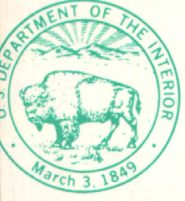
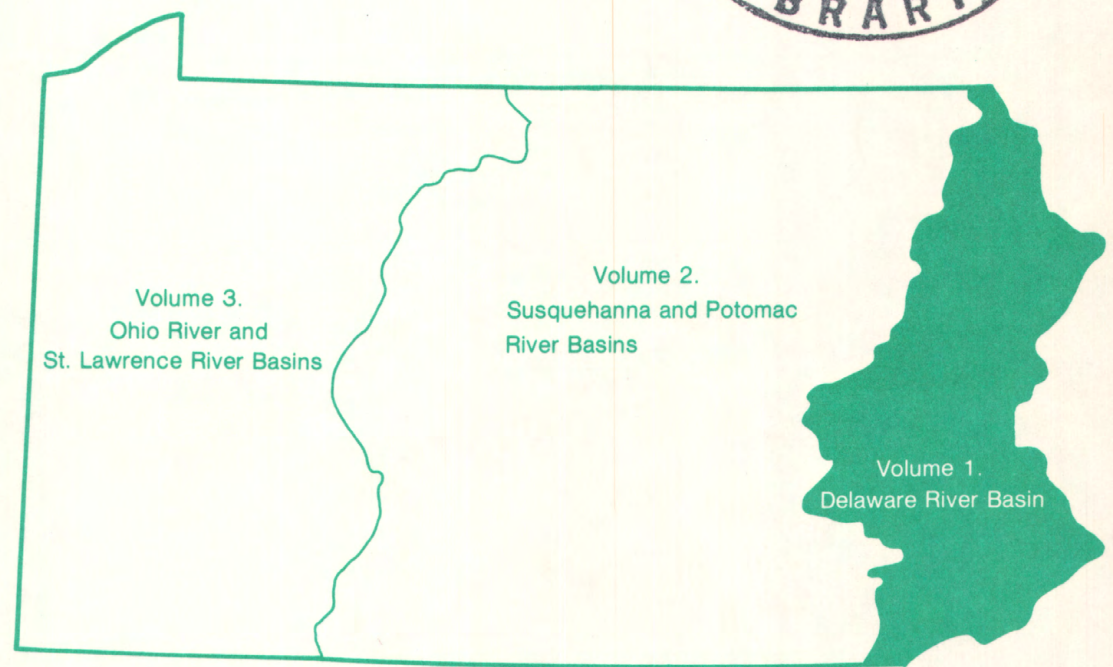
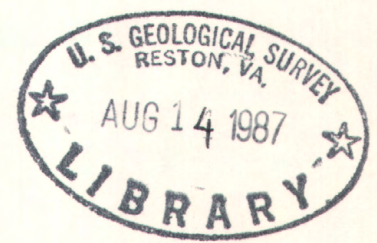


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Water Resources Data Pennsylvania Water Year 1985

Volume 1. Delaware River Basin



U.S. GEOLOGICAL SURVEY WATER-DATA REPORT PA-85-1
Prepared in cooperation with the Pennsylvania Department of
Environmental Resources, the Philadelphia Water Department
and with other State, municipal, and Federal agencies

CALENDAR FOR WATER YEAR 1985

1984

OCTOBER							NOVEMBER							DECEMBER						
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7	8	9	10	11	12	13								2	3	4	5	6	7	8
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1985

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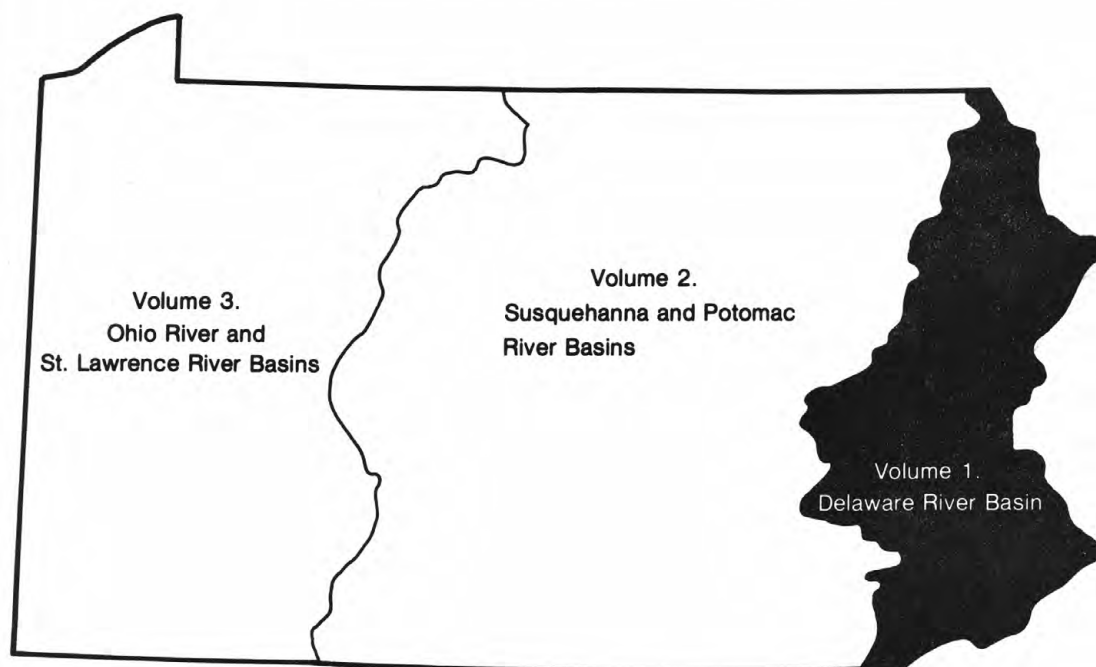
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							25	26	27	28	29	30	31	29	30					



Water Resources Data Pennsylvania Water Year 1985

Volume 1. Delaware River Basin

by J.R. Kolva, T.E. White, R.L. Druther, and P. Moleski



U.S. GEOLOGICAL SURVEY WATER DATA REPORT PA-85-1
Prepared in cooperation with the Pennsylvania Department of
Environmental Resources, the Philadelphia Water Department
and with other State, municipal, and Federal agencies

UNITED STATES DEPARTMENT OF THE INTERIOR

DONALD P. HODEL, Secretary

GEOLOGICAL SURVEY

Dallas L. Peck, Director

For additional information write to
District Chief, Water Resources Division
U.S. Geological Survey
P.O. Box 1107
Harrisburg, Pennsylvania 17108-1107
1987

PREFACE

This volume of the annual hydrologic data report of Pennsylvania is one of a series of annual reports that document hydrologic data gathered from the U.S. Geological Survey's surface-and ground-water data-collection networks in each State, Puerto Rico, and the Trust Territories. These records of streamflow, ground-water levels, and quality of water provide the hydrologic information needed by State, local, and Federal agencies, and the private sector for developing and managing our Nation's land and water resources. Hydrologic data for Pennsylvania are contained in three volumes:

- Volume 1. Delaware River Basin
- Volume 2. Susquehanna and Potomac River Basins
- Volume 3. Ohio and St. Lawrence River Basins

Volume 1 was prepared in cooperation with the Commonwealth of Pennsylvania and the other agencies under the general supervision of David E. Click, District Chief, Pennsylvania District, and Charles R. Wood, Subdistrict Chief, Malvern Subdistrict. It is the culmination of a concerted effort by dedicated personnel of the U.S. Geological Survey who collected, compiled, analyzed, verified, and organized the data, and who typed, edited, and assembled the report. In addition to the authors, who had primary responsibility for assuring that the information contained herein is accurate, complete, and adheres to Geological Survey policy and established guidelines, the following individuals contributed significantly to the collection, processing, and tabulation of the data:

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George Jung
L. DeWayne Cecil
Mark E. Jones

Craig R. Moore
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INTRODUCTION

Water resources data for the 1985 water year for Pennsylvania consist of records of discharge and water quality of streams; elevation and contents of lakes and reservoirs; elevation of tides; and water levels of ground-water wells. This volume contains records for water discharge at 68 gaging stations; elevation and contents at 12 lakes and reservoirs; elevation of tides at 4 gaging stations; water quality at 33 gaging stations; and water levels at 17 observation wells. Also included are data for 33 crest-stage, 51 low-flow, and 43 water-quality partial-record stations. Locations of these sites are shown on figures 6 through 9. Additional water data were collected at various sites not involved in the systematic data-collection program and are published as miscellaneous measurements and analyses. These data together with the data in Volumes 2 and 3 represent that part of the National Water Data System operated by the U.S. Geological Survey and cooperating State, local, and Federal agencies in Pennsylvania.

Records of discharge and stage of streams, and contents or stage of lakes and reservoirs were first published in a series of U.S. Geological Survey water-supply papers entitled, "Surface Water Supply of the United States." Through September 30, 1960, these water-supply papers were in an annual series and then in a 5-year series for 1961-65 and 1966-70. Records of chemical quality, water temperature, and suspended sediment were published from 1941 to 1970 in an annual series of water-supply papers entitled "Quality of Surface Waters of the United States." Records of ground-water levels were published from 1935 to 1974 in a series of water-supply papers entitled "Ground Water Levels in the United States." Water-supply papers may be consulted in the libraries of the principal cities in the United States or may be purchased from the Branch of Distribution, U.S. Geological Survey, 1200 South Eads Street, Arlington, Virginia 22202.

For water years 1961 through 1970, streamflow data were released by the Geological Survey in annual reports on a State-boundary basis. Water-quality records for water years 1964 through 1970 were similarly released either in separate reports or in conjunction with streamflow records.

Beginning with the 1971 water year, water data for streamflow, water quality, and ground water are published in official Survey reports on a State-boundary basis. These official Survey reports carry an identification number consisting of the two-letter State abbreviation, the last two digits of the water year, and the volume number. For example, this volume is identified as "U.S. Geological Survey Water-Data Report PA-83-1." These water-data reports are for sale, in paper copy or in microfiche by the National Technical Information Service, U.S. Department of Commerce, Springfield, Virginia 22161.

Additional information, including current prices, for ordering specific reports may be obtained from the District Chief at the address given on the back of the title page or by telephone (717) 782-3851.

COOPERATION

The U.S. Geological Survey and organizations of the Commonwealth of Pennsylvania have had cooperative agreements for the systematic collection of surface-water records during the periods 1919-21 and 1931 to date, water-quality records from 1944 to date, and ground-water records from 1925 to date. Organizations that supplied data are acknowledged in station descriptions. Organizations that assisted in collecting data through cooperative agreement with the Survey are:

State Department of Environmental Resources, Arthur A. Davis, Secretary, through the following: Office of Resources Management, James R. Grace, Deputy Secretary; Bureau of Water Resources Management John E. McSparren, Director; Office of Environmental Protection, Mark McClellan, Deputy Secretary; Bureau of Topographic and Geologic Survey, Donald M. Hoskins, State Geologist, Bureau of Water Quality Management, Dennis P. Capella, Director.

Delaware River Basin Commission, G.M. Hansler, Executive Director.

Chester County Water Resources Authority, D.C. Yaeck, Executive Director.

City of Bethlehem, Gordon Mowrer, Mayor.

City of Philadelphia, Water Department, W.J. Marrazzo, Water Commissioner.

Assistance in the form of funds or services was given by Corps of Engineers, U.S. Army, in collecting records for 62 gaging stations. Assistance was also furnished by the National Weather Service, NOAA, U.S. Department of Commerce.

The following organizations aided in collecting records:

Palmer Water Co.; Pennsylvania Power and Light Co.; Philadelphia Electric Co.; Philadelphia Suburban Water Co.; Panther Valley Water Co.; Borough of Tamaqua; Womelsdorf-Robeson Joint Water Authority; and the City of Coatesville.

SUMMARY OF
HYDROLOGIC CONDITIONS

Precipitation for the 1985 water year was about equal the 1951-80 normal for the Delaware River basin. Figure 1 compares the 1985 monthly precipitation with the 1951-80 monthly mean precipitation recorded at Allentown, Pennsylvania. Rainfall was about 10.5 inches below normal during the first 7 months of the water year, and about 10.9 inches above normal during the last 5 months of the year, with rainfall in April about 15 percent of normal, and the period of May through September about 150 percent of normal. September's rainfall was about 210 percent of normal. Most of this rainfall occurred during Hurricane Gloria on the 27th of the month.

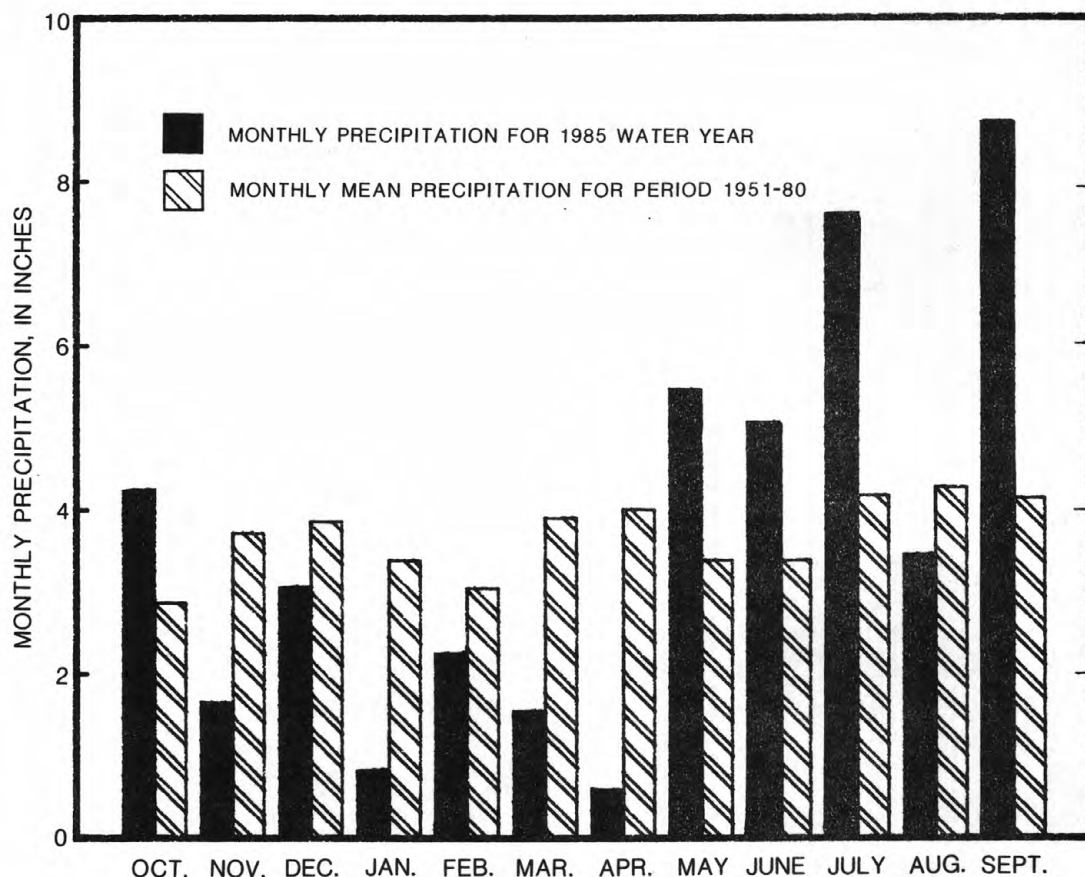


Figure 1.--Comparison of precipitation in the Delaware River basin above Allentown, Pa. during the 1985 water year with mean precipitation for 1951-80.

Streamflow for the Delaware River basin was below normal during the 1985 water year. Figure 2 compares the 1985 monthly and yearly mean discharges with the median discharges for 1951-80 at two representative gaging stations. The yearly mean discharge was 57 percent of the 1951-80 median at Schuylkill River at Pottstown, and 48 percent of the median at Bush Kill at Shoemakers.

Monthly mean discharges at Schuylkill River at Pottstown were normal during October. Monthly mean discharges for the period of November through August were below normal. Flows for April were 32 percent of normal, and were the lowest ever recorded at the gage for that month. Flows for September were 133 percent of normal, primarily due to Hurricane Gloria near the end of the month.

Monthly mean discharges at Bush Kill at Shoemakers were below normal during October, through April, and were 32 percent of normal for that period. Flows in May and August were near normal. Flows in June, July and September were all above normal. The November discharges were only 12 percent of normal. The September discharge was over 200 percent of normal, again primarily due to Hurricane Gloria.

Storage in seven major reservoirs during the 1985 water year was average or slightly below average except for Francis E. Walter Reservoir, which was over 500 percent of normal. The U.S. Army Corps of Engineers was running tests for the Francis E. Walter expansion project and was impounding much more water than normal.

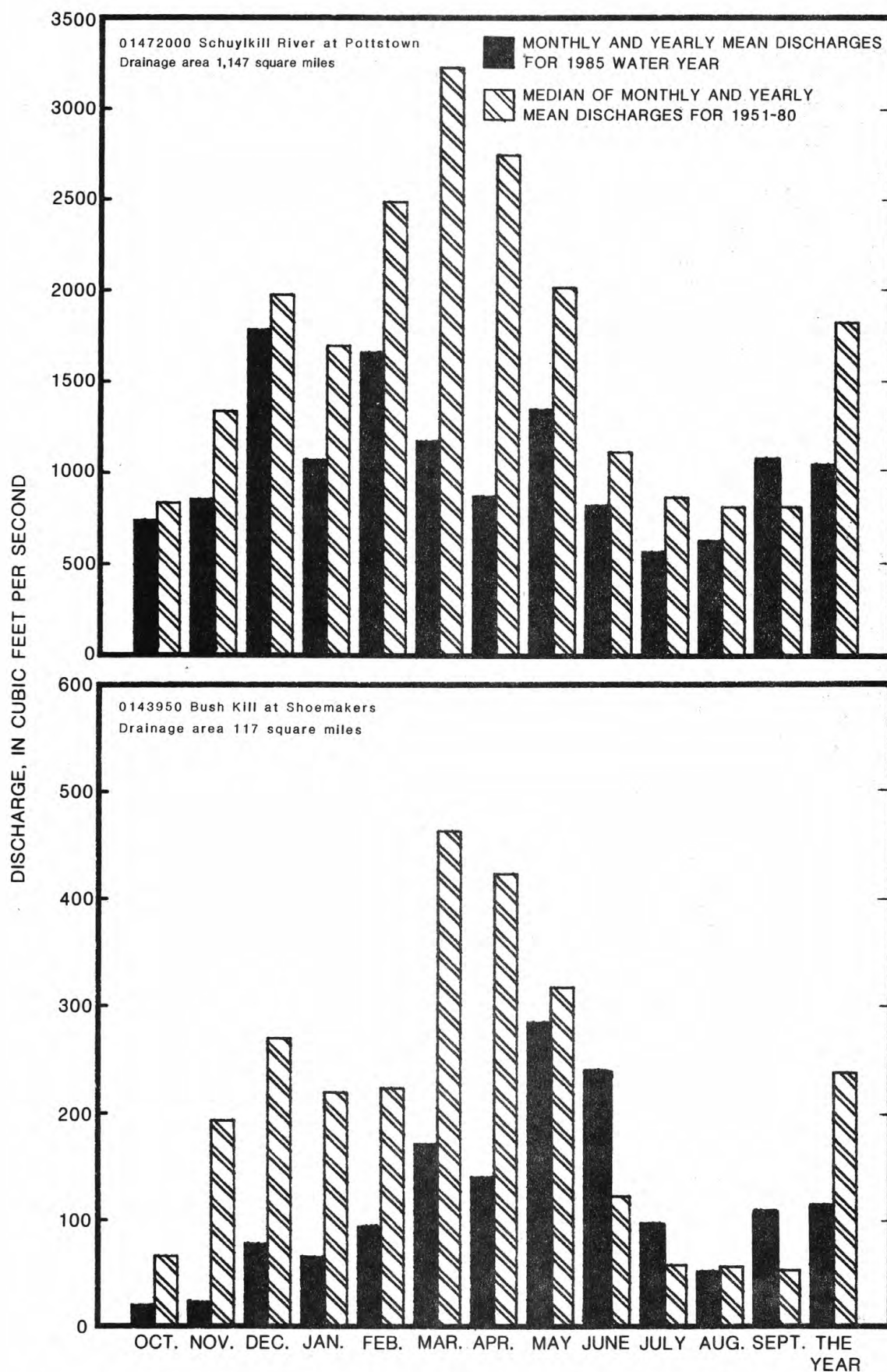


Figure 2.--Comparison of discharge at two long-term representative gaging stations during the 1985 water year with the median discharge for 1951-80.

Ground-water levels, which were above normal throughout much of the Delaware River basin during the 1984 water year, were generally below normal during the 1985 water year. However, water levels varied substantially throughout the basin due to an uneven distribution of precipitation. Seasonal mean water levels in 16 observation wells relative to long-term seasonal mean levels are shown in figure 3. Long-term mean water levels were calculated from records ranging from 4 to 35 years in length.

During the fall, water levels were generally normal or below normal in all but the southern part of the basin, where levels were normal to much above normal. Recharge during late fall and early winter was very slight and by winter, below normal to much below normal water levels prevailed in all but the southeastern part of the basin. By spring, water levels were still below normal throughout the entire basin, except the southeastern part. Summertime water levels were mixed. Levels in the southeastern and extreme northern parts of the basin were generally above normal and levels in the central and western parts of the basin, were generally normal to below normal.

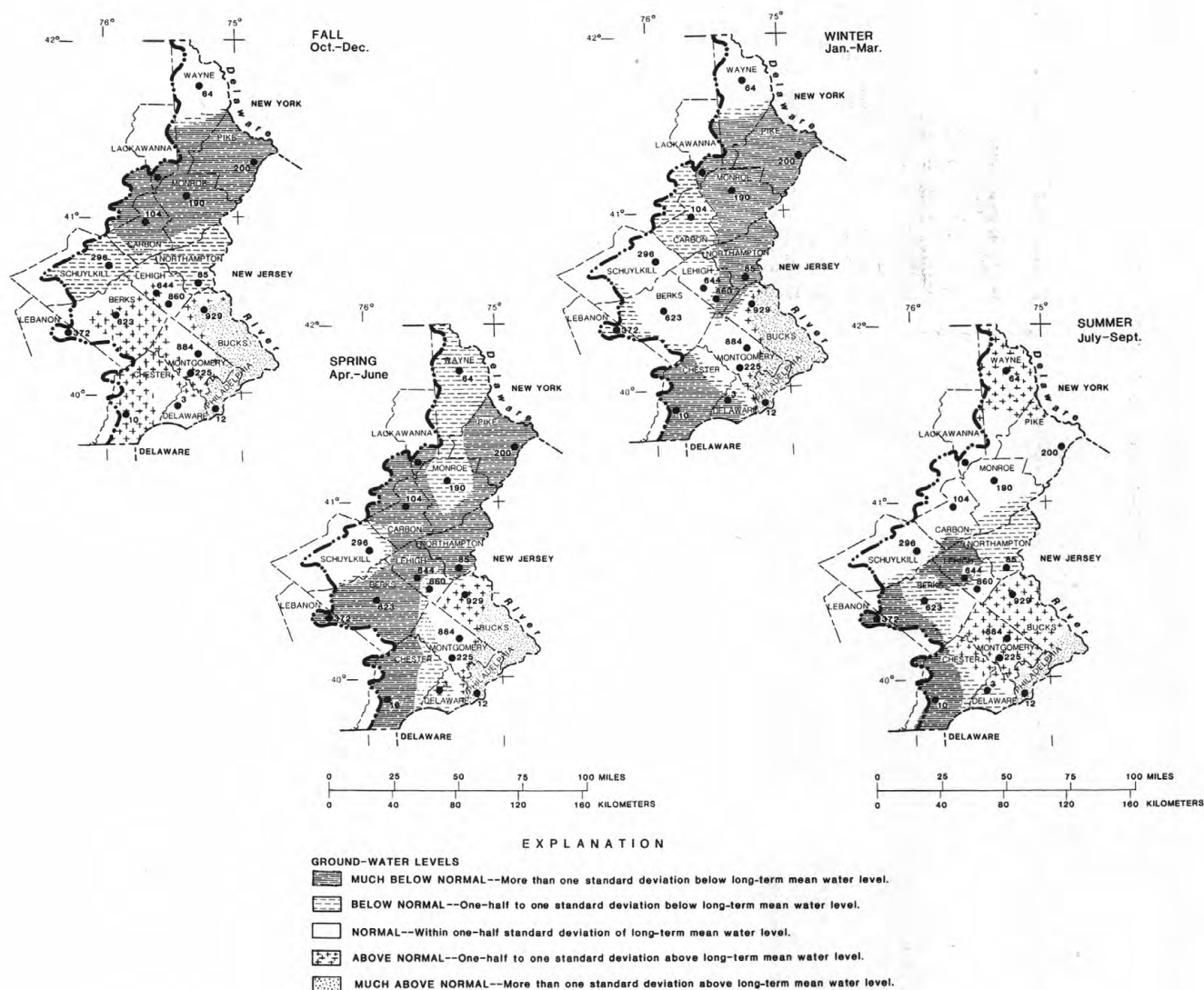


Figure 3.--Relationship between mean 1985 seasonal water levels and long-term mean water levels.

Data collected at the NASQAN (National Stream Quality Accounting Network) station, Schuylkill River at Philadelphia, showed the suspended-sediment concentrations to be lower on the average than measured in 1980, 1981, 1983, and 1984. No data were collected for the period January 6 to July 7 of the 1982 water year, so no comparison was made with the 1982 water year. Dissolved solid concentrations were highest during the months of January. Figure 4 compares the suspended-sediment discharge collected during the 1985 water year with the median suspended-sediment discharge for 1951-80. The yearly mean suspended-sediment discharge for 1985 was only 44 percent of the yearly median for the 1951-80 period. Monthly means were much lower, only 11 percent of the median, the period of March to August due to low streamflows during this period. The mean for September was over 60 times the median for that month due to the affects of Hurricane Gloria. That one storm supplied 61 percent of the sediment load for the year.

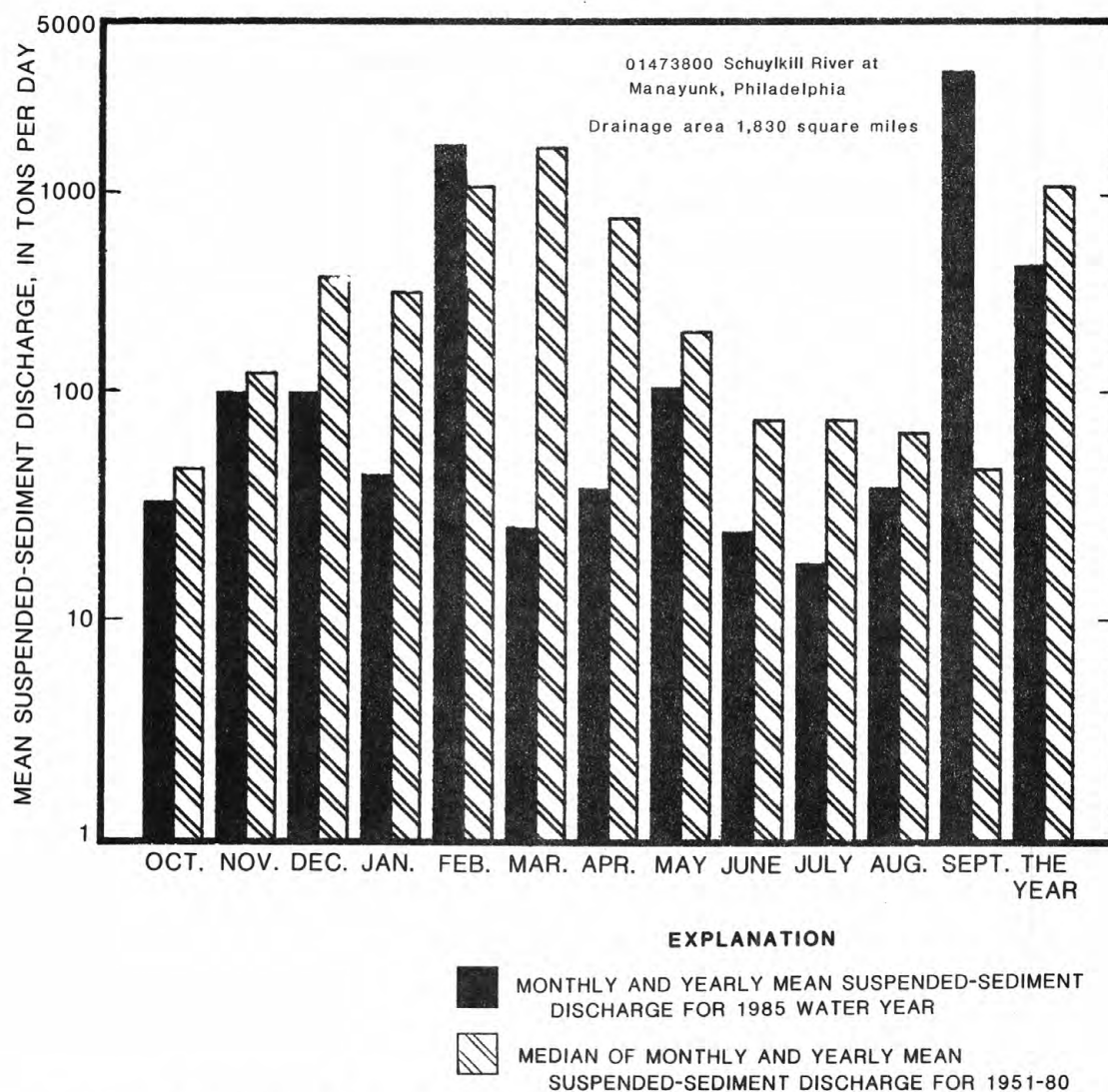


Figure 4.--Comparison of suspended-sediment discharge during the 1985 water year with the median suspended-sediment discharge for 1951-80.

SPECIAL NETWORKS AND PROGRAMS

Hydrologic bench-mark station is one that provides hydrologic data for a basin in which the hydrologic regimen will likely be governed solely by natural conditions. Data collected at a bench-mark station may be used to separate effects of natural from manmade changes in other basins which have been developed and in which the physiography, climate, and geology are similar to those in the undeveloped bench-mark basin.

National stream-quality accounting network (NASQAN) is a data-collection network designed by the U.S. Geological Survey to meet many of the information demands of agencies or groups involved in national or regional water-quality planning and management. Both accounting and broad-scale monitoring objectives have been incorporated into the network design. Areal configuration of the network is based on river-basin accounting units (identified by 8-digit hydrologic-unit numbers) designated by the Office of Water Data Coordination in consultation with the Water Resources Council. Primary objectives of the network are (1) to depict areal variability of streamflow and water-quality conditions nationwide on a year-by-year basis and (2) to detect and assess long-term changes in streamflow and stream quality.

Radiochemical program is a network of regularly sampled water-quality stations where samples are collected to be analyzed for radioisotopes. The streams that are sampled represent major drainage basins in the conterminous United States.

Tritium network is a network of stations which has been established to provide baseline information on the occurrence of tritium in the Nation's surface waters. In addition to the surface-water station in the network, tritium data are also obtained at a number of precipitation stations. The purpose of the precipitation stations is to provide an estimate sufficient for hydrologic studies of the tritium input to the United States.

EXPLANATION OF THE RECORDS

The records in this report are for the 1985 water year that began October 1, 1984, and ended September 30, 1985. A calendar of the water year is provided on the inside of the front cover. The records contain streamflow data, stage and content data for lakes and reservoirs, water-quality data for surface and ground water, and ground-water-level data. The following sections of the introductory text are presented to provide users with a more detailed explanation of how the hydrologic data published in this report were collected, analyzed, computed, and arranged for presentation.

Station Identification Numbers

Each data station, whether streamsite or wellsite, is assigned a unique identification number. This number is unique in that it applies specifically to a given station and to no other. The number usually is assigned when a station is first established and is retained for that station indefinitely. The systems used by the U.S. Geological Survey to assign identification numbers for surface-water stations and for ground-water well sites differ, but both are based on geographic locations. The "downstream order" system is used for regular surface-water stations and the "latitude-longitude" system is used for wells and, in Pennsylvania, for surface-water stations where only miscellaneous measurements are made.

Downstream Order System

Since October 1, 1950, the order of listing hydrologic-station records in Survey reports is in a downstream direction along the main stream. All stations on a tributary entering upstream from a main-stream station are listed before that station. A station on a tributary that enters between two main-stream stations is listed between them. A similar order is followed in listing stations on first rank, second rank, and other ranks of tributaries. The rank of any tributary on which a station is situated with respect to the stream to which it is immediately tributary is indicated by an indentation in a list of stations in the front of the report. Each indentation represents one rank. This downstream order and system of indentation show which stations are on tributaries between any two stations and the rank of the tributary on which each station is situated.

As an added means of identification, each hydrologic station and partial-record station has been assigned a station number. These are in the same downstream order used in this report. In assigning station numbers, no distinction is made between partial-record stations and other stations; therefore, the station number for a partial-record station indicates downstream-order position in a list made up of both types of stations. Gaps are left in the series of numbers to allow for new stations that may be established; hence, the numbers are not consecutive. The complete 8-digit number for each station such as 01474500, which appears just to the left of the station name, includes the 2-digit part number "01" plus the 6-digit downstream order number "474500". The part number designates the major river basin; for example, part "01" is the North Atlantic Slope.

Latitude-Longitude System

The well and miscellaneous site numbering system of the U.S. Geological Survey is based on the grid system of latitude and longitude. The system provides the geographic location of the well or miscellaneous site and a unique number for each site. The number consists of 15 digits. The first 6 digits denote the degrees, minutes, and seconds of latitude, the next 7 digits denote the degrees, minutes, and seconds of longitude, and the last 2 digits (assigned sequentially) identify the wells or other sites within a 1-second grid. See figure 5 below.

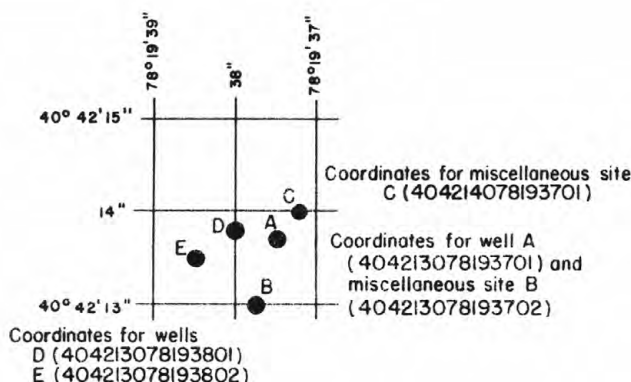


Figure 5.--System for numbering wells and miscellaneous sites (latitude and longitude).

A local well number is also assigned to the wells and consists of a 2-letter abbreviation of the county in which the well is located and a sequential number assigned at the time the well was scheduled.

Records of Stage and Water Discharge

Records of stage and water discharge may be complete or partial. Complete records of discharge are those obtained using a continuous stage-recording device through which either instantaneous or mean daily discharge may be computed for any time, or any period of time, during the period of record. Complete records of lake or reservoir contents, similarly, are those for which stage or content may be computed or estimated with reasonable accuracy for any time or period of time. They may be obtained using a continuous stage-recording device, but need not be. Because mean daily discharges and end-of-day contents commonly are published for such stations, they are referred to as "daily stations."

By contrast, partial records are obtained through discrete measurements without using a continuous stage-recording device and pertain only to a few flow characteristics, or perhaps only one. The nature of a partial record is indicated by table titles such as "crest-stage partial records," or "low-flow partial records." Records of miscellaneous discharge measurements or of measurements from special studies, such as low-flow seepage studies, may be considered as partial records, but they are presented separately in this report. Location of all complete-record and crest-stage stations in the St. Lawrence River basin for which data are given in this report are shown in figure 3.

Data Collection and Computation

The base data collected at gaging stations consist of records of stage and measurement of discharge of streams or canals, and stage, surface area, and contents of lakes or reservoirs. In addition, observations of factors affecting the stage-discharge relation or the stage-capacity relation, weather records, and other information are used to supplement base data in determining the daily flow or volume of water in storage. Records of stage are obtained from either direct readings on a nonrecording gage or from a water-stage recorder that gives either a continuous graph of the fluctuations or a tape punched at selected time intervals. Measurements of discharge are made with a current meter, using the general methods adopted by the Geological Survey. These methods are described in standard textbooks, in Water Supply Papers 888, and 2175, Volumes 1 and 2 in U.S. Geological Survey Techniques of Water Resources Investigations, book 3, chapter A6.

For stream-gaging stations, rating tables giving the discharge for any stage are prepared from stage-discharge relation curves. If extensions to the rating curves are necessary to express discharge greater than measured, they are made on the basis of indirect measurements of peak discharge (such as slope-area or contracted-opening measurements, computation of flow over dams or weirs), step-backwater techniques, velocity-area studies, and logarithmic plotting. The daily mean discharge is computed from gage heights and rating tables, then the monthly and yearly mean discharge are computed from the daily figures. If the stage-discharge relation is subject to change because of frequent or continual change in the physical features that form the control, the daily mean discharge is computed by the shifting-control method, in which correction factors based on individual discharge measurements and notes by hydrologists and observers are used in applying the gage heights to the rating tables. If the stage-discharge relation for a station is temporarily changed by the presence of aquatic growth or debris on the control, the daily mean discharge is computed by what is basically the shifting-control method.

At some stream-gaging stations the stage-discharge relation is affected by the backwater from reservoirs, tributary streams, or other sources. This necessitates the use of the slope method in which the slope or fall in a reach of the stream is a factor in computing discharge. The slope or fall is obtained by means of an auxiliary gage set at some distance from the base gage. At some stations the stage-discharge relation is affected by changing stage; at these stations the rate of change in stage is used as a factor in computing discharge.

At some northern stream-gaging stations the stage-discharge relation is affected by ice in the winter, and it becomes impossible to compute the discharge in the usual manner. Discharge for periods of ice effect is computed on the basis of gage-height record and occasional winter discharge measurements. Consideration is given to the available information on temperature and precipitation, notes by gage observers and hydrologists, and comparable records of discharge for other stations in the same or nearby basins.

For a lake or reservoir station, capacity tables giving the contents for any stage are prepared from stage-area relation curves defined by surveys. The application of the stage to the capacity table gives the contents, from which the daily, monthly, or yearly change in contents is computed.

If the stage-capacity curve is subject to changes because of deposition of sediment in the reservoir, periodic resurveys of the reservoir are necessary to define new stage-capacity curves. During the period between reservoir surveys the computed contents may be increasingly in error due to the gradual accumulation of sediment.

For some gaging stations there are periods when no gage-height record is obtained or the recorded gage height is so faulty that it cannot be used to compute daily discharge or contents. This happens when the recorder stops or otherwise fails to operate properly, intakes are plugged, the float is frozen in the well, or for various other reasons. For such periods the daily discharges are estimated on the basis of recorded range in stage, prior and subsequent records, discharge measurements, weather records, and comparison with records for other stations in the same or nearby basins. Likewise daily contents may be estimated on the basis of operator's log, prior and subsequent records, inflow-outflow studies, and other information.

Data Presentation

The records published for each gaging station consist of two parts--the manuscript or station description and the data table for the current water year. The manuscript provides, under various headings, descriptive information, such as station location; period of record; average discharge; historical extremes; record accuracy; and other remarks pertinent to station operation and regulation. The following information, as appropriate, is provided with each continuous record of discharge or lake content. Comments to follow clarify information presented under the various headings of the station description.

LOCATION.--Information on locations is obtained from the most accurate maps available. The location of the gage with respect to the cultural and physical features in the vicinity and with respect to the reference place mentioned in the station name is given. River mileages, given for only a few stations, were determined by methods given in "River Mileage Measurement," Bulletin 14, Revision of October 1968, prepared by the Water Resources Council or were provided by the U.S. Army Corps of Engineers.

DRAINAGE AREA.--Drainage areas are measured using the most accurate maps available. Because the type maps available varies from one drainage basin to another, the accuracy of the drainage areas likewise varies. Drainage areas are updated as better maps become available.

PERIOD OF RECORD.--This indicates the period for which there are published records for the station or for an equivalent station. An equivalent station is one that was in operation at a time that the present station was not, and whose location was such that records from it can reasonably be considered equivalent with records from the present station.

REVISED RECORDS.-- Published records, because of new information, occasionally are found to be incorrect, and revisions are printed in later reports. Listed under this heading are all the reports in which revisions have been published for the station and the water years to which the revisions apply. If a revision did not include daily, monthly, or annual figures of discharge, that fact is noted after the year dates as follows: "(M)" means that only the instantaneous maximum discharge was revised; "(m)" that only the instantaneous minimum was revised; and "(P)" that only the peaks discharges were revised. If the drainage area has been revised, the report in which the most recently revised figure was first published is given.

GAGE.--The type of gage in current use, the datum of the current gage referred to National Geodetic Vertical Datum of 1929 (see glossary), and a condensed history of the types, locations, and datums of previous gages are given under this heading.

REMARKS.--All periods of estimated daily-discharge record will either be identified by date in this paragraph of the station description for water-discharge stations or flagged in the daily-discharge table. (See next section, "Identifying Estimated Daily Discharge.") If a remark statement is used to identify estimated record, the paragraph will begin with this information presented as the first entry. The paragraph is also used to present information relative to the accuracy of the records, to special methods of computation, to conditions that affect natural flow at the station and, possibly, to other pertinent items. For reservoir stations, information is given on the dam forming the reservoir, the capacity, outlet works and spillway, and purpose and use of the reservoir.

COOPERATION.--Records provided by a cooperating organization or obtained for the Geological Survey by a cooperating organization are identified here.

AVERAGE DISCHARGE.--The discharge value given is the arithmetic mean of the water-year mean discharges. It is computed only for stations having at least 5 water years of complete record, and only water years of complete record are included in the computation. It is not computed for stations where diversions, storage, or other water-use practices cause the value to be meaningless. If water developments significantly altering flow at the station are put into use after the station has been in operation for a period of years, a new average is computed as soon as 5 wateryears of record have accumulated following the development.

EXTREMES FOR PERIOD OF RECORD.--Extremes may include maximum and minimum stages and maximum and minimum discharges of contents. Unless otherwise qualified, the maximum discharge or content is the instantaneous maximum corresponding to the highest stage that occurred. The highest stage may have been obtained from a graphic or digital recorder, a crest-stage gage, or by direct observation of a nonrecording gage. If the maximum stage did not occur on the same day as the maximum discharge or content, it is given separately. Similarly, the minimum is the instantaneous minimum discharge, unless otherwise qualified, and was determined and is reported in the same manner as the maximum.

EXTREMES OUTSIDE PERIOD OF RECORD.--Included here is information concerning major floods or unusually low flows that occurred outside the stated period of record. The information may or may not have been obtained by U.S. Geological Survey.

EXTREMES FOR CURRENT YEAR.--Extremes given here are similar to those for the period of record, except the peak discharge listing may include secondary peaks. For stations meeting certain criteria, all peak discharges and stages occurring during the water year and greater than a selected base discharge are presented under this heading. The peaks greater than the base discharge, including the highest one, are referred to as secondary peaks. Peak discharges are not published for canals, ditches, drains, or streams for which the peaks are subject to substantial control by man. The time of occurrence for peaks is expressed in 24-hour local standard time. For example, 12:30 a.m. is 0030, and 1:30 p.m. is 1330. The minimum for the current water year appears below the table of peak data.

REVISIONS.--If a critical error in published records is discovered, a revision is included in the first report following discovery of the error.

Although rare, occasionally the records of a discontinued gaging station may need revision. Because, for these stations, there would be no current or, possibly, future station manuscript published to document the revision in a "Revised Records" entry, users of data for these stations who obtained the data from previously published data reports may wish to contact the District office to determine if the published records were ever revised after the station was discontinued. Of course, if the data were obtained by computer retrieval, the data would be current and there would be no need to check because any published retrieval of data is always accompanied by revisions of the corresponding data in computer storage.

The daily table for stream-gaging stations gives the mean discharge for each day and is followed by monthly and yearly summaries. In the monthly summary below the daily table, the line headed "TOTAL" gives the sum of the daily figures. The line headed "MEAN" gives the average flow in cubic feet per second during the month. The lines headed "MAX" and "MIN" give the maximum and minimum daily discharges, respectively, for the month. Discharge for the month also may be expressed in cubic feet per second per square mile (line headed "CFSM"), or in inches (line headed "IN"), or in acre-feet (line headed "AC-FT"). Figures for cubic feet per second per square mile and runoff in inches are omitted if there is extensive regulation or diversion, if the drainage area includes large noncontributing areas, or if the average annual rainfall over the drainage basin is usually less than 20 inches. In the yearly summary below the monthly summary, the figures shown are the appropriate daily discharges for the calendar and water years.

Footnotes to the table of daily discharge are introduced by the word "NOTE." Footnotes are used to indicate periods for which the discharge is computed or estimated by special methods because of no gage-height record, backwater from various sources, or other unusual conditions. Periods of no gage-height record are indicated if the period is continuous for a month or more or includes the maximum discharge for the year. Periods of backwater from an unusual source, of indefinite stage-discharge relation, or of any other unusual condition at the gage site are indicated only if they are a month or more in length and the accuracy of the records is affected. Days on which the stage-discharge relation is affected by ice are not indicated. The methods used for computing discharge for various unusual conditions have been explained in preceding paragraphs.

Data collected at partial-record stations follow the information for continuous record sites. Data for partial-record discharge stations are presented in two tables. The first is a table of discharge measurements at low-flow partial-record stations, and the second is a table of annual maximum stage and discharge at crest-stage stations. The tables of partial-record stations are followed by a listing of discharge measurements made at sites other than continuous-record or partial-record stations. Occasionally, a series of discharge measurements are made within a short time period to investigate the seepage gains or losses along a reach of a stream or to determine the low-flow characteristics of an area. Such measurements are also given in special tables following the tables of partial-record stations.

Identifying Estimated Daily Discharge

Estimated daily-discharge values published in the water-discharge tables of annual State data reports are identified either by flagging individual daily values with the letter "e" and printing a table footnote, "e Estimated," or by listing the dates of the estimated record in the REMARKS paragraph of the station description.

Accuracy of Field Data and Computed Results

The accuracy of streamflow data depends primarily on (1) the stability of the stage-discharge relation or, if the control is unstable, the frequency of discharge measurements, and (2) the accuracy of observations of stage, measurements of discharge, and interpretations of records.

The station description under "REMARKS" states the degree of accuracy of the records. "Excellent" means that about 95 percent of the daily discharges are within 5 percent; "good," within 10 percent; and "fair," within 15 percent. "Poor" means that daily discharges have less than "fair" accuracy.

Figures of daily mean discharge in this report are shown to the nearest hundredth of a cubic foot per second for discharges of less than 1 ft³/3; to tenths between 1.0 and 10 ft³/3; to whole numbers between 10 and 1,000 ft³/s and to 3 significant figures above 1,000 cfs. The number of significant figures used is based solely on the magnitude of the figure. The same rounding rules apply to discharge figures listed for partial-record stations.

Discharge at many stations, as indicated by the monthly mean, may not reflect natural runoff due to the effects of diversion, consumption, regulation by storage, increase or decrease in evaporation due to artificial causes, or to other factors. For such stations, figures of cubic feet per second per square mile and of runoff in inches are not published unless satisfactory adjustments can be made for diversions, for changes in contents of reservoirs, or for other changes incident to use and control. Evaporation from a reservoir is not included in the adjustments for changes in reservoir contents, unless it is so stated. Even at those stations where adjustments are made, large errors in computed runoff may occur if adjustments or losses are large in comparison with the observed discharge.

Other Data Available

Information of a more detailed nature than that published for most of the gaging stations such as observations of water temperatures, discharge measurements, gage-height records, and rating tables is on file in the district office. Also most gaging-station records are available in computer-usable form and many statistical analyses have been made.

Information on the availability of unpublished data or statistical analyses may be obtained from the district office.

Records of Surface-Water Quality

Records of surface-water quality ordinarily are obtained at or near stream-gaging stations because interpretation of records of surface-water quality nearly always requires corresponding discharge data. Records of surface-water quality in this report may involve a variety of types of data and measurement frequencies.

Classification of Records

Water-quality data for surface-water sites are grouped into one of three classifications. A continuing-record station is a site where data are collected on a regularly scheduled basis. Frequency may be once or more times daily, weekly, monthly, or quarterly. A partial-record station is a site where limited water-quality data are collected systematically over a period of years. Frequency of sampling is usually less than quarterly. A miscellaneous sampling site is a location other than a continuing or partial-record station, where samples are collected to give better areal coverage to define water-quality conditions in the river basin.

Arrangement of Records

Water-quality records collected at a surface-water daily record station are published immediately following that record, regardless of the frequency of sample collection. Station number and name are the same both records. Where a surface-water daily record station is not available or where the water quality differs significantly from that at a nearby surface-water station, the continuing water-quality record is published with its own station number and name in the regular downstream-order sequence. Water-quality data for partial-record stations and for miscellaneous sampling sites appear in separate tables following the table of discharge measurements at miscellaneous sites.

On-Site Measurements and Sample Collection

Most methods for collecting and analyzing water samples are described in the U.S. Geological Survey Techniques of Water-Resources Investigations listed on a following page.

One sample can define adequately the water quality at a given time if the mixture of solutes throughout the stream cross section is homogeneous. However, the concentration of solutes at different locations in the cross section may vary widely with different rates of water discharge; depending on the source of material and the turbulence and mixing of the stream. Some streams must be sampled through several vertical sections to obtain a representative sample needed for an accurate mean concentration and for use in calculating load.

Chemical-quality data published in this report are considered to be the most representative values available for the stations listed. The values reported represent water-quality conditions at the time of sampling as much as possible, consistent with available sampling techniques and methods of analysis. In the rare case where an apparent inconsistency exists between a reported pH value and the relative abundance of carbon dioxide species (carbonate and bicarbonate), the inconsistency is the result of a slight uptake of carbon dioxide from the air by the sample between measurement of pH in the field and determination of carbonate and bicarbonate in the laboratory.

For chemical-quality stations equipped with digital monitors, the records consist of daily maximum, minimum, and mean values for each constituent measured and are based upon hourly punches beginning at 0100 hours and ending at 2400 hours for the day of record. More detailed records (hourly values) may be obtained from the district office.

Water Temperature

Water temperatures are measured at most of the water-quality stations. In addition, water temperatures are taken at time of discharge measurements for water-discharge stations. For stations where water temperatures are taken manually once or twice daily, the water temperatures are taken at about the same time each day. Large streams have a small diurnal temperature change; shallow streams may have a daily range of several degrees and may follow closely the changes in air temperature. Some streams may be affected by waste-heat discharges. At stations where recording instruments are used, either mean temperatures or maximum and minimum temperatures for each day are published.

Sediment

Suspended-sediment concentrations are determined from samples collected by using depth-integrating samplers. Samples usually are obtained at several verticals in the cross section, or a single sample may be obtained at a fixed point and a coefficient applied to determine the mean concentration in the cross section.

During periods of rapidly changing flow or rapidly changing concentration, samples may have been collected more frequently (twice daily or, in some instances, hourly). The published sediment discharges for days of rapidly changing flow or concentration were computed by the subdivided-day method (time-discharge weighted average). Therefore, for those days when the published sediment discharge value differs from the value computed as the product of discharge times mean concentration times 0.0027, the reader can assume that the sediment discharge for that day was computed by the subdivided-day method. For periods when no samples were collected, daily loads of suspended sediment were estimated on the basis of water discharge, sediment concentrations observed immediately before and after the periods, and suspended-sediment loads for other periods of similar discharge.

At other stations, suspended-sediment samples were collected periodically at many verticals in the stream cross section. Although data collected periodically may represent conditions only at the time of observations such data are useful in establishing seasonal relations between quality and streamflow in predicting long-term sediment-discharge characteristics of the stream.

In addition to the records of the quantities of suspended sediment, records of the periodic measurements of the particle-size distribution of the suspended-sediment and bed material are included.

Laboratory Measurements

Sediment samples, samples for biochemical oxygen demand (BOD), and daily samples for specific conductance are analyzed locally. All other samples are analyzed in the Geological Survey laboratories in Arvada, CO. Methods used in analyzing sediment samples and computing sediment records are given in TWRI, Book 5, Chap. CL. Methods used by the Geological Survey laboratory are given in TWRI, Book 1, Chap. D2; Book 3, Chap. C2; Book 5, Chap. A1, A3, and A4.

Data Presentation

For continuing-record stations, information pertinent to the history of station operation is provided in descriptive headings preceding the tabular data. These descriptive headings give details regarding location, drainage area, period of record, type of data available, instrumentation, general remarks, cooperation, and extremes for parameters currently measured daily. Tables of chemical, physical, biological, radiochemical data, and so forth, obtained at a frequency less than daily, are presented first. Tables of "daily values" of specific conductance, pH, water temperature, dissolved oxygen, and suspended sediment then follow in sequence.

In the descriptive headings, if the location is identical to that of the discharge gaging station, neither the LOCATION nor the DRAINAGE AREA statements are repeated. The following information, as appropriate, is provided with each continuous-record station. Comments that follow clarify information presented under the various headings of the station description.

LOCATION.--See Data Presentation under "Records of Stage and Water Discharge;" same comments apply.

DRAINAGE AREA.-- See Data Presentation under "Records of Stage Water Discharge;" same comments apply.

PERIOD OF RECORD.--This indicates the periods for which there are published water-quality records for the station. The periods are shown separately for records of parameters measured daily or continuously and those measured less than daily. For those measured daily or continuously, periods of record are given for the parameters individually.

INSTRUMENTATION.--Information on instrumentation is given only if a water-quality monitor, temperature record, sediment pumping sampler, or other sampling device is in operation at a station.

REMARKS.--Remarks provide added information pertinent to the collection, analysis, or computation of the record.

COOPERATION.--Records provided by a cooperating organization or obtained for the Geological Survey by a cooperating organization are identified here.

EXTREMES.--Maximums and minimums are given only for parameters measured daily or more frequently. None are given parameters measured weekly or less frequently, because the true maximums and minimums may not have been sampled. Extremes, when given, are for both the period of record and for the current water year.

REVISION.--If errors in published water-quality records are discovered after publication, appropriate updates are made to the Water-Quality File in the U.S. Geological Survey's computerized data system, WATSTORE, and subsequently by monthly transfer of update transactions to the U.S. Environmental Protection Agency's STORET system. Because the usual volume of updates makes it impractical to document individual changes in the State data-report series or elsewhere, potential users of U.S. Geological Survey water-quality data are encouraged to obtain all required data from the appropriate computer file to insure the most recent updates.

Remark Codes

The following remarks codes may appear with the water-quality data in this report:

PRINTED OUTPUT	REMARK
E	Estimated value
>	Actual value is known to be greater than the value shown
<	Actual value is known to be less than the value shown
K	Results based on colony count outside the acceptable range (non-ideal colony count)
L	Biological organism count less than 0.5 percent (organisms may be observed rather than counted)
D	Biological organism count equal to or greater than 15 percent (dominant)
&	Biological organism estimated as dominant

Frequency-of-Sampling Notation

The categories of data given in the "PERIOD OF RECORD" paragraph are followed by the water year(s) for data which was collected at New York gaging stations. The amount of data available is specified by the following letter codes:

- | | |
|------------------------------|------------------------------------|
| (a) 1 or 2 samples per year. | (d) 10 to 20 samples per year. |
| (b) 3 to 5 samples per year. | (e) more than 20 samples per year. |
| (c) 6 to 9 samples per year. | |

Records of Ground-Water Levels

Water-level data from a network of observation wells are given in this report. The network well data are intended to provide a sampling and historical record of water-level changes in the Nations most important aquifers. Locations of the observation wells in this network in Pennsylvania are shown in figures 6 and 7. Water-level data for specific projects are reported under those projects.

Data Collection and Computation

Measurements are made in many types of wells, under varying conditions of access and at different temperatures, hence neither the method of measurement nor the equipment can be standardized. At each observation well, however, the equipment and techniques used are those that will ensure that measurements at each well are consistent.

Tables of water-level data are presented by counties arranged in alphabetical order. The prime identification number for a given well is a 15-digit number that is based on latitude and longitude. The secondary identification number is the local well number, that is provided for local needs.

Data Presentation

Each well record consists of two parts, the station description and the data table of water levels observed during the water year. The description of the well is presented first through use of descriptive headings preceding the tabular data. The comments to follow clarify information presented under the various headings.

LOCATION.--This paragraph follows the well-indentification number and reports the latitude and longitude (given in degrees, minutes, and seconds); a landline location designation; the hydrologic-unit number; the distance and direction from a geographic point of reference; and the owner's name.

AQUIFER.-- This entry describes the aquifer by age and composition.

WELL CHARACTERISTICS.--This entry describes the well in terms of depth, diameter, casing depth and (or) screened interval, method of construction, use, and additional information such as casing breaks, collapsed screen, and other changes since construction.

DATUM.--This entry describes both the measuring point and the land-surface altitude at the well. The measuring point is described physically (such as top of collar, notch in top of casing, plug in pump base, and so on), and in relation to land surface (such as 1.3 ft above land-surface datum). The altitude of the land-surface datum (LSD) is described in feet above (or below) National Geodetic Vertical Datum of 1929 (NGVD of 1929); it is reported with a precision depending on the method of determination.

REMARKS.--This entry describes factors that may influence the water level in a well or the measurement of the water level. It should identify wells that are also water-quality observation wells, and may be used to acknowledge the assistance of local (non-Survey) observers.

PERIOD OF PUBLISHED RECORD.--This entry indicates the period for which there are published records for the well. It reports the month and year of the start of publication of water level records by the U.S. Geological Survey or cooperating agency, and the words "to current year" if the records are to be continued to the following year. Periods for which water-level records are available, but not published by the Survey, may be noted.

EXTREMES FOR PERIOD OF PUBLISHED RECORD.--This entry contains the highest and lowest water levels of the period of published record, with respect to land-surface datum (LSD), and the dates of their occurrence.

A table of water levels follows the station description for each well. Water levels are reported in feet below (or above) land-surface datum. All periodic measurements of water levels for wells are listed. For wells equipped with recorders, daily water-level lows are published. The highest and lowest daily water levels of the water year are shown on a line below the table. Because only daily lows are published for wells with recorders, the extreme instantaneous high may be a value that is not listed in the table. Missing records are indicated by dashes in place of the water level.

ACCESS TO WATSTORE DATA

The National Water Data Storage and Retrieval System (WATSTORE) was established for handling water data collected through the activities of the U.S. Geological Survey and to provide for more effective and efficient means of releasing the data to the public. The system is operated and maintained on the central computer facilities of the Survey at its National Center in Reston, Virginia.

WATSTORE can provide a variety of useful products ranging from simple data tables to complex statistical analyses. A minimal fee, plus the actual computer cost incurred in producing a desired product, is charged to the requester. Information about the availability of specific types of data, the acquisition of data or products, and user charges can be obtained locally from each of the Water Resources Division's district offices (see address given on the back of the title page).

General inquiries about WATSTORE may be directed to: Chief Hydrologist, U.S. Geological Survey, 437 National Center, Reston, Virginia 22092.

DEFINITION OF TERMS

Terms related to streamflow, water-quality, and other hydrologic data, as used in this report, are defined below. See also the table for converting Inch-pound units to International System of units (SI) on the inside of the back cover.

Acre-foot (AC-FT, acre-ft) is the quantity of water required to cover 1 acre to depth of 1 foot and is equivalent to 43,560 cubic feet or about 326,000 gallons or 1,233 cubic meters.

Algae are mostly aquatic single-celled, colonial, or multi-celled plants, containing chlorophyll and lacking roots, stems and leaves.

Algal growth potential (AGP) is the maximum algal dry weight biomass that can be produced in a natural water sample under standardized laboratory conditions. The growth potential is the algal biomass present at stationary phase and is expressed as milligrams dry weight of algae produced per liter of sample.

Aquifer is a geologic formation, group of formations, or part of a formation that contains sufficient saturated permeable material to yield significant quantities of water to wells and springs.

Artesian means confined and is used to describe a well in which the water level stands above the top of the aquifer, tapped by well. A flowing artesian well is one in which the water level is above the land surface.

Bacteria are microscopic unicellular organisms, typically spherical, rodlike, or spiral and threadlike in shape, often clumped into colonies. Some bacteria cause disease, others perform an

Cfs-day is the volume of water represented by flow of 1 cubic foot per second for 24 hours. It is equivalent to 86,400 cubic feet, approximately 1.9835 acre-feet, about 646,000 gallons or 2,447 cubic meters.

Chemical oxygen demand (COD) is a measure of the chemically oxidizable material in the water, and furnishes an approximation of the amount of organic and reducing material present. The determined value may correlate with natural water color or with carbonaceous organic pollution from sewage or industrial wastes.

Chlorophyll refers to the green pigments of plants. Chlorophyll a and b are the two most common pigments in plants.

Color unit is produced by one milligram per liter of platinum in the form of the chloroplatinate ion. Color is expressed in units of the platinum-cobalt scale.

Contents is the volume of water in a reservoir or lake. Unless otherwise indicated, volume is computed on the basis of a level pool and does not include bank storage.

Control designates a feature downstream from the gage that determines the stage-discharge relation at the gage. This feature may be a natural constriction of the channel, an artificial structure, or a uniform cross section over a long reach of the channel.

Control structure as used in this report is a structure on a stream or canal that is used to regulate the flow or stage of the stream or to prevent the intrusion of salt water.

Cubic feet per second per square mile (CFSM) is the average number of cubic feet of water flowing per second from each square mile of area drained, assuming that the runoff is distributed uniformly in time and area.

Cubic foot per second (FT³/S, ft³/s) is the rate of discharge representing a volume of 1 cubic foot passing a given point during 1 second and is equivalent to approximately 7.48 gallons per second or 448.8 gallons per minute or 0.02832 cubic meters per second.

Discharge is the volume of water (or more broadly, volume of fluid plus suspended sediment) that passes a given point within a given period of time.

Mean discharge (MEAN) is the arithmetic mean of individual daily mean discharges during a specific period.

Instantaneous discharge is the discharge at a particular instant of time.

Dissolved refers to that material in a representative water sample which passes through a 0.45 mm membrane filter. This is a convenient operational definition used by Federal agencies that collect water data. Determinations of "dissolved" constituents are made on subsamples of the filtrate.

Diversity index is a numerical expression of evenness of distribution of aquatic organisms. The formula for diversity index is:

$$\bar{d} = - \sum_{i=1}^s \frac{n_i}{n} \log_2 \frac{n_i}{n}$$

Where n_i is the number of individuals per taxon, n is the total number of individuals, and s is the total number of taxa in the sample of the community. Diversity index values range from zero, when all the organisms in the sample are the same, to some positive number, when some or all of the organisms in the sample are different.

Drainage area of a stream at a specific location is that area, measured in a horizontal plane, enclosed by a topographic divide from which direct surface runoff from precipitation normally drains by gravity into the river above the specified point. Figures of drainage area given herein include all closed basins, or noncontribution areas, within the area unless otherwise noted.

Drainage basin is a part of the surface of the earth that is occupied by a drainage system, which consists of a surface stream or a body of impounded surface water together with all tributary surface streams and bodies of impounded surface water.

Gage height (G.H.) is the water-surface elevation referred to some arbitrary gage datum. Gage height is often used interchangeably with the more general term "stage," although gage height is more appropriate when used with a reading on a gage.

Gaging station is a particular site on a stream, canal, lake, or reservoir where systematic observations of hydrologic data are obtained.

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Hydrologic unit is a geographic area representing part or all of a surface drainage basin or distinct hydrologic feature as delineated by the Office of Water Data Coordination on the State Hydrologic Unit Maps; each hydrologic unit is identified by an 8-digit number.

Methylene blue active substance (MBAS) is a measure of apparent detergents. This determination depends on the formation of a blue color when methylene blue dye reacts with synthetic detergent compounds.

Micrograms per gram ($\mu\text{g/g}$) is a unit expressing the concentration of a chemical element as the mass (micrograms) of the element sorbed per unit mass (gram) of sediment.

Micrograms per liter ($\mu\text{g/L}$, $\mu\text{g/L}$) is a unit expressing the concentration of chemical constituents in solution as mass (micrograms) of solute per unit volume (liter) of water. One thousand micrograms per liter is equivalent to one milligram per liter.

Milligrams per liter (mg/L , mg/L) is a unit for expressing the concentration of chemical constituents in solution. Milligrams per liter represent the mass of solute per unit volume (liter) of water. Concentration of suspended sediment also is expressed in mg/L , and is based on the mass of sediment per liter of water-sediment mixture.

National Geodetic Vertical Datum of 1929 (NGVD) is a geodetic datum derived from a general adjustment of the first order level nets of both the United States and Canada. It was formerly called "Sea Level Datum of 1929" or "mean sea level" in this series of reports. Although the datum was derived from the average sea level over a period of many years at 26 tide stations along the Atlantic, Gulf of Mexico, and Pacific Coasts, it does not necessarily represent local mean sea level at any particular place.

Organism is any living entity, such as an insect, phytoplankter, or zooplankter.

Organism count/area refers to the number of organisms collected and enumerated in a sample and adjusted to the number per area habitat, usually square meters (m^2), acres, or hectares. Periphyton benthic organisms, and macrophytes are expressed in these terms.

Organisms count/volume refers to the number of organisms collected and enumerated in a sample and adjusted to the number per sample volume, usually milliliters (mL) or liters (L). Numbers of planktonic organisms can be expressed in these terms.

Total organism count is the total number of organisms collected and enumerated in any particular sample.

Partial-record station is a particular site where limited streamflow and/or water-quality data are collected systematically over a period of years for use in hydrologic analyses.

Particle size is the diameter, in millimeters (mm), of suspended sediment or bed material determined by either sieve or sedimentation methods. Sedimentation methods (pipet, bottom-withdrawal tube, visual-accumulation tube) determine fall diameter of particles in either distilled water (chemically dispersed) or in native water (the river water at the time and point of sampling).

Particle-size classification used in this report agrees with recommendations made by the American Geophysical Union Subcommittee on Sediment Terminology.

The classification is as follows:

Classification	Size (mm)	Method of analysis
Clay	0.00024 - 0.004	Sedimentation.
Silt	0.004 - 0.062	Sedimentation.
Sand	0.062 - 2.0	Sedimentation or sieve.
Gravel	2.0 - 64.0	Sieve.

The particle-size distributions given in this report are not necessarily representative of all particles in transport in the stream. Most of the organic material is removed and the sample is subjected to mechanical and chemical dispersion before analysis in distilled water. Chemical dispersion is not used for native water analysis.

Percent composition is a unit for expressing the ratio of a particular part of a sample or population sample or population, in terms of types, numbers, mass or volume.

Pesticides are chemical compounds used to control undesirable plants and animals. Major categories of pesticides include insecticides, miticides, fungicides, herbicides, and rodenticides. Insecticides and herbicides, which control insects and plants respectively, are the two categories

Phytoplankton is the plant part of the plankton. They are usually microscopic and their movement is subject to the water currents. Phytoplankton growth is dependent upon solar radiation and nutrient substances. Because they are able to incorporate as well as release materials to the surrounding water, the phytoplankton have a profound effect upon the quality of the water. They are the primary food producers in the aquatic environment, and are commonly known as algae.

Blue-green algae are a group of phytoplankton organisms having a blue pigment, in addition to the green pigment called chlorophyll. Blue-green algae often cause nuisance conditions in water.

Diatoms are the unicellular or colonial algae having a siliceous shell. Their concentrations are expressed as number of cells/mL of sample.

Green algae have chlorophyll pigments similar in color to those of higher green plants. Some forms produce algal mats or floating "moss" in lakes. Their concentrations are expressed as number of cells/mL of sample.

Zooplankton is the animal part of the plankton. Zooplankton are capable of extensive movements within the water column, and are often large enough to be seen with the unaided eye. Zooplankton are secondary consumers feeding upon bacteria, phytoplankton, and detritus. Because they are the grazers in the aquatic environment, the zooplankton are a vital part of the aquatic food web. The zooplankton community is dominated by small crustaceans and rotifers.

Polychlorinated biphenyls (PCBs) are industrial chemicals that are mixtures of chlorinated biphenyl compounds having various percentages of chlorine. They are similar in structure to organochlorine insecticides.

Recoverable from bottom material is the amount of a given constituent that is in solution after a representative sample of bottom material has been digested by a method (usually using an acid or mixture of acids) that results in dissolution of only readily soluble substances. Complete dissolution of all bottom material is not achieved by the digestion treatment and thus the determination represents less than the total amount (that is, less than 95 percent) of the constituent in the sample. To achieve comparability of analytical data, equivalent digestion procedures would be required of all laboratories performing such analyses because different digestion procedures are likely to produce different analytical results.

Runoff in inches (IN, in) shows the depth to which the drainage area would be covered if all the runoff for a given time period were uniformly distributed on it.

Sediment is solid material that originates mostly from disintegrated rocks and is transported by, suspended in, or deposited from water; it includes chemical and biochemical precipitates and decomposed organic material such as humus. The quantity, characteristics, and cause of the occurrence of sediment in streams are influenced by environmental factors. Some major factors are degree of slope, length of slope, soil characteristics, land usage, and quantity and intensity of precipitation.

Suspended sediment is the sediment that at any given time is maintained in suspension by the upward components of turbulent currents or that exists in suspension as a colloid.

Suspended-sediment concentration is the velocity-weighted concentration of suspended sediment in the sampled zone (from the water surface to a point approximately 0.3 ft above the bed) expressed as milligrams of dry sediment per liter of water-sediment mixture (mg/L).

Suspended-sediment discharge (tons/day) is the rate at which dry weight of sediment passes a section of a stream or is the quantity of sediment, as measured by dry weight or volume, that passes a section in a given time. It is computed by multiplying discharge times mg/L times 0.0027.

Suspended-sediment load is quantity of suspended sediment passing a section in a specified period.

Total sediment discharge (tons/day) is the sum of the suspended-sediment discharge and the bed-load discharge. It is the total quantity of sediment, as measured by dry weight or volume, that passes a section during a given time.

Mean concentration is the time-weighted concentration of suspended sediment passing a stream section during a 24-hour day.

Solute is any substance derived from the atmosphere, vegetation, soil, or rocks that is dissolved in water.

Specific conductance is a measure of the ability of a water to conduct an electrical current. It is expressed in micromhos per centimeter at 25°C. Specific conductance is related to the type and concentration of ions in the solution and can be used for approximating the dissolved-solids content of the water. Commonly, the concentration of dissolved solids (in milligrams per liter) is about 65 percent of the specific conductance (in micromhos). This relation is not constant from stream to stream, and it may vary in the same source with changes in the composition of the water.

Stage-discharge relation is the relation between gage height (stage) and volume of water per unit of time, flowing in a channel.

Streamflow is the discharge that occurs in a natural channel. Although the term "discharge" can be applied to the flow of a canal, the word "streamflow" uniquely describes the discharge in a surface stream course. The term "streamflow" is more general than "runoff" as streamflow may be applied to discharge whether or not it is affected by diversion or regulation.

Substrate is the physical surface upon which an organism lived.

Natural substrates refers to any naturally occurring emerged or submersed solid surface, such as a rock or tree, upon which an organism lived.

Artificial substrate is a device which is purposely placed in a stream or lake for colonization of organisms. The artificial substrate simplifies the community structure by standardizing the substrate from which each sample is taken. Examples of artificial substrates are basket samplers (made of wire cages filled with clean streamside rocks) and multi-plate samplers (made of hardboard) for benthic organism collection, and plexiglass strips for periphyton collection.

Surface area of a lake is that area outlined on the latest USGS topographic map as the boundary of the lake and measured by a planimeter in acres. In localities not covered by topographic maps, the areas are computed from the best maps available at the time planimeted. All areas shown are those for the stage when the planimeted map was made.

Surficial bed material is that part (0.1 to 0.2 ft) of the bed material that is sampled using U.S. Series Bed-Material Samplers.

Suspended, recoverable is the amount of a given constituent that is in solution after the part of a representative water-suspended sediment sample that is retained on a 0.45 mm membrane filter has been digested by a method (usually using a dilute acid solution) that results in dissolution of only readily soluble substances. Complete dissolution of all the particulate matter is not achieved by the digestion treatment and thus the determination represents something less than the "total" amount (that is, less than 95 percent) of the constituent present in the sample. To achieve comparability of analytical data, equivalent digestion procedures would be required of all laboratories performing such analyses because different digestion procedures are likely to produce different analytical results.

Determinations of "suspended, recoverable" constituents are made either by analyzing portions of the material collected on the filter or, more commonly, by difference, based on determinations of (1) dissolved and (2) total recoverable concentrations of the constituent.

Suspended, total is the total amount of a given constituent in the part of a representative water-suspended sediment sample that is retained on a 0.45 mm membrane filter. This term is used only when the analytical procedure assures measurement of at least 95 percent of the constituent determined. A knowledge of the expected form of the constituent in the sample, as well as the analytical methodology used, is required to determine when the results should be reported as "suspended, total."

Determinations of "suspended, total" constituents are made either by analyzing portions of the material collected on the filter or, more commonly, by difference, based on determinations of (1) dissolved and (2) total concentrations of the constituent.

Taxonomy is the division of biology concerned with the classification and naming of organisms. The classification of organisms is based upon a hierarchical scheme beginning with Kingdom and ending with Species at the base. The higher the classification level, the fewer features the organisms have in common. For example, the taxonomy of a particular mayfly, Hexagenia limbata is the following:

Kingdom.....Animal
 Phylum.....Arthropoda
 Class.....Insecta
 Order.....Ephemeroptera
 Family.....Ephemeridae
 Genus.....Hexagenia
 Species.....Hexagenia limbata

Time-weighted average is computed by multiplying the number of days in the sampling period by the concentrations of individual constituents for the corresponding period and dividing the sum of the products by the total number of days. A time-weighted average represents the composition of water that would be contained in a vessel or reservoir that had received equal quantities of water from the stream each day for the year.

Tons per acre-foot indicates the dry mass of dissolved solids in 1 acre-foot of water. It is computed by multiplying the concentration in milligrams per liter by 0.00136.

Tons per day is the quantity of substance in solution or suspension that passes a stream section during a 24-hour day.

Total is the total amount of a given constituent in a representative water-suspended sediment sample, regardless of the constituent's physical or chemical form. This term is used only when the analytical procedure assures measurement of at least 95 percent of the constituent present in both the dissolved and suspended phases of the sample. A knowledge of the expected form of the constituent in the sample, as well as the analytical methodology used, is required to judge when the results should be reported as "total". (Note that the word "total" does double duty here, indicating both that the sample consists of a water-suspended sediment mixture and that the analytical method determines all of the constituent in the sample.)

Total, recoverable is the amount of a given constituent that is in solution after a representative water-suspended sediment sample has been digested by a method (usually using a dilute acid solution) that results in dissolution of only readily soluble substances. Complete dissolution of all particulate matter is not achieved by the digestion treatment, and thus the determination represents something less than the "total" amount (that is, less than 95 percent) of the constituent present in the dissolved and suspended phases of the sample. To achieve comparability of analytical data, equivalent digestion procedures would be required of all laboratories performing such analyses because different digestion procedures are likely to produce different analytical results.

Total in bottom material is the total amount of a given constituent in a representative sample of bottom material. This term is used only when the analytical procedure assures measurement of at least 95 percent of the constituent determined. A knowledge of the expected form of the constituent in the sample, as well as the analytical methodology used, is required to judge when the results should be reported as "total in bottom material."

Total load (tons) is the total quantity of any individual constituent, as measured by dry mass or volume, that is dissolved in a specific amount of water (discharge) during a given time. It is computed by multiplying the total discharge, times the mg/L of the constituent, times the factor 0.0027, times the number of days.

WDR is used as an abbreviation for "Water Data Report" in the REVISED RECORDS paragraph to refer to State annual basic-data reports.

Weighted average is used in this report to indicate discharge-weighted average. It is computed by multiplying the discharge for a sampling period by the concentrations of individual constituents for the corresponding period and dividing the sum of the products by the sum of the discharges. A discharge-weighted average approximates the composition of water that would be found in a reservoir containing all the water passing a given location during the water year after thorough mixing in the reservoir.

WSP is used as an abbreviation for "Water-Supply Paper" in references to previously published reports.

The U.S. Geological Survey publishes a series of manuals describing procedures for planning and conducting specialized work in water-resources investigations. The material is grouped under major subject headings called books and is further divided into sections and chapters. For example, Section A of Book 3 (Applications of Hydraulics) pertains to surface water. The chapter, the unit of publication, is limited to a narrow field of subject matter. This format permits flexibility in revision and publication as the need arises.

The reports listed below are for sale by the U.S. Geological Survey, Branch of Distribution, 604 South Pickett St., Alexandria, VA 22304 (authorized agent of the Superintendent of Documents, Government Printing Office). Prepayment is required. Remittance should be sent by check or money order payable to the U.S. Geological Survey. Prices are not included because they are subject to change. Current prices can be obtained by writing to the above address. When ordering or inquiring about prices for any of these publications, please give the title, book number, chapter number, and "U.S. Geological Survey Techniques of Water-Resources Investigations."

- 1-D1. *Water temperature--influential factors, field measurement, and data presentation*, by H. H. Stevens, Jr., J. F. Ficke, and G. F. Smoot: USGS--TWRI Book 1, Chapter D1. 1975. 65 pages.
- 1-D2. *Guidelines for collection and field analysis of ground-water samples for selected unstable constituents*, by W. W. Wood: USGS--TWRI Book 1, Chapter D2. 1976. 24 pages.
- 2-D1. *Application of surface geophysics to ground-water investigations*, by A. A. R. Zohdy, G. P. Eaton, and D. R. Mabey: USGS--TWRI Book 2, Chapter D1. 1974. 116 pages.
- 2-E1. *Application of borehole geophysics to water-resources investigations*, by W. S. Keys and L. M. MacCary: USGS--TWRI Book 2, Chapter E1. 1971. 126 pages.
- 3-A1. *General field and office procedures for indirect discharge measurements*, by M. A. Benson and Tate Dalrymple: USGS--TWRI Book 3, Chapter A1. 1967. 30 pages.
- 3-A2. *Measurement of peak discharge by the slope-area method*, by Tate Dalrymple and M. A. Benson: USGS--TWRI Book 3, Chapter A2. 1967. 12 pages.
- 3-A3. *Measurement of peak discharge at culverts by indirect methods*, by G. L. Bodhaine: USGS--TWRI Book 3, Chapter A3. 1968. 60 pages.
- 3-A4. *Measurement of peak discharge at width contractions by indirect methods*, by H. F. Matthai: USGS--TWRI Book 3, Chapter A4. 1967. 44 pages.
- 3-A5. *Measurement of peak discharge at dams by indirect methods*, by Harry Hulsing: USGS--TWRI Book 3, Chapter A5. 1967. 29 pages.
- 3-A6. *General procedure for gaging streams*, by R. W. Carter and Jacob Davidian: USGS--TWRI Book 3, Chapter A6. 1968. 13 pages.
- 3-A7. *Stage measurements at gaging stations*, by T. J. Buchanan and W. P. Somers: USGS--TWRI Book 3, Chapter A7. 1968. 28 pages.
- 3-A8. *Discharge measurements at gaging stations*, by T. J. Buchanan and W. P. Somers: USGS--TWRI Book 3, Chapter A8. 1969. 65 pages.
- 3-A9. *Measurement of time of travel and dispersion in streams by dye tracing*, by E. F. Hubbard, F. A. Kilpatrick, L. A. Martens, and J. F. Wilson, Jr.: USGS--TWRI Book 3, Chapter A9. 1982. 44 pages.
- 3-A10. *Discharge ratings at gaging stations*, by E. J. Kennedy: USGS--TWRI Book 3, Chapter A10. 1984. 59 pages.
- 3-A11. *Measurement of discharge by moving-boat method*, by G. F. Smoot and C. E. Novak: USGS--TWRI Book 3, Chapter A11. 1969. 22 pages.
- 3-A13. *Computation of continuous records of streamflow*, by E. J. Kennedy: USGS--TWRI Book 3, Chapter A13. 1983. 53 pages.
- 3-A14. *Use of flumes in measuring discharge*, by F. A. Kilpatrick and V. R. Schneider: USGS--TWRI Book 3, Chapter A14. 1983. 46 pages.
- 3-A15. *Computation of water-surface profiles in open channels*, by Jacob Davidian: USGS--TWRI Book 3, Chapter A15. 1984. 48 pages.
- 3-B1. *Aquifer-test design, observation, and data analysis*, by R. W. Stallman: USGS--TWRI Book 3, Chapter B1. 1971. 26 pages.
- 3-B2. *Introduction to ground-water hydraulics, a programmed text for self-instruction*, by G. D. Bennett: USGS--TWRI Book 3, Chapter B2. 1976. 172 pages.
- 3-B3. *Type curves for selected problems of flow to wells in confined aquifers*, by J. E. Reed: USGS--TWRI Book 3, Chapter B3. 1980. 106 pages.
- 3-C1. *Fluvial sediment concepts*, by H. P. Guy: USGS--TWRI Book 3, Chapter C1. 1970. 55 pages.
- 3-C2. *Field methods for measurement of fluvial sediment*, by H. P. Guy and V. W. Norman: USGS--TWRI Book 3, Chapter C2. 1970. 59 pages.
- 3-C3. *Computation of fluvial-sediment discharge*, by George Porterfield: USGS--TWRI Book 3, Chapter C3. 1972. 66 pages.
- 4-A1. *Some statistical tools in hydrology*, by H. C. Riggs: USGS--TWRI Book 4, Chapter A1. 1968. 39 pages.
- 4-A2. *Frequency curves*, by H. C. Riggs: USGS--TWRI Book 4, Chapter A2. 1968. 15 pages.
- 4-B1. *Low-flow investigations*, by H. C. Riggs: USGS--TWRI Book 4, Chapter B1. 1972. 18 pages.
- 4-B2. *Storage analyses for water supply*, by H. C. Riggs and C. H. Hardison: USGS--TWRI Book 4, Chapter B2. 1973. 20 pages.
- 4-B3. *Regional analyses of streamflow characteristics*, by H. C. Riggs: USGS--TWRI Book 4, Chapter B3. 1973. 15 pages.
- 4-D1. *Computation of rate and volume of stream depletion by wells*, by C. T. Jenkins: USGS--TWRI Book 4, Chapter D1. 1970. 17 pages.
- 5-A1. *Methods for determination of inorganic substances in water and fluvial sediments*, by M. W. Skougstad and others, editors: USGS--TWRI Book 5, Chapter A1. 1979. 626 pages.
- 5-A2. *Determination of minor elements in water by emission spectroscopy*, by P. R. Barnett and E. C. Mallory, Jr.: USGS--TWRI Book 5, Chapter A2. 1971. 31 pages.
- 5-A3. *Methods for analysis of organic substances in water*, by D. F. Goerlitz and Eugene Brown: USGS--TWRI Book 5, Chapter A3. 1972. 40 pages.
- 5-A4. *Methods for collection and analysis of aquatic biological and microbiological samples*, edited by P. E. Greeson, T. A. Ehlike, G. A. Irwin, B. W. Lium, and K. V. Slack: USGS--TWRI Book 5, Chapter A4. 1977. 332 pages.
- 5-A5. *Methods for determination of radioactive substances in water and fluvial sediments*, by L. L. Thatcher, V. J. Janzer, and K. W. Edwards: USGS--TWRI Book 5, Chapter A5. 1977. 95 pages.
- 5-A6. *Quality assurance practices for the chemical and biological analyses of water and fluvial sediments*, by L. C. Friedman and D. E. Erdmann: USGS--TWRI Book 5, Chapter A6. 1982. 181 pages.
- 5-C1. *Laboratory theory and methods for sediment analysis*, by H. P. Guy: USGS--TWRI Book 5, Chapter C1. 1969. 58 pages.
- 7-C1. *Finite difference model for aquifer simulation in two dimensions with results of numerical experiments*, by P. C. Trescott, G. F. Pinder, and S. P. Larson: USGS--TWRI Book 7, Chapter C1. 1976. 116 pages.
- 7-C2. *Computer model of two-dimensional solute transport and dispersion in ground water*, by L. F. Konikow and J. D. Bredehoeft: USGS--TWRI Book 7, Chapter C2. 1978. 90 pages.
- 7-C3. *A model for simulation of flow in singular and interconnected channels*, by R. W. Schaffranek, R. A. Baltzer, and D. E. Goldberg: USGS--TWRI Book 7, Chapter C3. 1981. 110 pages.
- 8-A1. *Methods of measuring water levels in deep wells*, by M. S. Garber and F. C. Koopman: USGS--TWRI Book 8, Chapter A1. 1968. 23 pages.
- 8-A2. *Installation and service manual for U.S. Geological Survey manometers*, by J. D. Craig: USGS--TWRI Book 8, Chapter A2. 1983. 57 pages.
- 8-B2. *Calibration and maintenance of vertical-axis type current meters*, by G. F. Smoot and C. E. Novak: USGS--TWRI Book 8, Chapter B2. 1968. 15 pages.

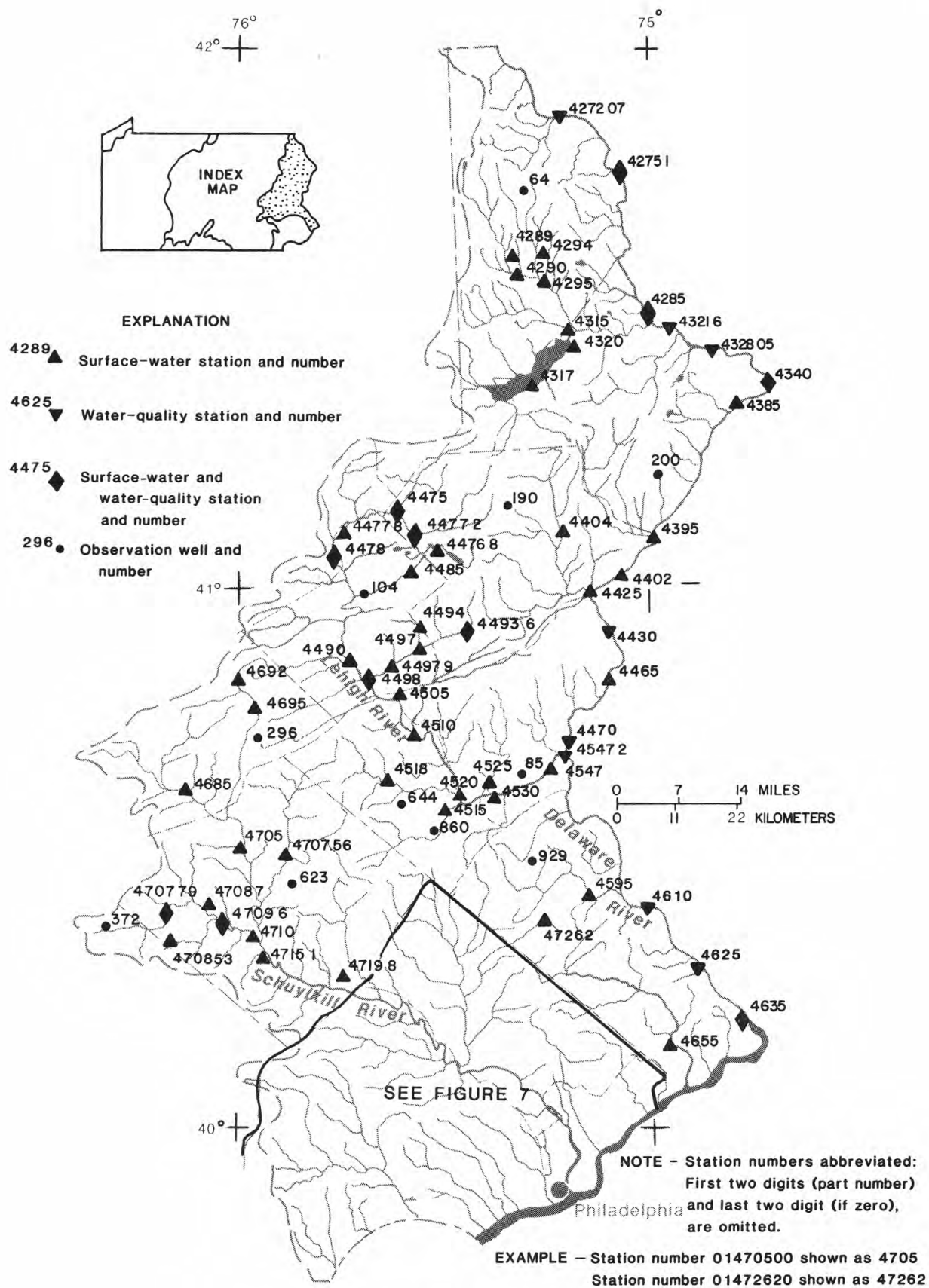


Figure 6.--Location of data-collection stations.

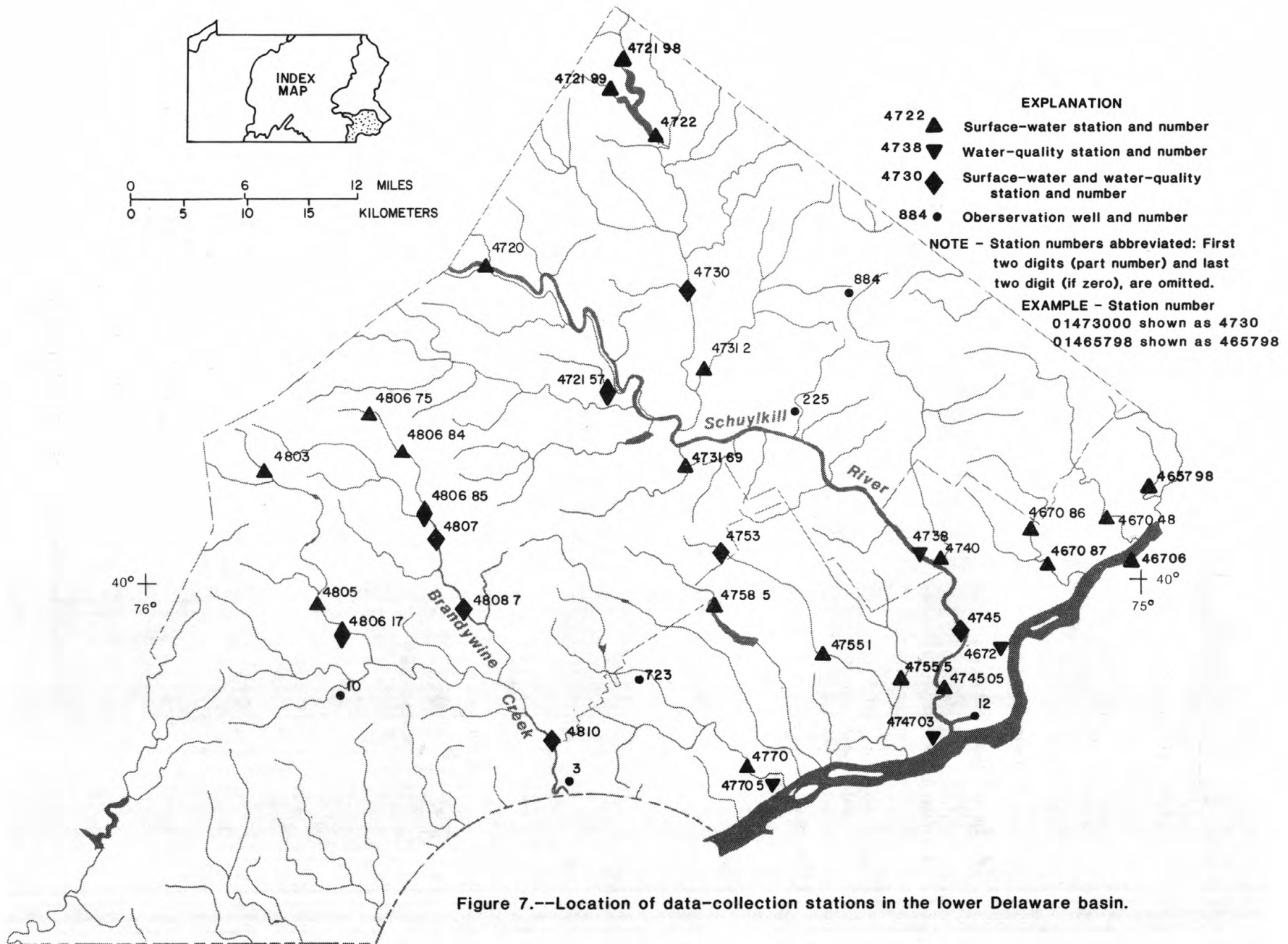


Figure 7.--Location of data-collection stations in the lower Delaware basin.

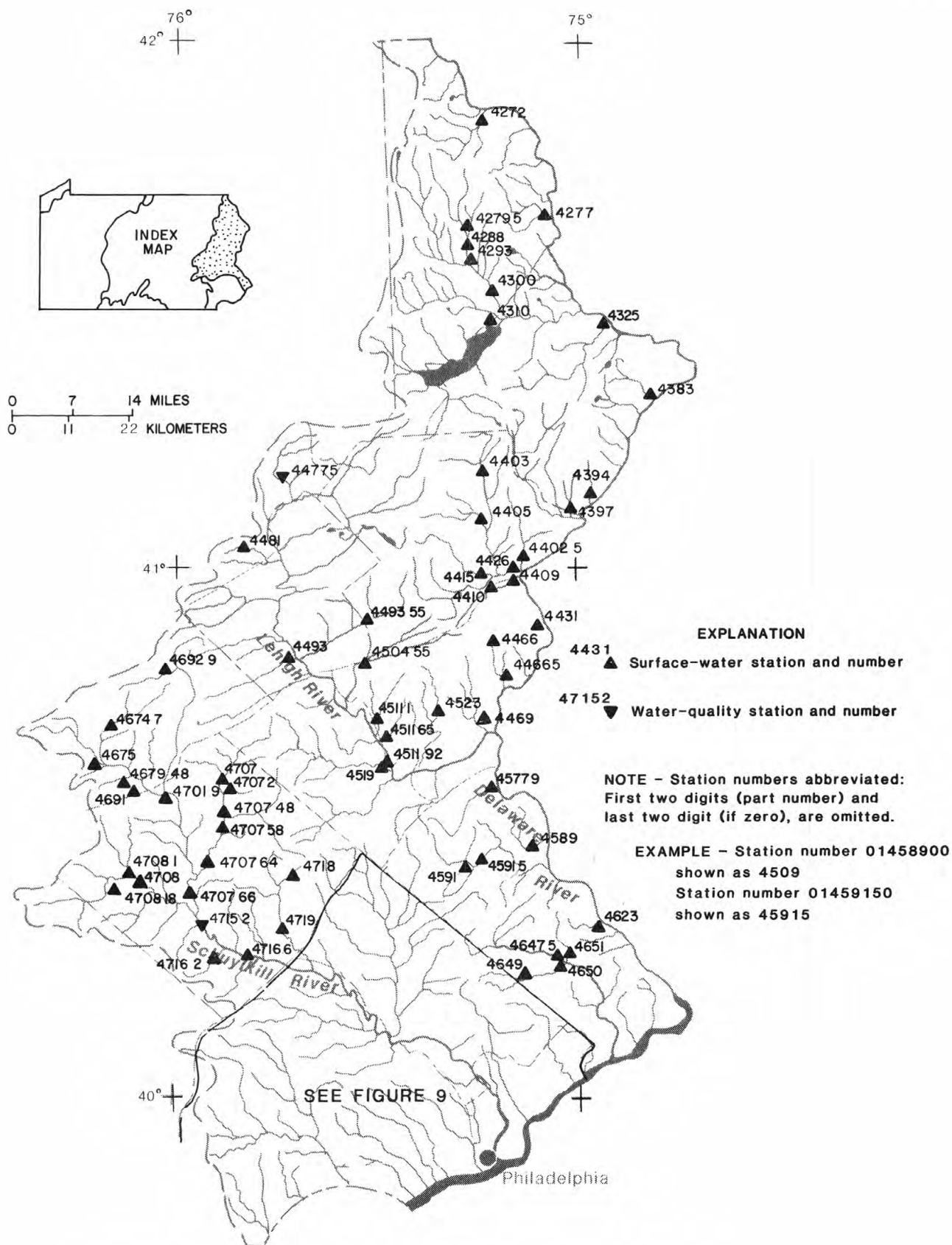
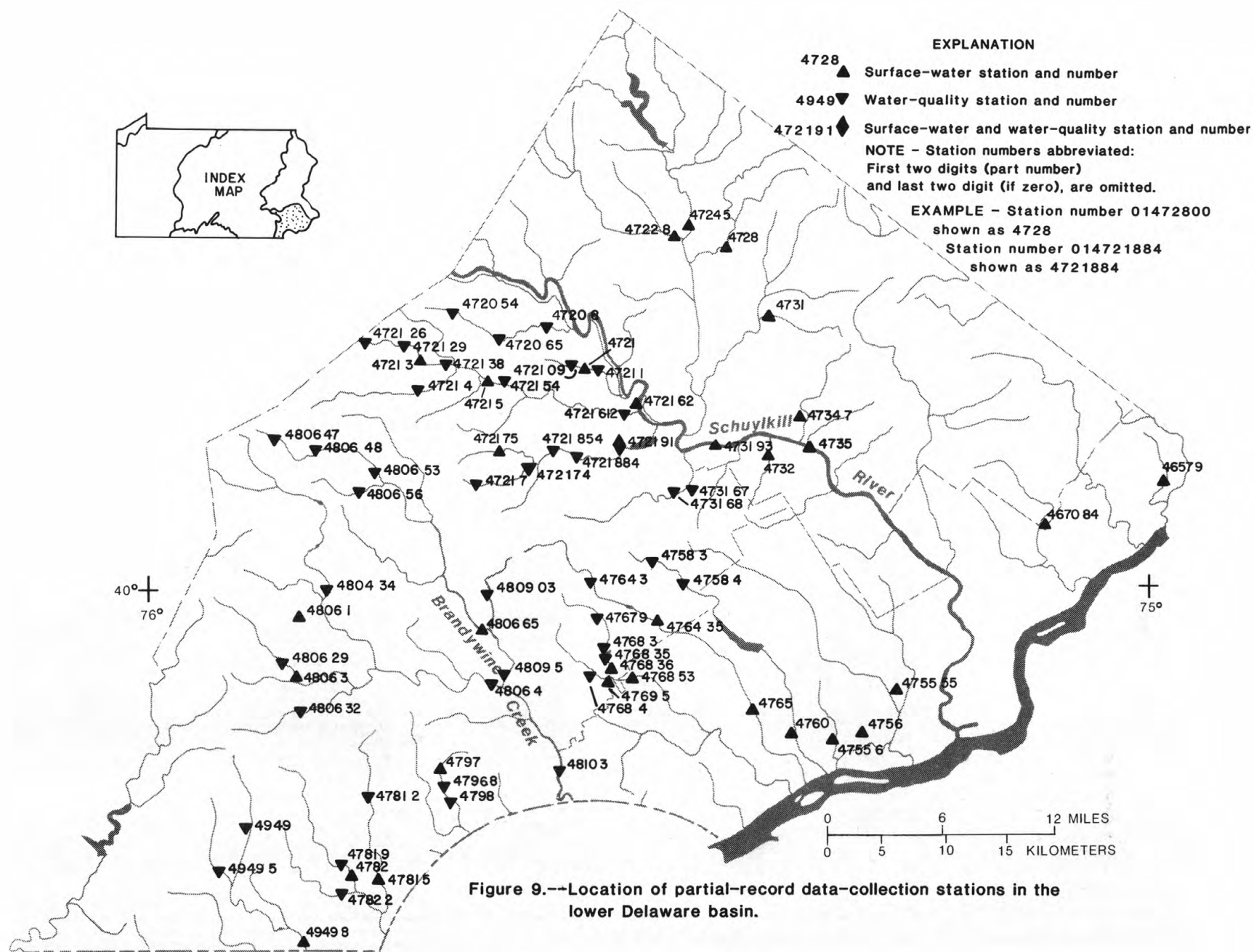


Figure 8.--Location of partial-record data-collection stations.



DELAWARE BAY

25

01412350 DELAWARE BAY AT SHIP JOHN SHOAL LIGHTHOUSE, NJ

LOCATION.--Lat 39°18'19", long 75°22'37", Cumberland County, Hydrologic Unit 02040204, at lighthouse in bay opposite Bombay Hook Island, DE, and 3 mi south southwest of mouth of Cohansey River, NJ.

PERIOD OF RECORD.--April 1969 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: April 1969 to current year.

WATER TEMPERATURE: February 1970 to current year.

INSTRUMENTATION.--Water-quality monitor since April, 1969.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 59,700 microsiemens Jan. 19, 1984; minimum, 120 microsiemens Feb. 9, 1985.

WATER TEMPERATURE: Maximum, 33.0°C Aug. 2, 1979; minimum, 0.0°C on many days during winter periods.

EXTREMES FOR CURRENT YEAR.--

SPECIFIC CONDUCTANCE: Maximum, 39,200 microsiemens Sept. 14; minimum 120 microsiemens Feb. 9.

WATER TEMPERATURE: Maximum, 28.0°C Aug. 8, 14-17; minimum, 0.0°C Jan. 20-22.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	34400	28200	31600	32300	27600	29600	32600	26200	29700	30100	17000	24900
2	33100	23900	30300	31600	26500	29400	33000	26300	29800	29200	17700	24400
3	32200	23000	28500	34100	27300	30500	33300	26300	30000	28200	21300	25700
4	31600	23300	28100	34400	28100	31800	31400	26000	29200	30100	23100	27400
5	32100	21800	28600	33300	28000	31100	31000	25300	28900	29600	23500	27300
6	32900	28700	30700	31000	27000	29800	32500	25300	29600	29500	22300	27000
7	31700	26200	29500	32000	27100	30300	28500	21200	26500	29400	22800	26500
8	31100	25800	29100	34300	26900	31500	30000	21400	26700	27400	20600	24600
8	31100	25800	29100	34300	26900	31500	30000	21400	26700	27400	20600	24600
9	31000	25400	28700	34300	28700	31800	30500	22400	26600	28900	19300	24000
10	---	---	---	33400	27200	30900	32200	23300	27800	29200	21400	25400
11	---	---	---	32800	27800	30400	32000	24700	28200	30600	22600	26800
12	---	---	---	31300	25600	29200	31700	22700	28400	29500	22400	26000
13	---	---	---	30900	25300	28900	31300	23000	28300	29300	21100	26100
14	---	---	---	33500	25400	28900	31200	24400	28000	30600	23100	27600
15	---	---	---	32900	26900	30200	31000	25100	28500	30200	24100	27200
16	---	---	---	---	---	---	30800	25100	28600	31700	23200	27700
17	33800	27900	31700	---	---	---	29900	22900	27600	32000	23200	28100
18	33400	26000	31200	---	---	---	30400	23200	27400	32600	24900	29400
19	33800	28400	31000	---	---	---	31400	22600	28300	32900	24500	29700
20	33200	25000	30900	28800	25800	27300	32200	24100	28100	29800	22800	26900
21	33000	24500	30400	30000	26200	27900	31600	24400	28000	29700	20700	25100
22	32200	27400	30400	31100	27200	29400	31400	23600	27500	28500	19500	24200
23	32300	25500	29400	32300	28600	30200	29600	22400	26000	28100	20200	24600
24	33700	28000	30800	32700	28600	30600	30000	21200	26000	30000	22600	26900
25	33600	24900	30200	34300	29500	31700	28000	18200	23900	32100	25100	28900
26	32800	22400	28400	36700	29500	32200	25400	17200	22900	31300	24100	28100
27	33600	23800	29300	33300	27400	31400	27100	19400	23400	34800	24200	28600
28	32500	24100	29500	33900	29300	31400	28700	19000	24200	33900	24900	29600
29	31300	25400	28400	32500	26700	29800	27200	17500	23500	35700	24400	30400
30	30600	26900	28500	32400	26100	29700	27200	20400	23500	36400	24000	30600
31	32000	23500	29500	---	---	---	28600	18000	24000	36600	26700	31200
MONTH	34400	21800	29800	36700	25300	30200	33300	17200	27100	36600	17000	27100

01412350 DELAWARE BAY AT SHIP JOHN SHOAL, LIGHTHOUSE, NJ--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	35500	25800	32300	28200	17200	23300	30200	24100	27000	30200	23900	27400
2	36000	27400	33000	29400	19200	24100	29100	21700	26500	32100	26700	29300
3	34800	27600	33100	28200	19600	24300	31100	20800	27100	33500	26700	29800
4	36000	30300	33500	30500	20800	26600	29700	22300	26600	33200	25500	29700
5	36400	30700	33700	28600	22600	25900	29300	22100	26000	31700	22500	26800
6	37000	31700	34400	28900	20600	25000	28600	20700	24800	29300	22700	26000
7	36300	30000	33400	31200	23100	26800	28100	19800	24100	30500	21900	26200
8	33200	1320	27500	29100	21400	25600	26900	19000	22700	30900	22700	26200
9	26400	120	19100	28200	20200	24700	26300	17700	22200	30500	21100	26500
10	34200	16500	24500	28900	19800	25400	24700	16700	21600	28500	19200	24700
11	36600	31000	34600	28800	20600	25100	24600	15500	20900	26800	18800	23800
12	38400	33900	36500	28200	18200	23300	25100	15900	21300	27000	18100	23600
13	36800	31500	34200	24400	17200	21300	25500	18100	22000	27800	20400	24300
14	34300	28000	32200	26100	17800	22300	25800	19000	22600	26900	17700	23900
15	32900	26100	31000	27400	18000	22600	26700	19600	23200	29100	22600	26300
16	33300	26200	30600	25000	16300	21300	25900	19300	23200	28500	22300	25800
17	32000	23500	29000	25900	17200	22200	26400	20200	23500	29700	23400	26700
18	30600	24000	28000	27000	19600	23800	25200	18700	23000	30500	21000	25900
19	30300	23000	27500	29100	21400	25900	26000	18000	22300	29400	20100	25300
20	31100	23400	28200	27300	21200	25200	26900	18300	23600	29100	20500	25100
21	30700	22300	27700	27300	19600	25300	26200	21000	24000	27800	20200	24700
22	30000	21300	26600	28600	22400	25700	26400	19900	23400	28300	19500	25100
23	28300	21700	25700	28800	22500	26300	26300	19600	23300	28900	20500	25500
24	27500	21100	25100	30000	21600	26400	26600	21100	24000	30000	21900	25900
25	27500	20900	24900	29300	22300	25900	26200	18300	23200	29400	21000	26200
26	28300	20200	25200	27600	19000	24600	25800	17200	22300	29500	19100	25800
27	30400	19000	23900	27900	19600	24200	25700	19000	22400	29100	21700	26000
28	27400	15800	22700	28200	18700	24400	25900	19900	23200	29700	19300	26000
29	---	---	---	28500	17700	24000	26200	19300	23300	30500	22700	26900
30	---	---	---	29400	19100	25000	28900	17100	25600	29800	23200	27200
31	---	---	---	28600	17700	26000	---	---	---	29000	23400	26700
MONTH	38400	120	29200	31200	16300	24600	31100	15500	23600	33500	17700	26100
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	30500	22200	25700	33500	24800	29000	30800	22900	26500	33000	25200	30100
2	30000	22200	25900	33300	24300	28700	31600	22200	27400	33200	24400	28900
3	29700	21900	25800	32300	24300	27800	31500	20000	27000	30900	24200	28700
4	29200	22000	25800	31500	24100	28200	29800	20800	26300	30400	25000	28400
5	30300	23100	26000	32000	25100	28400	28900	20500	25800	30800	24000	27900
6	28700	22300	25600	31500	24100	27800	---	---	---	31500	23900	28200
7	29000	21100	25800	29200	22300	26800	---	---	---	32300	22900	28500
8	28400	18900	24800	30300	23500	27600	---	---	---	32700	22200	27800
9	27900	21100	24800	31100	23800	28100	---	---	---	33600	23500	29200
10	27100	20300	24600	30900	24100	27800	---	---	---	35100	27100	31500
11	27400	19100	24700	31300	23100	27800	---	---	---	37500	28300	32900
12	27400	19100	24700	31300	23100	27800	---	---	---	37500	28300	32900
13	28000	22200	25100	32000	18700	27100	---	---	---	37500	30800	35300
14	27300	21000	24900	31400	23200	28100	---	---	---	39100	33200	35700
15	27000	21000	24500	31600	23400	28200	29200	21400	26200	39200	33600	36500
16	29700	21000	25700	30700	22200	27400	29700	23500	26400	38500	31100	34800
17	28600	22000	26000	30900	24400	28000	31400	24400	26900	37500	31300	31200
18	28300	22400	25600	32900	25300	28900	31400	25600	28500	37100	32000	34600
19	28900	22300	25600	32400	25300	29400	32000	26400	29200	36900	29600	34200
20	29100	18100	26300	32400	24700	29100	33100	26800	30100	37100	31100	34200
21	28500	20200	26100	32400	25300	28300	33300	27300	30500	38000	31800	34800
22	29500	20800	26300	31500	25300	28700	32700	27100	30000	38000	30500	34400
23	29700	20500	25800	32700	25300	29200	33300	26600	30600	38200	30600	34900
24	29600	23200	26400	33100	26300	29800	33300	25900	30500	36400	30800	34300
25	28600	21700	25900	32600	25600	29000	33100	25900	30000	37100	32100	34500
26	28600	21400	26000	32200	25600	29600	31200	24300	29000	38300	29500	33700
27	30900	22000	27200	29100	23100	27200	34400	26600	30500	37400	30300	34600
28	33300	23300	29200	30400	21200	26300	33800	23900	28400	38100	28300	33700
29	32000	25600	29700	32200	22700	27300	30700	21700	26400	32900	23600	28500
30	33600	24800	28700	31100	23500	27500	32100	24700	27700	31500	22600	27700
31	32600	24600	28600	31100	24000	26900	30900	24600	28400	30300	19500	26300
MONTH	33600	18100	26100	33500	18700	28100	34400	20000	28300	39200	19500	31900

01412350 DELAWARE BAY AT SHIP JOHN SHOAL, LIGHTHOUSE NJ--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	18.0	17.0	17.5	---	---	---	7.0	6.5	7.0	6.5	6.5	6.5
2	17.0	16.5	17.0	---	---	---	7.0	6.5	6.5	6.5	6.5	6.5
3	16.5	16.0	16.5	---	---	---	7.0	6.5	7.0	6.5	6.0	6.5
4	16.5	16.0	16.5	---	---	---	7.0	6.5	6.5	6.0	5.5	6.0
5	17.0	16.0	16.5	---	---	---	6.5	6.0	6.5	6.0	5.5	5.5
6	16.5	16.0	16.0	15.5	15.0	15.5	6.5	6.0	6.0	5.5	5.0	5.5
7	16.0	16.0	16.0	15.0	14.0	14.5	6.0	5.0	5.5	5.5	5.0	5.0
8	16.0	16.0	16.0	14.0	13.5	14.0	5.0	4.5	5.0	5.0	4.5	5.0
9	16.0	16.0	16.0	13.5	13.0	13.5	5.0	4.5	5.0	4.5	3.0	4.0
10	---	---	---	13.5	13.5	13.5	5.0	4.5	5.0	3.5	2.5	3.0
11	---	---	---	13.5	13.0	13.5	5.0	5.0	5.0	3.0	2.5	2.5
12	---	---	---	13.0	12.0	13.0	5.0	5.0	5.0	2.5	2.0	2.0
13	---	---	---	12.5	11.5	12.0	5.5	5.0	5.0	2.0	1.0	2.0
14	---	---	---	11.5	10.0	11.0	5.5	5.0	5.5	2.0	1.5	2.0
15	---	---	---	10.5	10.0	10.0	5.5	5.0	5.5	2.0	1.5	1.5
16	16.5	16.0	16.5	10.5	5.5	10.0	5.5	5.5	5.5	1.0	.0	1.0
17	16.5	16.0	16.5	10.0	5.5	9.5	6.0	5.5	5.5	1.0	.5	.5
18	16.5	16.5	16.5	9.5	5.5	9.0	6.5	6.0	6.0	1.0	.5	.5
19	17.0	16.0	16.5	9.0	6.0	9.0	6.0	5.5	6.0	1.0	.5	1.0
20	17.0	16.5	16.5	8.5	7.5	8.0	6.0	6.0	6.0	.5	.0	.0
21	17.5	16.5	17.0	7.5	7.0	7.5	6.0	5.5	6.0	.0	.0	.0
22	17.5	17.0	17.5	7.0	6.5	7.0	6.5	6.0	6.0	.0	.0	.0
23	18.0	17.5	17.5	7.0	6.5	6.5	6.5	6.0	6.0	.0	.0	.0
23	18.0	17.5	17.5	7.0	6.5	6.5	6.5	6.0	6.0	.0	.0	.0
24	17.5	17.5	17.5	6.5	6.5	6.5	6.0	6.0	6.0	.0	.0	.0
25	17.5	17.5	17.5	7.0	6.0	6.5	6.0	6.0	6.0	.0	.0	.0
26	17.5	17.5	17.5	6.5	6.0	6.5	6.0	5.5	5.5	.0	.0	.0
27	18.0	17.5	17.5	6.5	6.0	6.5	6.0	5.5	5.5	.0	.0	.0
28	18.0	17.5	18.0	7.0	6.5	6.5	6.0	5.5	6.0	.0	.0	.0
29	18.0	18.0	18.0	7.0	6.5	6.5	6.5	6.0	6.0	.0	.0	.0
30	---	---	---	7.0	6.0	6.5	6.5	6.0	6.5	.0	.0	.0
MONTH	18.0	16.0	17.0	15.5	5.5	9.5	7.0	4.5	6.0	6.5	.0	2.0
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	.0	.0	.0	4.5	3.5	4.0	9.0	8.0	8.5	16.5	14.5	15.0
2	.0	.0	.0	4.5	3.5	4.0	8.5	8.0	8.0	15.5	15.0	15.0
3	.0	.0	.0	4.5	3.5	4.0	8.5	8.0	8.0	15.0	14.0	14.5
4	.0	.0	.0	4.5	3.5	3.5	9.0	8.0	8.0	15.0	14.0	14.5
5	.0	.0	.0	5.0	3.5	4.5	9.0	8.0	8.5	15.0	14.0	15.0
6	.0	.0	.0	5.0	4.5	4.5	10.0	9.0	9.5	17.0	15.0	16.0
7	.0	.0	.0	4.5	4.5	4.5	10.0	9.5	9.5	16.5	16.0	16.0
8	.0	.0	.0	5.0	4.5	4.5	10.0	9.5	9.5	17.0	15.5	16.0
9	.0	.0	.0	5.5	4.5	5.0	9.5	8.5	9.0	17.0	11.5	16.0
10	.0	.0	.0	6.0	4.5	5.0	9.0	8.5	8.5	17.0	16.0	16.5
11	.0	.0	.0	5.5	5.0	5.5	9.0	8.5	8.5	18.0	16.5	17.0
12	.0	.0	.0	6.0	5.5	6.0	10.0	8.5	9.0	18.5	17.0	17.5
13	.0	.0	.0	6.5	5.5	6.0	10.0	9.0	9.5	20.0	17.5	18.5
14	.0	.0	.0	7.0	6.0	6.5	10.0	9.5	9.5	19.5	18.5	19.0
15	.0	.0	.0	7.0	6.5	6.5	11.0	10.0	10.5	19.0	18.5	18.5
16	.0	.0	.0	7.0	6.0	6.5	11.5	10.5	11.0	19.0	18.5	18.5
17	.0	.0	.0	7.0	6.5	7.0	11.5	10.5	11.0	18.5	18.0	18.5
18	---	---	---	6.5	6.0	6.5	12.0	10.5	11.0	18.5	17.5	18.0
19	---	---	---	7.0	5.5	6.0	12.5	11.5	11.5	18.0	17.5	18.0
20	---	---	---	6.5	5.5	6.0	13.0	11.5	12.0	18.5	17.5	17.5
21	---	---	---	7.0	6.0	6.5	13.5	12.0	13.0	18.5	17.5	18.0
22	---	---	---	6.5	6.5	6.5	14.5	13.0	13.5	18.5	17.5	18.0
23	---	---	---	6.5	6.5	6.5	15.0	13.5	14.0	18.0	17.5	18.0
24	---	---	---	6.5	6.5	6.5	14.5	14.0	14.0	17.5	17.0	17.5
25	---	---	---	7.0	6.5	6.5	15.5	14.0	14.5	18.5	17.0	17.5
26	---	---	---	7.5	6.5	7.0	16.0	14.5	15.0	19.0	17.0	18.0
27	---	---	---	8.0	6.5	7.5	16.0	14.5	15.5	19.5	17.5	18.0
28	---	---	---	9.0	7.0	8.0	16.5	15.0	15.5	21.0	17.0	18.5
29	---	---	---	10.0	8.0	8.5	16.0	14.5	15.5	18.5	17.5	18.0
30	---	---	---	9.5	8.0	9.0	16.0	14.5	15.5	19.0	17.5	18.0
31	---	---	---	9.0	8.5	8.5	---	---	---	18.0	17.5	18.0
MONTH				10.0	3.5	6.0	16.5	8.0	11.0	21.0	11.5	17.0

DELAWARE BAY

01412350 DELAWARE BAY AT SHIP JOHN SHOAL LIGHTHOUSE, NJ--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	19.0	18.0	18.5	21.0	20.5	21.0	25.5	25.0	25.5	24.5	24.0	24.5
2	19.0	18.5	19.0	21.0	20.5	21.0	25.0	24.5	25.0	24.5	24.0	24.5
3	20.0	18.5	19.0	21.5	20.5	21.0	25.5	24.5	25.0	25.0	24.0	24.5
4	20.0	19.5	19.5	22.5	21.0	21.5	25.5	24.5	25.0	25.5	24.5	24.5
5	20.0	19.5	19.5	22.0	21.5	22.0	25.0	24.5	25.0	26.0	24.5	25.0
6	20.0	19.5	19.5	22.5	21.5	22.0	---	---	---	26.0	25.0	25.5
7	20.0	19.5	19.5	23.0	22.0	22.5	---	---	---	26.5	25.5	26.0
8	19.5	19.5	19.5	23.0	22.0	22.5	---	---	---	---	---	---
9	20.0	19.0	19.5	24.0	22.5	23.0	---	---	---	---	---	---
10	20.5	19.5	20.0	23.5	23.0	23.0	---	---	---	---	---	---
11	20.5	20.0	20.5	24.0	23.0	23.5	---	---	---	---	---	---
12	20.5	20.0	20.5	24.0	23.0	23.5	---	---	---	---	---	---
13	20.5	20.0	20.5	25.0	23.0	23.5	---	---	---	---	---	---
14	20.0	19.5	19.5	25.0	23.5	24.0	28.0	26.0	26.5	---	---	---
15	20.5	19.0	19.5	25.0	24.0	24.5	27.0	26.5	26.5	---	---	---
16	20.5	19.5	19.5	25.0	24.5	24.5	27.0	26.5	26.5	---	---	---
17	20.5	19.5	20.0	25.0	24.5	25.0	26.5	26.0	26.5	---	---	---
18	20.5	19.5	20.0	25.5	24.5	25.0	26.0	25.5	26.0	---	---	---
19	20.5	20.0	20.0	25.5	24.5	25.0	26.5	25.5	26.0	---	---	---
20	21.0	20.0	20.5	25.5	25.0	25.0	26.5	26.0	26.0	---	---	---
21	21.0	20.0	20.5	26.0	25.0	25.5	26.0	25.5	26.0	---	---	---
22	21.0	20.0	20.5	26.0	25.5	25.5	25.5	25.0	25.5	---	---	---
23	21.0	20.5	20.5	25.5	25.5	25.5	26.0	24.5	25.0	---	---	---
24	21.5	20.5	21.0	25.5	25.0	25.5	25.5	24.5	25.0	---	---	---
25	21.5	21.0	21.5	26.0	25.0	25.5	25.0	24.5	24.5	---	---	---
26	21.5	21.0	21.0	25.5	25.0	25.5	---	---	---	---	---	---
27	21.0	20.5	20.5	26.0	25.0	25.5	---	---	---	---	---	---
28	21.0	20.0	20.5	26.0	25.0	25.5	25.0	24.5	25.0	---	---	---
29	21.5	20.5	20.5	25.5	25.0	25.5	25.5	24.5	25.0	---	---	---
30	21.5	20.5	21.0	26.0	25.0	25.5	25.5	24.5	25.0	---	---	---
31	---	---	---	26.0	25.5	25.5	25.0	24.5	25.0	---	---	---
MONTH	21.5	18.0	20.0	26.0	20.5	24.0	28.0	24.5	25.5	26.5	24.0	---

DELAWARE RIVER BASIN

29

01427207 DELAWARE RIVER AT LORDVILLE, NY

LOCATION.--Lat 41°52'05", long 75°12'50", Delaware County, Hydrologic Unit 02040101, at Lordville-Equinunk Interstate Bridge at Lordville, 50 ft downstream from Humphries Brook, and 6.5 mi southeast of Hancock.

DRAINAGE AREA.--1,590 mi².

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: October 1967 to August 1971, June 1973 to current year.

REVISED RECORDS.--WDR NY-82-1: Drainage area.

INSTRUMENTATION.--Water-temperature digital recorder since June 1973, provides one-hour interval punches. Prior to August 1971, water-temperature recorder provided continuous recordings.

REMARKS.--Interruption of record was due to malfunction of recording instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1968-70, 1973, 1975-85) 30.5°C June 16, 1976, July 10, 1981; minimum (water years 1968-71, 1974, 1977-78, 1980-85), 0.0°C on many days during winter periods.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Maximum, 29.5°C Aug. 15; minimum, 0.0°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	12.5	12.0	12.0	11.5	10.0	10.5	4.5	4.0	4.0	4.0	3.0	3.0
2	12.5	10.5	11.5	12.5	9.5	11.0	4.5	3.5	4.0	4.0	3.5	4.0
3	10.5	8.5	9.5	9.0	7.0	8.0	3.5	2.5	3.0	3.0	1.0	2.0
4	12.5	9.5	10.5	9.5	8.0	8.5	2.5	2.0	2.0	1.0	.0	.5
5	11.5	10.0	10.5	11.0	9.5	10.0	2.0	1.5	1.5	.5	.0	.0
6	10.0	8.0	9.5	10.5	9.0	10.0	1.0	.0	.5	.0	.0	.0
7	10.5	9.0	9.5	9.0	7.5	8.0	.5	.0	.0	.5	.0	.0
8	12.0	10.5	11.0	7.5	6.0	7.0	.0	.0	.0	.5	.0	.0
9	13.5	11.5	12.5	8.0	7.0	7.5	.5	.0	.0	.0	.0	.0
10	14.0	12.5	13.0	9.5	8.0	8.5	1.0	.0	.5	.0	.0	.0
11	15.0	13.0	13.5	10.0	9.5	9.5	2.5	1.0	2.0	.0	.0	.0
12	14.5	12.5	13.5	9.5	7.5	9.0	3.5	2.5	3.0	.0	.0	.0
13	13.5	12.5	13.0	7.5	4.0	5.5	5.0	3.5	4.0	.0	.0	.0
14	13.0	12.0	12.5	3.5	2.5	3.5	5.0	4.0	4.5	.0	.0	.0
15	12.5	11.0	12.0	4.0	2.5	3.0	3.5	3.0	3.5	.0	.0	.0
16	13.5	11.0	12.0	5.0	3.5	4.0	4.0	3.5	3.5	.0	.0	.0
17	13.0	12.0	12.5	4.5	3.5	4.0	5.5	4.0	4.5	.0	.0	.0
18	14.0	13.0	13.5	4.0	3.0	3.5	5.5	4.5	5.0	.0	.0	.0
19	14.0	13.0	13.5	4.5	3.0	4.0	4.5	3.0	3.5	.0	.0	.0
20	15.0	13.5	14.5	3.0	1.5	2.0	3.0	2.5	3.0	.0	.0	.0
21	13.5	12.5	13.0	2.5	1.0	1.5	2.5	.0	1.5	.0	.0	.0
22	14.5	13.0	14.0	3.0	2.0	2.5	2.5	.0	1.5	.0	.0	.0
23	14.5	13.0	13.5	3.0	2.0	2.5	2.5	1.5	2.0	.0	.0	.0
24	13.0	12.0	12.5	4.0	2.5	3.0	2.0	.5	1.5	.0	.0	.0
25	13.5	11.5	12.0	5.0	3.5	4.5	2.0	.5	1.5	.0	.0	.0
26	13.0	12.0	12.5	5.0	4.0	4.5	.0	.0	.0	.0	.0	.0
27	15.0	13.0	13.5	5.0	3.5	4.0	.0	.0	.0	.0	.0	.0
28	17.0	15.0	15.5	8.0	4.5	6.0	.5	.0	.0	.0	.0	.0
29	16.5	14.5	16.0	8.5	5.0	6.5	6.0	.5	3.0	.0	.0	.0
30	14.5	12.5	13.5	5.0	4.0	4.5	6.5	4.5	6.0	.0	.0	.0
31	13.0	11.5	12.0	---	---	---	4.5	3.0	3.0	.0	.0	.0
MONTH	17.0	8.0	12.5	12.5	1.0	6.0	6.5	.0	2.5	4.0	.0	.5

DELAWARE RIVER BASIN

01427207 DELAWARE RIVER AT LORDVILLE, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.0	.0	.0	3.0	.0	1.5	5.5	4.5	5.0	17.5	15.0	16.5
2	.0	.0	.0	4.5	2.5	3.5	5.0	4.0	4.5	16.0	13.0	14.5
3	.0	.0	.0	3.5	1.5	2.5	4.0	2.5	3.0	14.0	12.0	13.0
4	.0	.0	.0	2.5	.0	.5	6.0	2.5	4.0	15.0	11.0	13.0
5	.0	.0	.0	.0	.0	.0	10.5	6.0	8.0	15.0	13.5	14.5
6	.0	.0	.0	.5	.0	.0	12.0	10.0	11.0	15.0	14.5	14.5
7	.0	.0	.0	.5	.0	.0	10.0	8.0	8.5	15.5	13.5	14.5
8	.0	.0	.0	2.0	.0	1.0	7.5	6.0	7.0	15.5	12.0	13.5
9	.0	.0	.0	3.5	.5	2.0	6.0	4.0	5.0	16.5	11.5	13.5
10	.0	.0	.0	5.0	2.0	3.0	6.0	2.5	4.5	20.0	14.0	16.5
11	.0	.0	.0	4.0	3.0	3.5	6.5	5.0	5.5	22.0	17.5	19.5
12	.0	.0	.0	4.0	2.5	3.5	9.5	5.0	7.0	23.0	19.5	21.0
13	.0	.0	.0	3.5	2.0	3.0	11.0	8.0	9.0	24.0	20.0	22.0
14	.0	.0	.0	3.5	3.0	3.5	9.5	8.0	8.5	24.0	20.5	22.0
15	.0	.0	.0	3.5	2.0	3.0	10.0	8.0	9.0	23.0	19.5	21.0
16	.0	.0	.0	3.5	.5	2.0	13.0	10.0	11.5	20.0	17.5	18.5
17	.0	.0	.0	4.0	2.5	3.0	11.5	8.0	10.0	19.5	17.0	18.0
18	.0	.0	.0	3.0	.5	2.0	13.0	8.5	10.5	18.5	16.0	17.5
19	.0	.0	.0	2.5	.0	1.5	13.0	11.5	12.0	16.5	13.5	15.0
20	.0	.0	.0	5.0	2.0	3.5	15.5	12.0	14.0	18.0	13.0	15.0
21	.0	.0	.0	4.5	1.5	3.0	17.5	14.0	15.5	18.0	16.5	17.5
22	.0	.0	.0	5.0	1.5	3.5	19.5	15.5	17.5	19.5	15.0	17.0
23	.0	.0	.0	5.5	4.0	5.0	20.0	17.0	18.5	19.0	16.5	18.0
24	.0	.0	.0	5.5	5.0	5.5	17.5	13.5	15.5	21.0	16.5	18.5
25	1.5	.0	.5	6.0	3.0	4.5	13.5	12.5	12.5	22.0	18.0	20.0
26	---	---	---	6.0	2.0	4.0	15.0	11.0	13.0	21.5	19.0	20.5
27	---	---	---	8.5	3.5	5.5	16.5	13.0	14.5	23.0	20.0	21.0
28	1.5	.0	.5	10.0	8.0	8.5	14.5	12.0	13.0	22.0	18.5	20.5
29	---	---	---	13.0	9.5	11.0	15.0	10.0	12.5	20.0	16.0	18.0
30	---	---	---	12.0	10.0	11.0	17.5	12.0	14.5	19.5	17.0	18.5
31	---	---	---	10.0	5.5	8.0	---	---	---	19.0	17.5	18.5
MONTH	1.5	.0	.0	13.0	.0	3.5	20.0	2.5	10.0	24.0	11.0	17.5

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	20.0	17.5	18.5	24.5	20.5	22.0	22.5	19.5	21.0	21.0	18.0	19.0
2	20.5	16.5	18.5	25.0	21.5	23.0	23.0	19.0	21.0	22.5	19.0	20.0
3	20.0	19.0	19.5	25.0	22.0	23.5	25.0	20.0	22.0	24.5	20.0	21.5
4	21.5	17.0	19.0	24.5	22.0	23.0	25.5	21.0	23.0	26.0	21.0	23.0
5	20.5	16.5	18.5	25.0	21.0	23.0	26.5	21.5	23.5	26.5	23.5	24.5
6	19.0	16.0	17.0	24.0	19.5	21.0	27.0	22.5	24.0	27.0	24.0	25.0
7	20.5	16.0	18.5	20.0	17.0	18.5	24.5	22.5	23.5	27.5	24.5	25.5
8	20.5	18.5	19.5	21.0	18.5	19.5	26.0	22.5	24.0	26.0	25.0	25.5
9	20.5	18.5	19.5	22.0	19.0	20.0	28.0	23.0	25.0	24.5	22.5	23.5
10	23.5	19.0	21.0	22.5	20.5	21.0	27.0	24.0	25.5	22.5	21.0	22.0
11	23.5	19.5	21.5	24.0	20.0	21.5	25.5	23.5	24.5	21.5	18.5	20.5
12	21.5	18.0	20.0	22.0	17.5	20.0	26.0	21.5	23.5	19.0	16.5	17.5
13	18.0	15.5	16.5	22.0	14.5	18.0	26.5	22.0	24.0	16.5	13.5	15.0
14	16.0	14.5	15.5	22.0	20.0	21.0	28.0	23.5	25.5	18.0	13.5	15.0
15	20.5	14.5	17.0	21.0	20.0	20.5	29.5	25.0	26.5	18.0	14.0	16.0
16	21.5	18.5	19.5	23.0	19.5	21.0	27.0	24.0	25.5	20.0	15.0	17.0
17	23.0	19.0	20.5	24.5	20.0	22.0	27.0	22.0	24.0	21.0	16.0	17.5
18	24.5	21.0	22.0	25.0	21.5	23.5	25.0	22.0	23.5	21.5	17.0	19.0
19	23.5	21.0	22.0	27.0	22.5	24.5	24.0	21.5	22.5	23.5	18.0	20.0
20	22.5	20.0	21.0	27.5	24.0	25.0	25.0	22.0	23.0	24.5	19.5	21.5
21	24.0	19.0	21.5	26.0	24.0	25.0	24.5	21.0	22.5	24.5	20.5	22.0
22	23.0	20.0	21.5	25.5	22.5	24.0	23.0	21.0	22.0	22.5	20.5	21.5
23	24.0	20.0	21.5	24.0	20.5	22.5	24.0	19.5	21.5	21.5	19.5	20.5
24	24.0	21.0	22.5	25.0	20.5	22.0	22.0	19.5	20.5	21.0	19.0	20.0
25	22.5	20.0	21.0	26.0	21.0	23.0	20.0	18.5	19.0	20.0	17.0	18.5
26	20.5	18.5	19.5	24.5	23.0	24.0	24.0	18.5	21.0	18.0	16.5	17.0
27	20.0	17.5	18.5	26.5	22.0	24.0	24.5	22.0	23.0	17.5	15.0	16.0
28	18.5	15.0	17.5	26.0	22.5	24.0	25.0	21.5	23.0	15.0	14.0	14.5
29	16.0	13.5	15.0	26.5	22.5	24.5	24.0	22.0	23.0	15.5	13.0	14.0
30	21.5	16.0	18.0	27.0	23.0	24.5	22.5	20.5	21.5	16.0	13.5	14.5
31	---	---	---	24.5	21.0	23.0	20.5	18.5	19.5	---	---	---
MONTH	24.5	13.5	19.5	27.5	14.5	22.5	29.5	18.5	23.0	27.5	13.0	19.5

DELAWARE RIVER BASIN

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01427510 DELAWARE RIVER AT CALLICOON, NY

LOCATION.--Lat 41°45'24", long 75°03'30", Wayne County, Pennsylvania, Hydrologic Unit 02040101, on right bank, 0.5 mi downstream from Callicoon Creek, 0.5 mi downstream from Interstate Bridge 7, and 0.8 mi southeast of Callicoon. Water-quality sampling site at discharge station.

DRAINAGE AREA.--1,820 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--July 1975 to current year.

REVISED RECORDS.--WDR NY-82-1: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 734.88 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges: Dec. 7, 9, Jan. 5 to Feb. 25, and Feb. 27 to Mar. 1. Records good except those for estimated daily discharges, which are poor. Subsequent to September 1954, entire flow from 371 mi² of drainage area controlled by Pepacton Reservoir (see Reservoirs in Delaware River Basin), and subsequent to October 1963, entire flow from 454 mi² of drainage area controlled by Cannonsville Reservoir (see Reservoirs in Delaware River Basin). Part of flow from these reservoirs diverted for New York City municipal supply. Remainder of flow (except for conservation releases and spill) impounded for release during period of low flow in the lower Delaware River basin, as directed by the Delaware River Master. Satellite telemeter at station.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 75,300 ft³/s Feb. 12, 1981, result of ice jam release, gage height, 13.19 ft; maximum gage height, 14.83 ft Jan. 9, 1979 (ice jam); minimum discharge, 307 ft³/s Aug. 23, 1985; minimum gage height, 2.20 ft Sept. 13, 1977, Aug. 23, 1985.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 39,500 ft³/s Sept. 27, gage height, 10.13 ft; minimum, 307 ft³/s Aug. 23, gage height, 2.20 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	774	728	3220	3130	900	2600	1750	847	1170	597	1130	596
2	420	1240	2960	3010	840	2240	2290	809	1560	477	1290	529
3	1190	1390	2460	2570	820	1950	2110	957	1220	411	831	420
4	865	1410	2700	2180	840	1630	2040	975	1050	677	655	385
5	868	1390	2220	2000	900	1570	2000	882	938	687	575	371
6	1520	1510	2000	1700	840	2050	1980	856	883	956	578	393
7	1360	1640	1700	1400	820	1580	1990	982	813	1290	590	628
8	1150	1540	1480	1100	820	1680	2020	912	744	1070	637	631
9	1240	1510	1400	1000	840	1780	2080	784	711	867	677	1580
10	1210	1390	1370	900	940	1740	1830	731	684	814	657	2370
11	1010	1500	1420	1100	1050	1750	1680	699	615	675	584	1540
12	1040	1550	1670	1200	1200	6390	1580	673	570	832	547	996
13	1210	1310	1800	1300	1500	9000	1440	651	586	1740	507	754
14	1230	1370	2270	1200	1700	6070	1360	632	574	1570	506	638
15	1410	1280	2410	1000	1300	4570	1370	580	536	1460	482	594
16	1120	1290	2310	900	1100	3520	1340	541	535	1740	437	585
17	1170	1440	2180	840	940	3010	1250	600	540	1500	418	508
18	1190	1440	2080	800	840	2550	1140	1220	571	1030	408	474
19	1040	1410	1980	780	800	2080	1120	2130	573	832	354	453
20	1250	1250	2380	760	780	1960	1300	1470	539	731	331	435
21	1130	1380	2230	780	780	1780	1340	1190	473	932	332	464
22	1070	1380	3080	820	800	1570	1220	1010	619	1680	323	480
23	1180	1370	4280	900	1200	1440	1160	893	852	1490	312	455
24	797	1350	3300	980	3000	1400	1140	812	672	929	519	453
25	589	1440	2850	1400	6400	1370	1140	745	609	702	677	428
26	775	1410	2320	1300	5540	1240	1170	694	497	651	624	386
27	858	1440	1940	1100	4200	1130	1130	719	424	833	571	18200
28	904	1350	1860	960	3200	1130	1040	1070	561	882	485	20500
29	688	3460	3100	900	---	1260	971	1630	1020	731	405	7200
30	541	4850	3980	860	---	1340	914	1300	883	636	383	4200
31	1090	---	3500	820	---	1320	---	989	---	643	523	---
TOTAL	31889	47018	74450	39690	44890	74700	44895	28983	22022	30065	17348	67646
MEAN	1029	1567	2402	1280	1603	2410	1497	935	734	970	560	2255
MAX	1520	4850	4280	3130	6400	9000	2290	2130	1560	1740	1290	20500
MIN	420	728	1370	760	780	1130	914	541	424	411	312	371
CAL YR 1984	TOTAL	1082294	MEAN	2957	MAX	41000	MIN	420				
WTR YR 1985	TOTAL	523596	MEAN	1435	MAX	20500	MIN	312				

DELAWARE RIVER BASIN

01427510 DELAWARE RIVER AT CALLICOON, NY--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: June 1975 to current year.

INSTRUMENTATION.--Water-temperature digital recorder since June 1975, provides one-hour-interval punches.

REMARKS.--Interruptions of record were due to malfunction of recording instrument, except July 3, 4, and Aug. 17-24, when probe was out of the water.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1976-84), 29.5°C Aug. 7-9, 1980; minimum, 0.0°C on many days during winter periods.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Maximum recorded, 29.0°C Aug. 15, but may have been higher during period when probe was out of the water; minimum, 0.0°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	13.5	12.0	12.5	11.5	11.0	11.0	5.0	4.0	4.5	3.5	3.0	3.0
2	12.0	10.5	11.5	12.0	9.0	11.0	4.5	3.5	4.0	4.0	3.5	3.5
3	---	---	---	9.5	7.5	8.5	3.5	2.5	3.0	3.0	1.5	2.5
4	12.0	9.5	11.0	9.0	7.0	8.0	2.5	1.5	2.0	1.0	.5	1.0
5	12.5	10.0	11.0	10.5	9.0	9.5	2.0	1.0	2.0	.5	.0	.0
6	11.5	9.0	10.5	10.0	9.0	10.0	1.0	.5	.5	.0	.0	.0
7	11.5	8.0	10.0	8.5	6.5	8.0	.5	.0	.0	.5	.0	.0
8	12.0	10.5	11.0	7.0	5.5	6.5	.0	.0	.0	.5	.0	.0
9	14.5	12.0	13.0	7.0	6.0	6.5	.5	.0	.0	.5	.0	.0
10	16.0	13.5	14.5	9.0	7.0	8.0	.5	.0	.5	.0	.0	.0
11	15.5	13.5	14.5	10.0	8.5	9.5	1.5	.5	1.0	.0	.0	.0
12	16.0	13.0	15.0	9.5	7.5	8.5	3.0	1.5	2.0	.0	.0	.0
13	15.5	13.0	14.0	7.0	4.5	6.0	4.5	3.0	4.0	.0	.0	.0
14	14.5	12.5	13.5	4.0	3.0	3.5	4.5	4.0	4.5	.0	.0	.0
15	13.5	11.0	12.5	4.0	2.0	3.0	4.0	3.5	3.5	.0	.0	.0
16	13.5	10.5	12.0	4.5	3.5	4.0	4.0	3.5	3.5	.5	.0	.0
17	14.0	11.5	12.5	4.0	3.0	3.5	5.5	4.0	4.5	.0	.0	.0
18	14.5	13.5	14.0	4.0	2.5	3.0	5.5	4.5	5.0	.0	.0	.0
19	15.0	13.5	14.0	3.5	2.0	3.0	4.5	3.5	4.0	.0	.0	.0
20	16.0	14.5	15.0	2.0	1.0	1.5	3.5	2.5	3.0	.0	.0	.0
21	14.5	13.0	13.5	1.5	.5	1.0	2.0	.5	1.5	.0	.0	.0
22	15.0	14.0	14.5	2.0	.5	1.5	2.0	.5	1.0	.0	.0	.0
23	14.5	13.5	14.0	2.5	1.0	1.5	2.0	1.5	2.0	.0	.0	.0
24	14.0	13.0	13.5	3.0	1.5	2.0	2.0	1.0	1.5	.0	.0	.0
25	13.5	11.5	12.5	4.0	2.0	3.0	1.5	.5	1.5	.0	.0	.0
26	13.0	12.5	13.0	4.5	3.0	3.5	.0	.0	.0	.0	.0	.0
27	15.0	13.0	14.0	4.5	3.0	3.5	.0	.0	.0	.0	.0	.0
28	17.0	14.5	15.5	7.5	4.0	5.5	.0	.0	.0	.0	.0	.0
29	16.5	15.0	16.0	8.0	5.5	6.5	4.0	.0	1.5	.0	.0	.0
30	14.5	12.5	14.0	5.5	4.5	5.0	6.0	4.0	5.0	.0	.0	.0
31	13.5	12.0	13.0	---	---	---	4.5	3.0	4.0	.0	.0	.0
MONTH	17.0	8.0	13.0	12.0	.5	5.5	6.0	.0	2.0	4.0	.0	.5

DELAWARE RIVER BASIN

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01427510 DELAWARE RIVER AT CALLICOON, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.0	.0	.0	2.5	.0	1.0	7.0	5.5	6.0	18.5	14.5	16.5
2	.0	.0	.0	4.0	1.5	2.5	6.0	4.5	5.0	17.0	14.0	15.0
3	.0	.0	.0	4.0	1.5	2.5	4.5	3.0	4.0	15.0	12.0	13.5
4	.0	.0	.0	2.0	.0	.5	7.0	2.5	4.5	16.5	10.5	13.5
5	.0	.0	.0	2.5	.0	1.0	11.0	5.5	8.0	16.0	13.5	15.0
6	.0	.0	.0	.5	.0	.0	12.5	9.5	10.5	15.5	14.5	15.0
7	.0	.0	.0	1.0	.0	.5	11.0	8.5	10.0	16.5	13.5	15.0
8	.0	.0	.0	1.5	.0	.5	8.5	6.5	7.5	16.0	12.0	14.5
9	.0	.0	.0	4.0	.0	2.0	7.5	4.5	6.0	17.5	11.0	14.5
10	.0	.0	.0	5.0	1.5	3.0	7.5	3.0	5.5	20.0	14.0	17.0
11	.0	.0	.0	5.0	2.5	3.5	7.5	4.5	6.0	22.0	17.0	19.5
12	.0	.0	.0	4.0	3.0	3.5	10.5	5.0	7.5	22.5	19.0	21.0
13	.0	.0	.0	3.5	2.5	3.0	11.5	7.5	9.5	24.5	20.5	22.5
14	.0	.0	.0	4.5	3.5	3.5	9.5	8.5	9.0	24.5	20.0	22.5
15	.0	.0	.0	4.0	2.0	3.0	10.5	8.5	9.5	23.5	19.5	21.5
16	.0	.0	.0	4.0	1.5	2.5	14.0	9.5	11.5	20.5	18.0	19.0
17	.0	.0	.0	4.5	2.5	3.0	12.5	8.0	10.5	20.5	17.5	18.5
18	.0	.0	.0	3.5	1.0	2.5	13.5	8.5	11.0	19.5	16.0	18.0
19	.0	.0	.0	4.0	.0	2.0	14.0	11.0	13.0	17.5	15.5	16.5
20	.0	.0	.0	5.5	2.0	3.5	16.5	12.5	14.5	20.0	14.0	16.5
21	.0	.0	.0	5.5	2.0	3.5	19.0	13.5	16.0	---	---	---
22	.0	.0	.0	6.0	1.5	4.0	20.5	15.5	18.0	---	---	---
23	.0	.0	.0	6.5	4.0	5.0	21.0	17.0	19.0	---	---	---
24	.0	.0	.0	6.0	5.0	5.5	18.5	14.5	16.0	---	---	---
25	1.0	.0	.0	7.0	3.5	5.0	14.5	13.5	14.0	---	---	---
26	1.0	.0	.5	7.0	2.0	4.5	16.5	12.0	14.5	---	---	---
27	1.0	.0	.5	9.5	3.0	6.5	17.5	13.0	15.5	---	---	---
28	1.0	.0	.5	10.5	7.5	9.0	16.0	12.5	14.0	---	---	---
29	---	---	---	13.0	9.0	11.0	16.5	11.0	13.5	22.0	17.5	19.5
30	---	---	---	13.0	10.0	11.5	18.5	12.0	15.5	21.5	17.5	19.5
31	---	---	---	10.5	6.0	8.5	---	---	---	20.0	18.5	19.5
MONTH	1.0	.0	.0	13.0	.0	4.0	21.0	2.5	11.0	24.5	10.5	17.5

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	21.5	18.5	20.0	---	---	---	24.0	20.0	22.0	20.5	18.0	19.0
2	23.0	17.5	20.5	---	---	---	24.0	19.5	22.0	21.0	19.0	20.0
3	22.0	19.0	20.5	---	---	---	24.5	19.5	22.5	23.0	19.5	21.5
4	23.5	18.0	21.0	---	---	---	25.0	21.5	23.5	26.0	21.5	23.5
5	21.5	18.0	19.5	26.0	23.0	25.0	25.5	22.5	24.0	26.0	23.5	24.5
6	21.0	17.0	19.0	25.5	23.0	24.5	25.0	23.0	24.0	27.0	24.0	25.5
7	22.0	17.0	20.0	24.0	21.5	23.0	24.5	23.0	23.5	27.0	24.5	26.0
8	21.0	19.0	20.0	22.5	19.0	21.0	25.0	22.5	24.0	26.5	25.5	26.0
9	21.0	18.5	20.0	23.5	20.5	22.0	27.0	22.5	25.0	25.0	22.0	23.5
10	24.0	20.0	22.0	24.0	21.5	23.0	27.0	24.0	26.0	23.5	21.0	22.0
11	23.5	20.5	22.0	25.0	21.5	23.5	26.0	24.5	25.5	22.0	20.0	21.0
12	23.5	19.0	21.5	24.0	21.5	23.0	26.5	23.0	24.5	19.5	16.5	18.0
13	19.0	17.0	18.0	23.5	20.0	22.0	26.0	22.5	24.5	17.5	14.5	16.5
14	18.0	15.5	17.0	24.0	19.5	21.5	28.0	24.5	26.0	17.5	14.0	16.0
15	20.5	16.0	18.5	23.0	21.0	22.0	29.0	25.0	26.5	18.0	14.0	16.0
16	21.0	19.5	20.5	25.0	20.5	22.5	26.5	23.0	25.0	19.0	15.0	17.0
17	22.5	20.0	21.0	25.5	20.5	23.0	---	---	---	19.0	16.0	18.0
18	24.5	21.5	23.0	26.5	21.0	24.0	---	---	---	19.5	17.0	18.5
19	24.5	22.0	23.0	27.0	22.5	25.0	---	---	---	21.0	17.5	19.5
20	24.0	20.5	22.5	27.5	24.5	26.0	---	---	---	22.5	19.5	21.0
21	25.0	20.0	22.5	27.5	24.5	26.0	---	---	---	23.0	20.0	22.0
22	24.5	21.0	23.0	25.5	22.0	23.5	---	---	---	23.0	21.0	21.5
23	26.5	22.5	25.0	24.5	21.0	23.0	---	---	---	21.0	20.0	20.5
24	25.5	23.0	23.5	24.5	19.5	22.5	---	---	---	21.5	19.5	20.5
25	23.5	20.5	22.5	25.0	21.0	23.5	22.0	20.5	21.0	19.5	17.0	18.5
26	22.0	20.0	20.5	25.0	23.5	24.0	23.0	20.5	21.5	18.5	16.5	17.5
27	20.5	19.0	20.0	26.0	22.0	24.0	24.5	22.0	23.0	17.5	15.0	16.5
28	19.5	18.5	19.0	26.5	22.0	24.5	24.0	21.5	23.0	15.0	14.5	15.0
29	---	---	---	26.0	23.0	24.5	23.5	22.0	23.0	15.0	14.0	14.5
30	---	---	---	26.5	23.5	25.5	22.0	20.5	21.5	16.0	14.0	15.0
31	---	---	---	25.5	21.5	23.0	20.5	19.0	19.5	---	---	---
MONTH	26.5	15.5	21.0	27.5	19.0	23.5	29.0	19.0	23.5	27.0	14.0	20.0

DELAWARE RIVER BASIN

01428500 DELAWARE RIVER ABOVE LACKAWAXEN RIVER NEAR BARRYVILLE, NY

LOCATION.--Lat 41°30'31", long 74°59'11", Sullivan County, Hydrologic Unit 02040101, on left bank 1.6 mi upstream from Lackawaxen River, and 4.6 mi northwest of Barryville. Water-quality sampling site at discharge station.

DRAINAGE AREA.--2,020 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1940 to current year.

REVISED RECORDS.--WDR NY-82-1: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 600.22 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges: Dec. 7-10, Jan. 7 to Feb. 26, and Feb. 28 to Mar. 1. Records good except those for estimated daily discharges, which are poor. Subsequent to September 1954, entire flow from 371 mi² of drainage area controlled by Pepacton Reservoir (see Reservoirs in Delaware River Basin), and subsequent to October 1963, entire flow from 454 mi² of drainage area controlled by Cannonsville Reservoir (see Reservoirs in Delaware River Basin). Part of flow of these reservoirs diverted for New York City municipal supply. Remainder of flow (except for conservation releases and spill) impounded for release during periods of low flow in the lower Delaware River basin, as directed by the Delaware River Master. Gage-height telemeter at station.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 130,000 ft³/s Aug. 19, 1955, gage height, 26.40 ft, from floodmarks in gage house, from rating curve extended above 55,000 ft³/s on basis of slope-area measurement at gage height 23.19 ft; minimum discharge, 122 ft³/s Sept. 5, 1953, gage height, 1.11 ft; minimum daily, 126 ft³/s Sept. 4, 1953.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 49,500 ft³/s Sept. 27, gage height, 14.70 ft; minimum daily, 355 ft³/s Aug. 23.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1210	1010	3580	3480	960	2900	2120	1110	1500	857	1150	650
2	597	794	3250	3380	960	2690	2770	1070	1940	663	1500	668
3	728	1610	2740	3000	900	2400	2620	1500	1630	539	1130	530
4	1280	1470	2960	2580	900	2110	2460	1640	1370	476	842	433
5	788	1530	2620	2380	1000	1860	2380	1380	1230	889	711	414
6	1350	1600	2290	2030	900	2490	2370	1250	1140	860	625	397
7	1550	1740	1900	1900	900	2100	2410	1320	1050	1250	665	470
8	1310	1670	1600	1600	900	2040	2530	1310	968	1370	721	651
9	1260	1620	1600	1300	900	2260	2660	1160	913	1030	727	838
10	1260	1530	1600	1100	1000	2220	2400	1040	859	916	758	2900
11	1180	1620	1560	1000	1200	2180	2170	972	794	845	703	2070
12	1030	1540	1870	1200	1300	6190	2040	928	730	713	628	1330
13	1210	1550	1960	1400	1500	11800	1880	888	721	1580	592	981
14	1270	1410	2360	1500	1700	7510	1790	858	724	1910	558	792
15	1410	1450	2600	1300	1900	5610	1760	808	681	1650	562	682
16	1410	1310	2510	1100	1400	4320	1690	744	721	1870	498	680
17	1200	1470	2360	940	1100	3610	1640	778	717	1830	463	605
18	1250	1550	2260	880	1000	3130	1520	1190	707	1280	452	525
19	1220	1510	2150	860	940	2610	1430	2360	725	1020	435	483
20	1150	1450	2450	860	880	2360	1540	1920	696	877	382	453
21	1250	1310	2530	860	840	2230	1710	1530	627	849	360	430
22	1190	1500	3130	900	860	1980	1550	1300	548	2070	368	480
23	1280	1470	4990	1000	1400	1820	1450	1150	899	1810	355	476
24	1090	1460	3910	1100	3500	1760	1420	1040	958	1280	365	460
25	726	1490	3300	1200	7600	1720	1450	954	832	953	651	444
26	704	1590	2730	1600	7200	1580	1430	884	711	817	772	418
27	913	1500	2320	1500	5170	1430	1420	864	564	924	653	16800
28	945	1490	2160	1300	3500	1410	1320	1310	523	1040	576	30000
29	877	2590	3190	1100	---	1490	1240	2350	1040	929	478	9780
30	654	5670	4460	1000	---	1640	1180	1930	1220	786	450	5340
31	806	---	4090	960	---	1660	---	1390	---	768	607	---
TOTAL	34098	49504	83030	46310	52310	91110	56350	38928	27738	34651	19737	81180
MEAN	1100	1650	2678	1494	1868	2939	1878	1256	925	1118	637	2706
MAX	1550	5670	4990	3480	7600	11800	2770	2360	1940	2070	1500	30000
MIN	597	794	1560	860	840	1410	1180	744	523	476	355	397
CAL YR 1984	TOTAL	1224087	MEAN	3345	MAX	47000	MIN	597				
WTR YR 1985	TOTAL	614946	MEAN	1685	MAX	30000	MIN	355				

DELAWARE RIVER BASIN

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01428500 DELAWARE RIVER ABOVE LACKAWAXEN RIVER NEAR BARRYVILLE, NY--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1968 to current year.

CHEMICAL DATA: 1971-73 (a).

NUTRIENT DATA: 1971 (a).

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: October 1967 to current year (no winter record for water years 1969-76).

INSTRUMENTATION.--Water-temperature digital recorder since October 1975, provides one-hour-interval punches.
Prior to October 1975, water-temperature recorder provided continuous recordings.

REMARKS.--Interruptions of record were due to malfunctions of recording instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1968-75, 1980-81, 1983, 1985), 32.0°C Aug. 2, 3, 1975, July 10, 1981;
minimum (water years 1968, 1977-85), 0.0°C on many days during winter periods, each year except water years
1980-82.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Maximum, 30.0°C July 20; minimum, 0.0°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	---	---	---	13.5	12.5	13.0	5.0	4.5	5.0	---	---	---
2	---	---	---	13.0	9.5	12.0	4.5	4.0	4.5	---	---	---
3	---	---	---	11.0	8.5	10.0	4.0	3.5	4.0	---	---	---
4	---	---	---	9.5	8.0	8.5	3.0	2.0	2.5	---	---	---
5	---	---	---	10.0	9.0	9.5	2.0	1.5	2.0	---	---	---
6	---	---	---	10.0	9.0	9.5	1.5	.5	1.0	---	---	---
7	---	---	---	9.0	7.5	8.5	.5	.0	.0	---	---	---
8	---	---	---	8.0	6.0	7.0	.5	.0	.0	---	---	---
9	---	---	---	7.5	6.0	6.5	1.0	.0	.5	---	---	---
10	---	---	---	8.5	7.0	7.5	.5	.0	.0	.5	.0	.0
11	---	---	---	9.0	8.0	8.5	1.0	.0	.5	.0	.0	.0
12	---	---	---	9.0	8.0	8.5	1.5	1.0	1.0	.0	.0	.0
13	---	---	---	8.0	5.0	7.0	3.5	1.5	2.5	.0	.0	.0
14	---	---	---	5.5	4.0	5.0	4.0	3.5	3.5	.0	.0	.0
15	---	---	---	4.0	3.0	4.0	4.0	4.0	4.0	.0	.0	.0
16	---	---	---	5.0	3.5	4.0	4.0	4.0	4.0	.0	.0	.0
17	---	---	---	4.5	3.0	3.5	5.0	4.0	4.5	.0	.0	.0
18	---	---	---	3.5	3.0	3.0	5.0	4.5	5.0	.0	.0	.0
19	---	---	---	3.5	2.5	3.0	4.5	4.0	4.5	.0	.0	.0
20	---	---	---	2.0	1.0	1.5	4.0	3.0	3.5	.0	.0	.0
21	---	---	---	2.0	.5	1.0	3.0	1.5	2.5	.0	.0	.0
22	---	---	---	2.5	1.0	1.5	1.5	1.5	1.5	.0	.0	.0
23	---	---	---	2.0	.5	1.0	1.5	1.5	1.5	.0	.0	.0
24	---	---	---	2.5	1.0	1.5	1.5	1.0	1.5	.0	.0	.0
25	---	---	---	3.5	1.5	2.5	1.5	1.0	1.5	.0	.0	.0
26	14.0	14.0	14.0	4.0	2.0	3.0	1.0	.0	.5	.0	.0	.0
27	15.5	14.0	14.5	4.5	2.5	3.5	.0	.0	.0	.0	.0	.0
28	17.5	15.0	16.0	6.5	3.5	5.0	.0	.0	.0	.0	.0	.0
29	16.5	15.5	16.5	6.5	5.5	6.0	---	---	---	.0	.0	.0
30	15.5	14.0	15.0	6.0	5.0	5.5	---	---	---	.0	.0	.0
31	15.5	13.5	14.5	---	---	---	---	---	---	.0	.0	.0
MONTH	17.5	13.5	15.0	13.5	.5	5.5	5.0	.0	2.0	.5	.0	.0

DELAWARE RIVER BASIN

01428500 DELAWARE RIVER ABOVE LACKAWAXEN RIVER NEAR BARRYVILLE, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.0	.0	.0	1.5	.0	1.0	8.5	6.5	7.5	---	---	---
2	.0	.0	.0	3.5	1.5	2.5	6.5	5.5	6.0	---	---	---
3	.0	.0	.0	3.5	2.0	2.5	5.0	4.0	5.0	---	---	---
4	.0	.0	.0	2.0	.5	1.0	6.0	3.5	4.5	---	---	---
5	.0	.0	.0	3.0	.5	1.5	9.5	5.5	7.5	---	---	---
6	.0	.0	.0	1.5	.0	.5	12.0	9.0	10.5	---	---	---
7	.0	.0	.0	1.5	.0	.5	11.0	9.5	10.5	17.0	14.5	15.5
8	.0	.0	.0	2.0	.5	1.0	9.5	7.5	9.0	17.0	13.0	15.0
9	.0	.0	.0	3.0	1.0	2.0	7.5	6.0	7.0	17.5	11.5	14.5
10	.0	.0	.0	4.5	2.0	3.0	7.5	5.0	6.0	20.5	14.5	17.5
11	.0	.0	.0	4.0	3.0	3.5	7.0	5.5	6.0	22.0	17.0	19.5
12	.0	.0	.0	4.5	3.5	4.0	9.5	5.5	7.5	23.0	19.5	21.0
13	.0	.0	.0	3.5	3.5	3.5	11.5	8.0	9.5	25.5	20.5	22.5
14	.0	.0	.0	3.5	3.5	3.5	---	---	---	26.0	20.5	23.0
15	.0	.0	.0	3.5	3.5	3.5	---	---	---	23.5	20.0	22.0
16	.0	.0	.0	3.5	2.5	3.0	13.5	10.0	11.5	20.5	19.0	19.5
17	.0	.0	.0	3.5	3.0	3.0	13.0	9.5	11.0	21.0	18.5	19.5
18	.0	.0	.0	3.5	2.0	3.0	14.0	9.5	11.5	20.5	17.0	18.5
19	.0	.0	.0	3.5	1.5	2.5	13.5	11.5	13.0	17.5	16.0	17.0
20	.0	.0	.0	5.0	2.5	3.5	17.0	13.0	14.5	19.5	15.5	17.5
21	.0	.0	.0	5.5	3.0	4.0	---	---	---	21.5	17.0	19.0
22	.0	.0	.0	6.0	3.0	4.5	19.5	16.0	18.0	22.5	17.5	19.5
23	.0	.0	.0	6.0	4.0	5.0	21.5	17.0	19.0	20.5	17.5	19.0
24	.0	.0	.0	5.5	5.5	5.5	18.0	15.5	17.0	22.5	17.5	19.5
25	.0	.0	.0	7.0	4.5	5.5	15.5	14.5	15.0	24.5	18.0	21.0
26	.5	.0	.0	7.0	3.5	5.5	17.0	13.5	15.0	24.0	19.5	21.5
27	1.0	.5	.5	9.0	4.0	6.5	---	---	---	26.0	21.0	23.0
28	1.0	.0	.5	10.0	7.0	9.0	---	---	---	23.0	20.0	22.0
29	---	---	---	13.0	9.5	11.0	---	---	---	21.0	18.5	19.5
30	---	---	---	12.5	10.5	11.5	---	---	---	20.5	18.5	19.5
31	---	---	---	10.5	8.0	9.5	---	---	---	19.5	18.5	19.0
MONTH	1.0	.0	.0	13.0	.0	4.0	21.5	3.5	10.5	26.0	11.5	19.5

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	21.5	19.0	20.0	24.5	20.0	22.0	25.5	21.5	23.5	22.5	19.0	20.5
2	22.0	18.5	20.5	24.0	21.5	23.0	24.5	21.0	23.0	23.0	19.5	21.5
3	22.5	20.0	21.0	25.5	22.5	23.5	26.5	21.0	23.5	24.5	20.5	22.5
4	23.5	19.0	21.5	27.0	22.5	24.5	26.5	22.0	24.0	26.5	22.0	24.5
5	21.5	18.5	20.0	28.0	23.5	25.5	27.0	23.0	25.0	27.0	24.0	25.5
6	22.5	18.0	20.0	27.0	24.5	25.5	27.0	23.5	25.0	28.5	25.0	26.5
7	22.5	17.5	20.0	26.5	23.5	25.0	25.5	24.0	24.5	29.0	25.5	27.0
8	22.0	19.0	20.0	24.5	22.0	23.5	28.0	24.0	25.5	27.5	26.0	26.5
9	22.0	19.5	20.5	25.5	21.5	23.5	29.0	24.0	26.5	26.0	25.0	25.5
10	25.0	20.0	22.0	26.5	23.0	24.5	29.0	25.0	27.0	25.0	22.5	23.5
11	25.0	20.0	22.0	27.5	23.0	25.0	27.5	25.5	26.5	22.5	20.5	22.0
12	22.5	20.0	21.5	25.5	23.0	24.5	28.5	24.0	26.0	21.0	18.0	19.5
13	20.0	18.0	19.0	26.5	23.0	24.5	28.0	24.0	26.0	19.5	15.5	17.5
14	19.5	17.0	18.0	24.5	23.0	24.0	29.0	25.5	27.0	19.5	15.0	17.0
15	22.5	16.5	19.0	24.5	22.0	23.0	29.5	26.0	27.5	19.0	15.5	17.0
16	22.0	19.5	20.5	25.5	22.5	24.0	27.5	25.0	26.5	19.5	16.0	17.5
17	23.0	19.5	21.5	26.0	22.0	24.0	28.0	23.5	25.5	19.5	17.0	18.0
18	25.5	21.0	23.0	28.0	23.0	25.5	25.5	23.5	24.5	20.5	17.5	19.0
19	24.0	21.5	22.5	29.0	24.0	26.5	25.5	22.5	24.0	22.0	18.5	20.0
20	24.0	21.0	22.5	30.0	25.0	27.5	25.5	23.0	24.0	23.5	19.5	21.5
21	24.5	20.5	22.5	29.5	25.5	27.5	25.5	22.0	24.0	23.5	20.5	22.0
22	25.0	21.0	23.0	26.5	24.0	26.0	24.5	22.0	23.5	22.5	21.0	21.5
23	27.5	22.5	24.5	25.0	22.0	23.5	25.0	20.5	23.0	22.5	20.5	21.0
24	26.0	23.0	24.5	26.0	21.0	23.5	24.0	20.5	22.5	---	---	---
25	25.0	21.0	23.0	26.5	22.0	24.5	---	---	---	---	---	---
26	22.0	20.0	21.0	26.0	24.0	25.0	---	---	---	---	---	---
27	20.5	18.5	20.0	28.5	23.0	25.5	---	---	---	---	---	---
28	19.5	18.5	19.0	28.0	23.0	25.5	25.5	22.5	24.0	---	---	---
29	21.5	18.5	19.5	28.0	23.5	25.5	24.5	23.0	23.5	---	---	---
30	23.5	19.0	21.0	28.0	24.0	26.0	23.0	21.5	22.0	---	---	---
31	---	---	---	25.0	22.5	23.5	21.0	20.0	20.5	---	---	---
MONTH	27.5	16.5	21.0	30.0	20.0	24.5	29.5	20.0	24.5	29.0	15.0	21.5

LACKAWAXEN RIVER BASIN

37

01429000 WEST BRANCH LACKAWAXEN RIVER AT PROMPTON, PA

LOCATION.--Lat 41°35'14", long 75°19'38", Wayne County, Hydrologic Unit 02040103, on left bank 500 ft downstream from Prompton Lake, 1,500 ft upstream from bridge on U.S. Highway 6 at Prompton, and 2,000 ft upstream from Van Auken Creek.

DRAINAGE AREA.--59.7 mi².

PERIOD OF RECORD.--August 1944 to current year. Prior to October 1952, published as Lackawaxen River at Prompton.

REVISED RECORDS.--WSP 1432: 1948-49. WDR PA-71-1: 1970(M).

GAGE.--Water-stage recorder. Datum of gage is 1,083.78 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--No estimated daily discharges during water year. Records good. Flow regulated since 1960 by Prompton Reservoir (station 01428900) 500 ft upstream. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--41 years, 109 ft³/s, 24.85 in/yr, adjusted for storage since January 1961.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 5,860 ft³/s Aug. 18, 1955, gage height, 9.24 ft, from rating curve extended above 3,600 ft³/s; no flow July 26 to Aug. 25, 1960, result of construction work upstream.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of May 23, 1942, reached a stage of 16.7 ft, from floodmark.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 1,760 ft³/s Sept. 27, gage height, 4.78 ft minimum daily, 13 ft³/s Oct. 13-15, Aug. 9, Sept. 26.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	16	21	48	155	33	159	114	45	56	26	37	25
2	16	21	69	149	33	136	164	44	58	25	37	25
3	16	21	77	129	32	119	151	62	50	24	36	24
4	16	20	108	109	32	102	136	77	44	24	35	23
5	15	21	94	100	32	107	121	69	40	22	34	22
6	14	24	84	84	31	132	111	67	38	22	33	21
7	14	25	73	81	31	113	105	73	36	23	32	21
8	14	25	61	75	31	110	106	69	35	23	22	20
9	14	25	59	61	30	121	112	62	34	22	13	19
10	14	25	55	53	30	115	103	56	33	21	15	21
11	14	26	56	51	29	107	95	51	32	21	17	23
12	14	27	66	49	29	321	88	47	30	21	25	23
13	13	27	79	49	31	463	80	45	30	25	36	22
14	13	26	110	48	33	339	77	43	29	27	35	21
15	13	26	109	47	34	247	78	39	27	32	35	20
16	14	25	104	44	35	192	75	38	27	66	34	19
17	14	25	98	43	35	161	70	39	27	73	32	18
18	14	24	91	42	35	136	63	43	27	60	30	17
19	14	23	85	42	35	113	64	44	27	49	28	16
20	14	23	102	41	35	106	82	44	26	42	20	16
21	14	22	97	39	34	97	81	43	25	39	18	15
22	16	21	123	38	34	87	74	41	24	58	25	14
23	21	21	183	38	38	82	68	38	24	55	23	14
24	22	20	149	37	156	81	67	37	25	46	21	14
25	22	20	125	36	481	78	66	35	27	40	22	14
26	22	19	99	36	373	71	64	34	26	38	24	13
27	23	19	89	36	264	66	61	33	26	40	24	725
28	22	18	90	35	196	66	55	34	25	38	24	1120
29	22	26	184	34	---	69	51	45	24	36	23	526
30	22	37	210	34	---	69	48	48	26	35	23	277
31	22	---	176	34	---	70	---	44	---	35	25	---
TOTAL	514	703	3153	1849	2222	4235	2630	1489	958	1108	838	3148
MEAN	16.6	23.4	102	59.6	79.4	137	87.7	48.0	31.9	35.7	27.0	105
MAX	23	37	210	155	481	463	164	77	58	73	37	1120
MIN	13	18	48	34	29	66	48	33	24	21	13	13
MEAN†	18.6	30.1	106	52.0	87.9	134	86.5	47.8	27.5	38.8	23.4	116
CFSM†	.31	.50	1.77	.87	1.47	2.24	1.45	.80	.46	.65	.39	1.94
IN†	.35	.57	2.00	.98	1.66	2.53	1.64	.91	.52	.74	.44	2.20

CAL YR 1984 TOTAL 46035 MEAN 126 MAX 2270 MIN 13 MEAN† 126 CFSM† 2.11 IN† 28.65
WTR YR 1985 TOTAL 22847 MEAN 62.6 MAX 1120 MIN 13 MEAN† 63.8 CFSM† 1.07 IN† 14.53

† Adjusted for change in contents in Prompton Reservoir.

LACKAWAXEN RIVER BASIN

01429500 DYBERRY CREEK NEAR HONESDALE, PA

LOCATION.--Lat 41°36'25", long 75°16'00", Wayne County, Hydrologic Unit 02040103, on right bank 180 ft upstream from unnamed tributary, 1,700 ft downstream from General Edgar Jadwin Reservoir, 2.1 mi north of Honesdale, and 2.6 mi upstream from mouth.

DRAINAGE AREA.--64.6 mi².

PERIOD OF RECORD.--October 1943 to current year. Published as "at Dyberry" October 1943 to September 1959 and as "near Dyberry" October 1959 to September 1961.

REVISED RECORDS.--WSP 1382: 1947(M), 1950(M), 1951-53.

GAGE.--Water-stage recorder. Datum of gage is 970.70 ft above National Geodetic Vertical Datum of 1929. Prior to Oct. 1, 1957, nonrecording gage at site 1.9 mi upstream at datum 13.70 ft higher.

REMARKS.--Estimated daily discharges during water year: Jan. 10 to Feb. 17 and Sept. 25-30. Record good except for periods of estimated record, which are poor. Flow regulated since October 1959 by General Edgar Jadwin Reservoir (station 01429400) 1,700 ft upstream. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--42 years, 113 ft³/s, 23.76 in/yr, adjusted for storage since October 1959.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 15,500 ft³/s July 10, 1952, gage height, 14.6 ft, site and datum then in use, from rating curve extended above 2,500 ft³/s on basis of slope-area measurement at gage height 13.78 ft, site and datum then in use; no flow Oct. 2, 3, 1968, result of shutoff at General Edgar Jadwin Reservoir.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of May 23, 1942, reached a stage of 15.86 ft, site and datum then in use, from floodmarks.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 2,220 ft³/s Sept. 27, gage height, 6.89 ft, from floodmarks; minimum daily, 7.8 ft³/s Oct. 16.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	9.5	16	90	138	32	119	178	42	136	33	57	23
2	13	16	89	136	32	108	183	45	76	26	38	19
3	14	16	84	109	31	95	116	144	57	22	30	15
4	14	14	105	95	31	77	105	102	47	21	26	14
5	14	35	72	89	30	122	94	75	49	27	22	14
6	13	40	70	84	30	117	90	73	47	60	21	13
7	15	29	62	79	30	97	85	76	38	61	19	12
8	13	23	55	72	29	110	100	81	35	37	24	11
9	11	21	51	54	29	140	103	63	34	29	20	16
10	10	26	47	51	28	120	90	55	33	41	18	47
11	9.7	32	58	49	28	111	90	49	28	38	17	27
12	8.6	28	76	48	28	605	82	46	26	31	15	18
13	8.3	26	84	47	29	726	79	44	28	64	14	14
14	7.9	23	99	46	31	395	84	40	25	44	15	12
15	7.9	21	89	45	32	224	87	35	22	219	15	11
16	7.8	20	89	43	33	159	85	34	33	293	14	11
17	7.9	19	80	42	35	135	79	43	30	98	15	10
18	8.0	18	73	41	39	114	70	72	31	65	13	9.8
19	8.3	17	74	40	39	96	70	60	27	49	13	10
20	9.5	25	107	39	38	95	84	51	23	40	12	12
21	11	43	83	38	36	88	73	43	20	45	11	11
22	22	22	320	37	39	78	64	39	18	356	11	9.9
23	52	17	316	36	101	79	59	34	19	95	10	9.4
24	28	17	149	36	382	77	57	31	34	64	11	13
25	19	17	128	35	590	74	55	28	43	48	28	16
26	22	16	96	35	341	66	57	26	26	50	34	16
27	31	16	89	34	215	63	53	29	21	61	25	1250
28	25	15	97	34	146	66	48	108	21	42	19	1400
29	20	113	305	33	---	67	46	118	38	35	15	650
30	20	94	291	33	---	64	43	68	50	31	20	300
31	17	---	154	32	---	72	---	53	---	39	37	---
TOTAL	477.4	835	3582	1730	2484	4559	2509	1807	1115	2164	639	3994.1
MEAN	15.4	27.8	116	55.8	88.7	147	83.6	58.3	37.2	69.8	20.6	133
MAX	52	113	320	138	590	726	183	144	136	356	57	1400
MIN	7.8	14	47	32	28	63	43	26	18	21	10	9.4
MEAN†	15.4	27.8	116	55.1	88.7	147	83.6	58.3	37.2	69.8	20.6	133
CFSM†	.24	.43	1.80	.85	1.37	2.28	1.29	.90	.58	1.08	.32	2.06
IN†	.27	.49	2.07	.96	1.43	2.62	1.46	1.02	.66	1.22	.36	2.33

CAL YR 1984 TOTAL 50164.5 MEAN 137 MAX 1840 MIN 7.8 MEAN† 137 CFSM† 2.12 IN† 28.79
WTR YR 1985 TOTAL 25895.5 MEAN 70.9 MAX 1400 MIN 7.8 MEAN† 71.2 CFSM† 1.10 IN† 14.94

† Adjusted for change in contents in General Edgar Jadwin Reservoir.

LACKAWAXEN RIVER BASIN

39

01431500 LACKAWAXEN RIVER AT HAWLEY, PA

LOCATION.--Lat 41°28'34", long 75°10'21", Wayne County, Hydrologic Unit 02040103, on left bank at Church Street Bridge in Hawley, 700 ft upstream from Wallenpaupack Creek, and 3,000 ft downstream from Middle Creek.

DRAINAGE AREA.--290 mi².

PERIOD OF RECORD.--July 1908 to September 1917, August 1938 to current year. Monthly discharge only for some periods, published in WSP 1302. October 1917 to December 1919, gage heights and discharge measurements only, in reports of Water Supply Commission of Pennsylvania.

REVISED RECORDS.--WSP 1951: 1938-41. WSP 1302: 1909-17. WSP 1432: 1942. WSP 1502: 1956.

GAGE.--Nonrecording gage, water-stage recorder, and crest-stage gage. Datum of gage is 869.00 ft above National Geodetic Vertical Datum of 1929. Prior to 1938, nonrecording gage at same site and datum. Aug. 10, 1938, to Aug. 19, 1955, water-stage recorder and Aug. 20, 1955, to Feb. 13, 1956, nonrecording gage at site 1,000 ft downstream at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 5 to Feb. 22, Apr. 19-23, May 6-14, 17-21, May 31 to June 3. Records fair except for periods of estimated record, which are poor. Regulation since 1960 by Prompton Reservoir (station 01428900) and, at high flow, since 1959 by General Edgar Jadwin Reservoir (station 01429400) located 14.9 mi and 13.0 mi upstream, respectively. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--56 years, (water years 1908-17, 1938-85), 480 ft³/s, 22.50 in/yr, adjusted for storage since October 1959.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 51,900 ft³/s Aug. 19, 1955, gage height, 24.8 ft at present site, 20.6 ft at former site, from floodmark, from rating curve extended above 12,000 ft³/s on basis of slope-area measurement at gage height 24.2 ft at present site, 20.1 ft at former site; minimum daily, 8 ft³/s Sept. 8, 1909.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of March 1936 reached a stage of 19.1 ft at present site, 13.9 ft at former site, from floodmarks, discharge, 27,600 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 10,300 ft³/s Sept. 27, gage height 10.47 ft minimum daily, 32 ft³/s Oct. 17, 18.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	
1	43	79	327	740	100	699	735	212	600	146	357	196	
2	44	78	387	705	100	616	855	217	450	114	240	141	
3	46	76	352	590	100	529	672	735	370	102	167	104	
4	47	72	464	489	100	455	585	750	251	100	132	102	
5	47	102	374	380	100	531	521	520	223	91	111	94	
6	46	165	333	320	100	710	470	420	226	124	106	111	
7	46	127	282	250	100	540	435	350	194	149	96	94	
8	45	104	253	210	100	542	493	310	172	129	114	78	
9	45	93	224	170	100	650	587	270	171	111	95	76	
10	44	90	206	160	100	580	518	240	169	102	85	132	
11	42	96	210	150	100	521	465	220	152	105	77	143	
12	40	97	282	140	100	1570	431	210	153	99	72	101	
13	39	95	315	140	100	2180	391	210	139	146	83	84	
14	37	91	397	130	100	1450	370	200	129	132	93	77	
15	36	86	396	130	110	1050	374	203	121	269	138	70	
16	34	81	385	130	120	823	374	190	180	444	110	64	
17	32	80	351	130	130	716	341	180	200	321	99	71	
18	32	77	322	130	140	606	309	480	183	218	90	63	
19	33	75	294	120	140	490	310	380	167	163	84	68	
20	40	71	360	120	140	477	310	290	133	132	78	66	
21	40	90	341	120	140	439	310	170	121	117	68	57	
22	59	80	828	120	350	386	310	188	123	574	64	55	
23	203	68	1210	120	859	370	310	170	108	386	64	53	
24	134	67	760	110	1850	370	308	159	111	232	61	59	
25	104	67	611	110	2200	364	303	148	168	166	78	64	
26	98	67	465	110	1570	322	317	132	116	168	127	63	
27	106	66	416	110	1140	293	301	140	96	397	123	5400	
28	107	67	420	110	841	282	267	292	89	264	101	6840	
29	95	254	1110	110	---	282	248	571	98	176	84	3060	
30	89	393	1220	110	---	282	225	487	182	138	98	1280	
31	83	---	897	110	---	308	---	420	---	147	277	---	
TOTAL	1936	3054	14792	6574	11130	19433	12445	9464	5601	5962	3572	18866	
MEAN	62.5	102	477	212	398	627	415	305	187	192	115	629	
MAX	203	393	1220	740	2200	2180	855	750	600	574	357	6840	
MIN	32	66	206	110	100	282	225	132	89	91	61	53	
MEAN†	64.5	109	481	204	406	624	414	305	183	195	111	640	
CFSM†	.22	.38	1.66	.70	1.40	2.15	1.43	1.05	.63	.67	.38	2.21	
IN†	.25	.43	1.91	.81	1.46	2.48	1.60	1.21	.70	.77	.43	2.47	
CAL YR 1984 TOTAL	227502	MEAN	622	MAX	10300	MIN	32	MEAN†	622	CFSM†	2.14	IN†	29.13
WTR YR 1985 TOTAL	112829	MEAN	309	MAX	6840	MIN	32	MEAN†	311	CFSM†	1.07	IN†	14.56

† Adjusted for change on contents in Prompton Reservoir and General Edgar Jadwin Reservoir.

LACKAWAXEN RIVER BASIN

01432000 WALLENPAUPACK CREEK AT WILSONVILLE, PA

LOCATION.--Lat 41°27'33", long 75°11'08", at hydroelectric plant of Pennsylvania Power and Light Co., at lower end of penstock, Pike County, Hydrologic Unit 02040103, at Kimble, 3 mi east of dam at Wilsonville, 1.2 mi south of Hawley.

DRAINAGE AREA.--228 mi².

PERIOD OF RECORD.--October 1909 to current year. Monthly discharge only for some periods, published in WSP 1302.

REVISED RECORDS.--WSP 756: Drainage area. WSP 1302: 1918, 1923-24. WSP 1432: 1920-21. WSP 2102: 1966 (monthly mean).

GAGE.--Daily discharge determined from flow through turbines, computed from records of generator output and flow over roller gates, computed on basis of head on gates. Prior to Nov. 3, 1925, nonrecording gage at site 1,000 ft downstream from dam at datum 1,146.78 ft National Geodetic Vertical Datum of 1929.

REMARKS.--No estimated daily discharges in the water year. Records good. No flow over spillway or roller gates. Flow regulated since 1925, by Lake Wallenpaupack (station 01431700).

COOPERATION.--Records of generator load, operation of power plant, net operating head, water-surface elevations in lake and daily discharges furnished by Pennsylvania Power and Light Co., in connection with a Federal Power Commission project.

AVERAGE DISCHARGE.--76 years, 363 ft³/s, 21.63 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum daily discharge, 6,440 ft³/s June 30, 1973; no flow at times each year subsequent to Nov. 3, 1925.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.00	.00	.00	.00	.00	252	.00	.00	.00	.00	469	325
2	109	302	.00	.00	.00	.00	.00	.00	357	170	481	198
3	445	.00	.00	.00	.00	.00	.00	.00	828	284	.00	236
4	449	.00	.00	.00	343	.00	.00	.00	485	.00	.00	290
5	451	.00	767	.00	243	.00	.00	.00	940	290	463	295
6	.00	.00	1170	.00	.00	464	.00	.00	956	.00	469	426
7	.00	.00	.00	166	.00	458	.00	.00	940	.00	469	294
8	233	.00	.00	255	227	475	237	.00	.00	309	347	231
9	227	.00	.00	249	.00	.00	329	.00	.00	.00	385	352
10	324	.00	.00	236	.00	.00	.00	.00	471	281	.00	.00
11	593	.00	.00	224	.00	473	.00	.00	453	548	.00	.00
12	550	.00	.00	.00	.00	705	.00	.00	474	662	360	.00
13	447	.00	.00	.00	.00	735	.00	.00	.00	.00	391	.00
14	390	.00	.00	242	.00	774	.00	.00	226	.00	374	.00
15	219	.00	.00	227	.00	720	15	.00	417	.00	452	.00
16	220	.00	.00	236	.00	.00	.00	.00	497	.00	471	279
17	449	.00	.00	240	.00	.00	.00	.00	469	.00	349	357
18	455	.00	.00	239	.00	700	.00	.00	472	62	333	305
19	429	.00	.00	.00	.00	.00	.00	.00	122	.00	396	284
20	452	23	.00	220	.00	715	.00	.00	181	.00	492	353
21	388	.00	.00	1280	.00	587	.00	.00	262	.00	581	296
22	392	.00	.00	717	.00	674	.00	.00	.00	.00	467	385
23	441	.00	.00	306	.00	.00	.00	.00	.00	.00	552	863
24	448	.00	.00	260	.00	.00	99	.00	29	.00	693	354
25	453	.00	.00	237	.00	732	.00	.00	945	1170	354	396
26	873	.00	.00	.00	.00	.00	.00	.00	607	1320	572	911
27	575	.00	.00	.00	.00	.00	.00	.00	321	.00	408	960
28	580	.00	281	22	.00	.00	.00	.00	167	.00	411	1630
29	572	.00	.00	.00	---	5.0	.00	.00	381	46	419	1640
30	577	.00	.00	.00	---	.00	.00	.00	.00	515	473	1630
31	576	---	.00	.00	---	.00	---	.00	---	447	366	---
TOTAL	12317.00	325.00	2218.00	5356.00	813.00	8469.00	680.00	.00	11000.00	7816.00	11887.00	12792.00
MEAN	397	10.8	71.5	173	29.0	273	22.7	.00	367	252	383	426
MAX	873	302	1170	1280	343	774	329	.00	956	1320	863	1640
MIN	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00	.00
CAL YR 1984	TOTAL 78868.00	MEAN 489	MAX 4830	MIN .00								
WTR YR 1985	TOTAL 73673.00	MEAN 202	MAX 1640	MIN .00								

LACKAWAXEN RIVER BASIN

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LAKES AND RESERVOIRS IN LACKAWAXEN RIVER BASIN

01428900 PROMPTON RESERVOIR.--Lat 41°35'18", long 75°19'39", Wayne County, Hydrologic Unit 02040103, at dam on West Branch Lackawaxen River, 0.3 mi north of Prompton, 0.4 mi upstream from highway bridge and 0.5 mi upstream from Van Auken Creek. DRAINAGE AREA, 59.6 mi². PERIOD OF RECORD, December 1960 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

Reservoir formed by an earth and rockfill dam with ungated bedrock spillway at elevation 1,205.00 ft. Storage began July 1960. Capacity at elevation 1,205.00 ft is 51,700 acre-ft. Ordinary minimum (conservation) pool elevation, 1,125.00 ft, capacity, 3,420 acre-ft. Reservoir is used for flood control and recreation. Figures given herein represent total contents. Regulation is accomplished by discharge through an ungated tunnel. Records furnished by Corps of Engineers.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 8,170 acre-ft June 29, 1973, elevation, 1,138.40 ft; minimum (after first filling), 2,920 acre-ft Sept. 27, 1964, elevation, 1,123.20 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 4,490 acre-ft Sept. 28, elevation, 1,128.52 ft; minimum, 3,030 acre-ft Oct. 15, 16, elevation, 1,123.34 ft.

01429400 GENERAL EDGAR JADWIN RESERVOIR.--Lat 41°36'44", long 75°15'55", Wayne County, Hydrologic Unit 02040103, at dam on Dyberry Creek, 0.45 mi upstream from unnamed tributary, 2.4 mi north of Honesdale, and 2.9 mi upstream from mouth. DRAINAGE AREA, 64.5 mi². PERIOD OF RECORD, October 1959 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

Reservoir formed by an earth and rockfill dam with ungated, concrete spillway at elevation 1,053.00 ft. Storage began in October 1959. Capacity at elevation 1,053.00 ft is 24,500 acre-ft. Reservoir is used for flood control. Figures given herein represent total contents. Regulation is accomplished by discharge through an ungated tunnel. Records furnished by Corps of Engineers.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 6,520 acre-ft June 19, 1973, elevation, 1,017.40 ft; no storage many times.

EXTREMES FOR CURRENT YEAR: Maximum contents, 2,520 acre-ft Sept. 28, elevation, 1003.10 ft; no storage many times.

01431700 LAKE WALLENPAUPACK.--Lat 41°27'35", long 75°11'10", Wayne County, Hydrologic Unit 02040103, at dam on Wallenpaupack Creek, at Wilsonville, 1.2 mi south of Hawley and 1.5 mi upstream from mouth. DRAINAGE AREA, 228 mi. PERIOD OF RECORD, January 1926 to current year. GAGE, vertical staff. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Pennsylvania Power and Light Co.).

Reservoir formed by concrete gravity-type and earthfill dam, with concrete spillway at elevation 1,176.00 ft in two sections. Spillway equipped with roller gate, 14 ft high on each section. Storage began Nov. 3, 1925; water in reservoir first reached minimum pool elevation in January 1926. Total capacity at elevation 1,190.00 ft, top of gates, is 209,300 acre-ft, of which 108,900 acre-ft is controlled storage above elevation 1,170.00 ft, minimum pool (prior to 1984, minimum pool 1,160.00 ft). Reservoir is used for generation of hydroelectric power. Figures given herein represent usable contents. Records furnished by Pennsylvania Power and Light Co. Records prior to 1984 included 48,900 acre-ft more usable contents.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 129,300 acre-ft Aug. 19-21, 1955, elevation, 1,193.45 ft; minimum (after first filling), 12,280 acre-ft (old minimum pool) Mar. 28, 1958, elevation, 1,162.60 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 94,450 acre-ft June 1, 2 elevation, 1,187.5 ft; minimum, 23,820 acre-ft Nov. 4, Dec. 6-8, 10, elevation, 1,174.6 ft.

LACKAWAXEN RIVER BASIN

LAKES AND RESERVOIRS IN LACKAWAXEN RIVER BASIN--Continued

MONTHEND ELEVATION AND CONTENTS AT 2400, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

Date	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)
<u>01428900 Prompton Reservoir</u>				<u>01429400 General Edgar Jadwin Reservoir</u>		
Sept. 30	1123.43	3060	--	976.01	0	0
Oct. 31	1123.85	3180	+ 2.0	976.00	0	0
Nov. 30	1125.28	3580	+ 6.7	975.99	0	0
Dec. 31	1126.20	3840	+ 4.2	979.77	+ 43	+ 0.7
CAL YR 1984	--	--	+ 0.2	--	--	+ 0.1
Jan. 31	1124.53	3370	- 7.6	976.37	0	- 0.7
Feb. 28	1126.20	3840	+ 8.5	Not obtained	--	--
Mar. 31	1125.45	3630	- 3.4	977.57	0	--
Apr. 30	1125.21	3560	- 1.2	976.60	0	0
May 31	1125.17	3550	- 0.2	976.68	0	0
June 30	1124.24	3290	- 4.4	976.25	0	0
July 31	1124.94	3480	+ 3.1	976.35	0	0
Aug. 31	1124.14	3260	- 3.6	975.91	0	0
Sept. 30	1126.80	3920	+ 11.1	978.85	+ 17	+ 0.3
WTR YR 1985	--	--	+ 1.2	--	--	+ 0.3
<u>01431700 Lake Wallenpaupack</u>						
Sept. 30	1178.9	46220	--			
Oct. 31	1174.8	24860	- 347			
Nov. 30	1175.1	26430	+ 26.4			
Dec. 31	1176.1	31730	+ 86.2			
CAL YR 1984	--	--	- 39.5			
Jan. 31	1175.7	29610	- 34.5			
Feb. 28	1178.4	44060	+ 260			
Mar. 31	1179.4	49460	+ 87.8			
Apr. 30	1182.8	68000	+ 311			
May 31	1187.2	92740	+ 402			
June 30	1185.8	84780	- 134			
July 31	1184.6	77060	- 125			
Aug. 31	1181.0	58100	- 308			
Sept. 30	1182.8	68000	+ 166			
WTR YR 1985	--	--	+ 30.1			

DELAWARE RIVER BASIN

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01432160 DELAWARE RIVER AT BARRYVILLE, NY

LOCATION.--Lat 41°28'31", long 74°54'46", Pike County, Pa., Hydrologic Unit 02040104, at Shohola-Barryville Bridge at Barryville, just upstream from Halfway Brook, and 1,000 ft upstream from Shohola Brook.

DRAINAGE AREA.--2,659 mi².

PERIOD OF RECORD.--Water years 1958, 1968 to current year.

CHEMICAL DATA: 1958 (d), 1969 (a), 1973 (b), 1974 (d), 1975 (b).

NUTRIENT DATA: 1973 (b), 1974 (d), 1975 (b).

BIOLOGICAL DATA:

Bacteria.--1973 (b), 1974 (d), 1975 (b).

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: October 1967 to September 1973, March 1975 to current year.

INSTRUMENTATION.--Water-temperature digital recorder since March 1975, provides one-hour-interval punches. Prior to September 1973, water-temperature recorder provided continuous recordings.

REMARKS.--Unpublished records of daily temperatures for May to September 1964-66 are available in files of the Geological Survey. Temperature probe may be influenced by solar radiation during periods of low flow. Records are not published for June 15, 20-23, 27-29, July 2-6, 12, and Aug. 5-25, 27-28, when probe was known to have less than 4 inches of water cover.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1968-73, 1976-78, 1980-82), 32.0°C July 20, 21, 1980; minimum, 0.0°C on many days during winter periods.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Maximum recorded, 30.5°C July 20, 21, but may have been higher during periods when records were not published; minimum, 0.0°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	13.5	12.0	12.5	13.5	12.0	13.0	5.0	5.0	5.0	3.5	3.5	3.5
2	13.5	8.5	11.5	13.0	8.5	11.5	5.0	4.5	4.5	4.0	3.5	4.0
3	15.0	6.0	10.5	10.5	8.5	9.5	4.0	3.5	4.0	3.5	2.0	3.0
4	13.0	11.5	12.5	9.0	8.0	8.5	3.5	2.5	3.0	2.0	1.0	1.5
5	16.5	11.0	12.5	10.0	9.0	9.5	3.0	2.0	2.0	1.0	.0	.5
6	11.5	10.0	11.0	10.0	8.5	9.5	3.5	2.5	3.0	.0	.0	.0
7	11.5	9.0	10.5	8.5	7.0	7.5	3.0	.5	1.0	1.0	.0	.5
8	12.5	10.5	11.5	7.0	5.5	6.5	.5	.0	.0	1.0	.0	.5
9	15.0	12.0	13.0	7.0	6.0	6.5	.5	.0	.5	.0	.0	.0
10	16.0	13.5	14.5	8.5	7.0	7.5	1.0	.5	.5	.0	.0	.0
11	16.0	14.0	15.0	9.0	7.5	8.5	2.0	1.0	1.5	.0	.0	.0
12	17.0	13.5	15.0	9.0	7.5	8.5	2.5	1.5	2.0	.5	.0	.0
13	16.0	14.0	15.0	7.5	5.0	6.5	4.0	2.5	3.0	.5	.0	.0
14	15.0	13.0	14.0	5.0	4.0	4.5	4.0	3.5	4.0	.5	.0	.0
15	14.0	12.0	13.0	4.0	3.5	3.5	4.0	3.5	3.5	.5	.0	.0
16	13.5	11.0	12.5	5.0	3.5	4.0	4.0	3.5	3.5	.5	.0	.0
17	14.0	11.5	13.0	4.0	3.0	3.5	5.0	4.0	4.5	.5	.0	.0
18	15.0	13.5	14.0	3.5	2.5	3.0	5.5	5.0	5.0	.5	.5	.5
19	15.0	14.0	14.5	3.5	2.5	3.0	5.0	4.0	4.0	.5	.0	.0
20	16.5	14.5	15.5	2.5	1.0	1.5	3.5	3.0	3.5	.0	.0	.0
21	15.0	14.0	14.5	1.0	.0	.5	3.0	1.5	2.0	.0	.0	.0
22	16.0	15.0	15.5	1.5	.5	1.0	2.5	1.5	2.0	.0	.0	.0
23	15.0	14.0	14.5	1.5	.5	1.0	2.0	1.5	2.0	.5	.0	.0
24	14.0	12.5	13.5	2.0	1.0	1.5	2.0	1.0	1.5	.5	.0	.0
25	15.0	12.0	13.0	2.5	1.5	2.0	2.0	1.0	2.0	.5	.0	.0
26	14.0	12.0	13.5	3.0	1.5	2.5	.5	.0	.0	.0	.0	.0
27	16.5	14.0	15.0	3.5	2.5	3.0	.0	.0	.0	.5	.0	.0
28	18.0	15.0	16.0	7.0	3.5	5.0	1.0	.0	.0	.5	.0	.0
29	16.5	15.0	16.0	7.5	6.0	6.5	4.5	1.0	2.5	.5	.0	.0
30	17.0	12.5	14.5	6.0	5.0	5.5	4.5	4.0	4.0	.5	.0	.5
31	16.0	13.0	14.0	---	---	---	4.0	3.5	3.5	.0	.0	.0
MONTH	18.0	6.0	13.5	13.5	.0	5.5	5.5	.0	2.5	4.0	.0	.5

DELAWARE RIVER BASIN

01432160 DELAWARE RIVER AT BARRYVILLE, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.5	.0	.0	3.0	.0	1.5	7.5	7.0	7.5	18.5	15.5	17.0
2	.5	.5	.5	4.0	2.0	3.0	7.0	5.5	6.0	17.0	14.0	15.5
3	.5	.0	.0	3.5	2.0	3.0	5.5	4.5	5.0	14.0	12.5	13.0
4	.0	.0	.0	2.5	.0	1.0	6.5	3.5	5.0	14.0	11.0	12.5
5	.0	.0	.0	2.5	.0	1.0	10.5	6.0	8.0	14.5	13.0	13.5
6	.5	.0	.5	2.5	.5	1.5	11.5	9.5	10.5	14.5	14.0	14.5
7	.5	.0	.5	2.5	.0	1.0	10.5	9.5	10.0	16.0	14.0	15.0
8	.5	.0	.5	3.0	2.0	2.5	9.5	7.5	8.5	15.5	13.0	14.5
9	.5	.5	.5	4.0	2.0	3.0	7.5	6.0	7.0	16.0	12.5	14.0
10	.5	.5	.5	5.0	2.5	3.5	7.5	4.5	6.0	19.0	14.5	17.0
11	.5	.0	.0	5.0	3.0	4.0	7.0	5.5	6.5	21.5	17.0	19.0
12	.0	.0	.0	5.5	4.0	5.0	9.0	5.5	7.5	23.0	19.5	20.5
13	.0	.0	.0	4.5	3.5	4.0	11.0	8.0	9.5	25.5	20.5	23.0
14	.5	.0	.0	4.5	4.0	4.5	10.5	9.5	10.0	25.5	20.0	23.0
15	.5	.0	.5	4.5	3.5	4.0	11.0	10.0	10.5	24.0	19.0	21.5
16	.5	.0	.5	4.0	2.5	3.5	13.0	10.5	11.5	19.0	17.5	18.0
17	.5	.0	.5	4.5	3.5	4.0	12.0	10.0	11.0	21.0	17.0	18.5
18	.5	.0	.0	4.0	2.5	3.0	13.0	9.5	11.5	19.5	17.0	18.0
19	.5	.0	.5	4.0	1.5	2.5	13.5	12.0	13.0	17.5	16.0	16.5
20	.5	.0	.0	5.5	3.0	4.0	16.0	13.0	14.5	19.0	15.0	17.0
21	.5	.0	.0	5.0	3.0	4.0	17.5	14.0	15.5	20.5	17.5	19.0
22	.5	.0	.5	5.5	2.5	4.0	19.0	16.0	17.5	21.0	18.0	19.5
23	.5	.0	.5	6.0	4.0	5.0	20.0	17.5	18.5	20.0	18.0	18.5
24	.5	.0	.0	6.0	5.5	5.5	18.5	15.0	16.5	22.5	17.0	19.5
25	1.0	.0	.5	6.5	4.5	5.5	15.0	14.0	14.5	23.5	17.5	20.5
26	1.0	.0	.5	6.0	3.5	5.0	16.0	13.5	14.5	24.5	18.5	21.0
27	2.0	1.0	1.5	8.0	4.5	6.5	17.0	14.5	15.5	27.0	19.5	23.0
28	2.0	.0	1.0	10.0	8.5	9.0	15.5	13.5	14.5	22.0	20.0	21.5
29	---	---	---	13.0	10.0	11.5	16.0	12.0	14.0	20.5	18.5	19.5
30	---	---	---	12.0	11.0	11.5	18.0	13.0	15.5	20.0	18.0	19.0
31	---	---	---	11.0	7.5	9.5	---	---	---	19.5	18.5	19.0
MONTH	2.0	.0	.5	13.0	.0	4.5	20.0	3.5	11.0	27.0	11.0	18.0

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	21.0	18.5	19.5	24.5	19.5	21.5	24.0	19.5	21.5	21.5	17.5	19.5
2	21.0	18.0	19.5	---	---	---	23.0	20.5	22.0	23.5	18.5	20.5
3	21.0	19.5	20.5	---	---	---	25.5	20.5	23.0	27.5	18.5	22.0
4	22.0	18.5	20.5	---	---	---	27.0	21.0	23.5	26.5	20.0	23.5
5	22.0	16.5	18.5	---	---	---	---	---	---	27.5	22.0	24.0
6	20.0	16.0	17.5	---	---	---	---	---	---	28.0	22.5	24.5
7	20.5	16.0	18.0	26.5	23.0	25.0	---	---	---	29.0	22.0	24.5
8	20.5	17.0	18.0	23.5	21.5	22.5	---	---	---	27.0	23.5	25.0
9	22.0	18.0	19.5	26.0	21.0	23.0	---	---	---	25.0	22.0	23.5
10	24.5	19.0	21.0	26.0	21.5	23.5	---	---	---	24.0	22.5	23.5
11	23.5	17.5	20.0	27.0	20.0	23.5	---	---	---	23.0	21.0	22.0
12	21.5	18.0	20.0	---	---	---	---	---	---	21.0	18.5	19.5
13	17.5	14.5	16.5	26.0	20.5	23.5	---	---	---	19.0	16.0	17.5
14	20.0	13.5	16.5	25.0	23.0	24.0	---	---	---	20.5	15.0	17.0
15	---	---	---	24.0	22.5	23.5	---	---	---	21.0	13.5	16.5
16	23.5	17.0	19.5	25.5	22.5	24.0	---	---	---	22.5	14.0	17.0
17	22.5	17.0	19.5	25.0	22.0	24.0	---	---	---	23.0	15.0	18.0
18	23.5	18.5	20.5	26.5	23.0	25.0	---	---	---	24.0	15.5	18.0
19	24.5	17.5	21.0	29.0	23.5	26.5	---	---	---	25.0	16.0	19.0
20	---	---	---	30.5	24.0	26.5	---	---	---	23.0	17.0	20.0
21	---	---	---	30.5	23.0	27.0	---	---	---	23.5	17.5	20.5
22	---	---	---	26.0	23.5	25.0	---	---	---	22.0	19.0	20.5
23	---	---	---	23.5	21.5	22.5	---	---	---	23.5	19.0	20.5
24	26.5	24.0	25.5	23.5	21.0	22.5	---	---	---	21.5	19.0	20.0
25	25.5	18.5	21.0	25.0	20.5	22.5	---	---	---	21.5	14.5	18.0
26	21.5	18.0	19.5	22.5	21.0	22.0	24.5	20.5	22.0	19.5	15.0	17.5
27	---	---	---	26.5	21.0	24.0	---	---	---	18.0	16.0	17.5
28	---	---	---	26.5	22.5	24.5	---	---	---	16.0	16.0	16.0
29	---	---	---	27.5	23.0	24.5	22.5	19.5	21.0	16.5	15.0	16.0
30	23.0	18.5	20.5	28.5	21.5	24.0	22.0	19.0	20.0	17.0	15.5	16.5
31	---	---	---	22.5	20.0	21.0	20.0	18.0	19.5	---	---	---
MONTH	26.5	13.5	19.5	30.5	19.5	24.0	27.0	18.0	21.5	29.0	13.5	20.0

DELAWARE RIVER BASIN

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01432805 DELAWARE RIVER AT POND EDDY, NY

LOCATION.--Lat 41°26'20", long 74°49'11", Pike County, Pa., Hydrologic Unit 02040104, at interstate bridge at Pond Eddy, 450 ft downstream from Mill Brook, and 4.5 mi upstream from Mongaup River.

DRAINAGE AREA.--2,820 mi².

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: October 1973 to current year.

INSTRUMENTATION.--Water-temperature digital recorder since October 1973, provides one-hour-interval punches.

REMARKS.--Temperature probe may be influenced by solar radiation during periods of low flow. Interruptions of record were due to malfunctions of recording instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1976, 1978, 1980-81, 1983-84) 31.0°C July 21, 1980; minimum (water years 1974, 1977-78, 1980, 1983-85), 0.0°C on many days during winter periods, except 1978, 1980, and 1985.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Minimum, 0.5°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	---	---	---	14.5	13.5	14.0	---	---	---	4.0	4.0	4.0
2	---	---	---	14.0	12.0	13.0	---	---	---	4.5	4.0	4.0
3	---	---	---	11.5	9.5	11.0	---	---	---	4.0	3.0	3.5
4	---	---	---	10.0	9.5	9.5	---	---	---	2.5	1.5	2.0
5	---	---	---	11.0	9.5	10.0	---	---	---	1.5	.5	1.0
6	---	---	---	10.5	9.5	10.0	---	---	---	.5	.5	.5
7	---	---	---	9.5	8.0	9.0	---	---	---	.5	.5	.5
8	---	---	---	8.0	7.0	7.5	---	---	---	1.5	.5	.5
9	---	---	---	7.5	7.0	7.5	---	---	---	.5	.5	.5
10	---	---	---	9.0	7.5	8.0	---	---	---	.5	.5	.5
11	---	---	---	9.5	8.5	9.0	---	---	---	.5	.5	.5
12	---	---	---	9.5	8.5	9.0	---	---	---	.5	.5	.5
13	---	---	---	8.5	7.0	8.0	---	---	---	.5	.5	.5
14	---	---	---	6.5	5.5	6.0	---	---	---	.5	.5	.5
15	---	---	---	5.5	5.0	5.0	---	---	---	.5	.5	.5
16	---	---	---	5.5	5.0	5.0	---	---	---	.5	.5	.5
17	13.5	12.0	12.5	5.0	4.0	4.5	---	---	---	.5	.5	.5
18	15.0	13.0	14.0	4.5	4.0	4.5	---	---	---	.5	.5	.5
19	15.0	14.0	14.5	4.5	4.0	4.5	5.5	4.5	5.0	.5	.5	.5
20	16.5	14.5	15.5	4.0	2.5	3.5	4.5	4.0	4.0	.5	.5	.5
21	15.5	15.0	15.0	2.5	2.0	2.5	3.5	2.5	3.0	.5	.5	.5
22	16.0	15.0	15.5	2.5	2.0	2.5	3.0	2.0	2.5	.5	.5	.5
23	16.0	15.0	15.5	2.5	2.5	2.5	2.5	2.0	2.0	.5	.5	.5
24	14.5	13.5	14.5	2.5	2.5	2.5	2.5	1.5	2.0	.5	.5	.5
25	14.5	13.0	13.5	3.0	2.5	3.0	2.5	1.5	2.0	.5	.5	.5
26	14.5	13.5	14.0	3.5	3.0	3.5	1.5	.5	1.0	.5	.5	.5
27	16.0	14.5	15.0	---	---	---	.5	.5	.5	.5	.5	.5
28	18.0	15.5	16.5	---	---	---	1.0	.5	.5	.5	.5	.5
29	17.5	16.5	17.0	---	---	---	4.5	.5	2.0	.5	.5	.5
30	16.5	15.0	15.5	---	---	---	4.5	3.5	4.0	.5	.5	.5
31	15.0	14.5	14.5	---	---	---	4.5	4.0	4.5	.5	.5	.5
MONTH	18.0	12.0	15.0	14.5	2.0	6.5	5.5	.5	2.5	4.5	.5	1.0

DELAWARE RIVER BASIN

01432805 DELAWARE RIVER AT POND EDDY, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.5	.5	.5	---	---	---	8.0	7.5	7.5	---	---	---
2	.5	.5	.5	---	---	---	7.5	6.0	6.5	---	---	---
3	.5	.5	.5	---	---	---	6.0	4.5	5.0	---	---	---
4	.5	.5	.5	---	---	---	6.0	4.0	5.0	---	---	---
5	.5	.5	.5	---	---	---	9.5	6.0	7.5	---	---	---
6	.5	.5	.5	---	---	---	11.0	10.0	10.5	---	---	---
7	.5	.5	.5	---	---	---	10.5	9.5	10.0	---	---	---
8	.5	.5	.5	---	---	---	10.0	8.5	9.0	---	---	---
9	.5	.5	.5	---	---	---	8.0	6.5	7.5	16.0	13.0	14.5
10	.5	.5	.5	---	---	---	7.0	5.0	6.0	19.0	14.5	16.5
11	.5	.5	.5	---	---	---	7.0	6.0	6.5	20.0	17.0	18.5
12	.5	.5	.5	---	---	---	8.5	6.0	7.5	22.0	19.0	20.0
13	---	---	---	---	---	---	10.5	8.5	9.5	24.0	20.5	22.0
14	---	---	---	---	---	---	10.0	10.0	10.0	24.5	21.0	22.5
15	---	---	---	---	---	---	11.0	10.0	10.5	23.0	20.0	21.5
16	---	---	---	---	---	---	12.5	11.0	11.5	20.5	18.5	19.5
17	---	---	---	---	---	---	12.5	10.5	11.5	20.0	18.0	19.0
18	---	---	---	---	---	---	13.0	10.5	11.5	19.5	17.5	18.5
19	---	---	---	---	---	---	14.0	12.0	13.0	17.5	16.5	17.0
20	---	---	---	---	---	---	15.5	13.0	14.0	---	---	---
21	---	---	---	---	---	---	---	---	---	---	---	---
22	---	---	---	---	---	---	---	---	---	---	---	---
23	---	---	---	---	---	---	---	---	---	---	---	---
24	---	---	---	---	---	---	---	---	---	---	---	---
25	---	---	---	---	---	---	---	---	---	---	---	---
26	---	---	---	---	---	---	---	---	---	---	---	---
27	---	---	---	---	---	---	---	---	---	---	---	---
28	---	---	---	---	---	---	---	---	---	---	---	---
29	---	---	---	12.5	9.5	11.0	---	---	---	---	---	---
30	---	---	---	12.5	11.0	11.5	---	---	---	---	---	---
31	---	---	---	11.0	8.0	9.5	---	---	---	---	---	---
MONTH	.5	.5	.5	12.5	8.0	10.5	15.5	4.0	9.0	24.5	13.0	19.0
DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	---	---	---	---	---	---	24.0	20.0	22.0	---	---	---
2	---	---	---	---	---	---	23.5	20.5	22.0	---	---	---
3	---	---	---	---	---	---	25.0	21.0	22.5	---	---	---
4	---	---	---	---	---	---	26.0	21.5	23.5	---	---	---
5	---	---	---	---	---	---	26.5	22.0	23.5	---	---	---
6	---	---	---	---	---	---	26.5	22.5	24.0	---	---	---
7	---	---	---	---	---	---	25.0	22.5	23.5	---	---	---
8	---	---	---	---	---	---	25.5	23.0	24.0	---	---	---
9	---	---	---	---	---	---	26.5	24.0	25.0	---	---	---
10	---	---	---	---	---	---	26.5	23.0	24.5	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	---	---	---	---	---	---	---	---	---
13	---	---	---	---	---	---	---	---	---	---	---	---
14	---	---	---	---	---	---	---	---	---	---	---	---
15	---	---	---	---	---	---	---	---	---	---	---	---
16	---	---	---	---	---	---	---	---	---	---	---	---
17	---	---	---	---	---	---	---	---	---	---	---	---
18	---	---	---	---	---	---	---	---	---	---	---	---
19	---	---	---	---	---	---	---	---	---	---	---	---
20	23.5	20.0	21.5	---	---	---	---	---	---	---	---	---
21	23.5	20.0	21.0	---	---	---	---	---	---	---	---	---
22	---	---	---	---	---	---	---	---	---	---	---	---
23	---	---	---	---	---	---	---	---	---	---	---	---
24	---	---	---	---	---	---	---	---	---	---	---	---
25	---	---	---	---	---	---	---	---	---	---	---	---
26	---	---	---	---	---	---	---	---	---	19.5	18.0	18.5
27	---	---	---	---	---	---	---	---	---	18.5	16.5	17.5
28	---	---	---	---	---	---	---	---	---	16.5	16.0	16.0
29	---	---	---	---	---	---	---	---	---	16.0	15.5	16.0
30	---	---	---	---	---	---	---	---	---	16.5	15.5	16.0
31	---	---	---	---	---	---	---	---	---	---	---	---
MONTH	23.5	20.0	21.5	---	---	---	26.5	20.0	23.5	19.5	15.5	17.0

01434000 DELAWARE RIVER AT PORT JERVIS, NY

LOCATION.--Lat 41°22'14", long 74°41'52", Pike County, Pa., Hydrologic Unit 02040104, on right bank 250 ft downstream from bridge (on U.S. Highways 6 and 209) between Port Jervis, N.Y. and Matamoras, Pa., 1.2 mi upstream from Neversink River, and 6.5 mi downstream from Mongaup River. Water-quality sampling site at discharge station.

DRAINAGE AREA.--3,070 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1904 to current year.

REVISED RECORDS.--WSP 1031: 1905-36. WDR NY-71-1: 1970. WDR NY-82-1: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 415.35 ft above National Geodetic Vertical Datum of 1929. October 1904 to August 13, 1928, nonrecording gage at bridge 250 ft upstream at present datum; operated by U.S. Weather Bureau prior to June 20, 1914.

REMARKS.--Estimated daily discharges: Jan. 9 to Feb. 20. Records good except those for estimated daily discharges, which are fair. Flow regulated by Lake Wallenpaupack and by Toronto, Cliff Lake, and Swinging Bridge Reservoirs (see Reservoirs in Delaware River Basin) and smaller reservoirs. Large diurnal fluctuations at medium and low flows caused by powerplants on tributary streams. Subsequent to September 1954, entire flow from 371 mi² of drainage area controlled by Pepacton Reservoir, and subsequent to October 1963, entire flow from 454 mi² of drainage area controlled by Cannonsville Reservoir (see Reservoirs in Delaware River Basin). Part of flow from these reservoirs diverted for New York City municipal supply. Remainder of flow (except for conservation releases and spill) impounded for release during periods of low flow in the lower Delaware River basin, as directed by the Delaware River Master. Gage-height telemeter at station.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 233,000 ft³/s Aug. 19, 1955, gage height, 23.91 ft, from floodmarks in gage house, from rating curve extended above 89,000 ft³/s on basis of slope-area measurement of peak flow; maximum gage height, 26.6 ft Feb. 12, 1981 (ice jam), from floodmarks; minimum observed discharge, 175 ft³/s Sept. 23, 1908, gage height, 0.6 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--The U.S. Weather Bureau reported a discharge of 205,000 ft³/s Oct. 10, 1903, gage height, 23.1 ft, from rating curve extended above 70,000 ft³/s by velocity-area studies; stage on Mar. 8, 1904 was 25.5 ft, ice jam.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 67,700 ft³/s Sept. 28, gage height, 12.61 ft; minimum, 555 ft³/s Aug. 23, gage height, 1.50 ft; minimum daily, 853 ft³/s Sept. 16.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1580	1920	4660	4950	1430	5180	3120	1770	2480	1520	1990	1490
2	1190	1070	3990	4620	1290	4300	4420	1780	3170	1230	2460	1400
3	912	1900	3680	4450	1090	3680	4350	3450	3340	1280	1990	1130
4	1940	1590	3790	3900	1360	3310	4000	4630	2780	1220	1250	1030
5	1660	1710	3820	3490	1760	3030	3780	3520	2790	1180	1130	1070
6	1640	1810	4600	3030	1590	4030	3580	2940	3040	1340	1700	1090
7	1730	1900	3220	3140	1340	3810	3370	2870	2830	1380	1750	1110
8	1530	1940	2310	3230	1270	3680	3940	2820	2500	1930	1660	1130
9	1540	1800	2070	2440	1620	3710	4500	2500	1490	1580	1660	1320
10	1600	1730	2180	1660	1550	3440	3930	2190	1590	1360	1610	3420
11	1650	1690	2140	1670	1650	3720	3490	1890	1960	1470	1270	2900
12	1660	1680	2250	2030	1900	7330	3310	1740	1860	1540	1190	1910
13	1710	1860	2450	1840	2110	16300	2960	1670	1680	1930	1370	1350
14	1790	1610	2740	2190	2530	11900	2660	1660	1380	2360	1390	1060
15	1800	1760	3190	2200	2510	9220	2700	1460	1340	2040	1420	874
16	1980	1540	3160	1920	2330	6980	2700	1290	1610	2610	1560	853
17	1800	1560	2990	1860	1920	5590	2600	1220	1910	2870	1400	1310
18	1960	1680	2910	1590	1510	5420	2480	1650	1660	2120	1100	1310
19	2000	1730	2720	1540	1390	4690	2310	2930	1530	1750	1130	1250
20	1720	1870	2970	1340	1480	4070	2420	2900	1240	1260	1230	1180
21	1860	1620	3420	1700	1400	4320	2530	2320	1150	1050	1240	1160
22	1720	1710	3720	3300	1340	4060	2410	1920	1150	2450	1220	1060
23	2040	1660	6640	1890	1750	3640	2310	1670	950	3040	1160	1150
24	2220	1620	5600	2070	4200	3170	2260	1530	1300	2460	1310	1200
25	1670	1610	4490	1970	9070	3340	2330	1380	1780	2230	1030	1170
26	1620	1710	3800	2330	10700	3160	2310	1260	1690	3330	1520	1210
27	1730	1640	3340	1890	7740	2510	2220	1210	1670	2170	1600	16900
28	1640	1680	3370	1610	6060	2420	1970	1530	1410	1600	1310	48100
29	1710	2200	4310	1810	---	2430	1840	3600	1430	1430	1200	18600
30	1630	6500	6280	1520	---	2470	1810	3530	1650	1330	1170	11200
31	1480	---	6040	1470	---	2340	---	2720	---	1610	1340	---
TOTAL	52712	56300	112850	74650	75890	147250	88610	69550	56360	56670	44360	129937
MEAN	1700	1877	3640	2408	2710	4750	2954	2244	1879	1828	1431	4331
MAX	2220	6500	6640	4950	10700	16300	4500	4630	3340	3330	2460	48100
MIN	912	1070	2070	1340	1090	2340	1810	1210	950	1050	1030	853
CAL YR 1984	TOTAL	1957462	MEAN	5348	MAX	75300	MIN	912				
WTR YR 1985	TOTAL	965139	MEAN	2644	MAX	48100	MIN	853				

DELAWARE RIVER BASIN

01434000 DELAWARE RIVER AT PORT JERVIS, NY--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1957-60, 1964 to current year.

CHEMICAL DATA: 1958-59 (e), 1964-65 (c), 1966 (a), 1967-68 (c), 1969-76 (d).

MINOR ELEMENTS DATA: 1970 (a), 1972-73 (a), 1974-76 (c).

PESTICIDE DATA: 1974 (a).

ORGANIC DATA: OC--1974 (b), 1975 (d).

NUTRIENT DATA: 1968 (a), 1969-76 (d).

BIOLOGICAL DATA:

Bacteria--1973-76 (d).

Phytoplankton--1974 (b), 1975-76 (c).

Periphyton--1976 (a).

SEDIMENT DATA: 1959 (c), 1976 (c).

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: January 1973 to September 1973.

WATER TEMPERATURES: February 1957 to September 1960, January 1973 to September 1973, June 1974 to current year.

SUSPENDED--SEDIMENT DISCHARGE: February 1957 to September 1960, March 1970 to June 1976.

INSTRUMENTATION.--Water-temperature digital recorder since January 1973, provides one-hour-interval punches.

REMARKS.--Interruptions of record were due to malfunctions of recording instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum (water years 1957-59, 1973-81, 1983-84), 30.0°C July 13, 1981; minimum (water years 1958-60, 1973, 1975-85), 0.0°C on many days during winter periods, except 1984.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURES: Minimum, 0.0°C on many days during winter period.

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	---	---	---	13.5	13.0	13.0	5.0	5.0	5.0	---	---	---
2	---	---	---	13.5	10.5	12.0	4.5	4.0	4.5	---	---	---
3	---	---	---	10.5	9.0	10.0	4.0	3.5	4.0	---	---	---
4	---	---	---	9.5	8.5	9.5	3.5	2.5	3.0	---	---	---
5	13.0	12.0	12.5	10.5	9.5	10.0	2.5	1.0	2.0	---	---	---
6	12.5	11.5	12.0	10.0	8.5	9.5	2.5	1.5	2.0	---	---	---
7	12.5	11.0	11.5	8.5	7.0	8.0	2.0	.0	1.0	---	---	---
8	13.0	11.5	12.0	7.0	6.5	7.0	.5	.0	.0	---	---	---
9	14.5	13.0	13.5	7.0	6.0	7.0	.5	.0	.5	---	---	---
10	15.5	14.0	14.5	8.0	7.0	7.5	1.0	.0	.5	---	---	---
11	16.0	14.5	15.5	8.5	7.5	8.0	2.0	1.5	1.5	.0	.0	.0
12	16.0	14.5	15.5	8.5	7.0	8.0	2.0	1.5	2.0	.5	.0	.0
13	16.0	14.5	15.0	7.0	5.0	6.5	3.5	2.0	2.5	.0	.0	.0
14	15.0	14.0	14.5	5.0	4.5	4.5	4.0	3.5	3.5	.0	.0	.0
15	14.5	13.0	14.0	5.0	4.0	4.5	4.0	4.0	4.0	.0	.0	.0
16	14.0	12.5	13.5	5.0	4.5	5.0	4.5	4.0	4.5	.0	.0	.0
17	14.0	12.5	13.5	4.5	3.5	4.0	5.0	4.5	5.0	.0	.0	.0
18	15.0	13.5	14.0	4.0	3.0	3.5	4.5	4.0	4.0	.0	.0	.0
19	15.0	14.5	15.0	3.5	3.0	3.5	4.0	3.0	3.5	.0	.0	.0
20	16.0	15.0	15.0	3.0	2.0	2.5	3.0	2.0	2.5	.5	.0	.0
21	15.5	15.0	15.5	2.0	1.0	1.5	---	---	---	.5	.5	.5
22	16.0	15.5	16.0	1.5	.5	1.0	---	---	---	.5	.0	.0
23	15.5	14.5	15.0	1.5	.5	1.0	---	---	---	.5	.0	.0
24	14.5	13.5	14.0	1.5	1.0	1.0	---	---	---	.0	.0	.0
25	14.0	13.0	13.5	2.0	1.0	1.5	---	---	---	.0	.0	.0
26	14.0	13.5	14.0	2.5	1.5	2.0	---	---	---	.0	.0	.0
27	15.5	14.0	15.0	3.0	2.0	2.5	---	---	---	.0	.0	.0
28	17.0	15.5	16.5	6.0	3.0	4.0	---	---	---	.5	.0	.0
29	16.5	15.0	16.5	6.5	5.5	6.0	---	---	---	.0	.0	.0
30	15.5	14.5	15.0	5.5	5.0	5.5	---	---	---	.0	.0	.0
31	15.0	13.5	14.5	---	---	---	---	---	---	.0	.0	.0
MONTH	17.0	11.0	14.5	13.5	.5	5.5	5.0	.0	3.0	.5	.0	.0

DELAWARE RIVER BASIN

49

01434000 DELAWARE RIVER AT PORT JERVIS, NY--Continued

TEMPERATURE (DEG. C) OF WATER, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	FEBRUARY			MARCH			APRIL			MAY		
1	.0	.0	.0	2.0	1.0	1.5	8.5	7.0	7.5	18.0	15.5	17.0
2	.0	.0	.0	3.5	2.0	3.0	7.0	6.0	6.5	17.0	15.0	16.0
3	.0	.0	.0	3.5	2.5	3.0	6.0	5.0	5.5	15.0	12.0	13.0
4	.0	.0	.0	2.5	1.0	1.5	7.0	4.5	5.5	15.0	11.5	13.0
5	.0	.0	.0	2.5	1.0	1.5	10.0	6.0	7.5	15.5	12.5	14.0
6	.0	.0	.0	2.0	1.0	1.5	11.5	8.5	10.0	16.0	13.5	14.5
7	.0	.0	.0	2.0	1.0	1.5	11.0	9.5	10.0	16.5	14.0	15.0
8	.0	.0	.0	3.5	1.5	2.0	10.5	8.5	9.5	16.5	13.5	15.0
9	.0	.0	.0	4.5	2.0	3.0	9.0	7.0	7.5	16.5	12.5	14.5
10	.0	.0	.0	4.5	2.5	3.5	8.0	6.0	7.0	18.5	13.5	16.5
11	.0	.0	.0	5.0	3.0	4.0	8.0	6.5	7.0	20.5	16.5	18.5
12	.0	.0	.0	6.0	4.0	5.0	10.0	6.0	7.5	21.5	18.5	20.0
13	.0	.0	.0	4.5	3.5	4.0	11.5	8.0	9.5	23.5	20.0	22.0
14	.0	.0	.0	4.5	4.0	4.0	11.0	9.0	10.0	24.0	20.5	22.0
15	.0	.0	.0	4.5	3.5	4.0	11.5	9.5	10.5	22.5	20.0	21.5
16	.0	.0	.0	4.5	3.0	3.5	13.5	10.5	11.5	21.0	18.5	20.0
17	.0	.0	.0	5.0	3.5	4.0	13.0	10.0	11.5	20.0	18.0	19.0
18	.0	.0	.0	4.0	2.5	3.5	13.5	9.5	11.5	19.5	17.0	18.5
19	.5	.0	.0	4.0	2.5	3.0	14.5	11.0	13.0	18.5	16.5	17.5
20	.5	.0	.0	5.5	3.5	4.0	15.5	12.5	14.0	19.5	15.5	17.5
21	.5	.0	.5	5.5	4.0	4.5	18.0	14.0	16.0	20.5	17.0	19.0
22	.5	.0	.5	5.5	4.0	4.5	20.0	15.5	18.0	21.5	17.5	20.0
23	1.0	.5	.5	6.0	4.5	5.0	19.0	16.5	18.0	20.5	18.0	19.0
24	1.0	.0	.5	6.0	5.0	5.5	17.5	15.5	16.0	21.5	17.5	19.5
25	.5	.0	.0	6.5	4.5	5.5	16.0	14.0	15.0	22.0	18.5	20.5
26	.5	.0	.0	7.0	4.5	5.5	17.0	13.5	15.5	22.5	20.0	21.5
27	2.0	.5	1.5	8.0	4.5	6.5	17.5	14.5	16.0	---	---	---
28	1.5	.5	1.0	10.5	6.5	8.5	16.5	14.5	15.5	---	---	---
29	---	---	---	12.0	8.5	10.5	16.0	12.5	14.5	---	---	---
30	---	---	---	12.5	10.0	11.0	17.5	13.5	15.5	---	---	---
31	---	---	---	11.0	8.0	9.5	---	---	---	---	---	---
MONTH	2.0	.0	.0	12.5	1.0	4.5	20.0	4.5	11.5	24.0	11.5	18.0

DELAWARE RIVER BASIN

01438500 DELAWARE RIVER AT MONTAGUE, NJ

LOCATION.--Lat 41°18'33", long 74°47'44", Pike County, PA, Hydrologic Unit 02040104, on right bank 1,500 ft upstream from toll bridge (on U.S. Route 206) between Montague, NJ and Milford, PA, 0.8 mi downstream from Sawkill Creek, and at river mile 246.3.

DRAINAGE AREA.--3,480 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--March 1936 to September 1939 (gage heights only, published as "at Milford, PA"). October 1939 to current year. Monthly discharge only for some periods, published in WSP 1302.

REVISED RECORDS.--WDR-NJ-81-2: 1980.

GAGE.--Water-stage recorder. Datum of gage is 369.93 ft above National Geodetic Vertical Datum of 1929. Prior to Feb. 9, 1940, nonrecording gage on upstream side of left span of subsequently dismantled bridge at present site at datum 70 ft lower.

REMARKS.--Estimated daily discharges: Jan. 9 to Feb. 25. Records excellent except those for period of ice effect, Jan. 9 to Feb. 25, and those from May 28 to Sept. 28, which are good. Diurnal fluctuations at medium and low flow caused by powerplants on tributary streams. Flow regulated by Lake Wallenpaupack and by Pepacton, Cannonsville, Swinging Bridge, Toronto, Cliff Lake, and Neversink Reservoirs (see Delaware River basin, reservoirs in) and smaller reservoirs. Diversion from Pepacton, Cannonsville, and Neversink Reservoirs (see Delaware River basin, diversions). Several measurements of water temperature were made during the year. U.S. Army Corps of Engineers satellite telemeter at station.

AVERAGE DISCHARGE.--46 years, 5,787 ft³/s, unadjusted.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 250,000 ft³/s, Aug. 19, 1955, gage height, 35.15 ft, from rating curve extended above 90,000 ft³/s on basis of flood-routing study; minimum, 382 ft³/s, Aug. 24, 1954, gage height, 3.83 ft, minimum daily, 412 ft³/s, Aug. 23, 1954.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of October 10, 1903, reached a stage of 35.5 ft, from floodmark, present datum.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 66,300 ft³/s, Sept. 28, gage height, 18.04 ft; minimum discharge, 691 ft³/s, Aug. 23.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1720	1970	5180	5470	1600	5910	3370	1940	3120	1720	2140	1750
2	1480	1240	4270	5050	1500	5150	4900	1940	3760	1400	2870	1580
3	1120	1830	3970	4920	1400	4290	4930	4160	3660	1390	2650	1340
4	1900	1680	4090	4340	1500	3820	4500	6100	3390	1380	1530	1180
5	1910	1810	4050	3910	1950	3590	4250	4510	3090	1140	1240	1200
6	1700	1950	4870	3330	1750	4450	4110	3660	3470	1690	1860	1230
7	1860	2060	3740	3270	1550	4490	3790	3510	3230	1550	1890	1300
8	1710	2070	2520	3450	1450	4270	4280	3390	3050	1910	1990	1220
9	1690	1950	2260	2700	1750	4350	4970	3010	1890	1970	1890	1370
10	1760	1920	2350	2000	1650	4030	4590	2680	1760	1440	1860	4210
11	1780	1820	2350	1800	1750	4090	3980	2290	2260	1650	1420	3720
12	1860	1920	2410	2400	2100	6990	3760	2100	2110	1760	1380	2450
13	1800	1940	2660	2000	2400	16500	3430	1980	2040	2050	1560	1720
14	1890	1690	2880	2300	2900	12900	3050	1960	1510	2520	1560	1360
15	1870	1870	3370	2400	2900	10300	3040	1730	1670	2280	1570	1130
16	2040	1720	3350	2200	2700	8210	3080	1570	1880	2890	1760	1010
17	1920	1640	3190	2100	2300	6540	2940	1520	2080	3280	1570	1510
18	2050	1760	3100	1900	1900	6140	2850	2060	1950	2420	1240	1540
19	2080	1770	2890	1900	1700	5590	2620	3440	1900	1990	1180	1450
20	1910	1920	3080	1600	1750	4580	2720	3540	1450	1520	1330	1380
21	1940	1780	3660	1750	1650	4970	2840	2880	1400	1240	1350	1370
22	1800	1710	3960	3200	1550	4560	2710	2450	1350	2560	1280	1220
23	2100	1720	7050	2200	1950	4290	2580	2100	1080	3820	1120	1280
24	2380	1710	6260	2000	4400	3630	2480	1910	1460	3020	1480	1380
25	1870	1660	5000	2000	9600	3620	2570	1740	1920	2520	1070	1320
26	1640	1770	4260	2400	11400	3750	2560	1600	1920	3700	1490	1330
27	1990	1740	3710	2000	8790	2890	2480	1530	1850	2860	1830	12600
28	1800	1750	3620	1700	7030	2770	2210	1900	1510	1900	1500	50700
29	1820	2230	4660	1900	---	2750	2040	4410	1490	1660	1380	20700
30	1790	6680	6760	1700	---	2800	2020	4290	1890	1420	1310	12200
31	1620	---	6560	1650	---	2650	---	3300	---	1840	1540	---
TOTAL	56800	59280	122080	81540	84870	164870	99650	85200	65140	64490	49840	137750
MEAN	1832	1976	3938	2630	3031	5318	3322	2748	2171	2080	1608	4592
MAX	2380	6680	7050	5470	11400	16500	4970	6100	3760	3820	2870	50700
MIN	1120	1240	2260	1600	1400	2650	2020	1520	1080	1140	1070	1010

CAL YR 1984 TOTAL 2254130 MEAN 6159 MAX 82700 MIN 1120
WTR YR 1985 TOTAL 1071510 MEAN 2936 MAX 50700 MIN 1010

BUSH KILL BASIN

51

01439500 BUSH KILL AT SHOEMAKERS, PA

LOCATION.--Lat 41°05'17", long 75°02'17", Monroe County, Hydrologic Unit 02040104, on right bank 30 ft downstream from highway bridge, 0.1 mi downstream from Saw Creek, 0.7 mi (1.1 km) northwest of Shoemakers, and 2 mi southwest of Bushkill.

DRAINAGE AREA.--117 mi².

PERIOD OF RECORD.--October 1908 to current year. Monthly discharge only for some periods, published in WSP 1302. Prior to October 1928, published as Bushkill Creek near Shoemakers; October 1928 to September 1952, published as Bushkill Creek at Shoemakers.

REVISED RECORDS.--WSP 756: Drainage area. WSP 1202: 1921, 1932(M), 1933, 1935-36, 1938(M), 1939-40, 1942, 1945, 1946(M), 1948(M). WSP 1302: 1909-15, 1920(M), 1922-29.

GAGE.--Water-stage recorder. Datum of gage is 421.13 ft above National Geodetic Vertical Datum of 1929. Sept. 19, 1908, to Aug. 12, 1938, nonrecording gage, and Aug. 13, 1938, to June 20, 1956, water-stage recorder at site 50 ft upstream at same datum.

REMARKS.--Estimated daily discharges during water year: Oct. 1, Oct. 6-22, Nov. 22-28, Jan. 5 to Mar. 6. Records good except for periods of estimated record, which are fair. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--77 years, 235 ft³/s, 27.30 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 23,400 ft³/s Aug. 19, 1955, gage height, 13.95 ft, from flood-marks, from rating curve extended above 2,600 ft³/s on basis of slope-area measurement of peak flow; minimum, 2.6 ft³/s Sept. 25, 26, 27, 1964, gage height, 0.72 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges, greater than base discharge of 1,100 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1530	*1,420	*3.66	No other peak greater than base discharge.			

Minimum daily discharge, 15 ft³/s Oct. 12-14, 19.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	18	19	47	122	45	260	186	92	545	121	170	52
2	23	19	38	128	44	250	185	112	425	118	123	38
3	22	18	49	116	44	240	172	617	313	109	103	33
4	20	17	83	105	44	230	169	649	262	98	84	30
5	17	29	64	100	44	220	157	520	324	90	70	27
6	61	38	77	92	43	200	161	433	441	86	60	24
7	18	32	72	86	43	190	161	368	323	119	54	22
8	17	27	82	80	43	188	187	309	291	110	75	22
9	17	24	65	74	43	190	186	261	286	97	77	26
10	17	23	46	68	43	179	173	234	254	90	61	34
11	16	23	47	64	43	167	160	216	213	81	53	42
12	15	23	53	62	43	208	152	202	194	70	50	34
13	15	22	53	60	42	241	140	192	181	121	43	27
14	15	21	51	58	42	223	138	177	166	112	39	23
15	17	20	51	56	42	207	136	152	147	108	38	21
16	18	20	50	54	42	188	138	144	357	94	35	20
17	17	19	49	54	42	181	134	203	366	81	35	20
18	16	18	48	52	42	170	121	575	285	66	31	18
19	15	19	48	52	42	149	120	457	238	56	29	17
20	17	18	54	50	42	142	123	343	198	50	29	17
21	18	17	54	50	42	133	121	306	181	45	27	17
22	20	18	157	49	42	124	120	283	160	119	26	16
23	24	19	149	48	80	134	118	240	144	101	24	16
24	28	20	108	48	370	145	117	221	134	68	22	17
25	24	21	101	48	350	133	117	200	156	58	29	17
26	22	21	89	47	330	118	117	183	139	118	43	17
27	21	21	92	47	300	106	113	172	130	200	38	756
28	20	22	98	46	280	101	105	211	127	138	30	871
29	21	38	128	46	---	103	103	310	126	113	26	580
30	21	66	183	45	---	102	96	239	125	91	28	406
31	20	---	138	45	---	114	---	207	---	94	65	---
TOTAL	630	712	2424	2052	2652	5336	4226	8828	7231	3022	1617	3260
MEAN	20.3	23.7	78.2	66.2	94.7	172	141	285	241	97.5	52.2	109
MAX	61	66	183	128	370	260	187	649	545	200	170	871
MIN	15	17	38	45	42	101	96	92	125	45	22	16
CFSM	.17	.20	.67	.57	.81	1.47	1.21	2.44	2.06	.83	.45	.93
IN.	.20	.23	.77	.65	.84	1.70	1.34	2.81	2.30	.96	.51	1.04
CAL YR 1984	TOTAL	89068	MEAN	243	MAX	2790	MIN	14	CFSM	2.08	IN.	28.32
WTR YR 1985	TOTAL	41990	MEAN	115	MAX	871	MIN	15	CFSM	.98	IN.	13.35

DELAWARE RIVER BASIN

01440200 DELAWARE RIVER BELOW TOCKS ISLAND DAMSITE, NEAR DELAWARE WATER GAP, PA

LOCATION.--Lat 41°00'42", long 75°05'09", Warren County, NJ, Hydrologic Unit 02040105, on left bank 40 ft streamward from River Road, 1.0 mi downstream from Tocks Island, 3.7 mi northeast of Delaware Water Gap, PA, 4.0 mi upstream from bridge on Interstate Route 80, and at mile 216.1.

DRAINAGE AREA.--3,850 mi², approximately.

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--May 1964 to current year.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is 293.64 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges: Oct. 1-19, Jan. 9 to Feb. 23, and Aug. 14 to Sept. 3. Records fair except those for periods of no gage-height record Oct. 1-19 and Aug. 14 to Sept. 3, and those for period of ice effect, Jan. 9 to Feb. 23, which are poor. Diurnal fluctuation at medium and low flow caused by powerplants on tributary streams. Flow regulated by Lake Wallenpaupack, and by Pepacton, Cannonsville, Swinging Bridge, Toronto, Cliff Lake, and Neversink Reservoirs (see Delaware River basin, reservoirs in) and smaller reservoirs. Diversion from Pepacton, Cannonsville, and Neversink Reservoirs (see Delaware River basin, diversions). Several measurements of water temperature were made during the year. Gage-height telemeter at station.

AVERAGE DISCHARGE.--21 years, 6,329 ft³/s, unadjusted.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 103,000 ft³/s, June 30, 1973, gage height, 23.82 ft; minimum daily, 580 ft³/s, July 7, 8, 1965.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 74,400 ft³/s, Sept. 28, gage height, 17.93 ft; minimum, 948 ft³/s, Sept. 22.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1840	1900	6510	6610	1790	6870	3390	2260	4900	2340	2440	1810
2	1820	1990	4760	5850	1780	6200	4930	2270	4990	2100	3080	1830
3	1460	1480	4440	5730	1700	5240	5750	4270	5060	1790	3240	1610
4	1510	2070	4360	5230	1580	4560	5260	8500	4950	1840	2270	1200
5	2150	1900	4520	4700	1740	4410	4900	6880	4170	1470	1740	1180
6	1900	2050	4930	4030	2100	4630	4740	5460	4940	1780	1850	1230
7	1900	2210	4910	3650	1900	5620	4390	4910	4580	1810	2160	1240
8	1950	2260	3200	3990	1690	5050	4440	4560	4170	2060	2400	1240
9	1800	2190	2740	3370	1790	5130	5390	4150	3310	2550	2200	1300
10	1880	2100	2590	2510	1900	4870	5620	3700	2760	1890	2220	2460
11	1900	2040	2690	2210	1820	4540	4750	3220	3020	1940	1900	4260
12	2100	2050	2620	2440	2140	5470	4320	2910	2940	1990	1700	3060
13	1920	1980	2870	2580	2960	17800	4080	2700	2780	2230	1680	2080
14	2030	2090	3000	2470	3450	15600	3620	2600	2260	2560	1700	1540
15	2010	1910	3480	2830	3450	11800	3450	2380	2280	2970	1690	1260
16	2060	1980	3690	2390	3210	9710	3530	2150	2850	2880	1770	1080
17	1990	1740	3610	2350	2870	7510	3450	2060	3470	3450	1790	1210
18	2120	1810	3460	2180	2430	6730	3310	2860	3230	3210	1510	1460
19	2150	1900	3320	2270	2170	6650	3100	4000	2870	2480	1310	1390
20	2300	2010	3260	1860	2140	5240	3030	4820	2360	2010	1350	1330
21	2010	2050	3730	1720	2110	5590	3140	3990	2130	1590	1450	1300
22	2130	1740	4330	2460	2030	5210	3170	3650	1960	1780	1430	1120
23	2180	1900	6480	3120	2320	5000	3020	3020	1710	4240	1310	1180
24	2490	1840	7530	2350	4290	4230	2880	2670	1700	3690	1330	1280
25	2450	1820	6030	2310	8890	4030	2900	2430	2150	2900	1480	1300
26	1950	1800	5190	2480	13600	4480	2910	2200	2590	3130	1370	1240
27	2120	1910	4350	2340	10200	3430	2930	2060	2500	4250	1930	4090
28	2040	1840	4020	2020	8420	3170	2680	2070	2050	2690	1810	61300
29	1980	2140	4540	2000	---	3130	2460	4280	2060	2230	1550	31200
30	2050	4980	6850	2040	---	3150	2330	5670	2350	1920	1500	16100
31	1870	---	7360	1880	---	3070	---	4570	---	2040	1620	---
TOTAL	62060	61680	135370	93970	96470	188120	113870	113270	93090	75810	56780	153880
MEAN	2002	2056	4367	3031	3445	6068	3796	3654	3103	2445	1832	5129
MAX	2490	4980	7530	6610	13600	17800	5750	8500	5060	4250	3240	61300
MIN	1460	1480	2590	1720	1580	3070	2330	2060	1700	1470	1310	1080

CAL YR 1984 TOTAL 2594910 MEAN 7090 MAX 93200 MIN 1460
WTR YR 1985 TOTAL 1244370 MEAN 3409 MAX 61300 MIN 1080

BRODHEAD CREEK BASIN

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01440400 BRODHEAD CREEK NEAR ANALOMINK, PA

LOCATION.--Lat 41°05'05", long 75°12'54", Monroe County, Hydrologic Unit 02040104, on left bank 1.5 mi upstream from Paradise Creek, 1.6 mi southeast of Henryville, and 2.3 mi north of Analomink.

DRAINAGE AREA.--65.9 mi².

PERIOD OF RECORD.--October 1957 to current year.

GAGE.--Water-stage recorder. Datum of gage is 586.50 ft above National Geodetic Vertical Datum of 1929. Prior to Dec. 12, 1957, nonrecording gage at same site and datum.

REMARKS.--Estimated daily discharges during water year: Nov. 17-21, Jan. 9 to Feb. 22. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--28 years, 136 ft³/s, 27.93 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 12,900 ft³/s July 28, 1969, gage height, 11.82 ft, from rating curve extended above 1,400 ft³/s on basis of slope-area measurement of peak flow; minimum, 5.4 ft³/s Sept. 11, 12, 13, 14, gage height, 1.14 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges, greater than base discharge of 1,100 ft³/s and maximum (*).

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1430	*3,270	*6.89	No other peak greater than base discharge.			

Minimum discharge, 11 ft³/s Sept. 26, gage height 1.25 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	14	14	26	94	25	115	132	50	265	47	81	28
2	19	15	22	97	24	107	119	66	163	44	53	26
3	17	15	26	85	24	97	104	486	125	42	43	22
4	20	14	41	75	24	90	98	378	104	41	36	19
5	18	23	31	75	23	128	93	285	197	38	33	17
6	17	25	37	69	23	125	95	240	232	47	29	16
7	16	21	36	71	23	102	92	202	162	71	28	14
8	15	18	28	62	23	104	111	168	148	60	48	14
9	14	16	25	60	22	105	105	148	139	46	36	16
10	14	16	23	54	22	96	95	135	120	41	30	23
11	14	16	24	52	22	90	91	118	100	36	27	30
12	13	15	27	48	40	158	88	108	91	36	25	21
13	13	15	27	46	70	171	83	102	84	103	23	17
14	13	14	27	44	60	142	82	91	77	56	21	15
15	13	13	27	42	47	128	82	79	70	51	20	15
16	13	13	26	60	36	115	82	75	248	43	20	14
17	13	13	25	48	33	109	81	87	201	37	21	13
18	13	13	24	40	30	101	78	203	155	33	19	13
19	13	13	24	36	27	90	76	145	122	29	18	13
20	14	12	28	35	26	90	75	110	100	28	19	12
21	13	12	28	34	25	84	74	96	92	27	18	12
22	14	12	95	33	28	78	72	86	80	67	17	12
23	21	12	87	32	90	83	69	76	73	42	16	12
24	18	12	67	31	167	87	69	70	68	33	16	13
25	16	12	59	30	191	82	69	66	66	29	24	13
26	15	12	50	29	164	73	69	67	59	49	26	12
27	15	12	51	28	146	69	63	59	55	84	21	1310
28	15	12	53	27	125	68	59	107	52	54	19	663
29	15	35	98	26	---	74	59	133	53	41	17	351
30	16	34	126	26	---	80	56	87	52	35	17	218
31	15	---	99	25	---	89	---	74	---	43	45	---
TOTAL	469	479	1367	1514	1562	3130	2521	4197	3553	1433	867	2974
MEAN	15.1	16.0	44.1	48.8	55.8	101	84.0	135	118	46.2	28.0	99.1
MAX	21	35	126	97	191	171	132	486	265	103	81	1310
MIN	13	12	22	25	22	68	56	50	52	27	16	12
CFSM	.23	.24	.67	.74	.85	1.53	1.27	2.05	1.79	.70	.42	1.50
IN.	.26	.27	.77	.85	.86	1.77	1.42	2.37	2.01	.81	.49	1.68

CAL YR 1984	TOTAL	53252	MEAN	145	MAX	3700	MIN	11	CFSM	2.20	IN.	30.06
WTR YR 1985	TOTAL	24066	MEAN	65.9	MAX	1310	MIN	12	CFSM	1.00	IN.	13.59

01442500 BRODHEAD CREEK AT MINISINK HILLS, PA

LOCATION.--Lat 40°59'55", long 75°08'35", Monroe County, Hydrologic Unit 02040104, on left bank at Minisink Hills, 500 ft upstream from Marshall Creek, 1,500 ft downstream from Coates Paper Box Co., 0.8 mi upstream from mouth, and 3 mi southeast of East Stroudsburg.

DRAINAGE AREA.--259 mi².

PERIOD OF RECORD.--November 1950 to current year.

REVISED RECORDS.--WSP 1232: 1951(P).

GAGE.--Water-stage recorder. Datum of gage is 301.84 ft above National Geodetic Vertical Datum of 1929. Prior to Aug. 19, 1955, water-stage recorder, and Aug. 23 to Nov. 24, 1955, nonrecording gage at site about 1,300 ft upstream at datum 2.19 ft higher. Nov. 25, 1955, to July 24, 1956, nonrecording gage at site 40 ft upstream at present datum.

REMARKS.--Estimated daily discharges in this water year: Jan. 10-15, Jan. 17 to Feb. 21. Records good, except periods of estimated daily discharges which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--34 years, 559 ft³/s, 29.29 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 68,800 ft³/s Aug. 19, 1955, gage height, 29.9 ft, site and datum then in use, 27.0 ft, present site and datum, from floodmarks, from rating curve extended above 4,600 ft³/s on basis of computation of flow over dam at gage height 14.43 ft and slope-area measurement of peak flow, site and datum then in use; minimum, 29 ft³/s Sept. 27, 1964; minimum gage height, 1.10 ft Sept. 10, 1980.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 4,300 ft³/s and maximum (*).

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sep. 27	1445	*12,000	*8.87	No other peak discharges above base.			

Minimum discharge, 56 ft³/s Sep. 26, gage height 1.84 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	89	88	140	457	120	455	509	191	609	162	287	101
2	118	90	117	487	120	433	438	260	441	152	189	94
3	110	88	148	432	115	391	376	1770	344	152	153	85
4	96	83	240	387	115	362	369	1350	296	151	137	80
5	90	150	164	384	110	496	346	1010	475	137	124	72
6	86	148	222	335	110	482	359	868	652	137	114	69
7	86	118	214	341	110	389	350	776	436	238	109	67
8	88	105	161	316	105	402	418	643	396	185	154	68
9	88	106	143	240	105	392	386	554	393	160	135	74
10	84	105	137	230	105	361	352	507	338	142	107	103
11	84	97	145	220	105	341	338	463	282	130	97	104
12	80	92	156	215	250	588	331	421	263	117	93	83
13	78	85	151	210	380	625	312	418	243	325	84	75
14	78	82	140	205	210	512	311	369	225	193	87	72
15	78	80	147	200	180	466	313	320	212	191	84	72
16	77	79	148	192	155	429	315	299	688	163	83	72
17	76	77	142	200	140	414	291	373	572	135	88	71
18	80	79	134	185	130	389	270	743	430	121	81	73
19	78	80	138	175	120	355	266	528	343	112	83	72
20	84	76	167	170	110	356	288	407	280	105	83	71
21	79	74	161	160	110	339	277	366	253	102	78	69
22	92	72	638	155	254	313	258	381	233	201	78	67
23	140	72	476	150	416	334	246	311	221	158	77	66
24	110	72	378	145	664	351	266	291	215	124	74	67
25	98	72	340	140	715	323	257	264	227	117	110	64
26	96	73	282	140	624	292	256	251	187	183	122	60
27	95	72	280	135	581	276	229	244	177	270	98	5790
28	91	74	301	130	493	275	216	323	170	185	84	2540
29	98	187	477	130	---	281	212	440	179	146	79	954
30	99	194	597	125	---	277	202	300	171	130	88	581
31	93	---	460	120	---	296	---	259	---	136	121	---
TOTAL	2819	2870	7544	7111	6752	11995	9357	15700	9951	4960	3381	11836
MEAN	90.9	95.7	243	229	241	387	312	506	332	160	109	395
MAX	140	194	638	487	715	625	509	1770	688	325	287	5790
MIN	76	72	117	120	105	275	202	191	170	102	74	60
CFSM	.35	.37	.94	.88	.93	1.49	1.20	1.95	1.28	.62	.42	1.53
IN.	.40	.41	1.08	1.02	.97	1.72	1.34	2.25	1.43	.71	.49	1.70

CAL YR 1984	TOTAL	245377	MEAN	670	MAX	12600	MIN	72	CFSM	2.59	IN.	35.24
WTR YR 1985	TOTAL	94276	MEAN	258	MAX	5790	MIN	60	CFSM	1.00	IN.	13.54

DELAWARE RIVER BASIN

55

01443000 DELAWARE RIVER AT PORTLAND, PA

LOCATION.--Lat 40°55'26", long 75°05'46", Northampton County, Hydrologic Unit 02040105, at walkbridge connecting Portland, PA and Columbia, NJ, and 0.5 mi upstream of Paulins Kill.

DRAINAGE AREA.--4,165 mi².

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1976 to current year.

COOPERATION.--Field data and samples for laboratory analyses provided by New Jersey Department of Environmental Protection, Division of Water Resources. Analyses of fecal coliform and fecal streptococci by the MPN method, and water-phase nutrients were performed by the New Jersey Department of Health, Division of Laboratories and Epidemiology.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	OXYGEN, DIS- SOLVED (PER- CENT SATUR- ATION)	OXYGEN DEMAND, BIO- CHEM- ICAL, 5 DAY (MG/L)	COLI- FORM, FECAL, EC BROTH (MPN)	STREP- TOCOCCI FECAL (MPN)
OCT 15...	1200	2300	--	8.2	14.5	10.7	106	--	<20	33
FEB 20...	1330	2520	96	7.7	1.0	15.2	106	E1.2	<20	<2
APR 23...	1030	3300	82	7.7	17.0	8.9	93	E1.4	<20	79
JUN 18...	1020	3980	84	7.6	19.5	8.6	96	E1.3	20	920
JUL 22...	1100	2640	92	7.6	28.0	--	--	E1.1	<20	>280
AUG 19...	1045	1560	93	7.9	23.5	7.9	94	E1.1	50	350

DATE	HARD- NESS (MG/L AS CaCO3)	CALCIUM DIS- SOLVED (MG/L AS Ca)	MAGNE- SIUM, DIS- SOLVED (MG/L AS Mg)	SODIUM, DIS- SOLVED (MG/L AS Na)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY LAB (MG/L AS CaCO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS Cl)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)
OCT 15...	30	8.8	1.9	4.1	.90	19	11	6.6	<.10
FEB 20...	31	9.3	1.8	5.6	.80	18	12	10	<.10
APR 23...	28	8.7	1.6	4.3	.70	16	11	6.9	<.10
JUN 18...	27	8.1	1.6	3.9	.60	17	9.8	6.9	<.10
JUL 22...	31	9.5	1.8	5.1	1.0	21	11	8.2	.10
AUG 19...	31	9.4	1.8	6.1	1.0	21	9.9	11	<.10

DATE	SILICA, DIS- SOLVED (MG/L AS SiO2)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRITE TOTAL (MG/L AS N)	NITRO- GEN, NO2+NO3 TOTAL (MG/L AS N)	NITRO- GEN, AMMONIA TOTAL (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	NITRO- GEN, TOTAL (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	CARBON, ORGANIC TOTAL (MG/L AS C)
OCT 15...	1.0	46	.006	.27	.080	.23	.50	.040	--
FEB 20...	2.5	53	.008	.52	.060	.31	.83	.040	2.3
APR 23...	1.4	44	.005	.28	.150	.46	.74	.060	3.1
JUN 18...	1.9	43	.004	.11	.270	.40	.51	.040	2.9
JUL 22...	1.8	51	.004	.08	.140	.44	.52	.040	3.8
AUG 19...	1.6	53	.003	.07	.080	.40	.47	.050	2.7

DELAWARE RIVER BASIN

01446500 DELAWARE RIVER AT BELVIDERE, NJ

LOCATION.--Lat 40°49'36", long 75°05'02", Warren County, Hydrologic Unit 02040105, on left bank at Belvidere, 800 ft downstream from Pequest River, and at mile 197.7.

DRAINAGE AREA.--4,535 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1922 to current year.

REVISED RECORDS.--WSP 781: 1933(M). WSP 951: 1940-41, Drainage area. WSP 1432: 1923, 1924(M).

GAGE.--Water-stage recorder. Datum of gage 226.43 ft above National Geodetic Vertical Datum of 1929. Prior to Jan. 1, 1929, nonrecording gage at site 200 ft upstream at same datum.

REMARKS.--No estimated daily discharges. Records good. Diurnal fluctuations at medium and low flow caused by powerplants on tributary streams. Flow regulated by Lake Wallenpaupack, and by Pepacton, Cannonsville, Swinging Bridge, Toronto, Cliff Lake, and Neversink Reservoirs (see Delaware River basin, reservoirs in) and smaller reservoirs. Diversions from Pepacton, Cannonsville, and Neversink Reservoirs (see Delaware River basin, diversions). National Weather Service gage-height telemeter at station.

AVERAGE DISCHARGE.--63 years, 7,859 ft³/s, unadjusted.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 273,000 ft³/s, Aug. 19, 1955, gage height, 30.21 ft, from high-water mark in gage house, from rating curve extended above 170,000 ft³/s, on basis of flood-routing study; minimum, 609 ft³/s, Sept. 28, 29, 1943, gage height, 2.11 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Oct. 10, 1903, reached a stage of 28.6 ft, from floodmark, discharge, 220,000 ft³/s, from rating curve extended above 170,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 71,200 ft³/s, Sept. 28, gage height, 15.03 ft; minimum, 1,100 ft³/s, Aug. 24, gage height, 2.70 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2100	2070	7620	8080	2090	8310	4340	2720	5640	2670	2840	2020
2	2270	2440	5470	7160	2180	7440	5560	2820	5880	2480	3290	2130
3	1910	1690	5070	6980	2120	6320	6650	6450	5560	2160	3400	1960
4	1470	2280	5130	6430	1790	5570	6200	11800	5570	2130	2770	1690
5	2310	2350	5150	5890	1720	5530	5750	9610	4830	2030	2060	1480
6	2220	2540	5510	5180	2490	5720	5560	7440	5990	1820	1770	1470
7	2090	2560	5990	4660	2450	6670	5350	6630	5420	2410	2250	1480
8	2220	2600	4120	4930	2050	5990	5370	5970	4850	2340	2590	1590
9	2050	2560	3350	4100	1980	6120	6180	5360	4390	2690	2540	1550
10	2040	2450	3130	3100	2180	5870	6490	4730	3460	2400	2410	1990
11	2110	2400	3230	2840	2040	5500	5610	4220	3330	2060	2280	4510
12	2150	2300	3160	2840	2580	6380	5160	3790	3400	2160	1860	3580
13	2190	2330	3320	3200	4210	16900	4850	3540	3220	2620	1790	2580
14	2160	2380	3520	2960	4100	18200	4400	3320	2920	2950	1910	1980
15	2240	2100	3910	3400	4120	14100	4170	3130	2600	3280	1900	1610
16	2240	2250	4270	2720	3900	11600	4230	2830	3580	3040	1900	1360
17	2440	2050	4140	2640	3590	9060	4160	2790	4750	3500	2040	1240
18	2300	2000	3970	2610	3150	7980	3970	4150	4220	3490	1860	1670
19	2450	2150	3860	2850	2860	7840	3780	5090	3620	2760	1550	1710
20	2520	2190	3800	2210	2760	6560	3680	5610	3160	2380	1480	1620
21	2280	2310	4200	1820	2740	6500	3780	4860	2730	1920	1610	1550
22	2460	2100	5860	2210	2740	6170	3790	4720	2540	1960	1640	1540
23	2740	2090	7140	3950	3090	5930	3610	3950	2400	3800	1560	1370
24	2830	2080	9080	3130	4680	5310	3490	3470	2130	3850	1360	1460
25	2930	2050	7330	2800	9010	4960	3420	3150	2660	3100	1910	1550
26	2400	2100	6230	2710	15300	5210	3440	2870	2910	3170	1600	1490
27	2240	2280	5440	2700	12600	4380	3400	2720	2770	4870	2050	9020
28	2430	2220	4980	2460	10300	3960	3220	2730	2670	3610	2150	54900
29	2370	2620	5440	2290	---	3890	2960	4080	2410	2740	1820	36700
30	2370	4320	7860	2430	---	3870	2800	6180	2440	2370	1760	20100
31	2280	---	8850	2270	---	3870	---	5180	---	2170	1870	---
TOTAL	70810	69860	160130	113550	114820	221710	135370	145910	112050	84930	63820	168900
MEAN	2284	2329	5165	3663	4101	7152	4512	4707	3735	2740	2059	5630
MAX	2930	4320	9080	8080	15300	18200	6650	11800	5990	4870	3400	54900
MIN	1470	1690	3130	1820	1720	3870	2800	2720	2130	1820	1360	1240

CAL YR 1984 TOTAL 3198350 MEAN 8739 MAX 104000 MIN 1470

WTR YR 1985 TOTAL 1461860 MEAN 4005 MAX 54900 MIN 1240

DELAWARE RIVER BASIN

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01447000 DELAWARE RIVER AT NORTHAMPTON STREET AT EASTON, PA

LOCATION.--Lat 40°41'30", long 75°12'15", Northampton County, Hydrologic Unit 02040105, at bridge on Northampton Street in Easton, 600 ft upstream from Lehigh River, and 0.2 mi downstream from U.S. Route 22 toll bridge in Easton.

DRAINAGE AREA.--4,717 mi².

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1976 to current year.

COOPERATION.--Field data and samples for laboratory analyses provided by New Jersey Department of Environmental Protection, Division of Water Resources. Analyses of fecal coliform and fecal streptococci by the MPN method, and water-phase nutrients were performed by the New Jersey Department of Health, Division of Laboratories and Epidemiology.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	OXYGEN, DIS- SOLVED (PER- CENT SATUR- ATION)	OXYGEN DEMAND, BIO- CHEM- ICAL, 5 DAY (MG/L)	COLI- FORM, FECAL, EC BROTH (MPN)	STREP- TOCOCCI FECAL (MPN)
OCT 04...	1045	2400	188	8.3	16.0	8.2	83	E1.5	80	49
FEB 20...	1100	3030	173	8.2	1.5	14.9	106	E1.3	<20	<2
APR 23...	1230	3920	112	7.7	18.0	8.8	94	E1.5	<20	240
JUN 11...	1230	3590	153	7.4	21.5	9.2	105	2.8	20	920
JUL 22...	1400	2050	123	7.9	28.5	--	--	E1.2	80	>2400
AUG 19...	1330	2340	150	8.0	24.5	8.6	104	E1.4	<20	1600

DATE	HARD- NESS (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY LAB (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)
OCT 04...	71	19	5.8	7.8	1.2	48	22	12	<.10
FEB 20...	60	16	4.8	8.8	1.2	39	22	13	<.10
APR 23...	40	11	3.0	5.9	.80	26	14	9.8	<.10
JUN 11...	53	14	4.3	6.7	.90	38	17	9.7	<.10
JUL 22...	52	14	4.1	6.7	1.2	38	17	10	<.10
AUG 19...	54	15	4.1	8.1	1.1	39	15	12	<.10

DATE	SILICA, DIS- SOLVED (MG/L AS SiO2)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRITE TOTAL (MG/L AS N)	NITRO- GEN, NO2+NO3 TOTAL (MG/L AS N)	NITRO- GEN, AMMONIA TOTAL (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	NITRO- GEN, TOTAL (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	CARBON, ORGANIC TOTAL (MG/L AS C)
OCT 04...	2.2	99	.009	.97	<.050	.50	1.5	.060	2.0
FEB 20...	2.4	92	.013	1.1	.110	.27	1.3	.040	2.7
APR 23...	1.2	61	.010	.39	.110	.54	.93	.060	3.2
JUN 11...	2.6	78	.012	.46	.100	.45	.91	.060	4.0
JUL 22...	2.2	78	.005	.34	.160	.44	.78	.060	3.5
AUG 19...	2.2	81	.007	.40	.110	.50	.90	.070	3.4

DELAWARE RIVER BASIN

01447000 DELAWARE RIVER AT NORTHAMPTON STREET AT EASTON, PA--Continued

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	SULFIDE TOTAL (MG/L AS S)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC TOTAL (UG/L AS AS)	BERYL- LIUM, TOTAL RECOV- ERABLE (UG/L AS BE)	BORON, TOTAL RECOV- ERABLE (UG/L AS B)	CADMIUM TOTAL RECOV- ERABLE (UG/L AS CD)	CHRO- MIUM, TOTAL RECOV- ERABLE (UG/L AS CR)
OCT 04...	1045	<.5	<10	2	<10	<20	<1	<10

DATE	COPPER, TOTAL RECOV- ERABLE (UG/L AS CU)	IRON, TOTAL RECOV- ERABLE (UG/L AS FE)	LEAD, TOTAL RECOV- ERABLE (UG/L AS PB)	MANGA- NESE, TOTAL RECOV- ERABLE (UG/L AS MN)	MERCURY TOTAL RECOV- ERABLE (UG/L AS HG)	NICKEL, TOTAL RECOV- ERABLE (UG/L AS NI)	SELE- NIUM, TOTAL RECOV- ERABLE (UG/L AS SE)	ZINC, TOTAL RECOV- ERABLE (UG/L AS ZN)
OCT 04...	1	250	12	20	<.1	6	<1	20

01447500 LEHIGH RIVER AT STODDARTSVILLE, PA

LOCATION.--Lat 41°07'49", long 75°37'33", Monroe County, Hydrologic Unit 02040106, on left bank 75 ft upstream from bridge on State Highway 115, at Stoddartsville, 1.9 mi upstream from Tobyhanna Creek, and 4 mi southwest of Thornhurst.

DRAINAGE AREA.--91.7 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1943 to current year.

REVISED RECORDS.--WSP 1382: 1947, 1951.

GAGE.--Water-stage recorder. Datum of gage is 1,463.81 ft above National Geodetic Vertical Datum of 1929. Prior to Oct. 1, 1946, nonrecording gage at site 350 ft downstream at datum 2.14 ft lower.

REMARKS.--Estimated daily discharges during water year: Jan 11 to Feb. 21. Records good except for period of estimated record, which are poor.

AVERAGE DISCHARGE.--42 years, 188 ft³/s, 27.77 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 31,800 ft³/s Aug. 19, 1955, gage height, 16.37 ft, from floodmarks, from rating curve extended above 1,700 ft³/s on basis of slope-area measurement of peak flow; minimum observed, 7.0 ft³/s Sept. 26, 27, 1964; minimum gage height, 0.19 ft Sept. 27, 1980 Oct. 2, 9, 10, Nov. 17, 1980.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of May 22, 1942, reached a stage of 12.03 ft, from floodmark, present site and datum, discharge, 15,700 ft³/s.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,300 ft³/s and maximum (*).

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Jul. 13	0530	3070	5.82	Sep. 27	1830	*8380	*10.60

Minimum discharge, 20 ft³/s Oct. 18, 19, gage height, 0.38 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	28	34	102	207	58	238	235	82	664	107	381	163
2	51	36	88	203	57	214	252	130	456	98	243	130
3	44	40	85	179	57	193	218	778	326	98	211	109
4	34	34	100	158	56	178	198	642	256	128	168	90
5	32	81	82	152	56	206	189	467	443	102	145	77
6	30	92	90	149	55	206	181	376	535	165	145	68
7	29	67	78	129	54	182	172	325	361	363	123	62
8	35	55	83	119	54	175	200	263	307	233	131	64
9	30	47	75	107	54	167	205	220	274	186	115	80
10	28	46	64	124	54	158	183	195	233	158	101	167
11	27	44	68	115	54	151	164	177	193	139	90	183
12	25	40	77	110	140	292	160	161	173	151	84	127
13	50	37	81	105	290	314	150	148	162	1800	77	100
14	43	35	80	100	250	270	137	134	149	722	72	83
15	28	33	79	96	220	237	140	121	135	538	69	73
16	22	32	76	94	190	206	132	115	411	507	72	65
17	21	30	73	89	170	194	122	132	432	352	72	59
18	21	28	69	86	140	177	113	241	313	266	64	55
19	21	28	68	83	130	160	108	206	245	219	62	51
20	23	26	74	80	125	154	124	169	199	186	61	49
21	25	26	72	78	120	141	119	145	176	163	58	46
22	27	27	200	76	116	136	108	129	155	258	54	45
23	63	23	204	74	202	142	107	115	135	206	52	44
24	52	26	163	72	365	151	156	106	162	162	49	44
25	45	24	145	70	487	143	127	96	173	134	73	44
26	43	24	125	67	399	132	119	86	132	189	101	42
27	45	24	122	65	332	124	108	82	118	312	87	3930
28	41	26	136	64	270	122	100	267	112	219	75	3490
29	42	114	262	62	---	128	96	374	128	172	66	1260
30	41	128	296	61	---	132	89	230	119	144	94	751
31	37	---	236	60	---	154	---	182	---	234	251	---
TOTAL	1083	1307	3553	3234	4555	5577	4512	6894	7677	8711	3446	11551
MEAN	34.9	43.6	115	104	163	180	150	222	256	281	111	385
MAX	63	128	296	207	487	314	252	778	664	1800	381	3930
MIN	21	23	64	60	54	122	89	82	112	98	49	42
CFSM	.38	.48	1.25	1.13	1.78	1.96	1.64	2.42	2.79	3.06	1.21	4.20
IN.	.44	.53	1.44	1.31	1.85	2.26	1.83	2.80	3.11	3.53	1.40	4.69
CAL YR 1984	TOTAL	80464	MEAN	220	MAX	2860	MIN	21	CFSM	2.40	IN.	32.64
WTR YR 1985	TOTAL	62100	MEAN	170	MAX	3930	MIN	21	CFSM	1.85	IN.	25.19

LEHIGH RIVER BASIN

01447500 LEHIGH RIVER AT STODDARTSVILLE, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORDS:--

WATER TEMPERATURE: October 1980 to current year.

INSTRUMENTATION.--Temperature recorder since October 1980.

REMARKS.--Interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 26.0°C July 18, 19, 1982, July 17, 1983; minimum, 0.0°C on many days during winter period.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum, 23.5°C, July 22, Aug. 15, Sept. 7; minimum, 1.0°C, Dec. 26,27, Jan. 26-31, Feb. 13-21.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	---	---	---	10.5	10.0	10.5	4.5	3.5	4.0	5.0	4.5	5.0
2	---	---	---	11.5	9.0	10.5	4.0	3.5	3.5	4.5	3.0	3.5
3	---	---	---	9.0	6.5	7.5	4.0	3.0	3.5	3.0	2.5	3.0
4	11.5	8.5	10.0	8.0	6.0	7.0	3.0	2.0	2.5	2.5	2.0	2.5
5	11.0	8.0	9.5	10.0	8.0	9.0	2.5	1.5	2.0	2.0	2.0	2.0
6	10.5	7.0	9.0	9.5	8.0	9.0	1.5	1.0	1.5	2.5	2.0	2.5
7	10.0	6.5	8.5	8.0	6.0	7.0	2.0	1.0	1.5	2.5	2.0	2.5
8	11.0	9.0	10.0	6.0	4.0	5.5	2.5	1.5	2.0	2.5	1.5	2.0
9	---	---	---	6.5	5.0	5.5	2.5	1.5	2.0	---	---	---
10	---	---	---	8.5	6.5	7.0	2.5	2.0	2.0	---	---	---
11	---	---	---	8.5	7.0	8.0	2.5	1.5	2.0	---	---	---
12	---	---	---	8.0	6.0	7.0	3.5	2.0	3.0	---	---	---
13	---	---	---	6.0	4.0	5.0	4.5	3.5	4.0	---	---	---
14	---	---	---	4.0	3.0	3.5	4.5	4.0	4.5	---	---	---
15	---	---	---	4.5	2.5	3.5	4.5	4.0	4.0	---	---	---
16	---	---	---	5.0	4.0	4.5	4.0	4.0	4.0	---	---	---
17	10.0	9.0	9.5	4.5	3.0	3.5	6.0	4.0	5.0	---	---	---
18	12.0	10.0	11.0	4.0	2.5	3.5	5.0	3.5	4.0	---	---	---
19	11.5	10.5	11.0	4.0	2.5	3.5	4.0	3.0	3.5	---	---	---
20	13.5	11.5	12.5	2.5	2.0	2.5	3.0	2.5	2.5	---	---	---
21	12.5	11.5	12.0	2.5	2.0	2.0	3.5	2.5	3.0	---	---	---
22	13.5	12.0	12.5	3.0	2.0	2.5	3.5	2.0	2.5	---	---	---
23	13.0	12.0	12.5	3.0	1.5	2.5	2.5	1.5	2.0	---	---	---
24	12.0	11.0	11.5	3.5	1.5	2.5	3.0	1.5	2.5	1.5	1.5	1.5
25	12.0	10.5	11.0	3.5	2.0	2.5	2.0	1.5	1.5	1.5	1.5	1.5
26	12.5	11.0	11.5	3.5	1.5	2.5	1.5	1.0	1.0	1.5	1.0	1.5
27	13.5	11.5	12.5	3.0	1.5	2.5	2.0	1.0	1.5	1.5	1.0	1.0
28	15.0	13.0	14.0	6.0	2.5	4.5	5.5	2.0	3.5	1.5	1.0	1.0
29	14.5	13.0	14.0	6.5	4.5	5.5	5.5	4.0	5.0	1.5	1.0	1.0
30	12.5	10.5	11.5	4.5	3.5	4.0	4.0	3.0	3.5	1.5	1.0	1.5
31	12.0	10.5	11.0	---	---	---	4.5	3.5	4.0	1.5	1.0	1.5
MONTH	15.0	6.5	11.5	11.5	1.5	5.0	6.0	1.0	3.0	5.0	1.0	2.0

LEHIGH RIVER BASIN

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01447500 LEHIGH RIVER AT STODDARTSVILLE, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	1.5	1.5	1.5	3.5	2.0	2.5	6.0	5.0	5.5	12.5	11.5	11.5
2	1.5	1.5	1.5	5.0	3.0	4.0	5.5	4.5	5.0	---	---	---
3	1.5	1.5	1.5	4.0	3.0	3.5	4.5	3.5	4.0	---	---	---
4	2.0	1.5	1.5	3.0	2.0	2.5	6.0	3.5	4.5	---	---	---
5	2.0	1.5	1.5	4.0	2.0	3.0	9.0	5.5	7.0	---	---	---
6	2.0	1.5	1.5	3.5	2.0	2.5	10.0	8.5	9.5	---	---	---
7	1.5	1.5	1.5	3.0	1.5	2.0	8.5	7.5	8.0	---	---	---
8	1.5	1.5	1.5	4.0	2.5	3.0	7.0	6.0	6.5	---	---	---
9	1.5	1.5	1.5	5.0	3.0	4.0	6.5	4.5	5.5	---	---	---
10	1.5	1.5	1.5	5.5	3.0	4.5	6.5	4.0	5.0	---	---	---
11	1.5	1.5	1.5	4.5	3.5	4.5	6.0	5.0	5.5	---	---	---
12	1.5	1.5	1.5	5.0	4.0	4.5	8.5	4.5	6.5	---	---	---
13	1.5	1.0	1.0	5.0	3.5	4.5	10.0	7.5	8.5	---	---	---
14	1.0	1.0	1.0	5.0	4.0	4.5	9.0	8.0	8.5	---	---	---
15	1.0	1.0	1.0	4.5	3.0	4.0	9.0	8.0	8.5	---	---	---
16	1.0	1.0	1.0	4.0	2.0	3.0	11.0	9.0	10.0	---	---	---
17	1.0	1.0	1.0	4.5	3.5	4.0	11.0	8.0	9.5	---	---	---
18	1.0	1.0	1.0	4.0	2.5	3.0	11.0	8.0	9.5	---	---	---
19	2.0	1.0	1.0	3.5	2.0	3.0	11.5	10.0	11.0	---	---	---
20	2.0	1.0	1.5	5.5	3.0	4.0	13.0	10.5	12.0	---	---	---
21	2.0	1.0	1.5	5.5	3.0	4.0	14.5	11.5	13.0	---	---	---
22	2.0	1.5	2.0	5.5	3.0	4.0	15.0	12.0	13.5	18.0	15.0	16.5
23	3.5	2.0	2.5	5.5	4.0	5.0	16.0	13.5	15.0	15.0	13.0	13.5
24	3.5	2.0	2.5	5.5	4.5	5.0	14.5	11.5	12.5	17.0	11.0	14.0
25	4.0	3.0	3.5	6.5	4.0	5.0	11.0	11.0	11.0	19.0	12.5	15.5
26	3.5	3.0	3.5	6.5	3.5	5.0	13.5	10.0	12.0	20.0	13.5	16.5
27	4.0	3.0	3.5	7.5	4.0	5.5	14.0	11.0	12.5	21.5	15.5	18.0
28	3.0	1.5	2.5	8.5	7.0	8.0	12.0	10.0	11.0	17.5	15.0	16.5
29	---	---	---	11.0	8.5	9.5	12.5	9.0	10.5	17.0	14.0	15.0
30	---	---	---	10.0	8.0	9.0	13.5	10.0	12.0	16.5	13.5	15.0
31	---	---	---	8.0	5.5	7.0	---	---	---	15.5	15.0	15.0
MONTH	4.0	1.0	1.5	11.0	1.5	4.5	16.0	3.5	9.0	21.5	11.0	15.0
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	17.0	14.5	16.0	19.0	15.5	17.0	21.5	17.5	19.5	18.5	16.5	17.5
2	17.5	14.5	16.0	18.5	16.5	17.5	20.5	17.0	18.5	20.0	17.0	18.5
3	18.0	16.0	17.0	20.5	16.5	18.0	20.5	15.5	18.0	21.0	17.5	19.5
4	19.0	15.5	17.0	21.0	17.0	18.5	21.0	16.5	18.5	22.0	18.5	20.0
5	17.5	14.0	15.5	22.0	17.5	19.5	20.5	16.5	18.5	23.0	19.5	21.0
6	17.0	14.0	15.5	19.5	18.5	19.0	19.5	15.0	17.5	23.0	20.0	21.5
7	16.0	13.5	15.0	19.5	18.0	18.5	20.5	17.0	18.5	23.5	20.0	21.5
8	17.0	15.0	15.5	19.0	17.5	18.0	21.0	17.5	19.0	22.5	20.5	21.5
9	17.0	15.0	16.0	20.5	17.5	19.0	22.0	17.5	19.5	21.5	20.0	21.0
10	20.5	16.0	17.5	22.0	20.0	19.5	22.0	17.5	19.5	21.0	20.0	20.5
11	17.5	15.5	16.5	21.0	17.5	19.5	20.0	17.0	18.5	20.5	18.0	19.5
12	17.5	15.5	16.5	21.0	17.0	19.0	21.0	16.0	18.5	18.0	15.5	16.5
13	15.5	14.0	15.0	20.5	16.0	18.5	19.5	15.5	18.0	16.0	14.0	15.0
14	15.5	12.5	14.0	21.0	19.0	20.0	21.0	17.0	19.0	16.0	12.5	14.5
15	17.5	11.5	14.5	21.0	19.5	20.5	23.5	17.5	20.5	16.0	12.5	14.5
16	16.5	14.5	15.5	22.5	19.0	20.5	21.0	19.0	20.0	16.5	12.5	14.5
17	18.0	15.5	16.5	22.5	18.5	20.5	22.0	16.5	19.0	16.5	13.0	14.5
18	19.5	17.0	18.0	22.0	17.5	20.0	18.5	16.0	17.0	17.0	13.5	15.0
19	18.5	16.5	17.5	22.0	17.5	20.0	19.0	14.5	17.0	18.0	14.0	16.0
20	17.5	15.0	16.5	22.5	19.0	20.5	20.5	17.0	18.0	19.0	15.5	17.0
21	18.0	15.0	16.5	22.5	18.5	20.5	20.0	16.5	18.0	19.0	15.5	17.0
22	19.0	15.0	17.0	23.5	20.5	21.5	19.5	16.5	18.0	18.0	16.0	17.0
23	21.0	17.0	18.5	21.5	17.5	19.5	20.5	15.0	17.5	18.5	16.5	17.5
24	19.5	17.5	18.5	21.0	16.0	18.5	19.5	15.0	17.0	19.0	17.0	17.5
25	19.5	16.0	17.5	21.5	17.5	19.5	17.5	16.5	17.0	17.5	15.0	16.0
26	17.0	15.5	16.5	21.0	20.0	20.5	20.0	17.0	18.5	15.5	13.5	14.5
27	17.0	14.5	15.5	23.0	18.5	20.5	21.5	18.5	20.0	16.5	15.0	16.0
28	15.5	14.5	15.0	22.5	18.0	20.5	21.0	17.5	19.5	16.5	15.5	16.0
29	17.0	14.5	15.5	22.0	18.0	20.0	21.0	17.5	19.0	16.0	14.0	15.5
30	18.5	15.0	16.5	22.0	18.0	20.0	19.0	17.5	18.0	16.0	14.0	15.5
31	---	---	---	20.5	18.0	19.0	18.0	17.0	17.5	---	---	---
MONTH	21.0	11.5	16.5	23.5	15.5	19.5	23.5	14.5	18.5	23.5	12.5	17.5

LEHIGH RIVER BASIN

01447680 TUNKHANNOCK CREEK NEAR LONG POND, PA

LOCATION.--Lat 41°03'55", long 75°31'14", Monroe County, Hydrologic Unit 02040106, on left bank 0.6 mi downstream from unnamed tributary, 0.9 mi downstream from bridge on Legislative Route 45040, 3 mi west of Long Pond, and 5 mi upstream from mouth.

DRAINAGE AREA.--18.0 mi². At site used prior to July 7, 1966, 16.8 mi².

PERIOD OF RECORD.--March 1965 to current year.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 1,804.83 ft above National Geodetic Vertical Datum of 1929. Prior to July 7, 1966, nonrecording gage at site 0.8 mi upstream at different datum.

REMARKS.--Estimated daily discharge in this water year: Jan. 16-26, Jan 28 to Feb. 22, April 16-18. Records good except for periods of estimated daily discharges, which are fair. Diversion above station, since October 1969, to Wild Creek Basin. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--20 years, 46.5 ft³/s, 35.12 in/yr, adjusted for diversion since October 1969.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 679 ft³/s Apr. 6, 1984, gage height, 4.76 ft, minimum discharge 3.0 ft³/s Mar. 11, 1969, gage height, 1.84 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 200 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sep. 28	1330	*561	*4.43	No other peaks above base discharge			

Minimum daily discharge, 5.0 ft³/s Feb. 2-11.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	13	15	34	33	5.3	37	26	13	27	18	26	10
2	16	14	28	31	5.2	29	31	20	30	16	23	9.9
3	17	14	25	31	5.1	29	29	81	25	16	23	9.5
4	19	14	26	26	5.1	26	24	81	20	16	21	9.2
5	19	16	26	25	5.0	31	25	51	27	16	19	8.9
6	19	17	22	31	5.0	37	23	39	40	17	17	8.5
7	17	19	21	23	5.0	45	25	34	43	19	15	8.1
8	16	19	17	24	5.0	27	27	31	33	21	16	7.9
9	15	18	15	29	5.0	26	25	30	27	23	15	7.8
10	14	16	15	52	5.0	26	23	26	23	23	14	8.4
11	13	14	16	48	5.0	26	21	24	21	22	13	8.7
12	12	13	18	30	10	44	19	25	18	20	12	9.0
13	12	11	19	27	20	65	19	25	17	20	11	9.1
14	11	9.9	22	19	30	53	18	25	16	19	11	8.7
15	11	11	21	19	26	37	18	26	16	18	10	8.4
16	9.9	10	20	17	24	30	18	23	36	16	10	8.1
17	9.5	9.7	18	16	22	24	15	26	52	15	9.8	7.6
18	9.2	9.5	17	14	20	20	20	29	54	14	9.5	7.2
19	9.4	9.0	17	13	19	21	16	30	43	13	9.3	6.8
20	9.7	8.2	17	12	18	20	18	27	34	12	9.1	6.5
21	9.7	7.9	19	11	17	19	17	22	26	12	8.8	6.3
22	10	7.6	29	10	16	21	16	20	23	16	8.5	6.1
23	12	7.6	42	9.5	31	20	18	20	20	14	8.2	6.2
24	13	7.5	36	8.5	60	21	22	19	20	14	8.1	6.3
25	15	7.5	28	7.6	88	18	20	17	23	14	9.1	5.6
26	16	7.6	25	6.8	77	20	19	17	23	18	9.8	5.8
27	17	7.8	17	5.9	55	20	17	17	22	21	11	293
28	16	8.6	20	5.8	59	19	16	25	21	22	11	529
29	16	18	38	5.6	---	21	14	36	20	23	11	397
30	16	32	45	5.5	---	22	15	34	19	21	11	240
31	16	---	41	5.4	---	26	---	26	---	23	11	---
TOTAL	428.4	379.4	754	601.6	647.7	880	614	919	819	552	401.2	1663.6
MEAN	13.8	12.6	24.3	19.4	23.1	28.4	20.5	29.6	27.3	17.8	12.9	55.5
MAX	19	32	45	52	88	65	31	81	54	23	26	529
MIN	9.2	7.5	15	5.4	5.0	18	14	13	16	12	8.1	5.6
†	.36	.35	.36	.39	.39	3.16	7.64	3.36	.36	.36	.36	.31
MEAN†	14.2	13.0	24.7	19.8	23.5	31.6	28.1	33.0	27.7	18.2	13.3	55.8
CFSM†	.78	.72	1.37	1.10	1.30	1.75	1.56	1.83	1.54	1.01	.74	3.10
IN†	.91	.80	1.58	1.27	1.36	2.02	1.74	2.11	1.72	1.16	.85	3.46

CAL YR 1984 TOTAL 20300.8 MEAN 55.5 MAX 643 MIN 7.5 MEAN† 56.0 CFSM† 3.11 IN† 42.25
WTR YR 1985 TOTAL 8659.9 MEAN 23.7 MAX 529 MIN 5.0 MEAN† 25.2 CFSM† 1.40 IN† 19.01

† Diversion above station to Wild Creek basin, equivalent in cubic feet per second, furnished by the city of Bethlehem.

‡ Adjusted for diversion.

LEHIGH RIVER BASIN

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01447720 TOBYHANNA CREEK NEAR BLAKESLEE, PA

LOCATION.--Lat 41°05'05", long 75°36'21", Carbon County, Hydrologic Unit 02040106, on left bank 50 ft downstream from bridge on State Highway 940, 500 ft downstream from Shingle Mill Run, and 1.5 mi southwest of Blakeslee.

DRAINAGE AREA.--118 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1961 to current year.

GAGE.--Water-stage recorder. Datum of gage is 1,511.23 ft National Geodetic Vertical Datum of 1929. Prior to Jan. 16, 1962, nonrecording gage at site 50 ft upstream at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 10 to Feb. 16. Records good except periods of estimated daily discharges which are poor. Occasional regulation by Pocono Lake about 5.0 mi upstream and minor diversion from Tunkhannock Creek basin into Wild Creek basin.

AVERAGE DISCHARGE.--24 years, 261 ft³/s, 30.08 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 9,190 ft³/s Sept. 27, 1985, gage height, 12.33 ft, from rating curve extended above 9,200 ft³/s on basis of slope-area measurement at gage height 19.41 ft; minimum, 22 ft³/s Sept. 24, 25, 1964, gage height, 1.51 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Aug. 19, 1955, reached a stage of 19.41 ft, from floodmark, discharge, 35,300 ft³/s, by slope-area measurement.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,600 ft³/s and maximum (*).

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	2000	*9190	*12.33	No other peak greater than base discharge.			
Minimum discharge, 34 ft ³ /s Sept. 12, gage height, 1.98 ft.							

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	55	66	175	210	78	236	220	99	338	121	282	136
2	102	67	137	199	76	207	263	146	372	112	210	150
3	97	65	131	186	74	190	236	754	262	108	158	146
4	84	63	149	164	73	181	207	769	194	120	130	168
5	74	103	133	160	71	201	193	460	332	115	118	127
6	66	117	133	141	70	216	190	327	487	112	107	40
7	61	105	124	137	69	199	192	288	348	143	97	96
8	60	97	131	144	68	185	216	237	262	151	111	251
9	63	89	86	278	68	178	216	200	222	144	107	154
10	66	89	82	350	67	171	192	177	193	137	97	131
11	66	84	87	300	66	164	171	166	163	118	87	155
12	63	80	99	250	110	310	161	157	144	104	80	125
13	60	76	109	220	220	396	152	153	132	205	71	110
14	54	67	114	200	195	326	150	147	125	219	66	222
15	54	67	109	180	180	263	146	139	118	175	64	217
16	100	65	102	165	170	217	145	131	524	150	66	124
17	115	62	97	150	157	193	139	146	621	131	62	52
18	116	60	90	140	139	176	131	188	415	108	60	68
19	114	60	89	130	130	159	128	202	305	94	58	44
20	85	48	95	120	122	157	137	176	224	86	56	43
21	64	42	100	115	118	150	139	153	180	81	54	42
22	72	40	171	110	121	146	131	135	155	164	52	41
23	130	41	206	105	196	151	130	124	141	159	49	41
24	131	40	181	98	389	159	152	116	152	123	47	43
25	118	41	160	95	554	161	141	107	177	103	71	41
26	117	40	139	92	458	152	135	100	151	142	97	41
27	117	41	133	88	350	144	125	98	133	240	97	4920
28	110	44	145	86	275	140	115	189	123	209	84	4860
29	108	177	247	84	---	149	109	297	131	155	73	1900
30	86	217	303	81	---	155	103	239	128	125	68	1000
31	72	---	250	79	---	171	---	184	---	184	113	---
TOTAL	2680	2253	4307	4857	4664	6003	4865	6804	7252	4338	2892	15488
MEAN	86.5	75.1	139	157	167	194	162	219	242	140	93.3	516
MAX	131	217	303	350	554	396	263	769	621	240	282	4920
MIN	54	40	82	79	66	140	103	98	118	81	47	40
CFSM	.73	.64	1.18	1.33	1.42	1.64	1.37	1.86	2.05	1.19	.79	4.37
IN.	.84	.71	1.36	1.53	1.47	1.89	1.53	2.14	2.29	1.37	.91	4.88

CAL YR 1984	TOTAL	110831	MEAN	303	MAX	5540	MIN	40	CFSM	2.57	IN.	34.94
WTR YR 1985	TOTAL	66403	MEAN	182	MAX	4920	MIN	40	CFSM	1.54	IN.	20.93

LEHIGH RIVER BASIN

01447720 TOBYHANNA CREEK NEAR BLAKESLEE, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: June 1980 to current year.

INSTRUMENTATION.--Temperature recorder since June 1980

REMARKS.--Interruptions in the daily record were due to malfunction of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 27.0°C July 17-19, 1982; minimum, 0.0°C on many days during winter periods.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum, 24.5°C, July 16, Aug. 15; minimum, 0.5°C on many days during winter periods.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	12.0	11.0	11.5	12.0	11.5	11.5	5.0	4.0	4.0	4.5	3.5	4.0
2	11.5	10.5	11.0	12.5	10.0	12.0	4.0	3.0	3.5	5.0	3.5	4.5
3	12.0	9.5	11.0	9.5	7.5	8.5	4.0	3.0	3.5	3.5	2.0	2.5
4	12.5	10.5	11.5	9.5	8.0	8.5	3.0	2.0	2.5	3.0	2.0	2.0
5	12.0	9.5	11.0	11.5	10.0	10.5	2.5	1.5	2.0	2.0	1.0	1.5
6	11.0	8.5	10.0	11.0	9.0	10.0	2.0	.5	1.5	2.0	.5	1.0
7	11.0	8.0	10.0	9.0	7.5	8.0	1.0	.5	.5	2.5	1.5	2.0
8	12.5	10.5	11.5	7.5	5.5	6.5	.5	.5	.5	2.0	.5	1.0
9	14.5	12.0	13.0	8.0	6.5	7.0	1.0	.5	.5	.5	.5	.5
10	14.0	12.5	13.0	9.5	8.0	9.0	2.5	1.0	2.0	.5	.5	.5
11	14.5	12.5	13.5	10.0	8.0	9.0	3.0	2.5	3.0	.5	.5	.5
12	14.0	11.0	12.5	9.0	6.5	7.5	3.0	2.5	3.0	.5	.5	.5
13	13.5	11.5	12.5	6.0	4.5	5.5	4.5	3.0	3.5	.5	.5	.5
14	12.5	10.0	11.5	4.5	3.0	3.5	4.0	3.0	3.5	.5	.5	.5
15	12.0	9.5	11.0	5.5	2.5	4.0	4.0	3.0	3.5	.5	.5	.5
16	13.0	10.5	11.5	5.5	4.0	5.5	3.5	3.0	3.5	.5	.5	.5
17	12.5	11.0	12.0	4.0	3.0	3.5	5.0	3.5	4.5	.5	.5	.5
18	14.0	12.5	13.0	4.5	3.0	3.5	5.0	3.5	4.0	.5	.5	.5
19	14.0	12.5	13.0	4.0	2.0	3.5	4.0	3.0	3.0	.5	.5	.5
20	15.0	13.5	14.0	2.0	1.0	1.0	3.0	2.5	3.0	.5	.5	.5
21	14.0	12.0	13.0	1.5	.5	1.0	2.5	2.0	2.0	.5	.5	.5
22	15.0	13.5	14.0	2.0	.5	1.0	4.0	2.0	3.0	.5	.5	.5
23	14.0	13.0	13.5	1.5	.5	1.0	2.5	2.0	2.0	.5	.5	.5
24	13.0	12.5	13.0	2.5	1.0	1.5	3.0	1.5	2.0	.5	.5	.5
25	13.5	12.0	12.5	3.0	1.0	2.0	3.0	.5	2.0	.5	.5	.5
26	14.0	12.5	13.0	3.0	1.0	2.0	1.5	.5	1.0	.5	.5	.5
27	15.0	13.0	14.0	3.5	1.5	2.5	1.5	.5	.5	.5	.5	.5
28	16.0	14.0	15.0	7.5	3.5	5.5	3.0	1.0	2.0	.5	.5	.5
29	15.0	13.5	14.5	8.0	4.0	5.5	5.5	3.0	4.5	.5	.5	.5
30	13.5	11.5	12.5	4.0	3.0	3.5	5.0	3.0	4.0	.5	.5	.5
31	13.5	12.0	12.5	---	---	---	3.5	2.5	3.0	.5	.5	.5
MONTH	16.0	8.0	12.5	12.5	.5	5.5	5.5	.5	2.5	5.0	.5	1.0

LEHIGH RIVER BASIN
01447720 TOBYHANNA CREEK NEAR BLAKESLEE, PA--Continued

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TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	.5	.5	.5	4.0	2.0	3.0	6.5	5.5	6.0	14.5	12.5	13.5
2	.5	.5	.5	5.0	3.0	4.0	6.5	5.0	5.5	13.5	11.5	12.5
3	.5	.5	.5	4.5	2.5	3.5	5.0	4.5	5.0	12.5	10.0	11.5
4	.5	.5	.5	3.0	2.0	2.5	7.5	4.5	5.5	13.5	11.0	12.0
5	.5	.5	.5	5.0	3.0	4.0	10.5	5.5	7.5	13.0	12.0	12.5
6	.5	.5	.5	4.0	2.0	3.0	10.0	7.5	9.0	14.5	13.0	13.5
7	.5	.5	.5	3.5	2.0	3.0	9.0	7.0	7.5	14.5	12.0	13.0
8	.5	.5	.5	4.5	3.0	4.0	7.5	6.0	7.0	15.0	11.0	12.5
9	.5	.5	.5	5.5	3.0	4.0	7.5	5.5	6.0	15.5	10.5	13.0
10	.5	.5	.5	6.0	3.0	4.5	8.0	4.5	6.0	17.0	12.5	14.5
11	.5	.5	.5	5.0	3.5	4.5	6.5	5.5	6.0	18.5	13.5	16.0
12	.5	.5	.5	5.0	3.5	4.5	9.5	5.0	7.0	20.0	15.0	17.0
13	.5	.5	.5	5.0	3.5	4.0	10.0	7.0	8.5	21.0	16.5	18.0
14	1.5	.5	1.0	4.5	3.5	4.0	9.5	8.0	8.5	20.5	15.5	18.0
15	1.5	1.0	1.0	4.5	2.5	3.5	9.5	8.5	9.0	19.0	16.0	17.0
16	1.5	.5	1.0	4.5	2.0	3.5	12.0	9.0	10.0	16.0	15.5	15.5
17	2.0	1.0	1.5	4.5	3.0	3.5	10.5	7.5	9.0	17.0	15.0	16.0
18	2.0	1.0	1.5	4.0	1.5	2.5	11.5	7.5	9.5	16.5	14.5	15.5
19	2.5	1.0	1.5	4.0	1.0	2.5	12.5	10.0	11.0	16.0	13.5	14.5
20	2.0	1.0	1.5	5.5	3.0	4.0	14.0	10.5	12.0	18.5	14.0	16.0
21	2.5	1.0	1.5	4.5	2.0	3.0	15.5	11.5	13.5	19.5	15.5	17.0
22	3.5	2.0	3.0	5.0	2.0	3.5	16.0	12.0	14.0	18.5	14.5	16.5
23	4.5	3.0	3.5	5.0	3.5	4.5	16.5	13.0	14.5	16.0	14.5	15.5
24	4.5	3.0	3.5	5.0	4.0	4.5	14.5	12.5	13.0	18.5	13.5	16.0
25	4.0	3.0	3.5	6.0	3.5	4.5	12.5	12.0	12.5	20.0	14.5	17.0
26	3.5	3.0	3.0	6.0	2.5	4.0	15.0	11.5	13.0	20.5	15.0	18.0
27	4.0	2.0	3.5	7.5	3.0	5.5	15.0	11.5	13.0	21.0	16.0	18.5
28	3.5	1.5	2.5	8.5	6.0	7.5	12.5	11.0	12.0	17.5	16.5	17.0
29	---	---	---	11.0	7.5	9.0	14.0	10.5	12.0	19.0	16.5	17.5
30	---	---	---	8.5	7.5	8.0	15.5	11.0	13.0	19.0	16.5	17.5
31	---	---	---	7.5	6.0	6.5	---	---	---	17.5	16.5	17.0
MONTH	4.5	.5	1.5	11.0	1.0	4.5	16.5	4.5	9.5	21.0	10.0	15.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	19.0	16.5	17.5	20.0	16.5	18.0	22.0	19.0	20.0	19.5	17.5	18.5
2	20.0	17.0	18.0	19.0	17.0	18.0	21.0	18.5	20.0	21.0	17.5	19.0
3	20.5	17.5	18.5	20.5	17.0	18.5	22.0	17.5	19.5	21.5	18.0	19.5
4	21.0	17.0	19.0	21.5	16.5	19.0	22.5	17.5	20.0	22.0	18.5	20.0
5	18.5	16.0	17.0	22.5	17.5	20.0	22.0	17.5	20.0	22.5	19.5	21.0
6	18.5	16.5	17.5	21.0	19.5	20.0	21.5	18.0	20.0	22.5	20.0	21.5
7	18.5	16.0	17.0	21.0	18.5	19.5	22.0	19.0	20.5	23.5	20.0	21.5
8	18.0	17.0	17.5	19.0	17.0	18.0	23.0	19.5	21.0	22.5	21.0	22.0
9	19.0	16.5	17.5	21.5	18.5	20.0	24.0	19.5	21.5	22.0	21.0	21.5
10	21.0	16.5	18.0	21.5	18.5	20.0	24.0	20.0	22.0	21.5	20.0	20.5
11	19.0	16.0	17.5	22.0	18.0	20.0	22.5	20.0	21.5	20.5	19.5	20.0
12	18.5	16.5	17.5	21.5	17.5	19.5	22.5	18.0	20.5	19.0	16.0	18.0
13	16.5	15.0	15.5	23.0	18.5	21.0	22.0	17.5	20.0	17.0	13.5	15.0
14	16.5	14.0	15.0	23.0	21.0	22.0	24.0	20.5	22.0	18.5	16.0	17.0
15	18.0	13.0	15.5	22.5	21.0	21.5	24.5	21.5	23.0	18.0	15.5	16.5
16	16.5	14.5	16.0	24.5	20.5	22.0	24.0	20.5	21.5	17.0	15.5	16.0
17	17.5	16.0	16.5	24.0	19.5	21.5	22.0	17.5	20.0	16.5	13.5	15.0
18	19.0	17.0	17.5	23.5	19.5	21.5	21.5	18.0	19.0	17.0	14.0	15.5
19	18.5	16.5	17.5	23.5	19.5	21.5	21.5	18.5	19.5	17.0	14.5	16.0
20	18.5	16.0	17.0	23.5	20.0	22.0	21.0	19.5	20.5	17.5	15.0	16.5
21	19.0	15.5	17.0	22.5	20.0	21.5	20.0	17.5	18.5	17.5	15.5	16.5
22	20.0	15.5	17.5	23.5	20.5	21.5	19.5	17.5	18.5	17.0	16.0	16.5
23	21.5	17.5	19.0	23.0	19.5	21.0	19.0	16.0	17.5	17.0	16.5	17.0
24	21.0	17.5	19.0	23.0	17.5	20.5	18.5	16.0	17.0	18.0	16.5	17.0
25	20.5	16.0	18.0	23.5	19.5	21.5	18.0	17.0	17.5	17.0	15.0	15.5
26	17.5	16.0	16.5	22.0	20.5	21.0	21.0	18.0	19.5	15.0	13.5	14.0
27	17.5	15.0	16.5	23.5	20.0	22.5	21.5	19.5	20.5	15.5	15.0	15.0
28	16.5	15.5	16.0	23.5	20.0	21.5	21.0	17.5	19.5	15.0	14.5	14.5
29	18.5	15.5	16.5	23.0	20.0	21.5	20.5	17.5	19.0	15.0	13.5	14.5
30	19.5	16.0	17.5	23.5	20.0	21.5	20.0	18.0	19.0	15.0	13.5	14.5
31	---	---	---	22.0	19.0	20.0	18.5	17.5	18.0	---	---	---
MONTH	21.5	13.0	17.0	24.5	16.5	20.5	24.5	16.0	20.0	23.5	13.5	17.5

LEHIGH RIVER BASIN

01447800 LEHIGH RIVER BELOW FRANCIS E. WALTER LAKE NEAR WHITE HAVEN, PA

LOCATION.--Lat 41°06'17", long 75°43'57", Luzerne County, Hydrologic Unit 02040106, on right bank 0.7 mi downstream from Francis E. Walter Lake, 2.0 mi upstream from Fawn Run, and 4 mi northeast of White Haven.

DRAINAGE AREA.--290 mi².

PERIOD OF RECORD.--October 1957 to current year. Prior to October 1962 published as "below Bear Creek Reservoir," October 1962 to September 1971 published as "below Francis E. Walter Reservoir."

GAGE.--Water-stage recorder. Datum of gage is 1,212.95 ft above National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

REMARKS.--Estimated daily discharges during water year: Jan. 11-24 and Feb. 3-9. Records good, except for estimated daily discharges, which are poor. Flow regulated by Francis E. Walter Lake (station 01447780) 0.7 mi upstream since February 1961. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--28 years, 618 ft³/s, 28.92 in/yr, adjusted for storage since February 1961.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 13,800 ft³/s Dec. 21, 1957, gage height, 9.85 ft, from rating curve extended above 6,100 ft³/s; minimum, 1.3 ft³/s Nov. 14, 1961, result of shutoff at lake; minimum gage height, 1.86 ft Sept. 16, 1964; minimum daily discharge, 22 ft³/s July 20-23, 1965.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Aug. 1955 reached a discharge of 54,200 ft³/s based on slope-area measurement at site 4.9 mi downstream.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 8,620 ft³/s Sept. 28, gage height, 8.61 ft; minimum daily, 45 ft³/s May 21, 22, 24, 25.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	129	174	548	789	179	667	527	191	50	282	336	468
2	129	140	533	394	182	580	816	177	51	187	976	468
3	129	130	359	769	180	582	767	886	52	132	785	218
4	129	131	341	655	180	576	539	2130	52	121	782	55
5	129	162	398	475	180	503	430	2090	58	330	768	219
6	130	295	341	473	180	561	472	1790	68	476	120	438
7	130	327	289	394	179	602	629	1050	84	474	119	450
8	129	210	256	356	180	503	738	894	78	667	119	450
9	113	185	255	284	180	456	614	676	70	665	293	450
10	104	185	256	238	179	454	572	512	60	559	428	270
11	104	185	256	240	178	450	492	572	56	480	438	48
12	104	185	256	240	245	671	450	562	54	647	357	48
13	105	167	283	240	632	1050	450	399	54	546	78	48
14	107	151	330	240	707	900	447	49	90	861	57	48
15	107	151	358	240	577	753	379	51	200	1350	57	48
16	107	139	354	240	567	687	347	52	400	2530	57	237
17	107	131	285	239	547	673	385	54	800	2760	417	441
18	109	131	240	239	305	454	334	49	1700	1260	421	518
19	157	131	284	240	169	334	351	51	1200	533	336	611
20	415	131	321	240	238	411	460	51	800	334	165	621
21	196	114	297	240	329	394	385	45	500	119	182	637
22	153	102	306	240	349	339	280	45	350	119	182	637
23	164	102	736	240	295	294	281	46	350	119	254	494
24	184	102	778	240	1060	300	322	45	350	399	322	327
25	185	102	591	248	1830	579	406	45	350	434	324	325
26	185	102	449	242	1700	482	392	46	351	515	195	444
27	185	102	419	240	1150	306	445	47	326	500	66	2790
28	185	102	503	201	889	286	294	47	374	468	55	5110
29	185	236	512	183	---	357	268	48	464	468	155	8390
30	185	455	824	179	---	394	240	48	462	468	393	6570
31	185	---	1030	180	---	393	---	49	---	344	468	---
TOTAL	4665	4960	12988	9658	13566	15991	13512	12797	9854	19147	9705	31878
MEAN	150	165	419	312	485	516	450	413	328	618	313	1063
MAX	415	455	1030	789	1830	1050	816	2130	1700	2760	976	8390
MIN	104	102	240	179	169	286	240	45	50	119	55	48
MEAN†	151	173	416	306	485	519	445	983	324	637	270	1182
CFSM†	.52	.60	1.43	1.06	1.67	1.79	1.53	3.39	1.12	2.20	.93	4.08
IN†	.60	.67	1.65	1.22	1.74	2.06	1.71	3.91	1.25	2.53	1.07	4.55

CAL YR 1984 TOTAL 267606 MEAN 731 MAX 8050 MIN 84 MEAN† 731 CFSM† 2.52 IN† 34.23
WTR YR 1985 TOTAL 158721 MEAN 435 MAX 8390 MIN 45 MEAN† 491 CFSM† 1.69 IN† 22.99

† Adjusted for change in contents in Francis E. Walter Reservoir.

LEHIGH RIVER BASIN

67

01448500 DILLDOWN CREEK NEAR LONG POND, PA

LOCATION.--Lat 41°02'08", long 75°32'37", Monroe County, Hydrologic Unit 02040106, on left bank 60 ft upstream from bridge on Shucks Mill Road, 2.8 mi upstream from Mud Run, 4 mi northeast of Albrightsville, and 4.4 mi west of Long Pond.

DRAINAGE AREA.--2.39 mi².

PERIOD OF RECORD.--October 1948 to current year.

REVISED RECORDS.--WSP 1392: 1949(M), 1950-53.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 1,665.07 ft National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges in this water year: Jan. 17 to Feb. 11, Feb. 17-21. Records good, except periods of estimated daily discharges which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--37 years, 4.87 ft³/s, 27.69 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 630 ft³/s June 14, 1969, gage height, 3.995 ft, from rating curve extended above 300 ft³/s on basis of culvert and flow-over-dam computations of peak flow; minimum, 0.10 ft³/s Dec. 10, 1964, gage height, 0.55 ft m).

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 50 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1200	*304	*3.28	No other peak greater than base discharge			
Minimum discharge, 0.34 ft ³ /s Jan. 21, gage height 0.78 ft.							

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1.1	.65	.87	2.1	.94	2.9	5.1	1.8	4.0	1.4	1.8	.79
2	2.3	.91	.75	2.0	.93	2.8	3.6	4.7	2.0	1.4	1.2	.77
3	.96	.70	1.9	1.8	.92	2.6	2.8	18	1.7	1.5	1.1	.72
4	.87	.68	1.2	1.7	.92	2.6	3.0	6.7	1.6	1.6	1.0	.71
5	.83	1.9	.91	1.8	.91	4.0	2.9	4.9	5.5	1.3	1.0	.69
6	.81	.88	1.1	1.6	.90	2.9	3.4	4.5	3.1	2.3	.97	.69
7	.79	.72	.90	1.6	.90	2.6	3.0	4.8	1.9	2.1	1.1	.68
8	.78	.67	.86	1.6	.90	2.8	4.0	3.9	2.0	1.5	1.3	.77
9	.78	.65	.83	1.5	.90	2.7	3.2	3.5	1.9	2.3	.97	1.0
10	.75	.79	.98	1.5	.89	2.5	2.8	3.4	1.7	3.4	.92	2.8
11	.74	.68	1.2	1.5	.88	2.5	2.7	3.3	1.5	1.5	.94	.87
12	.72	.64	1.2	1.5	4.2	8.8	2.6	3.1	1.5	1.4	.89	.66
13	.71	.61	1.2	1.5	3.2	4.5	2.5	3.4	1.5	1.8	.87	.62
14	.71	.59	1.0	1.5	1.7	3.6	2.6	2.9	1.5	1.4	.87	.60
15	.68	.59	1.1	1.5	1.5	3.3	2.7	2.7	1.4	1.5	.84	.58
16	.66	.59	1.0	1.4	1.4	3.0	2.7	3.0	9.8	1.3	.99	.57
17	.66	.57	1.1	1.3	1.3	3.1	2.4	3.8	3.5	1.2	.88	.56
18	.67	.58	1.0	1.3	1.3	2.9	2.4	4.2	3.1	1.2	.87	.55
19	.69	.58	1.2	1.2	1.3	2.7	2.4	2.9	2.1	1.1	.87	.52
20	.78	.53	1.2	1.2	1.2	2.8	2.6	2.4	1.8	1.1	.84	.52
21	.68	.53	1.1	1.1	1.2	2.6	2.5	2.3	1.7	1.1	.81	.54
22	1.1	.53	3.7	1.1	1.6	2.6	2.3	2.1	1.6	2.6	.89	.60
23	1.2	.52	1.6	1.1	4.3	3.0	2.5	2.1	1.6	1.2	1.0	.58
24	.84	.54	1.5	1.1	5.8	3.0	3.4	1.9	2.9	1.1	.87	.60
25	.73	.53	1.4	1.0	5.7	2.7	2.5	1.8	2.1	1.1	1.5	.52
26	.91	.52	1.3	1.0	3.6	2.4	2.2	1.7	1.5	3.2	1.2	.54
27	.82	.52	1.4	1.0	3.4	2.5	2.1	1.7	1.5	2.6	.83	135
28	.72	.56	1.8	.98	2.9	2.5	2.0	2.7	1.6	1.2	.78	17
29	.86	3.8	3.5	.96	---	2.9	1.9	2.3	1.6	1.1	.76	5.5
30	.74	1.0	2.0	.95	---	2.7	1.8	1.8	1.4	1.1	.88	4.1
31	.67	---	1.7	.95	---	2.8	---	1.9	---	2.6	.88	---
TOTAL	26.26	23.56	42.50	42.34	55.59	95.3	82.6	110.2	70.6	51.2	30.62	180.65
MEAN	.85	.79	1.37	1.37	1.99	3.07	2.75	3.55	2.35	1.65	.99	6.02
MAX	2.3	3.8	3.7	2.1	5.8	8.8	5.1	18	9.8	3.4	1.8	135
MIN	.66	.52	.75	.95	.88	2.4	1.8	1.7	1.4	1.1	.76	.52
CFSM	.36	.33	.57	.57	.83	1.28	1.15	1.49	.98	.69	.41	2.52
IN.	.41	.37	.66	.87	1.48	1.29	1.72	1.10	.80	.48	2.81	---
CAL YR 1984	TOTAL	1874.00	MEAN	5.12	MAX	146	MIN	.52	CFSM	2.14	IN.	29.17
WTR YR 1985	TOTAL	811.42	MEAN	2.22	MAX	135	MIN	.52	CFSM	.93	IN.	12.63

LEHIGH RIVER BASIN

01449000 LEHIGH RIVER AT LEHIGHTON, PA.

LOCATION.--Lat 40°49'45", long 75°42'20", Carbon County, Hydrologic Unit 02040106, on left bank 190 ft downstream of highway bridge at East Weissport, 0.3 mi upstream from Mahoning Creek.

DRAINAGE AREA.--591 mi².

PERIOD OF RECORD.--December 1982 to current year. Daily gage height records, previously referred to as continuous records for water years 1946-1948. Miscellaneous measurements 1977-1978, 1980-1981, and annual maximum 1982.

GAGE.--Water-stage recorder. Datum of gage is 444.26 ft above National Geodetic Vertical Datum of 1929. Prior to December 1982, nonrecording gage at highway bridge 190 ft upstream at same datum. Prior to August 1970, daily discharge station at this same site at datum 2.0 ft higher.

REMARKS.--Estimated daily discharges during water year: Oct. 1-2, Nov. 20-27, Jan. 11 to Feb. 11, Sept. 27-30. Records good, except for periods of estimated daily discharges which are poor. Flow regulated by Francis E. Walter Lake (station 01447780) since February 1961. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 25,500 ft³/s Sept. 27, 1985, gage height, 18.22 ft, from rating curve extended above 16,000 ft³/s; minimum, 147 ft³/s Sept. 15, 1983, and Oct. 8, 9, 1984, gage height, 1.40 ft.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 25,500 ft³/s, Sept. 27, gage height, 18.22 ft; minimum, 164 ft³/s Sept. 16, 17, gage height, 1.46 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	260	302	801	1520	350	1450	1060	524	508	712	1130	642
2	360	291	752	863	350	1220	1300	487	464	480	1310	632
3	310	262	733	1200	340	1170	1450	2180	380	424	1060	622
4	272	246	537	1220	340	1130	1230	3440	346	412	1020	271
5	262	323	622	970	330	1150	956	3140	449	368	967	192
6	258	402	643	896	330	1060	1000	2850	715	626	360	446
7	255	513	540	863	320	1110	997	2040	479	923	313	575
8	255	423	465	749	320	1080	1380	1760	604	804	344	603
9	257	326	444	665	320	952	1220	1510	467	968	458	608
10	241	318	441	548	310	920	1080	1160	385	918	589	629
11	230	323	450	530	310	904	1050	1220	347	807	613	320
12	227	319	474	510	776	1190	919	1170	330	712	604	198
13	227	308	481	500	1660	1840	908	1100	320	1220	307	179
14	225	279	524	490	1770	1640	900	575	575	1510	253	171
15	223	267	573	480	1210	1430	880	509	662	2490	239	168
16	222	265	578	470	1140	1270	773	495	1340	3290	249	166
17	220	248	568	460	1100	1240	762	522	1820	2060	461	447
18	221	241	453	450	1080	1140	787	600	2630	851	601	558
19	225	240	447	440	656	811	675	553	1860	706	595	714
20	451	240	552	430	636	834	841	485	1120	417	336	740
21	385	230	527	430	645	910	855	442	798	308	325	758
22	333	220	794	420	798	796	664	411	830	344	327	762
23	355	210	875	410	870	749	626	392	836	337	322	760
24	335	210	1370	400	1460	757	624	384	818	664	436	478
25	324	200	976	390	2710	815	756	369	750	604	534	444
26	322	200	900	380	2710	1110	703	353	653	792	557	441
27	338	200	713	380	2070	742	813	344	627	806	332	1300
28	326	204	843	370	1730	681	633	351	580	705	228	3500
29	325	535	1010	370	---	729	595	463	716	670	202	10000
30	312	737	1220	360	---	824	531	389	743	647	358	8000
31	309	---	1550	350	---	831	---	351	---	607	640	---
TOTAL	8865	9082	21856	18514	26641	32485	26968	30569	23152	27182	16070	35324
MEAN	286	303	705	597	951	1048	899	986	772	877	518	1177
MAX	451	737	1550	1520	2710	1840	1450	3440	2630	3290	1310	10000
MIN	220	200	441	350	310	681	531	344	320	308	202	166
CAL YR 1984	TOTAL	527153	MEAN	1440	MAX	10500	MIN	200				
WTR YR 1985	TOTAL	276708	MEAN	758	MAX	10000	MIN	166				

LEHIGH RIVER BASIN

69

01449360 POHOPOCO CREEK AT KRESGEVILLE, PA

LOCATION.--Lat 40°53'51", long 75°30'10", Monroe County, Hydrologic Unit 02040106, on right bank 20 ft downstream from bridge on U.S. Highway 209 at Kresgeville, 0.2 mi downstream from Middle Creek, and 13 mi northeast of Lehighon.

DRAINAGE AREA.--49.9 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1966 to current year.

GAGE.--Water-stage recorder. Datum of gage is 659.72 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during the water year: Oct. 5-21, Oct. 29 to Nov. 4, Nov. 9-28, Jan. 10 to Feb. 11, Feb. 19-22. Records good, except periods of estimated daily discharge which are poor.

AVERAGE DISCHARGE.--19 years, 105 ft³/s, 28.55 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 2,080 ft³/s July 29, 1969, gage height, 9.21 ft, from rating curve extended above 800 ft³/s; minimum, 9.2 ft³/s Sept. 7, 1985, gage height, 2.70 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 500 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1600	*1260	*7.39	No other peak above base discharge.			

Minimum discharge, 9.2 ft³/s Sept. 7, gage height, 2.70 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	33	25	33	85	29	71	75	37	67	29	24	16
2	42	25	30	96	28	70	58	60	42	28	20	16
3	32	25	138	81	28	65	55	234	45	29	19	16
4	30	25	82	65	27	62	55	129	44	31	18	15
5	28	40	39	65	27	75	53	111	57	27	18	14
6	27	39	49	60	26	65	54	101	51	28	17	13
7	26	32	46	60	26	58	53	98	41	32	17	13
8	25	30	38	58	26	60	56	86	42	27	20	14
9	25	28	35	51	25	58	54	79	41	28	18	14
10	24	27	34	50	25	55	50	75	39	25	17	21
11	24	26	36	46	25	53	49	71	36	25	17	18
12	24	26	38	46	85	85	49	67	35	24	16	16
13	23	25	35	45	111	72	48	70	34	29	16	15
14	23	24	34	43	69	65	47	63	33	25	15	14
15	23	24	36	42	58	63	48	59	33	26	15	14
16	23	24	35	42	52	61	48	59	85	24	15	14
17	23	23	35	41	48	62	45	71	51	21	16	14
18	23	23	34	40	46	60	44	80	43	21	15	14
19	23	22	36	39	45	57	44	60	38	20	15	13
20	23	22	41	38	43	59	44	55	36	20	15	13
21	25	22	85	37	42	57	42	53	34	20	15	13
22	53	21	361	36	48	54	41	50	32	23	14	13
23	50	21	169	35	76	59	42	48	32	20	14	13
24	31	21	88	34	88	58	45	47	35	19	14	14
25	29	20	75	33	89	56	42	45	37	19	24	14
26	28	20	63	33	83	52	41	44	31	25	22	14
27	29	20	61	32	82	50	40	43	30	28	18	851
28	28	20	62	31	75	50	39	45	31	21	16	554
29	27	216	93	31	---	51	38	44	32	20	15	205
30	26	50	114	30	---	49	37	40	30	19	15	135
31	26	---	85	29	---	54	---	40	---	22	18	---
TOTAL	876	966	2140	1456	1432	1866	1436	2164	1217	755	528	2123
MEAN	28.3	32.2	69.0	47.0	51.1	60.2	47.9	69.8	40.6	24.4	17.0	70.8
MAX	53	216	361	96	111	85	75	234	85	32	24	851
MIN	23	20	30	29	25	49	37	37	30	19	14	13
CFSM	.57	.65	1.38	.94	1.02	1.21	.96	1.40	.81	.49	.34	1.42
IN.	.65	.72	1.60	1.09	1.07	1.39	1.07	1.61	.91	.56	.39	1.58

CAL YR 1984	TOTAL	40011	MEAN	109	MAX	1180	MIN	20	CFSM	2.18	IN.	29.83
WTR YR 1985	TOTAL	16961	MEAN	46.5	MAX	851	MIN	13	CFSM	.93	IN.	12.64

LEHIGH RIVER BASIN

0144936C PCHOPOCO CREEK AT KRESGEVILLE, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: October 1968 to September 1970, May 1971 to current year.

INSTRUMENTATION.--Temperature recorder October 1970, May 1971 to current year.

REMARKS.--Interruptions in the daily record were due to malfunction of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 31.5°C July 25, 1970; minimum, freezing point on several days during winter periods.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum 23.5°C Aug. 15; minimum, 1.0°C many days during winter period.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	12.0	11.0	11.5	14.0	13.0	13.5	6.5	5.5	6.0	6.5	3.5	5.0
2	11.5	11.0	11.5	13.5	12.0	13.0	6.0	5.5	5.5	7.0	6.5	7.0
3	10.5	9.5	10.0	11.5	9.0	10.0	5.5	5.0	5.0	6.5	4.5	5.0
4	12.0	10.5	11.0	9.5	8.5	9.0	5.5	3.5	4.5	4.5	3.5	4.0
5	11.5	10.5	11.0	13.0	9.5	11.5	3.5	3.0	3.5	3.5	3.0	3.0
6	11.0	9.5	10.0	13.0	11.0	12.0	3.0	2.5	2.5	3.0	2.0	2.5
7	9.5	8.0	9.0	11.0	8.5	9.5	3.0	2.0	2.5	4.0	2.5	3.0
8	12.0	9.5	10.5	8.0	7.5	7.5	2.0	2.0	2.0	4.0	3.0	3.5
9	15.0	11.5	13.0	8.0	7.5	7.5	2.5	2.0	2.5	2.5	2.0	2.0
10	14.5	13.5	14.0	11.0	8.0	9.5	4.0	2.5	3.0	2.0	1.5	2.0
11	15.0	13.5	14.0	11.0	10.0	10.5	5.5	4.0	4.5	1.5	1.5	1.5
12	14.5	12.5	13.5	10.5	9.0	10.0	5.5	5.5	5.5	1.5	1.0	1.0
13	14.0	12.5	13.5	9.0	7.5	8.5	7.0	5.5	6.0	1.0	1.0	1.0
14	14.0	12.5	13.0	7.5	6.5	6.5	7.0	6.5	6.5	1.0	.5	1.0
15	13.0	11.5	12.0	6.5	6.5	6.5	6.5	6.0	6.0	1.0	1.0	1.0
16	12.5	11.0	11.5	7.5	6.5	7.0	6.5	6.0	6.5	1.0	.5	.5
17	12.0	11.0	11.5	7.5	7.0	7.0	8.0	6.5	7.5	.5	.5	.5
18	14.5	11.5	13.0	7.0	6.5	6.5	8.0	6.5	7.0	.5	.5	.5
19	14.5	14.0	14.0	6.5	6.5	6.5	7.0	5.0	5.5	1.0	.5	1.0
20	16.0	14.0	15.0	6.5	5.0	6.0	5.0	4.5	5.0	1.0	.5	.5
21	15.0	14.0	14.5	5.0	5.0	5.0	4.5	4.0	4.0	.5	.5	.5
22	16.5	14.5	15.5	5.0	4.5	4.5	6.0	4.0	5.0	.5	.0	.5
23	16.0	15.0	15.5	4.5	4.5	4.5	6.0	4.0	4.5	.5	.0	.0
24	14.5	13.5	14.0	4.5	4.0	4.5	4.0	3.0	3.5	.5	.0	.5
25	13.5	12.5	13.5	5.0	4.5	5.0	4.5	3.5	4.0	.5	.5	.5
26	14.5	13.0	14.0	5.5	5.0	5.0	3.0	2.0	2.5	1.0	.5	.5
27	16.5	14.0	15.5	6.0	5.0	5.5	2.5	1.5	2.0	1.0	.5	.5
28	17.5	16.5	17.0	9.5	4.5	7.0	4.0	1.5	3.0	1.0	.5	.5
29	17.5	16.0	17.0	9.5	7.5	9.0	8.0	4.0	5.5	1.0	.5	1.0
30	15.5	13.5	14.0	7.5	6.0	6.0	8.5	6.0	8.0	1.5	.5	1.0
31	15.0	13.5	14.0	---	---	---	6.0	3.5	4.0	1.0	.5	1.0
MONTH	17.5	8.0	13.0	14.0	4.0	8.0	8.5	1.5	4.5	7.0	.0	1.5

01449360 POHOPOCO CREEK AT KRESGEVILLE, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	1.0	.5	.5	5.0	2.5	4.0	7.5	6.5	7.0	14.0	10.0	12.0
2	1.0	1.0	1.0	7.5	4.0	5.5	7.5	5.5	6.5	10.5	8.5	10.0
3	1.5	1.0	1.0	6.5	4.0	5.5	6.5	4.5	5.0	13.0	8.5	11.0
4	1.0	.5	.5	5.0	2.5	3.5	9.0	4.5	7.0	13.5	9.5	12.0
5	.5	.0	.0	7.0	2.5	4.5	13.5	7.5	10.5	14.5	12.5	13.5
6	.5	.0	.5	5.5	3.0	4.0	13.5	11.0	12.0	13.5	12.0	12.5
7	.5	.5	.5	3.5	2.0	3.0	10.5	8.5	9.5	13.5	10.0	11.5
8	.5	.5	.5	6.0	3.5	4.5	9.0	7.5	8.0	13.5	8.5	11.0
9	.5	.0	.5	7.5	5.0	6.5	7.5	5.5	6.5	16.0	11.5	14.0
10	.5	.5	.5	7.5	4.0	6.0	8.0	4.0	6.0	---	---	---
11	1.0	.5	.5	6.5	4.5	5.5	7.0	5.0	6.0	---	---	---
12	2.0	1.0	1.5	7.5	6.5	7.0	11.0	5.5	8.5	---	---	---
13	1.0	.5	1.0	9.0	5.5	7.5	12.5	9.0	11.0	---	---	---
14	2.0	1.0	1.5	8.5	6.5	7.5	10.5	9.0	10.0	---	---	---
15	2.0	1.0	1.5	6.5	5.0	5.5	10.5	10.0	10.0	---	---	---
16	2.0	1.0	1.5	6.5	3.0	5.0	14.5	10.0	12.5	---	---	---
17	2.0	1.0	1.5	7.5	5.0	6.0	13.0	9.5	11.0	14.0	12.5	13.5
18	2.5	1.0	2.0	5.5	3.0	4.5	13.5	8.0	11.0	14.5	12.5	13.5
19	4.0	1.5	2.5	5.5	2.5	4.0	16.0	11.5	14.0	13.0	11.0	12.0
20	3.5	1.5	2.5	7.0	4.5	6.0	17.0	13.5	15.0	15.5	11.0	13.5
21	3.5	1.0	2.5	6.5	4.0	5.5	19.0	13.0	16.0	16.0	14.0	15.0
22	5.5	3.5	4.5	6.5	3.0	5.0	19.0	14.5	16.5	16.0	13.5	15.0
23	7.5	5.0	6.0	7.0	5.5	6.5	18.5	14.5	16.5	15.0	12.5	13.0
24	8.5	4.5	6.5	7.0	6.5	7.0	14.0	10.5	12.0	15.0	11.5	13.5
25	8.5	7.0	8.0	8.5	5.5	7.0	12.0	10.5	11.5	16.0	12.5	14.5
26	7.0	5.5	6.0	8.5	4.5	6.5	17.0	11.0	14.5	17.0	13.5	16.0
27	8.0	6.0	6.5	10.0	4.5	7.5	17.0	13.0	15.0	18.5	15.5	17.5
28	5.5	2.5	4.0	12.5	9.0	11.0	12.5	10.5	12.0	16.5	14.5	16.0
29	---	---	---	15.0	11.0	13.0	16.0	10.0	13.5	16.5	13.5	15.0
30	---	---	---	13.5	10.5	11.5	17.5	11.0	15.0	15.5	13.0	14.5
31	---	---	---	10.5	7.0	8.5	---	---	---	15.0	14.0	14.5
MONTH	8.5	.0	2.5	15.0	2.0	6.5	19.0	4.0	11.0	18.5	8.5	13.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	17.5	14.5	16.0	17.0	15.5	16.5	20.0	16.0	17.5	16.0	15.0	15.5
2	17.0	14.0	16.0	17.0	15.5	16.0	18.0	15.5	17.0	17.5	15.5	16.5
3	17.0	15.0	16.5	18.5	16.0	17.0	18.0	15.0	16.5	19.0	16.5	18.0
4	17.0	15.0	15.5	19.5	16.0	17.5	18.5	15.5	17.0	21.0	17.5	19.0
5	16.0	13.5	14.5	20.5	17.0	18.5	19.0	15.5	17.5	21.5	19.0	20.5
6	16.5	13.0	14.5	20.0	18.0	19.0	18.5	16.0	17.0	21.5	19.5	20.5
7	15.5	13.0	14.5	20.0	17.5	18.5	19.5	16.5	18.0	21.5	19.5	20.5
8	15.0	14.0	14.5	18.0	16.5	17.0	20.5	17.5	19.0	20.5	19.5	20.0
9	16.0	13.5	14.5	20.0	16.0	18.0	21.5	18.0	20.0	20.0	19.0	19.5
10	19.0	15.0	17.0	20.5	17.5	19.0	21.0	18.0	19.5	19.5	18.0	18.5
11	17.0	15.0	15.5	21.0	17.5	19.0	20.5	18.0	19.5	18.0	15.0	17.0
12	17.5	15.0	16.0	20.0	17.0	18.5	20.5	16.5	19.0	14.5	12.5	13.0
13	15.5	13.5	14.5	20.5	17.0	18.5	20.0	16.0	18.5	12.5	11.5	12.0
14	14.5	12.0	13.5	21.0	18.0	19.5	22.5	18.0	20.5	12.5	11.0	12.0
15	15.5	11.5	13.5	20.5	18.5	19.5	23.5	20.5	22.0	12.5	10.5	11.5
16	16.0	14.0	14.5	22.0	19.0	20.0	22.0	19.0	20.5	13.0	11.0	12.0
17	17.0	14.0	15.5	21.5	17.5	19.5	20.0	16.5	18.5	13.5	11.0	12.5
18	17.0	15.5	16.5	20.5	16.5	18.5	18.5	16.5	17.0	14.0	12.0	13.0
19	17.5	15.5	16.5	20.5	16.5	18.5	18.5	16.5	17.5	15.5	13.0	14.0
20	16.5	14.5	16.0	21.5	17.5	19.5	19.0	17.5	18.0	16.0	14.0	15.0
21	16.5	14.0	15.5	21.5	18.0	20.0	18.0	16.5	17.0	16.0	14.5	15.5
22	17.0	14.5	15.5	22.0	19.5	21.0	17.0	16.0	16.5	16.5	15.0	16.0
23	19.5	16.5	17.5	20.0	17.0	18.5	16.5	14.5	15.5	16.0	16.0	16.0
24	19.0	17.0	18.0	19.0	15.0	17.0	16.5	14.0	15.5	17.0	15.5	16.0
25	17.5	15.0	16.5	20.0	16.0	18.0	16.5	15.5	16.0	15.5	14.0	14.5
26	16.0	15.0	15.5	19.0	18.5	18.5	18.5	16.0	17.0	15.5	12.0	13.0
27	15.0	14.0	14.5	21.0	17.5	19.5	20.0	17.5	18.5	16.0	15.0	15.5
28	14.5	13.5	13.5	20.5	17.0	18.5	19.0	16.5	17.5	14.5	13.5	14.0
29	16.5	13.0	15.0	20.0	16.5	18.0	19.0	16.5	17.5	13.5	12.0	13.0
30	17.5	15.0	16.0	21.0	16.5	18.5	17.5	17.0	17.0	13.0	11.5	12.5
31	---	---	---	19.0	17.0	17.5	16.5	16.0	16.0	---	---	---
MONTH	19.5	11.5	15.5	22.0	15.0	18.5	23.5	14.0	18.0	21.5	10.5	15.5

LEHIGH RIVER BASIN

01449800 POHOPOCO CREEK BELOW BELTZVILLE DAM NEAR PARRYVILLE, PA

LOCATION.--Lat 40°50'44", long 75°38'46", Carbon County, Hydrologic Unit 02040106, on right bank 0.1 mi upstream from Sawmill Run, 0.45 mi downstream from Beltzville Dam, 1.3 mi upstream from Bull Run, and 2.3 mi northeast of Parryville.

DRAINAGE AREA.--96.4 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1967 to current year.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 492.05 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--No estimated daily discharges during water year. Records good. Flow regulated by Wild Creek Reservoir (station 01449700) and Penn Forest Reservoir (station 01449400), 7.3 mi and 10.0 mi upstream, respectively, and Beltzville Lake (station 01449790), 0.45 mi upstream. Figures of daily discharge do not include diversion from Wild Creek Reservoir to city of Bethlehem. Diversion from Tunkhannock Creek to Wild Creek basin above station since October 1969.

AVERAGE DISCHARGE.--18 years, 200 ft³/s, 28.15 in/yr, adjusted for storage and diversion 1968-1981.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 1,740 ft³/s May 8, 1973, gage height, 5.59 ft; minimum, 0.90 ft³/s Oct. 11, 12, 1969, gage height, 2.12 ft, result of upstream shutoff.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 1,530 ft³/s Sept. 27, gage height, 5.34 ft; minimum daily, 14 ft³/s July 25, Aug. 11, 14.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	40	38	35	80	36	90	138	32	93	45	28	16
2	40	38	35	108	36	90	116	31	92	50	32	16
3	40	38	35	111	36	90	70	131	68	50	32	16
4	40	38	35	95	65	120	74	211	46	50	32	16
5	40	38	35	95	60	135	80	211	40	50	23	16
6	40	38	35	95	50	92	80	211	52	50	19	16
7	40	38	35	95	50	73	80	190	58	50	17	16
8	40	38	35	75	41	81	92	103	58	50	15	16
9	40	38	35	66	37	92	86	123	58	43	15	16
10	20	38	35	66	38	92	80	123	58	38	15	16
11	41	38	35	66	38	92	80	123	58	38	14	24
12	38	38	35	66	38	94	79	123	58	33	15	35
13	38	38	35	66	94	124	77	79	46	29	15	24
14	38	38	35	66	129	109	77	59	40	29	14	18
15	38	38	35	66	113	85	67	58	40	29	16	18
16	38	38	35	66	87	80	60	58	41	29	16	18
17	38	38	35	66	87	80	60	74	98	29	16	17
18	38	38	35	66	87	90	60	95	123	29	16	16
19	38	38	35	66	87	96	60	95	91	22	16	15
20	38	38	35	66	73	83	60	95	51	30	16	15
21	38	38	35	50	62	77	60	95	28	30	16	15
22	38	38	36	40	62	77	73	95	22	18	16	15
23	38	38	35	40	62	77	80	81	22	17	16	15
24	38	38	35	39	62	77	80	56	22	15	16	15
25	38	38	35	53	127	119	80	45	22	14	16	15
26	38	38	35	60	162	99	68	45	22	23	16	15
27	38	38	35	60	162	64	60	45	22	23	16	549
28	38	36	57	60	119	56	60	45	28	23	16	889
29	38	35	92	45	---	75	51	65	35	23	16	934
30	38	35	92	37	---	84	37	75	35	23	16	344
31	38	---	92	36	---	84	---	83	---	23	16	---
TOTAL	1181	1132	1279	2066	2100	2777	2225	2955	1527	1005	558	3166
MEAN	38.1	37.7	41.3	66.6	75.0	89.6	74.2	95.3	50.9	32.4	18.0	106
MAX	41	38	92	111	162	135	138	211	123	50	32	934
MIN	20	35	35	36	36	56	37	31	22	14	14	15
CAL YR 1984	TOTAL	67595	MEAN	185	MAX	1450	MIN	20				
WTR YR 1985	TOTAL	21971	MEAN	60.2	MAX	934	MIN	14				

LEHIGH RIVER BASIN

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01449800 POHOPOCO CREEK BELOW BELTZVILLE DAM NEAR PARRYVILLE, PA-Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: October 1968 to current year.

INSTRUMENTATION.--Temperature recorder October 1968 to current year.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 26.5°C on several days during July, August 1970; minimum, freezing point December 9, 1969.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum, 23.0°C July 24; minimum, 1.5°C, Jan. 24-Feb. 11.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	---	---	---	15.0	14.5	14.5	9.0	8.5	9.0	5.5	5.5	5.5
2	---	---	---	15.0	14.0	14.5	9.0	8.5	9.0	5.5	5.5	5.5
3	15.5	14.5	15.0	14.5	14.0	14.0	8.5	8.5	8.5	5.5	5.0	5.5
4	16.0	15.0	15.0	14.5	14.0	14.0	8.5	8.0	8.0	5.0	5.0	5.0
5	16.0	15.0	15.0	15.0	14.0	14.5	8.0	7.5	8.0	5.0	5.0	5.0
6	16.0	14.5	15.0	14.0	13.5	14.0	8.0	7.0	7.5	5.0	5.0	5.0
7	15.5	14.5	15.0	14.0	13.5	13.5	7.5	7.5	7.5	5.0	5.0	5.0
8	15.5	15.0	15.0	13.5	13.0	13.5	7.5	7.0	7.5	5.0	4.5	4.5
9	16.0	15.0	15.5	13.5	13.0	13.5	7.5	7.0	7.0	4.5	4.0	4.5
10	16.0	13.5	15.0	13.5	13.0	13.5	7.0	7.0	7.0	4.0	4.0	4.0
11	16.0	14.5	15.0	13.5	13.0	13.0	7.0	7.0	7.0	4.0	4.0	4.0
12	16.0	14.5	15.0	13.0	12.5	12.5	7.0	6.5	7.0	3.5	3.5	3.5
13	16.0	14.5	15.0	12.5	12.0	12.5	7.0	6.5	6.5	3.5	3.5	3.5
14	15.5	14.5	15.0	12.0	11.5	12.0	7.0	7.0	7.0	3.5	3.5	3.5
15	15.5	14.5	15.0	12.0	11.5	12.0	7.0	7.0	7.0	3.5	3.5	3.5
16	15.5	14.5	15.0	12.0	11.0	11.5	7.0	6.5	7.0	3.0	3.0	3.0
17	15.0	14.5	15.0	11.0	11.0	11.0	7.0	6.5	6.5	3.0	3.0	3.0
18	15.5	15.0	15.0	11.0	11.0	11.0	7.0	6.5	6.5	3.0	3.0	3.0
19	15.0	15.0	15.0	11.0	10.5	11.0	6.5	6.5	6.5	3.0	3.0	3.0
20	15.5	14.5	15.0	10.5	10.0	10.0	6.5	6.0	6.5	3.0	2.5	2.5
21	15.0	14.5	15.0	10.0	10.0	10.0	6.0	6.0	6.0	2.5	2.0	2.0
22	15.5	14.5	15.0	10.0	9.5	10.0	6.5	6.0	6.5	2.0	2.0	2.0
23	15.0	14.0	14.5	9.5	9.5	9.5	6.0	6.0	6.0	2.0	2.0	2.0
24	15.0	14.5	14.5	9.5	9.5	9.5	6.0	6.0	6.0	2.0	1.5	2.0
25	15.5	14.5	14.5	9.5	9.0	9.5	6.0	5.5	6.0	1.5	1.5	1.5
26	15.0	14.5	15.0	9.5	9.0	9.0	5.5	5.5	5.5	1.5	1.5	1.5
27	15.5	15.0	15.0	9.5	9.0	9.0	5.5	4.5	5.0	1.5	1.5	1.5
28	15.5	14.5	15.0	9.5	9.0	9.5	5.5	5.0	5.5	1.5	1.5	1.5
29	15.0	14.5	15.0	9.5	9.0	9.0	5.5	5.5	5.5	2.0	1.5	1.5
30	15.0	14.5	14.5	9.0	8.5	9.0	5.5	5.5	5.5	2.0	1.5	1.5
31	15.0	14.5	14.5	---	---	---	5.5	5.5	5.5	1.5	1.5	1.5
MONTH	16.0	13.5	15.0	15.0	8.5	11.5	9.0	4.5	7.0	5.5	1.5	3.0

LEHIGH RIVER BASIN

01449800 POHOPOCO CREEK BELOW BELTZVILLE DAN NEAR PARRYVILLE, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		FEBRUARY			MARCH			APRIL			MAY	
1	1.5	1.5	1.5	3.0	2.5	2.5	5.5	5.5	5.5	9.5	7.5	8.0
2	1.5	1.5	1.5	3.0	3.0	3.0	5.5	5.5	5.5	9.0	7.5	8.0
3	2.0	1.5	1.5	3.0	2.5	3.0	5.5	5.5	5.5	10.0	8.0	9.0
4	1.5	1.5	1.5	3.0	2.5	2.5	6.0	5.5	5.5	8.5	8.0	8.0
5	1.5	1.5	1.5	3.0	2.5	2.5	6.5	5.5	5.5	8.0	7.5	8.0
6	2.0	1.5	2.0	3.0	2.5	2.5	6.5	5.5	5.5	9.0	7.0	8.0
7	2.0	1.5	2.0	3.0	2.5	2.5	6.5	5.5	6.0	7.5	7.0	7.0
8	1.5	1.5	1.5	3.0	3.0	3.0	6.0	5.5	6.0	12.5	7.0	8.5
9	2.0	1.5	1.5	3.5	3.0	3.0	6.0	5.5	6.0	10.0	9.0	9.5
10	2.5	1.5	2.0	3.5	3.0	3.0	6.5	5.5	6.0	10.0	9.0	9.5
11	2.5	1.5	2.0	3.0	3.0	3.0	6.0	5.5	6.0	10.5	9.0	10.0
12	2.0	2.0	2.0	3.5	3.0	3.5	7.0	6.0	6.0	10.5	9.5	9.5
13	2.0	2.0	2.0	3.5	3.5	3.5	7.5	6.0	6.5	11.0	9.5	10.0
14	2.0	2.0	2.0	4.0	3.5	3.5	7.0	6.5	7.0	11.0	9.5	10.0
15	2.0	2.0	2.0	4.0	3.5	3.5	6.5	6.5	6.5	11.0	9.5	10.0
16	2.0	2.0	2.0	4.0	3.5	3.5	7.5	6.5	6.5	10.0	9.5	10.0
17	2.0	2.0	2.0	4.0	3.5	4.0	8.0	6.0	7.0	10.5	10.0	10.0
18	2.0	2.0	2.0	4.0	3.5	3.5	7.5	6.0	6.5	10.5	9.5	10.0
19	2.5	2.0	2.0	4.0	3.5	3.5	8.5	6.5	7.0	11.0	9.5	10.0
20	2.5	2.0	2.5	4.5	3.5	4.0	8.5	7.0	7.5	11.0	10.0	10.0
21	2.5	2.0	2.5	4.0	3.5	4.0	8.5	7.0	7.5	11.0	10.0	10.5
22	3.0	2.5	2.5	4.5	3.5	4.0	8.5	7.0	7.5	11.0	10.0	10.5
23	3.0	2.5	2.5	4.0	4.0	4.0	8.5	7.0	7.5	10.5	10.0	10.0
24	3.0	2.5	2.5	4.0	4.0	4.0	7.5	7.0	7.0	12.0	10.0	10.5
25	2.5	2.5	2.5	4.5	4.0	4.0	7.0	7.0	7.0	12.0	10.0	10.5
26	2.5	2.5	2.5	5.0	4.0	4.5	8.5	7.0	7.5	12.0	10.0	10.5
27	2.5	2.5	2.5	5.5	4.0	4.5	9.0	7.5	8.0	12.0	10.0	11.0
28	2.5	2.5	2.5	5.5	4.5	4.5	7.5	7.0	7.5	12.0	10.5	11.0
29	---	---	---	5.5	4.5	5.0	9.5	7.0	8.0	11.5	10.0	10.5
30	---	---	---	6.0	4.5	5.0	10.5	7.0	8.0	11.5	10.0	10.5
31	---	---	---	5.5	5.5	5.5	---	---	---	11.0	10.5	11.0
MONTH	3.0	1.5	2.0	6.0	2.5	3.5	10.5	5.5	6.5	12.5	7.0	9.5
DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
1	12.0	10.5	11.0	18.0	16.0	16.5	15.5	13.0	13.5	15.0	12.5	13.0
2	12.0	11.0	11.0	17.0	16.0	16.5	14.5	13.0	13.5	16.0	12.5	13.5
3	12.0	11.0	11.5	17.0	12.5	14.5	15.0	13.0	13.5	15.5	12.5	13.5
4	12.0	11.0	11.5	14.0	12.0	12.5	15.5	13.0	14.0	16.0	12.5	14.0
5	11.5	10.5	11.0	13.5	12.5	13.0	16.0	13.0	14.0	16.0	12.5	13.5
6	12.5	10.5	11.5	13.0	12.5	13.0	16.0	12.5	13.5	16.0	12.5	13.5
7	12.5	11.0	11.5	13.5	12.0	13.0	15.5	12.5	13.5	16.5	12.5	13.5
8	12.0	11.0	11.5	13.0	12.5	12.5	16.0	12.0	13.0	16.5	12.5	13.5
9	12.0	11.0	11.5	14.5	12.5	13.0	16.5	12.0	13.5	15.0	12.5	13.5
10	12.0	11.5	12.0	14.0	12.5	13.0	16.5	12.0	13.5	15.0	12.5	13.5
11	12.0	11.5	11.5	14.5	12.5	13.0	14.5	12.0	13.0	16.0	12.5	13.5
12	12.0	11.0	11.5	14.5	12.5	13.0	16.5	11.5	13.5	15.5	13.5	14.0
13	15.0	10.5	13.0	15.0	12.5	13.5	16.5	11.5	13.0	15.0	12.0	13.5
14	16.0	14.0	15.0	14.5	12.5	13.0	17.0	12.0	13.5	16.0	12.0	13.0
15	16.5	15.0	15.5	14.0	12.5	13.0	16.5	12.5	13.5	15.5	12.5	13.5
16	16.5	15.0	16.0	15.0	13.0	13.5	13.5	12.0	13.0	15.5	12.5	13.5
17	16.0	15.5	15.5	15.5	12.5	13.5	16.5	12.0	13.5	15.0	12.5	13.5
18	16.5	15.0	16.0	15.5	12.5	13.5	13.0	12.0	12.5	15.0	12.5	13.5
19	16.5	15.5	16.0	21.5	12.5	14.0	15.5	12.5	13.5	15.5	12.0	13.0
20	17.0	15.5	16.0	15.0	13.0	13.5	15.0	12.5	13.0	16.0	12.0	13.0
21	18.0	15.0	16.5	15.0	13.0	13.5	15.5	12.5	13.0	14.5	12.5	13.0
22	17.0	15.0	15.5	20.5	13.0	14.5	15.5	12.0	13.0	15.0	12.0	13.0
23	18.0	15.5	16.5	22.0	12.5	14.5	15.5	12.0	13.0	13.5	12.5	13.0
24	17.5	15.0	16.0	23.0	12.5	15.0	15.0	12.0	13.0	14.5	10.0	13.0
25	18.0	15.0	16.0	20.0	12.5	14.0	13.5	12.5	13.0	15.0	11.5	12.5
26	17.5	14.5	16.0	14.0	13.0	13.5	15.0	12.5	13.5	13.5	11.5	12.5
27	17.5	14.5	16.0	16.0	12.5	13.5	16.0	12.5	13.5	14.0	8.5	10.0
28	16.5	14.5	15.5	16.0	12.5	13.5	16.0	12.0	13.5	9.0	8.5	8.5
29	17.5	16.0	16.5	15.5	12.5	13.5	20.5	12.5	15.5	9.0	9.0	9.0
30	18.0	16.0	16.5	15.5	13.0	13.5	18.0	13.0	15.0	17.0	9.0	13.5
31	---	---	---	14.0	12.5	13.0	13.5	12.5	13.0	---	---	---
MONTH	18.0	10.5	14.0	23.0	12.0	13.5	20.5	11.5	13.5	17.0	8.5	13.0

LEHIGH RIVER BASIN

75

01450500 AQUASHICOLA CREEK AT PALMERTON, PA

LOCATION.--Lat 40°48'22", long 75°35'54", Carbon County, Hydrologic Unit 02040106, on right bank 1,200 ft upstream from Sixth Street Bridge in Palmerton, and 1.2 mi upstream from mouth.

DRAINAGE AREA.--76.7 mi².

PERIOD OF RECORD.--October 1939 to current year.

REVISED RECORDS.--WSP 1051: 1940-45 (monthly net diversion), drainage area. WSP 2102: 1967 (monthly net diversion).

GAGE.--Water-stage recorder. Datum of gage is 389.08 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Dec. 18 to Jan. 1, Jan. 12 to Feb. 10. Records fair, except periods of estimated daily discharges which are poor. Occasional diversion from Pohopoco Creek into Aquashicola Creek above station.

AVERAGE DISCHARGE.--46 years, 152 ft³/s, 26.92 in/yr, adjusted for diversion.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 11,700 ft³/s July 10, 1945, gage height, 13.63 ft, from rating curve extended above 2,500 ft³/s on basis of contracted-opening measurement of peak flow; minimum, 2.6 ft³/s Sept. 12, 1957, from rating curve extended below 16 ft³/s; minimum gage height, 2.44 ft Sept. 16, 1964; minimum daily discharge, 9.1 ft³/s Sept. 15, 1964.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,000 ft³/s/ and maximum (*):

Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)	Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)
Sept. 27	1815	*5750	*10.48	No other peak above base discharge			

Minimum daily discharge, 13 ft³/s Aug. 23.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	46	36	45	150	46	109	101	50	119	30	55	29
2	62	36	40	143	45	104	90	74	81	28	36	25
3	52	36	58	133	44	96	90	295	69	29	31	23
4	44	36	76	128	43	92	91	313	80	28	29	22
5	42	54	63	129	42	102	88	227	96	26	28	21
6	40	56	72	120	41	92	92	190	96	27	27	20
7	39	45	81	116	40	84	88	172	74	35	26	19
8	39	41	72	113	39	85	94	144	70	36	40	25
9	39	39	69	99	38	83	87	130	65	45	34	32
10	38	39	50	97	38	79	83	124	57	42	26	36
11	37	37	69	94	37	77	80	108	51	36	25	38
12	37	36	67	90	100	102	79	105	51	33	25	28
13	35	36	66	86	218	102	77	110	50	58	23	25
14	35	35	66	84	140	97	74	98	44	47	23	23
15	35	35	67	80	114	96	76	89	40	48	21	22
16	34	34	66	78	100	93	76	87	80	41	21	22
17	34	32	66	76	92	92	72	94	75	36	22	21
18	34	30	66	72	87	89	69	115	62	34	20	20
19	34	34	68	70	86	87	69	95	54	33	20	20
20	37	31	86	68	88	87	69	83	47	32	20	19
21	36	29	120	66	85	84	66	78	43	31	20	18
22	40	30	150	64	86	79	64	74	41	36	14	18
23	80	30	170	62	103	82	63	72	38	32	13	19
24	54	30	120	59	128	82	65	71	40	29	21	20
25	44	30	105	57	140	80	63	68	41	28	41	20
26	42	30	95	56	134	73	61	67	35	45	39	20
27	41	29	115	54	129	70	57	68	33	60	29	2820
28	39	29	135	52	117	69	54	68	34	38	21	1600
29	42	72	155	50	---	73	53	70	36	33	16	515
30	41	56	170	48	---	69	50	65	32	30	23	325
31	38	---	160	47	---	71	---	63	---	38	38	---
TOTAL	1290	1123	2808	2641	2400	2680	2241	3467	1734	1124	827	5865
MEAN	41.6	37.4	90.6	85.2	85.7	86.5	74.7	112	57.8	36.3	26.7	196
MAX	80	72	170	150	218	109	101	313	119	60	55	2820
MIN	34	29	40	47	37	69	50	50	32	26	13	18
†	-5.1	-5.4	-4.7	-4.9	-5.8	-4.4	-4.4	-4.2	-4.7	-4.6	-4.6	-4.7
MEAN‡	36.5	32.0	85.9	80.3	79.9	82.1	70.3	108	53.1	31.7	22.1	191
CFSM‡	.48	.42	1.12	1.05	1.04	1.07	.92	1.41	.69	.41	.29	2.49
IN‡	.55	.47	1.29	1.21	1.08	1.23	1.02	1.62	.77	.48	.33	2.78

CAL YR 1984 TOTAL 61427 MEAN 168 MAX 2610 MIN 27 MEAN‡ 163 CFSM‡ 2.13 IN‡ 28.86
WTR YR 1985 TOTAL 28200 MEAN 77.3 MAX 2820 MIN 13 MEAN‡ 72.5 CFSM‡ .95 IN‡ 12.84

† Figures of net diversion, equivalent in cubic feet per second, include water diverted from Pohopoco Creek to Aquashicola Creek plus water diverted above station from Aquashicola Creek, furnished by Palmer Water Company.

‡ Adjusted for diversion.

LEHIGH RIVER BASIN

01451000 LEHIGH RIVER AT WALNUTPORT, PA

LOCATION.--Lat 40°45'25", long 75°36'12", Northampton County, Hydrologic Unit 02040106, on left bank 0.3 mi upstream from highway bridge at Walnutport, and 0.4 mi upstream from Trout Creek.

DRAINAGE AREA.--889 mi².

PERIOD OF RECORD.--October 1946 to current year.

GAGE.--Water-stage recorder. Datum of gage is 350.27 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 9 to Feb. 11. Records good except for periods of estimated record which are poor. Flow regulated by Wild Creek Reservoir (station 01449700) since January 1941, Penn Forest Reservoir (station 01449400) since October 1958, Francis E. Walter Lake (station 01447780) since February 1961, and Beltzville Lake (station 01449790) since February 1971. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--39 years, 1,855 ft³/s, 28.34 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 77,800 ft³/s Aug. 19, 1955, gage height, 17.68 ft; minimum, 57 ft³/s July 27, 1965, gage height, 1.25 ft, result of upstream shutoff.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum stage known, 20.6 ft May 23, 1942, from floodmarks.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 26,100 ft³/s Sept. 27, gage height, 9.59 ft; minimum daily, 290 ft³/s Sept. 13 to Sept. 16.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	367	383	891	2170	480	2000	1570	621	785	801	1180	645
2	444	385	831	1490	480	1680	1760	678	687	605	1410	627
3	420	364	870	1750	470	1580	1940	3450	558	551	1100	618
4	372	348	728	1750	470	1550	1640	5250	506	527	1060	398
5	360	416	715	1490	470	1680	1320	4590	572	482	1020	297
6	355	512	823	1320	460	1430	1330	4130	946	665	488	421
7	352	550	720	1270	460	1430	1320	3050	649	1060	381	574
8	353	529	619	1100	450	1420	1770	2530	690	886	417	605
9	355	435	574	1000	450	1270	1600	2170	682	1090	487	610
10	358	410	563	900	440	1200	1380	1690	533	1030	605	638
11	337	416	575	820	440	1170	1340	1700	488	888	642	446
12	337	410	595	750	947	1590	1180	1620	466	771	631	298
13	337	404	595	710	2820	2400	1140	1550	447	1360	405	290
14	342	386	620	680	2720	2210	1130	881	614	1660	318	290
15	332	363	679	660	2220	1890	1120	745	732	2640	304	290
16	327	363	682	650	2110	1640	994	726	1560	3710	306	290
17	326	350	670	640	1910	1610	955	799	2180	2520	418	420
18	329	340	578	630	1480	1540	979	951	3180	954	587	553
19	330	342	562	620	964	1100	871	853	2360	762	588	663
20	454	337	654	600	901	1090	998	743	1340	556	412	707
21	511	335	652	590	938	1170	1030	685	924	402	367	718
22	424	329	1400	580	1050	1040	859	637	910	431	365	725
23	513	317	1340	570	1200	1020	804	603	920	420	357	725
24	435	317	1970	560	1860	1030	802	571	920	643	427	520
25	413	314	1390	550	3600	1060	914	525	850	632	589	447
26	413	313	1230	540	3710	1490	870	502	728	849	600	447
27	416	312	994	530	3000	983	913	487	695	951	435	12800
28	406	312	1100	520	2460	885	790	489	661	767	314	10100
29	416	753	1450	510	---	955	717	601	789	713	301	12800
30	401	902	1780	500	---	1050	639	560	821	691	376	11200
31	392	---	2180	490	---	1080	---	519	---	633	646	---
TOTAL	11927	12247	29030	26940	38960	43243	34675	44906	28193	30650	17536	60162
MEAN	385	408	936	869	1391	1395	1156	1449	940	989	566	2005
MAX	513	902	2180	2170	3710	2400	1940	5250	3180	3710	1410	12800
MIN	326	312	562	490	440	885	639	487	447	402	301	290
CAL YR 1984	TOTAL	763884	MEAN	2087	MAX	17500	MIN	312				
WTR YR 1985	TOTAL	378469	MEAN	1037	MAX	12800	MIN	290				

LEHIGH RIVER BASIN

77

01451500 LITTLE LEHIGH CREEK NEAR ALLENTOWN, PA

LOCATION.--Lat 40°34'56", long 75°29'00", Lehigh County, Hydrologic Unit 02040106, on right bank at downstream side of bridge on Lehigh Parkway in Allentown, 0.8 mi upstream from Cedar Creek, and 2.9 mi upstream from mouth.

DRAINAGE AREA.--80.8 mi².

PERIOD OF RECORD.--October 1945 to current year. Prior to October 1946, published as "at Allentown."

REVISED RECORDS.--WDR PA-73-1: 1946(M), 1951(P), 1955(M), 1956(M), 1958(M), 1962(M), 1963(M), 1965(M), 1969(M), 1971(M).

GAGE.--Water-stage recorder and, since September 1958, masonry control. Datum of gage is 253.41 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--No estimated daily discharges during water year. Records good. Occasional regulation at low flow by fish hatchery above station. Several observation of water temperature were made during the year.

AVERAGE DISCHARGE.--40 years, 99.1 ft³/s, 16.70 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 11,800 ft³/s June 22, 1972, gage height, 11.80 ft, from rating curve extended above 980 ft³/s on basis of slope-area measurement of peak flow; minimum, 17 ft³/s Feb. 4, 1965, result of upstream shutoff; minimum gage height, 1.39 ft June 17, 18, 22, 1949.

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 900 ft³/s and maximum(*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1500	*3,900	*6.11	Sept. 27	2245	3,200	5.59

Minimum discharge, 33 ft³/s Sept. 23, gage height, 2.12 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	73	68	70	69	60	66	65	45	74	45	183	42
2	91	66	66	86	61	66	60	63	53	45	74	41
3	94	64	75	86	58	63	58	232	48	87	60	40
4	81	63	81	75	54	62	58	119	47	55	56	39
5	74	68	71	74	54	69	57	76	70	48	52	39
6	73	75	106	70	56	64	59	68	63	49	51	38
7	73	72	88	69	55	61	58	65	52	59	50	37
8	72	71	73	68	53	64	57	61	53	50	82	38
9	71	70	69	63	53	63	56	58	52	50	59	40
10	71	70	68	63	54	60	55	57	48	46	53	43
11	68	69	69	65	53	58	55	55	47	44	51	46
12	67	67	67	63	190	73	54	53	47	43	51	41
13	65	67	65	64	212	71	53	61	47	43	49	38
14	65	66	64	63	94	64	52	53	47	46	48	37
15	64	65	67	63	80	61	52	51	46	53	46	37
16	63	66	66	58	73	59	52	52	111	44	45	37
17	64	65	64	61	71	58	52	66	70	42	45	36
18	64	65	63	61	69	58	50	118	58	41	44	36
19	65	67	64	61	70	58	51	69	53	40	44	36
20	66	66	66	59	70	58	50	59	50	40	44	35
21	67	65	66	58	69	58	49	67	49	39	44	35
22	66	65	103	58	71	57	48	62	47	47	43	34
23	94	64	79	58	92	62	48	57	47	42	42	34
24	89	65	70	57	92	65	47	57	45	39	41	35
25	77	65	70	58	80	64	48	54	45	38	58	36
26	73	63	66	58	73	59	48	52	44	48	65	36
27	70	63	68	58	71	58	47	50	44	100	50	2180
28	67	63	70	58	68	57	46	51	45	56	45	746
29	75	88	77	58	---	58	46	53	47	47	43	128
30	76	78	73	58	---	56	45	50	46	45	43	92
31	72	---	68	58	---	57	---	50	---	152	42	---
TOTAL	2250	2029	2232	1978	2156	1907	1576	2084	1595	1623	1703	4132
MEAN	72.6	67.6	72.0	63.8	77.0	61.5	52.5	67.2	53.2	52.4	54.9	136
MAX	94	88	106	86	212	73	65	232	111	152	183	2180
MIN	63	63	63	57	53	56	45	45	44	38	41	34
CFSM	.90	.84	.89	.79	.95	.76	.65	.83	.66	.65	.68	1.71
IN.	1.04	.93	1.03	.91	.99	.88	.73	.96	.73	.75	.78	1.90

CAL YR 1984	TOTAL	66413	MEAN	181	MAX	4050	MIN	63	CFSM	2.24	IN.	30.58
WTR YR 1985	TOTAL	25265	MEAN	69.2	MAX	2180	MIN	34	CFSM	.86	IN.	11.63

LEHIGH RIVER BASIN

01451800 JORDAN CREEK NEAR SCHNECKSVILLE, PA

LOCATION.--Lat 40°39'42", long 75°37'38", Lehigh County, Hydrologic Unit 02040106, on left bank 54 ft downstream from wooden covered bridge at Trexler-Lehigh County Game Preserve, 1.0 mi downstream from Mill Creek, and 1.1 mi southwest of Schnecksville.

DRAINAGE AREA.--53.0 mi².

PERIOD OF RECORD.--February 1966 to current year.

GAGE.--Water-stage recorder and concrete control. Elevation of gage is 400 ft above National Geodetic Vertical Datum of 1929, from topographic map. Prior to Oct. 2, 1973, nonrecording gage at bridge 54 ft upstream at same datum.

REMARKS.--Estimated daily discharge during water year: Jan. 10 to Feb. 21. Records good except for periods of estimated record, which are fair. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--19 years, 92.7 ft³/s, 23.76 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 7,100 ft³/s June 22, 1972, gage height, 12.32 ft, from flood-mark, from rating curve extended above 680 ft³/s on basis of contracted-opening measurement of peak flow; minimum observed, 0.4 ft³/s July 26, 1966; minimum gage height observed, 1.74 ft July 19, 26, 1966.

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 900 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1745	*2,840	*8.09	No other peaks greater than base discharge.			

Minimum discharge, 6.1 ft³/s Nov. 22, 23, 26, Sept. 22, gage height, 2.52 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	11	25	24	100	20	64	65	16	38	17	38	13
2	25	25	21	110	20	59	43	37	22	16	22	12
3	14	24	43	97	20	51	40	309	19	20	19	10
4	10	23	54	95	20	47	40	201	18	16	17	9.7
5	9.0	37	43	98	19	59	36	140	42	13	15	8.9
6	8.6	31	78	85	19	47	40	108	31	13	14	8.3
7	8.3	25	72	82	19	39	37	89	22	16	13	7.9
8	8.5	23	73	75	19	44	48	72	23	15	49	9.8
9	9.3	22	62	66	19	42	39	60	24	17	25	10
10	9.4	23	59	60	19	36	34	54	20	13	21	10
11	9.0	23	59	54	19	34	34	48	17	10	24	9.6
12	8.5	22	53	48	60	60	32	43	17	9.0	22	7.9
13	8.0	20	50	45	180	53	31	60	16	26	17	7.2
14	7.9	19	47	41	110	47	30	41	14	21	17	6.7
15	7.8	18	52	38	84	44	31	35	13	28	15	6.8
16	7.8	19	48	35	68	40	31	36	81	16	14	6.5
17	7.9	17	48	33	60	41	29	55	85	11	13	6.3
18	8.3	17	47	31	56	37	26	74	62	9.4	13	6.1
19	8.5	19	49	29	52	35	26	45	45	8.7	13	6.0
20	14	16	57	28	48	38	26	38	38	8.1	13	5.8
21	11	15	55	27	45	35	24	34	33	7.7	12	5.7
22	87	14	211	26	65	32	24	31	29	20	9.8	5.6
23	134	15	187	25	99	37	23	32	29	10	8.9	5.8
24	51	17	153	24	115	38	22	32	27	8.1	8.5	6.9
25	38	16	129	24	111	38	23	26	28	7.7	36	6.7
26	37	14	96	23	92	31	22	24	22	30	28	6.6
27	32	14	89	23	81	30	20	23	20	91	17	1490
28	29	14	87	22	71	30	19	27	22	33	13	844
29	36	49	113	22	---	30	19	24	24	25	11	335
30	30	30	102	21	---	29	17	21	20	22	15	201
31	27	---	94	21	---	33	---	20	---	30	20	---
TOTAL	712.8	646	2355	1508	1610	1280	931	1855	901	587.7	573.2	3075.8
MEAN	23.0	21.5	76.0	48.6	57.5	41.3	31.0	59.8	30.0	19.0	18.5	103
MAX	134	49	211	110	180	64	65	309	85	91	49	1490
MIN	7.8	14	21	21	19	29	17	16	13	7.7	8.5	5.6
CFSM	.43	.41	1.43	.92	1.08	.78	.58	1.13	.57	.36	.35	1.94
IN.	.50	.45	1.65	1.06	1.13	.90	.65	1.30	.63	.41	.40	2.16

CAL YR 1984 TOTAL 38175.9 MEAN 104 MAX 1500 MIN 4.8 CFSM 1.96 IN. 26.80
WTR YR 1985 TOTAL 16035.5 MEAN 43.9 MAX 1490 MIN 5.6 CFSM .83 IN. 11.26

LEHIGH RIVER BASIN

79

01452000 JORDAN CREEK AT ALLENTOWN, PA

LOCATION.--Lat 40°37'23", long 75°28'58", Lehigh County, Hydrologic Unit 02040106, on right bank 200 ft upstream from bridge on State Highway 145, 0.5 mi northwest of city limits of Allentown, and 2.5 mi upstream from mouth.

DRAINAGE AREA.--75.8 mi².

PERIOD OF RECORD.--October 1944 to current year.

REVISED RECORDS.--WDR PA-76-1: 1970(M), 1971.

GAGE.--Water-stage recorder and rubble masonry control, crest raised 1 ft in August 1958 and further modified by filling in square notches on sides and notching center of dam at 17:1 slope in August 1974. Datum of gage is 259.82 ft above Pennsylvania Department of Transportation datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 10 to Feb. 9, June 15-21. Records good, except periods of estimated daily discharges which are fair. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--41 years, 113 ft³/s, 20.26 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 16,200 ft³/s June 23, 1972, gage height, 11.61 ft, floodmark, from rating curve extended above 6,100 ft³/s on basis of slope-area measurement of peak flow; no flow on many days.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of May 23, 1942, reached a stage of approximately 7.1 ft, from floodmarks 650 ft downstream.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,300 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage Height (ft)	Date	Time	Discharge (ft ³ /s)	Gage Height (ft)
Sept. 28	0045	*4510	*6.84	No other peak greater than base discharge.			
Minimum discharge, 7.4 ft ³ /s Sept. 18, gage height, 2.15 ft.							

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	16	33	31	117	25	80	68	20	54	20	74	24
2	29	33	26	127	24	80	63	33	36	20	41	18
3	28	31	30	124	24	72	49	312	25	26	33	15
4	18	29	72	116	24	62	49	229	23	24	28	15
5	15	45	52	122	24	75	45	172	43	18	24	13
6	12	48	85	107	23	70	45	144	59	24	24	12
7	12	35	98	100	23	52	46	117	32	16	22	10
8	12	30	82	93	23	59	54	88	28	18	74	11
9	12	29	80	58	23	59	50	80	31	19	48	8.8
10	13	30	74	56	23	49	43	80	26	19	34	12
11	14	29	72	53	23	46	42	79	22	14	29	12
12	12	28	65	50	53	66	42	69	23	11	36	11
13	11	26	59	48	401	77	39	76	21	17	27	10
14	11	24	54	46	184	68	37	67	19	29	26	8.7
15	14	23	60	43	122	66	37	49	17	36	24	8.0
16	12	23	58	41	88	59	39	46	98	27	21	7.9
17	12	22	55	39	81	58	37	70	100	18	20	7.8
18	14	21	53	38	79	54	34	91	80	14	18	7.7
19	15	22	53	36	80	47	32	73	56	11	17	8.2
20	16	21	64	34	83	50	33	51	48	9.1	17	8.6
21	14	18	60	32	76	45	31	44	41	8.6	18	8.4
22	34	18	203	31	80	42	28	41	36	16	16	8.5
23	260	16	216	30	114	45	27	40	35	20	14	8.1
24	81	19	180	28	136	48	26	44	36	13	13	7.9
25	59	21	154	29	131	48	27	37	37	10	38	7.7
26	51	18	119	28	115	41	27	32	28	32	52	9.8
27	46	18	108	27	99	38	25	28	25	193	31	1770
28	43	18	102	26	82	37	23	29	25	75	23	1860
29	50	41	122	26	---	38	21	33	28	47	18	501
30	43	47	127	25	---	37	20	28	25	37	25	280
31	36	---	111	25	---	38	---	25	---	57	34	---
TOTAL	1015	816	2725	1756	2263	1706	1139	2327	1157	898.7	919	4690.1
MEAN	32.7	27.2	87.9	56.6	80.8	55.0	38.0	75.1	38.6	29.0	29.6	156
MAX	260	48	216	127	401	80	68	312	100	193	74	1860
MIN	11	16	26	25	23	37	20	20	17	8.6	13	7.7
CFSM	.43	.36	1.16	.75	1.07	.73	.50	.99	.51	.38	.39	2.06
IN.	.50	.40	1.34	.86	1.11	.84	.56	1.14	.57	.44	.45	2.30

CAL YR 1984 TOTAL 54180 MEAN 148 MAX 2440 MIN 11 CFSM 1.95 IN. 26.59
WTR YR 1985 TOTAL 21411.8 MEAN 58.7 MAX 1860 MIN 7.7 CFSM .77 IN. 10.51

LEHIGH RIVER BASIN

01452500 MONOCACY CREEK AT BETHLEHEM, PA

LOCATION.--Lat 40°38'28", long 75°22'47", Northampton County, Hydrologic Unit 02040106, on right bank 40 ft downstream from highway bridge at entrance to Monocacy Park at Bethlehem, and 2.1 mi upstream from mouth.

DRAINAGE AREA.--44.5 mi².

PERIOD OF RECORD.--October 1948 to current year.

GAGE.--Water-stage recorder. Concrete control since July 17, 1969. Datum of gage is 247.24 ft above National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers). Prior to May 15, 1962, nonrecording gage at site 40 ft upstream at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 17-20, May 5-12, and June 29 to July 2. Records fair except for periods of estimated daily discharges, which are poor. Some regulation at low flow by mill above station since April 1954. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--37 years, 52.7 ft³/s, 16.07 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 3,490 ft³/s Jan. 25, 1979, gage height, 8.19 ft; minimum, 3.0 ft³/s Jan. 9, 1966, gage height, 1.67 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of July 10, 1945, reached a stage of 9.74 ft, from floodmarks, discharge, 5,200 ft³/s, by slope-area measurement.

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 300 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage Height (ft)	Date	Time	Discharge (ft ³ /s)	Gage Height (ft)
Sept. 27	0530	*923	*4.71	No other peak above base discharge.			
Minimum daily discharge, 17 ft ³ /s Sept. 17-25.							

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	38	32	35	53	30	34	31	22	35	24	30	22
2	44	33	35	55	30	34	30	27	25	24	29	22
3	41	31	37	55	29	32	31	87	25	33	28	22
4	38	33	40	53	28	31	30	63	25	22	28	21
5	38	44	34	54	26	36	29	35	35	22	28	21
6	38	42	48	50	26	34	30	33	30	27	27	21
7	37	33	46	49	26	32	29	31	25	25	26	21
8	41	33	41	49	26	33	30	29	25	24	37	24
9	44	32	40	42	25	31	30	28	26	22	30	22
10	40	33	37	40	25	29	28	26	24	22	28	21
11	34	32	38	41	25	28	28	25	23	22	26	20
12	34	34	40	38	114	34	30	25	25	22	25	20
13	33	32	37	39	118	36	29	29	24	23	24	20
14	33	33	34	37	57	34	29	27	23	23	24	20
15	33	31	33	36	47	31	28	24	23	25	23	20
16	33	30	34	31	37	33	30	24	44	24	23	19
17	33	30	33	30	36	33	34	32	32	22	23	17
18	34	31	33	29	33	32	28	46	32	22	22	17
19	35	31	33	29	33	30	23	31	29	22	22	17
20	37	30	36	29	33	31	26	29	28	22	22	17
21	34	32	39	29	32	29	23	28	25	21	22	17
22	62	31	69	29	30	29	22	25	24	29	22	17
23	76	30	62	29	38	29	22	25	24	24	22	17
24	44	31	61	29	43	29	22	25	24	24	22	17
25	36	30	56	29	43	29	23	23	24	24	28	17
26	40	30	49	29	41	31	23	22	23	41	28	18
27	38	30	49	29	39	30	23	22	23	73	23	631
28	37	30	49	29	35	30	23	23	23	31	22	373
29	39	42	52	29	---	28	22	23	23	29	22	152
30	34	34	57	29	---	26	22	23	23	28	29	103
31	33	---	52	30	---	26	---	23	---	39	25	---
TOTAL	1211	980	1339	1161	1105	964	808	935	794	835	790	1766
MEAN	39.1	32.7	43.2	37.5	39.5	31.1	26.9	30.2	26.5	26.9	25.5	58.9
MAX	76	44	69	55	118	36	34	87	44	73	37	631
MIN	33	30	33	29	25	26	22	22	23	21	22	17
CFSM	.88	.73	.97	.84	.89	.70	.60	.68	.60	.60	.57	1.32
IN.	1.01	.82	1.12	.97	.92	.81	.68	.78	.66	.70	.66	1.48

CAL YR 1984	TOTAL	30637	MEAN	83.7	MAX	590	MIN	30	CFSM	1.88	IN.	25.61
WTR YR 1985	TOTAL	12688	MEAN	34.8	MAX	631	MIN	17	CFSM	.78	IN.	10.61

LEHIGH RIVER BASIN

81

01453000 LEHIGH RIVER AT BETHLEHEM, PA

LOCATION.--Lat 40°36'55", long 75°22'45", Lehigh County, Hydrologic Unit 02040106, on left bank 110 ft upstream from New Street Bridge at Bethlehem, and 1,800 ft upstream from Monocacy Creek. Records include flow of Monocacy Creek.

DRAINAGE AREA.--1,279 mi² includes that of Monocacy Creek. At site used prior to Oct. 1, 1928, 1,229 mi².

PERIOD OF RECORD.--September 1902 to February 1905, April 1909 to current year. Monthly discharge only for some periods, published in WSP 1302. Published as "at South Bethlehem" prior to October 1913.

REVISED RECORDS.--WSP 261: 1903-5, WSP 321: 1910-11. WSP 1051: Drainage area. WSP 1141: 1929-34(M). WSP 1302: 1914(M), 1916(M), 1918, 1921, 1927-28. WSP 1432: 1903, 1919(M), 1920-21, 1929, 1933.

GAGE.--Water-stage recorder. Datum of gage is 210.94 ft above National Geodetic Vertical Datum of 1929. Prior to October 1928, nonrecording gage at New Street Bridge 120 ft downstream at same datum. Oct. 1, 1928, to Sept. 30, 1962, water-stage recorder at site 4,250 ft downstream at datum 2.49 ft lower. Oct. 1, 1963, to Dec. 14, 1975, water-stage recorder at site 40 ft downstream at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 11 to Feb. 12. Records good except for periods of estimated record, which are fair. Flow regulated by Wild Creek Reservoir (station 01449700) since January 1941, Penn Forest Reservoir (station 01449400) since October 1958, Francis E. Walter Reservoir (station 01447780) since February 1961, and Beltzville Lake (station 01449790) since February 1971. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--78 years (water years 1902-04, 1909-85), 2,337 ft³/s, 24.80 in/yr, adjusted for diversion 1902-04, 1909-42 and, for recirculated water, October 1, 1959 to September 30, 1962.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 92,000 ft³/s May 23, 1942, gage height, about 25.9 ft, from floodmark, present site and datum, from rating curve extended above 48,000 ft³/s; minimum, 125 ft³/s June 28, 1965, gage height, 0.94 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Feb. 28, 1902, reached a stage of 24.9 ft, from floodmark, present site and datum, discharge, about 88,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 32,700 ft³/s, Sept. 27, gage height, 12.78 ft; minimum, 318 ft³/s Sept. 17, gage height, 0.98 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	784	797	1270	2470	660	2340	1710	967	1250	1170	1450	878
2	959	792	1270	2260	640	2040	1930	1160	1170	1050	1410	833
3	918	759	1300	2050	620	1790	2090	3870	1000	1080	1320	820
4	779	715	1340	2200	620	1680	1840	5250	893	886	1270	720
5	726	898	1200	2050	620	1940	1520	4470	1110	835	1260	455
6	710	996	1380	1610	600	1740	1470	4050	1330	940	944	410
7	699	968	1350	1510	600	1520	1470	3340	1140	1330	602	722
8	702	998	1200	1470	600	1530	1860	2820	1020	1280	941	807
9	711	840	1120	1320	600	1490	1810	2470	1190	1310	733	818
10	716	802	1100	1230	600	1430	1510	2050	940	1350	806	835
11	671	802	1090	1200	600	1410	1480	1920	852	1270	884	792
12	656	798	1110	1100	700	1700	1420	1780	847	1150	920	488
13	658	769	1100	1100	3480	2500	1390	1890	799	1430	770	421
14	647	759	1090	1000	2880	2470	1380	1400	846	1670	580	379
15	653	703	1170	1000	2430	2190	1380	1220	1060	2410	496	340
16	640	700	1200	960	1850	1830	1350	1160	1840	3380	480	356
17	646	697	1170	920	1680	1730	1300	1290	2520	2840	485	348
18	649	672	1110	900	1570	1670	1290	1450	3030	1470	760	712
19	648	691	1060	860	1470	1440	1270	1330	2720	1150	798	768
20	701	665	1130	840	1350	1380	1290	1220	1660	1020	716	871
21	973	658	1200	820	1350	1400	1340	1140	1350	693	555	893
22	988	646	2050	800	1390	1360	1270	1100	1270	810	546	899
23	1650	631	2140	780	1530	1350	1200	1040	1290	737	528	908
24	1050	625	2270	760	2140	1360	1200	1020	1310	809	538	820
25	919	626	1980	740	3230	1360	1230	926	1280	985	932	625
26	901	623	1540	720	3590	1490	1270	883	1140	1260	956	628
27	859	615	1440	720	3190	1370	1240	851	1070	1920	777	16500
28	847	609	1440	700	2710	1270	1210	847	1050	1140	529	14700
29	971	976	1680	680	---	1290	1090	906	1110	993	458	13100
30	863	1370	2290	660	---	1330	1040	967	1210	950	516	11300
31	811	---	2390	660	---	1350	---	877	---	1140	819	---
TOTAL	25105	23200	44180	36090	43300	50750	42850	55664	39297	40458	24779	73146
MEAN	810	773	1425	1164	1546	1637	1428	1796	1310	1305	799	2438
MAX	1650	1370	2390	2470	3590	2500	2090	5250	3030	3380	1450	16500
MIN	640	609	1060	660	600	1270	1040	847	799	693	458	340
CAL YR 1984	TOTAL	1034498	MEAN	2826	MAX	23800	MIN	609				
WTR YR 1985	TOTAL	498819	MEAN	1367	MAX	16500	MIN	340				

LEHIGH RIVER BASIN

01454700 LEHIGH RIVER AT GLENDON, PA

LOCATION.--Lat 40°40'09", long 75°14'12", Northampton County, Hydrologic Unit 02040106, on right bank 140 ft upstream from highway bridge in Hugh Moore Parkway at Glendon, 1.9 mi upstream from mouth, and 2.0 mi southwest of Easton.

DRAINAGE AREA.--1,359 mi².

PERIOD OF RECORD.--October 1966 to current year.

REVISED RECORDS.--WDR PA-72-1: 1971(M).

GAGE.--Water-stage recorder. Datum of gage is 164.30 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 11 to Feb. 12. Records good except for periods of estimated record, which are fair. Flow regulated by Francis E. Walter Reservoir (station 01447780), Penn Forest Reservoir (station 01449400), and Wild Creek Reservoir (station 01449700) and since February 1971, Beltzville Lake (station 01449790) about 60 mi upstream. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--19 years, 2,899 ft³/s, 28.96 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 60,600 ft³/s June 23, 1972, gage height, 24.86 ft from rating curve extended above 36,000 ft³/s; minimum daily, 330 ft³/s Jan. 31, Feb. 1, 1981.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 35,500 ft³/s Sept. 27, gage height, 19.10 ft; minimum, 424 ft³/s Sept. 17, gage height, 6.47 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	856	868	1390	2840	700	2600	1990	1030	1450	1200	2030	1010
2	1050	863	1390	2800	680	2330	2200	1280	1270	1110	1770	947
3	998	820	1460	2450	680	2150	2270	4740	1080	1200	1620	939
4	851	779	1600	2530	660	2080	2160	6200	978	934	1460	860
5	789	1020	1270	2460	660	2230	1910	5250	1280	874	1430	553
6	771	1080	1700	2160	660	2170	1830	4710	1520	949	1190	494
7	753	1020	1670	2060	640	1970	1840	3870	1260	1460	736	765
8	764	1070	1330	1970	640	1980	2080	3230	1100	1400	1210	948
9	784	920	1240	1580	640	1920	2150	2760	1280	1420	884	939
10	773	869	1200	1370	640	1780	1910	2390	1000	1510	917	953
11	725	864	1190	1300	640	1720	1840	2230	898	1360	1020	937
12	706	858	1210	1200	1000	2010	1730	2150	885	1200	1070	591
13	709	826	1190	1200	4230	2710	1650	2230	830	1600	947	509
14	696	818	1180	1100	3350	2740	1620	1750	828	1930	743	485
15	701	759	1280	1100	2790	2420	1610	1330	1060	2530	612	449
16	687	749	1320	1000	2260	2180	1560	1250	2210	3610	576	458
17	694	743	1310	980	2120	2110	1480	1440	2810	3170	575	437
18	699	730	1250	940	2040	2080	1440	2000	3290	1790	816	745
19	692	749	1200	920	1910	1790	1410	1600	3060	1210	920	838
20	758	716	1270	900	1620	1650	1420	1350	2130	1070	872	1050
21	997	698	1370	880	1590	1680	1540	1250	1590	734	655	1190
22	1070	682	2450	860	1670	1610	1430	1210	1370	868	638	1210
23	2210	661	2610	840	1980	1580	1270	1140	1400	752	617	1510
24	1200	649	2670	820	2420	1590	1260	1120	1450	766	597	2210
25	1020	656	2500	800	3590	1590	1290	1020	1400	1000	1080	2650
26	1000	650	2130	780	4080	1810	1380	961	1200	1220	1200	3240
27	944	650	1960	760	3640	1640	1310	920	1120	2800	941	20500
28	928	653	1920	740	3050	1410	1330	922	1100	1410	643	17800
29	1100	1020	2150	740	---	1410	1160	951	1130	1180	553	15100
30	960	1620	2650	720	---	1510	1110	1040	1250	1110	638	13500
31	891	---	2730	720	---	1560	---	942	---	1460	879	---
TOTAL	27776	25060	51790	41520	50580	60010	49180	64266	43229	44827	29839	93817
MEAN	896	835	1671	1339	1806	1936	1639	2073	1441	1446	963	3127
MAX	2210	1620	2730	2840	4230	2740	2270	6200	3290	3610	2030	20500
MIN	687	649	1180	720	640	1410	1110	920	828	734	553	437

CAL YR 1984 TOTAL 1217813 MEAN 3327 MAX 27600 MIN 649
WTR YR 1985 TOTAL 581894 MEAN 1594 MAX 20500 MIN 437

LEHIGH RIVER BASIN

83

01454720 LEHIGH RIVER AT EASTON, PA

LOCATION.--Lat 40°41'12", long 75°12'32", Northampton County, Hydrologic Unit 02040106, at Third Street Bridge, Easton, U.S. Highway 611.

DRAINAGE AREA.--1,364 mi².

PERIOD OF RECORD.--October 1961 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: October 1963 to current year.

pH: October 1972 to September 1974, October 1975 to current year.

WATER TEMPERATURE: October 1961 to current year.

DISSOLVED OXYGEN: June 1966 to current year.

INSTRUMENTATION.--Water-quality monitor since October 1961.

REMARKS.--Station not operated Oct. 1 to Mar. 6. Other interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 581 microsiemens Aug. 19, 1963; minimum, 70 microsiemens Nov. 14, 1970.

pH: Maximum, 8.4 Aug. 8, 1980; minimum, 6.0 Mar. 16, 1978.

WATER TEMPERATURE: Maximum, 30.5°C July 29, 1970, and July 21, 1980; minimum, 0.0°C on many days during winter months.

DISSOLVED OXYGEN: Maximum, 15.5 mg/L Jan. 11, 1978; minimum, 0.0 mg/L Aug. 4, 1966.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	415	395	407									
2	---	---	---									
3	---	---	---									
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28	---	---	---									
29	---	---	---									
30	---	---	---									
31	---	---	---									

MONTH

LEHIGH RIVER BASIN

01454720 LEHIGH RIVER AT EASTON, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	234	219	229	287	270	277
2				---	---	---	218	205	213	291	282	287
3				---	---	---	213	196	207	283	199	247
4				---	---	---	200	191	195	197	145	162
5				---	---	---	209	192	202	146	136	140
6				---	---	---	222	201	213	143	136	139
7				---	---	---	226	209	220	158	143	147
8				---	---	---	210	200	206	169	159	164
9				---	---	---	199	191	195	181	170	177
10				---	---	---	204	192	200	192	181	187
11				---	---	---	215	201	210	209	192	203
12				---	---	---	228	211	220	209	199	205
13				---	---	---	240	225	233	202	195	198
14				---	---	---	237	228	234	215	196	206
15				---	---	---	232	223	227	260	215	236
16				---	---	---	237	223	230	286	260	271
17				---	---	---	259	236	248	288	277	283
18				---	---	---	264	251	258	280	261	271
19				---	---	---	265	257	260	266	253	258
20				---	---	---	267	254	260	259	250	254
21				---	---	---	266	249	259	281	258	265
22				---	---	---	248	235	240	297	281	288
23				---	---	---	260	234	244	307	286	296
24				---	---	---	272	258	264	313	299	307
25				---	---	---	273	265	270	317	308	311
26				---	---	---	271	261	266	321	310	317
27				233	213	219	265	249	257	324	306	316
28				243	214	230	265	254	259	317	310	313
29				259	243	252	255	238	245	326	314	320
30				261	253	258	269	250	256	335	325	330
31				276	235	244	---	---	---	329	306	318
MONTH				276	213	241	273	191	234	335	136	248
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	318	295	311	268	249	255	279	229	249	394	324	359
2	301	287	291	256	247	251	246	233	239	324	283	304
3	287	276	281	268	251	258	232	217	222	283	266	275
4	297	283	288	286	263	275	228	216	222	278	272	274
5	322	291	308	299	287	294	223	214	219	291	278	286
6	321	295	302	306	298	302	233	219	225	330	285	300
7	299	274	284	317	281	305	254	233	239	393	333	362
8	293	275	280	278	231	248	319	247	287	393	338	375
9	302	290	297	246	226	234	313	287	297	336	278	310
10	297	269	280	245	232	238	354	316	343	283	271	276
11	306	285	296	237	219	228	355	323	340	286	276	280
12	322	307	314	246	231	239	323	290	304	285	272	278
13	335	322	329	256	236	246	294	279	286	319	273	291
14	344	335	340	256	204	223	300	292	296	359	321	337
15	351	327	341	214	174	191	337	295	311	381	360	376
16	326	240	281	---	---	---	384	334	358	405	382	397
17	238	185	210	---	---	---	403	383	388	425	392	411
18	195	162	183	160	132	148	416	402	408	427	402	412
19	162	153	156	227	161	197	405	335	376	429	352	404
20	184	158	172	257	228	240	334	306	317	351	295	325
21	218	186	206	264	257	259	311	306	308	294	267	277
22	256	218	236	296	258	281	346	306	325	270	256	264
23	255	245	250	316	295	303	374	346	362	266	246	254
24	251	229	241	339	315	328	382	363	370	251	241	245
25	250	237	243	353	330	336	379	352	368	264	251	257
26	260	238	246	329	262	300	350	277	307	305	266	286
27	275	259	264	274	203	224	300	280	290	299	140	195
28	288	272	277	248	224	242	306	299	302	194	144	172
29	289	280	285	258	244	249	338	300	317	184	112	128
30	288	269	279	276	257	265	373	338	348	113	103	108
31	---	---	---	280	246	273	399	374	384	---	---	---
MONTH	351	153	269	353	132	256	416	214	310	429	103	294

LEHIGH RIVER BASIN

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01454720 LEHIGH RIVER AT EASTON, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.7	7.5	7.5									
2	---	---	---									
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26	---	---	---									
27	---	---	---									
28	---	---	---									
29	---	---	---									
30	---	---	---									
31	---	---	---									

MONTH

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	7.6	7.4	7.5	7.6	7.4	7.5
2				---	---	---	7.6	7.6	7.6	7.4	7.2	7.3
3				---	---	---	7.6	7.5	7.6	7.2	6.9	7.1
4				---	---	---	7.6	7.5	7.5	7.2	7.0	7.0
5				---	---	---	7.6	6.9	7.4	7.2	7.0	7.1
6				---	---	---	7.4	7.3	7.4	7.1	7.1	7.1
7				---	---	---	7.5	7.4	7.4	7.2	7.1	7.1
8				---	---	---	7.5	7.4	7.5	7.2	7.0	7.1
9				---	---	---	7.6	7.5	7.5	7.3	7.1	7.2
10				---	---	---	7.7	7.6	7.6	7.3	7.2	7.2
11				---	---	---	7.6	7.6	7.6	7.4	7.2	7.3
12				---	---	---	7.6	6.9	7.5	7.3	7.2	7.3
13				---	---	---	7.5	7.4	7.5	7.3	7.2	7.2
14				---	---	---	7.6	7.5	7.5	7.3	7.1	7.2
15				---	---	---	7.5	7.4	7.5	7.4	7.1	7.3
16				---	---	---	7.5	7.3	7.4	7.3	7.2	7.3
17				---	---	---	7.6	7.4	7.5	7.3	7.1	7.2
18				---	---	---	7.7	7.6	7.6	7.3	7.2	7.2
19				---	---	---	7.7	7.4	7.6	7.4	7.3	7.3
20				---	---	---	7.6	7.3	7.4	7.6	7.3	7.4
21				---	---	---	7.7	7.3	7.5	7.5	7.2	7.4
22				---	---	---	7.6	7.4	7.5	7.6	7.2	7.4
23				---	---	---	7.4	7.3	7.4	7.5	7.2	7.3
24				---	---	---	7.3	7.2	7.3	7.6	7.2	7.4
25				---	---	---	7.3	7.1	7.2	7.8	7.3	7.5
26				---	---	---	7.5	7.2	7.4	7.9	7.3	7.5
27				7.5	7.4	7.4	7.5	7.4	7.4	8.0	7.3	7.6
28				7.5	7.3	7.4	7.4	7.3	7.4	7.8	7.3	7.5
29				7.6	7.1	7.4	7.5	7.3	7.4	7.8	7.1	7.4
30				7.5	7.4	7.4	7.6	7.4	7.5	7.7	7.3	7.5
31				7.5	7.3	7.4	---	---	---	7.6	7.2	7.5
MONTH				7.6	7.1	7.4	7.7	6.9	7.5	8.0	6.9	7.3

01454720 LEHIGH RIVER AT EASTON, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	7.4	7.2	7.3	7.5	7.2	7.3	7.1	7.0	7.1	7.3	7.1	7.2
2	7.4	7.2	7.3	7.5	7.2	7.3	7.2	6.9	7.1	7.3	7.1	7.2
3	7.6	7.2	7.4	7.5	7.2	7.3	7.2	7.0	7.1	7.5	7.1	7.2
4	7.5	7.2	7.3	7.6	7.1	7.3	7.2	7.1	7.1	7.6	7.2	7.3
5	7.4	7.1	7.2	7.8	7.2	7.4	7.2	7.1	7.1	7.5	7.1	7.2
6	7.3	6.9	7.2	7.8	7.2	7.4	7.3	6.7	7.1	7.7	7.0	7.3
7	7.5	7.3	7.3	7.4	7.2	7.3	7.4	7.0	7.2	7.6	7.2	7.4
8	7.3	7.3	7.3	7.3	7.1	7.2	7.4	7.1	7.2	7.5	7.2	7.4
9	7.4	7.2	7.3	7.3	6.7	7.1	7.4	7.0	7.2	7.3	7.1	7.1
10	7.6	7.1	7.4	7.3	7.1	7.2	7.6	7.2	7.3	7.2	7.0	7.1
11	7.5	7.2	7.4	7.4	7.1	7.2	7.5	7.2	7.3	7.3	7.1	7.2
12	7.6	7.2	7.3	7.5	7.0	7.2	7.5	7.2	7.3	7.4	7.1	7.2
13	7.5	7.2	7.3	7.5	7.1	7.3	7.6	7.2	7.3	7.6	7.1	7.3
14	7.6	7.0	7.3	7.3	7.1	7.2	7.5	7.1	7.3	7.6	7.3	7.4
15	7.7	7.3	7.5	7.2	7.0	7.0	7.5	7.1	7.2	7.6	7.3	7.4
16	7.4	7.1	7.2	---	---	---	7.4	7.0	7.2	7.7	7.4	7.5
17	7.2	7.1	7.1	---	---	---	7.5	7.2	7.3	7.7	7.3	7.5
18	7.1	6.7	7.0	7.0	6.7	6.9	7.5	7.2	7.4	8.0	7.4	7.8
19	7.0	6.9	6.9	7.2	6.9	7.1	7.4	7.2	7.3	7.9	7.4	7.6
20	7.1	7.0	7.0	7.3	7.0	7.2	7.4	7.1	7.2	7.8	7.3	7.5
21	7.2	6.9	7.1	7.4	7.0	7.2	7.4	7.1	7.2	7.5	7.2	7.3
22	7.4	7.1	7.2	7.5	7.0	7.2	7.5	7.1	7.3	7.4	7.1	7.2
23	7.5	7.2	7.3	7.6	7.1	7.2	7.6	7.0	7.4	7.4	7.1	7.2
24	7.4	7.2	7.2	7.7	7.2	7.4	7.8	7.3	7.5	7.3	7.1	7.2
25	7.2	7.0	7.2	7.7	7.3	7.4	7.7	7.2	7.4	7.4	7.2	7.3
26	7.4	7.1	7.2	7.4	7.1	7.3	7.2	7.1	7.1	7.5	7.3	7.4
27	7.5	7.1	7.3	7.1	7.0	7.0	7.3	7.1	7.2	7.3	6.9	7.1
28	7.4	7.2	7.3	7.2	7.0	7.1	7.5	7.1	7.2	7.0	6.7	6.8
29	7.5	7.2	7.3	7.3	7.1	7.2	7.6	7.2	7.3	7.0	6.8	6.8
30	7.4	7.2	7.3	7.4	7.1	7.2	7.5	7.0	7.4	6.8	6.7	6.7
31	---	---	---	7.2	6.9	7.1	7.4	7.2	7.3	---	---	---
MONTH	7.7	6.7	7.3	7.8	6.7	7.3	7.8	6.7	7.3	8.0	6.7	7.3

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

[illegible]

LEHIGH RIVER BASIN

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01454720 LEHIGH RIVER AT EASTON, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	11.5	9.5	10.5	20.0	17.5	18.5
2				---	---	---	9.5	8.5	9.0	18.5	16.5	18.0
3				---	---	---	8.5	8.0	8.0	16.5	13.0	14.0
4				---	---	---	8.5	7.5	8.0	14.0	12.0	13.0
5				---	---	---	11.5	8.5	10.0	16.0	13.5	14.5
6				---	---	---	13.5	11.5	12.5	16.5	15.0	16.0
7				---	---	---	13.5	13.0	13.0	16.5	16.0	16.0
8				---	---	---	13.0	11.0	12.0	16.5	15.0	16.0
9				---	---	---	11.0	9.5	10.0	17.0	15.0	16.0
10				---	---	---	9.5	8.5	9.0	18.5	16.0	17.5
11				---	---	---	9.0	9.0	9.0	20.5	18.5	19.5
12				---	---	---	10.5	9.0	10.0	22.0	20.5	21.0
13				---	---	---	12.5	11.0	11.5	23.0	22.0	22.5
14				---	---	---	13.0	12.0	12.5	23.5	22.5	23.0
15				---	---	---	13.0	12.5	13.0	23.0	21.5	22.5
16				---	---	---	14.0	13.0	13.5	21.5	20.0	21.0
17				---	---	---	14.5	13.5	14.0	20.0	19.0	19.5
18				---	---	---	15.0	14.0	14.5	19.0	18.0	18.5
19				---	---	---	16.5	14.5	15.5	18.5	18.0	18.5
20				---	---	---	18.0	16.0	17.5	19.5	18.0	18.5
21				---	---	---	19.0	17.5	18.5	21.0	19.0	20.0
22				---	---	---	20.5	19.0	19.5	22.5	20.5	21.5
23				---	---	---	20.0	19.0	20.0	21.5	20.0	21.0
24				---	---	---	19.0	16.5	18.0	21.0	19.5	20.0
25				---	---	---	16.5	15.5	16.0	22.0	19.5	20.5
26				---	---	---	16.5	15.0	15.5	23.0	20.5	21.5
27				10.0	8.5	9.5	18.0	16.0	17.0	24.5	21.5	23.0
28				12.0	10.0	11.0	18.0	16.5	17.5	24.0	23.0	23.5
29				14.5	12.0	13.5	17.5	16.5	17.0	23.5	22.0	22.5
30				15.0	14.0	14.5	19.0	16.5	17.5	23.0	21.5	22.0
31				14.0	11.5	13.0	---	---	---	22.5	21.5	22.0
MONTH				15.0	8.5	12.5	20.5	7.5	13.5	24.5	12.0	19.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	22.5	21.0	21.5	23.0	22.0	22.5	24.5	23.0	23.5	23.0	22.0	22.5
2	23.0	21.5	22.5	23.5	22.0	23.0	24.0	23.0	23.5	23.0	21.5	22.0
3	24.0	22.0	23.0	24.0	22.5	23.5	24.0	23.0	23.5	24.5	22.0	23.0
4	24.0	22.5	23.0	25.5	23.0	24.0	24.0	23.5	23.5	25.5	23.5	24.5
5	23.5	20.5	22.0	26.0	24.0	25.0	24.5	23.5	24.0	26.5	24.5	25.5
6	21.0	20.0	20.5	26.5	25.0	26.0	25.0	24.0	24.5	27.0	26.0	26.5
7	21.5	20.5	21.0	26.0	25.0	25.5	25.5	23.5	24.5	27.5	26.5	27.0
8	21.5	21.0	21.0	25.0	23.5	24.5	25.5	24.5	25.5	27.5	26.0	27.0
9	22.0	20.5	21.0	24.0	23.0	23.5	26.5	24.0	25.0	26.5	26.0	26.0
10	23.5	21.0	22.5	24.5	23.5	24.0	27.5	25.0	26.0	26.0	25.0	25.5
11	24.0	22.5	23.0	25.0	24.0	24.5	27.5	26.0	26.5	25.5	24.0	25.0
12	24.0	22.5	23.0	25.5	24.5	25.0	26.5	25.5	26.0	24.0	22.5	23.0
13	23.5	22.0	22.5	25.5	24.5	25.0	26.5	25.0	26.0	23.0	21.0	21.5
14	21.5	20.0	20.5	25.5	25.0	25.5	27.5	25.0	26.0	21.0	20.0	20.5
15	21.5	19.5	20.5	25.5	24.5	25.0	28.5	26.5	27.5	20.5	19.5	20.0
16	21.0	20.5	20.5	---	---	---	28.5	27.0	27.5	20.5	19.5	20.0
17	21.0	20.0	20.5	---	---	---	27.0	26.5	26.5	20.5	19.5	20.0
18	21.5	20.5	21.0	24.5	23.0	24.0	27.0	25.0	25.5	21.5	20.0	21.0
19	21.5	20.5	21.0	25.5	24.5	24.5	25.0	24.0	24.5	22.0	20.5	21.0
20	22.0	21.0	21.5	26.5	24.5	25.5	25.0	24.0	24.5	22.5	21.0	21.5
21	22.0	20.5	21.5	27.5	25.5	26.0	25.0	24.0	24.0	23.0	21.5	22.0
22	22.5	21.5	22.0	28.0	26.0	27.0	24.5	23.5	24.0	22.5	21.5	22.0
23	24.0	22.0	23.0	27.5	26.0	26.5	24.0	23.0	23.5	22.0	21.5	21.5
24	24.5	23.5	24.0	26.5	25.0	26.0	23.5	22.5	23.0	22.0	21.5	21.5
25	24.5	23.5	24.0	26.5	25.0	26.0	23.5	22.5	23.0	21.5	21.0	21.5
26	23.5	22.0	23.0	26.0	25.0	25.5	23.0	22.0	22.5	21.5	20.5	20.5
27	22.0	21.0	22.0	25.0	24.0	24.5	24.5	22.5	23.5	20.5	19.0	20.0
28	21.0	20.5	21.0	25.5	24.5	25.0	25.0	23.0	24.0	19.5	17.5	18.5
29	22.0	20.0	21.0	26.0	25.0	25.5	25.0	23.5	24.0	18.0	17.0	17.5
30	22.5	21.0	21.5	26.5	24.5	25.5	25.0	24.5	24.5	18.0	17.5	17.5
31	---	---	---	25.5	24.5	25.0	24.5	23.0	24.0	---	---	---
MONTH	24.5	19.5	22.0	28.0	22.0	25.0	28.5	22.0	24.5	27.5	17.0	22.0

LEHIGH RIVER BASIN

01454720 LEHIGH RIVER AT EASTON, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	9.6	8.5	8.9									
2	---	---	---									
3	---	---	---									
4	---	---	---									
5	---	---	---									
6	---	---	---									
7	---	---	---									
8	---	---	---									
9	---	---	---									
10	---	---	---									
11	---	---	---									
12	---	---	---									
13	---	---	---									
14	---	---	---									
15	---	---	---									
16	---	---	---									
17	---	---	---									
18	---	---	---									
19	---	---	---									
20	---	---	---									
21	---	---	---									
22	---	---	---									
23	---	---	---									
24	---	---	---									
25	---	---	---									
26	---	---	---									
27	---	---	---									
28	---	---	---									
29	---	---	---									
30	---	---	---									
31	---	---	---									
MONTH												
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	11.3	10.0	10.7	11.1	8.0	8.8
2				---	---	---	12.6	11.1	11.8	8.2	7.8	8.0
3				---	---	---	12.2	11.8	12.1	10.0	8.2	9.0
4				---	---	---	13.9	11.8	12.7	11.9	10.1	10.8
5				---	---	---	13.1	10.9	12.1	11.4	10.0	10.7
6				---	---	---	10.8	9.8	10.5	10.7	9.5	9.7
7				---	---	---	10.6	9.8	10.1	9.5	9.3	9.4
8				---	---	---	11.5	10.1	10.5	10.1	9.0	9.6
9				---	---	---	11.8	10.8	11.3	10.2	9.4	9.7
10				---	---	---	13.2	11.5	12.1	10.0	8.7	9.4
11				---	---	---	12.6	11.9	12.2	9.2	8.3	8.8
12				---	---	---	13.0	11.5	12.1	8.5	7.7	8.1
13				---	---	---	13.3	11.4	12.4	7.9	7.0	7.6
14				---	---	---	12.3	10.5	11.1	7.7	6.9	7.2
15				---	---	---	11.7	10.1	10.5	8.5	6.7	7.3
16				---	---	---	12.7	10.0	10.9	7.9	7.0	7.3
17				---	---	---	12.7	9.9	10.7	8.2	7.1	7.6
18				---	---	---	13.5	9.9	11.1	8.3	7.4	7.8
19				---	---	---	12.9	9.6	10.6	8.8	7.8	8.2
20				---	---	---	12.3	8.9	9.7	9.4	7.9	8.4
21				---	---	---	12.8	8.8	9.9	9.4	7.4	8.0
22				---	---	---	12.4	8.6	9.5	9.4	7.2	8.1
23				---	---	---	9.3	8.1	8.5	8.1	7.0	7.5
24				---	---	---	8.9	8.0	8.4	10.8	7.1	8.1
25				---	---	---	9.1	8.5	8.7	11.1	7.2	8.2
26				---	---	---	11.7	8.6	9.5	11.3	6.9	8.2
27				17.0	13.1	14.2	11.5	8.5	9.2	10.6	6.5	7.7
28				15.0	12.5	13.4	8.9	8.4	8.6	7.8	6.1	6.9
29				13.2	9.9	11.4	11.3	8.4	9.0	8.9	6.0	7.2
30				10.2	9.3	9.7	12.1	8.6	9.4	8.9	6.6	7.7
31				10.0	9.3	9.7	---	---	---	8.0	6.8	7.3
MONTH				17.0	9.3	11.7	13.9	8.0	10.5	11.9	6.0	8.3

LEHIGH RIVER BASIN

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01454720 LEHIGH RIVER AT EASTON, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	7.8	6.7	7.1	8.8	7.2	7.8	7.0	6.6	6.8	7.4	5.5	6.3
2	8.2	6.4	7.1	10.4	7.0	8.0	7.9	6.8	7.2	8.3	6.2	6.8
3	8.4	6.6	7.2	8.7	6.7	7.5	8.6	7.1	7.5	8.1	6.0	6.8
4	8.6	6.4	7.3	8.9	6.2	7.2	9.6	7.1	7.6	8.0	6.2	6.9
5	7.7	6.3	6.7	8.7	6.1	7.3	9.3	7.0	7.5	7.1	5.4	6.1
6	8.1	6.7	7.3	8.3	5.9	7.0	10.0	6.7	7.7	7.9	5.2	6.5
7	9.4	7.3	8.0	7.6	6.1	6.7	9.6	6.6	7.3	8.0	5.1	6.7
8	8.1	7.0	7.4	7.6	6.4	6.9	8.4	5.9	7.1	7.5	5.2	6.3
9	8.2	6.7	7.3	8.8	6.7	7.3	8.3	6.1	6.9	6.8	5.8	6.2
10	9.1	6.8	7.7	8.5	7.0	7.4	8.4	5.9	6.9	7.2	5.4	6.2
11	8.3	6.5	7.3	9.8	6.8	7.6	7.6	5.9	6.7	7.7	5.8	6.6
12	8.3	6.0	7.0	10.0	6.7	7.5	8.8	6.1	7.0	7.6	6.0	6.6
13	8.0	6.0	6.9	9.7	6.5	7.4	9.8	6.3	7.4	8.4	5.2	6.6
14	9.3	6.5	7.6	8.4	6.7	7.1	8.1	6.0	6.9	8.4	6.3	7.2
15	10.8	7.0	8.3	7.0	6.3	6.7	7.6	4.9	6.3	8.4	6.6	7.3
16	7.7	7.3	7.5	---	---	---	7.0	4.7	5.7	8.4	6.4	7.1
17	7.9	7.4	7.6	---	---	---	7.4	5.0	6.0	8.1	5.7	6.8
18	7.5	7.3	7.4	7.8	7.0	7.4	7.3	5.3	6.2	---	---	---
19	7.9	7.5	7.7	7.7	6.7	7.1	7.4	5.7	6.4	---	---	---
20	8.0	7.5	7.7	7.5	6.2	6.7	8.0	5.9	6.7	---	---	---
21	8.7	7.5	7.9	7.7	5.7	6.4	7.9	5.8	6.5	---	---	---
22	8.8	7.2	7.8	7.4	5.4	6.4	9.1	5.8	7.0	---	---	---
23	8.6	7.0	7.6	7.9	5.2	6.3	9.7	6.3	7.4	---	---	---
24	7.9	6.7	7.1	8.4	5.6	6.6	10.6	6.4	7.8	8.6	7.6	8.0
25	7.7	6.5	6.9	8.3	5.8	7.0	8.9	6.1	6.9	8.9	7.5	8.0
26	8.3	6.5	7.2	7.1	6.0	6.5	7.2	6.4	6.7	8.8	7.8	8.2
27	8.7	7.0	7.7	6.5	6.0	6.3	8.5	6.3	6.8	8.1	6.3	7.0
28	8.4	7.3	7.8	7.7	6.0	6.7	9.3	5.7	6.7	8.4	6.6	7.6
29	10.1	7.2	8.2	7.8	6.3	6.9	8.2	5.6	6.5	10.2	7.9	9.3
30	8.8	7.3	7.9	8.6	6.2	7.0	8.9	5.1	6.3	9.3	7.9	8.6
31	---	---	---	7.0	5.8	6.4	6.0	5.3	5.7	---	---	---
MONTH	10.8	6.0	7.5	10.4	5.2	7.0	10.6	4.7	6.8	10.2	5.1	7.1

LEHIGH RIVER BASIN

LAKES AND RESERVOIRS IN LEHIGH RIVER BASIN

01447780 FRANCIS E. WALTER RESERVOIR (formerly published as Bear Creek Reservoir).--Lat 41°06'45", long 75°43'15", Luzerne County, Hydrologic Unit 02040106, at dam on Lehigh River, 2,200 ft downstream from Bear Creek and 5 mi northeast of White Haven. DRAINAGE AREA, 289 mi². PERIOD OF RECORD, February 1961 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

Reservoir formed by an earthfill embankment covered with a rock shell, with concrete spillway at elevation 1,450.0 ft. Storage began Feb. 17, 1961; water in reservoir first reached conservation pool elevation in June 1961. Total capacity at elevation 1,450.0 ft is 110,700 acre-ft of which 108,700 acre-ft is controlled storage above elevation 1,300.0 ft, conservation pool. Dead storage is 2,000 acre-ft. Reservoir is used for flood control and recreation. Flow regulated by three gates and low-flow by-pass system. Records furnished by the Corps of Engineers.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 62,100 acre-ft Sept. 28, 1985, elevation, 1,417.08 ft; minimum (after establishment of conservation pool), 980 acre-ft July 6, 1982, elevation, 1,287.70 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 62,100 acre-ft Sept. 28, elevation, 1,417.08 ft; minimum, 1,340 acre-ft Feb. 18, elevation, 1,293.00 ft.

01449400 PENN FOREST RESERVOIR.--Lat 40°55'45", long 75°33'45", Carbon County, Hydrologic Unit 02040106, at dam on Wild Creek, 0.7 mi upstream from Hatchery, 2.6 mi upstream from Wild Creek Dam, 4.4 mi upstream from mouth, and 10 mi northeast of Palmerton. DRAINAGE AREA, 16.5 mi. PERIOD OF RECORD, October 1958 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by city of Bethlehem).

Reservoir formed by an earthfill dam, with ungated concrete spillway at elevation 1,000.00 ft. Storage began in October 1958. Capacity at elevation 1,000.00 ft is 19,980 acre-ft. Reservoir is used for municipal water supply. Figures given herein represent total contents. Regulation is done by valves on pipe through dam. Records furnished by city of Bethlehem. Figures given herein include diversion, since October 1969, from Tunkhannock Creek basin in to Wild Creek basin.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 20,800 acre-ft Apr. 16, 1983, elevation, 1,001.69 ft; minimum, 176 acre-ft Oct. 6, 1965, elevation, 902.40 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 18,560 acre-ft Oct. 1, elevation, 996.85 ft; minimum, 9,550 acre-ft Sept. 26, elevation, 972.27 ft.

01449700 WILD CREEK RESERVOIR.--Lat 40°53'50", long 75°33'50", Carbon County, Hydrologic Unit 02040106, at dam on Wild Creek, 1.6 mi upstream from mouth, 2.4 mi south of Hatchery, and 7.5 mi northeast of Palmerton. DRAINAGE AREA, 22.2 mi. PERIOD OF RECORD, January 1941 to current year. Nonrecording gage. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by city of Bethlehem).

Reservoir formed by earthfill dam, with concrete ungated spillway at elevation 820.00 ft. Storage began January 27, 1941; water in reservoir first reached minimum pool elevation in February 1941. Total capacity at elevation 820.00 ft is 12,500 acre-ft of which 12,000 acre-ft is controlled storage. Reservoir is used for municipal water supply. Figures given herein represent usable contents. Regulation is accomplished by valves on pipe through dam. Records furnished by city of Bethlehem. Since October 1969 the basin upstream has received diversion from Tunkhannock Creek basin.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 12,880 acre-ft May 23, 1942, elevation, 822.93 ft; minimum (after first filling), 2,680 acre-ft Nov. 15, 1966, elevation, 774.10 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 11,160 acre-ft Oct. 8, elevation, 816.67 ft; minimum, 10,070 acre-ft May 24, elevation, 812.69 ft.

01449790 BELTZVILLE LAKE.--Lat 40°50'56", long 75°38'19", Carbon County, Hydrologic Unit 02040106, at dam on Pohopoco Creek, 0.45 mi upstream from gaging station on Pohopoco Creek, 0.55 mi upstream from Sawmill Run and 2.3 mi northeast of Parryville. DRAINAGE AREA, 96.3 mi. PERIOD OF RECORD, February 1971 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

Reservoir formed by an earth and rockfill dam with ungated, partially lined spillway at elevation 651.00 ft. Storage began Feb. 8, 1971. Capacity at elevation 651.00 ft is 68,300 acre-ft. Ordinary minimum (conservation) pool elevation is 628.00 ft, capacity, 41,250 acre-ft. Dead storage is 1,390 acre-ft. Reservoir is used for recreation, flood control, low flow augmentation and water supply. Figures given herein represent total contents. Regulation is accomplished by a multi-level water-quality outlet system, and two flood-control gates. Records furnished by Corps of Engineers.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 49,730 acre-ft Jan. 29, 1976, elevation, 636.30 ft minimum, 15,110 acre-ft Mar. 31, 1983, elevation, 588.79 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 43,500 acre-ft Sept. 28, elevation, 630.30 ft; minimum, 39,800 acre-ft Nov. 28, elevation 626.56.

MONTHEND ELEVATION AND CONTENTS AT 2400, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

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Date	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)
<u>01447780 Francis E. Walter Reservoir</u>				<u>01449400 Penn Forest Reservoir</u>		
Sept. 30	1300.00	2000	--	987.03	18640	--
Oct. 31	1300.67	2070	+ 1.1	994.00	17310	- 21.6
Nov. 30	1305.36	2550	+ 8.1	989.40	15410	- 31.9
Dec. 31	1303.89	2390	- 2.6	985.92	14070	- 21.8
CAL YR 1984	--	--	- 0.4	--	--	- 6.8
Jan. 31	1299.99	2000	- 6.3	984.02	13370	- 11.4
Feb. 28	1299.89	1990	- 0.2	982.29	12770	- 10.8
Mar. 31	1301.56	2160	+ 2.8	984.04	13380	+ 9.9
Apr. 30	1298.62	1850	- 5.2	983.71	13270	- 1.8
May 31	1391.67	36900	+ 570	986.75	14390	+ 18.2
June 30	1391.40	36680	- 3.7	985.23	13810	- 9.7
July 31	1392.86	37850	+ 19.0	981.69	12560	- 20.3
Aug. 31	1389.54	35190	- 43.2	977.08	11010	- 25.2
Sept. 30	1397.83	42250	+ 119	974.96	10330	- 11.4
WTR YR 1985	--	--	+ 55.6	--	--	- 11.5
<u>01449700 Wild Creek Reservoir</u>				<u>01449790 Beltzville Lake</u>		
Sept. 30	815.92	10960	--	627.69	40960	--
Oct. 31	814.13	10460	- 8.1	627.49	40770	- 3.1
Nov. 30	815.13	10740	+ 4.7	626.72	40030	- 12.4
Dec. 31	816.52	11120	+ 6.2	628.10	41340	+ 21.3
CAL YR 1984	--	--	- 1.0	--	--	+ 0.2
Jan. 31	815.13	10740	- 6.2	628.00	41250	- 1.5
Feb. 28	815.66	10880	+ 2.5	628.05	41300	+ 0.9
Mar. 31	815.46	10830	- 0.8	628.08	41330	+ 0.5
Apr. 30	815.08	10720	- 1.8	628.00	41250	- 1.3
May 31	813.26	10220	- 8.1	628.14	41380	+ 2.1
June 30	813.15	10190	- 0.5	628.23	41470	+ 1.5
July 31	813.37	10250	+ 1.0	628.12	41360	- 1.8
Aug. 31	813.40	10260	+ 0.2	628.18	41420	+ 1.0
Sept. 30	814.46	10550	+ 4.9	628.03	41280	- 2.4
WTR YR 1985	--	--	- 0.6	--	--	+ 0.4

TOHICKON CREEK BASIN

01459500 TOHICKON CREEK NEAR PIPERSVILLE, PA

LOCATION.--Lat 40°26'01", long 75°07'01", Bucks County, Hydrologic Unit 02040105, on right bank at highway bridge, 1.5 mi northeast of Pipersville, and 4.5 mi upstream from mouth.

DRAINAGE AREA.--97.4 mi².

PERIOD OF RECORD.--July 1935 to current year.

REVISED RECORDS.--WDR PA-75-1: 1974.

GAGE.--Water-stage recorder. Datum of gage is 258.96 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Oct. 1-3, Jan. 12 to Feb.15, Sept. 5-20. Record good except for periods of estimated record, which are fair. Regulation since December 1973 by Nockamixon Lake about 6.2 mi upstream. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--50 years, 147 ft³/s, 20.49 in/yr, adjusted for storage since December 1973.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 16,200 ft³/s July 7, 1984, gage height, 11.32 ft from rating curve extended above 3,600 ft³/s on basis of slope-area measurement at gage height 10.48 ft; minimum, 0.05 ft³/s Sept. 24, 29, Oct. 6, 1941.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 7,980 ft³/s Sept. 27, gage height, 8.42 ft; minimum daily, 3.9 ft³/s Oct. 14.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	10	64	9.8	159	27	104	71	12	49	11	132	8.8
2	13	51	9.0	159	27	91	86	17	39	11	127	7.4
3	9.0	435	11	159	27	73	72	1110	28	9.9	65	6.6
4	4.7	334	23	168	27	61	66	991	23	9.5	38	6.2
5	4.7	85	15	175	27	88	58	360	44	8.5	27	6.0
6	4.8	35	112	128	27	78	62	178	59	8.1	21	5.8
7	4.2	21	172	113	27	73	62	117	52	9.3	17	5.6
8	4.0	15	158	116	27	75	61	79	51	9.5	21	5.4
9	4.3	12	111	89	27	66	52	53	50	8.9	19	5.2
10	4.0	347	87	66	27	58	43	44	46	8.1	16	5.0
11	4.2	310	77	52	27	93	37	38	42	7.4	14	4.9
12	4.3	14	65	47	80	164	35	33	37	6.7	12	4.8
13	4.3	9.7	58	43	540	132	31	31	33	6.8	11	4.7
14	3.9	8.3	51	40	350	102	27	28	28	5.8	9.9	4.6
15	4.3	8.1	55	38	230	75	27	23	24	6.1	9.7	4.5
16	4.3	8.1	56	36	199	60	27	21	30	8.2	8.9	4.4
17	4.2	7.4	58	35	192	57	33	41	52	9.6	7.5	4.4
18	4.3	7.4	57	34	158	46	25	144	77	8.8	6.5	4.3
19	4.5	8.5	56	33	96	36	24	108	58	7.6	5.7	4.2
20	4.3	7.4	68	32	104	38	25	68	38	6.8	5.1	4.1
21	4.8	6.7	71	31	104	33	23	52	30	6.1	5.5	4.1
22	6.4	6.7	92	30	113	40	22	57	25	7.3	5.0	4.2
23	47	6.3	148	30	226	53	20	40	21	7.4	4.8	4.2
24	44	6.2	155	29	346	63	18	36	23	6.3	4.5	4.6
25	47	6.2	130	29	334	56	18	30	20	5.3	7.4	4.5
26	43	6.0	90	28	242	49	18	26	16	9.9	11	4.8
27	39	5.9	74	28	196	47	18	24	13	17	12	4420
28	35	6.0	79	28	136	44	17	22	11	17	12	3600
29	174	15	154	28	---	44	16	19	11	17	11	609
30	164	11	159	28	---	42	14	16	11	15	10	211
31	103	---	159	28	---	39	---	15	---	21	9.9	---
TOTAL	812.5	1863.9	2619.8	2039	3943	2080	1108	3833	1041	296.9	666.4	8973.3
MEAN	26.2	62.1	84.5	65.8	141	67.1	36.9	124	34.7	9.58	21.5	299
MAX	174	435	172	175	540	164	86	1110	77	21	132	4420
MIN	3.9	5.9	9.0	28	27	33	14	12	11	5.3	4.5	4.1
MEAN†	38.7	36.2	107	65.8	140	67.1	33.4	124	32.3	9.58	21.5	294
CFSM†	.40	.37	1.10	.68	1.44	.69	.34	1.27	.33	.10	.22	3.02
IN†	.45	.42	1.27	.77	1.50	.80	.38	1.46	.37	.11	.25	3.37

CAL YR 1984 TOTAL 90061.4 MEAN 246 MAX 6750 MIN 3.9 MEAN† 246 CFSM† 2.53 IN† 34.36
WTR YR 1985 TOTAL 29276.8 MEAN 80.2 MAX 4420 MIN 3.9 MEAN† 80.9 CFSM† .83 IN† 11.28

† Adjusted for change in contents in Nockamixon Lake.

TOHICKON CREEK BASIN

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RESERVOIR IN TOHICKON CREEK BASIN

01459350 NOCKIAMIXON RESERVIOR.--Lat 40°28'13", long 75°11'10", Buck Couty, Hydrologic Unit 02040105, at dam on Tohickon Creek, 6.2 mi upstream from gaging station on Tohickon Creek, 2.9 mi upstream from Mink Run, 1.3 mi east of Ottsville. DRAINAGE AREA, 73.3 mi². PERIOD OF RECORD, December 1973 to current year. GAGE, water stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Pennsylvania Department of Environmental Resources).

Reservior formed by earthfill dam with concrete spillway at elevation 395.0 ft. Storage began December 1973. Total capacity 66,500 acre-ft at elvation 410 ft. Reservoir is used primarily for recreation, but can be used for water supply and flood control. Records furnished by Pennsylvania Department of Enviromental Resources.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 44,380 acre-ft Jan. 20, 1979, elevation 397.85 ft; minimum (after first filling) 15,900 acre-ft around Dec. 31, 1975, elevation 372.78 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 44, 000 acre ft Sept. 27, elevation 397.60 ft; minimum, 38,450 acre-ft Nov. 12, elevation 393.75 ft.

MOTHEND ELVATION ABD CONTENTS AT 2400, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

Date	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)
<u>01459350 NOCKAMIXON RESERVOIR</u>			
Sept. 30	394.65	39710	--
Oct. 31	395.20	40480	+ 12.5
Nov. 30	394.10	38940	- 25.9
Dec. 31	395.10	40340	+ 22.8
CAL YR 1984	--	--	+ 0.1
Jan. 31	395.10	40340	0
Feb. 28	395.05	40270	- 1.3
Mar. 31	395.05	40270	0
Apr. 30	394.90	40060	- 3.5
May 31	394.90	40060	0
June 30	394.80	39920	- 2.4
July 31	394.80	39920	0
Aug. 31	394.80	39920	0
Sept. 30	395.00	40200	+ 4.7
WTR YR 1985	--	--	+ 0.7

DELAWARE RIVER BASIN

01461000 DELAWARE RIVER AT LUMBERVILLE, PA

LOCATION.--Lat 40°24'27", long 75°02'16", Bucks County, Hydrologic Unit 02040105, at pedestrian bridge at Lumberville, 1.4 mi upstream of Lockatong Creek.

DRAINAGE AREA.--6,598 mi².

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1976 to current year.

COOPERATION.--Field data and samples for laboratory analyses provided by New Jersey Department of Environmental Protection, Division of Water Resources. Analyses of fecal coliform and fecal streptococci by the MPN method, and water-phase nutrients were performed by the New Jersey Department of Health, Division of Laboratories and Epidemiology.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	OXYGEN, DIS- SOLVED (PER- CENT SATUR- ATION)	OXYGEN DEMAND, BIO- CHEM- ICAL, 5 DAY (MG/L)	COLI- FORM, FECAL, EC BROTH (MPN)	STREP- TOCOCCI FECAL (MPN)
FEB 07...	1030	4320	250	8.0	2.0	13.4	97	<.9	20	<2
APR 17...	1030	6000	164	8.0	13.0	11.0	104	E2.0	<20	<2
JUN 18...	1415	8640	173	8.5	21.0	8.2	94	3.3	490	1600
JUL 24...	1045	4710	177	8.0	25.5	8.1	99	E2.2	70	220
AUG 15...	1300	2940	207	8.2	28.0	8.2	105	3.9	20	540

DATE	HARD- NESS (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY LAB (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)
FEB 07...	83	21	7.5	14	1.5	48	26	21	<.10
APR 17...	54	14	4.7	7.8	1.2	33	20	13	<.10
JUN 18...	58	15	5.0	7.0	1.4	40	20	12	<.10
JUL 24...	69	18	5.9	9.0	1.7	47	20	14	.20
AUG 15...	79	20	7.0	12	1.7	54	23	16	<.10

DATE	SILICA, DIS- SOLVED (MG/L AS SiO2)	SOLIDS, SUM OF CONSTITUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRITE TOTAL (MG/L AS N)	NITRO- GEN, NO2+NO3 TOTAL (MG/L AS N)	NITRO- GEN, AMMONIA TOTAL (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	NITRO- GEN, TOTAL (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	CARBON, ORGANIC TOTAL (MG/L AS C)
FEB 07...	2.7	120	.026	1.5	.070	1.1	2.6	.120	2.5
APR 17...	1.5	82	.048	.92	.500	1.0	1.9	.110	2.9
JUN 18...	3.6	88	.032	.82	.220	.77	1.6	.180	3.6
JUL 24...	2.7	100	.045	.87	.160	.66	1.5	.160	4.5
AUG 15...	2.4	110	.024	.95	.160	.56	1.5	.130	2.9

DELAWARE RIVER BASIN

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01462500 DELAWARE RIVER AT WASHINGTON CROSSING, NJ

LOCATION.--Lat 40°17'20", long 74°52'08", Mercer County, Hydrologic Unit 02040105, at bridge at Washington Crossing, 1.4 mi upstream of Jacobs Creek.

DRAINAGE AREA.--6,735 mi².

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1976 to current year.

COOPERATION.--Field data and samples for laboratory analyses provided by New Jersey Department of Environmental Protection, Division of Water Resources. Analyses of fecal coliform and fecal streptococci by the MPN method, and water-phase nutrients were performed by the New Jersey Department of Health, Division of Laboratories and Epidemiology.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	OXYGEN, DIS- SOLVED (PER- CENT SATUR- ATION)	OXYGEN DEMAND, BIO- CHEM- ICAL, 5 DAY (MG/L)	COLI- FORM, FECAL, EC BROTH (MPN)	STREP- TOCOCCI FECAL (MPN)
FEB 07...	1330	3850	234	8.7	1.5	15.8	114	--	<20	<2
APR 17...	1330	6260	157	8.4	14.0	11.4	110	E1.9	<20	<2
JUN 13...	1220	5040	192	7.5	18.0	8.8	94	E1.8	70	350
JUL 24...	1415	5670	199	8.6	26.5	9.8	122	E3.2	70	130
AUG 15...	1030	2940	201	8.6	28.5	8.0	104	E1.5	20	240

DATE	HARD- NESS (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY LAB (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)
FEB 07...	84	21	7.6	15	1.6	49	27	23	<.10
APR 17...	54	14	4.7	8.1	1.3	32	19	13	.10
JUN 13...	67	17	6.0	9.8	1.1	46	20	13	<.10
JUL 24...	74	19	6.5	10	1.7	51	22	15	.10
AUG 15...	79	20	7.0	10	1.6	53	22	16	.10

DATE	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, SUM OF CONSTITUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRITE TOTAL (MG/L AS N)	NITRO- GEN, NO2+NO3 TOTAL (MG/L AS N)	NITRO- GEN, AMMONIA TOTAL (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	NITRO- GEN, TOTAL (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	CARBON, ORGANIC TOTAL (MG/L AS C)
FEB 07...	2.1	130	.027	1.6	.690	.84	2.5	.110	2.7
APR 17...	2.0	81	.033	.86	.210	.45	1.3	.090	3.0
JUN 13...	3.1	98	.021	.90	.120	.47	1.4	.110	--
JUL 24...	2.8	110	.027	.91	.150	.64	1.6	.140	4.3
AUG 15...	2.2	110	.015	.88	.100	.54	1.4	.150	3.0

DELAWARE RIVER BASIN

01462500 DELAWARE RIVER AT WASHINGTON CROSSING, NJ--Continued

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	SULFIDE TOTAL (MG/L AS S)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC TOTAL (UG/L AS AS)	BERYL- LIUM, TOTAL RECOV- ERABLE (UG/L AS BE)	BORON, TOTAL RECOV- ERABLE (UG/L AS B)	CADMIUM TOTAL RECOV- ERABLE (UG/L AS CD)	CHRO- MIUM, TOTAL RECOV- ERABLE (UG/L AS CR)	COPPER, TOTAL RECOV- ERABLE (UG/L AS CU)
JUN 13...	1220	<.5	<10	<1	<10	100	<1	10	3

DATE	IRON, TOTAL RECOV- ERABLE (UG/L AS FE)	LEAD, TOTAL RECOV- ERABLE (UG/L AS PB)	MANGA- NESE, TOTAL RECOV- ERABLE (UG/L AS MN)	MERCURY TOTAL RECOV- ERABLE (UG/L AS HG)	NICKEL, TOTAL RECOV- ERABLE (UG/L AS NI)	SELE- NIUM, TOTAL RECOV- ERABLE (UG/L AS SE)	ZINC, TOTAL RECOV- ERABLE (UG/L AS ZN)	PHENOLS TOTAL (UG/L)
JUN 13...	190	9	30	<.1	10	<1	30	2

DELAWARE RIVER BASIN

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01463500 DELAWARE RIVER AT TRENTON, NJ
(National stream quality accounting network and Radiochemical program station)

LOCATION.--Lat 40°13'18", long 74°46'42", Mercer County, Hydrologic Unit 02040105, on left bank 450 ft upstream from Calhoun Street Bridge at Trenton, 0.5 mi upstream from Assunpink Creek, and at mile 134.5.
DRAINAGE AREA.--6,780 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--February 1913 to current year. October 1912 to February 1913 monthly discharge only, published in WSP 1302. Gage-height records collected in this vicinity since 1904 are contained in reports of the National Weather Service.

REVISED RECORDS.--WSP 951: Drainage area. WSP 1302: 1913-20. WSP 1382: 1924, 1928.

GAGE.--Water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929. Prior to Sept. 30, 1965, at datum 7.77 ft higher. Feb. 24, 1913 to Oct. 2, 1928, nonrecording gage on downstream side of highway bridge at site 500 ft downstream.

REMARKS.--Estimated daily discharges: Jan. 21 to Feb. 1, and Feb. 9-11. Records good except those for periods of ice effect, Jan. 21 to Feb. 1, and Feb. 9-11, which are fair. Diurnal fluctuations at medium and low flow caused by powerplants on tributary streams. Flow regulated by Lakes Wallenpaupack and Hopatcong, and by Pepacton, Cannonsville, Swinging Bridge, Toronto, Cliff Lake, Neversink, and Wild Creek Reservoirs (see Delaware River basin, reservoirs in) and smaller reservoirs. Diversion from Pepacton, Cannonsville, and Neversink Reservoirs and to Delaware and Raritan Canal (see Delaware River basin, diversions). Water diverted just above station by borough of Morrisville, PA, and city of Trenton for municipal supply (see Delaware River basin, diversions). U.S. Army Corps of Engineers satellite telemeter at station.

AVERAGE DISCHARGE.--73 years, 11,667 ft³/s, unadjusted.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 329,000 ft³/s, Aug. 20, 1955, elevation, 28.60 ft, from high-water mark in gage house, from rating curve extended above 230,000 ft³/s; minimum, 1,180 ft³/s Oct. 31, 1963, elevation, 7.26 ft. Flow in Delaware and Raritan Canal not included.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Oct. 11, 1903, reached an elevation of about 28.5 ft above National Geodetic Vertical Datum of 1929, discharge estimated, 295,000 ft³/s. Maximum elevation since 1903, 30.6 ft above National Geodetic Vertical Datum of 1929, Mar. 8, 1904, from floodmark (ice jam).

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 50,000 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Elevation (ft)	Date	Time	Discharge (ft ³ /s)	Elevation (ft)
Sept. 28	2130	*87,200	*16.68	No other peak greater than base discharge.			

Minimum discharge, 2,050 ft³/s, Sept. 18, gage height, 7.67 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3380	3790	7230	12100	3830	12900	6530	4280	7890	4270	5800	3390
2	3630	3530	8620	11600	3900	11200	7550	4260	8490	4440	5720	3570
3	3900	3880	7050	11200	3780	10200	8950	10100	7920	4210	5930	3620
4	3530	3550	7330	10500	3560	9050	9610	19700	7750	3960	5650	3410
5	2970	4300	7110	9860	3180	8580	8890	18400	7650	3640	4820	3080
6	3440	4470	8090	9000	3180	8850	8300	14600	8050	3440	4080	2500
7	3510	4320	9140	8020	3920	8720	8220	12400	8510	3460	3470	2360
8	3310	4250	8150	7570	4090	9320	7930	10800	7490	4310	3980	2690
9	3490	4270	6050	7380	3470	8870	8420	9610	7040	4200	4530	3030
10	3380	4220	5280	6220	3140	8770	8970	8640	6300	4620	4000	3040
11	3320	4330	5040	5410	3060	8290	8810	7690	5200	4330	3910	3600
12	3310	4040	5100	5340	5380	8280	7950	7060	4980	3780	3920	5880
13	3310	3740	5040	5220	12800	12000	7440	6570	4960	3920	3430	4670
14	3370	3690	5090	5420	10600	23300	7100	6310	4660	4800	3280	3640
15	3300	3700	5270	5070	8820	18500	6630	5490	4380	5650	3090	2980
16	3390	3430	5770	5830	7870	15400	6410	5010	5050	6720	2960	2550
17	3360	3450	6070	4600	7070	13200	6340	4740	8680	7180	2890	2290
18	3540	3270	5890	4570	6560	11200	6140	8220	8780	6760	3070	2100
19	3440	3210	5640	4490	6010	10300	5960	8240	8620	5430	3180	2710
20	3620	3280	5640	4800	5580	9930	5730	8030	7190	4430	2950	2970
21	3720	3260	5670	4170	5270	8600	5720	8010	5790	3880	2830	2990
22	3760	3390	7540	3110	5200	8860	5830	7640	4920	3330	2710	2950
23	5420	3260	10200	3240	5770	8420	5690	7000	4580	3280	2700	2970
24	5440	3110	11400	4990	7220	8310	5380	6050	4490	4960	2600	2790
25	4650	3170	11900	5530	10100	7610	5280	5420	4570	5140	2590	2810
26	4550	3170	9780	4550	16700	7240	5250	4930	4730	5070	4160	2750
27	4010	3140	8740	4390	19000	7790	5240	4550	4790	7870	3500	22900
28	3730	3270	7910	4200	15200	6500	5140	4330	4590	8020	3510	65400
29	4440	3570	7970	4040	---	6070	4920	4330	4470	5650	3390	62500
30	4360	4380	9490	3860	---	6040	4520	6230	4160	4630	2940	38000
31	4030	---	11900	3820	---	6110	---	7690	---	4340	2980	---
TOTAL	116610	110440	231100	190100	194260	308410	204850	246330	186680	149720	114570	270140
MEAN	3762	3681	7455	6132	6938	9949	6828	7946	6223	4830	3696	9005
MAX	5440	4470	11900	12100	19000	23300	9610	19700	8780	8020	5930	65400
MIN	2970	3110	5040	3110	3060	6040	4520	4260	4160	3280	2590	2100
CAL YR 1984	TOTAL 4987350	MEAN 13630	MAX 130000	MIN 2970								
WTR YR 1985	TOTAL 2323210	MEAN 6365	MAX 65400	MIN 2100								

DELAWARE RIVER BASIN

01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--Water years 1945 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: June 1968 to September 1978, May 1979 to current year.

pH: June 1968 to September 1978, May to September 1978, February 1980 to August 1982, April 1983 to current year.

WATER TEMPERATURE: October 1944 to September 1978, May 1979 to current year.

DISSOLVED OXYGEN: October 1962 to September 1978, May 1979 to current year.

SUSPENDED-SEDIMENT DISCHARGE: Water years 1949 to 1981.

INSTRUMENTATION.--Temperature recorder since October 1944, water-quality monitor since October 1962.

REMARKS.--Missing continuous water-quality records are the result of malfunction of sensor or sampling mechanism.

Unpublished records of suspended sediment discharge for the period October 1, 1981 to March 31, 1982 are available in files of the district office.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 400 microsiemens, Jan. 24, 1959; minimum, 50 microsiemens, Mar. 19, 1945.

pH: Maximum, 10.3, August 9, 10, 1983; minimum, 5.3, June 22, 1972.

WATER TEMPERATURE: Maximum, 34.0°C, June 18, 1957; minimum 0.0°C on many days during winter months.

DISSOLVED OXYGEN: Maximum, 18.4 mg/L, January 10, 1980; minimum, 4.0 mg/L, Nov. 9, 1972.

EXTREMES FOR CURRENT YEAR.--

SPECIFIC CONDUCTANCE: Maximum, 377 microsiemens, Feb. 12; minimum, 82 microsiemens, Sept. 30.

pH: Maximum, 9.8 Apr. 18, 19; minimum, 6.8, Sept. 29.

WATER TEMPERATURE: Maximum, 31.0°C, Aug. 14, 15; minimum 0.0°C on many days during the winter months.

DISSOLVED OXYGEN: Maximum, 17.4 mg/L, Feb. 10; minimum, 5.4 mg/L, Aug. 17, 19.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	OXYGEN, DIS- SOLVED SATUR- ATION)	OXYGEN DEMAND, BIO- CHEM- ICAL, 5 DAY (MG/L)	COLI- FORM, FECAL, UM-MF (COLS./ 100 ML)	STREP- TOCOCCI FECAL, KF AGAR (COLS. PER 100 ML)
NOV											
14...	1230	3710	218	8.6	8.0	--	13.9	116	1.5	K8	K4
27...	1330	3110	235	8.9	6.0	--	--	--	--	--	--
FEB											
12...	1300	3780	220	8.0	--	5.5	13.9	104	3.5	K48	3900
JUN											
25...	1100	4620	192	8.4	24.0	3.0	9.7	115	1.8	110	K50
SEP											
05...	1115	3230	239	8.2	27.0	2.0	9.2	116	1.4	80	7900

DATE	HARD- NESS (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)
NOV											
14...	84	21	7.6	12	1.5	49	25	17	<.10	1.8	120
27...	88	22	8.0	10	1.4	57	25	15	.10	.5	120
FEB											
12...	76	19	7.0	16	1.5	51	26	25	<.10	1.3	130
JUN											
25...	71	18	6.4	9.2	1.2	49	23	15	<.10	2.1	100
SEP											
05...	77	19	7.2	10	1.5	55	24	16	<.10	2.5	110

DATE	SEDI- MENT, SUS- PENDED (MG/L)	SEDI- MENT, DIS- CHARGE, SUS- PENDED (T/DAY)	SED. SUSP. SIEVE DIAM. 2 FINER THAN .062 MM	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	CARBON, ORGANIC TOTAL (MG/L AS C)
NOV										
14...	14	140	48	1.4	.050	.10	.100	.070	.080	--
27...	--	--	--	--	--	--	--	--	--	--
FEB										
12...	9	92	79	1.6	.220	.80	.150	.080	.100	2.5
JUN										
25...	10	125	93	.82	<.010	.50	.140	.100	.070	--
SEP										
05...	7	61	96	1.0	.060	.60	.150	.130	.100	--

DELAWARE RIVER BASIN

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01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BARIUM, DIS- SOLVED (UG/L AS BA)	BERYL- LIUM, DIS- SOLVED (UG/L AS BE)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)	COBALT, DIS- SOLVED (UG/L AS CO)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)
NOV 14...	1230	40	<1	30	<.5	<1	2	<3	2	28
FEB 12...	1300	80	<1	33	<.5	<1	<1	<3	10	30
JUN 25...	1100	50	<1	29	<.5	<1	<1	<3	2	35
SEP 05...	1115	30	1	31	<.5	<1	<1	<3	3	16

DATE	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	MOLYB- DENUM, DIS- SOLVED (UG/L AS MO)	NICKEL, DIS- SOLVED (UG/L AS NI)	SELE- NIUM, DIS- SOLVED (UG/L AS SE)	SILVER, DIS- SOLVED (UG/L AS AG)	STRON- TIUM, DIS- SOLVED (UG/L AS SR)	VANA- DIUM, DIS- SOLVED (UG/L AS V)
NOV 14...	4	7	4	<.1	<10	1	<1	<1	79	<6
FEB 12...	1	10	22	1.0	<10	2	<1	<1	80	<6
JUN 25...	5	10	4	.3	<10	3	<1	<1	75	<6
SEP 05...	1	<4	9	.2	<10	3	<1	<1	89	<6

DATE	ZINC, DIS- SOLVED (UG/L AS ZN)	GROSS ALPHA, DIS- SOLVED (UG/L AS U-NAT)	GROSS ALPHA, SUSP. TOTAL (UG/L AS U-NAT)	GROSS BETA, DIS- SOLVED (PCI/L AS CS-137)	GROSS BETA, SUSP. TOTAL (PCI/L AS CS-137)	GROSS BETA, DIS- SOLVED (PCI/L AS SR/ YT-90)	GROSS BETA, SUSP. TOTAL (PCI/L AS SR/ YT-90)	RADIUM 226, DIS- SOLVED, RADON METHOD (PCI/L)	URANIUM DIS- SOLVED, EXTRAC- TION (UG/L)
NOV 14...	6	<2.9	<.4	<1.7	<.4	<1.4	<.4	.05	.15
FEB 12...	38	--	--	--	--	--	--	--	--
JUN 25...	17	<2.6	<.5	<1.4	<.6	<1.2	<.5	.06	.20
SEP 05...	4	--	--	--	--	--	--	--	--

DELAWARE RIVER BASIN

01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

SPECIFIC CONDUCTANCE (MICROSIEMENS PER CENTIMETER AT 25 DEG. C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	251	239	244	233	228	230	253	244	249	154	142	146
2	250	245	248	230	226	228	241	150	183	145	142	144
3	249	246	247	234	229	232	155	149	151	156	144	151
4	250	245	248	236	219	226	162	155	159	165	156	159
5	249	244	247	236	204	221	166	161	164	167	164	165
6	261	249	254	238	224	229	186	161	168	171	167	169
7	264	247	257	237	226	233	179	159	171	176	169	172
8	247	233	239	234	227	230	185	179	182	183	177	180
9	240	235	238	232	227	230	177	172	174	185	182	184
10	239	234	237	227	221	225	188	174	181	187	180	183
11	240	236	238	221	205	212	191	186	188	191	187	188
12	244	240	242	214	207	211	201	192	197	212	193	206
13	247	243	245	220	213	216	204	200	202	229	213	221
14	245	239	242	224	220	222	207	204	206	234	228	231
15	241	234	238	224	219	221	204	197	201	227	212	218
16	240	233	236	221	216	219	197	194	195	216	187	206
17	237	230	234	226	218	220	193	182	188	209	187	201
18	236	228	233	227	221	223	182	176	178	215	194	204
19	229	223	226	224	220	222	179	176	177	230	215	222
20	230	224	226	230	225	227	178	177	177	247	231	238
21	230	228	229	231	226	229	186	178	182	247	239	245
22	230	223	228	232	226	229	192	186	188	245	240	243
23	238	222	230	230	221	225	189	183	185	244	238	240
24	233	216	225	226	218	222	183	157	175	254	241	249
25	232	213	220	226	222	224	156	145	148	238	209	222
26	222	215	220	225	219	222	148	146	147	216	207	210
27	221	215	218	224	217	220	155	147	150	218	214	216
28	230	218	224	224	220	222	168	155	159	215	208	211
29	234	226	232	231	219	226	192	169	177	210	202	206
30	225	218	220	243	230	233	196	187	193	207	202	205
31	232	224	227	---	---	---	186	156	165	217	208	212
MONTH	264	213	235	243	204	224	253	145	179	254	142	202

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	228	215	219	118	114	116	177	168	170	178	174	175
2	243	223	234	125	119	122	170	166	167	184	178	181
3	249	230	237	128	125	127	168	157	163	187	170	178
4	262	250	256	136	128	132	157	144	148	191	162	179
5	265	261	263	143	137	139	143	140	141	161	139	146
6	264	259	262	151	144	148	146	142	144	141	138	139
7	265	257	261	154	152	153	151	144	147	146	138	141
8	264	253	259	154	147	151	152	150	151	148	146	147
9	260	248	254	154	147	150	154	150	152	153	148	151
10	253	243	248	155	151	153	153	142	148	156	152	154
11	251	236	244	153	147	150	142	139	141	163	157	160
12	377	179	254	154	150	152	147	139	142	173	163	166
13	238	168	194	162	155	160	152	147	149	174	171	172
14	262	225	246	158	113	127	157	152	154	175	172	174
15	222	201	213	114	110	112	158	155	157	176	172	174
16	204	198	202	113	110	111	165	159	161	178	173	176
17	198	190	194	117	113	115	165	162	163	189	178	184
18	192	190	191	128	118	123	167	163	165	190	168	180
19	190	186	188	132	128	130	172	167	169	205	173	196
20	192	187	189	132	129	131	172	170	171	205	189	198
21	197	191	194	145	129	134	177	172	174	188	169	176
22	209	195	203	149	146	147	181	177	179	175	170	172
23	216	208	213	147	142	145	180	172	176	183	174	179
24	211	203	208	149	143	145	172	169	170	188	180	185
25	204	184	198	151	146	148	175	169	173	201	186	191
26	182	126	154	153	150	151	180	176	178	206	201	203
27	125	110	115	158	152	154	185	179	183	208	202	204
28	114	112	113	157	151	153	183	177	181	209	204	208
29	---	---	---	161	153	156	182	176	179	209	206	207
30	---	---	---	166	160	163	181	176	179	209	205	207
31	---	---	---	171	167	169	---	---	---	204	169	186
MONTH	377	110	215	171	110	141	185	139	163	209	138	177

01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

SPECIFIC CONDUCTANCE (MICROSIEMENS PER CENTIMETER AT 25 DEG. C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	JUNE			JULY			AUGUST			SEPTEMBER		
1	169	161	164	216	213	214	197	169	186	228	215	223
2	182	160	171	218	211	215	226	190	211	244	229	240
3	180	166	172	210	202	205	210	194	202	249	238	245
4	166	161	164	203	199	201	195	182	190	237	226	231
5	162	157	159	209	202	206	182	171	177	227	220	223
6	179	160	167	212	208	211	183	171	176	224	220	222
7	182	176	179	214	210	212	187	183	185	228	223	225
8	179	168	174	225	212	219	197	108	179	232	225	229
9	169	165	167	224	221	223	198	193	195	240	227	231
10	175	168	172	221	204	212	213	197	208	260	242	252
11	182	175	179	203	197	201	210	152	199	260	239	251
12	188	181	184	198	194	196	218	175	210	238	208	228
13	190	187	189	200	195	197	221	217	219	206	184	192
14	193	187	191	205	199	201	222	217	220	184	180	182
15	196	191	193	203	192	200	220	213	216	185	182	183
16	206	185	196	192	180	187	215	212	213	198	184	191
17	213	206	208	181	159	170	216	211	214	209	198	203
18	206	187	190	157	148	151	224	216	220	224	210	219
19	186	178	180	151	147	149	228	223	226	247	224	236
20	177	166	170	155	152	154	236	223	230	262	249	257
21	175	167	171	173	156	165	247	237	242	268	263	266
22	183	174	178	182	175	179	249	240	244	268	248	258
23	194	184	189	188	183	186	242	232	238	247	229	238
24	204	195	199	208	190	200	232	226	229	227	218	223
25	210	202	205	204	173	186	225	190	214	222	218	220
26	214	209	212	178	156	173	230	189	216	219	101	207
27	214	209	212	193	174	186	239	230	236	184	111	147
28	211	202	206	189	168	181	244	233	240	153	98	130
29	206	202	204	174	166	169	231	223	227	95	84	87
30	211	205	206	189	175	183	224	213	220	88	82	85
31	---	---	---	193	181	191	215	213	214	---	---	---
MONTH	214	157	185	225	147	191	249	108	213	268	82	211

TEMPERATURE, WATER (DEG. C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	17.0	15.5	16.0	17.5	16.5	17.0	8.5	7.0	7.5	5.5	4.5	5.0
2	15.5	14.5	15.0	16.5	14.0	16.0	7.5	6.5	7.0	5.5	5.0	5.5
3	16.0	13.5	14.5	14.5	12.5	13.5	6.5	6.0	6.5	5.0	5.0	5.0
4	17.0	14.0	15.5	14.5	12.0	13.5	6.0	5.0	5.5	5.0	4.5	4.5
5	17.5	14.0	15.5	15.5	13.5	14.5	5.5	4.5	5.0	4.5	3.0	3.5
6	17.0	14.0	15.0	15.0	13.0	14.0	5.0	4.0	4.5	3.0	2.5	3.0
7	16.5	13.5	15.0	13.0	11.0	12.0	4.0	3.0	3.0	3.5	2.5	3.0
8	16.0	14.5	15.0	12.0	10.0	11.0	3.0	2.5	2.5	3.0	1.5	2.5
9	17.0	15.0	16.0	11.5	9.5	10.5	3.5	2.0	2.5	1.5	.0	.5
10	18.0	16.0	17.0	12.5	10.5	11.5	3.5	2.5	3.0	.0	.0	.0
11	18.5	16.5	17.5	12.0	11.0	11.5	5.0	3.5	4.0	.5	.0	.0
12	18.5	16.0	17.5	11.5	9.0	10.5	5.0	4.0	4.5	.0	.0	.0
13	18.5	16.5	17.5	9.0	7.5	8.5	6.0	4.5	5.0	.0	.0	.0
14	18.0	16.5	17.0	8.5	6.5	7.5	6.0	5.5	5.5	1.0	.0	.5
15	18.0	15.5	17.0	8.5	6.5	7.5	6.5	6.0	6.0	1.5	.0	.5
16	18.0	15.5	16.5	9.0	7.0	8.0	6.5	6.0	6.0	.0	.0	.0
17	17.0	15.0	16.0	8.0	6.5	7.0	7.5	6.5	7.0	.0	.0	.0
18	17.0	16.0	16.5	7.5	6.5	7.0	7.5	6.5	7.0	.5	.0	.0
19	18.5	16.0	17.0	7.0	5.5	6.5	7.0	6.0	6.5	1.5	.5	.5
20	18.5	17.5	18.0	5.5	4.0	5.0	7.0	6.0	6.0	.5	.0	.0
21	19.0	17.5	18.0	5.5	3.5	4.5	6.0	5.5	5.5	.0	.0	.0
22	19.0	17.5	18.5	5.5	3.5	4.5	7.0	5.5	6.5	.0	.0	.0
23	18.5	17.5	18.5	5.5	3.5	4.5	6.0	5.0	5.5	.0	.0	.0
24	17.5	16.5	17.0	5.5	3.5	4.5	5.0	4.0	4.5	.0	.0	.0
25	17.5	15.5	16.5	6.0	4.0	5.0	4.5	3.5	4.0	.0	.0	.0
26	18.0	16.5	17.0	6.5	4.5	5.5	3.5	2.5	3.0	.0	.0	.0
27	18.5	17.0	18.0	6.5	4.5	5.5	3.0	2.5	2.5	.0	.0	.0
28	20.0	17.5	18.5	9.0	6.0	7.5	3.5	2.5	3.0	.0	.0	.0
29	20.0	18.5	19.0	9.5	7.5	8.5	5.0	3.5	4.0	.0	.0	.0
30	19.5	17.5	18.5	8.5	7.0	7.5	5.0	4.5	5.0	.0	.0	.0
31	19.0	17.5	18.0	---	---	---	4.5	4.0	4.0	.0	.0	.0
MONTH	20.0	13.5	17.0	17.5	3.5	9.0	8.5	2.0	5.0	5.5	.0	1.0

DELAWARE RIVER BASIN

01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

TEMPERATURE, WATER (DEG. C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	.0	.0	.0	3.5	2.5	3.5	11.5	10.0	11.0	21.5	17.5	19.5
2	.0	.0	.0	5.5	3.5	4.5	10.0	9.0	9.5	19.5	16.5	18.0
3	.5	.0	.0	6.0	4.5	5.0	9.0	8.0	8.5	16.5	13.0	14.5
4	.0	.0	.0	5.0	4.5	4.5	9.0	7.5	8.5	14.5	13.0	14.0
5	.0	.0	.0	7.0	4.5	6.0	11.5	8.5	10.0	15.5	13.5	14.5
6	.0	.0	.0	6.0	4.5	5.5	13.0	11.0	12.0	15.5	15.0	15.5
7	.0	.0	.0	5.0	4.0	4.5	12.5	11.0	11.5	16.5	15.5	16.0
8	.0	.0	.0	5.5	4.5	5.0	12.0	10.5	11.5	17.0	15.5	16.0
9	.0	.0	.0	7.0	5.0	6.0	10.5	9.0	10.0	17.5	15.5	16.5
10	.0	.0	.0	7.5	5.5	6.5	10.5	8.5	9.5	19.0	16.5	17.5
11	.0	.0	.0	7.0	6.0	6.5	9.5	9.0	9.5	21.0	18.5	19.5
12	1.0	.0	.5	7.5	6.5	7.0	11.5	8.5	10.0	22.5	20.0	21.5
13	2.0	.5	1.5	8.5	6.5	7.5	13.0	11.0	11.5	24.0	21.0	22.0
14	2.5	1.5	2.0	8.0	7.0	7.5	13.5	11.5	12.5	25.0	22.0	23.5
15	2.0	1.0	1.5	7.0	6.0	6.0	13.0	12.5	12.5	23.5	21.0	22.0
16	2.0	1.0	1.5	6.5	5.0	6.0	14.0	12.5	13.5	22.5	20.0	21.0
17	2.5	1.0	1.5	7.0	5.5	6.0	14.5	12.0	13.0	21.5	20.0	20.5
18	3.0	1.0	2.0	6.5	5.0	6.0	15.5	12.5	14.0	20.0	17.5	18.5
19	4.0	2.0	3.0	6.5	4.5	5.5	18.0	14.5	16.0	19.0	17.0	18.0
20	4.5	2.5	3.5	6.5	6.0	6.0	18.5	16.5	17.0	20.5	17.5	19.0
21	4.5	2.5	3.5	7.0	5.5	6.5	20.0	16.5	18.0	21.0	19.5	20.0
22	5.0	3.5	4.0	7.0	6.0	6.5	21.5	18.0	19.5	21.5	19.5	20.5
23	7.5	4.5	6.0	7.0	6.5	6.5	21.5	18.5	19.5	20.5	19.0	19.5
24	8.0	6.0	7.0	7.5	7.0	7.0	18.5	16.0	17.5	20.5	18.0	19.5
25	8.5	7.5	8.0	8.5	6.5	7.5	16.5	15.5	16.0	23.0	19.0	21.0
26	7.5	5.0	6.0	9.0	6.5	8.0	19.5	15.5	17.5	24.5	20.0	22.0
27	5.0	3.5	4.0	10.5	7.5	9.0	20.5	17.5	19.0	25.5	21.5	23.5
28	4.0	2.5	3.0	12.0	9.5	11.0	19.0	16.5	18.0	25.0	22.5	23.5
29	---	---	---	14.0	11.0	12.5	19.5	15.5	17.5	23.5	21.0	22.0
30	---	---	---	13.5	12.5	13.0	20.5	16.5	18.5	23.5	20.5	22.0
31	---	---	---	12.5	10.5	11.5	---	---	---	22.0	21.0	21.5
MONTH	8.5	.0	2.0	14.0	2.5	7.0	21.5	7.5	14.0	25.5	13.0	19.5

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	23.0	20.5	22.0	24.0	21.0	22.5	26.5	24.0	25.0	25.0	22.0	23.5
2	23.5	21.5	22.5	25.5	21.5	23.5	26.5	23.5	25.0	25.0	22.0	23.5
3	24.0	22.0	23.0	26.0	22.5	24.0	27.0	23.5	25.0	27.0	23.0	25.0
4	23.5	22.5	23.0	28.0	23.5	25.5	27.0	24.0	25.5	28.0	24.5	26.0
5	22.5	20.5	21.5	26.5	24.5	25.5	27.5	24.0	25.5	29.0	25.0	27.0
6	22.5	20.0	21.0	27.0	24.5	25.5	27.0	24.0	25.5	29.0	26.0	27.5
7	22.0	20.5	21.0	27.5	24.5	26.0	27.5	24.5	26.0	30.5	26.0	28.0
8	21.0	20.0	20.5	26.0	24.0	25.0	27.5	23.5	25.5	28.5	27.0	27.5
9	22.0	19.5	21.0	27.5	23.5	25.5	28.0	25.5	26.5	28.5	26.0	27.0
10	24.0	21.0	22.5	27.0	25.0	26.0	30.0	26.0	27.5	27.5	25.5	26.5
11	23.5	21.5	22.5	28.0	24.5	26.5	30.0	26.5	28.0	26.5	24.0	25.5
12	24.0	21.5	22.5	27.5	25.0	26.0	29.5	26.0	27.5	24.5	22.5	23.5
13	22.5	20.0	21.5	29.0	24.5	26.5	29.5	25.5	27.5	22.5	20.5	21.5
14	22.0	19.0	20.5	29.5	26.0	27.5	31.0	26.5	28.5	22.5	18.5	20.5
15	23.5	19.0	21.0	27.5	26.5	27.0	31.0	28.0	29.5	23.0	18.5	20.5
16	23.5	20.5	22.0	27.5	25.5	26.5	29.5	27.5	28.5	23.5	18.5	21.0
17	22.0	20.5	21.5	27.5	25.5	26.5	28.5	25.5	27.0	23.5	19.0	21.0
18	22.5	21.0	21.5	27.5	25.0	26.0	26.0	24.5	25.5	23.5	19.0	21.0
19	23.0	21.0	22.0	28.0	25.0	26.5	26.0	24.5	25.0	24.5	20.0	22.0
20	24.0	21.5	22.5	29.0	25.5	27.0	27.5	24.5	26.0	25.0	21.0	22.5
21	24.5	21.0	22.5	29.5	26.0	27.5	26.0	24.0	25.0	24.0	21.5	22.5
22	24.5	21.5	23.0	29.5	26.5	28.0	25.5	23.0	24.0	23.5	21.5	22.5
23	26.0	22.5	24.0	29.0	25.5	27.0	26.5	22.0	24.0	22.0	21.5	21.5
24	27.0	24.0	25.0	27.5	24.5	26.0	25.5	22.5	24.0	24.0	21.5	22.5
25	25.5	22.5	24.0	28.0	25.0	26.5	23.5	22.5	23.0	24.0	20.0	22.0
26	23.5	22.0	23.0	26.5	25.0	26.0	26.0	23.0	24.0	21.5	20.5	21.0
27	22.0	20.5	21.5	27.5	25.0	26.0	27.0	24.0	25.5	21.5	19.5	20.5
28	21.5	20.0	20.5	26.5	24.5	25.5	27.5	24.0	25.5	19.5	17.5	18.0
29	23.0	20.0	21.5	26.5	24.5	25.5	28.0	24.0	26.0	17.5	16.5	17.0
30	24.0	21.5	22.5	28.0	24.5	26.0	27.0	25.0	26.0	17.0	16.0	16.5
31	---	---	---	27.0	25.5	26.0	25.0	23.0	23.5	---	---	---
MONTH	27.0	19.0	22.0	29.5	21.0	26.0	31.0	22.0	26.0	30.5	16.0	23.0

DELAWARE RIVER BASIN

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01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
OCTOBER			NOVEMBER			DECEMBER			JANUARY			
1	8.7	8.0	8.4	8.5	7.8	8.0	8.9	7.8	8.2	7.9	7.8	7.8
2	8.9	8.0	8.4	8.4	7.7	8.0	8.2	7.7	7.9	7.9	7.8	7.8
3	9.1	8.0	8.5	8.7	7.8	8.1	7.8	7.6	7.6	7.9	7.8	7.9
4	9.2	8.1	8.6	8.8	7.8	8.2	8.1	7.5	7.8	8.1	7.9	8.0
5	9.4	8.1	8.8	8.3	7.4	7.9	8.3	7.7	7.9	8.4	7.9	8.1
6	9.4	8.3	8.8	8.3	7.7	7.9	7.9	7.6	7.7	8.5	7.9	8.1
7	9.5	8.3	8.9	8.7	7.6	8.0	7.9	7.6	7.7	8.6	8.0	8.2
8	9.5	8.3	9.0	8.8	7.8	8.2	8.2	7.7	7.9	8.7	8.0	8.3
9	9.5	8.3	8.9	8.8	7.8	8.2	8.5	7.7	8.0	8.7	8.0	8.2
10	9.4	8.2	8.8	8.9	7.8	8.2	8.5	7.8	8.0	8.7	8.1	8.3
11	9.4	8.2	8.8	8.2	7.7	7.9	8.7	7.8	8.1	8.8	8.1	8.3
12	9.3	8.1	8.7	8.6	7.7	8.0	8.8	7.8	8.2	8.9	8.1	8.4
13	9.4	8.2	8.8	8.7	7.7	8.1	8.9	7.9	8.2	9.0	8.1	8.5
14	9.3	8.3	8.8	8.9	7.8	8.3	8.2	7.8	7.9	8.9	8.2	8.4
15	9.3	8.3	8.8	9.0	7.8	8.3	8.7	7.8	8.1	9.1	8.2	8.5
16	9.3	8.3	8.8	9.0	7.9	8.4	8.6	7.9	8.1	9.0	8.2	8.6
17	9.2	8.2	8.7	9.0	7.8	8.4	9.0	7.8	8.2	9.0	8.3	8.5
18	9.1	8.1	8.5	8.9	7.8	8.3	9.1	7.9	8.3	9.2	8.2	8.6
19	9.2	8.0	8.5	8.9	7.7	8.2	8.2	7.8	8.0	9.3	8.3	8.7
20	9.0	8.0	8.4	9.0	7.7	8.4	9.1	7.8	8.2	9.2	8.2	8.6
21	8.9	7.9	8.3	9.1	7.9	8.5	9.0	7.9	8.2	8.7	8.1	8.4
22	8.7	7.8	8.2	9.1	8.0	8.5	9.0	7.9	8.3	8.9	8.2	8.5
23	8.3	7.8	8.0	9.1	7.9	8.4	8.4	7.9	8.1	8.8	8.3	8.5
24	7.8	7.7	7.7	9.2	7.9	8.5	8.2	7.9	8.0	8.5	8.1	8.3
25	8.2	7.6	7.8	9.3	8.0	8.6	8.1	7.8	7.9	8.2	8.0	8.1
26	8.3	7.7	7.9	9.3	8.0	8.7	8.3	7.8	8.0	8.3	7.9	8.1
27	8.4	7.7	7.9	9.4	8.1	8.7	8.0	7.8	7.9	8.2	7.8	8.0
28	8.6	7.7	8.0	9.4	8.1	8.7	8.4	7.8	8.0	8.3	7.9	8.0
29	8.4	7.7	8.0	9.1	7.9	8.4	8.8	7.9	8.2	8.5	8.0	8.2
30	8.6	7.7	8.0	9.2	7.8	8.4	8.4	8.0	8.1	8.6	8.1	8.3
31	8.8	7.8	8.1	---	---	---	8.0	7.8	8.0	8.3	8.1	8.2
MONTH	9.5	7.6	8.5	9.4	7.4	8.3	9.1	7.5	8.0	9.3	7.8	8.3
DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	8.4	8.1	8.2	7.8	7.7	7.7	9.0	7.6	8.2	8.6	7.4	7.8
2	8.5	8.1	8.2	8.0	7.7	7.9	9.0	7.9	8.4	7.8	7.4	7.5
3	8.7	8.1	8.4	8.2	7.8	7.9	8.5	7.9	8.2	7.4	7.2	7.3
4	9.0	8.3	8.7	7.9	7.8	7.8	8.8	7.8	8.2	7.4	7.2	7.3
5	8.9	8.5	8.7	8.3	7.8	8.0	9.1	7.9	8.4	7.2	7.1	7.1
6	8.8	8.3	8.5	8.4	7.9	8.1	9.2	7.9	8.4	7.1	7.0	7.0
7	8.8	8.3	8.6	8.4	7.9	8.1	9.3	7.9	8.5	7.1	6.9	7.0
8	8.8	8.3	8.6	8.3	7.9	8.1	9.3	7.9	8.6	7.1	7.1	7.1
9	8.8	8.3	8.6	8.6	7.9	8.2	9.2	7.9	8.5	7.1	7.0	7.1
10	8.8	8.3	8.6	8.7	7.9	8.2	9.3	7.9	8.6	7.1	7.0	7.1
11	8.8	8.2	8.5	8.7	8.0	8.2	9.0	7.9	8.4	7.3	7.1	7.2
12	8.4	7.7	8.1	8.5	8.0	8.1	9.6	7.7	8.7	7.4	7.1	7.2
13	7.9	7.8	7.8	8.7	8.0	8.3	9.7	7.9	8.9	7.6	7.2	7.4
14	7.9	7.8	7.9	8.2	7.6	7.8	9.7	8.0	8.8	8.9	7.3	7.9
15	7.9	7.8	7.9	7.6	7.4	7.5	9.2	7.9	8.4	9.3	7.5	8.3
16	8.2	7.9	8.0	7.7	7.5	7.6	9.5	7.7	8.6	9.2	7.5	8.3
17	8.3	7.9	8.1	7.9	7.6	7.7	9.7	7.7	8.8	8.8	7.5	8.0
18	8.5	7.9	8.1	8.0	7.6	7.8	9.8	7.8	8.8	7.6	7.2	7.4
19	8.7	7.9	8.2	8.1	7.6	7.8	9.8	7.7	8.8	7.8	7.2	7.5
20	8.8	8.0	8.3	8.0	7.7	7.8	9.6	7.6	8.5	8.1	7.5	7.8
21	8.9	8.0	8.4	8.4	7.7	7.9	9.5	7.6	8.4	7.8	7.4	7.6
22	9.1	8.0	8.4	8.3	7.8	8.0	9.4	7.6	8.3	---	---	---
23	9.3	8.0	8.6	8.3	7.8	7.9	9.1	7.5	8.1	---	---	---
24	9.2	8.1	8.5	8.2	7.7	7.9	7.9	7.5	7.7	---	---	---
25	8.7	8.1	8.3	8.7	7.7	8.1	8.1	7.6	7.8	---	---	---
26	8.1	7.8	7.9	8.9	7.9	8.4	8.4	7.6	7.9	---	---	---
27	7.7	7.6	7.7	9.0	8.0	8.4	8.3	7.6	7.9	---	---	---
28	7.7	7.6	7.7	9.3	8.0	8.6	7.9	7.5	7.7	---	---	---
29	---	---	---	9.4	7.9	8.6	7.9	7.4	7.6	---	---	---
30	---	---	---	9.2	7.9	8.4	8.4	7.5	7.8	---	---	---
31	---	---	---	8.4	7.7	8.0	---	---	---	---	---	---
MONTH	9.3	7.6	8.3	9.4	7.4	8.0	9.8	7.4	8.3	9.3	6.9	7.5

DELAWARE RIVER BASIN

01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	JUNE			JULY			AUGUST			SEPTEMBER		
1	---	---	---	8.9	7.7	8.3	7.6	7.2	7.4	7.8	7.3	7.5
2	---	---	---	9.0	7.6	8.3	7.9	7.3	7.5	7.9	7.3	7.5
3	---	---	---	9.1	7.5	8.4	7.9	7.4	7.6	7.9	7.3	7.6
4	---	---	---	9.2	7.6	8.5	8.0	7.4	7.6	8.0	7.3	7.6
5	---	---	---	8.9	7.4	8.2	7.9	7.3	7.5	8.2	7.3	7.6
6	7.6	7.4	7.5	8.9	7.4	8.1	8.1	7.3	7.6	8.3	7.2	7.6
7	7.8	7.5	7.7	8.9	7.5	8.1	8.3	7.3	7.6	8.4	7.2	7.6
8	7.8	7.6	7.7	8.2	7.3	7.7	8.0	7.0	7.5	7.9	7.2	7.5
9	7.9	7.6	7.8	8.5	7.3	7.8	8.4	7.4	7.7	7.7	7.2	7.4
10	8.2	7.6	7.9	8.2	7.4	7.8	8.5	7.3	7.7	7.9	7.2	7.4
11	8.4	7.7	7.9	8.6	7.4	7.9	8.9	7.3	8.0	7.9	7.3	7.5
12	8.8	7.6	8.1	8.5	7.4	7.8	9.0	7.5	8.1	7.7	7.3	7.5
13	8.8	7.7	8.2	8.5	7.4	7.8	9.1	7.6	8.3	7.6	7.3	7.4
14	8.9	7.7	8.3	8.4	7.3	7.7	9.1	7.6	8.3	8.0	7.2	7.5
15	9.3	7.7	8.4	7.7	7.2	7.4	9.0	7.6	8.3	8.1	7.2	7.5
16	9.2	7.7	8.3	7.5	7.2	7.3	8.8	7.5	8.2	8.4	7.2	7.6
17	8.0	7.4	7.6	7.5	7.2	7.3	8.8	7.3	8.0	8.5	7.3	7.7
18	7.6	7.3	7.5	7.4	7.1	7.2	7.8	7.2	7.5	8.6	7.4	7.9
19	7.7	7.4	7.6	7.7	7.1	7.3	7.7	7.1	7.3	8.6	7.4	7.9
20	8.0	7.4	7.7	7.9	7.1	7.4	8.1	7.1	7.4	8.6	7.5	8.0
21	8.8	7.5	8.0	8.0	7.1	7.4	7.7	7.2	7.3	8.6	7.5	8.0
22	9.1	7.6	8.3	8.3	7.1	7.5	7.9	7.1	7.4	8.5	7.5	7.9
23	9.1	7.7	8.4	8.6	7.2	7.8	8.1	7.2	7.5	7.8	7.4	7.6
24	9.2	7.7	8.5	9.2	7.4	8.3	8.4	7.2	7.6	8.3	7.4	7.7
25	9.3	7.7	8.5	9.2	7.7	8.4	7.4	7.1	7.2	8.4	7.5	7.8
26	8.6	7.8	8.2	8.2	7.3	7.6	7.4	7.0	7.2	8.2	7.2	7.8
27	8.9	7.8	8.3	7.6	7.2	7.3	7.8	7.1	7.3	7.4	7.1	7.3
28	8.8	7.7	8.2	7.2	7.1	7.2	7.9	7.2	7.4	7.3	6.9	7.2
29	8.8	7.7	8.2	7.6	7.2	7.3	8.1	7.2	7.5	6.9	6.8	6.9
30	9.0	7.7	8.2	8.2	7.3	7.6	7.9	7.2	7.4	7.1	6.9	7.0
31	---	---	---	8.1	7.3	7.5	7.6	7.2	7.3	---	---	---
MONTH	9.3	7.3	8.0	9.2	7.1	7.8	9.1	7.0	7.6	8.6	6.8	7.6

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
	OCTOBER			NOVEMBER			DECEMBER			JANUARY		
1	---	---	---	9.4	7.4	8.1	13.3	10.7	11.5	12.4	12.0	12.2
2	12.4	9.5	10.8	9.7	7.3	8.3	12.3	10.6	11.4	12.3	11.8	12.0
3	14.3	10.1	11.8	11.6	8.5	10.0	11.6	11.1	11.4	12.3	12.0	12.1
4	14.6	10.7	12.4	11.8	9.1	10.2	12.4	10.9	11.6	12.7	12.1	12.3
5	15.0	10.6	12.6	10.9	8.6	9.4	12.9	11.4	12.0	13.4	12.2	12.8
6	15.7	10.5	12.6	10.9	8.5	9.4	12.3	11.7	11.9	14.1	13.0	13.4
7	15.2	10.4	12.6	12.3	9.2	10.5	12.6	11.8	12.2	14.3	13.1	13.6
8	14.7	10.0	12.1	13.1	10.3	11.5	13.3	12.3	12.7	14.3	13.1	13.6
9	13.9	9.7	11.6	13.6	10.8	11.9	13.9	12.6	13.1	15.0	13.6	14.2
10	13.5	9.3	11.2	13.7	10.6	11.8	13.9	12.6	13.0	15.5	14.0	14.7
11	13.4	9.3	10.9	11.5	10.1	10.7	14.0	12.2	12.9	15.7	14.3	14.9
12	13.3	9.1	10.8	12.9	10.0	11.3	13.9	11.9	12.6	15.8	14.6	15.0
13	12.5	9.0	10.5	13.7	11.0	12.1	14.1	11.8	12.6	15.8	14.2	14.9
14	12.4	8.6	10.2	14.9	11.8	13.2	12.2	11.1	11.7	15.3	14.0	14.6
15	12.3	8.8	10.3	15.6	12.4	13.6	13.0	10.8	11.6	15.2	13.8	14.4
16	12.3	9.0	10.4	14.9	12.2	13.4	12.7	11.0	11.5	15.7	14.0	14.8
17	12.1	9.1	10.3	15.5	12.3	13.6	13.2	10.8	11.7	15.5	14.2	14.7
18	11.1	8.5	9.6	15.6	12.4	13.7	13.2	10.9	11.7	15.9	14.1	14.9
19	11.9	8.1	10.6	15.8	12.3	13.7	11.5	10.6	11.0	15.8	14.0	14.7
20	11.1	8.2	9.3	---	---	---	13.3	10.6	11.6	15.8	13.9	14.7
21	10.9	8.0	9.1	---	---	---	13.1	11.2	11.8	16.3	14.6	15.4
22	10.3	7.8	8.9	---	---	---	13.2	11.1	11.8	16.5	14.9	15.5
23	9.4	7.7	8.3	---	---	---	12.4	11.3	11.7	16.1	14.8	15.3
24	8.2	7.4	7.7	---	---	---	12.6	11.8	12.1	15.2	14.2	14.7
25	9.9	7.6	8.6	---	---	---	12.8	11.9	12.3	14.7	13.8	14.2
26	9.5	7.9	8.6	---	---	---	13.7	12.6	13.0	15.2	13.8	14.5
27	10.4	7.8	8.7	---	---	---	13.4	12.9	13.0	15.4	14.0	14.5
28	10.7	7.9	8.9	---	---	---	13.9	12.8	13.2	15.5	14.0	14.6
29	10.0	7.8	8.6	---	---	---	14.1	12.7	13.2	15.7	14.1	14.7
30	10.7	7.6	8.8	14.8	10.5	12.2	13.3	12.5	12.8	15.8	14.1	14.8
31	10.5	7.8	9.0	---	---	---	13.0	12.4	12.7	14.5	13.6	14.0
MONTH	15.7	7.4	10.2	15.8	7.3	11.4	14.1	10.6	12.2	16.5	11.8	14.2

DELAWARE RIVER BASIN

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01463500 DELAWARE RIVER AT TRENTON, NJ--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
FEBRUARY			MARCH			APRIL			MAY			
1	14.9	13.3	13.8	13.2	12.8	13.0	12.2	9.6	10.8	10.0	6.7	8.2
2	15.0	13.1	13.8	13.1	12.6	12.8	12.5	10.1	11.2	8.5	6.3	7.3
3	16.6	13.5	14.8	13.3	12.4	12.8	11.9	10.6	11.2	8.6	7.1	8.0
4	16.6	14.2	15.1	12.5	12.1	12.3	12.7	10.6	11.6	8.7	8.2	8.5
5	16.3	13.8	14.8	12.8	12.0	12.3	13.1	10.7	11.7	8.9	8.6	8.8
6	15.6	13.5	14.4	13.4	11.9	12.6	12.5	10.0	11.1	8.5	8.0	8.3
7	15.8	13.6	14.6	13.7	12.4	13.0	12.9	10.0	11.2	8.0	7.5	7.8
8	16.2	13.8	14.9	13.4	12.5	12.8	12.8	9.8	11.3	8.0	7.4	7.7
9	16.7	14.2	15.4	13.6	12.3	12.8	13.1	10.1	11.6	8.2	7.5	7.8
10	17.4	14.5	15.7	13.6	12.1	12.8	14.0	10.7	12.2	8.3	7.5	7.8
11	17.1	14.6	15.6	13.4	11.9	12.6	13.1	10.8	11.9	8.4	7.1	7.6
12	14.7	13.0	13.7	12.4	11.5	11.8	14.7	10.8	12.6	8.6	6.6	7.5
13	13.6	13.0	13.4	12.9	11.3	12.0	14.9	10.6	12.6	9.5	6.3	7.7
14	13.5	13.0	13.3	11.7	11.2	11.4	14.4	10.3	12.0	10.7	6.7	8.5
15	13.9	13.3	13.6	12.2	11.4	11.8	12.3	9.6	10.8	11.0	6.8	8.8
16	14.1	13.2	13.6	12.7	12.0	12.3	13.2	9.1	10.9	10.8	6.9	8.5
17	14.3	13.3	13.7	12.8	12.0	12.4	13.7	8.6	11.0	9.8	6.7	8.0
18	14.8	13.4	14.0	12.9	11.9	12.4	13.9	8.6	11.0	7.5	7.0	7.3
19	14.5	13.0	13.7	13.2	12.2	12.5	13.6	8.1	10.4	8.6	7.2	7.9
20	14.9	12.7	13.6	12.8	12.0	12.3	12.4	7.4	9.7	9.3	7.6	8.3
21	15.1	12.6	13.7	13.3	12.0	12.6	12.1	7.1	9.3	8.6	7.5	7.9
22	15.2	12.5	13.6	13.2	12.1	12.6	11.3	6.6	8.8	8.1	7.2	7.6
23	15.5	12.0	13.4	12.9	11.8	12.3	10.4	6.2	8.1	8.2	6.1	7.5
24	14.4	11.6	12.7	12.5	11.5	11.9	8.4	6.4	7.4	9.4	7.4	8.3
25	12.8	11.1	11.8	13.4	11.5	12.3	9.1	6.9	7.9	10.3	7.5	8.7
26	12.0	11.3	11.7	13.7	11.7	12.6	9.9	7.3	8.5	11.0	7.3	9.0
27	12.9	11.9	12.5	13.5	11.5	12.4	9.6	7.0	8.2	12.0	7.2	9.5
28	13.1	12.7	12.9	13.7	11.0	12.2	8.6	6.8	7.6	11.0	7.2	8.8
29	---	---	---	13.8	10.4	11.9	9.5	6.9	8.2	10.8	7.0	8.6
30	---	---	---	12.7	9.8	10.9	9.9	7.4	8.6	10.7	7.4	9.0
31	---	---	---	11.2	9.6	10.3	---	---	---	8.7	7.3	8.0
MONTH	17.4	11.1	13.9	13.8	9.6	12.3	14.9	6.2	10.3	12.0	6.1	8.2

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	7.3	7.0	7.2	11.3	7.7	9.3	8.0	6.5	7.0	8.8	6.4	7.4
2	7.5	6.9	7.3	11.9	7.4	9.5	8.6	6.5	7.4	8.8	6.6	7.5
3	8.2	7.1	7.6	12.4	7.4	9.7	8.7	6.8	7.6	9.0	6.6	7.6
4	8.7	7.1	7.8	12.7	7.3	9.8	8.8	6.8	7.7	9.0	6.3	7.5
5	7.6	7.2	7.4	11.1	6.8	8.7	9.0	6.7	7.7	9.2	6.1	7.5
6	8.1	7.2	7.6	10.8	6.8	8.6	9.2	6.7	7.8	9.3	5.8	7.3
7	8.4	7.3	7.8	10.4	6.6	8.4	9.4	6.5	7.7	9.6	5.7	7.4
8	8.4	7.5	7.8	9.6	6.4	7.8	9.1	6.4	7.5	8.5	5.7	7.0
9	8.8	7.6	8.1	10.4	6.9	8.5	9.1	6.5	7.7	8.3	5.7	6.8
10	9.3	7.5	8.3	9.1	7.0	8.1	9.5	6.3	7.7	8.6	5.6	6.8
11	9.6	7.5	8.3	9.9	6.8	8.3	10.1	6.3	8.0	8.6	5.8	7.1
12	9.9	7.4	8.6	9.7	6.8	8.2	10.7	6.1	8.2	8.4	6.5	7.3
13	9.9	7.4	8.7	9.8	7.0	8.2	11.0	6.4	8.5	8.8	6.8	7.7
14	10.7	7.7	9.2	9.3	6.6	7.8	11.0	6.2	8.4	9.6	7.3	8.3
15	11.8	8.0	9.6	8.2	6.3	7.1	10.1	6.1	8.0	9.9	7.4	8.5
16	10.7	7.4	8.8	7.9	6.2	6.9	9.1	5.7	7.4	10.5	7.4	8.7
17	8.0	7.0	7.4	8.3	6.3	7.2	10.0	5.4	7.5	10.7	7.4	8.8
18	7.7	6.9	7.2	8.3	6.6	7.3	7.8	5.8	6.7	11.3	7.4	9.1
19	8.1	7.1	7.6	9.1	6.6	7.7	8.3	5.4	6.7	11.0	7.3	8.9
20	9.2	7.2	8.1	9.4	6.4	7.7	9.2	5.8	7.2	11.0	7.3	8.8
21	10.4	7.5	8.9	9.4	6.3	7.8	8.6	5.8	6.7	10.8	7.2	8.7
22	11.3	7.8	9.4	9.9	6.0	7.8	9.2	6.0	7.4	10.4	7.3	8.6
23	11.6	7.7	9.5	10.3	6.3	8.2	9.5	6.2	7.7	8.9	7.2	7.8
24	12.0	7.6	9.5	12.4	6.9	9.3	10.1	6.4	8.0	10.1	6.8	8.2
25	11.9	7.4	9.5	11.5	7.2	9.1	8.0	6.3	7.0	10.5	7.3	8.7
26	10.4	7.8	9.1	9.0	6.6	7.6	8.2	6.4	7.0	9.8	7.4	8.5
27	10.7	8.1	9.3	8.0	6.2	6.9	9.0	6.3	7.4	8.0	6.5	7.1
28	10.4	7.7	9.0	6.9	6.0	6.4	9.1	6.5	7.6	8.6	7.3	8.0
29	10.5	7.7	9.0	8.6	6.5	7.4	9.4	6.5	7.7	8.9	7.5	8.3
30	10.7	7.6	9.0	9.7	6.7	8.1	8.6	6.3	7.3	---	---	---
31	---	---	---	9.1	6.6	7.5	7.8	5.9	6.6	---	---	---
MONTH	12.0	6.9	8.4	12.7	6.0	8.1	11.0	5.4	7.5	11.3	5.6	7.9

DELAWARE RIVER BASIN

01464598 DELAWARE RIVER AT BURLINGTON, NJ

LOCATION.--Lat 40°04'42", long 74°52'28", Burlington County, Hydrologic Unit 02040201, on left bank at the intake canal of the Public Service Electric and Gas Company, 0.3 mi downstream from Burlington-Bristol Bridge, 1.4 mi downstream from Assiscunk Creek, and at mile 117.54.

DRAINAGE AREA.--7,160 mi².

TIDE ELEVATION DATA

PERIOD OF RECORD.--July 1964 to current year. March 1921 to July 1926, January 1931 to November 1939, August 1951 to June 1954, July 1957 to June 1964, in files of Philadelphia District, U.S. Army Corps of Engineers.

REVISED RECORDS.--WDR NJ-76-1: 1973(m).

GAGE.--Water-stage recorder. Datum of gage is -12.90 ft below National Geodetic Vertical Datum of 1929. Prior to May 20, 1971, water-stage recorder at site 0.7 mi upstream at same datum. Gage-height record converted to elevation above or below (-) National Geodetic Vertical Datum of 1929 for publication.

REMARKS.--No gage-height or doubtful record: Jan. 21-20, Feb. 8-10, and Sept. 14-30. Summaries for months with short periods of no gage-height record have been estimated with little or no loss of accuracy unless otherwise noted. Some periods cannot be estimated and are noted by dash (--) lines.

EXTREMES FOR PERIOD OF RECORD.--Maximum elevation, 8.74 ft, Oct. 25, 1980; minimum, -6.60 ft, Feb. 26, 1967.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum elevation known, 10.8 ft, Aug. 20, 1955, from high-water mark at site 1.4 mi upstream; minimum, -9.1 ft, Dec. 31, 1962, at present site.

EXTREMES FOR CURRENT YEAR.--Maximum elevation recorded, 7.06 ft, Feb. 12; minimum recorded, -4.31 ft, Mar. 6.

Summaries of tide elevations during current year are as follows:

TIDE ELEVATIONS, IN FEET, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

		OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
Maximum	Elevation	6.36	6.02	6.29	6.15	7.06	5.76	6.18	6.86	6.39	6.33	6.29	--
	high tide Date	15	10	22	19	12	12	6	4	27	2	1	--
Minimum	Elevation	-2.97	-3.74	-3.75	-4.19	--	-4.31	-3.67	-3.50	-3.30	-3.20	-3.45	--
	low tide Date	4	21	7	20	--	6	10	2	26	27	16	--
Mean high tide		5.22	4.71	4.59	--	4.54	4.59	4.88	5.26	5.23	5.24	5.24	--
Mean water level		1.71	1.25	1.17	--	1.19	1.07	1.27	1.59	1.48	1.52	1.53	--
Mean low tide		-2.09	-2.45	-2.49	--	-2.52	-2.69	-2.60	-2.36	-2.57	-2.48	-2.48	--

NESHAMINY CREEK BASIN

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01465500 NESHAMINY CREEK NEAR LANGHORNE, PA

LOCATION.--Lat 40°10'26", long 74°57'26", Bucks County, Hydrologic Unit 02040201, on left bank at bridge on State Highway 213, 0.3 mi downstream from Mill Creek, and 1.7 mi west of Langhorne.

DRAINAGE AREA.--210 mi².

PERIOD OF RECORD.--October 1934 to current year.

REVISED RECORDS.--WSP 1332: 1949. WSP 1432: 1936-37. WDR PA-83-1: 1982(P)

GAGE.--Water-stage recorder. Datum of gage is 40.57 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Oct. 23-25, 29-31, Nov. 5-8, Dec. 6-8, Dec. 20 to Feb. 21, Feb. 25 to Mar. 27. Records poor. Several observations of water temperature were made during the year. Some regulation at low flow by mills above station. Flow regulated by upstream reservoirs on Little Neshaminy Creek, Robin Run, Pine Run, North Branch Neshaminy Creek, and Core Creek (combined flood control capacity, about 9,560 acre-ft). Occasional regulation by Springfield Lake, capacity, 650 mil gal, completed in 1934; no significant regulation except during period May 1934 to January 1944, when the lake was filling, and in September 1949, July 1954, July through October 1957, September, October 1961. Interceptor sewer installed along left bank in May, June 1966.

AVERAGE DISCHARGE.--51 years, 291 ft³/s, 18.80 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 49,300 ft³/s Aug. 19, 1955, gage height, 22.84 ft, from floodmarks, from rating curve extended above 4,700 ft³/s on basis of contracted-opening measurement at gage height 15.94 ft, and slope-area measurement of peak flow; minimum, 1.9 ft³/s Sept. 8, 1957; minimum gage height, 0.35 ft Sept. 1, 2, 1963.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Aug. 23, 1933, reached a stage of 17.3 ft, from floodmark, discharge, 30,000 ft³/s, from rating curve extended as explained above.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 11,600 ft³/s Sept. 27, gage height, 11.66 ft (3.331 m); minimum daily, 24 ft³/s July 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	65	62	73	110	68	120	255	45	271	34	597	51
2	110	56	60	110	68	100	205	51	172	33	144	42
3	106	52	61	140	66	90	142	1500	89	31	72	37
4	63	50	73	180	66	94	125	541	69	30	53	36
5	52	250	78	160	66	100	113	234	62	29	43	34
6	45	170	400	140	66	130	107	171	89	28	38	32
7	41	120	260	130	66	120	98	148	74	34	36	30
8	40	80	150	120	66	110	91	122	65	58	412	32
9	42	66	102	100	64	100	89	102	78	45	244	41
10	44	61	91	90	64	90	81	89	70	58	100	40
11	45	61	85	86	160	86	78	83	57	40	67	45
12	42	58	78	80	450	90	79	75	50	35	70	37
13	39	55	72	78	1000	120	75	72	47	29	56	32
14	37	51	67	74	700	160	71	69	42	28	47	29
15	36	46	68	74	400	140	72	60	41	33	44	27
16	36	43	70	74	250	120	75	55	83	94	40	27
17	38	42	67	72	160	110	76	64	124	44	39	26
18	44	44	77	72	130	100	67	356	83	35	37	26
19	46	50	102	72	120	92	68	168	63	28	37	26
20	46	52	120	72	110	88	72	99	52	26	36	26
21	47	49	140	72	110	86	74	80	50	24	39	25
22	51	45	180	72	149	96	73	171	50	28	42	25
23	130	43	150	70	205	120	74	125	40	50	39	25
24	100	43	130	70	253	140	72	108	37	38	34	28
25	75	41	120	70	300	120	71	94	36	30	84	27
26	63	40	110	70	250	100	71	73	37	151	338	36
27	59	40	110	70	200	90	65	62	33	179	154	6770
28	55	40	110	70	150	84	56	64	34	118	76	1990
29	230	73	120	68	---	84	51	61	38	60	58	484
30	130	99	120	68	---	83	47	54	40	46	48	287
31	84	---	110	68	---	80	---	49	---	70	47	---
TOTAL	2041	1982	3554	2802	5757	3243	2693	5045	2076	1566	3171	10373
MEAN	65.8	66.1	115	90.4	206	105	89.8	163	69.2	50.5	102	346
MAX	230	250	400	180	1000	160	255	1500	271	179	597	6770
MIN	36	40	60	68	64	80	47	45	33	24	34	25
CAL YR 1984	TOTAL	144595	MEAN	395	MAX	8420	MIN	36				
WTR YR 1985	TOTAL	44303	MEAN	121	MAX	6770	MIN	24				

POQUESSING CREEK BASIN

01465798 POQUESSING CREEK AT GRANT AVENUE, PHILADELPHIA, PA

LOCATION.--Lat 40°03'25", long 74°59'08", Philadelphia County, Hydrologic Unit 02040202, on right bank 600 ft upstream from Delaware River Expressway and 3,000 ft upstream from mouth in northeast Philadelphia.

DRAINAGE AREA.--21.4 mi².

PERIOD OF RECORD.--July 1965 to current year. Records for 1971-74 published in WDR PA-81-1.

GAGE.--Water-stage recorder and concrete low-water control. Datum of gage is 2.68 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during the water year: Jan. 11-24, 28-31, Feb. 6-8. Records fair, except periods of estimated daily discharges which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--20 years, 33.4 ft³/s, 21.23 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 9,400 ft³/s July 28, 1982, gage height, 15.35 ft, from flood-mark, from rating curve extended above 550 ft³/s on basis of slope-area measurement of peak flow; minimum, 1.1 ft³/s Aug. 9, 1966, gage height, 2.43 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,200 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1445	1610	7.75	Aug. 8	0700	1780	8.02
July 31	1845	*3600	*10.39	Sept. 27	1515	2730	9.35

Minimum discharge, 2.4 ft³/s July 21, 22, gage height, 2.65 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	89	88	140	457	120	455	509	191	609	162	287	101
2	118	90	117	487	120	433	438	260	441	152	189	94
3	110	88	148	432	115	391	376	1770	344	152	153	85
4	96	83	240	387	115	362	369	1350	296	151	137	80
5	90	150	164	384	110	496	346	1010	475	137	124	72
6	86	148	222	335	110	482	359	868	652	137	114	69
7	86	118	214	341	110	389	350	776	436	238	109	67
8	88	105	161	316	105	402	418	643	396	185	154	68
9	88	106	143	240	105	392	386	554	393	160	135	74
10	84	105	137	230	105	361	352	507	338	142	107	103
11	84	97	145	220	105	341	338	463	282	130	97	104
12	80	92	156	215	250	588	331	421	263	117	93	83
13	78	85	151	210	380	625	312	418	243	325	84	75
14	78	82	140	205	210	512	311	369	225	193	87	72
15	78	80	147	200	180	466	313	320	212	191	84	72
16	77	79	148	192	155	428	315	299	668	163	83	72
17	76	77	142	200	140	414	291	373	572	135	88	71
18	80	79	134	185	130	389	270	743	430	121	81	73
19	78	80	138	175	120	355	266	528	343	112	83	72
20	84	76	167	170	110	356	288	407	280	105	83	71
21	79	74	161	160	110	339	277	366	253	102	78	69
22	92	72	638	155	254	313	258	381	233	201	78	67
23	140	72	476	150	416	334	246	311	221	158	77	66
24	110	72	378	145	664	351	266	291	215	124	74	67
25	98	72	340	140	715	323	257	264	227	117	110	64
26	96	73	282	140	624	292	256	251	187	183	122	60
27	95	72	280	135	581	276	229	244	177	270	98	5790
28	91	74	301	130	493	275	216	323	170	185	84	2540
29	98	187	477	130	---	281	212	440	179	146	79	954
30	99	194	597	125	---	277	202	300	171	130	88	581
31	93	---	460	120	---	296	---	259	---	136	121	---
TOTAL	2819	2870	7544	7111	6752	11995	9357	15700	9951	4960	3381	11836
MEAN	90.9	95.7	243	229	241	387	312	506	332	160	109	395
MAX	140	194	638	487	715	625	509	1770	688	325	287	5790
MIN	76	72	117	120	105	275	202	191	170	102	74	60
CFSM	.35	.37	.94	.88	.93	1.49	1.20	1.95	1.28	.62	.42	1.53
IN.	.67	.59	.74	.32	1.24	.49	.46	1.25	.51	1.60	1.39	2.18

CAL YR 1984	TOTAL	13122.5	MEAN	35.9	MAX	900	MIN	5.0	CFSM	1.68	IN.	22.81
WTR YR 1985	TOTAL	6586.2	MEAN	18.0	MAX	1090	MIN	2.5	CFSM	.84	IN.	11.45

PENNYPACK CREEK BASIN

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01467048 PENNYPACK CREEK AT LOWER RHAWN STREET BRIDGE, PHILADELPHIA, PA

LOCATION.--Lat 40°03'00", long 75°01'59", Philadelphia County, Hydrologic Unit 02040202, on left bank at downstream side of footbridge pier, 400 ft downstream from Lower Rhawn Street bridge, 0.8 mi upstream from Wooden Bridge Run, in Philadelphia.

DRAINAGE AREA.--49.8 mi².

PERIOD OF RECORD.--June 1965 to current year. Records for 1971-74 published in WDR PA-81-1.

REVISED RECORDS.--WDR PA-81-1: 1974.

GAGE.--Water-stage recorder. Datum of gage is 21.27 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during the water year: Oct. 4-8, Dec. 15-Feb. 12, Feb. 15-22, April 18 to 14. Records fair except for periods of estimated discharges, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--20 years, 92.8 ft³/s, 25.31 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 9,770 ft³/s July 28, 1982, gage height, 13.15 ft, from rating curve extended above 3,900 ft³/s on basis of slope-area measurement of peak flow; minimum, 6.0 ft³/s Oct. 11, 1966, gage height, 1.97 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,700 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2045	1930	5.81	Sept. 26	2300	3110	7.33
July 31	1745	3090	7.31	Sept. 27	1445	*3920	*8.23
Aug. 8	0615	2150	6.11				

Minimum daily discharge, 12 ft³/s Dec. 12-14, 18.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	81	23	24	25	140	30	176	31	79	19	114	21
2	30	24	22	47	110	29	38	42	25	19	23	19
3	26	24	54	23	52	27	34	270	21	18	20	20
4	24	23	51	16	32	31	31	140	21	18	19	20
5	23	209	27	40	25	64	29	72	22	30	18	19
6	22	39	165	26	23	32	27	50	24	20	18	19
7	25	28	32	23	22	28	26	80	21	19	64	18
8	23	24	20	22	21	33	26	40	52	25	714	19
9	27	24	17	21	20	31	27	29	30	36	40	41
10	24	25	17	20	19	28	26	28	22	28	75	39
11	23	28	16	19	24	27	28	27	21	20	30	24
12	23	26	12	18	200	72	28	27	21	17	21	19
13	23	24	12	18	180	39	26	31	20	16	21	18
14	22	24	12	17	57	30	26	29	19	16	28	17
15	22	24	20	17	43	28	27	25	20	24	21	17
16	23	25	15	16	38	26	29	23	164	134	20	17
17	23	24	13	16	34	27	29	77	79	22	19	17
18	23	28	12	16	33	26	28	101	30	18	19	16
19	23	45	24	16	33	26	27	28	22	17	20	16
20	28	28	19	16	33	27	27	24	25	16	20	16
21	26	24	50	16	31	26	26	25	24	16	40	15
22	26	23	76	16	32	26	25	27	21	58	27	15
23	53	23	18	15	33	62	25	54	19	19	20	16
24	58	22	15	18	34	43	27	38	19	17	19	19
25	34	22	25	21	34	42	29	24	19	26	246	19
26	25	22	14	20	34	30	27	23	18	314	244	241
27	23	23	19	19	35	29	26	22	19	88	31	3040
28	23	22	24	18	30	28	25	58	20	26	23	126
29	121	98	16	17	---	29	25	43	26	20	22	46
30	30	32	14	17	---	27	25	23	25	19	21	36
31	24	---	14	17	---	35	---	22	---	504	32	---
TOTAL	981	1030	869	626	1402	1038	975	1533	948	1639	2049	3985
MEAN	31.6	34.3	28.0	20.2	50.1	33.5	32.5	49.5	31.6	52.9	66.1	133
MAX	121	209	165	47	200	72	176	270	164	504	714	3040
MIN	22	22	12	15	19	26	25	22	18	16	18	15
CFSM	.63	.69	.56	.41	1.01	.67	.99	.63	1.06	1.33	2.67	
IN.	.73	.77	.65	.47	1.05	.78	.73	1.15	.71	1.22	1.53	2.98
CAL YR 1984	TOTAL	35389	MEAN	96.7	MAX	1530	MIN	12	CFSM	1.94	IN.	26.44
WTR YR 1985	TOTAL	17075	MEAN	46.8	MAX	3040	MIN	12	CFSM	.94	IN.	12.75

DELAWARE RIVER BASIN

01467060 DELAWARE RIVER AT PALMYRA, NJ

LOCATION.--Lat 40°01'05", long 75°02'16", Philadelphia County, PA, Hydrologic Unit 02040202, on right bank opposite Palmyra, 0.5 mi upstream from Tacony-Palmyra Bridge, 3.5 mi downstream from Rancocas Creek, and at mile 107.55.

DRAINAGE AREA.--7,850 mi².

TIDE ELEVATION DATA

PERIOD OF RECORD.--December 1962 to current year. Tidal volumes published from December 1962 to September 1970.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is -10.00 ft below National Geodetic Vertical Datum of 1929. Gage-height record converted to elevation above or below (-) National Geodetic Vertical Datum of 1929 for publication.

REMARKS.--No gage-height or doubtful record: Oct. 4-5, Oct. 30 to Nov. 1, Jan. 20 to Feb. 4, Feb. 16 to Mar. 4 and June 18 to July 2. Some periods of low tide are affected by sluggish or plugged intake and the record is estimated with negligible loss in accuracy. Some periods cannot be estimated and are noted by dash (--) lines.

EXTREMES FOR PERIOD OF RECORD.--Maximum elevation, 8.23 ft, Oct. 25, 1980; minimum, -8.6 ft, Dec. 31, 1962.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum elevation known since 1899, 8.9 ft, Aug. 24, 1933, from profile provided by U.S. Army Corps of Engineers.

EXTREMES FOR CURRENT YEAR.--Maximum elevation recorded, 6.40 ft, Feb. 12; minimum recorded, -4.04 ft, Mar. 6.

Summaries of tide elevations during current year are as follows:

TIDE ELEVATIONS, IN FEET, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

		OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
Maximum	Elevation	5.79	5.48	5.66	5.58	6.40	5.18	5.61	6.20	--	--	5.76	6.25
high tide	Date	15	10	22	19	12	12	6	4	--	--	1	28
Minimum	Elevation	-2.76	-3.47	-3.55	--	--	-4.04	-3.44	-3.21	--	-3.03	-3.15	-2.95
low tide	Date	4	21	7	--	--	6	10	2	--	27	16	15
Mean high tide		4.66	4.15	4.02	--	--	4.00	4.28	4.65	--	4.61	4.64	4.63
Mean water level		1.55	1.12	.99	--	--	.87	1.10	1.38	--	1.37	1.39	1.47
Mean low tide		-1.91	-2.25	-2.34	--	--	-2.57	-2.43	-2.23	--	-2.25	-2.27	-2.06

FRANKFORD CREEK BASIN

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01467086 TACONY CREEK ABOVE ADAMS AVENUE, PHILADELPHIA, PA

LOCATION.--Lat 40°02'33", long 75°06'47", Philadelphia County, Hydrologic Unit 02040203, on left bank 20 ft upstream from dam, 120 ft upstream from Adams Avenue Bridge in Philadelphia.

DRAINAGE AREA.--16.7 mi².

PERIOD OF RECORD.--October 1965 to current year. Records for 1971-74 published in WDR PA-81-1. Published as Tacony Creek at County line, Philadelphia, June 1974 to September, 1979.

REVISED RECORDS.--WDR PA-76-1: 1974.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 61.11 ft above National Geodetic Vertical Datum of 1929. Prior to June 1972 recording gage at site 1,600 ft upstream at same datum.

REMARKS.--Estimated daily discharges during the water year: Oct. 10 to Dec. 5, Jan. 10-31, Feb. 5-11. Records fair except for periods of estimated discharge, which are poor. Several observations of water temperatures were made during the year.
temperature were made during the year.

AVERAGE DISCHARGE.--20 years, 27.1 ft³/s, 22.14 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 4,550 ft³/s Aug. 27, 1967, gage height, 13.19 ft, from rating curve extended above 350 ft³/s on basis of slope-area measurement at gage height 9.06 ft; minimum, 1.8 ft³/s Sept. 12, 1966, gage height, 2.82 ft, at upstream site.

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 1,100 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
July 31	1845	1230	6.32	Sept. 27	0015	*2040	*8.20
Aug. 8	0515	1220	6.29				

Minimum discharge, 3.2 ft³/s July 25, gage height, 2.14 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	44	5.2	7.4	10	45	6.9	59	14	31	5.9	23	7.1
2	20	4.9	6.6	24	38	6.8	11	23	7.2	6.1	8.0	7.0
3	9.2	4.8	30	9.3	13	6.5	13	191	6.8	5.7	6.5	6.8
4	9.2	4.8	12	8.6	9.4	9.6	11	15	7.0	5.8	5.9	6.3
5	8.7	80	6.8	18	9.2	17	10	12	8.9	15	5.5	6.0
6	8.5	15	84	10	8.6	6.5	9.4	11	7.2	5.8	5.6	5.9
7	8.5	7.4	12	9.2	8.2	7.0	8.9	18	6.7	5.8	29	6.3
8	8.5	7.1	10	9.0	7.8	9.5	9.4	10	19	14	162	11
9	11	7.1	9.7	8.3	7.5	7.1	9.9	9.8	7.6	9.4	12	12
10	8.8	8.2	9.7	8.2	7.2	7.0	9.8	9.8	6.8	9.3	52	8.1
11	8.6	8.6	9.2	8.1	7.0	6.6	11	9.1	6.4	5.9	16	6.7
12	8.4	8.6	8.8	8.0	178	18	10	8.2	6.7	4.9	8.6	6.3
13	8.1	8.4	8.6	7.9	17	7.0	9.7	9.5	6.2	4.9	7.6	5.5
14	7.8	7.8	8.8	7.8	6.7	6.8	9.5	7.9	6.3	4.4	21	5.9
15	8.0	8.6	13	7.7	7.3	6.4	9.7	7.7	6.1	11	7.3	5.4
16	8.1	8.8	8.8	7.6	6.5	6.3	9.8	8.3	55	34	7.0	5.6
17	8.3	8.4	8.9	7.5	6.3	6.3	9.5	56	29	5.3	6.6	5.1
18	8.4	11	9.1	7.4	6.1	6.2	9.1	15	9.2	4.9	6.8	5.2
19	8.6	15	15	7.4	6.2	5.8	9.0	8.2	6.6	3.9	8.1	5.6
20	8.8	8.2	9.5	7.4	6.5	6.3	8.9	7.9	8.5	4.1	6.4	5.1
21	9.2	7.4	22	7.3	6.1	6.1	8.7	11	7.0	4.1	23	5.3
22	18	7.6	21	7.3	6.0	6.1	8.4	11	6.0	27	8.1	5.6
23	33	7.8	9.1	7.3	6.3	22	8.4	30	5.6	4.9	6.7	6.7
24	26	8.0	9.0	7.3	6.3	8.0	15	10	5.6	4.2	6.4	11
25	14	8.3	12	7.2	6.3	8.2	11	8.1	5.3	7.3	129	6.9
26	10	8.4	8.7	7.2	6.9	5.6	9.8	7.0	5.3	71	39	91
27	9.0	8.6	10	7.2	6.3	5.6	9.1	6.9	5.9	27	11	565
28	8.2	19	9.8	7.2	6.5	5.6	9.4	40	5.7	6.6	8.5	27
29	60	52	8.8	7.2	---	5.6	9.5	11	23	5.5	8.0	16
30	6.4	11	8.8	7.2	---	5.6	9.2	7.7	12	4.9	7.4	14
31	5.6	---	8.8	7.2	---	11	---	7.4	---	99	9.6	---
TOTAL	419.0	376.0	416.1	271.0	454.2	249.0	346.1	601.5	329.6	427.6	661.6	881.4
MEAN	13.5	12.5	13.4	8.74	16.2	8.03	11.5	19.4	11.0	13.8	21.3	29.4
MAX	60	80	84	24	178	22	59	191	55	99	162	565
MIN	5.6	4.8	6.6	7.2	6.0	5.6	8.4	6.9	5.3	3.9	5.5	5.1
CFSM	.81	.75	.81	.53	.98	.48	.69	1.17	.66	.83	1.28	1.77
IN.	.94	.84	.93	.61	1.02	.56	.78	1.35	.74	.96	1.48	1.98
CAL YR 1984	TOTAL	10544.1	MEAN	28.8	MAX	581	MIN	4.8	CFSM	1.73	IN.	23.63
WTR YR 1985	TOTAL	5433.1	MEAN	14.9	MAX	565	MIN	3.9	CFSM	.90	IN.	12.18

FRANKFORD CREEK BASIN

01467087 FRANKFORD CREEK AT CASTOR AVENUE, PHILADELPHIA, PA

LOCATION.--Lat 40°00'57", long 75°05'50", Philadelphia County, Hydrologic Unit 02040203, on left bank at upstream side of Castor Avenue bridge 2.8 mi upstream from mouth in Northeast Philadelphia.

DRAINAGE AREA.--30.4 mi².

PERIOD OF RECORD.--July 1982 to current year.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 6.58 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during the water year: Jan. 10-31, Feb. 6, 7, July 11-14, Aug. 4-6, 28 to Sept. 4. Records poor. Several observations of water temperature were during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 10,300 ft³/s July 31, 1985, gage height, 11.82 ft, from rating curve extended above 8,000 ft³/s on basis of slope-area measurement of peak flow; minimum, 1.1 ft³/s Sept. 5, 1985, gage height, 1.40 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 3,000 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
July. 31	1730	*10300	*11.82	Aug. 25	1715	3370	6.41
Aug. 8	0430	4010	6.99	Sept. 26	2300	8850	10.66
Aug. 10	2130	3400	6.44	Sept. 27	1130	3640	6.66

Minimum discharge, 1.1 ft³/s Sept. 5, gage height, 1.40 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	89	5.4	8.5	11	94	7.9	133	21	72	46	55	9.0
2	36	5.4	7.7	43	60	7.9	11	48	14	13	14	8.0
3	12	5.6	50	14	19	7.9	9.0	511	14	5.8	8.7	7.4
4	11	5.6	14	11	9.4	9.9	9.9	14	14	11	8.2	6.6
5	8.8	173	16	20	9.1	32	9.9	6.1	11	28	7.7	6.0
6	7.9	12	194	17	8.6	11	9.9	4.6	9.0	6.6	7.4	4.8
7	9.2	8.0	16	14	8.2	7.0	8.9	17	8.0	5.6	120	7.2
8	10	8.5	12	13	8.0	7.5	9.4	11	41	20	559	22
9	9.0	7.8	13	8.9	8.1	8.1	9.9	11	11	14	40	22
10	9.9	9.8	12	8.5	9.7	7.9	9.9	7.9	9.4	27	202	14
11	9.9	12	12	8.3	11	7.7	9.9	7.9	9.3	6.2	31	6.6
12	9.9	10	12	8.1	486	28	9.9	7.9	9.0	5.6	23	6.7
13	9.4	9.5	13	8.0	32	7.6	10	10	9.0	5.4	27	3.8
14	8.8	8.7	12	7.8	17	7.0	11	11	8.9	5.2	97	5.2
15	8.9	10	14	7.7	14	6.8	10	6.3	9.5	56	5.8	4.3
16	9.9	8.9	12	7.6	11	6.3	9.9	6.3	171	79	8.7	6.5
17	9.9	9.4	13	7.6	11	6.3	9.9	121	75	6.3	7.7	6.8
18	9.9	12	14	7.5	10	6.3	9.9	19	19	5.8	8.6	7.9
19	9.9	20	19	7.5	9.9	7.3	9.9	6.0	11	5.2	18	8.8
20	11	8.4	12	7.5	26	7.9	9.9	5.6	16	5.4	9.9	6.8
21	11	8.2	32	7.5	9.2	7.9	9.9	17	13	5.6	28	6.3
22	25	8.5	37	7.6	8.8	7.9	9.9	15	9.9	108	6.9	7.7
23	54	8.8	13	7.6	8.8	34	9.9	49	9.7	5.7	6.1	5.6
24	36	8.9	9.8	7.6	8.8	13	22	14	10	5.7	7.3	13
25	13	9.9	16	7.6	8.9	15	11	8.3	7.1	78	406	7.6
26	9.9	9.5	11	7.7	8.8	11	9.9	7.9	4.6	205	110	706
27	9.9	9.7	11	7.8	8.8	11	9.9	7.9	6.6	51	15	1570
28	9.9	9.9	13	8.0	8.0	11	9.9	91	4.9	10	14	37
29	119	99	8.8	---	11	9.9	13	69	8.5	13	21	---
30	7.6	9.8	12	10	---	10	9.9	5.2	61	7.9	12	14
31	7.0	---	11	12	---	33	---	10	---	766	17	---
TOTAL	603.5	532.2	650.8	330.0	932.1	363.1	433.3	1090.9	736.9	1608.5	1894.0	2558.6
MEAN	19.5	17.7	21.0	10.6	33.3	11.7	14.4	35.2	24.6	51.9	61.1	85.3
MAX	119	173	194	43	486	34	133	511	171	766	559	1570
MIN	7.0	5.4	7.7	7.5	8.0	6.3	8.9	4.6	4.6	5.2	5.8	3.8
CFSM	.64	.58	.69	.35	1.10	.38	.47	1.16	.81	1.71	2.01	2.81
IN.	.74	.65	.80	.40	1.14	.44	.53	1.33	.90	1.97	2.32	3.13

CAL YR 1984 TOTAL 16273.4 MEAN 44.5 MAX 1000 MIN 5.4 CFSM 1.46 IN. 19.91
WTR YR 1985 TOTAL 11733.9 MEAN 32.1 MAX 1570 MIN 3.8 CFSM 1.06 IN. 14.36

DELAWARE RIVER BASIN

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01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA

LOCATION.--Lat 39°57'11", long 75°08'05", Philadelphia County, Hydrologic Unit 02040202, at center of river on a line 200 ft upstream of bridge from the north side of pier 12 north through channel station +14.3 to pierhead line on New Jersey side of river.

DRAINAGE AREA.--7,993 mi².

PERIOD OF RECORD.--August 1949 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: November 1963 to current year.

pH: October 1967 to current year.

WATER TEMPERATURE: November 1960 to current year.

DISSOLVED OXYGEN: November 1960 to current year.

INSTRUMENTATION.--Water-quality monitor (39°57'10", 75°08'18") located at river end of pier 11 north about 100 ft downstream from bridge since November 1960.

REMARKS.--Further information on this station is given in U.S. Geological Survey Water-Supply Paper 1809-0. Station not operated Dec. 2 to Feb. 8. Other interruptions in the record were due to malfunctions of the instruments.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 1,450 microsiemens Nov. 20, 1964; minimum, 65 microsiemens Sept. 15, 1979.

pH: Maximum, 8.7 Oct. 14, 1979; minimum, 4.7 Dec. 29, 1978.

WATER TEMPERATURE: Maximum, 31.0°C, July 13-15, 1966; minimum, freezing point on many days during winter months.

DISSOLVED OXYGEN: Maximum, 14.1 mg/L Dec. 14, 1962; minimum, 0.0 mg/L on many days each year.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	349	316	333	357	300	331	356	307	327			
2	336	312	327	352	309	332	339	300	320			
3	341	307	323	355	295	326	---	---	---			
4	340	306	321	362	312	335	---	---	---			
5	342	311	325	358	303	332	---	---	---			
6	343	311	328	346	289	319	---	---	---			
7	347	312	329	338	289	313	---	---	---			
8	345	312	329	339	291	315	---	---	---			
9	342	311	328	342	297	320	---	---	---			
10	342	312	328	341	302	321	---	---	---			
11	343	317	331	342	301	323	---	---	---			
12	344	315	331	330	291	312	---	---	---			
13	354	316	336	322	286	305	---	---	---			
14	362	328	345	313	279	298	---	---	---			
15	361	324	346	336	291	313	---	---	---			
16	359	326	345	324	294	310	---	---	---			
17	364	325	344	317	284	303	---	---	---			
18	362	323	343	327	293	309	---	---	---			
19	369	328	345	332	298	315	---	---	---			
20	367	328	346	330	295	312	---	---	---			
21	369	326	346	329	297	312	---	---	---			
22	368	325	347	333	300	318	---	---	---			
23	368	317	340	343	300	323	---	---	---			
24	364	310	339	344	304	326	---	---	---			
25	362	315	340	351	306	328	---	---	---			
26	364	314	341	350	310	330	---	---	---			
27	362	311	338	348	308	328	---	---	---			
28	361	313	339	362	305	332	---	---	---			
29	356	308	333	344	308	326	---	---	---			
30	373	306	335	346	304	323	---	---	---			
31	359	306	334	---	---	---	---	---	---			
MONTH	373	306	336	362	279	320	356	300	324			

DELAWARE RIVER BASIN

01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				260	242	251	211	195	204	---	---	---
2				258	234	248	209	194	202	---	---	---
3				252	204	232	211	194	204	246	219	233
4				246	186	221	212	198	206	249	214	231
5				246	199	221	216	201	209	239	216	223
6				212	173	195	217	204	211	225	216	221
7				219	171	195	217	200	212	225	207	219
8				---	---	---	216	209	214	---	---	---
9				---	---	---	220	210	216	---	---	---
10				---	---	---	225	212	220	---	---	---
11				215	180	192	227	214	220	---	---	---
12				208	186	194	227	213	220	---	---	---
13				196	186	191	226	206	218	---	---	---
14				201	190	195	238	206	220	209	180	198
15				199	190	196	230	204	219	210	168	193
16				195	186	192	227	208	220	237	174	193
17				215	188	193	226	205	217	232	196	216
18				211	170	191	227	204	217	229	192	211
19				199	169	186	226	205	216	220	190	205
20				198	167	182	229	205	218	219	191	205
21				186	157	171	232	205	219	258	196	219
22				186	156	170	230	200	218	---	---	---
23				182	162	173	234	205	220	---	---	---
24				185	161	175	237	207	223	---	---	---
25				186	166	177	241	211	227	---	---	---
26				185	168	178	245	211	230	---	---	---
27				190	171	181	244	216	230	---	---	---
28				192	178	184	262	215	239	---	---	---
29				189	180	186	---	---	---	246	226	236
30				204	184	195	---	---	---	247	232	241
31				220	186	203	---	---	---	246	230	241
MONTH				260	156	195	262	194	217	258	168	218
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	247	221	238	265	237	252	271	204	237	314	256	284
2	245	216	234	268	238	254	262	210	237	314	264	289
3	245	219	232	266	236	255	264	212	238	301	258	282
4	242	221	274	265	230	253	269	212	241	304	262	287
5	253	225	241	266	234	253	260	213	238	298	264	283
6	248	232	240	268	234	254	255	213	237	314	267	294
7	249	234	243	265	238	254	252	218	237	321	277	299
8	249	230	241	289	241	263	257	211	236	318	282	302
9	249	227	239	288	246	270	257	216	238	336	281	306
10	243	226	237	292	250	271	270	217	241	352	285	319
11	248	223	236	278	247	266	261	216	240	352	287	315
12	245	226	238	284	247	266	258	215	235	350	288	316
13	245	226	237	285	250	269	258	220	240	339	284	310
14	257	221	237	283	247	267	262	221	241	338	286	315
15	260	221	243	281	249	265	260	226	242	342	285	316
16	259	221	242	279	247	264	262	226	245	343	289	319
17	255	214	232	280	244	264	262	229	248	348	295	323
18	260	215	232	281	245	265	267	227	250	351	299	327
19	248	214	232	280	250	268	274	232	257	360	302	335
20	246	217	223	283	249	271	274	241	260	365	311	335
21	247	220	235	---	---	---	279	239	263	370	310	339
22	253	220	238	---	---	---	291	241	264	387	308	339
23	253	223	238	---	---	---	285	245	268	386	311	345
24	255	225	240	---	---	---	293	247	271	399	297	357
25	258	232	246	---	---	---	293	245	271	405	317	355
26	256	237	248	---	---	---	289	232	261	412	323	363
27	277	237	253	280	228	257	281	234	257	403	229	315
28	272	241	260	277	219	249	275	238	257	259	193	231
29	266	239	255	287	217	248	276	239	261	219	143	179
30	266	236	252	293	220	256	285	249	271	161	116	140
31	---	---	---	275	214	249	290	251	274	---	---	---
MONTH	277	214	241	293	214	260	293	204	250	412	116	304

DELAWARE RIVER BASIN

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01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.1	7.1	7.1	7.1	7.1	7.1	7.2	7.1	7.2			
2	7.1	7.1	7.1	7.1	7.1	7.1	7.2	7.1	7.2			
3	7.1	7.0	7.1	7.1	7.1	7.1	---	---	---			
4	7.1	7.0	7.0	7.2	7.1	7.1	---	---	---			
5	7.2	7.0	7.1	7.1	7.1	7.1	---	---	---			
6	7.2	7.1	7.1	7.1	7.1	7.1	---	---	---			
7	7.2	7.1	7.1	7.2	7.1	7.1	---	---	---			
8	7.1	7.1	7.1	7.1	7.1	7.1	---	---	---			
9	7.1	7.1	7.1	7.1	7.1	7.1	---	---	---			
10	7.1	7.1	7.1	7.1	7.1	7.1	---	---	---			
11	7.1	7.1	7.1	7.1	7.1	7.1	---	---	---			
12	7.1	7.1	7.1	7.1	7.1	7.1	---	---	---			
13	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
14	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
15	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
16	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
17	7.1	7.1	7.1	7.2	7.2	7.2	---	---	---			
18	7.1	7.1	7.1	7.3	7.1	7.2	---	---	---			
19	7.1	7.1	7.1	7.2	7.2	7.2	---	---	---			
20	7.1	7.1	7.1	7.3	7.2	7.2	---	---	---			
21	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
22	7.2	7.1	7.1	7.2	7.1	7.2	---	---	---			
23	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
24	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
25	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
26	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
27	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
28	7.1	7.1	7.1	7.2	7.1	7.1	---	---	---			
29	7.1	7.1	7.1	7.2	7.1	7.2	---	---	---			
30	7.1	7.0	7.1	7.2	7.1	7.2	---	---	---			
31	7.1	7.1	7.1	---	---	---	---	---	---			
MONTH	7.2	7.0	7.1	7.3	7.1	7.1	7.2	7.1	7.2			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	6.5	6.4	6.4	---	---	---
2				6.7	6.5	6.6	6.5	6.4	6.4	---	---	---
3				6.7	6.6	6.6	6.6	6.4	6.5	---	---	---
4				6.6	6.5	6.6	6.6	6.5	6.5	6.7	6.5	6.6
5				6.7	6.5	6.6	6.8	6.6	6.7	6.8	6.6	6.7
6				6.6	6.5	6.6	6.8	6.7	6.7	6.8	6.7	6.8
7				6.6	6.5	6.5	6.9	6.7	6.8	6.8	6.0	6.7
8				6.5	6.4	6.5	6.9	6.7	6.8	---	---	---
9				6.5	6.4	6.4	6.9	6.7	6.8	---	---	---
10				---	---	---	6.9	6.7	6.8	---	---	---
11				6.5	6.3	6.4	6.9	6.7	6.8	---	---	---
12				6.5	6.3	6.4	7.0	6.8	6.9	---	---	---
13				6.5	6.4	6.5	7.0	6.8	6.9	---	---	---
14				6.6	6.4	6.5	7.1	6.8	6.9	6.9	6.6	6.7
15				6.7	6.5	6.6	7.0	6.8	6.9	6.9	6.6	6.7
16				6.7	6.6	6.6	7.0	6.8	6.9	6.8	6.7	6.7
17				6.7	6.6	6.6	7.1	6.8	6.9	6.7	6.6	6.6
18				6.8	6.6	6.6	7.1	6.8	6.9	6.7	6.5	6.6
19				6.8	6.6	6.7	7.2	6.9	7.0	6.7	6.5	6.6
20				6.6	6.5	6.5	7.1	6.8	6.9	6.8	6.5	6.6
21				6.6	6.4	6.5	7.0	6.8	6.9	6.8	6.6	6.7
22				6.5	6.4	6.4	7.1	6.8	6.9	---	---	---
23				6.5	6.4	6.4	7.0	6.8	6.8	---	---	---
24				6.5	6.4	6.4	6.8	6.7	6.7	---	---	---
25				6.7	6.4	6.4	6.8	6.7	6.7	---	---	---
26				6.5	6.4	6.5	6.9	6.7	6.8	---	---	---
27				6.6	6.4	6.5	6.8	6.7	6.8	---	---	---
28				6.5	6.4	6.5	6.8	6.7	6.8	---	---	---
29				6.5	6.4	6.5	6.8	6.7	6.7	6.5	6.3	6.4
30				6.5	6.4	6.4	---	---	---	6.6	6.4	6.5
31				6.5	6.4	6.4	---	---	---	6.6	6.5	6.5
MONTH				6.8	6.3	6.5	7.2	6.4	6.8	6.9	6.0	6.6

DELAWARE RIVER BASIN

01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	6.6	6.5	6.6	6.6	6.5	6.6	6.4	6.2	6.3	5.8	5.7	5.7
2	6.6	6.5	6.6	6.6	6.5	6.6	6.4	6.3	6.3	6.0	5.7	5.8
3	6.6	6.5	6.5	6.6	6.6	6.6	6.5	6.3	6.4	6.1	5.8	6.0
4	6.5	6.5	6.5	6.6	6.6	6.6	6.5	6.3	6.4	6.1	5.9	6.0
5	6.5	6.4	6.4	6.6	6.6	6.6	6.5	6.3	6.4	6.1	6.0	6.0
6	6.5	6.4	6.4	6.6	6.6	6.6	6.4	6.3	6.3	6.0	5.9	6.0
7	6.6	6.5	6.5	6.7	6.6	6.6	6.4	6.3	6.4	6.0	5.9	6.0
8	6.6	6.5	6.5	6.7	6.6	6.6	6.4	6.3	6.3	6.0	5.9	5.9
9	6.6	6.5	6.6	6.6	6.6	6.6	6.4	6.3	6.4	5.9	5.8	5.9
10	6.7	6.6	6.6	6.6	6.6	6.6	6.4	6.3	6.4	5.9	5.8	5.8
11	6.6	6.6	6.6	6.6	6.5	6.6	6.4	6.3	6.3	5.8	5.7	5.7
12	6.6	6.4	6.6	6.7	6.6	6.7	6.3	6.2	6.3	5.7	5.6	5.6
13	6.5	6.5	6.5	6.7	6.6	6.7	6.3	6.2	6.3	6.2	5.5	5.9
14	6.5	6.4	6.5	6.8	6.6	6.7	6.3	6.1	6.2	6.1	6.0	6.1
15	6.5	6.4	6.5	6.7	6.7	6.7	6.3	6.2	6.2	6.1	6.0	6.1
16	6.5	6.5	6.5	6.7	6.7	6.7	6.3	6.1	6.2	6.3	6.1	6.2
17	6.5	6.5	6.5	6.7	6.6	6.7	6.2	6.1	6.2	6.2	6.1	6.1
18	6.6	6.5	6.5	6.7	6.6	6.7	6.2	6.0	6.1	6.3	6.1	6.2
19	6.6	6.5	6.5	6.8	6.7	6.7	6.2	6.1	6.1	6.4	6.1	6.2
20	6.6	6.5	6.6	6.8	6.7	6.7	6.1	6.0	6.1	6.4	6.3	6.3
21	6.7	6.5	6.6	---	---	---	6.0	5.9	5.9	6.4	6.2	6.3
22	6.7	6.5	6.6	---	---	---	5.9	5.8	5.8	6.3	6.2	6.3
23	6.8	6.6	6.7	---	---	---	5.8	5.7	5.7	6.3	6.2	6.2
24	6.8	6.6	6.7	---	---	---	5.9	5.7	5.8	6.2	6.2	6.2
25	6.8	6.6	6.7	---	---	---	5.8	5.7	5.7	6.2	6.1	6.1
26	6.7	6.5	6.6	---	---	---	5.9	5.6	5.7	6.2	6.1	6.1
27	6.6	6.5	6.5	6.5	6.4	6.5	5.9	5.6	5.7	6.2	6.1	6.2
28	6.6	6.5	6.5	6.5	6.4	6.5	5.7	5.5	5.7	6.3	6.1	6.2
29	6.7	6.5	6.6	6.5	6.4	6.4	5.7	5.5	5.6	6.3	6.0	6.2
30	6.6	6.5	6.6	6.5	6.4	6.4	6.1	5.7	6.0	6.1	5.9	6.0
31	---	---	---	6.5	6.3	6.4	6.0	5.7	5.8	---	---	---
MONTH	6.8	6.4	6.6	6.8	6.3	6.6	6.5	5.5	6.1	6.4	5.5	6.0

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	20.5	20.0	20.0	19.5	19.0	19.5	9.5	9.0	9.0	---	---	---
2	20.0	19.5	19.5	19.5	18.5	19.0	9.0	8.5	8.5	---	---	---
3	19.5	19.0	19.5	18.5	18.0	18.5	---	---	---	---	---	---
4	19.0	18.5	19.0	18.0	18.0	18.0	---	---	---	---	---	---
5	19.0	18.5	19.0	18.0	18.0	18.0	---	---	---	---	---	---
6	19.0	18.5	18.5	17.5	17.0	17.5	---	---	---	---	---	---
7	18.5	18.0	18.5	17.0	16.5	17.0	---	---	---	---	---	---
8	18.5	18.0	18.5	16.5	16.0	16.0	---	---	---	---	---	---
9	18.5	18.5	18.5	15.5	15.5	15.5	---	---	---	---	---	---
10	19.0	18.5	18.5	15.5	15.5	15.5	---	---	---	---	---	---
11	19.0	18.5	18.5	15.5	15.0	15.5	---	---	---	---	---	---
12	19.0	18.5	18.5	15.5	14.5	15.0	---	---	---	---	---	---
13	18.5	18.5	18.5	14.5	13.5	14.5	---	---	---	---	---	---
14	18.5	18.0	18.5	14.0	13.5	13.5	---	---	---	---	---	---
15	18.5	18.0	18.0	13.5	13.0	13.0	---	---	---	---	---	---
16	18.5	18.0	18.0	13.5	13.0	13.0	---	---	---	---	---	---
17	18.5	18.0	18.0	13.0	12.0	12.5	---	---	---	---	---	---
18	18.5	18.0	18.5	12.0	11.5	12.0	---	---	---	---	---	---
19	18.5	18.0	18.5	12.0	11.5	11.5	---	---	---	---	---	---
20	18.5	18.5	18.5	11.5	11.0	11.0	---	---	---	---	---	---
21	19.0	18.5	18.5	11.0	10.0	10.5	---	---	---	---	---	---
22	19.0	18.5	19.0	10.5	10.0	10.0	---	---	---	---	---	---
23	19.0	19.0	19.0	10.0	9.5	9.5	---	---	---	---	---	---
24	19.0	18.5	19.0	9.5	9.0	9.5	---	---	---	---	---	---
25	19.0	18.5	19.0	9.5	9.0	9.5	---	---	---	---	---	---
26	19.0	18.5	19.0	9.5	9.0	9.5	---	---	---	---	---	---
27	19.0	19.0	19.0	9.5	9.0	9.0	---	---	---	---	---	---
28	19.5	19.0	19.0	10.0	9.0	9.5	---	---	---	---	---	---
29	19.5	19.0	19.5	9.5	9.5	9.5	---	---	---	---	---	---
30	19.5	19.0	19.5	9.5	9.0	9.0	---	---	---	---	---	---
31	19.5	19.5	19.5	---	---	---	---	---	---	---	---	---
MONTH	20.5	18.0	19.0	19.5	9.0	13.5	9.5	8.5	9.0	---	---	---

DELAWARE RIVER BASIN

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01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	10.0	9.0	9.5	24.5	19.5	22.0
2				8.0	7.0	7.5	10.0	9.5	9.5	19.5	13.0	15.5
3				7.5	7.0	7.5	10.0	9.5	9.5	17.0	13.0	16.5
4				7.5	6.5	7.0	10.0	9.5	10.0	17.0	16.5	17.0
5				7.5	7.0	7.0	11.0	9.5	10.5	17.5	16.5	17.0
6				7.0	6.0	6.5	11.5	10.5	11.0	17.5	17.0	17.5
7				7.0	6.0	6.5	12.0	10.5	11.0	17.5	17.0	17.5
8				6.5	6.0	6.0	12.0	11.0	11.5	---	---	---
9				6.5	6.0	6.5	11.5	11.0	11.0	---	---	---
10				---	---	---	11.5	11.0	11.0	---	---	---
11				7.0	6.5	6.5	11.5	10.5	11.0	---	---	---
12				7.0	7.0	7.0	11.5	11.0	11.5	---	---	---
13				7.5	7.0	7.0	12.0	11.5	11.5	---	---	---
14				7.5	7.0	7.5	12.0	11.5	12.0	20.0	19.0	19.5
15				8.0	7.0	7.5	12.5	12.0	12.0	20.5	19.0	19.5
16				8.0	7.5	8.0	13.0	12.0	12.5	20.0	19.5	20.0
17				8.5	7.5	8.0	13.0	12.0	12.5	20.0	20.0	20.0
18				8.0	8.0	8.0	13.0	12.5	13.0	20.0	15.0	19.5
19				8.0	7.5	8.0	14.0	13.0	13.5	20.0	19.5	19.5
20				8.0	7.5	7.5	14.0	13.5	14.0	20.5	19.5	20.0
21				7.5	7.0	7.5	15.0	14.0	14.5	21.0	20.0	20.5
22				8.0	7.0	7.5	15.5	14.5	15.0	---	---	---
23				7.5	7.0	7.5	16.0	15.0	15.5	---	---	---
24				7.5	7.5	7.5	15.5	15.5	15.5	---	---	---
25				7.5	7.0	7.5	16.0	15.0	15.5	---	---	---
26				8.0	7.5	7.5	16.5	15.5	16.0	---	---	---
27				8.0	7.5	8.0	17.0	16.0	16.5	---	---	---
28				9.0	8.0	8.5	17.0	16.0	16.5	---	---	---
29				9.5	8.5	9.0	19.5	16.0	17.0	22.0	21.5	21.5
30				9.5	9.0	9.5	22.0	16.5	19.5	22.0	21.5	21.5
31				9.5	9.0	9.0	---	---	---	22.0	21.5	22.0
MONTH				9.5	6.0	7.5	22.0	9.0	13.0	24.5	13.0	19.0
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	22.5	22.0	22.5	23.5	23.0	23.0	27.5	27.0	27.5	25.5	25.5	25.5
2	23.0	22.0	22.5	23.5	23.0	23.0	27.5	27.0	27.0	25.5	25.0	25.5
3	23.0	22.5	23.0	24.0	23.0	23.5	27.5	26.5	27.0	26.0	25.5	25.5
4	23.5	22.5	23.0	24.5	23.5	24.0	27.0	26.5	27.0	26.0	25.5	26.0
5	23.0	22.5	23.0	24.5	24.0	24.0	27.0	26.5	27.0	26.5	26.0	26.0
6	23.0	22.5	23.0	24.5	24.0	24.5	27.0	26.5	27.0	26.5	26.0	26.5
7	23.0	22.5	23.0	25.0	24.5	24.5	27.5	26.5	27.0	27.0	26.5	26.5
8	23.0	22.5	22.5	25.0	24.5	24.5	27.0	26.5	27.0	27.0	26.5	27.0
9	23.0	22.5	23.0	25.0	24.5	24.5	27.5	27.0	27.0	27.0	26.5	27.0
10	23.5	23.0	23.0	25.0	24.5	25.0	27.5	27.0	27.0	27.5	27.0	27.0
11	23.5	23.0	23.5	25.5	25.0	25.0	27.5	27.0	27.5	27.0	26.5	26.5
12	23.5	23.5	23.5	25.5	25.0	25.5	27.5	27.0	27.5	26.5	25.5	26.0
13	23.5	22.5	23.0	26.0	25.0	25.5	28.0	27.0	27.5	25.5	24.5	25.0
14	23.0	22.5	22.5	26.0	25.5	26.0	28.0	27.0	27.5	24.5	24.0	24.5
15	23.0	22.5	22.5	26.5	26.0	26.0	28.5	27.5	28.0	24.0	24.0	24.0
16	23.0	22.5	22.5	27.0	26.0	26.5	28.5	28.0	28.0	24.0	23.5	24.0
17	23.0	22.0	22.5	27.0	26.0	26.5	28.0	27.5	28.0	24.0	23.5	23.5
18	23.0	22.5	23.0	27.0	26.0	26.5	27.5	27.0	27.5	24.0	23.5	23.5
19	23.0	22.5	23.0	27.0	26.5	27.0	27.5	27.0	27.0	24.0	23.5	24.0
20	23.5	23.0	23.0	27.5	25.5	27.0	27.5	27.0	27.0	24.5	23.5	24.0
21	23.5	23.0	23.0	28.0	25.0	27.0	27.0	26.5	27.0	24.5	23.5	24.0
22	23.5	23.0	23.5	29.0	27.0	28.0	27.0	26.5	26.5	24.0	24.0	24.0
23	24.0	23.0	23.5	27.0	23.5	24.5	26.5	26.0	26.5	24.0	23.5	23.5
24	24.5	23.5	24.0	---	---	---	26.5	26.0	26.0	24.0	23.5	23.5
25	24.5	23.5	24.0	---	---	---	26.0	26.0	26.0	23.5	23.0	23.5
26	24.0	23.5	23.5	---	---	---	26.0	25.5	26.0	23.5	23.0	23.0
27	23.5	23.0	23.5	27.5	27.0	27.5	26.5	26.0	26.0	23.0	22.5	23.0
28	23.0	23.0	23.0	27.5	27.0	27.5	26.5	26.0	26.0	22.5	21.0	22.0
29	23.5	23.0	23.0	27.5	27.0	27.5	26.5	26.0	26.0	22.0	19.0	20.5
30	23.0	23.0	23.0	28.0	27.0	27.5	26.5	26.0	26.0	19.5	18.0	19.0
31	---	---	---	28.0	27.5	27.5	26.0	25.5	26.0	---	---	---
MONTH	24.5	22.0	23.0	29.0	23.0	25.5	28.5	25.5	27.0	27.5	18.0	24.5

DELAWARE RIVER BASIN

01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	2.4	1.8	2.1	2.7	1.0	1.7	5.3	4.1	4.6			
2	2.5	1.7	2.1	2.6	1.1	1.7	6.1	4.4	5.0			
3	3.3	1.9	2.3	3.5	1.7	2.5	---	---	---			
4	3.5	2.3	2.7	3.5	2.1	2.6	---	---	---			
5	3.1	2.0	2.4	3.4	2.0	2.5	---	---	---			
6	3.1	2.0	2.5	4.1	2.0	2.7	---	---	---			
7	3.0	2.0	2.4	4.0	2.2	2.9	---	---	---			
8	3.1	1.9	2.2	3.9	2.4	3.0	---	---	---			
9	2.9	1.5	1.9	3.9	2.3	2.8	---	---	---			
10	2.6	1.2	1.6	3.6	2.2	2.7	---	---	---			
11	2.0	.9	1.3	3.5	2.2	2.7	---	---	---			
12	2.1	.7	1.2	4.1	2.3	3.0	---	---	---			
13	2.1	.8	1.4	4.4	2.9	3.5	---	---	---			
14	2.1	1.5	1.7	5.4	3.8	4.3	---	---	---			
15	2.5	1.6	1.9	5.0	3.6	4.1	---	---	---			
16	2.2	1.4	1.6	5.0	3.5	4.1	---	---	---			
17	2.3	1.1	1.6	5.6	4.1	4.7	---	---	---			
18	2.5	1.2	1.6	5.4	4.1	4.6	---	---	---			
19	2.2	1.0	1.5	5.0	4.0	4.4	---	---	---			
20	2.2	1.0	1.4	5.2	4.0	4.5	---	---	---			
21	2.5	1.0	1.6	5.4	4.2	4.6	---	---	---			
22	2.7	1.3	1.8	5.3	4.2	4.6	---	---	---			
23	2.7	1.3	1.8	5.3	4.2	4.5	---	---	---			
24	3.2	1.3	1.8	5.3	4.2	4.6	---	---	---			
25	2.8	1.1	1.7	5.2	4.2	4.5	---	---	---			
26	2.8	1.2	1.8	5.1	4.1	4.4	---	---	---			
27	2.8	1.3	1.9	5.1	3.9	4.4	---	---	---			
28	2.7	1.3	1.7	5.3	3.8	4.3	---	---	---			
29	2.6	1.3	1.7	5.2	3.9	4.4	---	---	---			
30	2.8	1.2	1.7	5.4	4.1	4.5	---	---	---			
31	2.6	1.0	1.5	---	---	---	---	---	---			
MONTH	3.5	.7	1.8	5.6	1.0	3.7	6.1	4.1	4.8			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				9.8	8.9	9.4	9.2	8.2	8.6	---	---	---
2				9.5	8.7	9.2	9.5	8.2	8.7	---	---	---
3				9.6	8.8	9.2	9.7	8.1	8.7	6.5	5.3	5.9
4				9.6	8.6	9.1	9.9	8.1	8.8	6.9	5.1	5.7
5				9.6	8.8	9.2	10.5	8.1	9.3	7.4	5.1	6.3
6				10.1	9.3	9.7	10.5	8.8	9.6	7.2	5.9	6.4
7				10.3	9.2	9.7	10.5	9.1	9.7	6.7	5.5	6.1
8				10.7	9.3	10.1	10.4	9.2	9.7	---	---	---
9				---	---	---	10.3	9.0	9.6	---	---	---
10				---	---	---	10.4	8.9	9.6	---	---	---
11				---	---	---	10.4	8.8	9.6	---	---	---
12				---	---	---	10.5	8.2	9.2	---	---	---
13				---	---	---	10.7	8.3	9.4	8.3	6.9	7.3
14				---	---	---	10.9	8.7	9.8	8.5	7.1	7.7
15				---	---	---	10.8	8.9	9.7	8.6	7.4	7.9
16				11.1	10.2	10.7	10.3	8.6	9.4	8.5	7.5	8.0
17				10.8	10.2	10.5	10.6	8.5	9.6	7.9	6.6	7.3
18				10.9	10.2	10.5	10.9	8.4	9.5	7.7	6.5	7.0
19				10.6	9.8	10.2	10.3	8.2	8.9	7.7	6.5	7.0
20				10.3	9.6	10.0	10.0	7.6	8.7	8.0	6.5	7.1
21				10.5	9.6	10.0	9.8	7.2	8.3	7.9	6.7	7.2
22				10.5	9.4	9.8	10.1	6.8	8.1	---	---	---
23				10.3	9.2	9.6	9.3	6.4	7.7	---	---	---
24				10.2	9.1	9.5	8.6	6.0	7.1	---	---	---
25				10.1	8.9	9.5	7.9	5.6	6.6	---	---	---
26				10.1	9.0	9.6	7.6	4.9	6.0	---	---	---
27				10.4	8.9	9.5	7.1	4.8	5.8	---	---	---
28				10.1	8.7	9.4	7.1	4.7	5.6	---	---	---
29				10.1	8.7	9.3	6.8	5.0	5.8	4.4	3.9	4.1
30				10.0	8.5	9.1	---	---	---	4.7	4.1	4.3
31				9.8	8.3	9.0	---	---	---	4.4	3.8	4.1
MONTH				11.1	8.3	9.7	10.9	4.7	8.5	8.6	3.8	6.4

DELAWARE RIVER BASIN

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01467200 DELAWARE RIVER AT BENJAMIN FRANKLIN BRIDGE AT PHILADELPHIA, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	4.2	3.8	4.0	3.8	1.9	2.6	2.6	1.3	1.9	2.7	1.1	1.7
2	4.2	3.8	3.9	3.6	1.8	2.4	2.7	1.6	2.0	2.7	1.3	1.8
3	4.0	3.7	3.8	3.7	1.7	2.2	3.0	1.6	2.2	3.1	1.3	1.9
4	3.9	3.5	3.7	4.2	1.5	2.2	3.3	1.8	2.6	2.9	1.2	1.9
5	3.7	3.2	3.4	3.7	1.7	2.3	3.9	2.2	3.0	3.3	1.3	2.2
6	3.5	3.1	3.3	4.0	1.9	2.6	4.1	2.3	3.2	4.0	1.3	2.4
7	5.2	2.5	3.3	4.1	2.1	2.9	4.7	2.5	3.3	4.5	1.6	2.7
8	4.9	1.5	2.7	4.0	2.4	2.3	4.0	2.3	3.0	4.2	1.6	2.7
9	4.7	.6	2.6	3.6	1.9	2.5	3.5	1.8	2.5	4.2	1.5	2.6
10	5.6	1.6	3.4	2.9	1.8	2.2	3.0	1.5	2.2	3.6	1.0	2.0
11	5.1	1.3	3.1	3.0	1.6	2.2	2.6	1.2	1.8	3.1	1.1	1.9
12	---	---	---	3.8	1.1	2.1	2.4	1.3	1.7	3.4	1.1	1.9
13	---	---	---	4.0	1.5	2.6	2.7	1.2	1.8	4.4	1.3	2.7
14	---	---	---	4.6	2.1	3.0	2.6	.9	1.7	4.4	2.0	3.0
15	---	---	---	4.6	2.5	3.3	2.9	.9	1.5	4.7	2.3	3.2
16	---	---	---	4.1	1.9	2.9	2.6	1.2	1.7	4.6	2.4	3.3
17	---	---	---	4.2	1.8	2.7	3.0	1.1	1.9	4.3	2.4	3.1
18	---	---	---	4.3	1.9	2.8	2.7	1.5	1.9	4.2	2.0	2.8
19	3.8	1.1	2.2	4.4	1.9	2.8	2.6	1.2	2.0	4.1	1.7	2.5
20	4.3	1.2	2.3	4.3	2.1	2.8	2.7	1.5	1.9	4.0	1.5	2.5
21	5.2	2.7	3.9	---	---	---	2.4	1.1	1.5	4.3	1.7	2.7
22	5.4	2.5	3.8	---	---	---	2.2	.7	1.3	4.5	1.6	2.7
23	6.0	3.0	4.3	---	---	---	2.2	.6	1.3	4.1	1.9	2.7
24	6.4	3.3	4.7	---	---	---	3.2	.8	1.7	3.3	1.8	2.4
25	6.3	3.4	4.7	---	---	---	2.8	1.3	1.9	3.8	1.8	2.5
26	6.1	3.0	4.5	4.9	3.3	3.9	3.4	1.1	1.8	3.5	1.7	2.4
27	5.1	2.8	3.8	4.4	2.4	3.2	3.1	1.3	1.9	5.8	2.1	3.5
28	4.5	2.4	3.1	4.5	2.4	3.1	3.0	1.4	1.9	5.7	4.4	5.3
29	4.3	2.1	2.9	4.1	2.2	3.0	3.5	1.3	2.1	6.1	5.3	5.7
30	4.0	1.9	2.7	3.7	2.0	2.6	3.6	1.5	2.2	6.2	5.6	5.8
31	---	---	---	3.2	1.7	2.3	3.1	1.4	1.9	---	---	---
MONTH	6.4	.6	3.5	4.9	1.1	2.7	4.7	.6	2.0	6.2	1.0	2.8

SCHUYLKILL RIVER BASIN

01468500 SCHUYLKILL RIVER AT LANDINGVILLE, PA

LOCATION.--Lat 40°37'45", long 76°07'30", Schuylkill County, Hydrologic Unit 02040203, on left bank 10 ft upstream from highway bridge at Landingville, 0.1 mi upstream from Mahannon Creek, and 5 mi downstream from West Branch Schuylkill River.

DRAINAGE AREA.--133 mi².

PERIOD OF RECORD.--August 1947 to April 1953, October 1963 to September 1965, August 1973 to current year.

REVISED RECORDS.--WDR PA-75-1: 1973(P), 1974(P).

GAGE.--Water-stage recorder. Datum of gage is 470.64 ft above National Geodetic Vertical Datum of 1929. Prior to Aug. 27, 1947, nonrecording gage 10 ft downstream at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 7 to Feb. 22. Records good except for periods of estimated record, which are fair. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--19 years (water years 1948-52, 1964-65, 1975-85), 288 ft³/s, 29.47 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,570 ft³/s Nov. 25, 1950; maximum gage height, 13.60 ft Apr. 16, 1983; minimum discharge, 19 ft³/s Oct. 30, 31, Nov. 4, 1963; minimum gage height, 2.75 ft, Sept. 13, 21, 22, 23, 1985.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood in June 1972 reached a stage of 17.36 ft, discharge, 14,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 1,300 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Nov. 29	0300	*1,720	*7.30	No other peak greater than base discharge.			

Minimum discharge, 54 ft³/s Sept. 13, 21, 22, 23, gage height, 2.75 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	88	72	246	216	98	230	212	108	141	88	136	70
2	99	71	196	229	96	219	179	176	106	88	95	67
3	76	67	227	221	96	204	183	472	104	93	86	67
4	77	65	202	217	94	195	189	329	102	84	81	66
5	86	170	177	213	94	206	186	298	136	83	80	65
6	72	106	239	196	94	182	192	274	113	87	77	63
7	67	90	204	190	94	178	180	261	102	83	80	62
8	74	84	182	180	92	186	190	234	110	100	107	85
9	88	84	171	160	92	169	176	218	101	93	79	73
10	79	81	165	160	92	161	173	205	97	113	74	106
11	83	83	168	150	90	157	178	190	97	83	74	74
12	90	78	166	140	110	207	176	188	98	80	76	65
13	73	81	160	140	280	178	169	220	94	78	72	62
14	66	79	143	130	240	166	164	174	91	111	72	60
15	67	74	153	130	220	158	164	161	86	101	77	60
16	71	68	141	120	200	156	162	183	316	80	72	60
17	69	63	143	120	190	154	155	187	165	74	69	60
18	71	64	137	120	170	147	147	194	148	76	66	59
19	86	68	147	120	160	141	146	158	119	76	68	60
20	88	60	150	110	160	139	142	147	110	73	67	59
21	68	64	164	110	150	135	137	138	103	73	65	56
22	114	62	313	110	170	134	134	133	98	83	63	56
23	129	61	260	110	216	141	133	136	116	72	63	59
24	87	61	245	100	263	158	133	133	97	71	64	69
25	80	61	234	100	276	147	130	125	92	78	124	65
26	94	60	209	100	269	133	127	119	90	120	112	63
27	80	63	208	100	255	132	119	114	89	129	74	596
28	68	120	217	100	237	131	113	120	95	83	69	231
29	80	971	229	100	---	147	111	120	103	77	67	145
30	75	355	224	98	---	135	110	110	95	74	92	119
31	83	---	206	98	---	145	---	108	---	176	88	---
TOTAL	2528	3486	6026	4388	4598	5071	4710	5733	3414	2780	2489	2802
MEAN	81.5	116	194	142	164	164	157	185	114	89.7	80.3	93.4
MAX	129	971	313	229	280	230	212	472	316	176	136	596
MIN	66	60	137	98	90	131	110	108	86	71	63	56
CFSM	.61	.87	1.46	1.07	1.23	1.23	1.18	.86	.67	.60	.70	
IN.	.71	.98	1.69	1.23	1.29	1.42	1.32	1.60	.95	.78	.70	.78

CAL YR 1984	TOTAL	116795	MEAN	319	MAX	2650	MIN	58	CFSM	2.40	IN.	32.67
WTR YR 1985	TOTAL	48025	MEAN	132	MAX	971	MIN	56	CFSM	.99	IN.	13.43

SCHUYLKILL RIVER BASIN

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01469500 LITTLE SCHUYLKILL RIVER AT TAMAQUA, PA

LOCATION.--Lat 40°48'25", long 75°58'20", Schuylkill County, Hydrologic Unit 02040203, on left bank at pumping plant of Panther Valley Water Co., 0.6 mi upstream from Tamaqua, and 0.8 mi upstream from Panther Creek.

DRAINAGE AREA.--42.9 mi².

PERIOD OF RECORD.--October 1919 to current year. Monthly discharge only for some periods, published in WSP 1302. June 1916 to September 1919, gage heights and discharge measurements only, in reports of Water Supply Commission of Pennsylvania.

REVISED RECORDS.--WSP 756: Drainage area. WSP 971: 1942. WSP 1302: 1922, 1926-30. WSP 1432: 1920-21, 1933.

GAGE.--Water-stage recorder and broad-crested weir. Datum of gage is 817.48 ft above National Geodetic Vertical Datum of 1929. Prior to June 21, 1929, nonrecording gage at site 3,600 ft downstream at datum 28.64 ft lower.

REMARKS.--Estimated daily discharge during water year: Dec. 30 to Mar. 14. Record good except for periods of estimated record, which are fair. Flow regulated by Still Creek Reservoir (station 01469200) 6.5 mi upstream. Figures of daily discharge do not include water diverted from reservoir. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--66 years, 92.7 ft³/s, 29.33 in/yr, adjusted for diversion and, since February 1933, for storage.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 7,790 ft³/s Aug. 18, 1955, gage height, 11.10 ft, from rating curve extended above 3,200 ft³/s on basis of contracted-opening measurement of peak flow; minimum, 1.8 ft³/s Dec. 18, 1931, gage height, 1.21 ft; minimum daily, 2.9 ft³/s Sept. 2, 1966.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 282 ft³/s Nov. 29, gage height, 3.20 ft; minimum, 6.3 ft³/s Sept. 21, 22, 23, gage height, 1.74 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	19	11	75	110	27	70	63	28	44	17	46	15
2	23	11	61	110	27	62	59	43	32	17	26	13
3	17	10	63	100	26	56	58	153	27	16	20	13
4	15	10	64	94	25	50	60	126	25	16	17	12
5	14	28	53	88	24	45	58	110	33	15	16	11
6	13	22	61	84	24	40	59	100	32	15	15	11
7	13	17	55	78	23	36	57	93	26	15	16	9.9
8	13	15	50	74	22	32	78	80	25	17	32	11
9	13	13	47	70	22	29	63	70	24	17	21	11
10	13	14	46	66	21	27	54	64	22	16	17	12
11	12	14	48	62	21	35	53	59	20	15	15	11
12	12	15	48	60	30	54	50	54	20	14	15	9.7
13	11	13	46	56	94	50	49	55	19	24	14	8.3
14	11	11	43	54	80	47	47	50	18	23	13	7.2
15	10	10	45	52	72	45	47	44	17	23	16	6.7
16	9.8	11	43	49	66	43	46	46	55	18	18	6.6
17	10	10	43	47	62	43	43	49	40	15	15	6.7
18	11	9.8	42	45	56	42	41	51	35	14	14	6.6
19	12	10	43	43	54	40	40	46	29	13	13	6.8
20	14	9.6	45	41	50	41	41	40	25	12	13	6.7
21	13	12	45	40	48	40	39	36	23	11	13	6.5
22	16	11	92	38	52	38	37	33	21	15	12	6.3
23	24	10	90	37	62	40	36	33	22	12	11	6.5
24	17	9.4	89	36	76	43	34	33	21	9.9	10	7.3
25	15	9.3	88	34	90	42	34	31	20	10	22	7.6
26	15	9.0	79	33	98	36	33	29	18	24	27	7.0
27	15	8.9	81	32	88	35	32	28	17	28	19	92
28	14	14	82	31	76	35	30	29	18	18	15	86
29	14	207	104	30	---	40	29	29	20	15	13	55
30	13	107	130	29	---	39	28	27	19	13	15	42
31	12	---	120	28	---	42	---	25	---	30	17	---
TOTAL	433.8	662.0	2021	1751	1416	1319	1398	1694	767	517.9	546	511.4
MEAN	14.0	22.1	65.2	56.5	50.6	42.5	46.6	54.6	25.6	16.7	17.6	17.0
MAX	24	207	130	110	98	70	78	153	55	30	46	92
MIN	9.8	8.9	42	28	21	27	28	25	17	9.9	10	6.3
†	9.3	9.2	9.5	8.9	9.0	8.9	9.0	10.9	9.4	6.8	6.2	6.0
MEAN†	16.6	26.6	69.2	64.3	67.0	54.8	56.8	67.8	29.1	20.1	19.4	20.6
CFSM†	.39	.62	1.61	1.50	1.56	1.28	1.32	1.58	.68	.47	.45	.48
IN†	.44	.70	1.86	1.72	1.62	1.48	1.47	1.82	.76	.54	.52	.54

CAL YR 1984 TOTAL 37204.8 MEAN 102 MAX 1340 MIN 8.9 MEAN† 110 CFSM† 2.56 IN† 34.76
WTR YR 1985 TOTAL 13037.1 MEAN 35.7 MAX 207 MIN 6.3 MEAN† 42.6 CFSM† 0.99 IN† 13.44

† Diversion from Still Creek Reservoir, equivalent in cubic feet per second, furnished by Panther Valley Water Company.

‡ Adjusted for diversion and change in contents in Still Creek Reservoir.

SCHUYLKILL RIVER BASIN

01470500 SCHUYLKILL RIVER AT BERNE, PA

LOCATION.--Lat 40°31'21", long 75°59'55", Berks County, Hydrologic Unit 02040203, on right bank 50 ft upstream from highway bridge at Berne, 0.5 mi upstream from Mill Creek, and 6.5 mi downstream from Little Schuylkill River. Water-quality sampling site at bridge 50 ft downstream.

DRAINAGE AREA.--355 mi².

PERIOD OF RECORD.--August 1947 to current year. Monthly discharge only for August 1947, published in WSP 1302.

GAGE.--Water-stage recorder. Datum of gage is 310.65 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 10 to Feb. 14, Feb. 18-22. Records good, except periods of estimated discharge which are poor. Some regulation at low flow by mine pumpage and by Still Creek Reservoir (station 01469200) about 25 mi upstream.

AVERAGE DISCHARGE.--38 years, 715 ft³/s, 27.37 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 42,800 ft³/s June 22, 1972, gage height, 19.0 ft, from floodmark in gage shelter, from rating curve extended above 17,000 ft³/s; minimum, 31 ft³/s Sept. 2, 1949.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood in May 1942 reached a stage of 15.0 ft, from floodmarks, discharge, 26,900 ft³/s.

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 4,400 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage Height (ft)	Date	Time	Discharge (ft ³ /s)	Gage Height (ft)
Nov. 29	0715	7160	9.19	Feb. 12	2345	*7850	*9.41

Minimum discharge, 89 ft³/s Sept. 21, gage height, 4.67 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	185	190	1030	630	230	674	646	269	312	178	386	143
2	265	188	746	692	225	638	583	369	259	169	217	130
3	203	178	725	655	225	578	570	1400	228	204	173	125
4	177	169	738	634	220	539	585	1180	232	176	158	122
5	182	316	597	652	220	579	547	978	276	161	148	118
6	182	302	766	594	220	508	563	852	295	173	144	113
7	164	227	707	568	215	460	520	765	227	217	142	112
8	150	206	615	537	215	484	539	661	229	185	199	138
9	180	199	566	481	215	460	496	581	228	233	177	159
10	185	208	531	460	215	424	465	537	207	222	152	171
11	190	188	509	440	210	407	460	491	197	182	150	181
12	198	210	484	410	210	555	449	455	198	165	153	125
13	200	179	457	390	2040	546	428	572	192	171	143	113
14	183	175	420	370	1050	493	410	442	186	182	141	108
15	183	170	444	360	774	475	407	386	180	282	138	106
16	183	165	420	340	654	451	407	379	614	181	135	104
17	179	160	413	320	603	450	407	459	462	154	133	98
18	165	166	390	305	563	438	374	481	369	139	121	96
19	180	180	393	295	536	421	373	385	295	133	123	95
20	222	155	426	290	528	416	367	344	256	135	127	95
21	175	143	414	280	499	401	355	322	236	131	118	96
22	307	142	1040	275	510	386	336	304	217	169	112	113
23	408	129	971	275	656	401	325	297	233	143	108	115
24	259	136	864	270	880	442	321	307	213	132	108	118
25	220	133	785	265	934	430	318	278	196	136	227	113
26	236	131	659	260	868	382	315	260	184	215	236	102
27	225	137	629	255	818	367	298	249	178	338	175	1870
28	194	156	633	245	725	365	290	250	184	194	138	1150
29	223	4170	689	240	---	397	280	274	219	150	125	558
30	202	1720	684	235	---	369	275	239	197	141	128	398
31	202	---	616	235	---	372	---	232	---	199	209	---
TOTAL	6407	10928	19361	12258	15258	14308	12709	14998	7505	5590	4944	7085
MEAN	207	364	625	395	545	462	424	484	250	180	159	236
MAX	408	4170	1040	692	2040	674	646	1400	614	338	386	1870
MIN	150	129	390	235	210	365	275	232	178	131	108	95
CFSM	.58	1.03	1.76	1.11	1.54	1.30	1.19	1.36	.70	.51	.45	.66
IN.	.67	1.15	2.03	1.28	1.60	1.50	1.33	1.57	.79	.59	.52	.74

CAL YR 1984 TOTAL 342914 MEAN 937 MAX 10900 MIN 129 CFSM 2.64 IN. 35.93
WTR YR 1985 TOTAL 131351 MEAN 360 MAX 4170 MIN 95 CFSM 1.01 IN. 13.76

SCHUYLKILL RIVER BASIN

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01470756 MAIDEN CREEK AT VIRGINVILLE, PA

LOCATION.--Lat 40°30'51", long 75°53'00", Berks County, Hydrologic Unit 02040203, on right bank 0.9 mi downstream from Sacony Creek, 0.9 mi southwest of Virginville, and 1.0 mi upstream from Moselem Creek.

DRAINAGE AREA.--159 mi².

PERIOD OF RECORD.--January 1973 to current year.

GAGE.--Water-stage recorder. Elevation of gage is 310 ft above National Geodetic Vertical Datum of 1929, from topographic map.

REMARKS.--Estimated daily discharges during water year: Jan. 11 to Feb. 15. Records good except for periods of estimated records which are poor. Several observation of water temperature were made during the year.

AVERAGE DISCHARGE.--12 years, 269 ft³/s, 22.97 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,420 ft³/s Jan. 24, 1979, gage height, 12.67 ft; minimum, 11 ft³/s Aug. 25, Sept. 24, 25, 1980; minimum gage height, 1.88 ft Aug. 25, 1980.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 1972 reached a stage of 17.2 feet, from floodmarks, discharge, about 14,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 2,000 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2345	ice jam	*9.52	Sept. 27	2045	*3,860	8.05

Minimum discharge, 16 ft³/s Sept. 21, 22, 23, gage height, 1.99 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	36	67	163	240	74	178	214	40	115	53	276	32
2	89	67	126	293	74	166	148	97	74	48	81	27
3	51	60	212	273	72	147	135	798	62	97	59	25
4	37	56	279	255	72	135	136	524	59	54	48	24
5	32	97	205	263	72	175	121	357	111	43	40	21
6	29	91	344	219	72	140	129	277	101	41	39	19
7	27	64	310	203	70	117	119	232	65	63	38	19
8	28	55	255	181	70	132	134	193	74	54	130	34
9	31	53	221	155	70	124	115	165	76	62	63	41
10	33	54	196	150	70	110	103	148	64	44	48	38
11	30	53	181	140	72	105	100	131	58	36	57	51
12	28	52	157	130	250	197	96	122	58	29	63	26
13	27	46	140	120	1000	181	90	170	50	31	41	19
14	27	42	124	110	740	153	85	123	44	38	40	18
15	28	40	144	110	450	140	87	100	41	77	39	17
16	28	42	125	100	242	126	88	101	200	42	38	17
17	28	38	123	100	201	125	86	155	221	29	37	17
18	29	37	117	98	183	116	75	254	165	24	33	17
19	30	46	120	94	188	105	73	143	119	23	27	17
20	50	41	141	90	191	107	74	116	97	21	32	17
21	41	35	133	88	170	98	70	103	86	21	27	16
22	223	34	571	86	184	91	65	98	73	74	22	16
23	520	34	485	84	301	107	61	96	75	35	21	17
24	182	34	393	82	356	117	58	100	64	24	19	19
25	127	33	336	80	331	116	60	84	57	23	110	19
26	119	32	242	80	273	93	58	76	49	63	74	18
27	97	31	222	78	240	86	52	70	62	246	44	2050
28	82	32	222	78	200	86	49	71	67	77	32	1420
29	116	515	285	76	---	94	48	80	78	52	27	577
30	89	244	263	76	---	86	42	67	61	45	29	360
31	75	---	226	74	---	90	---	66	---	164	42	---
TOTAL	2369	2125	7061	4206	6288	3843	2771	5157	2526	1733	1676	5008
MEAN	76.4	70.8	228	136	225	124	92.4	166	84.2	55.9	54.1	167
MAX	520	515	571	293	1000	197	214	798	221	246	276	2050
MIN	27	31	117	74	70	86	42	40	41	21	19	16
CFSM	.48	.45	1.43	.86	1.42	.78	.58	1.04	.53	.35	.34	1.05
IN.	.55	.50	1.65	.98	1.47	.90	.65	1.21	.59	.41	.39	1.17
CAL YR 1984	TOTAL	119930	MEAN	328	MAX	4170	MIN	27	CFSM	2.06	IN.	28.06
WTR YR 1985	TOTAL	44763	MEAN	123	MAX	2050	MIN	16	CFSM	.77	IN.	10.47

SCHUYLKILL RIVER BASIN

01470779 TULPEHOCKEN CREEK NEAR BERNVILLE, PA

LOCATION.--Lat 40°24'48", long 76°10'19", Berks County, Hydrologic Unit 02040203, on left bank 30 ft downstream from Kricks Mill Bridge, 0.4 mi upstream from Mill Creek, and 3.5 mi west of Bernville.

DRAINAGE AREA.--66.5 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--November 1974 to current year.

GAGE.--Water-stage recorder. Datum of gage is 311.26 ft above Pennsylvania Department of Transportation Datum.

REMARKS.--Estimated daily discharges in this water year: Nov. 22-26, Jan. 10 to Feb. 12. Records good, except periods of estimated daily discharge which are poor.

AVERAGE DISCHARGE.--10 years, 109 ft³/s, 22.32 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 5,560 ft³/s Jan. 24, 1979, gage height, 10.16 ft, from rating curve extended above 740 ft³/s on basis of contracted-opening measurement of peak flow; minimum daily, 25 ft³/s Oct. 14, 1981.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 1972 reached a stage of about 9.5 ft, from information by local resident, discharge not determined.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 950 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2230	*1240	*5.41	No other peaks greater than base discharge.			

Minimum daily discharge, 30 ft³/s Aug. 23, Sept. 26.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	65	51	87	71	45	87	89	44	53	39	64	50
2	58	51	83	81	45	96	65	57	59	39	40	49
3	54	56	96	78	44	100	63	144	54	41	37	32
4	52	58	84	74	44	96	62	85	47	39	51	30
5	52	72	75	75	44	84	69	68	60	40	51	30
6	59	54	103	72	44	77	71	66	53	38	35	29
7	72	50	99	72	44	75	77	64	51	41	33	29
8	70	49	93	71	44	76	76	60	56	38	68	37
9	51	49	89	68	44	85	60	57	61	38	40	41
10	50	54	86	67	44	90	57	61	54	36	36	53
11	49	58	76	66	44	86	56	66	47	35	52	51
12	49	57	73	64	300	78	56	70	48	34	52	39
13	55	47	70	63	345	72	62	70	46	33	40	37
14	60	45	75	61	139	70	62	53	44	33	45	39
15	58	45	79	59	118	69	62	50	45	38	40	49
16	50	46	75	58	110	72	55	51	62	34	41	35
17	50	51	75	57	119	77	54	54	68	32	43	31
18	48	55	73	56	114	74	53	74	58	32	41	30
19	47	59	73	55	99	64	57	70	52	31	40	29
20	56	47	73	54	97	64	59	58	51	30	32	29
21	59	45	75	53	93	62	57	50	47	30	30	35
22	80	44	108	52	94	62	57	54	47	32	29	45
23	100	45	89	51	118	70	56	53	49	38	28	33
24	64	46	86	50	128	75	50	53	47	37	32	31
25	58	46	86	49	121	73	49	53	46	38	50	30
26	55	45	75	48	98	62	48	54	40	46	46	28
27	65	44	78	48	93	61	46	49	39	68	34	339
28	77	47	77	47	89	60	46	52	40	53	35	123
29	82	276	83	47	---	69	45	49	41	44	32	95
30	55	107	81	46	---	71	44	45	40	42	30	86
31	52	---	79	45	---	81	---	49	---	75	38	---
TOTAL	1852	1799	2554	1858	2761	2338	1763	1883	1505	1224	1265	1594
MEAN	59.7	60.0	82.4	59.9	98.6	75.4	58.8	60.7	50.2	39.5	40.8	53.1
MAX	100	276	108	81	345	100	89	144	68	75	68	339
MIN	47	44	70	45	44	60	44	44	39	30	28	28
CFSM	.90	.90	1.24	.90	1.48	1.13	.88	.91	.75	.59	.61	.80
IN.	1.04	1.01	1.43	1.04	1.54	1.31	.99	1.05	.84	.68	.71	.89

CAL YR 1984	TOTAL	49976	MEAN	137	MAX	791	MIN	44	CFSM	2.06	IN.	27.96
WTR YR 1985	TOTAL	22396	MEAN	61.4	MAX	345	MIN	28	CFSM	.92	IN.	12.53

SCHUYLKILL RIVER BASIN

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01470779 TULPEHOCKEN CREEK NEAR BERNVILLE, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: October 1977 to current year.

INSTRUMENTATION.--Temperature record since October 1977.

REMARKS.--Interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURES: Maximum, 27°C July 21, 1985; minimum, 0.0°C on several days during winter period.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	---	---	---							---	---	---
2	---	---	---							---	---	---
3	---	---	---							---	---	---
4	12.5	11.5	12.0							---	---	---
5	12.5	12.0	12.0							---	---	---
6	12.0	11.5	12.0							---	---	---
7	11.5	11.0	11.5							---	---	---
8	13.0	11.5	12.0							---	---	---
9	14.5	13.0	13.5							---	---	---
10	14.5	14.0	14.5							---	---	---
11	15.5	14.5	14.5							---	---	---
12	15.0	13.5	14.5							---	---	---
13	14.0	13.5	14.0							---	---	---
14	13.5	12.5	13.0							---	---	---
15	13.0	11.5	12.0							---	---	---
16	12.0	11.5	12.0							---	---	---
17	12.0	12.0	12.0							---	---	---
18	---	---	---							---	---	---
19	---	---	---							---	---	---
20	---	---	---							---	---	---
21	---	---	---							---	---	---
22	---	---	---							.5	.5	.5
23	---	---	---							.5	.5	.5
24	---	---	---							.5	.5	.5
25	---	---	---							.5	.5	.5
26	---	---	---							.5	.5	.5
27	17.5	16.5	17.0							.5	.5	.5
28	17.5	17.0	17.5							2.5	.5	1.0
29	17.5	16.0	17.0							2.5	2.0	2.5
30	16.0	14.5	15.5							2.5	1.5	2.0
31	15.5	15.0	15.0							2.0	2.0	2.0
MONTH	17.5	11.0	14.0							2.5	.5	1.0

SCHUYLKILL RIVER BASIN

01470779 TULPEHOCKEN CREEK NEAR BERNVILLE, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	2.5	2.0	2.0	7.5	5.0	6.5	9.0	7.0	8.0	---	---	---
2	3.0	2.5	3.0	9.5	6.5	8.0	8.5	7.0	8.0	---	---	---
3	3.0	1.5	2.0	9.0	6.5	8.0	7.5	6.0	6.5	---	---	---
4	1.5	1.0	1.0	8.5	5.5	6.5	8.5	6.0	7.5	---	---	---
5	1.5	.5	1.0	9.5	5.5	7.5	12.5	8.0	10.0	---	---	---
6	2.0	.5	1.0	9.0	6.0	6.0	14.5	12.5	13.0	---	---	---
7	2.5	2.0	2.0	6.5	5.0	6.0	12.5	10.0	10.5	---	---	---
8	2.0	1.0	1.5	9.0	6.5	7.5	10.0	8.5	9.5	16.0	13.0	14.5
9	2.5	.5	1.0	10.0	8.0	9.5	8.5	7.0	7.5	16.0	13.0	14.5
10	2.5	.5	1.0	10.5	8.0	9.5	9.0	5.5	7.0	18.0	15.0	16.5
11	3.0	1.0	2.0	10.0	8.0	9.0	9.0	8.0	8.5	20.5	17.0	18.5
12	3.5	.5	2.5	9.0	7.5	8.0	11.5	7.5	9.5	21.0	19.0	20.0
13	8.5	2.0	7.5	9.5	6.0	7.5	13.5	11.5	12.5	21.0	18.0	20.0
14	6.5	3.0	3.5	9.5	7.5	9.0	12.5	11.5	12.0	21.0	18.5	20.0
15	4.5	3.5	4.0	8.0	6.5	7.0	12.5	12.0	12.5	19.5	17.0	18.5
16	4.0	3.0	3.5	8.0	5.0	6.5	14.5	12.5	13.5	17.0	14.5	15.5
17	5.5	3.5	4.5	9.0	7.0	8.0	14.5	12.0	13.0	15.0	14.5	15.0
18	6.0	4.0	5.0	7.5	5.0	6.0	15.0	11.5	13.0	16.0	14.5	15.0
19	7.0	5.0	6.0	6.5	3.5	5.0	17.5	14.0	16.0	16.0	13.5	15.0
20	6.5	5.0	6.0	8.0	6.5	7.5	19.5	16.5	18.0	18.0	14.5	16.0
21	6.5	1.5	5.5	8.0	6.0	7.0	19.5	19.5	19.5	20.5	17.5	18.5
22	9.0	6.5	7.5	7.5	6.0	7.0	---	---	---	19.0	17.0	18.0
23	11.0	8.5	9.5	7.0	6.5	6.5	---	---	---	17.5	15.0	16.5
24	11.5	8.5	10.0	7.5	6.5	7.0	---	---	---	17.0	14.0	15.5
25	11.5	10.0	10.5	9.0	6.5	7.5	---	---	---	19.0	16.0	17.5
26	10.0	8.5	9.0	9.0	6.5	8.0	---	---	---	20.5	17.5	19.0
27	10.0	8.5	9.5	11.0	7.5	9.0	---	---	---	21.5	18.5	20.0
28	8.0	5.5	6.5	12.5	11.0	11.5	---	---	---	21.0	18.5	20.5
29	---	---	---	14.0	12.5	13.0	---	---	---	18.5	17.0	17.5
30	---	---	---	14.0	11.5	13.0	---	---	---	19.0	16.5	17.5
31	---	---	---	11.0	7.5	9.5	---	---	---	18.0	17.0	17.5
MONTH	11.5	.5	4.5	14.0	3.5	8.0	19.5	5.5	11.0	21.5	13.0	17.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	20.5	17.0	18.5	---	---	---	23.5	19.5	21.5	18.0	17.5	17.5
2	20.5	18.5	19.5	---	---	---	23.0	19.5	21.0	---	---	---
3	20.5	18.5	20.0	---	---	---	24.0	18.5	21.0	23.0	20.0	21.0
4	20.0	18.0	19.0	---	---	---	23.5	19.0	21.5	---	---	---
5	18.0	15.5	17.0	---	---	---	23.0	20.0	21.5	---	---	---
6	19.0	15.5	17.0	---	---	---	23.5	20.0	22.0	25.0	23.0	23.5
7	18.0	17.0	17.5	---	---	---	24.5	20.0	22.5	---	---	---
8	18.0	17.0	17.5	---	---	---	24.5	21.0	22.5	---	---	---
9	19.5	17.0	18.0	---	---	---	25.5	21.5	23.5	---	---	---
10	21.0	17.5	19.5	---	---	---	26.0	22.0	23.5	22.5	21.0	22.0
11	20.5	19.5	19.5	---	---	---	25.0	22.0	23.5	21.5	18.5	20.5
12	20.0	19.5	20.0	---	---	---	23.5	20.5	22.0	18.5	16.0	17.5
13	---	---	---	---	---	---	24.5	20.5	22.0	---	---	---
14	---	---	---	---	---	---	---	---	---	---	---	---
15	---	---	---	---	---	---	---	---	---	---	---	---
16	---	---	---	---	---	---	---	---	---	---	---	---
17	---	---	---	26.5	21.0	24.0	23.5	19.5	21.0	---	---	---
18	---	---	---	25.5	21.0	23.0	22.0	19.0	20.5	---	---	---
19	---	---	---	25.5	21.0	23.0	22.5	18.5	20.0	---	---	---
20	---	---	---	26.5	22.5	24.0	24.5	20.0	22.5	---	---	---
21	---	---	---	27.0	22.5	24.5	23.0	20.5	22.0	---	---	---
22	---	---	---	26.5	23.0	24.5	21.5	19.0	20.5	---	---	---
23	---	---	---	25.5	20.0	23.0	21.0	18.0	19.0	---	---	---
24	---	---	---	23.5	18.5	21.5	21.0	18.0	19.5	---	---	---
25	---	---	---	25.5	20.5	22.5	20.0	19.0	19.5	---	---	---
26	---	---	---	24.5	21.5	23.0	---	---	---	---	---	---
27	---	---	---	25.0	21.0	23.0	---	---	---	---	---	---
28	---	---	---	24.5	21.0	23.0	23.0	20.5	21.5	---	---	---
29	---	---	---	24.0	20.5	22.0	22.5	20.5	21.5	---	---	---
30	---	---	---	25.5	20.5	22.5	---	---	---	---	---	---
31	---	---	---	24.0	20.5	22.5	20.5	18.0	19.5	---	---	---
MONTH	21.0	15.5	18.5	27.0	18.5	23.0	26.0	18.0	21.5	25.0	16.0	20.5

SCHUYLKILL RIVER BASIN

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01470853 FURNACE CREEK AT ROBESONIA, PA.

LOCATION.--Lat 40°20'24", long 76°08'37", Berks County, Hydrologic Unit 02040202, on downstream side of center pier of bridge, 270 feet south of Furnace Street in Robesonia.

DRAINAGE AREA.--4.18 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1982 to current year.

GAGE.--Water-stage recorder. Altitude of gage is 510 ft, from topographic map.

REMARKS.--Periods of estimated daily discharges in this water year: Jan. 10 to Feb. 11, Feb. 14-21, May 2-21. Records fair except periods of estimated daily discharges, which are poor. Diversion above station for municipal supply. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 227 ft³/s July 7, 1984, gage height, 4.70 ft, from rating curve extended above 55 ft³/s; minimum, 0.05 ft³/s Sept. 11, 20, 1983, gage height, 2.71 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 70 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Nov. 29	0145	97	3.95	Sept. 27	1230	*166	*4.34
Feb. 12	1530	80	3.83				

Minimum daily discharge, 0.13 ft³/s Sept. 18, 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	2.6	1.9	8.5	5.5	1.9	10	5.5	2.6	3.9	1.3	2.8	.83
2	3.0	2.3	6.9	8.4	1.8	8.8	3.9	9.0	2.6	1.4	1.1	.68
3	2.0	1.9	13	6.1	1.8	8.0	4.3	23	2.4	1.5	.85	.39
4	1.4	1.9	9.2	5.5	1.8	7.7	4.4	11	2.6	1.2	.75	.48
5	1.5	4.6	7.2	5.7	1.8	9.0	4.1	8.2	3.9	1.2	.54	.27
6	1.4	2.7	12	5.2	1.7	6.8	5.0	7.4	2.5	1.2	.42	.22
7	1.6	2.1	8.1	5.1	1.7	6.0	4.3	6.8	2.4	1.5	.45	.18
8	1.5	2.0	7.1	4.8	1.7	6.8	4.0	6.0	3.2	1.2	4.0	1.0
9	1.3	2.0	6.7	4.4	1.6	5.7	3.9	5.4	2.6	1.2	.97	1.2
10	1.5	2.5	7.0	4.2	1.6	5.4	3.5	5.6	1.9	.93	.57	2.0
11	1.9	2.6	7.1	4.0	1.6	4.8	3.2	5.9	1.8	.76	.71	1.3
12	1.1	2.1	6.2	3.8	25	7.5	3.2	6.3	1.7	.74	.49	.34
13	1.6	1.9	5.9	3.5	15	5.0	3.4	6.8	1.5	.70	.25	.30
14	1.6	1.8	5.8	3.3	6.0	5.1	3.4	5.6	1.6	.88	3.0	.32
15	1.6	2.1	6.7	3.2	5.4	4.4	3.3	4.5	1.9	1.1	.66	.37
16	1.5	2.6	5.7	3.0	5.0	4.1	3.2	5.4	4.4	.61	.70	.29
17	1.9	2.2	5.7	2.8	4.8	4.0	3.2	6.9	2.8	.41	.85	.16
18	1.8	2.8	5.2	2.7	4.5	3.5	3.0	8.4	1.8	.59	.44	.13
19	2.7	3.1	5.6	2.6	4.4	3.4	2.9	8.0	1.5	.43	.66	.34
20	2.1	2.0	5.3	2.5	4.3	3.4	2.7	5.7	1.6	.44	.30	.16
21	2.7	1.7	6.6	2.4	4.2	3.2	2.7	4.2	1.5	.47	.36	.13
22	8.1	1.8	11	2.3	10	3.2	2.5	4.6	1.4	.83	.49	.15
23	7.2	1.7	7.0	2.3	27	4.5	2.4	5.3	1.6	.44	.14	.41
24	4.0	1.9	6.2	2.2	23	5.0	2.4	4.9	1.4	.25	.44	.82
25	2.5	2.0	6.6	2.1	18	4.0	2.6	3.8	1.3	1.2	3.8	.33
26	2.2	1.8	5.3	2.1	15	3.3	2.6	3.3	1.2	5.6	1.7	.20
27	2.3	1.7	5.5	2.0	13	3.2	2.5	2.9	1.3	4.5	.84	52
28	2.8	4.2	5.7	2.0	11	3.2	2.5	3.0	1.6	1.1	.44	5.3
29	6.2	36	5.2	2.0	---	4.0	2.5	2.9	1.8	.66	.35	1.8
30	2.6	12	5.1	1.9	---	3.5	2.5	2.7	1.4	.55	1.5	.95
31	2.1	---	5.0	1.9	---	4.2	---	2.8	---	13	1.4	---
TOTAL	78.3	111.9	214.1	109.5	214.6	160.7	99.6	188.9	63.1	47.89	31.97	73.05
MEAN	2.53	3.73	6.91	3.53	7.66	5.18	3.32	6.09	2.10	1.54	1.03	2.43
MAX	8.1	36	13	8.4	27	10	5.5	23	4.4	13	4.0	52
MIN	1.1	1.7	5.0	1.9	1.6	3.2	2.4	2.6	1.2	.25	.14	.13
†	0.76	0.75	0.75	0.77	0.72	0.56	0.29	0.35	0.38	0.49	0.51	0.54
MEAN†	3.29	4.48	7.66	4.30	8.38	5.74	3.61	6.44	2.48	2.03	1.54	2.97
CFSM†	.79	1.07	1.83	1.03	2.00	1.37	.86	1.54	.59	.49	.37	.71
IN†	.91	1.20	2.11	1.19	2.09	1.58	.96	1.78	.66	.56	.42	.79

CAL YR 1984	TOTAL	3112.1	MEAN	8.50	MAX	73	MIN	1.1	MEAN†	9.23	CFSM†	2.21	IN†	29.99
WTR YR 1985	TOTAL	1393.61	MEAN	3.82	MAX	52	MIN	.13	MEAN†	4.39	CFSM†	1.05	IN†	14.26

† Diversion, equivalent in cubic feet per second, furnished by Womelsdorf-Robeson Joint Water Authority.

‡ Adjusted for diversion.

SCHUYLKILL RIVER BASIN

01470853 FURNACE CREEK NEAR ROBESONIA, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October 1984 to September 1985.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)
OCT 11...	1130	1.4	88	7.3	14.5	11	3.9	5.4	1.4
DATE	ALKA- LINIT FIELD (MG/L AS CACO3)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SULFATE DIS- SOLVED (MG/L AS SO4)	SILICA, DIS- SOLVED (MG/L AS SIO2)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	ARSENIC DIS- SOLVED (UG/L AS AS)
OCT 11...	28	5.0	17	18	1.7	<.010	1.7	<.010	<1
DATE	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	ZINC, DIS- SOLVED (UG/L AS ZN)	
OCT 11...	1	<1	34	40	1	10	<.1	10	

SCHUYLKILL RIVER BASIN

01470960 TULPEHOCKEN CREEK AT BLUE MARSH DAMSITE NEAR READING, PA

LOCATION.--Lat 40°22'14", long 76°01'32", Berks County, Hydrologic Unit 02040203, on right bank 1 mi upstream from Rebers Bridge and Plum Creek, 1 mi east of Blue Marsh, 3 mi north of Sinking Spring, and 5.5 mi northwest of Reading. Water-quality sampling site at Rebers bridge 1.0 mi downstream.

DRAINAGE AREA.--175 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--May 1965 to current year.

REVISED RECORD.--WDR PA-72-1: 1969-1971 (M).

GAGE.--Water-stage recorder. Datum of gage is 230.06 ft above Western Berks Water Authority datum. Prior to Nov. 25, 1974, water-stage recorder at site 0.3 mi downstream at same datum.

REMARKS.--No estimated daily discharges in this water year. Records fair. Flow regulated since April 1979 by Blue Marsh Reservoir (station 01470870) 0.8 mi upstream.

AVERAGE DISCHARGE.--20 years, 273 ft³/s, 21.20 in/yr, adjusted for storage since April 1979.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 16,100 ft³/s June 22, 1972, gage height, 18.7 ft, from flood-marks, from rating curve extended above 3,000 ft³/s on basis of runoff comparison with downstream station; minimum since construction of dam, 5.8 ft³/s Nov. 17, 1977; minimum gage height, 1.45 ft July 29, 30, 31, 1965.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 1,010 ft³/s Feb. 13, gage height, 4.53 ft; minimum daily, 27 ft³/s Aug. 23, 24.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	109	85	474	204	139	176	112	41	86	77	379	49
2	123	85	474	204	146	138	89	138	85	95	196	49
3	125	87	470	327	146	138	64	333	95	95	117	110
4	103	87	394	409	109	266	55	372	116	96	117	198
5	82	107	247	406	85	290	55	368	199	97	70	191
6	75	128	378	404	101	197	56	339	204	98	33	191
7	75	85	400	401	114	152	56	235	127	98	32	192
8	75	77	248	403	113	129	56	159	127	74	65	194
9	106	76	247	402	111	140	54	159	128	51	82	194
10	128	86	247	400	112	141	49	158	129	51	61	117
11	98	85	247	398	114	185	46	158	129	55	61	32
12	80	85	236	396	201	231	44	158	109	59	78	111
13	73	85	208	394	756	214	45	158	60	59	91	191
14	74	85	204	296	992	152	45	133	49	59	95	181
15	75	85	204	157	705	152	45	119	46	59	98	181
16	75	85	204	148	243	153	43	94	47	76	88	181
17	108	85	157	127	243	152	42	78	108	91	81	181
18	119	85	132	135	243	152	43	89	159	67	81	247
19	97	85	149	143	297	129	42	89	175	39	64	330
20	71	85	149	144	285	112	41	87	188	28	51	333
21	72	85	149	142	216	111	41	114	161	29	43	339
22	73	87	149	121	197	113	41	122	99	29	28	339
23	201	87	151	102	197	114	41	122	100	45	27	267
24	307	87	336	79	200	114	42	103	96	59	27	184
25	203	87	464	86	389	206	42	89	93	79	28	185
26	112	87	361	98	478	197	42	89	86	92	69	114
27	85	87	149	98	370	111	41	87	71	157	102	37
28	85	88	187	98	242	111	41	87	63	173	101	34
29	120	386	200	116	---	111	41	87	54	91	100	30
30	152	655	200	130	---	111	41	87	54	75	85	31
31	137	---	200	130	---	112	---	87	---	204	49	---
TOTAL	3418	3489	8015	7098	7554	4810	1495	4549	3243	2458	2599	5013
MEAN	110	116	259	229	270	155	49.8	147	108	79.3	83.8	167
MAX	307	655	474	409	992	290	112	372	204	204	379	339
MIN	71	76	132	79	85	111	41	41	46	29	27	30
MEAN†	108	138	243	141	267	161	131	159	101	81.3	80.7	125
CFSM†	.62	.79	1.39	.81	1.53	.92	.75	.91	.58	.46	.46	.71
IN†	.71	.88	1.60	.93	1.59	1.06	.84	1.05	.64	.54	.53	.80

CAL YR 1984 TOTAL 129766 MEAN 355 MAX 2770 MIN 71 MEAN† 362 CFSM† 2.07 IN† 28.09
WTR YR 1985 TOTAL 53741 MEAN 147 MAX 992 MIN 27 MEAN† 144 CFSM† .82 IN† 11.17

† Adjusted for change in contents of Blue Marsh Reservoir.

SCHUYLKILL RIVER BASIN

01470960 TULPEHOCKEN CREEK AT BLUE MARSH DAMSITE NEAR READING, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October 1968 to current year.

PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: October 1968 to current year.

INSTRUMENTATION.--Temperature recorder since October 1968.

REMARKS.--Temperature recorder located at gaging station 1.0 mi (1.6 km) upstream from sampling site.

Interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 34.0°C Oct. 2, 1968; minimum, freezing point on several days during Dec. 1970, Jan., Mar. 1971, Feb. 1975, Feb. 1979.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum, 25.5°C, June 29; minimum, 0.5°C, Jan. 21, 22.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	17.5	17.0	17.0	15.5	15.0	15.0	8.5	8.5	8.5	---	---	---
1	17.5	17.0	17.0	15.5	15.0	15.0	8.5	8.5	8.5	---	---	---
2	17.0	16.5	17.0	15.5	15.0	15.0	8.5	8.0	8.5	---	---	---
3	17.0	16.5	17.0	15.0	15.0	15.0	8.5	8.0	8.0	---	---	---
4	17.0	16.5	16.5	15.0	14.5	15.0	8.0	7.5	8.0	---	---	---
5	16.5	16.0	16.5	15.0	15.0	15.0	7.5	7.5	7.5	---	---	---
6	16.0	15.5	16.0	15.0	14.5	14.5	7.5	7.0	7.5	---	---	---
7	15.5	15.5	15.5	14.5	14.0	14.0	8.0	6.5	7.0	---	---	---
8	15.5	15.5	15.5	14.0	13.5	13.5	6.5	6.5	6.5	---	---	---
9	15.5	15.0	15.5	13.5	13.0	13.5	6.5	6.0	6.0	4.0	3.5	4.0
10	15.5	15.0	15.5	13.5	13.0	13.0	6.5	6.0	6.5	3.5	3.5	3.5
11	15.5	15.0	15.0	13.0	12.0	12.5	6.5	6.5	6.5	3.5	3.5	3.5
12	15.5	14.5	15.0	12.5	12.0	12.0	6.5	6.5	6.5	3.5	3.0	3.0
13	15.0	14.5	15.0	12.0	11.5	12.0	---	---	---	3.0	3.0	3.0
14	15.5	14.5	15.0	11.5	11.0	11.0	---	---	---	3.0	3.0	3.0
15	15.0	15.0	15.0	11.0	11.0	11.0	---	---	---	3.0	2.0	2.5
16	15.5	15.0	15.0	11.5	11.0	11.0	---	---	---	2.0	2.0	2.0
17	15.5	15.0	15.0	11.0	10.5	10.5	---	---	---	2.0	2.0	2.0
18	15.5	15.0	15.0	10.5	10.5	10.5	---	---	---	2.5	2.0	2.0
19	15.5	15.0	15.0	10.5	10.0	10.0	---	---	---	2.5	2.0	2.5
20	15.0	15.0	15.0	10.0	9.5	9.5	---	---	---	2.0	1.0	1.5
21	15.0	14.5	15.0	9.5	9.0	9.0	---	---	---	1.0	.5	1.0
22	15.5	14.5	15.0	9.0	8.5	9.0	---	---	---	1.0	.5	1.0
23	15.5	15.0	15.0	9.0	8.5	8.5	---	---	---	1.5	1.0	1.0
24	15.5	15.5	15.5	9.0	8.5	8.5	---	---	---	2.0	1.5	1.5
25	15.5	15.0	15.5	9.0	8.5	8.5	---	---	---	2.0	1.5	2.0
26	15.5	15.0	15.0	8.5	8.0	8.5	---	---	---	2.0	1.5	1.5
27	15.5	15.0	15.0	8.0	8.0	8.0	---	---	---	2.0	1.5	2.0
28	15.5	15.0	15.0	8.0	8.0	8.0	---	---	---	2.0	2.0	2.0
29	15.5	15.0	15.0	8.5	8.0	8.5	---	---	---	2.0	2.0	2.0
30	15.5	15.0	15.0	8.5	8.0	8.0	---	---	---	2.0	2.0	2.0
31	15.5	15.0	15.5	---	---	---	---	---	---	2.5	2.0	2.0
MONTH	17.5	14.5	15.5	15.5	8.0	11.5	8.5	6.0	7.5	4.0	.5	2.0

SCHUYLKILL RIVER BASIN

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01470960 TULPEHOCKEN CREEK AT BLUE MARSH DAMSITE NEAR READING, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	3.0	2.0	2.5	3.5	3.0	3.0	8.0	7.0	7.5	14.5	14.0	14.5
2	2.5	2.0	2.5	4.0	3.0	3.5	8.0	7.5	7.5	14.5	12.0	13.0
3	2.5	2.0	2.0	4.0	3.0	3.5	7.5	7.0	7.0	13.0	12.0	12.5
4	2.0	2.0	2.0	3.5	3.5	3.5	8.0	6.5	7.5	14.0	12.5	13.0
5	2.0	1.5	2.0	4.0	3.5	3.5	9.0	7.5	8.0	14.5	13.5	14.0
6	2.5	2.0	2.0	4.0	3.5	3.5	9.5	8.5	9.0	14.5	14.0	14.5
7	2.5	2.0	2.0	4.0	3.5	3.5	---	---	---	15.0	14.0	14.5
8	2.0	2.0	2.0	4.5	4.0	4.0	---	---	---	14.5	13.5	14.0
9	2.5	2.0	2.0	5.0	4.0	4.5	---	---	---	14.5	13.0	14.0
10	2.5	2.0	2.5	5.0	4.0	4.5	---	---	---	15.0	13.5	14.5
11	2.5	2.0	2.5	5.0	4.5	4.5	---	---	---	15.5	14.0	14.5
12	3.0	2.5	2.5	5.0	5.0	5.0	---	---	---	16.0	14.5	15.0
13	2.5	2.5	2.5	5.5	5.0	5.0	---	---	---	16.0	14.5	15.0
14	2.5	2.5	2.5	5.5	5.5	5.5	---	---	---	16.5	15.0	15.5
15	2.5	2.5	2.5	5.5	5.5	5.5	---	---	---	15.5	14.0	15.0
16	2.5	2.5	2.5	6.0	5.0	5.5	---	---	---	15.5	15.0	15.5
17	2.5	2.0	2.5	6.5	5.5	6.0	---	---	---	15.5	15.0	15.5
18	2.5	2.0	2.5	6.0	5.5	5.5	---	---	---	17.0	15.0	16.0
19	2.5	2.5	2.5	6.0	5.0	5.5	---	---	---	16.5	15.5	16.0
20	2.5	2.5	2.5	6.5	5.5	6.0	---	---	---	17.0	15.5	16.0
21	2.5	2.5	2.5	6.5	5.5	6.0	---	---	---	17.0	16.0	16.5
22	3.0	2.5	2.5	6.0	5.5	6.0	---	---	---	19.0	16.0	16.5
23	3.0	2.5	3.0	6.0	5.5	5.5	---	---	---	16.5	16.0	16.5
24	3.0	2.5	3.0	6.0	6.0	6.0	---	---	---	17.5	16.0	16.5
25	3.0	3.0	3.0	6.0	5.5	6.0	---	---	---	17.5	16.0	17.0
26	3.0	3.0	3.0	6.5	5.5	6.0	---	---	---	18.5	16.5	17.5
27	3.0	3.0	3.0	7.0	6.0	6.5	---	---	---	19.0	17.0	18.0
28	3.0	3.0	3.0	8.0	7.0	7.0	---	---	---	18.0	17.0	17.5
29	---	---	---	8.5	7.0	8.0	---	---	---	17.5	17.0	17.5
30	---	---	---	8.0	7.5	8.0	---	---	---	19.0	17.0	17.5
31	---	---	---	7.5	7.0	7.5	---	---	---	18.0	17.0	17.5
MONTH	3.0	1.5	2.5	8.5	3.0	5.5	9.5	6.5	8.0	19.0	12.0	15.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	20.0	17.0	18.5	24.0	20.5	22.0	22.0	20.5	23.5	21.5	20.0	20.5
2	19.5	17.5	18.5	22.0	20.5	21.0	21.0	19.5	20.0	22.5	20.5	21.0
3	19.0	18.0	18.5	22.5	20.5	21.5	21.0	19.0	19.5	22.0	19.5	21.0
4	18.5	17.5	18.0	23.0	21.0	21.5	21.0	19.0	20.0	22.0	21.0	21.5
5	18.0	17.5	17.5	22.5	21.0	21.5	24.0	19.0	21.5	22.0	21.0	21.5
6	19.0	17.5	18.0	23.0	20.5	21.5	22.5	18.5	20.5	22.0	21.0	21.5
7	18.5	17.5	18.0	24.0	21.0	22.5	22.0	18.5	20.0	22.5	21.5	22.0
8	18.5	18.0	18.0	22.0	21.0	21.5	21.0	18.5	20.0	22.5	21.5	22.0
9	19.0	18.0	18.5	24.0	21.0	22.0	21.5	20.0	20.5	22.5	21.5	22.0
10	20.0	18.0	19.0	24.0	21.0	22.0	22.0	20.0	20.5	23.5	21.0	22.0
11	19.0	17.5	18.5	23.0	20.0	21.5	21.5	20.0	21.0	23.5	20.0	21.0
12	20.5	17.5	19.0	23.0	20.0	20.5	21.5	20.0	20.5	22.5	19.0	20.5
13	21.5	18.5	20.0	23.0	19.5	21.0	21.5	20.0	20.5	21.0	20.0	20.5
14	21.5	18.0	19.5	23.0	20.0	21.0	21.5	18.0	19.5	20.5	19.5	20.0
15	21.5	18.0	19.5	22.5	20.0	21.0	20.5	18.0	19.0	20.5	19.5	20.0
16	21.0	18.0	19.0	22.0	20.0	21.0	19.0	17.0	18.0	21.0	19.5	20.0
17	20.5	17.5	18.5	22.0	19.5	20.5	19.0	16.5	17.5	21.0	19.5	20.0
18	19.0	17.5	18.0	23.5	19.5	21.0	17.5	17.0	17.0	20.5	19.5	20.5
19	19.5	17.5	18.5	24.0	19.5	21.5	22.5	17.0	19.5	21.0	20.5	20.5
20	19.0	17.5	18.0	24.0	19.0	21.0	22.5	20.5	21.0	21.0	20.5	20.5
21	19.0	17.5	18.0	24.0	19.0	21.0	22.5	19.5	21.0	21.0	20.5	20.5
22	20.5	17.5	18.5	24.5	19.0	21.0	23.5	19.5	20.5	21.0	20.5	20.5
23	20.5	18.0	19.0	22.5	18.5	20.5	23.5	19.0	20.5	20.5	20.0	20.5
24	24.0	18.5	21.0	23.0	20.0	21.0	23.0	19.0	20.5	20.5	20.0	20.0
25	23.5	20.5	22.0	21.0	19.5	20.5	20.5	19.5	20.0	20.5	20.0	20.0
26	24.0	21.5	22.5	21.5	19.5	20.5	21.0	18.5	19.5	20.5	19.0	20.0
27	24.0	22.5	23.0	21.5	20.0	20.5	20.0	18.5	19.0	19.5	18.0	19.0
28	24.0	22.5	23.0	21.5	20.0	20.5	20.5	18.5	19.5	21.0	18.0	19.0
29	25.5	22.5	23.5	21.5	19.5	20.5	20.0	18.5	19.5	22.0	17.0	19.0
30	24.0	22.5	23.0	22.5	19.5	20.5	21.0	19.0	20.0	21.0	17.0	18.0
31	---	---	---	22.0	19.5	20.5	21.5	20.5	20.5	---	---	---
MONTH	25.5	17.0	19.5	24.5	18.5	21.0	24.0	16.5	20.0	23.5	17.0	20.5

SCHUYLKILL RIVER BASIN

01471000 TULPEHOCKEN CREEK NEAR READING, PA

LOCATION.--Lat 40°22'08", long 75°58'46", Berks County, Hydrologic Unit 02040203, on right bank 15 ft upstream from covered bridge, 1 mi downstream from Cacoosing Creek, 2.5 mi upstream from mouth, and 3.5 mi northwest of square at Reading. Water-quality sampling site at covered bridge 15 ft downstream.

DRAINAGE AREA.--211 mi².

PERIOD OF RECORD.--October 1950 to current year. Monthly discharge only for October, November 1950, published in WSP 1722.

REVISED RECORDS.--WSP 1382: 1951-53, 1954(M). WSP 2102: 1965(M). WDR PA-72-1: 1971(M).

GAGE.--Water-stage recorder. Datum of gage is 216.60 ft (66.020 m) above Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 21, 22. Records good, except periods of estimated daily discharge which are fair. Flow regulated since April 1979 by Blue Marsh Reservoir (station 01470870) 3.9 mi upstream. Several observations of water temperature were during the year.

AVERAGE DISCHARGE.--35 years, 310 ft³/s, 19.93 in/yr, adjusted for storage since April 1979.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 17,000 ft³/s June 23, 1972, gage height, 15.65 ft, from flood-mark in gage shelter, from rating curve extended above 3,500 ft³/s on basis of contracted-opening measurement of peak flow; minimum, 23 ft³/s Dec. 1, 1964, gage height, 0.94 ft, result of upstream shutoff.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 1,110 ft³/s Feb. 13, gage height, 3.01 ft; minimum daily, 35 ft³/s Oct. 18.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	150	116	553	253	159	233	146	47	114	89	466	62
2	172	118	544	265	167	180	121	145	110	113	255	61
3	172	118	558	383	165	178	90	457	132	117	160	109
4	136	118	474	483	134	282	77	447	149	115	156	215
5	103	145	304	485	103	345	77	429	240	117	109	208
6	92	175	465	481	116	238	78	401	252	121	57	207
7	91	116	489	476	131	192	77	295	162	124	52	208
8	92	105	314	473	133	164	76	203	163	105	105	210
9	131	102	311	468	130	174	74	200	162	81	116	213
10	176	116	306	464	131	173	66	196	161	81	85	151
11	134	118	303	467	131	210	63	195	161	84	85	42
12	102	116	288	461	389	269	60	193	144	88	100	105
13	89	115	262	458	872	259	57	196	81	89	115	207
14	92	115	262	370	1100	187	58	169	63	88	122	192
15	92	115	262	196	849	188	58	145	60	89	123	194
16	91	115	261	194	298	187	56	125	98	104	113	193
17	144	114	216	163	293	185	53	106	143	124	101	193
18	170	115	183	170	289	185	53	134	202	102	100	246
19	139	117	199	175	337	162	51	117	214	68	85	335
20	92	115	200	172	352	142	50	122	230	54	65	337
21	92	115	203	170	265	140	50	139	203	54	57	343
22	109	115	224	160	245	140	50	149	126	59	38	342
23	283	115	217	151	260	144	48	150	127	82	35	280
24	361	115	399	107	261	145	49	132	122	107	35	188
25	247	115	553	106	422	229	49	111	117	129	54	188
26	148	114	455	121	542	237	49	110	110	162	81	130
27	113	114	205	121	444	137	48	111	88	230	124	366
28	118	121	245	120	289	138	48	112	81	210	121	165
29	166	555	257	135	---	140	48	112	70	110	118	100
30	198	769	256	150	---	140	47	110	70	94	109	81
31	183	---	253	150	---	141	---	110	---	370	64	---
TOTAL	4478	4632	10021	8548	9007	5864	1927	5668	4155	3560	3406	5871
MEAN	144	154	323	276	322	189	64.2	183	139	115	110	196
MAX	361	769	558	485	1100	345	146	457	252	370	466	366
MIN	89	102	183	106	103	137	47	47	60	54	35	42
MEAN†	142	176	307	188	319	195	146	195	132	117	107	154
CFSM†	.67	.83	1.45	.89	1.51	.92	.69	.63	.63	.55	.51	.73
IN†	.78	.93	1.68	1.03	1.57	1.07	.77	1.07	.70	.64	.58	.81

CAL YR 1984 TOTAL 161676 MEAN 442 MAX 2830 MIN 89 MEAN† 449 CFSM† 2.13 IN† 28.90
WTR YR 1985 TOTAL 67137 MEAN 184 MAX 1100 MIN 35 MEAN† 181 CFSM† .86 IN† 11.65

† Adjusted for change in contents in Blue Marsh Reservoir.

SCHUYLKILL RIVER BASIN

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01471510 SCHUYLKILL RIVER AT READING, PA

LOCATION.--Lat 40°19'52", long 75°56'22", Berks County, Hydrologic Unit 02040203, on Penn Avenue Bridge at West Reading, 0.8 mi downstream from Tulpehocken Creek.

DRAINAGE AREA.--880 mi².

PERIOD OF RECORD.--May 1914 to September 1915, October 1919 to September 1930 and June 30, 1977 to current year. Monthly discharge only prior to current year published in WSP 1302. Diversion by Schuylkill Navigation Canal included during the navigation seasons of 1914-15.

REVISED RECORDS.--WDR PA-78-1: 1977.

GAGE.--Nonrecording gage. Datum of gage is 185.50 ft above Pennsylvania Railroad Datum. May 7, 1914 to Sept. 30, 1930, nonrecording gage. June 30, 1977 to July 5, 1979, water-stage recorder at site 1,500 ft downstream at same datum.

REMARKS.--Estimated record during water year: Dec. 22-27, Jan. 11 to Feb. 11. Records fair, except for periods of estimated record which are poor. Flow regulated by Still Creek Reservoir (station 01469200) since February 1933, Blue Marsh Reservoir (station 01470870) since April 1979 and to some extent by Lake Ontelaunee, capacity 518,600,000 ft³. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--20 years (water years 1915, 1920-30, 1978-85), 1,552 ft³/s, 23.95 in/yr, 1914-15 adjusted for diversion.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 37,500 ft³/s Jan. 25, 1979, gage height, 17.36 ft at site 1,500 ft downstream, from rating curve extended above 16,000 ft³/s; minimum observed, 82 ft³/s Aug. 12, 1930, gage height, -1.19 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 23, 1972, reached a stage of about 31.3 ft at site 1,500 ft downstream, present datum, from floodmarks, discharge, about 90,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 8,100 ft³/s, Sept. 27, gage height, 16.09; minimum daily, 238 ft³/s Aug. 24.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	566	497	2250	1460	430	1260	912	388	599	393	2500	335
2	671	488	1800	1560	420	1140	951	694	579	396	967	300
3	653	461	1790	1590	420	1040	843	2790	607	474	605	312
4	567	443	1860	1710	410	1070	844	2780	544	454	517	403
5	502	534	1430	1750	400	1220	800	2210	711	398	441	401
6	495	779	1890	1690	390	1020	801	1870	830	498	359	399
7	475	534	1960	1610	390	841	778	1600	569	458	350	391
8	468	461	1630	1560	390	795	757	1300	536	446	556	424
9	478	425	1540	1390	390	816	720	1150	540	428	555	477
10	539	434	1460	1280	380	760	647	1070	499	388	416	444
11	523	443	1410	1100	390	741	615	1000	475	380	394	378
12	497	434	1360	940	1290	954	613	937	458	337	391	314
13	501	420	1200	880	4890	1150	591	1060	392	317	403	373
14	466	408	1070	810	3360	908	562	931	351	334	394	360
15	437	391	1060	770	2440	855	556	763	394	435	390	348
16	426	391	1050	700	1470	804	567	720	983	390	372	348
17	441	382	980	670	1330	786	572	911	1250	361	350	348
18	464	388	903	650	1240	769	520	1090	955	325	333	381
19	436	402	905	610	1250	698	510	882	823	279	311	470
20	436	403	973	590	1280	666	515	739	759	257	290	470
21	440	376	993	570	1130	654	494	691	642	251	285	472
22	544	374	1610	560	1100	619	472	673	512	293	249	482
23	1740	368	1910	540	1300	645	452	655	497	290	239	468
24	1090	374	1900	530	1660	719	475	641	498	282	238	357
25	780	374	1970	520	1900	804	465	578	448	327	419	357
26	630	374	1600	510	1930	763	461	534	419	481	511	348
27	599	374	1300	490	1740	591	448	509	375	930	473	4050
28	588	439	1420	480	1410	587	422	497	370	721	395	5650
29	657	5350	1480	470	---	631	414	529	439	421	350	2120
30	639	3590	1480	460	---	627	396	490	442	364	360	1300
31	591	---	1380	450	---	599	---	463	---	2250	337	---
TOTAL	18339	21111	45564	28900	35130	25542	18173	31145	17496	14358	14750	23280
MEAN	592	704	1470	932	1255	824	606	1005	583	463	476	776
MAX	1740	5350	2250	1750	4890	1260	951	2790	1250	2250	2500	5650
MIN	426	368	903	450	380	587	396	388	351	251	238	300
CAL YR 1984	TOTAL	777557	MEAN	2124	MAX	17100	MIN	368				
WTR YR 1985	TOTAL	293788	MEAN	805	MAX	5650	MIN	238				

SCHUYLKILL RIVER BASIN

01471980 MANATAWNY CREEK NEAR POTTSTOWN, PA

LOCATION.--Lat 40°16'22", long 75°40'49", Berks County, Hydrologic Unit 02040203, on left bank about 180 ft upstream from bridge on Manatawny Street, 0.7 mi downstream from Ironstone Creek, 2.4 mi northwest of Pottstown, 3.1 mi upstream from mouth, and 4.7 mi southwest of Boyertown.

DRAINAGE AREA.--85.5 mi².

PERIOD OF RECORD.--August 1974 to current year.

GAGE.--Water-stage recorder. Datum of gage is 150.00 ft above National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

REMARKS.--Estimated daily discharges during the water year: Jan. 12 to Feb. 1, Feb. 5-11. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--11 years, 136 ft³/s, 21.65 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 7,290 ft³/s July 7, 1984, gage height, 11.24 ft; minimum, 13 ft³/s Aug. 26, 1981, gage height, 1.65 ft.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of June 22, 1972, reached a stage of 17.1 ft, from floodmarks, discharge, about 9,600 ft³/s.

EXTREMES FOR CURRENT YEAR.--Peak discharge above base of 1,200 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2215	2800	6.79	Sept. 27	1930	*4190	*8.35

Minimum discharge, 20 ft³/s July 24, 25, gage height, 1.73 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	60	62	83	81	84	80	98	34	65	40	286	25
2	137	59	69	171	189	80	74	90	44	37	47	24
3	62	57	103	160	158	74	68	708	45	35	30	24
4	50	53	136	115	127	73	68	211	50	37	26	24
5	45	153	82	148	115	95	65	123	66	30	24	23
6	42	98	270	97	105	79	68	98	72	37	23	22
7	41	67	174	94	96	69	68	92	45	55	23	21
8	41	59	105	89	90	76	61	78	50	43	73	26
9	43	56	90	88	84	74	58	69	53	61	39	58
10	44	55	88	137	80	68	56	66	43	38	27	32
11	42	54	89	119	78	66	55	60	36	31	26	35
12	40	53	82	110	928	130	54	58	35	28	31	26
13	39	49	75	100	527	109	50	67	33	26	28	23
14	38	47	71	94	185	80	49	59	30	26	26	22
15	39	46	82	86	129	75	52	50	33	35	25	22
16	40	48	77	80	111	69	54	52	158	32	24	22
17	40	43	74	74	94	68	56	90	85	25	24	22
18	41	45	72	70	87	65	48	164	55	24	23	22
19	41	57	71	66	91	60	48	76	45	24	24	22
20	47	51	83	62	97	63	49	60	42	24	25	22
21	46	44	91	62	88	60	46	55	38	23	28	22
22	63	47	207	60	96	58	42	66	34	23	24	23
23	121	47	123	58	156	73	41	61	33	24	22	22
24	87	42	97	56	151	81	42	65	33	21	22	24
25	70	41	95	55	124	81	45	52	47	21	89	23
26	61	41	81	54	107	67	44	47	32	55	100	24
27	59	41	82	52	101	62	38	42	30	149	38	2040
28	64	42	96	51	87	62	38	40	37	48	27	376
29	229	256	99	50	---	65	37	43	54	29	25	137
30	92	122	85	49	---	63	36	40	55	26	26	96
31	69	---	77	48	---	66	---	39	---	88	29	---
TOTAL	2024	1935	3109	2636	4365	2291	1608	2855	1478	1195	1284	3304
MEAN	65.3	64.5	100	85.0	156	73.9	53.6	92.1	49.3	38.5	41.4	110
MAX	229	256	270	171	928	130	98	708	158	149	286	2040
MIN	38	41	69	48	78	58	36	34	30	21	22	21
CFSM	.76	.75	1.17	.99	1.82	.86	.63	1.08	.58	.45	.48	1.29
IN.	.88	.84	1.35	1.15	1.90	.00	.70	1.24	.64	.52	.56	1.44

CAL YR 1984	TOTAL	70502	MEAN	193	MAX	3010	MIN	31	CFSM	2.26	IN.	30.67
WTR YR 1985	TOTAL	28084	MEAN	76.9	MAX	2040	MIN	21	CFSM	.90	IN.	12.22

SCHUYLKILL RIVER BASIN

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01472000 SCHUYLKILL RIVER AT POTTSTOWN, PA

LOCATION.--Lat 40°14'30", long 75°39'07", Montgomery County, Hydrologic Unit 02040203, on right bank 75 ft upstream from Hanover Street Bridge in Pottstown and 0.4 mi downstream from Manatawny Creek.

DRAINAGE AREA.--1,147 mi².

PERIOD OF RECORD.--October 1926 to current year. Monthly discharges only for some periods, published in WSP 1302.

GAGE.--Water-stage recorder. Datum of gage is 117.86 ft above National Geodetic Vertical Datum of 1929. October 1926 to Nov. 22, 1928, nonrecording gage and Nov. 23, 1928, to Dec. 26, 1972, recording gage, at site 100 ft downstream at same datum. Dec. 27, 1972, to May 10, 1974, nonrecording gage 1.0 mi downstream at datum 2.83 ft lower.

REMARKS.--Estimated daily discharges during water year: Jan. 11 to Feb. 11. Records good. Flow regulated by Still Creek Reservoir (station 01470870) since April 1979 and to some extent by Lake Ontelaunee, capacity 518,600,000 ft³. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--59 years, 1,898 ft³/s, 22.48 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 95,900 ft³/s June 23, 1972, gage height, 29.97 ft, from floodmark; minimum, 87 ft³/s Aug. 13, 1930, gage height, 0.43 ft; minimum daily, 175 ft³/s Sept. 19, 1932.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum stage known prior to October 1926, 21.0 ft (6.40 m) Feb. 28, 1902, from floodmarks, discharge, 53,900 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 13,900 ft³/s, Sept. 27, gage height, 9.02 ft; minimum daily, 276 ft³/s Aug. 24.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	655	743	2820	1580	540	1670	1180	510	851	564	3120	446
2	932	668	2190	1900	520	1490	1360	799	868	563	1420	363
3	820	647	2030	2000	520	1400	1200	4160	771	592	877	353
4	668	595	2360	1960	520	1330	1180	3710	936	676	701	450
5	580	866	1810	1990	500	1570	1140	2700	897	572	617	495
6	549	1030	2460	1920	500	1450	1130	2300	1200	537	474	476
7	525	833	2600	1820	500	1240	1120	2030	902	838	446	452
8	509	688	1980	1760	500	1170	1040	1680	818	622	877	484
9	501	620	1790	1590	490	1200	1050	1480	808	649	819	615
10	574	616	1670	1460	480	1120	983	1350	754	593	608	627
11	593	635	1600	1300	480	1070	927	1280	699	518	504	498
12	541	603	1510	1100	3140	1320	920	1200	668	466	510	415
13	546	600	1410	1000	6230	1570	897	1270	621	423	499	424
14	523	567	1330	900	4300	1330	858	1270	522	430	507	448
15	484	534	1310	860	3180	1220	842	1030	517	490	472	426
16	486	526	1320	840	2050	1160	844	974	1130	620	438	418
17	486	506	1260	780	1780	1120	870	1170	1670	479	418	417
18	553	501	1150	740	1670	1100	805	1640	1270	451	388	408
19	521	567	1130	700	1600	1050	757	1280	1090	383	380	525
20	528	567	1200	680	1690	988	771	1020	966	346	369	577
21	552	511	1200	660	1540	977	750	943	926	326	375	584
22	546	484	1890	640	1470	939	715	956	751	339	323	593
23	1970	478	2420	620	1730	988	688	924	686	390	287	616
24	1580	471	2220	600	2070	1080	659	955	700	355	276	484
25	1150	473	2360	580	2220	1130	657	848	645	358	618	434
26	898	469	2110	580	2370	1180	636	771	585	700	810	435
27	813	468	1660	560	2190	945	612	726	551	1270	674	7810
28	782	474	1640	560	1840	898	577	718	544	1100	555	7450
29	1390	4200	1670	560	---	937	556	757	638	687	466	2940
30	962	4800	1720	540	---	960	533	750	786	493	419	1880
31	828	---	1620	540	---	934	---	702	---	931	463	---
TOTAL	23045	25740	55440	33320	46620	36536	26257	41903	24770	17761	19710	32546
MEAN	743	858	1788	1075	1665	1179	875	1352	826	573	636	1085
MAX	1970	4800	2820	2000	6230	1670	1360	4160	1670	1270	3120	7810
MIN	484	468	1130	540	480	898	533	510	517	326	276	353

CAL YR 1984 TOTAL 965829 MEAN 2639 MAX 22600 MIN 468
WTR YR 1985 TOTAL 383648 MEAN 1051 MAX 7810 MIN 276

SCHUYLKILL RIVER BASIN

01472157 FRENCH CREEK NEAR PHOENIXVILLE, PA

LOCATION.--Lat 40°09'05", long 75°36'06", Chester County, Hydrologic Unit 02040203, on right bank 70 ft downstream from two-span county bridge on French Creek Road, 4.5 mi northwest of Phoenixville, and 7.3 mi upstream from mouth.

DRAINAGE AREA.--59.1 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--October 1968 to current year.

GAGE.--Water-stage recorder and crest-stage gage. Altitude of gage is 160 ft, from topographic map. Prior to Nov. 7, 1968, nonrecording gage at site 70 ft upstream at same datum.

REMARKS.--Estimated daily discharges during water year: Oct. 1-2, Jan. 10-31, and Feb. 5-11. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--17 years, 92.2 ft³/s, 21.20 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 11,200 ft³/s June 22, 1972, gage height, 13.66 ft, from rating curve extended above 2,500 ft³/s on basis of slope-area measurement of peak flow; minimum daily, 8.9 ft³/s Aug. 25-29, 1981.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 750 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1900	1670	8.02	Sept. 27	1645	*2950	*9.25

Minimum discharge, 13 ft³/s Aug. 7, gage height, 4.06 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	43	37	56	41	77	57	88	22	28	19	18	17
2	84	35	45	67	132	56	57	44	24	19	17	16
3	45	32	50	81	113	51	47	491	23	18	15	16
4	33	29	67	53	88	50	48	160	24	17	14	15
5	29	114	48	56	66	64	44	85	24	17	14	15
6	27	64	171	52	48	53	44	64	25	22	13	15
7	26	44	109	50	37	45	42	58	22	65	13	14
8	26	39	62	53	35	50	39	46	21	22	82	14
9	26	36	53	46	33	50	38	41	25	22	33	18
10	27	36	51	45	32	45	36	38	22	19	23	16
11	27	35	50	44	31	42	35	34	20	19	20	16
12	25	35	46	43	603	68	35	32	20	18	18	14
13	24	32	3	42	497	64	34	38	20	17	16	14
14	24	29	41	41	170	50	33	32	19	16	74	14
15	24	28	47	40	113	45	33	27	19	16	27	13
16	24	29	45	39	87	41	35	27	66	32	18	13
17	24	29	42	38	79	41	34	66	80	18	17	13
18	24	29	40	38	71	38	30	136	31	16	16	13
19	24	39	40	38	75	36	30	52	23	15	17	13
20	27	35	45	37	81	37	29	37	20	15	17	13
21	28	30	43	37	73	37	27	33	21	14	18	13
22	29	29	90	36	89	35	27	57	20	18	21	13
23	105	29	62	36	156	49	26	39	19	18	17	13
24	59	28	48	35	131	60	26	48	19	15	16	15
25	48	29	50	35	97	63	29	34	19	14	38	14
26	37	28	42	35	78	47	28	28	18	19	82	14
27	33	28	41	35	73	41	25	25	18	78	28	1660
28	34	29	43	35	61	40	24	24	19	29	21	376
29	176	198	42	35	---	41	23	29	20	19	18	77
30	61	94	40	35	---	40	23	24	20	17	17	50
31	42	---	38	35	---	40	---	23	---	16	18	---
TOTAL	1265	1308	1690	1333	3226	1476	1069	1894	749	679	777	2537
MEAN	40.8	43.6	54.5	43.0	115	47.6	35.6	61.1	25.0	21.9	25.1	84.6
MAX	176	198	171	81	603	68	88	491	80	78	82	1660
MIN	24	28	38	35	31	35	23	22	18	14	13	13
CFSM	.69	.74	.92	.73	1.95	.81	.60	1.03	.42	.37	.42	1.43
IN.	.80	.82	1.06	.84	2.03	.93	.67	1.19	.47	.43	.49	1.60

CAL YR 1984	TOTAL	48392	MEAN	132	MAX	2230	MIN	21	CFSM	2.23	IN.	30.46
WTR YR 1985	TOTAL	18003	MEAN	49.3	MAX	1660	MIN	13	CFSM	.83	IN.	11.33

SCHUYLKILL RIVER BASIN

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01472157 FRENCH CREEK NEAR PHOENIXVILLE, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--February 1969 to current year.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- IDITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CACO3)	NESS NONCAR- BONATE (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)
OCT 22...	1200	30	148	7.8	25.0	16.0	0.5	10.0	60	14	16	4.8
DATE		SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY WH WAT TOTAL FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)
OCT 22...	6.0	1.9	46	13	9.7	15	103	94	1.1	.030	1.1	
DATE		NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS. (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	IRON, DIS- SOLVED (UG/L AS FE)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	METHY- LENE BLUE ACTIVE SUB- STANCE (MG/L)
OCT 22...	.040	.26	.30	--	<0.01	0.03	0.01	20	42	3	--	

SCHUYLKILL RIVER BASIN

01472198 PERKIOMEN CREEK AT EAST GREENVILLE, PA

Location.--Lat 40°23'38", long 75°30'57", Montgomery County, Hydrologic Unit 02040203, on right bank 100 ft upstream from Church Road Bridge, 0.9 mi upstream of Molasses Creek, and 1 mi southwest of East Greenville.

DRAINAGE AREA.--38.0 mi²

PERIOD OF RECORD.--October 1981 to current year.

GAGE.--Water-stage recorder. Datum of gage is 288.50 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 5 to Feb. 11. Records good except for periods of estimated record which are poor. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 24,900 ft³/s June 25, 1984, gage height, 7.07 ft; minimum, 3.8 ft³/s Sept. 5, 1985, gage height, 1.20 ft; minimum daily, 4.2 ft³/s Aug. 21, 23, 24, 1985.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,000 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1600	1,330	3.78	Sept. 27	0700	2,120	4.14
July 31	2000	1,540	3.89	Sept. 27	1500	*9,520	*5.66

Minimum discharge, 3.8 ft³/s Sept. 5, gage height, 1.20 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	27	27	26	41	15	38	45	18	36	17	102	9.2
2	63	26	24	84	15	37	32	37	23	17	31	8.2
3	28	25	41	67	15	33	29	374	21	19	24	7.1
4	24	24	45	52	15	31	30	95	21	18	22	6.0
5	22	69	29	44	15	52	28	59	44	16	17	5.2
6	22	43	115	36	14	37	34	50	34	17	16	4.9
7	21	31	63	32	14	31	29	44	23	22	15	5.0
8	21	27	43	28	14	37	28	37	25	18	22	6.5
9	23	26	37	25	14	34	26	30	26	21	17	15
10	23	26	36	23	14	29	25	29	22	17	14	17
11	22	25	35	23	14	29	25	28	20	16	11	16
12	21	25	31	22	395	69	24	26	20	15	14	7.7
13	20	23	29	22	194	51	24	39	18	15	9.5	6.7
14	20	22	27	21	73	41	24	27	18	14	8.0	6.2
15	20	22	35	21	56	36	24	24	18	25	6.9	6.0
16	20	22	30	20	46	31	25	24	84	17	6.0	5.7
17	20	21	30	20	41	31	24	96	40	15	5.7	5.7
18	20	21	28	19	39	29	23	109	26	14	4.9	5.2
19	20	24	30	19	42	27	22	47	23	14	4.8	5.2
20	22	22	35	18	44	28	23	34	21	13	4.3	4.6
21	21	21	34	18	40	27	22	29	20	13	4.2	4.8
22	28	21	98	17	48	26	21	35	19	19	4.3	5.3
23	92	21	55	17	88	40	21	29	19	15	4.2	6.4
24	39	21	43	17	78	39	21	30	18	13	4.2	7.5
25	30	21	41	17	65	38	21	26	18	13	10	7.5
26	27	20	33	16	54	29	21	24	17	28	11	8.4
27	26	20	35	16	50	28	20	23	17	84	12	2360
28	25	20	45	16	41	28	19	22	18	22	12	153
29	85	51	55	16	---	28	19	23	23	17	10	73
30	40	32	43	15	---	27	18	20	22	16	9.9	53
31	30	---	37	15	---	28	---	21	---	240	9.9	---
TOTAL	922	799	1288	817	1553	1069	747	1509	754	820	446.8	2832.0
MEAN	29.7	26.6	41.5	26.4	55.5	34.5	24.9	48.7	25.1	26.5	14.4	94.4
MAX	92	69	115	84	395	69	45	374	84	240	102	2360
MIN	20	20	24	15	14	26	18	18	17	13	4.2	4.6
CFSM	.78	.70	1.09	.69	1.46	.91	.66	1.28	.66	.70	.38	2.48
IN.	.90	.78	1.26	.80	1.52	1.05	.73	1.48	.74	.80	.44	2.77

CAL YR 1984 TOTAL 31481 MEAN 86.0 MAX 1820 MIN 19 CFSM 2.26 IN. 30.82
WTR YR 1985 TOTAL 13556.8 MEAN 37.1 MAX 2360 MIN 4.2 CFSM .98 IN. 13.27

SCHUYLKILL RIVER BASIN

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01472199 NORTHWEST BRANCH PERKIOMEN CREEK AT HILLEGASS, PA

Location.--Lat 40°22'26", long 75°31'22", Montgomery County, Hydrologic Unit 02040203, on left bank 0.3 mi downstream of bridge on private road, and 0.5 mi north of Hillegass.

DRAINAGE AREA.--23.0 mi².

PERIOD OF RECORD.--October 1981 to current year.

GAGE.--Water-stage recorder. Datum of gage is 290.00 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharge during water year: Jan. 5 to Feb. 11. Records fair except for periods of estimated record, which are poor.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge 2,690 ft³/s Dec. 28, 1983, gage height, 5.52 ft; minimum, 4.2 ft³/s Sept. 21, 1983, gage height, 1.38 ft; minimum daily, 4.4 ft³/s Sept. 20, 1983.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 800 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1630	*1,930	*5.10	No other peaks greater than base discharge.			

Minimum discharge, 4.3 ft³/s Aug. 23, gage height, 1.39 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	14	16	18	25	8.6	25	31	10	19	8.8	47	6.5
2	38	15	15	59	8.4	25	23	25	12	8.4	13	6.3
3	18	13	26	42	8.4	22	21	254	11	8.3	9.5	6.3
4	13	13	32	31	8.4	22	22	58	11	6.3	8.2	5.9
5	11	43	21	27	8.2	33	20	34	21	7.6	7.8	5.6
6	10	28	80	23	8.2	25	23	29	19	9.7	7.5	5.8
7	9.3	19	42	20	8.2	21	21	27	12	14	7.1	5.5
8	10	16	28	18	8.0	24	19	23	14	11	11	6.5
9	11	15	24	16	8.0	23	18	20	14	14	9.3	12
10	11	15	25	15	8.0	20	16	19	12	9.5	7.6	11
11	11	14	24	14	8.0	19	17	18	10	8.4	7.0	10
12	10	14	22	13	199	52	16	16	10	7.7	8.4	7.1
13	9.7	12	20	12	136	33	15	19	9.4	7.4	7.2	5.8
14	9.6	12	18	12	47	27	15	16	9.2	7.7	6.5	5.5
15	9.5	11	24	11	40	24	16	13	9.2	12	6.2	5.5
16	9.5	12	21	11	35	22	16	14	44	8.6	6.0	5.4
17	9.5	12	21	10	25	22	17	38	21	6.8	6.0	5.4
18	9.7	12	19	10	25	20	14	59	14	6.2	5.8	5.4
19	9.6	14	20	9.8	27	18	14	25	12	6.1	6.2	5.4
20	9.6	13	23	9.6	28	19	15	20	11	5.9	6.8	5.2
21	9.9	11	23	9.4	26	17	14	17	9.8	5.9	7.4	5.2
22	13	11	66	9.2	34	17	13	21	8.9	6.8	6.2	5.2
23	49	11	33	9.2	74	25	13	18	9.0	6.2	5.3	5.7
24	22	11	27	9.0	57	27	12	19	9.1	5.6	5.5	6.0
25	18	11	26	9.0	42	26	13	15	9.6	6.0	19	6.0
26	15	11	22	9.0	34	21	13	13	8.2	18	25	5.5
27	15	10	23	8.8	32	20	12	13	8.2	41	10	961
28	13	10	27	8.8	27	19	11	12	8.9	11	7.6	88
29	56	42	32	8.8	---	19	11	12	11	8.1	6.8	38
30	25	25	25	8.6	---	18	11	11	9.6	7.2	6.9	29
31	19	---	23	8.6	---	19	---	11	---	54	7.2	---
TOTAL	497.9	472	850	486.8	978.4	724	492	899	387.1	346.2	301.0	1281.7
MEAN	16.1	15.7	27.4	15.7	34.9	23.4	16.4	29.0	12.9	11.2	9.71	42.7
MAX	56	43	80	59	199	52	31	254	44	54	47	961
MIN	9.3	10	15	8.6	8.0	17	11	10	8.2	5.6	5.3	5.2
CFSM	.70	.68	1.19	.68	1.52	1.02	.71	1.26	.56	.49	.42	1.86
IN.	.81	.76	1.37	.79	1.58	1.17	.80	1.45	.63	.56	.49	2.07

CAL YR 1984	TOTAL	19730.6	MEAN	53.9	MAX	1030	MIN	9.0	CFSM	2.34	IN.	31.91
WTR YR 1985	TOTAL	7716.1	MEAN	21.1	MAX	961	MIN	5.2	CFSM	.92	IN.	12.48

SCHUYLKILL RIVER BASIN

01472620 EAST BRANCH PERKIOMEN CREEK NEAR DUBLIN, PA

LOCATION.--Lat 40°24'14", long 75°14'05", Bucks County, Hydrologic Unit 02040203, on right bank 40 ft downstream of bridge on Bucks Road, 4.5 miles northeast of Perkasio, and 5 miles southeast of Quakertown.

DRAINAGE AREA.--4.05.

PERIOD OF RECORD.--October 1983 to September 1984.

GAGE.--Water-stage recorder. Datum of gage is 334.124 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 15 to Feb. 11. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 2270 ft³/s, July 7, 1984, gage height 8.41 ft, from slope-area measurement; minimum, no flow many days during July, Aug. and Sept. 1985.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 350 ft³/s and maximum (*): ft;

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1600	753	5.09	Sept. 27	0515	*1280	*6.50

No flow many days during July, Aug. and Sept.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	.20	1.3	1.8	5.6	.46	3.2	4.6	.49	5.5	.17	.49	.06
2	.59	1.2	1.3	20	.44	3.0	2.3	.83	.87	.16	.19	.06
3	.26	.88	6.0	9.0	.43	2.2	1.8	56	.56	.11	.11	.05
4	.17	.83	4.9	5.4	.42	2.0	1.7	11	.43	.09	.08	.05
5	.17	20	2.7	5.6	.40	4.1	1.4	4.3	5.3	.07	.06	.04
6	.14	4.7	39	4.5	.39	2.4	1.4	2.9	2.2	.07	.06	.03
7	.14	2.5	9.1	5.3	.38	1.8	1.1	2.5	.99	.14	.06	.01
8	.14	1.8	4.3	4.5	.37	2.5	1.0	1.7	3.1	.10	.17	.00
9	.18	1.6	3.2	2.3	.36	2.3	.90	1.2	2.0	.11	.13	.03
10	.20	1.5	3.2	1.5	.35	1.8	.77	1.1	1.1	.09	.08	.06
11	.18	1.5	3.0	1.6	.34	1.6	.75	.94	.78	.08	.07	.05
12	.15	1.5	2.5	1.5	177	9.2	.73	.76	.70	.06	.06	.03
13	.13	1.1	2.2	1.3	37	4.6	.62	.68	.53	.07	.05	.01
14	.11	.90	1.9	1.2	17	2.9	.59	.55	.46	.06	.05	.00
15	.11	.83	3.1	1.0	8.0	2.2	.68	.43	.40	.06	.05	.00
16	.09	.80	2.6	.92	5.8	1.7	.66	.42	5.0	.09	.04	.00
17	.09	.75	2.7	.88	5.0	1.7	.51	2.6	1.9	.05	.03	.00
18	.09	.69	2.4	.84	3.8	1.3	.45	7.2	1.1	.04	.01	.00
19	.09	.90	3.1	.80	4.6	1.0	.45	1.8	.86	.02	.00	.00
20	.11	.74	3.8	.76	4.5	1.1	.44	1.0	.63	.00	.00	.00
21	.09	.61	5.5	.73	4.3	.94	.42	.85	.46	.00	.02	.00
22	1.4	.53	24	.70	5.5	.87	.41	1.3	.33	.01	.01	.00
23	4.1	.53	6.2	.66	13	2.6	.38	.93	.30	.00	.00	.00
24	.91	.56	4.1	.64	12	2.5	.36	.88	.29	.00	.00	.00
25	.67	.52	4.2	.61	10	2.2	.39	.68	.27	.00	.13	.00
26	.56	.46	2.6	.58	6.8	1.4	.36	.58	.25	.11	.42	.26
27	.48	.45	2.7	.56	7.0	1.2	.48	.39	.25	1.0	.18	372
28	1.7	.48	7.8	.54	4.0	1.1	.59	.36	.20	.67	.12	9.8
29	14	5.0	11	.52	---	1.1	.52	.35	.26	.09	.08	3.6
30	2.5	2.5	5.2	.49	---	.97	.49	.28	.22	.07	.07	2.5
31	1.6	---	4.0	.47	---	1.0	---	.25	---	.38	.08	---
TOTAL	31.35	57.66	180.1	81.00	329.64	68.48	27.25	105.25	37.24	3.97	2.90	388.64
MEAN	1.01	1.92	5.81	2.61	11.8	2.21	.91	3.40	1.24	.13	.09	13.0
MAX	14	20	39	20	177	9.2	4.6	56	5.5	1.0	.49	372
MIN	.09	.45	1.3	.47	.34	.87	.36	.25	.20	.00	.00	.00

CAL YR 1984 TOTAL 3434.88 MEAN 9.38 MAX 313 MIN .03
WTR YR 1985 TOTAL 1313.48 MEAN 3.60 MAX 372 MIN .00

SCHUYLKILL RIVER BASIN

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01473000 PERKIOMEN CREEK AT GRATERFORD, PA

LOCATION.--Lat 40°13'46", long 75°27'07", Montgomery County, Hydrologic Unit 02040203, on left bank 1,650 ft upstream from highway bridge at Graterford, 0.5 mi upstream from Landis Brook and 2.5 mi north of Collegeville.

DRAINAGE AREA.--279 mi².

PERIOD OF RECORD.--June 1914 to current year. Monthly discharge only for some periods, published in WSP 1302. Prior to October 1950, published as "at Graters Ford."

REVISED RECORDS.--WSP 756: Drainage area. WSP 1171: 1935(M). WSP 1302: 1915-16, 1927-29. WSP 1382: 1932-33, 1935, 1937, 1942, 1947, 1948(M), 1949(P), 1950(M), 1951-52(P).

GAGE.--Water-stage recorder. Datum of gage is 112.66 ft above National Geodetic Vertical Datum of 1929. June 1914 to Sept. 6, 1921, nonrecording gage at site 1,650 ft downstream at datum 3.29 ft lower. Sept. 7, 1921, to Sept. 13, 1927, nonrecording gage at present site and datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 10 to Feb. 1, Feb. 6-11. Records good except for periods of estimated record, which are poor. Some regulation by Green Lane Reservoir (station 01472200) 10.5 mi upstream since December 21, 1956.

AVERAGE DISCHARGE.--71 years, 390 ft³/s, 19.00 in/yr, adjusted for storage since December 1956.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 39,900 ft³/s July 9, 1935, gage height, 18.26 ft, from rating curve extended above 12,000 ft³/s on basis of slope-area measurement at gage height 16.23 ft; minimum, 4.7 ft³/s Oct. 5, 1941; minimum daily, 5.6 ft³/s Oct. 5, 1941.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 21,200 ft³/s Sept. 27, gage height, 13.19 ft; minimum daily, 42 ft³/s July 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	68	149	161	268	120	263	202	76	94	66	413	70
2	161	149	133	599	225	236	243	87	118	59	134	61
3	166	118	122	684	252	204	192	2820	94	57	80	50
4	105	100	252	369	213	185	174	1360	82	53	67	53
5	81	633	209	353	197	229	168	499	84	50	62	54
6	68	410	1170	289	170	277	166	277	135	53	61	56
7	59	219	826	273	150	208	177	223	113	74	59	55
8	52	168	346	286	140	210	163	176	96	78	132	58
9	52	152	241	199	135	218	148	138	104	109	99	66
10	57	141	212	190	130	187	138	124	93	84	66	79
11	71	132	215	180	120	170	133	117	85	66	54	67
12	68	127	211	170	3260	285	130	109	80	58	48	60
13	63	114	198	160	3140	414	124	114	78	53	47	52
14	71	105	178	150	924	228	118	118	74	50	47	52
15	66	95	174	140	517	188	116	101	70	55	50	50
16	63	89	186	140	328	153	119	92	196	67	45	50
17	62	90	186	130	255	143	117	116	278	62	42	50
18	66	87	159	130	217	140	110	442	181	54	44	50
19	64	92	152	120	224	122	102	233	123	47	44	50
20	67	94	166	120	259	118	99	157	103	43	45	53
21	66	88	178	115	233	119	97	132	93	41	48	52
22	67	84	713	110	231	110	98	136	79	64	55	53
23	326	81	475	105	492	125	94	137	74	58	54	53
24	182	79	285	105	716	186	94	130	67	47	51	52
25	142	79	267	100	617	185	98	114	89	45	94	49
26	110	78	214	98	443	170	90	97	78	60	237	51
27	102	78	197	96	399	146	84	88	64	164	120	11900
28	94	75	265	94	320	136	80	82	60	145	80	2130
29	773	147	415	92	---	136	77	83	63	81	71	537
30	295	207	396	90	---	133	78	77	66	64	69	312
31	186	---	313	88	---	129	---	75	---	89	79	---
TOTAL	3873	4260	9215	6043	14427	5753	3829	8530	3014	2096	2597	16325
MEAN	125	142	297	195	515	186	128	275	100	67.6	83.8	544
MAX	773	633	1170	684	3260	414	243	2830	278	164	413	11900
MIN	52	75	122	88	120	110	77	75	60	41	42	49
MEAN†	127	142	298	193	518	185	125	277	95	57.7	90.8	555
CFSM†	.46	.51	1.07	.69	1.86	.66	.45	.99	.34	.21	.33	1.99
IN†	.53	.57	1.23	.80	1.93	.76	.50	1.14	.38	.24	.38	2.22

CAL YR 1984 TOTAL 225037 MEAN 615 MAX 14800 MIN 50 MEAN† 615 CFSM† 2.20 IN† 29.93
WTR YR 1985 TOTAL 79962 MEAN 219 MAX 11900 MIN 41 MEAN† 219 CFSM† .78 IN† 10.66

† Adjusted for change in contents in Green Lan Reservoir.

SCHUYLKILL RIVER BASIN

01473120 SKIPPACK CREEK NEAR COLLEGEVILLE, PA

LOCATION.--Lat 40°09'52", long 75°26'01", Montgomery County, Hydrologic Unit 02040203, on right bank 60 ft downstream from two-span highway bridge, 1.5 mi upstream from mouth, and 2 mi southeast of Collegeville.

DRAINAGE AREA.--53.7 mi².

PERIOD OF RECORD.--April 1966 to current year.

GAGE.--Water-stage recorder. Datum of gage is 99.03 ft above National Geodetic Vertical Datum of 1929. Prior to June 15, 1967, nonrecording gage at site 60 ft upstream at same datum.

REMARKS.--Estimated daily discharges during water: Jan. 10-31, and Feb. 6-9. Records fair except for periods of missing record which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--19 years, 78.7 ft³/s, 19.90 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 40,400 ft³/s Sept. 13, 1971, gage height, 22.5 ft, from floodmark, from rating curve extended above 8,400 ft³/s on basis of slope-area measurement of peak flow; minimum, 0.1 ft³/s Sept. 12, 13, 1966; minimum gage height, 0.79 ft Oct. 3, 1968, July 31, 1977.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 2,000 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1700	*7880	*10.62	Sept. 27	1445	7130	10.17
May 3	0715	3850	7.81				

Minimum daily discharge, 3.4 ft³/s July 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	14	13	16	28	32	31	63	8.0	30	6.6	171	6.9
2	35	13	15	48	126	30	34	14	12	6.4	14	5.3
3	17	12	15	49	79	25	28	1630	9.1	5.9	9.0	5.2
4	12	11	25	39	56	24	26	157	8.7	5.4	7.0	5.2
5	11	138	18	40	43	32	24	62	12	5.2	6.5	5.1
6	9.5	35	238	37	38	26	23	47	13	4.9	6.0	5.0
7	8.6	22	65	37	32	22	22	39	8.6	10	5.4	4.8
8	8.2	18	39	39	27	24	20	28	9.2	7.7	74	5.4
9	8.7	17	31	31	23	24	19	23	11	18	26	6.7
10	8.9	15	27	29	21	21	18	20	8.6	8.5	11	12
11	8.2	14	26	27	20	20	17	17	7.5	6.7	8.3	6.3
12	7.6	15	23	26	2050	32	16	15	7.5	6.1	6.9	5.4
13	7.5	13	22	25	469	31	15	15	6.7	5.6	6.6	5.1
14	7.0	13	20	24	93	25	14	13	7.0	5.0	5.9	5.0
15	7.0	12	22	22	62	23	14	11	6.1	6.0	5.8	4.7
16	7.0	12	21	22	48	20	15	10	20	8.3	5.4	4.6
17	7.0	12	20	21	39	21	14	130	14	7.6	5.3	4.6
18	6.8	11	20	20	35	19	13	219	10	6.2	4.9	4.8
19	6.9	13	20	19	34	17	13	30	7.9	5.2	4.8	4.7
20	7.0	13	23	19	33	17	13	16	7.7	4.9	5.1	4.6
21	6.9	12	21	18	29	16	12	15	8.4	3.4	5.8	4.9
22	6.7	12	71	17	31	15	12	16	7.7	7.5	7.0	4.7
23	21	10	42	17	44	21	12	14	6.0	9.2	5.5	4.4
24	12	11	34	16	53	25	12	16	5.8	5.3	5.0	4.6
25	11	11	34	16	50	21	12	12	6.8	4.9	15	5.0
26	8.2	10	27	15	43	18	11	10	6.4	6.2	26	5.2
27	8.1	9.7	28	15	41	17	9.9	9.0	5.7	26	9.4	2690
28	7.5	10	35	15	34	17	9.2	8.7	5.5	16	7.0	115
29	79	31	32	14	---	17	8.5	8.9	6.6	7.4	6.2	35
30	21	22	29	14	---	16	8.2	8.2	7.7	6.5	5.9	22
31	15	---	26	14	---	17	---	8.0	---	6.5	12	---
TOTAL	401.3	560.7	1085	773	3685	684	527.8	2629.8	283.2	239.1	493.7	3002.2
MEAN	12.9	18.7	35.0	24.9	132	22.1	17.6	84.8	9.44	7.71	15.9	100
MAX	79	138	238	49	2050	32	63	1630	30	26	171	2690
MIN	6.7	9.7	15	14	20	15	8.2	8.0	5.5	3.4	4.8	4.4
CFSM	.24	.35	.65	.46	2.46	.41	.33	1.58	.18	.14	.30	1.86
IN.	.28	.39	.75	.54	2.55	.47	.37	1.82	.20	.17	.34	2.08

CAL YR 1984 TOTAL 37328.9 MEAN 102 MAX 2910 MIN 6.1 CFSM 1.90 IN. 25.86
WTR YR 1985 TOTAL 14364.8 MEAN 39.4 MAX 2690 MIN 3.4 CFSM .73 IN. 9.95

SCHUYLKILL RIVER BASIN

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01473169 VALLEY CREEK AT PENNSYLVANIA TURNPIKE BRIDGE NEAR VALLEY FORGE, PA.

LOCATION.--Lat 40°04'45", long 75°27'40", Chester County, Hydrologic Unit 02040202, on right bank, 100 ft. upstream of Pennsylvania turnpike bridge, 0.9 miles downstream of confluence with Little Valley Creek, near Valley Forge.

DRAINAGE AREA.--20.8 mi².

PERIOD OF RECORD.--October 1982 to current year.

GAGE.--Water-stage recorder. Datum of gage is 108.62 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 16-24, Feb. 4-9, June 1-7. Records good, except periods of estimated daily discharges which are fair. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 1,210 ft³/s Sept. 27, 1985, gage height, 8.21 ft, minimum daily, 12 ft³/s Oct. 5, 6, 10, 11, 17, 18, 1983, Sept. 14, 1985.

EXTREMES FOR CURRENT YEAR.--Peak discharges greater than base discharge of 600 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1515	1,110	7.96	Sept. 27	0230	914	7.51
Aug. 14	0230	922	7.53	Sept. 27	1300	*1,210	*8.21

Minimum daily discharge, 12 ft³/s Sept. 14.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	41	23	19	18	23	18	37	16	22	15	23	15
2	40	23	19	19	24	18	20	23	17	15	16	15
3	25	21	23	18	18	18	20	164	15	14	15	15
4	23	21	20	18	18	18	19	29	15	17	15	15
5	23	81	19	18	17	21	18	22	16	15	14	14
6	21	23	59	17	17	18	19	21	16	15	14	14
7	24	21	24	19	16	18	18	20	16	15	14	13
8	23	20	21	19	16	18	18	19	17	14	114	15
9	23	20	20	18	16	17	18	18	16	15	24	14
10	22	20	20	17	15	17	17	18	15	15	21	14
11	22	20	20	17	16	17	18	17	15	14	16	14
12	23	19	19	17	324	21	17	17	15	14	15	15
13	24	19	19	17	45	17	17	17	15	14	15	14
14	25	18	19	17	26	16	17	16	15	13	114	12
15	25	18	19	17	24	16	18	16	15	15	18	14
16	25	20	18	17	22	16	18	16	38	26	16	15
17	26	18	19	16	21	16	17	56	27	14	16	15
18	26	19	18	16	21	16	17	36	16	14	16	14
19	26	20	19	16	20	16	15	20	16	13	16	14
20	30	20	18	16	19	16	16	18	16	13	16	13
21	28	20	20	15	19	16	20	18	16	13	17	14
22	30	18	23	15	19	16	16	18	15	16	16	14
23	36	18	19	15	19	19	16	21	15	14	15	14
24	31	18	19	15	19	17	17	18	15	13	15	14
25	30	18	19	15	20	18	18	17	14	14	37	14
26	28	18	18	15	21	22	17	16	14	44	25	20
27	24	19	19	15	18	22	16	16	14	53	16	684
28	26	20	18	16	19	21	16	29	15	16	15	37
29	51	47	18	17	---	20	16	21	18	15	15	25
30	25	22	18	17	---	17	16	17	18	15	15	24
31	23	---	18	18	---	19	---	17	---	61	15	---
TOTAL	849	682	641	520	872	555	542	787	507	574	729	1144
MEAN	27.4	22.7	20.7	16.8	31.1	17.9	18.1	25.4	16.9	18.5	23.5	38.1
MAX	51	81	59	19	324	22	37	164	38	61	114	684
MIN	21	18	18	15	15	16	15	16	14	13	14	12
CFSM	1.32	1.09	.00	.81	1.50	.86	.87	1.22	.81	.89	1.13	1.83
IN.	1.52	1.22	1.15	.93	1.56	.99	.97	1.41	.91	1.03	1.30	2.05
CAL YR 1984	TOTAL	15965	MEAN	43.6	MAX	391	MIN	18	CFSM	2.10	IN.	28.55
WTR YR 1985	TOTAL	8402	MEAN	23.3	MAX	684	MIN	12	CFSM	1.12	IN.	15.03

SCHUYLKILL RIVER BASIN

01473800 SCHUYLKILL RIVER AT MANAYUNK, PHILADELPHIA, PA

LOCATION.--Lat 40°01'41", long 75°13'44", Philadelphia County, Hydrologic Unit 02040203, at Green Lane Avenue Bridge, 5.5 mi upstream from gaging station at Fairmount Dam, and 14.2 mi upstream from mouth.

DRAINAGE AREA.--1,830 mi², at Fairmount Dam.

PERIOD OF RECORD.--November 1947 to January 1982. July to current year.

PERIOD OF DAILY RECORD.--

SUSPENDED SEDIMENT DISCHARGE: November 1947 to January 1982. July to current year.

REMARKS.--Mean water discharges given are for station 01474500 Schuylkill River at Philadelphia (Fairmount Dam).

Daily records do not include water diverted by the city of Philadelphia for municipal water supply. Unpublished records of temperature of sediment samples available in the district office.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SEDIMENT CONCENTRATION: Maximum daily mean, 4,910 mg/L Dec. 30, 1948; minimum daily mean, 1 mg/L on many days.

SEDIMENT DISCHARGE: Maximum daily, 650,000 tons (estimated) Aug. 19, 1955; minimum daily, less than 0.05 ton Sept. 2, 1966.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	TEMPER- ATURE (DEG C)	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SEDI- MENT, SUS- PENDE (MG/L)	SEDI- MENT, DIS- CHARGE, SUS- PENDE (T/DAY)	SED. SUSP. FALL DIAM. % FINER THAN .004 MM	SED. SUSP. FALL DIAM. % FINER THAN .008 MM
MAY 1984							
30...	1035	16.0	50400	393	53500	46	59
JUL							
02...	1035	21.0	10500	201	5690	70	83
FEB 1985							
13...	0945	20.0	14800	271	10800	31	47
MAY							
04...	0505	12.0	8940	110	2660	60	72
		SED. SUSP. FALL DIAM. % FINER THAN .016 MM	SED. SUSP. FALL DIAM. % FINER THAN .031 MM	SED. SUSP. SIEVE DIAM. % FINER THAN .062 MM	SED. SUSP. SIEVE DIAM. % FINER THAN .125 MM	SED. SUSP. SIEVE DIAM. % FINER THAN .250 MM	SED. SUSP. SIEVE DIAM. % FINER THAN 1.00 MM
MAY 1984							
30...	69	77	83	87	92	97	99
JUL							
02...	92	97	98	98	99	99	100
FEB 1985							
13...	74	90	98	98	99	100	--
MAY							
04...	82	92	98	98	99	100	--

01473800 SCHUYLKILL RIVER AT MANAYUNK, PHILADELPHIA, PA--Continued

SEDIMENT DISCHARGE, SUSPENDED (TONS/DAY), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) OCTOBER	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) NOVEMBER	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) DECEMBER	SEDIMENT DISCHARGE (TONS/DAY)
1	1150	10	31	1250	13	44	4070	37	407
2	1420	9	35	1120	22	67	2930	20	158
3	1470	7	28	1040	26	73	2550	15	103
4	1150	7	22	956	18	46	2870	10	77
5	901	4	9.7	2100	12	68	2770	7	52
6	839	3	6.8	2220	16	96	4010	15	162
7	784	4	8.5	1700	14	64	4850	35	458
8	774	6	13	1290	12	42	3260	21	185
9	784	4	8.5	1120	8	24	2590	12	84
10	729	3	5.9	1010	6	16	2360	9	57
11	800	2	4.3	1040	4	11	2220	8	48
12	742	3	6.0	1020	3	8.3	2090	8	45
13	694	3	5.6	994	2	5.4	1970	10	53
14	703	3	5.7	903	2	4.9	1840	9	45
15	748	7	14	897	1	2.4	1830	12	59
16	680	23	42	853	3	6.9	1830	11	54
17	697	25	47	820	3	6.6	1790	11	53
18	696	22	41	818	3	6.6	1710	8	37
19	718	13	25	897	3	7.3	1630	6	26
20	761	23	47	916	4	9.9	1660	10	45
21	764	45	93	882	5	12	1740	11	52
22	822	34	75	822	4	8.9	2470	7	47
23	1500	20	81	787	6	13	3570	13	125
24	2750	17	126	722	3	5.8	3130	12	101
25	1950	14	74	746	2	4.0	3000	17	138
26	1460	17	67	775	3	6.3	2920	16	126
27	1190	6	19	742	4	8.0	2510	19	129
28	1130	7	21	727	7	14	2190	16	95
29	2610	8	56	1700	23	261	2340	15	95
30	2180	5	29	6680	124	2250	2410	13	85
31	1520	5	21	---	---	---	2320	15	94
TOTAL	35116	---	1068.0	37547	---	3192.3	79430	---	3295#214
DAY	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) JANUARY	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) FEBRUARY	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) MARCH	SEDIMENT DISCHARGE (TONS/DAY)
1	2180	17	100	1120	2	6.0	2350	5	32
2	2320	16	100	1490	2	8.0	2160	4	23
3	3650	19	187	1340	4	14	1950	5	26
4	2920	16	126	1130	3	9.2	1850	4	20
5	2890	15	117	959	3	7.8	1980	3	16
6	2840	18	138	870	4	9.4	2140	4	23
7	2620	17	120	820	3	6.6	1830	5	25
8	2580	22	153	780	3	6.3	1630	6	26
9	2340	20	126	776	3	6.3	1660	4	18
10	1980	7	37	820	4	8.9	1610	4	17
11	1920	3	16	952	3	7.7	1500	5	20
12	1910	3	15	7060	238	14900	1650	5	22
13	1920	2	10	15000	421	20400	2340	12	76
14	1850	3	15	7130	120	2310	2120	7	40
15	1770	3	14	4720	24	306	1830	6	30
16	1340	4	14	3570	12	116	1690	7	32
17	1200	3	9.7	2600	8	56	1630	5	22
18	1310	3	11	2370	8	51	1590	6	26
19	1470	3	12	2280	10	62	1510	5	20
20	1250	3	10	2300	7	43	1410	7	27
21	674	4	7.3	2270	7	43	1330	7	25
22	640	4	6.9	2050	7	39	1290	6	21
23	620	4	6.7	2370	7	45	1410	5	19
24	1130	2	6.1	3160	6	51	1600	7	30
25	1100	3	8.9	3350	7	63	1690	8	37
26	1000	2	5.4	3300	7	62	1650	6	27
27	967	2	5.2	3140	7	59	1540	6	25
28	930	3	7.5	2780	6	45	1330	4	14
29	900	3	7.3	---	---	---	1290	5	17
30	890	2	4.8	---	---	---	1300	6	21
31	880	2	4.8	---	---	---	1340	7	25
TOTAL	51991	---	1401.6	80507	---	38741.2	52200	---	802#214

01473800 SCHUYLKILL RIVER AT MANAYUNK, PHILADELPHIA, PA--Continued

SEDIMENT DISCHARGE, SUSPENDED (TONS/DAY), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MEAN DISCHARGE (CFS) APRIL	MEAN CONCEN- TRATION (MG/L)	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS) MAY	MEAN CONCEN- TRATION (MG/L)	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS) JUNE	MEAN CONCEN- TRATION (MG/L)	SEDIMENT DISCHARGE (TONS/DAY)
1	1980	8	43	717	7	14	1020	8	22
2	2070	8	45	804	10	22	1130	10	31
3	1880	7	36	7760	103	1330	1040	11	31
4	1710	7	32	7490	74	865	979	6	16
5	1600	8	35	4300	22	255	1020	7	19
6	1560	9	38	3340	18	162	1200	12	39
7	1600	8	35	2920	10	79	1340	14	51
8	1530	7	29	2460	8	53	1080	13	38
9	1460	6	24	2030	6	33	1080	9	26
10	1410	7	27	1820	6	29	1000	9	24
11	1350	6	22	1710	3	14	854	8	18
12	1280	6	21	1590	5	21	793	12	26
13	1230	6	20	1580	8	34	734	11	22
14	1170	8	25	1640	8	35	638	4	6.9
15	1180	12	38	1430	9	35	554	4	6.0
16	1160	13	41	1250	11	37	1030	5	14
17	1130	20	61	1570	11	47	2160	7	41
18	1120	27	82	3010	22	179	1960	7	37
19	1020	16	44	2210	10	60	1610	12	52
20	978	14	37	1610	4	17	1470	10	40
21	982	17	45	1330	3	11	1480	8	32
22	1010	18	49	1300	4	14	1220	7	23
23	930	21	53	1350	4	15	1070	5	14
24	903	20	49	1360	7	26	1060	7	20
25	905	13	32	1270	8	27	980	8	21
26	859	12	28	1110	6	18	931	7	18
27	804	7	15	1010	3	8.2	875	9	21
28	783	17	36	1020	3	8.3	817	7	15
29	768	35	73	1030	2	5.6	929	7	18
30	736	23	46	957	3	7.8	1180	7	22
31	---	---	---	856	8	18	---	---	---
TOTAL	37098	---	1161	63834	---	3479.9	33234	---	763.9#214
DAY	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) JULY	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) AUGUST	SEDIMENT DISCHARGE (TONS/DAY)	MEAN DISCHARGE (CFS)	MEAN CONCEN- TRATION (MG/L) SEPTEMBER	SEDIMENT DISCHARGE (TONS/DAY)
1	1150	10	31	3310	42	384	724	5	9.8
2	906	6	15	2500	13	88	668	4	7.2
3	855	7	16	1520	9	37	591	5	8.0
4	892	7	17	1120	8	24	532	5	7.2
5	976	7	18	997	7	19	604	3	4.9
6	892	7	17	840	4	9.1	582	3	4.7
7	1050	6	17	760	9	17	624	3	5.1
8	1230	7	23	2330	27	166	664	2	3.6
9	1080	9	26	1480	14	56	865	2	4.7
10	1060	6	17	1220	7	23	965	3	7.8
11	915	7	17	924	6	15	872	4	9.4
12	725	9	18	772	7	15	717	3	5.8
13	708	7	13	719	8	16	626	4	6.8
14	600	6	9.7	1240	10	33	632	3	5.1
15	686	6	11	799	6	13	647	3	5.2
16	1050	7	20	589	4	6.4	649	4	7.0
17	898	8	19	489	3	4.0	658	5	8.9
18	659	7	12	562	4	6.1	599	3	4.9
19	547	5	7.4	610	7	12	616	3	5.0
20	431	7	8.1	588	4	6.4	749	3	6.1
21	406	8	8.8	663	4	7.2	832	2	4.5
22	614	11	18	656	6	11	820	2	4.4
23	531	7	10	509	3	4.1	887	1	2.4
24	475	6	7.7	433	3	3.5	892	3	7.2
25	493	7	9.3	1030	22	61	737	3	6.0
26	894	7	17	1810	20	98	841	18	46
27	1540	8	33	1310	7	25	20900	692	61900
28	1790	9	43	972	6	16	19600	247	26400
29	1310	7	25	776	4	8.4	5390	26	378
30	899	6	15	673	3	5.5	3060	9	74
31	1250	8	27	638	6	10	---	---	---
TOTAL	27512	---	546.0	32839	---	1199.7	67543	---	88949.7

SCHUYLKILL RIVER BASIN

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01474000 WISSAHICKON CREEK AT MOUTH, PHILADELPHIA, PA

LOCATION.--Lat 40°00'54", long 75°12'24", Philadelphia County, Hydrologic Unit 02040203, on left bank 100 ft upstream from dam at Ridge Ave., 750 ft upstream from mouth, 1,000 ft northwest of Gustine Lake in Philadelphia.

DRAINAGE AREA.--64.0 mi².

PERIOD OF RECORD.--June 1897 to September 1903, January 1905 to July 1906, October 1965 to current year. Records for 1971-74 published in WDR PA-81-1. Prior to October 1965 published as "near Philadelphia."

REVISED RECORDS.--WSP 1302: 1905.

GAGE.--Water-stage recorder, concrete control, and crest-stage gage. Datum of gage is 26.41 ft above National Geodetic Vertical Datum of 1929. Prior to October 1965, water-stage recorder at about same site and datum.

REMARKS.--Estimated daily discharges during water year: Jan. 10-24, 26, 27, Feb. 5-9. Records good, except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--21 years, 102 ft³/s, 21.72 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 6,870 ft³/s June 29, 1973, gage height, 7.92 ft; minimum daily observed, 2.0 ft³/s July 18, 19, 1905.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 2,000 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2130	3190	5.65	Sept. 27	1030	*4390	*6.55
July 31	1745	2110	4.74				

Minimum discharge, 16 ft³/s Aug. 6, gage height, 1.70 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	70	30	32	41	80	41	141	34	74	25	144	25
2	90	31	29	53	88	43	54	42	43	23	37	21
3	44	27	40	52	47	43	46	744	31	23	24	21
4	35	27	52	41	40	42	45	93	33	24	21	20
5	33	158	38	49	36	60	40	57	34	37	19	21
6	31	54	225	45	35	45	39	47	36	24	19	21
7	33	38	70	40	34	41	38	52	31	22	29	20
8	33	33	44	45	33	44	35	44	36	22	475	24
9	35	32	40	39	32	44	40	40	39	38	54	28
10	33	29	37	35	32	38	40	38	28	29	37	62
11	31	29	40	33	32	34	38	34	28	27	33	35
12	31	28	39	31	1080	52	41	34	27	24	27	28
13	28	29	38	30	317	53	36	33	28	20	24	25
14	29	28	36	29	74	40	34	35	26	18	52	26
15	29	28	37	29	55	37	34	33	24	20	25	29
16	30	29	34	28	47	33	42	33	84	56	24	26
17	31	26	31	28	43	33	39	118	79	29	21	24
18	30	27	35	27	41	31	36	187	38	23	20	22
19	30	37	39	27	42	32	35	53	30	20	21	23
20	29	32	43	26	41	32	35	39	28	20	22	23
21	32	30	43	26	41	34	33	40	29	21	30	25
22	32	29	71	25	40	33	33	57	25	50	31	25
23	54	30	46	25	43	58	37	54	21	27	21	26
24	63	29	40	32	47	49	43	55	21	20	20	28
25	47	31	42	34	45	44	41	36	22	20	155	26
26	37	30	36	32	43	40	38	31	24	110	198	166
27	31	29	38	30	43	38	33	30	25	94	46	3320
28	32	31	43	29	41	37	31	49	24	40	29	193
29	103	81	40	29	---	39	30	51	30	25	25	71
30	42	47	37	29	---	35	33	34	46	22	24	56
31	33	---	33	31	---	36	---	32	---	265	24	---
TOTAL	1241	1119	1448	1050	2572	1261	1240	2259	1044	1218	1731	4460
MEAN	40.0	37.3	46.7	33.9	91.9	40.7	41.3	72.9	34.8	39.3	55.8	149
MAX	103	158	225	53	1080	60	141	744	84	265	475	3320
MIN	28	26	29	25	32	31	30	30	21	16	19	20
CFSM	.62	.58	.73	.53	1.44	.64	.65	1.14	.54	.61	.87	2.33
IN.	.72	.65	.84	.61	1.49	.73	.72	1.31	.61	.71	1.01	2.59

CAL YR 1984	TOTAL	41808	MEAN	114	MAX	2390	MIN	26	CFSM	1.78	IN.	24.30
WTR YR 1985	TOTAL	20643	MEAN	56.6	MAX	3320	MIN	18	CFSM	.88	IN.	12.00

SCHUYLKILL RIVER BASIN

01474500 SCHUYLKILL RIVER AT PHILADELPHIA, PA
(National stream-quality accounting network station)

LOCATION.--Lat 39°58'00", long 75°11'20", Philadelphia County, Hydrologic Unit 02040203, on right bank 150 ft (46 m) upstream from Fairmount Dam, 1,500 ft upstream from Spring Garden Street Bridge, in Philadelphia, and 8.7 mi upstream from mouth. Water-quality sampling site 1.6 mi upstream.

DRAINAGE AREA.--1,893 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--September 1931 to current year. Records for January 1898 to December 1912, published in WSP 35, 48, 65, 82, 97, 125, 166, 202, 214, 261, 301, 381 have been found to be unreliable and should not be used.

REVISED RECORDS.--WSP 756: Drainage area. WSP 1302: 1936(M). WSP 1432: 1945. See also PERIOD OF RECORD.

GAGE.--Water-stage recorder and concrete control. Datum of gage is 5.74 ft above National Geodetic Vertical Datum of 1929. Prior to Nov. 25, 1956, water-stage recorder at site on right bank just upstream from Fairmount Dam at same datum. Nov. 26, 1956, to Oct. 6, 1966, water-stage recorder at site on left bank 40 ft (12 m) upstream from Fairmount Dam at same datum.

REMARKS.--Estimated daily discharges during water year: Jan. 22, 23, 28, 31, Feb. 7, 8. Records good. Flow regulated by Still Creek Reservoir (station 01469200) since February 1933, Blue Marsh Reservoir (station 01470870) since April 1979, Green Lane Reservoir (station 01472200) since December 1956 and to some extent by Lake Ontelaunee, capacity 518,600,000 ft³. Records of discharge do not include diversion above station by City of Philadelphia for municipal water supply.

AVERAGE DISCHARGE.--54 years, 2,947 ft³/s, 21.14 in/yr, adjusted for diversion from October 1931 to September 1982.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 103,000 ft³/s June 23, 1972, gage height, 14.65 ft; no flow over dam at times; minimum daily, 0.6 ft³/s Sept. 2, 1966.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Oct. 4, 1869, reached a stage of 17.0 ft (5.18 m), discharge, 135,000 ft³/s, from rating extended above 46,000 ft³/s). Flood of Mar. 1, 1902, reached a stage of 14.8 ft, discharge, 98,000 ft³/s.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 40,600 ft³/s, Sept. 27, gage height, 10.69 ft; minimum, 299 ft³/s July 22, gage height 5.65 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	1150	1250	4070	2180	1120	2350	1980	717	1020	1150	3310	724
2	1420	1120	2930	2320	1490	2160	2070	804	1130	906	2500	668
3	1470	1040	2550	3650	1340	1950	1880	7760	1040	855	1520	591
4	1150	956	2870	2920	1130	1850	1710	7490	979	892	1120	532
5	901	2100	2770	2890	959	1980	1600	4300	1020	976	997	604
6	839	2220	4010	2840	870	2140	1560	3340	1200	892	840	582
7	784	1700	4850	2620	820	1830	1600	2920	1340	1050	760	624
8	774	1290	3260	2580	780	1630	1530	2460	1080	1230	2330	664
9	784	1120	2590	2340	776	1660	1460	2030	1080	1080	1480	865
10	729	1010	2360	1980	820	1610	1410	1820	1000	1060	1220	965
11	800	1040	2220	1920	952	1500	1350	1710	854	915	924	872
12	742	1020	2090	1910	7060	1650	1280	1590	793	725	772	717
13	694	994	1970	1920	15000	2340	1230	1580	734	708	719	626
14	703	903	1840	1850	7130	2120	1170	1640	638	600	1240	632
15	748	897	1830	1770	4720	1830	1180	1430	554	686	799	647
16	680	853	1830	1340	3570	1690	1160	1250	1030	1050	589	649
17	697	820	1790	1200	2600	1630	1130	1570	2160	898	489	658
18	696	818	1710	1310	2370	1590	1120	3010	1960	659	562	599
19	718	897	1630	1470	2280	1510	1020	2210	1610	547	610	616
20	761	916	1660	1250	2300	1410	978	1610	1470	431	588	748
21	764	882	1740	674	2270	1330	982	1330	1480	406	663	832
22	822	822	2470	640	2050	1290	1010	1300	1220	614	656	820
23	1500	787	3570	620	2370	1410	930	1350	1070	531	509	887
24	2750	722	3130	1130	3160	1600	903	1360	1060	475	433	892
25	1950	746	3000	1100	3350	1690	905	1270	980	493	1030	737
26	1460	775	2920	1000	3300	1650	859	1110	931	894	1810	841
27	1190	742	2510	967	3140	1540	804	1010	875	1540	1310	20900
28	1130	727	2190	930	2780	1330	783	1020	817	1790	972	19600
29	2610	1700	2340	900	---	1290	768	1030	929	1310	776	5390
30	2180	6680	2410	890	---	1300	736	957	1180	899	673	3060
31	1520	---	2320	880	---	1340	---	856	---	1250	638	---
TOTAL	35116	37547	79430	51991	80507	52200	37098	63834	33234	27512	32839	67543
MEAN	1133	1252	2562	1677	2875	1684	1237	2059	1108	887	1059	2251
MAX	2750	6680	4850	3650	15000	2350	2070	7760	2160	1790	3310	20900
MIN	680	722	1630	620	776	1290	736	717	554	406	433	532
†	248	210	212	234	269	228	233	248	233	262	250	225
CAL YR 1984	TOTAL	1460800	MEAN	3991	MAX	43500	MIN	680				
WTR YR 1985	TOTAL	598851	MEAN	1641	MAX	20900	MIN	406				

† Diversion, equivalent in cubic feet per second, for municipal supply, furnished by city of Philadelphia.

SCHUYLKILL RIVER BASIN

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01474500 SCHUYLKILL RIVER AT PHILADELPHIA, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October 1945 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: October 1963 to November 1980 (discontinued).

pH: January 1968 to November 1980 (discontinued).

WATER TEMPERATURES: October 1945 to November 1980 (discontinued).

DISSOLVED OXYGEN: January 1966 to November 1980 (discontinued).

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	BARO- METRIC PRES- SURE (MM OF HG)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	COLI- FORM, FECAL, 0.45 UM-MF (COLS./ 100 ML)	STREP- TOCOCCI FECAL, KF AGAR (COLS. PER 100 ML)	HARD- NESS (MG/L AS CACO3)
DEC 10...	1230	2420	312	7.5	4.0	744	20	11.8	K910	K720	110
MAR 11...	1200	1570	364	7.6	7.0	755	1.0	11.8	1200	K750	120
JUN 11...	1100	895	423	7.2	23.5	740	0.7	7.4	1200	8800	130
SEP 26...	1230	800	547	7.4	23.0	--	2.7	10.6	K55	K3	190

DATE	HARD- NESS NONCAR- BONATE (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY WH WAT FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)	SILICA, DIS- SOLVED (MG/L AS SIO2)
DEC 10...	49	29	9.8	15	0.6	64	37	28	0.1	7.7
MAR 11...	57	31	11	21	2.4	52	50	30	0.1	4.2
JUN 11...	75	31	13	24	3.3	56	63	35	0.2	5.1
SEP 26...	177	43	19	36	4.7	90	80	49	0.3	4.3

DATE	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTITUENTS, DIS- SOLVED (MG/L)	SOLIDS, DIS- SOLVED (TONS PER AC-FT)	SOLIDS, DIS- SOLVED (TONS PER DAY)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC TOTAL (MG/L AS N)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)
DEC 10...	205	170	0.28	1340	2.40	0.24	1.7	0.38	0.29	0.26
MAR 11...	206	190	0.28	--	2.40	0.30	1.0	0.30	0.31	0.21
JUN 11...	265	210	0.36	640	--	--	3.1	0.40	0.37	--
SEP 26...	342	240	0.47	600	2.70	0.17	0.5	0.58	0.56	0.56

DATE	ALUM- INIUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BARIUM, DIS- SOLVED (UG/L AS BA)	BERYL- LIUM, DIS- SOLVED (UG/L AS BE)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)	COBALT, DIS- SOLVED (UG/L AS CO)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)
DEC 10...	230	<1	36	<0.5	<1	2	<3	15	400	13
MAR 11...	30	1	32	<0.5	<1	<1	<3	7	110	5
JUN 11...	<10	1	37	0.9	2	2	<3	5	55	2
SEP 26...	30	2	39	1.4	2	2	<3	1	9	8

SCHUYLKILL RIVER BASIN

01474500 SCHUYLKILL RIVER AT PHILADELPHIA, PA--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	MOLYB- DENUM, DIS- SOLVED (UG/L AS MO)	NICKEL, DIS- SOLVED (UG/L AS NI)	-SELE- NIUM, DIS- SOLVED (UG/L AS SE)	SILVER, DIS- SOLVED (UG/L AS AG)	STRON- TIUM, DIS- SOLVED (UG/L AS SR)	VANA- DIUM, DIS- SOLVED (UG/L AS V)	ZINC, DIS- SOLVED (UG/L AS ZN)
DEC 10...	7	94	0.2	<10	9	<1	<1	140	<6	44
MAR 11...	17	130	0.3	<10	3	<1	<1	160	<6	16
JUN 11...	18	35	<0.1	<10	7	<1	<1	170	<6	14
SEP 26...	8	29	0.1	<10	1	<1	<1	230	<6	16

SCHUYLKILL RIVER BASIN

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01474505 SCHUYLKILL RIVER ABOVE PASSYUNK AVENUE AT PHILADELPHIA, PA

LOCATION.--Lat 39°55'18", long 75°12'16", Philadelphia County, Hydrologic Unit 02040203, on west face of Philadelphia Fire Department dock in the embayment off the main channel of the Schuylkill River on left bank 1,200 feet upstream from Passyunk Avenue at Philadelphia.

DRAINAGE AREA.--1,900 mi².

PERIOD OF RECORD.--September 1978 to current year.

GAGE.--Water stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (U.S. Corps of Engineers benchmark).

REMARKS.--Records fair.

EXTREMES FOR PERIOD OF RECORD.--Maximum elevation, 8.03 ft Oct. 25, 1980; minimum, -5.50 ft Dec. 3, 1980.

EXTREMES FOR CURRENT YEAR.--Maximum recorded elevation, 5.81 ft May 4; minimum recorded, -3.02 ft many days in Feb.

Summaries of tide elevations during current year are as follows:

	Maximum elevation	High tide date	Minimum elevation	Low tide date	Mean high tide	Mean water level	Mean low tide
Oct.	5.52	15	- 2.42	23	4.66	1.17	- 1.69
Nov.	5.16	10	- 2.58	14,17,18,20, 21,22,24	4.21	1.12	- 2.06
Dec.	5.35	22	- 2.58	5,7,8,9,23, 25,26,27	4.02	1.06	- 2.13
Jan.	5.16	19	- 2.62	26	3.77	.88	- 2.19
Feb.	5.68	12	- 3.02	7,8,9,18	3.45	.81	- 2.31
Mar.	4.82	12	- 2.51	6,7,9,13	3.86	1.29	- 1.76
Apr.	5.13	6	- 2.54	17,19,20	4.18	1.25	- 2.12
May	5.81	4	- 2.54	2	4.69	1.50	- 1.98
June	5.65	27	- 2.53	14	4.65	1.61	- 1.88
July	5.45	2	- 2.49	27	4.69	1.76	- 1.56
Aug.	5.33	1	- 2.07	1	---	---	---
Sept.	---	---	---	---	---	---	---

SCHUYLKILL RIVER BASIN

LAKES AND RESERVOIRS IN SCHUYLKILL RIVER BASIN

01469200 STILL CREEK RESERVOIR.--Lat 40°51'25", long 75°59'30", Schuylkill County, Hydrologic Unit 02040106, at dam on Still Creek, 1 mi upstream from mouth and 2.3 mi north of Hometown, Pa. DRAINAGE AREA, 7.19 mi². PERIOD OF RECORD, January 1933 to current year. Nonrecording gage. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Panther Valley Water Co.).

Reservoir formed by earthfill dam, with ungated concrete spillway at elevation 1,182.00 ft. Storage began in February 1933. Capacity at elevation 1,182.00 ft is 8,290 acre-ft. Reservoir is used for municipal water supply. Figures given herein represent total contents. Regulation is accomplished by valves on pipe through dam. Records furnished by Panther Valley Water Co.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 8,570 acre-ft Oct. 15, 1955, elevation, 1,182.92 ft, but may have been greater during 1950 or 1951 water years; minimum (after first filling), 588 acre-ft Dec. 8, 1944, elevation, 1,136.70 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 7,630 acre-ft Oct. 1, elevation, 1,179.75 ft; minimum, 6,530 acre-ft Sept. 30, elevation, 1,175.75 ft.

01470870 BLUE MARSH LAKE.--Lat 40°22'45", long 76°01'59", Berks County, Hydrologic Unit 02040203, at dam on Tulpehocken Creek, 0.8 mi upstream from gaging station on Tulpehocken Creek, 1.0 mi northeast of Blue Marsh, 1.9 mi upstream from Reber's Bridge, and 5.1 mi southeast of Bernville. DRAINAGE AREA, 175 mi. PERIOD OF RECORD, April 1979 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Corps of Engineers).

Reservoir formed by earthfill dam, with concrete ungated spillway at elevation 307.00 ft. Storage began April 23, 1979. Capacity at elevation 307.00 ft is 50,000 acre-ft. Dead storage is 3,000 acre-ft. Reservoir is used for flood control, water supply, and recreation. Figures herein represent total contents. Records furnished by Corps of Engineers.

EXTREMES FOR PERIOD OF RECORD.--Maximum contents, 39,480 acre-ft Apr. 17, 1983, elevation, 301.65 ft; minimum (after first filling), 16,570 acre-ft Sept. 26, 1985, elevation, 283.88 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 24,740 acre-ft Nov. 29, elevation, 291.56 ft; minimum, 16,700 acre-ft Sept. 26, elevation, 283.88 ft.

01472200 GREEN LANE RESERVOIR.--Lat 40°20'30", long 75°28'45", Montgomery County, Hydrologic Unit 02040203, at dam on Perkiomen Creek, 0.4 mi west of Green Lane and 2.1 mi upstream from Unami Creek. DRAINAGE AREA, 70.9 mi². PERIOD OF RECORD, December 1956 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Philadelphia Suburban Water Co.).

Reservoir formed by concrete, gravity-type dam, with ungated spillway at elevation 286.00 ft. Storage began December 21, 1956. Capacity at elevation 286.00 ft is 13,430 acre-ft. Reservoir is used for municipal water supply. Figures given herein represent total contents. Regulation is accomplished by valves on pipe through dam. Records furnished by Philadelphia Suburban Water Co.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 17,030 acre-ft June 23, 1972, elevation, 290.05 ft; minimum (after first filling), 1,270 acre-ft Aug. 25, 1957, elevation, 251.60 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 13,920 acre-ft Feb. 13, elevation, 286.55 ft; minimum, 11,520 acre-ft Sept. 26, elevation, 283.69 ft.

SCHUYLKILL RIVER BASIN

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LAKES AND RESERVOIRS IN SCHUYLKILL RIVER BASIN

MONTHEND ELEVATION AND CONTENTS AT 2400, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

Date	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)
<u>01469200 Still Creek Reservoir</u>				<u>01470870 Blue Marsh Dam</u>		
Sept. 30	1180.24	7770	--	290.08	22990	--
Oct. 31	1178.75	7360	- 6.7	290.00	22900	- 1.5
Nov. 30	1177.75	7080	- 4.7	291.10	24180	+ 21.5
Dec. 31	1176.50	6740	- 5.5	290.24	23180	- 16.3
CAL YR 1984	--	--	- 2.1	--	--	+ 6.9
Jan. 31	1176.25	6670	- 1.1	285.15	17770	- 87.9
Feb. 29	1177.75	7080	+ 7.4	284.95	17580	- 3.4
Mar. 31	1178.50	7290	+ 3.4	285.33	17950	+ 6.0
Apr. 30	1178.75	7360	+ 1.2	289.91	22800	+ 81.5
May 31	1179.25	7500	+ 2.3	290.55	23540	+ 12.0
June 30	1178.00	7150	- 5.9	290.22	23150	- 6.6
July 31	1177.25	6940	- 3.4	290.34	23270	+ 2.0
Aug. 31	1176.25	6670	- 4.4	290.16	23080	- 3.1
Sept. 30	1175.75	6530	- 2.4	287.94	20610	- 41.5
WTR YR 1985	--	--	- 1.7	--	--	- 3.3
<u>01472200 Green Lane Reservoir</u>						
Sept. 30	285.85	13300	--			
Oct. 31	285.97	13410	+ 1.8			
Nov. 30	285.95	13390	- 0.3			
Dec. 31	286.00	13430	+ 0.7			
CAL YR 1984	--	--	0			
Jan. 31	285.86	13310	- 2.0			
Feb. 29	286.03	13460	+ 2.7			
Mar. 31	285.95	13390	- 1.1			
Apr. 30	285.73	13190	- 3.4			
May 31	285.88	13330	+ 2.3			
June 30	285.55	13030	- 5.0			
July 31	284.85	12420	- 9.9			
Aug. 31	285.35	12850	+ 7.0			
Sept. 30	286.07	13490	+ 10.8			
WTR YR 1985	--	--	+ 0.3			

DELAWARE RIVER BASIN

01474703 DELAWARE RIVER AT FORT MIFFLIN AT PHILADELPHIA, PA

LOCATION.--Lat 39°52'45", long 75°12'11", Philadelphia County, Hydrologic Unit 02040202, water-quality recorder on right bank at outer end of L-shaped pier at Fort Mifflin, 0.4 mi downstream from mouth of Schuylkill River, in Philadelphia.

DRAINAGE AREA.--10,000 mi², approximately.

PERIOD OF RECORD.--July 1970 to June 1976, February 1981 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: July 1970 to December 1971, February 1981 to current year.

WATER TEMPERATURE: June 1972 to September 1976, February 1981 to current year.

INSTRUMENTATION.--Water-quality monitor July 1970 to June 1976, February 1981 to current year.

REMARKS.--Station not operated Nov. 29 to Mar. 8. Other interruptions in the record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 1,230 microsiemens Oct. 27, 1981; minimum, 90 microsiemens Apr. 11,,17, 19, 29, 1983, April 29, 1984.

WATER TEMPERATURE: Maximum, 31.0°C Aug. 4-6, 13, 1975; minimum, 0.5°C Feb. 5, 1981.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	530	390	438	480	410	440						
2	570	390	484	470	420	440						
2	570	390	484	470	420	440						
3	620	400	480	470	420	437						
4	580	390	473	480	420	442						
5	550	390	421	460	410	437						
6	450	380	402	510	410	437						
7	420	380	398	440	370	400						
8	410	360	396	430	370	396						
9	530	380	439	450	360	398						
10	540	380	455	430	360	399						
11	540	380	463	430	370	397						
12	540	390	449	430	360	389						
13	530	390	424	410	360	386						
14	500	390	429	390	360	377						
15	490	420	444	440	350	383						
16	480	400	436	410	350	380						
17	470	400	432	400	340	377						
18	610	410	464	410	360	380						
19	520	420	446	410	350	382						
20	490	420	447	420	360	385						
21	630	420	471	430	370	394						
22	610	430	465	420	370	389						
23	510	450	474	430	370	395						
24	560	460	491	440	380	402						
25	520	450	474	450	390	411						
26	530	410	465	450	380	413						
27	500	310	456	450	390	414						
28	510	420	456	480	390	422						
29	540	430	464	---	---	---						
30	520	420	469	---	---	---						
31	490	420	459	---	---	---						
MONTH	630	310	450	510	340	404						

DELAWARE RIVER BASIN

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01474703 DELAWARE RIVER AT FORT MIFFLIN AT PHILADELPHIA, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1986

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	390	240	296	350	280	301
2				---	---	---	380	250	297	380	280	308
3				---	---	---	340	250	275	430	290	350
4				---	---	---	340	250	277	400	240	319
5				---	---	---	360	250	277	310	220	262
6				---	---	---	370	240	276	270	220	240
7				---	---	---	370	250	283	290	230	251
8				---	---	---	390	240	283	290	240	260
9				440	260	308	380	240	281	290	240	257
10				360	250	286	370	250	281	350	240	272
11				330	250	271	370	260	288	300	240	264
12				400	240	272	360	250	281	290	240	258
13				440	250	306	340	250	278	280	240	254
14				400	250	293	350	250	280	280	240	256
15				360	240	274	350	250	281	280	240	259
16				400	230	279	340	250	279	290	240	261
17				350	230	270	380	260	295	290	250	265
18				370	230	281	340	260	284	290	240	267
19				420	230	277	390	250	291	290	240	262
20				370	230	273	370	250	289	290	250	264
21				400	230	277	350	260	282	310	240	270
22				330	230	---	330	250	279	350	260	284
23				360	230	264	350	250	278	360	260	288
24				330	230	253	370	260	286	350	260	285
25				380	220	276	360	270	296	330	250	277
26				350	230	269	330	260	288	300	250	270
27				310	230	261	320	270	284	290	250	267
28				300	220	254	330	280	296	300	250	270
29				310	230	257	330	280	295	310	260	274
30				350	230	265	380	280	311	300	260	275
31				380	240	272	---	---	---	360	260	288
MONTH				440	220	274	390	240	286	430	220	273
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	320	270	281	340	290	304	480	320	379			
2	320	260	282	330	280	302	420	330	362			
3	310	270	281	340	280	301	390	310	338			
4	320	270	282	320	290	302	350	300	320			
5	400	270	292	340	280	301	350	300	313			
6	350	270	300	330	290	304	330	290	308			
7	350	270	298	330	290	306	320	290	306			
8	340	270	296	350	300	315	400	280	328			
9	330	270	289	350	310	320	380	310	339			
10	320	270	287	370	310	329	380	290	345			
11	330	270	288	350	310	326	390	280	357			
12	320	270	285	350	310	323	370	280	341			
13	380	270	301	340	310	323	380	280	345			
14	380	270	298	350	300	321	420	300	366			
15	350	280	300	340	310	319	430	350	383			
16	340	280	299	350	310	320	400	290	377			
17	360	280	307	360	310	324	410	290	361			
18	380	280	313	330	290	317	440	300	376			
19	360	280	309	340	300	317	450	350	408			
20	370	280	305	340	300	322	480	380	438			
21	350	280	306	340	300	319	490	370	439			
22	350	290	302	350	310	323	501	370	445			
23	340	270	296	340	310	330	---	---	---			
24	330	280	297	350	320	331	---	---	---			
25	340	280	301	350	310	329	---	---	---			
26	330	290	301	370	300	331	---	---	---			
27	320	280	297	380	310	335	---	---	---			
28	340	290	302	390	320	341	---	---	---			
29	330	290	302	370	310	334	---	---	---			
30	340	290	303	360	320	336	---	---	---			
31	---	---	---	380	310	333	---	---	---			
MONTH	400	260	297	390	280	321	501	280	362			

DELAWARE RIVER BASIN

01474703 DELAWARE RIVER AT FORT MIFFLIN AT PHILADELPHIA, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	20.0	19.0	19.5	19.0	18.5	18.5						
2	19.5	19.0	19.0	19.0	17.5	18.5						
3	19.0	18.0	18.5	18.0	17.0	17.5						
4	18.5	18.0	18.5	17.5	17.0	17.0						
5	19.0	18.0	18.0	18.0	17.0	17.5						
6	18.0	17.5	18.0	17.5	16.5	17.0						
7	18.0	17.5	17.5	16.5	16.0	16.0						
8	18.0	17.5	17.5	16.0	15.5	15.5						
9	18.0	17.5	17.5	15.5	15.0	15.5						
10	18.0	17.5	17.5	15.5	15.0	15.5						
11	18.5	17.5	18.0	15.5	15.0	15.0						
12	18.0	17.5	18.0	15.0	14.0	14.5						
13	18.0	17.5	17.5	14.5	13.0	14.0						
14	17.5	17.0	17.5	13.5	12.5	13.0						
15	17.5	17.0	17.5	13.0	12.5	13.0						
16	17.5	17.0	17.5	13.0	12.0	12.5						
17	17.5	17.0	17.5	12.5	11.5	12.0						
18	18.0	17.5	17.5	12.0	11.5	11.5						
19	18.0	17.5	18.0	11.5	11.0	11.5						
20	18.5	18.0	18.0	11.0	10.0	10.5						
21	18.5	18.0	18.0	10.5	10.0	10.0						
22	18.5	18.0	18.5	10.0	9.5	10.0						
23	19.0	18.5	18.5	10.0	9.0	9.5						
24	19.0	18.0	18.5	9.5	9.0	9.5						
25	18.5	18.0	18.0	9.5	9.0	9.0						
26	18.5	18.0	18.0	9.5	9.0	9.0						
27	19.0	18.0	18.5	9.5	9.0	9.0						
28	19.0	18.0	18.5	10.0	9.0	9.5						
29	19.5	18.5	19.0	9.5	9.5	---						
30	19.0	18.5	19.0	---	---	---						
31	19.5	18.5	19.0	---	---	---						
MONTH	20.0	17.0	18.0	19.0	9.0	13.5						
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				8.0	6.0	---	10.0	8.5	9.0	17.0	16.0	16.5
2				8.0	5.5	6.5	10.0	8.5	9.0	17.0	16.0	16.5
3				8.0	6.0	7.0	9.5	8.5	8.5	17.5	16.0	16.5
4				7.5	6.0	6.5	10.0	8.5	9.0	16.5	14.5	15.5
5				8.0	6.5	7.0	10.5	8.5	9.5	17.0	14.5	16.0
6				7.5	6.5	7.0	10.5	9.5	10.0	16.5	15.5	16.0
7				7.0	6.5	6.5	10.5	9.5	10.0	17.0	15.5	16.0
8				7.0	6.5	6.5	10.5	9.5	10.0	17.0	16.0	16.5
9				7.5	6.5	6.5	10.0	9.5	10.0	18.0	16.0	17.0
10				7.5	6.5	7.0	10.5	9.0	10.0	18.0	16.5	17.0
11				7.5	6.5	7.0	10.5	9.5	10.0	18.5	17.5	18.0
12				7.0	6.5	7.0	11.5	9.5	10.5	19.0	18.0	18.5
13				7.5	6.5	7.0	12.0	10.5	11.0	19.5	16.0	19.0
14				8.0	7.0	7.0	12.0	10.5	11.0	20.0	19.0	19.0
15				8.0	7.0	7.5	12.0	11.0	11.5	20.5	19.0	19.5
16				8.5	7.0	7.5	12.0	11.5	11.5	20.0	19.0	19.5
17				8.0	7.0	7.5	12.5	11.5	11.5	20.0	19.5	19.5
18				8.0	7.0	7.5	13.0	11.5	12.0	21.0	19.0	19.5
19				7.5	6.5	7.0	13.5	12.0	12.5	20.0	19.0	19.5
20				7.5	6.5	7.0	14.0	12.5	13.0	20.0	19.0	19.5
21				8.0	7.0	7.0	14.5	13.0	14.0	20.0	19.5	19.5
22				7.5	7.0	---	15.0	14.0	14.5	20.5	19.5	20.0
23				7.5	7.0	7.0	16.0	14.5	15.0	20.0	19.5	20.0
24				7.5	7.0	7.0	15.5	14.5	15.0	20.5	19.5	20.0
25				7.5	6.5	7.0	15.5	14.5	15.0	21.0	19.5	20.0
26				8.0	6.5	7.0	15.5	14.5	15.0	21.0	20.0	20.5
27				8.0	6.5	7.5	16.0	15.0	15.5	22.0	20.5	21.0
28				8.5	7.0	8.0	16.5	15.5	16.0	22.0	21.0	21.0
29				9.0	7.5	8.5	16.5	15.5	---	21.5	20.5	21.0
30				9.5	8.0	8.5	17.0	15.5	16.0	22.0	20.5	21.0
31				9.5	8.5	8.5	---	---	---	22.0	21.0	21.5
MONTH				9.5	5.5	7.0	17.0	8.5	12.0	22.0	14.5	18.5

DELAWARE RIVER BASIN

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01474703 DELAWARE RIVER AT FORT MIFFLIN AT PHILADELPHIA, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	22.5	21.5	22.0	23.0	22.5	23.0	27.5	27.0	27.0	25.5	24.5	25.0
2	22.5	21.5	22.0	23.5	22.5	23.0	27.5	26.5	27.0	25.5	24.5	25.0
3	23.0	22.0	22.5	23.5	22.5	23.0	27.0	26.0	26.5	26.0	25.0	25.5
4	23.0	22.5	22.5	24.0	23.0	23.5	27.0	26.0	26.5	26.0	25.0	25.5
5	22.5	22.0	22.5	24.0	23.5	23.5	27.0	26.0	26.5	26.0	25.5	26.0
6	23.0	22.0	22.5	24.5	23.5	24.0	27.0	26.0	26.5	26.5	25.5	26.0
7	23.0	22.0	22.5	24.5	23.5	24.0	27.0	26.0	26.5	26.5	26.0	26.5
8	23.0	22.0	22.5	24.5	23.5	24.0	27.0	26.0	26.5	26.5	26.0	26.5
9	23.0	22.0	22.5	24.5	24.0	24.0	27.0	26.5	26.5	27.0	26.0	26.5
10	23.0	22.5	22.5	24.5	24.0	24.5	27.0	26.5	27.0	27.0	26.5	---
11	23.5	22.0	23.0	25.0	24.5	24.5	27.5	26.5	27.0	---	---	---
12	22.5	22.0	22.0	25.5	24.5	25.0	27.0	26.5	27.0	---	---	---
13	22.0	21.0	22.0	26.0	24.5	25.0	27.5	26.5	27.0	---	---	---
14	23.0	21.0	21.5	26.0	25.0	25.5	27.5	27.0	27.0	---	---	---
15	23.0	21.0	21.5	26.5	25.5	25.5	28.0	27.0	27.5	---	---	---
16	22.0	21.0	21.5	26.5	25.5	26.0	28.0	27.5	27.5	---	---	---
17	22.0	21.0	21.5	26.5	25.5	26.0	28.0	27.0	27.5	---	---	---
18	22.0	21.5	21.5	26.5	25.5	26.0	27.5	26.5	27.0	---	---	---
19	22.0	21.5	22.0	27.0	26.0	26.0	27.0	26.5	27.0	---	---	---
20	22.0	21.5	22.0	26.5	26.0	26.5	27.0	26.5	27.0	---	---	---
21	22.0	21.5	21.0	27.0	26.0	26.5	27.0	26.5	26.5	---	---	---
22	22.5	21.5	22.0	27.0	26.5	27.0	26.5	26.0	26.5	---	---	---
23	22.5	22.0	22.0	27.0	26.0	27.0	26.5	25.5	26.0	---	---	---
24	23.0	22.0	22.5	27.0	26.0	27.0	27.0	25.5	26.0	---	---	---
25	23.0	22.0	22.5	27.5	26.5	27.0	26.0	25.5	25.5	---	---	---
26	22.5	22.0	22.5	27.5	26.5	27.0	26.5	25.5	26.0	---	---	---
27	22.0	21.5	22.0	27.5	26.5	27.0	26.0	25.5	26.0	---	---	---
28	23.0	21.5	22.5	28.0	26.5	27.0	26.0	25.5	26.0	---	---	---
29	23.0	22.5	22.5	27.5	27.0	27.0	26.0	25.5	26.0	---	---	---
30	23.0	22.5	23.0	27.5	26.5	27.0	26.5	25.5	26.0	---	---	---
31	---	---	---	27.5	27.0	27.0	26.0	25.0	25.5	---	---	---
MONTH	23.5	21.0	22.0	28.0	22.5	25.5	28.0	25.0	26.5	27.0	24.5	26.0

DARBY CREEK BASIN

01475300 DARBY CREEK AT WATERLOO MILLS NEAR DEVON, PA

LOCATION.--Lat 40°01'21", long 75°25'20", Chester County, Hydrologic Unit 02040202, on left bank 125 ft upstream from bridge on Waterloo Road, 2 mi south of Devon, and 2.5 mi northwest of Newtown Square.

DRAINAGE AREA.--5.15 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--May 1972 to current year.

GAGE.--Water-stage recorder. Altitude of gage is 310 ft, from topographic map.

REMARKS.--Estimated daily discharges during water year: Jan. 11-29, Feb. 6-9, July 12-15 and Aug. 26 to Sept. 6. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--13 years, 9.42 ft³/s, 24.84 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 1,800 ft³/s Sept. 6, 1979, gage height, 6.71 ft; minimum, 0.74 ft³/s Aug. 26, 1983, gage height, 1.18 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 250 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1500	564	4.61	Aug. 14	0315	251	3.53
Aug. 8	0500	*725	*5.03	Sept. 27	1115	619	4.76

Minimum discharge, 1.1 ft³/s July 21, 22, gage height, 1.25 ft.

DISCHARGE, IN CUEIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	6.9	2.0	3.2	3.0	5.0	4.1	12	3.1	3.4	1.9	2.9	2.4
2	5.2	2.1	3.0	3.9	6.3	4.0	4.4	5.5	2.3	1.9	1.7	2.3
3	3.9	2.0	4.2	3.2	3.6	3.8	4.5	47	2.3	1.9	1.6	2.2
4	2.3	2.0	3.5	3.0	3.3	4.2	4.2	5.8	2.3	3.7	1.5	2.2
5	2.2	15	3.0	3.9	3.0	5.8	3.8	4.3	2.4	2.0	1.4	2.2
6	1.5	3.7	16	3.2	2.9	4.1	3.8	3.8	2.4	1.7	1.4	2.1
7	1.4	2.8	4.4	3.3	2.8	3.9	3.6	3.9	2.4	1.8	2.2	1.9
8	2.0	2.6	3.4	3.4	2.7	4.3	3.7	3.7	2.6	1.6	87	2.2
9	2.1	2.6	3.0	2.9	2.6	4.0	3.6	3.9	2.4	1.8	15	2.1
10	2.4	2.6	2.9	2.8	2.6	3.9	3.4	4.3	2.2	1.6	6.4	2.1
11	2.1	3.1	3.0	2.7	2.8	4.0	3.5	3.4	2.2	1.6	3.0	1.9
12	2.2	2.8	2.9	2.7	102	6.3	3.5	2.4	2.2	1.4	2.7	1.8
13	2.2	2.6	2.9	2.7	12	4.2	3.5	2.7	2.2	1.4	2.3	1.8
14	2.3	3.9	2.7	2.6	6.5	4.1	3.3	2.3	2.1	1.4	22	1.8
15	2.3	2.3	3.3	2.6	5.5	4.1	3.4	2.2	2.0	2.4	3.0	1.8
16	2.3	2.3	2.9	2.6	4.9	3.7	3.4	2.5	7.0	3.4	2.7	1.8
17	2.3	2.3	2.9	2.6	4.5	3.8	3.3	11	5.2	1.4	2.5	1.8
18	2.4	2.5	2.8	2.6	4.9	3.7	3.3	8.3	2.3	1.3	2.5	1.8
19	2.5	3.4	3.2	2.6	4.8	3.6	3.2	3.5	2.1	1.2	2.7	1.8
20	3.1	2.7	3.0	2.6	4.8	3.8	3.3	3.6	2.5	1.2	2.5	1.7
21	3.0	2.5	3.9	2.6	4.5	3.6	3.1	3.0	2.3	1.2	3.4	1.7
22	3.4	2.4	5.4	2.6	5.0	3.7	3.0	3.0	2.1	3.6	2.5	1.7
23	4.8	2.4	3.3	2.6	5.4	5.6	3.0	4.5	2.0	1.3	2.3	1.9
24	4.7	2.5	3.0	2.6	4.9	4.7	3.1	3.3	2.0	1.2	2.3	2.1
25	3.1	2.7	3.5	2.6	4.5	4.7	3.2	2.9	2.0	2.1	9.6	1.9
26	2.7	2.4	2.9	2.6	4.5	3.7	3.0	2.7	1.9	10	14	6.0
27	2.6	2.4	3.0	2.6	4.4	3.6	2.8	2.6	1.9	8.1	8.2	197
28	2.7	2.4	3.0	2.6	4.0	3.7	2.6	4.5	2.0	1.7	3.0	3.7
29	5.9	13	2.9	2.6	---	3.7	2.9	3.3	2.3	1.5	2.6	1.5
30	2.3	3.7	2.9	2.6	---	3.5	2.8	2.6	2.1	1.4	2.5	1.7
31	2.1	---	2.8	2.7	---	4.6	---	2.5	---	14	2.4	---
TOTAL	90.9	101.7	112.8	87.6	224.7	128.5	110.2	162.1	75.1	82.7	219.8	258.9
MEAN	2.93	3.39	3.64	2.83	8.02	4.15	3.67	5.23	2.50	2.67	7.09	8.63
MAX	6.9	15	16	3.9	102	6.3	12	47	7.0	14	87	197
MIN	1.4	2.0	2.7	2.6	2.6	3.5	2.6	2.2	1.9	1.2	1.4	1.5
CFSM	.57	.66	.71	.55	1.56	.81	.71	1.02	.49	.52	1.38	1.68
IN.	.66	.73	.81	.63	1.62	.93	.80	1.17	.54	.60	1.59	1.87
CAL YR 1984 TOTAL	3252.1	MEAN	8.89	MAX	243	MIN	1.4	CFSM	1.73	IN.	23.49	
WTR YR 1985 TOTAL	1655.0	MEAN	4.53	MAX	197	MIN	1.2	CFSM	.88	IN.	11.95	

DARBY CREEK BASIN

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01475300 DARBY CREEK AT WATERLOO MILLS NEAR DEVON, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--November 1970 to current year.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CACO3)	HARD- NESS NONCAR- BONATE (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)
OCT												
15...	1000	3.0	250	7.5	17.5	12.5	0.4	10.0	100	27	24	10
NOV												
20...	1445	2.6	225	7.6	--	4.5	--	--	--	--	--	--
DEC												
12...	1445	2.9	250	7.4	--	5.5	--	--	93	27	22	9.2
DATE		SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LITY WH WAT TOTAL FIELD MG/L AS CACO3	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)
OCT												
15...	11		1.9	74	20	22	14	153	150	1.4	0.03	1.4
NOV												
20...	--	--	--	66	--	21	--	152	--	--	<0.01	1.7
DEC												
12...	11		1.8	66	20	21	--	152	--	1.5	0.05	1.5
DATE		NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS. (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	IRON, DIS- SOLVED (UG/L AS FE)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	METHY- LENE BLUE ACTIVE SUB- STANCE (MG/L)
OCT												
15...		0.06	0.14	.20	--	0.01	0.01	0.02	20	63	10	--
NOV												
20...		<0.01	--	--	--	--	--	0.02	--	--	--	--
DEC												
12...		0.02	--	--	--	--	--	0.01	--	99	22	.04

DARBY CREEK BASIN

01475510 DARBY CREEK NEAR DARBY, PA

LOCATION.--Lat 39°55'44", long 75°16'22", Delaware County, Hydrologic Unit 02040202, on right bank 20 ft upstream from Providence Road Bridge, 1.1 mi northwest of Upper Darby, 2.3 mi upstream from Cobbs Creek, and 8.4 mi upstream from mouth.

DRAINAGE AREA.--37.4 mi².

PERIOD OF RECORD.--February 1964 to current year.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is 19.41 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during the water year: Dec. 30 to Jan. 31, Feb. 5-11. Records fair, except for periods estimated daily discharges, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--21 years, 66.9 ft³/s, 24.30 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 5,920 ft³/s Aug. 23, 1974, gage height, 10.23 ft, from rating curve extended above 920 ft³/s on basis of step-backwater analysis; minimum, 8.2 ft³/s Sept. 12, 13, 1980; minimum gage height, 1.16 ft Sept. 2, 1966.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,200 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1445	1840	5.49	Sept. 27	1130	*2080	*5.82
Aug. 8	0630	1990	5.70				

Minimum discharge, 9.8 ft³/s Sept. 20, 21, gage height, 1.17 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	90	25	27	29	98	29	123	20	32	16	48	17
2	53	25	26	36	102	29	32	36	18	13	16	17
3	32	25	45	30	41	27	32	425	17	12	16	17
4	28	25	35	28	36	31	32	43	17	48	16	16
5	27	131	28	36	34	40	28	30	18	21	15	15
6	26	33	175	30	33	28	26	27	18	17	14	15
7	25	27	42	30	32	27	25	26	17	16	30	15
8	26	26	32	31	31	29	25	24	25	35	473	30
9	27	25	30	27	30	28	24	23	20	22	96	21
10	27	25	28	23	29	27	24	24	18	32	103	31
11	26	26	28	22	28	26	25	22	17	15	24	17
12	25	28	28	21	629	49	24	19	17	12	20	14
13	25	25	27	21	102	29	24	25	18	12	18	14
14	24	25	27	20	46	27	23	18	17	12	95	14
15	24	25	32	20	38	26	24	17	17	22	22	14
16	24	25	28	20	34	26	23	18	80	70	18	13
17	24	24	27	20	31	27	22	118	63	16	17	13
18	25	25	27	20	30	26	22	88	21	14	17	12
19	24	36	32	20	32	25	22	24	18	14	19	12
20	25	27	28	20	31	27	22	21	17	14	17	10
21	25	25	43	20	29	26	21	45	18	12	30	10
22	40	25	42	20	30	26	21	41	16	42	19	10
23	65	25	29	20	34	47	20	40	15	23	16	11
24	51	25	31	20	32	35	21	27	16	14	15	13
25	29	25	30	20	31	33	22	21	15	15	143	11
26	26	24	27	20	30	27	21	20	16	93	155	81
27	25	24	28	20	30	27	20	19	16	73	26	1150
28	25	25	27	20	29	26	19	21	16	20	20	55
29	78	113	27	20	---	26	23	28	17	15	19	27
30	28	31	26	20	---	26	21	19	24	15	20	23
31	26	---	26	22	---	32	---	18	---	140	19	---
TOTAL	1025	975	1088	726	1712	914	811	1347	654	895	1578	1718
MEAN	33.1	32.5	35.1	23.4	61.1	29.5	27.0	43.5	21.8	28.9	50.9	57.3
MAX	90	131	175	36	629	49	123	425	80	140	473	1150
MIN	24	24	26	20	28	25	19	17	15	12	14	10
CFSM	.89	.87	.94	.63	1.63	.79	.72	1.16	.58	.77	1.36	1.53
IN.	1.0	.97	1.08	.72	1.70	.91	.81	1.34	.65	.89	1.57	1.71

CAL YR 1984	TOTAL	27148	MEAN	74.2	MAX	1210	MIN	21	CFSM	1.98	IN.	27.00
WTR YR 1985	TOTAL	13443	MEAN	36.8	MAX	1150	MIN	10	CFSM	.98	IN.	13.37

DARBY CREEK BASIN

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01475550 COBES CREEK AT DARBY, PA

LOCATION.--Lat 39°55'02", long 75°14'52", Delaware County, Hydrologic Unit 02040202, on right bank 60 ft upstream from dam, 200 ft upstream from bridge on Woodland Avenue, at Darby, and 1.1 mi upstream from mouth.

DRAINAGE AREA.--22.0 mi².

PERIOD OF RECORD.--February 1964 to current year.

REVISED RECORDS.--WDR PA-75-1: 1974(M).

GAGE.--Water-stage recorder and masonry control. Datum of gage is 11.93 ft above National Geodetic Vertical Datum of 1929. Prior to Apr. 29, 1964, nonrecording gage at same site and datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 10-29, Feb. 6-11 and Apr. 4-19. Records fair except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--21 years, 31.0 ft³/s, 19.16 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 4,490 ft³/s June 29, 1973, gage height, 10.98 ft, from rating curve extended above 850 ft³/s on basis of computation of peak flow through culvert; maximum gage height, 12.85 ft Aug. 23, 1974, backwater from storage tank; minimum, no flow on many days in 1964-66.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,800 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Aug. 8	0615	1960	4.97	Sept. 27	0015	*2540	*5.86

Minimum discharge, 3.6 ft³/s July 24, 25, gage height, 1.19 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	82	15	13	12	76	12	104	13	46	11	22	7.4
2	23	15	13	19	45	12	14	28	12	11	8.5	7.3
3	14	15	37	13	17	12	17	412	11	6.6	6.8	11
4	13	16	16	12	14	15	16	23	11	59	6.3	7.2
5	14	102	13	12	13	18	15	19	15	16	6.6	6.8
6	15	16	138	12	13	12	15	18	13	8.5	5.9	6.5
7	16	14	16	12	12	12	15	17	11	6.5	53	6.2
8	16	14	13	11	12	13	14	14	27	18	351	22
9	9.9	14	13	11	12	12	14	12	14	17	27	36
10	9.1	14	13	11	12	12	14	11	11	51	25	23
11	8.9	15	13	11	12	12	13	12	11	10	9.3	11
12	13	15	12	11	316	33	13	12	11	5.9	8.3	6.7
13	13	13	12	10	17	13	13	28	10	5.6	7.3	6.1
14	14	12	11	10	11	13	12	16	9.7	5.2	74	6.2
15	14	12	19	9.7	11	13	12	16	9.7	22	9.9	6.0
16	17	13	12	9.6	11	12	12	20	116	82	8.0	5.9
17	18	12	12	9.5	11	12	12	207	51	9.3	6.9	6.7
18	16	15	11	9.2	11	12	12	65	19	7.3	7.2	9.6
19	15	25	19	9.1	11	12	11	19	11	6.3	9.5	10
20	17	12	13	8.9	11	12	11	16	11	5.6	7.0	10
21	16	12	24	8.7	11	12	17	59	16	5.3	32	10
22	46	12	27	8.6	11	13	19	32	18	27	9.3	11
23	70	12	12	8.5	11	28	19	48	9.7	16	6.6	12
24	35	12	12	8.4	10	17	20	21	9.8	5.1	6.2	18
25	15	12	12	8.3	9.6	16	21	16	9.3	6.8	236	11
26	14	12	12	8.2	10	12	18	13	9.0	130	60	193
27	15	12	12	8.1	10	12	12	11	9.1	53	14	929
28	16	12	12	8.0	11	13	13	21	6.0	8.7	10	25
29	37	66	12	7.8	---	13	17	20	19	6.9	9.0	13
30	16	14	12	7.7	---	13	13	11	29	6.6	11	11
31	15	---	12	14	---	22	---	11	---	153	14	---
TOTAL	652.9	555	578	319.3	731.6	445	528	1241	565.3	782.2	1967.6	1444.6
MEAN	21.1	18.5	18.6	10.3	26.1	14.4	17.6	40.0	18.8	25.2	34.4	48.2
MAX	82	102	138	19	316	33	104	412	116	153	351	929
MIN	8.9	12	11	7.7	9.6	12	11	11	6.0	5.1	5.9	5.9
CFSM	.96	.84	.85	.47	1.19	.65	.80	1.82	.85	1.15	1.56	2.19
IN.	1.10	.94	.98	.54	1.24	.75	.89	2.10	.96	1.32	1.81	2.44

CAL YR 1984	TOTAL	13028.9	MEAN	35.6	MAX	781	MIN	7.7	CFSM	1.62	IN.	22.03
WTR YR 1985	TOTAL	8910.5	MEAN	24.4	MAX	929	MIN	5.1	CFSM	1.11	IN.	15.07

CRUM CREEK BASIN

01475850 CRUM CREEK NEAR NEWTOWN SQUARE, PA

Location.--Lat 39°58'35", long 75°26'13", Delaware County, Hydrologic Unit 02040202, at Castle Rock Bridge on State Highway 3, 0.6 mi upstream from Preston Run, 0.8 mi upstream from Geist Reservoir and 2.0 mi west of Newtown Square.

DRAINAGE AREA.--15.8 mi².

PERIOD OF RECORD.--Occasional low-flow measurements, water years 1932, 1949, 1970-1977, and annual maximum 1977-1981. October 1981 to current year.

GAGE.--Water-stage recorder. Datum of gage is 225.75 ft above National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 10 to 31, Feb. 6 to 10. Records fair except for periods of estimated record which are poor. Several observations of water temperature were made during the year.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 1,190 ft³/s March 21, 1983, gage height, 7.08 ft, from rating curve extended above 830 ft³/s; minimum, 3.4 ft³/s July 21, 22, 1981, minimum gage height, 2.13 ft, Aug. 10, 11, 1983.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 600 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1615	*1050	*6.91	Aug. 8	0745	943	6.57
Mar. 12	0915	*1050	6.90	Sept. 27	1345	1010	6.78

Minimum discharge, 3.4 ft³/s July 21, 22, gage height, 2.16 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	20	9.6	9.7	8.9	13	11	39	6.0	8.1	5.1	12	6.6
2	18	9.5	8.9	10	21	12	13	8.1	6.1	4.7	5.7	6.6
3	11	9.5	12	9.6	12	11	12	134	5.8	4.7	4.6	6.6
4	9.7	9.5	12	9.0	11	12	12	18	5.8	15	4.3	6.5
5	9.2	9.5	9.6	10	9.1	16	11	11	5.8	5.5	4.5	6.1
6	9.0	9.5	53	9.4	8.8	13	9.9	9.6	6.0	5.2	3.9	5.8
7	8.8	9.5	16	9.3	8.5	12	9.2	9.4	5.4	5.0	5.4	5.8
8	8.8	9.3	12	10	8.3	14	9.0	8.5	6.1	5.4	199	6.5
9	9.1	8.6	10	7.9	8.1	13	8.8	7.9	6.2	7.3	17	7.1
10	9.2	9.3	10	7.8	7.9	12	8.6	7.7	5.6	5.3	22	7.6
11	9.1	9.0	9.8	7.7	9.0	12	8.9	7.3	5.0	5.2	9.9	6.8
12	9.2	9.1	9.3	7.5	283	29	8.6	6.9	5.0	4.5	9.0	6.3
13	9.1	8.4	9.1	7.3	53	12	8.3	7.4	4.9	4.4	8.2	5.8
14	9.4	8.6	8.9	7.2	20	10	8.4	6.6	4.8	4.2	17	6.1
15	9.5	9.1	10	7.0	16	9.9	8.7	6.1	4.8	4.4	7.9	6.2
16	9.5	9.5	9.3	6.9	13	9.8	8.6	6.3	10	8.2	7.3	5.7
17	9.9	9.4	9.1	6.9	12	10	7.8	26	14	4.7	7.1	5.6
18	10	11	8.9	6.8	12	9.5	7.4	37	6.4	3.9	7.2	5.7
19	10	14	9.3	6.8	13	9.1	7.9	10	5.6	3.8	7.8	5.5
20	11	11	9.6	6.7	14	9.5	7.8	8.6	5.1	3.9	7.3	5.5
21	11	10	9.7	6.6	12	9.2	7.2	7.8	5.3	3.8	8.6	5.7
22	12	9.9	17	6.5	14	9.1	7.0	8.4	4.8	8.5	7.9	5.6
23	18	9.9	11	6.4	16	13	6.7	9.1	4.8	6.1	7.0	6.3
24	17	9.9	9.6	6.3	14	12	7.0	9.4	4.6	3.9	6.2	6.9
25	12	11	11	6.2	13	13	8.0	7.7	4.3	4.1	16	6.9
26	11	9.6	9.1	6.2	12	10	7.2	6.8	4.0	17	25	8.6
27	11	9.6	9.1	6.1	12	9.9	6.7	6.4	4.2	26	8.9	423
28	11	9.7	9.2	6.0	11	9.7	6.5	6.8	4.8	7.2	7.3	22
29	21	35	8.9	6.0	---	9.9	6.4	9.1	5.5	5.6	6.9	12
30	11	12	8.7	6.0	---	9.5	5.9	6.5	6.6	5.0	6.7	9.9
31	9.9	---	8.4	6.0	---	10	---	6.3	---	19	7.3	---
TOTAL	354.4	319.5	358.2	231.0	656.7	362.1	283.5	426.7	175.4	216.6	474.9	631.3
MEAN	11.4	10.6	11.6	7.45	23.5	11.7	9.45	13.8	5.85	6.99	15.3	21.0
MAX	21	35	53	10	283	29	39	134	14	26	199	423
MIN	8.8	8.4	8.4	6.0	7.9	9.1	5.9	6.0	4.0	3.8	3.9	5.5
CFSM	.72	.67	.73	.47	1.49	.74	.60	.87	.37	.44	.97	1.33
IN.	.83	.75	.84	.54	1.55	.85	.67	1.00	.41	.51	1.12	1.49

CAL YR 1984	TOTAL	10751.4	MEAN	29.4	MAX	535	MIN	8.4	CFSM	1.86	IN.	25.31
WTR YR 1985	TOTAL	4490.3	MEAN	12.3	MAX	423	MIN	3.8	CFSM	.78	IN.	10.57

CHESTER CREEK BASIN

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01477000 CHESTER CREEK NEAR CHESTER, PA

LOCATION.--Lat 39°52'08", long 75°24'31", Delaware County, Hydrologic Unit 02040202, on right bank 30 ft downstream from Dutton Mill Bridge and 3 mi northwest of Chester.

DRAINAGE AREA.--61.1 mi².

PERIOD OF RECORD.--August 1931 to current year. Monthly discharges only for some periods, published in WSP 1302.

REVISED RECORDS.--WDR PA-72-1: 1971.

GAGE.--Water-stage recorder. Datum of gage is 23.41 ft above Penn Central Railroad datum. Prior to June 27, 1966, water-stage recorder at site 50 ft upstream and June 28, 1966, to Oct. 4, 1967, nonrecording gage 150 ft upstream, all at same datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 10-31, Feb. 3-11, Feb. 15 to Mar. 14, May 5-16, May 19-23. Records fair except for periods of estimated discharge, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--54 years, 88.4 ft³/s, 1966 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 21,000 ft³/s Sept. 13, 1971, gage height, 24.59 ft, from floodmark, from rating curve extended above 2,400 ft³/s on basis of contracted-opening measurement at gage height 13.57 ft and slope-area measurement of peak flow; minimum, 0.3 ft³/s Aug. 7, 1934, gage height, 0.28 ft; minimum daily, 6.5 ft³/s Sept. 25, 1941.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,400 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	1545	2970	9.19	Sept. 27	1245	*3220	*9.57

Minimum discharge, 31 ft³/s, Sept. 22-24, gage height, 2.55 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	128	51	57	50	69	60	180	42	45	39	84	35
2	106	50	52	60	198	60	79	48	41	37	40	35
3	58	50	69	61	94	60	71	484	49	37	35	34
4	51	46	71	54	74	60	71	109	49	45	35	34
5	48	224	54	64	71	82	63	61	43	39	35	33
6	44	83	255	62	68	62	59	57	43	36	34	33
7	45	59	96	59	65	58	55	53	40	36	36	32
8	46	51	66	58	63	57	54	50	43	156	590	66
9	49	50	61	49	61	56	53	48	42	160	80	59
10	48	50	58	46	59	56	53	46	40	60	71	51
11	47	55	56	44	58	54	54	44	39	47	43	68
12	47	59	54	43	988	94	53	43	38	36	40	37
13	45	51	58	42	330	61	51	41	38	34	38	35
14	45	47	52	40	122	56	50	39	37	34	37	34
15	45	45	58	40	86	54	54	37	36	36	37	34
16	44	45	53	40	72	51	52	36	83	63	37	33
17	45	47	52	40	65	50	52	262	113	36	37	32
18	46	46	50	40	63	50	49	199	49	33	37	32
19	45	68	53	40	63	48	50	50	42	33	37	32
20	52	51	56	40	62	50	50	45	39	33	37	32
21	48	49	55	40	62	49	52	56	40	32	44	31
22	54	46	91	40	62	47	52	72	37	45	40	31
23	129	46	60	40	62	68	49	77	37	117	37	31
24	105	47	54	40	62	69	50	71	37	36	36	31
25	69	48	62	40	62	77	50	56	36	33	91	32
26	56	46	52	40	62	58	49	50	36	109	144	51
27	56	48	53	40	62	54	46	47	35	106	46	1890
28	51	46	52	40	61	53	43	47	35	47	38	217
29	143	162	51	40	---	53	44	49	37	38	36	92
30	66	69	49	40	---	51	42	43	47	35	36	83
31	55	---	47	48	---	53	---	42	---	98	36	---
TOTAL	1916	1835	2007	1420	3226	1812	1730	2404	1326	1717	2004	3270
MEAN	61.8	61.2	64.7	45.8	115	58.5	57.7	77.5	44.2	55.4	64.6	109
MAX	143	224	255	64	988	94	180	484	113	160	590	1890
MIN	44	45	47	40	58	47	42	36	35	32	34	31
CFSM	1.01	1.00	1.06	.75	1.88	.96	.94	1.27	.72	.91	1.06	1.78
IN.	1.17	1.12	1.22	.86	1.96	1.10	1.05	1.46	.81	1.05	1.22	1.99

CAL YR 1984	TOTAL	47566	MEAN	130	MAX	1580	MIN	43	CFSM	2.13	IN.	28.96
WTR YR 1985	TOTAL	24667	MEAN	67.6	MAX	1890	MIN	31	CFSM	1.11	IN.	15.02

DELAWARE RIVER BASIN

01477050 DELAWARE RIVER AT CHESTER, PA

LOCATION.--Lat 39°50'33", long 75°21'28", Delaware County, Hydrologic Unit 02040202, in the pumping house of Scott Paper Company.

DRAINAGE AREA.--10,300 mi².

PERIOD OF RECORD.--December 1961 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: October 1963 to current year.

pH: January 1968 to current year.

WATER TEMPERATURE: December 1961 to current year.

DISSOLVED OXYGEN: December 1961 to current year.

INSTRUMENTATION.--Water-quality monitor since December 1961.

REMARKS.--Prior to April 1981, sampling site was located at (latitude 39°50'12", longitude 75°22'00") auxiliary tidal-gaging station at the end of Reynolds Aluminum Company pier, 0.5 mi downstream from Chester Creek in Chester. Station not operated Nov. 14 to Feb. 28. Other interruptions in the record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 5,900 microsiemens Oct. 7, 1965; minimum, 103 microsiemens June 2, 1984.

pH: Maximum, 8.7 Sept. 13, 14, 1971 and Oct. 16, 1979; minimum 5.5 Dec. 10, 11, 1969.

WATER TEMPERATURE: Maximum, 33.0°C July 21, 1977; minimum, 0.0°C on many days during winter months.

DISSOLVED OXYGEN: Maximum, 13.5 mg/L Apr. 20, 1979; minimum, 0.0 mg/L on many days.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	1840	580	1010	1850	765	1150						
2	1220	555	864	1620	775	1100						
3	1180	510	756	1740	665	1050						
4	1060	470	664	1850	745	1220						
5	1260	485	734	1780	755	1170						
6	1220	515	779	1440	635	953						
7	1300	495	771	1170	590	863						
8	1250	515	792	1450	605	904						
9	1200	530	801	1640	640	966						
10	1430	560	872	1430	635	941						
11	1480	610	947	1540	640	957						
12	1520	615	950	1130	565	820						
13	2160	645	1130	965	530	---						
14	2580	835	1490	---	---	---						
15	2430	920	1490	---	---	---						
16	2270	920	1400	---	---	---						
17	2260	925	1400	---	---	---						
18	2210	920	1390	---	---	---						
19	2530	910	1430	---	---	---						
20	2160	925	1390	---	---	---						
21	2340	910	1380	---	---	---						
22	2310	905	1370	---	---	---						
23	2050	800	1300	---	---	---						
24	2050	745	1270	---	---	---						
25	1910	600	1260	---	---	---						
26	1950	790	1210	---	---	---						
27	2100	785	1210	---	---	---						
28	2190	835	1290	---	---	---						
29	1900	855	1240	---	---	---						
30	1980	825	1210	---	---	---						
31	1760	795	1210	---	---	---						
MONTH	2580	470	1130	1850	530	1010						

DELAWARE RIVER BASIN

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SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				358	345	352	283	270	277	303	234	292
2				358	333	346	277	268	273	352	292	304
3				339	320	332	281	270	274	389	267	306
4				336	310	327	281	270	275	346	285	302
5				335	309	325	286	271	277	305	287	298
6				319	305	313	283	270	277	302	274	288
7				324	302	315	278	265	272	298	268	283
8				325	306	317	252	272	277	300	266	282
9				321	304	314	284	273	279	302	264	285
10				346	291	308	294	274	283	304	257	281
11				307	283	301	298	285	291	279	254	269
12				308	288	301	295	257	277	279	258	268
13				292	282	286	286	255	269	274	250	265
14				292	272	280	271	263	267	279	260	268
15				286	261	271	272	265	269	292	267	277
16				268	247	260	270	246	258	293	266	275
17				263	239	253	256	248	252	---	---	---
18				247	236	242	258	250	254	---	---	---
19				247	236	242	273	251	263	---	---	---
20				257	242	249	272	266	270	---	---	---
21				256	240	248	274	266	271	---	---	---
22				268	242	255	278	266	272	---	---	---
23				270	257	264	280	266	273	---	---	---
24				269	258	263	290	280	285	---	---	---
25				270	255	261	286	266	276	331	282	303
26				277	251	260	281	265	273	321	293	303
27				267	251	259	285	272	279	325	296	304
28				265	251	259	298	275	286	327	295	310
29				267	250	258	302	272	290	383	320	354
30				284	249	271	305	281	292	402	283	301
31				285	260	273	---	---	---	328	286	303
MONTH				358	236	284	305	246	274	402	250	292
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	332	289	302	772	373	490	844	408	542	1700	650	950
2	329	285	301	815	395	533	778	410	539	1800	700	1100
3	339	289	306	828	347	511	822	407	544	1500	700	1000
4	342	287	305	798	347	488	685	405	518	1500	700	1100
5	378	288	311	798	365	511	635	407	501	1500	700	1000
6	360	290	311	824	368	529	609	415	505	1600	700	1000
7	345	290	310	698	373	515	635	417	509	1800	700	1100
8	342	292	312	740	382	533	551	322	437	1700	750	1100
9	334	297	312	728	381	538	453	338	389	1800	700	1100
10	352	294	318	759	394	554	481	334	390	2000	750	1200
11	358	294	319	714	385	525	477	335	392	2100	700	1200
12	352	299	316	858	394	---	519	333	392	2200	750	1200
13	344	300	319	837	406	550	537	341	405	1800	700	1100
14	338	303	318	826	418	574	606	337	413	1900	700	1200
15	374	303	324	838	436	576	548	340	414	2000	750	1200
16	426	306	342	850	423	565	581	343	425	2200	750	1300
17	413	304	332	857	420	567	691	353	477	2700	900	1500
18	417	306	339	990	435	597	860	371	549	2800	1000	1600
19	390	308	335	983	423	604	974	391	617	2800	1000	1700
20	389	308	333	914	432	601	1060	416	660	2900	1100	1700
21	376	308	331	847	442	620	1000	431	647	3000	1200	1800
22	384	308	337	1040	443	664	1080	431	687	3400	1200	1900
23	397	316	344	971	438	654	1400	442	780	3900	1400	2100
24	389	320	348	1070	474	710	1600	550	850	3900	1500	2300
25	374	314	342	1100	512	724	1200	600	650	3700	1500	2200
26	467	318	361	1070	479	705	---	---	---	3700	1700	2400
27	831	321	428	788	426	573	---	---	---	3700	500	1600
28	666	334	459	821	413	554	---	---	---	743	307	456
29	674	339	439	911	418	574	---	---	---	351	253	291
30	694	335	434	943	408	563	---	---	---	270	219	250
31	---	---	---	909	417	585	---	---	---	---	---	---
MONTH	831	285	340	1100	347	576	1600	322	529	3900	219	1280

DELAWARE RIVER BASIN

01477050 DELAWARE RIVER AT CHESTER, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.2	6.9	7.0	7.0	6.8	6.9						
2	7.1	6.9	7.0	7.0	6.8	6.9						
3	7.2	6.9	7.0	7.1	6.8	6.9						
4	7.1	7.0	7.0	7.1	6.9	7.0						
5	7.1	6.9	7.0	7.1	6.9	7.0						
6	7.1	6.9	7.0	7.1	6.9	7.0						
7	7.1	6.9	7.0	7.0	6.9	6.9						
8	7.1	6.9	7.0	7.1	6.9	7.0						
9	7.1	6.8	7.0	7.1	6.9	7.0						
10	7.1	6.8	6.9	7.1	6.9	7.0						
11	7.0	6.8	6.9	7.1	6.9	7.0						
12	7.0	6.8	6.9	7.1	6.9	7.0						
13	7.1	6.8	7.0	7.0	6.9	7.0						
14	7.2	7.0	7.1	---	---	---						
15	7.2	7.0	7.1	---	---	---						
16	7.1	6.9	7.0	---	---	---						
17	7.1	6.9	7.0	---	---	---						
18	7.1	6.9	7.0	---	---	---						
19	7.1	6.9	7.0	---	---	---						
20	7.0	6.8	6.9	---	---	---						
21	7.0	6.8	6.9	---	---	---						
22	7.0	6.8	6.9	---	---	---						
23	7.0	6.8	6.9	---	---	---						
24	7.0	6.8	6.9	---	---	---						
25	7.0	6.8	6.9	---	---	---						
26	7.0	6.8	6.9	---	---	---						
27	7.0	6.8	6.9	---	---	---						
28	7.0	6.8	6.9	---	---	---						
29	6.9	6.8	6.9	---	---	---						
30	7.0	6.8	6.9	---	---	---						
31	6.9	6.8	6.8	---	---	---						
MONTH	7.2	6.8	7.0	7.1	6.8	7.0						
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	6.8	6.8	6.8	6.8	6.5	6.5
2				---	6.8	6.8	6.9	6.8	6.8	6.8	6.5	6.6
3				6.8	6.8	6.8	6.9	6.8	6.8	6.8	6.6	6.7
4				6.9	6.8	6.8	6.8	6.8	6.8	6.7	6.6	6.7
5				6.9	6.8	6.8	6.9	6.7	6.8	6.7	6.7	6.7
6				6.9	6.8	6.9	6.9	6.8	6.9	7.0	6.6	6.6
7				6.9	6.8	6.9	6.9	6.8	6.9	6.7	6.6	6.6
8				6.9	6.8	6.9	6.9	6.8	6.9	6.7	6.6	6.6
9				6.9	6.8	6.8	6.9	6.8	6.8	6.6	6.6	6.6
10				6.9	6.8	6.8	6.9	6.8	6.8	6.6	6.6	6.6
11				6.8	6.7	6.8	6.9	6.8	6.9	6.6	6.6	6.6
12				6.9	6.8	6.8	6.9	6.8	6.9	6.7	6.6	6.6
13				6.9	6.8	6.9	6.9	6.8	6.9	6.7	6.6	6.7
14				6.9	6.8	6.9	6.9	6.9	6.9	6.7	6.6	6.7
15				6.9	6.8	6.8	6.9	6.8	6.8	6.8	6.7	6.7
16				6.8	6.8	6.8	6.8	6.8	6.8	7.0	6.7	6.7
17				6.8	6.8	6.8	6.8	6.7	6.8	---	---	---
18				6.8	6.8	6.8	6.7	6.7	6.7	---	---	---
19				6.9	6.8	6.8	6.7	6.6	6.7	---	---	---
20				6.9	6.8	6.8	6.7	6.6	6.6	---	---	---
21				6.9	6.8	6.8	6.6	6.5	6.5	---	---	---
22				6.8	6.8	6.8	6.5	6.5	6.5	---	---	---
23				6.8	6.8	6.8	6.5	6.5	6.5	---	---	---
24				6.8	6.8	6.8	6.6	6.5	6.5	---	---	---
25				6.8	6.8	6.8	6.6	6.6	6.6	6.6	6.5	6.6
26				6.8	6.8	6.8	6.6	6.5	6.6	6.6	6.5	6.5
27				6.8	6.8	6.8	6.6	6.5	6.6	6.5	6.5	6.5
28				6.8	6.8	6.8	6.9	6.5	6.6	6.5	6.5	6.5
29				6.8	6.8	6.8	6.6	6.5	6.5	6.6	6.5	6.5
30				6.8	6.8	6.8	6.6	6.5	6.5	6.6	6.5	6.5
31				6.8	6.7	6.8	---	---	---	6.6	6.5	6.5
MONTH				6.9	6.7	6.8	6.9	6.5	6.7	7.0	6.5	6.6

DELAWARE RIVER BASIN

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01477050 DELAWARE RIVER AT CHESTER, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	6.6	6.5	6.5	6.9	6.6	6.7	6.9	6.7	6.8	---	---	---
2	6.6	6.5	6.5	6.9	6.6	6.7	6.8	6.6	6.7	7.0	6.8	6.9
3	6.5	6.5	6.5	6.9	6.6	6.7	6.9	6.7	6.8	7.0	6.8	6.8
4	6.5	6.5	6.5	6.9	6.6	6.7	6.8	6.7	6.8	7.0	6.8	6.9
5	6.5	6.5	6.5	6.8	6.6	6.7	6.8	6.7	6.8	7.0	6.8	6.9
6	6.5	6.4	6.5	6.9	6.7	6.8	6.8	6.7	6.8	7.0	6.8	6.9
7	6.5	6.5	6.5	6.8	6.7	6.8	6.8	6.8	6.8	7.0	6.8	6.9
8	6.5	6.5	6.5	6.9	6.7	6.8	6.9	6.7	6.8	7.0	6.8	6.9
9	6.5	6.5	6.5	6.8	6.7	6.8	6.8	6.6	6.7	7.0	6.8	6.9
10	6.6	6.5	6.5	6.8	6.7	6.8	6.8	6.7	6.7	7.0	6.8	6.9
11	6.7	6.5	6.5	6.8	6.7	6.7	6.8	6.7	6.7	7.0	6.8	6.9
12	6.6	6.5	6.6	6.9	6.7	6.8	6.8	6.7	6.7	7.1	6.8	6.9
13	7.0	6.5	6.6	6.9	6.7	6.8	6.8	6.7	6.7	7.0	6.8	6.9
14	6.7	6.6	6.7	6.9	6.7	6.8	6.8	6.7	6.7	7.1	6.9	7.0
15	6.7	6.6	6.7	6.9	6.7	6.8	6.8	6.7	6.7	7.1	6.9	7.0
16	6.7	6.6	6.7	6.9	6.7	6.8	6.8	6.7	6.7	7.1	6.9	7.0
17	6.7	6.6	6.6	6.9	6.7	6.8	6.8	6.7	6.8	7.1	6.9	7.0
18	6.7	6.6	6.6	6.9	6.7	6.8	6.9	6.7	6.8	7.1	6.9	7.0
19	6.7	6.6	6.6	6.9	6.7	6.8	6.9	6.7	6.8	7.1	6.9	7.0
20	6.7	6.6	6.6	6.9	6.7	6.8	6.9	6.7	6.8	7.1	6.9	7.0
21	6.7	6.6	6.6	6.9	6.7	6.8	6.9	6.7	6.8	7.1	6.9	7.0
22	6.7	6.6	6.7	6.9	6.7	6.8	6.9	6.7	6.8	7.1	6.9	7.0
23	6.7	6.7	6.7	6.9	6.8	6.8	6.9	6.7	6.8	7.1	6.9	7.0
24	6.8	6.7	6.7	6.9	6.8	6.9	7.0	6.7	6.8	7.1	7.0	7.0
25	6.7	6.7	6.7	7.0	6.8	6.9	6.9	6.7	6.8	7.1	7.0	7.0
26	6.8	6.5	6.7	7.0	6.9	6.9	---	---	---	7.1	7.0	7.1
27	6.9	6.7	6.8	7.0	6.8	6.9	---	---	---	7.2	6.9	7.0
28	6.9	6.7	6.8	6.9	6.8	6.9	---	---	---	7.0	6.7	6.8
29	6.9	6.6	6.7	7.0	6.7	6.8	---	---	---	6.7	6.7	6.7
30	6.9	6.6	6.7	6.9	6.7	6.8	---	---	---	6.7	6.6	6.7
31	---	---	---	6.9	6.7	6.8	---	---	---	---	---	---
MONTH	7.0	6.4	6.6	7.0	6.6	6.8	7.0	6.6	6.8	7.2	6.6	6.9

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	20.0	19.5	19.5	20.0	19.0	19.5						
2	19.5	19.0	19.0	20.0	18.5	19.5						
3	19.5	18.5	18.5	19.0	18.0	18.0						
4	19.0	18.0	18.5	18.5	17.5	18.0						
5	19.5	18.0	18.5	18.5	17.5	18.0						
6	18.5	18.0	18.5	18.0	17.0	17.5						
7	18.5	17.5	18.0	17.0	16.5	17.0						
8	18.5	17.5	18.0	16.5	16.0	16.0						
9	19.0	18.0	18.5	16.5	15.5	16.0						
10	19.0	18.0	18.5	16.5	15.5	16.0						
11	19.0	18.0	18.5	16.5	15.5	16.0						
12	19.0	18.5	18.5	16.0	15.0	15.5						
13	19.0	18.0	18.5	---	---	---						
14	18.5	18.0	18.0	---	---	---						
15	18.5	17.5	18.0	---	---	---						
16	18.5	18.0	18.0	---	---	---						
17	18.5	18.0	18.5	---	---	---						
18	19.0	18.0	18.5	---	---	---						
19	19.5	18.5	19.0	---	---	---						
20	19.5	18.5	19.0	---	---	---						
21	20.0	18.5	19.5	---	---	---						
22	20.0	19.0	19.5	---	---	---						
23	20.0	19.0	19.5	---	---	---						
24	19.5	18.5	19.0	---	---	---						
25	19.5	18.5	19.0	---	---	---						
26	19.5	18.5	19.0	---	---	---						
27	19.5	19.0	19.0	---	---	---						
28	20.0	19.0	19.5	---	---	---						
29	20.0	19.5	19.5	---	---	---						
30	20.0	19.5	19.5	---	---	---						
31	20.0	19.5	19.5	---	---	---						
MONTH	20.0	17.5	19.0	20.0	14.5	17.0						

DELAWARE RIVER BASIN

01477050 DELAWARE RIVER AT CHESTER, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				7.0	6.5	---	10.5	10.0	10.0	18.5	17.5	18.0
2				7.5	6.5	7.0	10.5	9.5	10.0	18.0	17.0	17.5
3				7.5	6.5	7.0	10.0	9.5	10.0	17.0	16.0	16.5
4				7.0	6.5	7.0	10.0	9.5	10.0	17.5	16.0	16.5
5				8.0	7.0	7.5	11.0	9.5	10.5	18.0	16.5	17.0
6				8.0	7.0	7.5	11.5	10.5	11.0	18.0	17.5	17.5
7				8.0	7.0	7.5	11.5	10.5	11.0	18.0	17.5	17.5
8				8.0	7.0	7.5	11.0	10.5	11.0	18.0	17.5	17.5
9				8.5	7.5	8.0	11.0	10.5	10.5	18.0	17.5	18.0
10				9.0	7.5	8.5	11.0	10.0	10.5	19.0	17.5	18.5
11				9.0	8.0	8.5	11.0	10.0	10.5	20.0	18.5	19.0
12				9.0	8.5	9.0	11.5	10.5	11.0	20.5	19.0	19.5
13				9.0	8.5	8.5	12.5	11.0	11.5	21.0	19.5	20.0
14				9.0	8.5	9.0	12.5	11.5	12.0	21.5	20.0	21.0
15				9.0	8.5	8.5	13.0	12.0	12.5	21.5	20.5	20.5
16				9.0	8.0	8.5	13.5	12.0	13.0	21.5	20.5	21.0
17				9.0	8.5	9.0	13.5	12.5	13.0	---	---	---
18				9.0	8.0	8.5	14.0	12.5	13.0	---	---	---
19				8.5	7.5	8.0	14.5	13.5	14.0	---	---	---
20				9.0	8.0	8.5	15.5	14.0	14.5	---	---	---
21				8.5	8.0	8.5	16.0	14.5	15.0	---	---	---
22				8.5	8.0	8.5	16.5	15.0	16.0	---	---	---
23				8.5	8.0	8.5	17.0	15.5	16.5	---	---	---
24				8.5	8.0	8.5	19.5	16.0	16.0	---	---	---
25				9.0	8.0	8.5	16.5	16.0	16.0	21.5	20.5	21.0
26				9.0	8.0	8.5	17.0	16.0	16.5	22.0	21.0	21.5
27				9.5	8.0	9.0	17.0	16.0	16.5	22.5	21.0	22.0
28				10.0	9.0	9.5	17.5	16.5	17.0	23.0	22.0	22.0
29				11.0	9.5	10.0	17.5	16.5	17.0	22.0	21.5	22.0
30				10.5	10.0	10.5	18.0	16.5	17.5	22.5	21.5	22.0
31				10.5	10.0	10.0	---	---	---	22.5	21.5	22.0
MONTH				11.0	6.5	8.5	19.5	9.5	13.0	23.0	16.0	19.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	22.5	22.0	22.0	23.5	23.0	23.0	27.5	26.5	27.0	---	---	---
2	23.0	22.0	22.5	24.0	23.0	23.5	27.0	26.5	27.0	26.0	25.5	26.0
3	23.5	22.5	22.5	24.5	23.0	23.5	27.0	26.5	26.5	26.5	25.5	26.0
4	23.5	22.5	23.0	24.5	23.5	24.0	27.0	26.5	26.5	27.0	26.0	26.5
5	23.0	22.5	22.5	25.0	24.0	24.5	27.0	26.5	26.5	27.5	26.5	27.0
6	23.0	22.5	22.5	25.0	24.0	24.5	27.0	26.5	27.0	27.5	26.5	27.0
7	23.0	22.0	22.5	25.0	24.5	24.5	27.5	26.5	27.0	27.5	27.0	27.0
8	22.5	22.5	22.5	25.0	24.5	24.5	27.5	26.5	27.0	27.5	27.0	27.5
9	23.0	22.0	22.5	25.0	24.5	24.5	27.5	27.0	27.0	28.0	27.0	27.5
10	23.5	22.5	23.0	25.0	24.5	25.0	28.0	27.0	27.5	28.0	27.0	27.5
11	24.0	23.0	23.5	25.5	25.0	25.0	28.0	27.5	27.5	27.5	26.5	27.0
12	24.0	23.5	23.5	26.0	25.0	---	28.0	27.5	27.5	26.5	26.0	26.0
13	23.5	23.0	23.0	26.0	25.0	25.5	28.5	27.0	27.5	26.0	24.5	25.0
14	23.0	22.0	22.5	26.5	25.5	26.0	29.0	27.5	28.0	24.5	23.5	24.5
15	23.0	22.0	22.5	27.0	26.0	26.5	29.5	28.0	28.5	24.5	23.5	24.0
16	23.5	22.5	22.5	27.5	26.0	26.5	29.0	28.0	28.5	24.0	23.5	24.0
17	23.5	22.5	23.0	27.0	26.0	26.5	28.5	28.0	28.0	24.0	23.5	24.0
18	24.0	22.5	23.0	27.5	26.0	26.5	28.0	27.0	27.5	24.5	23.5	24.0
19	24.0	23.0	23.5	27.5	26.5	27.0	28.0	27.0	27.5	24.5	23.5	24.0
20	23.5	23.0	23.5	27.5	26.5	27.0	27.5	27.0	27.5	25.0	23.5	24.0
21	23.5	23.0	23.5	27.5	26.5	27.0	27.5	26.5	27.0	24.5	23.5	24.0
22	24.0	23.0	23.5	28.0	27.0	27.5	27.0	26.5	27.0	24.5	23.5	24.0
23	24.5	23.5	24.0	27.5	27.0	27.5	27.0	26.0	26.5	24.0	23.5	24.0
24	25.0	24.0	24.5	28.0	27.0	27.5	27.0	26.0	26.5	24.5	23.5	24.0
25	25.0	24.0	24.5	28.0	27.0	27.5	---	---	---	24.0	23.5	23.5
26	24.5	23.5	24.0	27.5	27.0	27.5	---	---	---	23.5	23.0	23.5
27	23.5	23.0	23.5	27.5	27.0	27.5	---	---	---	23.0	21.5	22.5
28	23.5	23.0	23.0	27.5	26.5	27.0	---	---	---	22.0	21.5	21.5
29	23.5	22.5	23.0	27.5	27.0	27.0	---	---	---	22.0	21.0	21.5
30	23.5	23.0	23.0	28.0	26.5	27.0	---	---	---	22.0	21.0	21.5
31	---	---	---	27.5	27.0	27.5	---	---	---	---	---	---
MONTH	25.0	22.0	23.0	28.0	23.0	26.0	29.5	26.0	27.0	28.0	21.0	25.0

DELAWARE RIVER BASIN

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01477050 DELAWARE RIVER AT CHESTER, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	5.5	4.0	4.8	3.6	1.3	2.7						
2	5.3	4.3	4.8	3.7	2.4	3.1						
3	5.8	4.1	5.0	4.5	2.5	3.4						
4	5.7	4.7	5.2	4.9	3.2	4.1						
5	5.7	4.3	5.1	4.9	3.8	4.4						
6	5.8	4.1	5.1	4.6	3.2	3.9						
7	5.9	4.0	5.1	4.6	2.8	3.8						
8	5.7	4.1	5.0	5.0	3.2	4.1						
9	5.5	3.5	4.6	5.2	3.2	4.2						
10	5.1	3.2	4.2	5.1	3.4	4.3						
11	4.8	2.9	4.0	5.0	3.5	4.3						
12	4.6	2.7	3.7	4.9	3.6	4.3						
13	5.3	2.7	4.1	4.8	4.0	4.5						
14	5.8	4.2	4.9	---	---	---						
15	5.7	4.3	5.0	---	---	---						
16	5.4	3.9	4.7	---	---	---						
17	5.1	3.6	4.4	---	---	---						
18	4.8	3.2	4.0	---	---	---						
19	4.8	2.8	3.8	---	---	---						
20	4.3	2.6	3.5	---	---	---						
21	4.4	2.1	3.3	---	---	---						
22	4.4	2.4	3.3	---	---	---						
23	4.1	1.8	3.0	---	---	---						
24	3.9	1.6	2.8	---	---	---						
25	3.7	1.5	2.7	---	---	---						
26	3.7	1.9	2.8	---	---	---						
27	3.7	1.6	2.7	---	---	---						
28	3.6	1.6	2.6	---	---	---						
29	3.0	1.5	2.2	---	---	---						
30	3.4	1.1	2.2	---	---	---						
31	3.2	1.4	2.4	---	---	---						
MONTH	5.9	1.1	3.9	5.2	1.3	3.9						
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				9.9	9.7	---	10.0	9.3	9.7	6.6	5.7	6.1
2				9.9	9.6	9.7	10.0	9.2	9.6	7.0	5.7	6.4
3				9.7	9.4	9.6	9.9	9.2	9.6	7.3	6.7	6.9
4				9.8	9.4	9.6	10.1	9.2	9.7	6.8	5.5	6.2
5				10.1	9.7	9.9	9.7	8.8	9.5	6.4	5.4	5.8
6				10.1	9.8	9.9	9.7	9.1	9.4	5.8	5.1	5.4
7				10.1	9.8	9.9	9.6	9.1	9.4	5.6	4.5	5.0
8				10.0	9.7	9.9	9.6	9.0	9.4	5.8	4.7	5.2
9				10.0	9.3	9.6	9.5	9.0	9.2	6.0	4.8	5.3
10				9.7	9.1	9.4	9.8	9.0	9.4	6.2	5.0	5.6
11				9.3	8.8	9.2	10.0	9.4	9.6	6.3	5.2	5.7
12				9.9	9.2	9.5	10.1	9.2	9.6	7.1	5.3	6.0
13				10.3	9.6	9.9	10.1	9.3	9.7	7.3	5.4	6.3
14				10.1	9.7	9.9	10.0	9.3	9.6	7.3	5.6	6.3
15				10.1	9.7	9.9	9.5	8.8	9.2	7.7	5.9	6.5
16				10.1	9.8	9.9	8.8	8.2	8.5	7.0	5.7	6.4
17				10.0	9.7	9.8	8.3	7.8	8.1	---	---	---
18				10.3	9.8	10.0	7.9	7.5	7.6	---	---	---
19				10.3	10.0	10.1	7.5	6.9	7.1	---	---	---
20				10.3	10.0	10.1	7.0	6.6	6.8	---	---	---
21				10.2	10.0	10.1	6.7	6.0	6.3	---	---	---
22				10.2	9.9	10.1	6.2	5.7	5.9	---	---	---
23				10.3	10.1	10.2	6.0	5.4	5.7	---	---	---
24				10.1	9.9	10.1	6.1	5.8	5.9	---	---	---
25				10.2	9.7	10.0	6.0	5.4	5.7	4.1	3.3	3.5
26				10.1	9.9	10.0	5.8	5.1	5.4	3.5	3.0	3.2
27				10.1	9.8	10.0	5.9	5.3	5.5	3.6	2.9	3.2
28				10.1	9.8	9.9	5.9	5.5	5.7	3.4	2.6	2.9
29				9.9	9.6	9.7	6.3	5.6	5.9	3.3	2.5	2.9
30				9.8	9.4	9.6	6.6	5.6	6.0	3.5	2.7	3.0
31				9.7	9.3	9.5	---	---	---	3.2	2.6	2.9
MONTH				10.3	8.8	9.8	10.1	5.1	8.0	7.7	2.5	5.1

DELAWARE RIVER BASIN

01477050 DELAWARE RIVER AT CHESTER, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	3.6	2.6	3.0	4.8	2.7	3.8	4.0	2.5	3.5	---	---	---
2	3.2	2.0	2.5	4.8	2.7	3.8	3.9	2.6	3.4	4.8	3.8	4.4
3	2.6	1.4	1.9	4.5	2.6	3.7	3.9	2.8	3.5	4.5	3.4	4.1
4	2.2	1.0	1.5	4.5	2.4	3.6	4.3	3.2	3.7	4.5	3.4	4.1
5	2.2	.9	1.3	4.1	2.3	3.4	4.4	3.6	3.9	4.5	3.1	3.9
6	1.9	.9	1.3	4.1	2.8	3.6	4.4	3.6	4.0	4.4	3.3	4.0
7	2.0	1.2	1.5	4.0	3.3	3.6	4.4	3.8	4.1	4.5	3.4	3.9
8	2.0	1.3	1.7	4.1	3.4	3.8	4.3	3.9	4.1	4.4	3.5	4.0
9	2.0	1.3	1.7	4.1	3.4	3.8	3.9	3.2	3.5	4.1	3.0	3.6
10	2.1	1.3	1.6	4.1	3.2	3.6	3.4	2.9	3.2	4.0	2.8	3.4
11	2.1	1.1	1.7	3.8	2.9	3.4	3.4	2.7	3.1	4.2	2.1	3.3
12	2.6	1.5	2.1	4.0	2.9	---	3.9	2.6	3.1	4.3	2.6	3.5
13	3.3	1.7	2.5	3.8	2.6	3.2	4.1	2.9	3.4	4.3	2.5	3.7
14	4.3	2.9	3.6	4.2	2.6	3.6	4.0	2.9	3.4	4.9	3.2	4.3
15	4.5	3.4	4.1	4.2	3.2	3.8	4.1	2.9	3.4	5.1	3.6	4.6
16	4.6	3.2	4.0	4.3	3.1	3.7	3.8	3.0	3.4	5.1	3.8	4.7
17	4.4	2.8	3.6	4.2	2.5	3.5	4.0	2.8	3.3	5.5	4.1	4.8
18	4.4	2.6	3.4	4.3	2.6	3.6	3.8	3.0	3.5	5.2	4.0	4.8
19	4.2	2.3	3.3	4.4	3.0	3.9	3.9	3.2	3.7	5.0	4.0	4.6
20	3.8	2.3	3.1	4.4	3.5	4.0	3.9	2.9	3.5	4.8	4.1	4.3
21	3.7	2.6	3.2	4.2	3.1	3.8	3.7	2.5	3.3	4.8	4.1	4.4
22	4.1	2.6	3.5	4.3	3.6	4.0	3.8	2.6	3.3	4.6	3.8	4.2
23	4.3	3.7	4.0	4.4	3.8	4.1	3.9	2.6	3.3	5.0	3.8	4.4
24	4.1	3.7	3.9	4.7	3.9	4.3	4.2	2.9	3.6	5.1	4.2	4.7
25	4.1	3.6	3.9	5.0	4.3	4.6	---	---	---	5.1	4.0	4.7
26	4.5	3.7	4.0	5.7	4.8	5.4	---	---	---	5.2	4.4	4.8
27	5.0	3.7	4.3	5.1	4.6	4.8	---	---	---	6.0	4.7	5.4
28	4.9	3.7	4.4	5.0	3.6	4.5	---	---	---	4.9	3.6	4.2
29	4.9	3.3	4.1	4.8	3.3	4.1	---	---	---	4.7	3.2	3.9
30	4.8	2.7	3.8	4.6	3.0	4.0	---	---	---	4.4	3.7	4.1
31	---	---	---	4.3	2.6	3.6	---	---	---	---	---	---
MONTH	5.0	.9	3.0	5.7	2.3	3.9	4.4	2.5	3.5	6.0	2.1	4.2

CHRISTINA RIVER BASIN

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01480300 WEST BRANCH BRANDYWINE CREEK NEAR HONEY BROOK, PA

LOCATION.--Lat 40°04'22", long 75°51'40", Chester County, Hydrologic Unit 02040205, at right upstream end of bridge on Legislative Route 15185, at Birdell, 0.4 mi downstream from Two Log Run, and 3.0 mi southeast of Honey Brook.

DRAINAGE AREA.--18.7 mi².

PERIOD OF RECORD.--June 1960 to current year.

REVISED RECORDS.--WDR PA-73-1: 1972(P).

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is 591.20 ft National Geodetic Vertical Datum of 1929.

REMARKS.--Estimated daily discharges during water year: Jan. 11 to Feb. 11, Feb. 15-17. Records good except for periods of estimated record, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--25 years, 26.2 ft³/s, 19.03 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,140 ft³/s June 22, 1972, July 1, 1984, gage height, 11.41 ft, from rating curve extended above 1,900 ft³/s on basis of slope-area measurement of peak flow; minimum, 1.7 ft³/s Aug. 15-19, 1963; minimum gage height, 1.07 ft Feb. 21, 22, 1977, result of freezeup.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 500 ft³/s and maximum (*):

Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)	Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)
Feb. 12	2015	882	6.97	Sept. 27	1530	*2000	*8.48
July 7	0015	650	6.38				

Minimum daily discharge, 5.5 ft³/s Sept. 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	11	18	34	18	18	16	28	9.1	9.6	7.5	38	7.5
2	13	17	31	36	26	16	17	15	8.5	7.1	13	7.4
3	14	17	29	25	22	14	17	117	9.1	7.0	11	7.7
4	14	16	25	20	19	15	17	26	9.6	10	9.8	7.5
5	14	17	20	22	18	19	16	16	9.7	7.4	9.8	7.0
6	13	19	81	19	16	15	15	15	9.8	57	9.2	6.5
7	13	19	29	22	15	14	14	15	8.1	124	9.0	6.4
8	12	18	21	21	15	17	14	13	8.5	26	37	7.1
9	12	18	20	18	14	15	15	12	8.6	24	13	7.7
10	12	18	21	15	14	14	14	11	8.5	13	10	8.3
11	12	18	21	14	13	15	13	10	7.9	12	9.5	8.1
12	12	18	19	13	324	25	13	9.8	7.9	9.7	9.2	6.8
13	12	18	19	13	129	17	12	14	7.1	8.5	8.6	6.0
14	12	17	17	12	49	15	12	11	7.2	8.1	8.6	6.0
15	11	17	19	12	29	14	13	9.8	7.0	17	8.4	5.9
16	11	17	18	11	23	13	13	9.8	36	57	7.6	6.4
17	11	17	18	10	21	14	13	19	40	12	7.7	6.2
18	11	17	18	9.8	20	14	11	33	13	9.5	7.5	5.7
19	11	17	20	9.4	21	13	11	13	10	8.6	8.0	6.2
20	11	17	21	9.0	21	13	10	11	9.8	7.6	8.3	5.6
21	11	17	22	8.6	20	13	10	16	9.3	7.4	8.2	5.5
22	11	16	37	8.4	27	12	11	32	7.9	12	8.7	5.6
23	23	16	21	8.2	37	20	10	18	7.5	8.6	8.1	6.6
24	24	16	20	8.0	32	20	10	18	7.7	7.6	7.6	6.9
25	23	16	20	7.9	27	21	11	12	7.1	11	14	6.0
26	17	16	17	7.7	22	15	11	11	6.8	38	19	6.8
27	16	16	18	7.6	21	15	9.5	9.5	6.5	133	9.9	627
28	14	16	18	7.4	17	15	9.3	11	7.2	17	8.6	48
29	46	208	17	7.3	---	16	9.6	13	7.6	13	8.2	17
30	25	54	17	7.2	---	14	9.4	10	7.4	11	8.2	15
31	20	---	17	11	---	15	---	9.9	---	23	7.7	---
TOTAL	472	741	725	418.5	1030	484	388.8	549.8	310.9	714.6	351.4	881.4
MEAN	15.2	24.7	23.4	13.5	36.8	15.6	13.0	17.7	10.4	23.1	11.3	29.4
MAX	46	208	81	36	324	25	28	117	40	133	38	627
MIN	11	16	17	7.2	13	12	9.3	9.1	6.5	7.0	7.5	5.5
CFSM	.81	1.32	1.25	.72	1.97	.83	.70	.95	.56	1.24	.60	1.57
IN.	.94	1.47	1.44	.83	2.05	.96	.77	1.09	.62	1.42	.70	1.75

CAL YR 1984	TOTAL	14587	MEAN	39.9	MAX	1220	MIN	11	CFSM	2.13	IN.	29.02
WTR YR 1985	TOTAL	7067.5	MEAN	19.4	MAX	627	MIN	5.5	CFSM	1.04	IN.	14.06

01480500 WEST BRANCH BRANDYWINE CREEK AT COATESVILLE, PA

LOCATION.--Lat 39°59'08", long 75°49'40", Chester County, Hydrologic Unit 02040205, on right bank at city limits of Coatesville, 1,200 ft upstream from bridge on old Lincoln Highway, and 0.6 mi downstream from Rock Run.

DRAINAGE AREA.--45.8 mi².

PERIOD OF RECORD.--October 1943 to December 1951, January 1970 to current year.

GAGE.--Water-stage recorder and V-notch sharp crested weir. Altitude of gage is 305 ft, from topographic map. Sept. 10, 1943, to Dec. 31, 1951, nonrecording gage at site 1,100 ft downstream at different datum.

REMARKS.--Estimated daily discharges during the water year: Oct. 19 to Nov. 30, Jan. 11-30, Feb. 5-11. Records good except for periods of estimated record, which are poor. Diversion above station from Rock Run Reservoir, capacity, 320 mil gal 2.6 mi upstream for municipal supply of City of Coatesville. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--23 years (water years 1943-51, 1970-85), 72.8 ft³/s, 21.5¢ in/yr, adjusted for storage and diversion.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,100 ft³/s June 29, 1973, gage height, 10.08 ft, from rating curve extended above 2,200 ft³/s on basis of slope-area measurement at gage height 9.92 ft; minimum observed, 4.6 ft³/s Sept. 10, 1944, gage height, 0.70 ft, site and datum then in use; minimum daily, 7.7 ft³/s Sept. 14, 1981.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood of Aug. 9, 1942 reached a stage of 12.3 ft, site and datum then in use, discharge, 8,600 ft³/s, by slope-area measurement.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 700 ft³/s and maximum (*):

Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)	Date	Time	DISCHARGE (ft ³ /s)	GAGE HEIGHT (ft)
Feb. 12	2045	*2450	*7.17	Sept. 27	1315	2080	6.91

Minimum daily discharge, 8.9 ft³/s Sept. 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP		
1	40	34	44	33	38	35	67	18	23	15	94	14		
2	70	32	38	49	55	35	51	27	18	14	35	14		
3	37	31	51	50	39	32	36	270	17	14	26	13		
4	30	30	47	38	33	32	38	68	19	36	22	13		
5	26	98	38	41	32	40	35	41	19	16	19	12		
6	24	60	135	38	30	34	35	35	20	14	18	11		
7	23	40	74	38	28	32	33	34	17	181	18	10		
8	24	34	42	40	27	35	32	31	17	39	56	15		
9	25	32	39	29	26	34	32	28	17	57	32	14		
10	24	31	38	28	25	32	31	26	16	29	23	13		
11	22	31	41	27	25	30	31	25	15	25	19	14		
12	22	31	45	26	784	48	30	22	11	18	17	12		
13	22	30	42	25	348	40	29	26	14	16	16	11		
14	21	30	39	24	76	34	27	24	13	15	15	9.8		
15	19	30	41	23	59	32	28	20	14	15	15	9.8		
16	22	31	39	22	50	30	28	21	37	136	14	9.6		
17	21	31	37	21	47	30	29	37	93	28	14	10		
18	22	34	34	20	48	28	25	77	30	19	13	9.9		
19	20	40	36	19	51	27	24	36	22	16	15	9.3		
20	21	37	41	18	52	28	24	28	19	15	15	9.5		
21	22	34	39	18	45	27	22	26	19	14	17	8.9		
22	34	32	60	17	46	27	21	48	16	23	16	9.0		
23	74	31	44	16	61	35	21	35	15	19	13	9.5		
24	58	31	39	16	56	41	21	39	14	13	13	11		
25	42	30	41	16	51	43	22	29	13	15	31	10		
26	36	30	36	16	42	33	22	24	13	54	39	10		
27	34	30	34	16	41	31	20	21	13	230	22	982		
28	42	40	34	15	37	31	18	21	14	44	16	202		
29	86	250	34	15	---	33	18	34	15	28	14	41		
30	50	69	32	20	---	32	18	24	15	23	17	33		
31	36	---	32	29	---	32	---	22	---	84	20	---		
TOTAL	1049	1324	1366	803	2252	1033	868	1217	602	1265	714	1550.3		
MEAN	33.8	44.1	44.1	25.9	80.4	33.3	28.9	39.3	20.1	40.8	23.0	51.7		
MAX	86	250	135	50	784	48	67	270	93	230	94	982		
MIN	19	30	32	15	25	27	18	18	13	13	13	8.9		
† MEAN†	4.2	4.2	4.1	3.9	4.2	4.9	4.0	3.7	3.8	3.7	4.5	4.4		
MEAN†	38.0	48.3	48.2	29.8	84.6	38.2	32.9	43.0	23.9	44.5	27.5	56.1		
CFSM†	.83	1.05	1.05	.65	1.85	.83	.72	.94	.52	.97	.60	1.22		
IN†	.96	1.18	1.21	.75	1.92	.96	.80	1.08	.58	1.12	.69	1.37		
CAL YR 1984	TOTAL	30338	MEAN	82.9	MAX	1430	MIN	19	MEAN†	87.3	CFSM†	1.91	IN†	25.88
WTR YR 1985	TOTAL	14043.3	MEAN	38.5	MAX	982	MIN	8.9	MEAN†	42.6	CFSM†	.93	IN†	12.63

† Diversion from Rock Run Reservoir, furnished by City of Coatesville.

‡ Adjusted for diversion.

01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA, PA

LOCATION.--Lat 39°57'42", long 75°48'06", Chester County, Hydrologic Unit 02040205, on left bank at bridge on Legislative Route 15068 at Modena, and 300 ft upstream from Dennis Run.

DRAINAGE AREA.--55.0 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--January 1970 to current year.

REVISED RECORDS.--WDR PA-74-1: 1971-72(P), 1973. WDR PA-75-1: 1974(m).

GAGE.--Water-stage recorder. Altitude of gage is 265 ft (80.8 m), from topographic map.

REMARKS.--Estimated daily discharges during the water year: Jan. 11 to Feb. 21, July 22 to Aug. 9. Records fair except for periods of estimated discharges, which are poor. Flow regulated by Rock Run Reservoir, capacity, 320 Mgal 5.6 mi upstream and by Lukens Steel Company.

AVERAGE DISCHARGE.--15 years, 94.5 ft³/s, 23.33 in/yr, adjusted for storage.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 9,600 ft³/s June 29, 1973, gage height, 12.47 ft, from rating curve extended above 920 ft³/s on basis of slope-area measurement at gage height 11.48 ft, minimum, 1.8 ft³/s Aug. 29, 1974; minimum gage height, 2.27 ft Oct. 14, 1970.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 1,000 ft³/s revised and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Sept. 27	1415	*2600	*7.05	No other peaks above base discharge.			

Minimum daily discharge, 20 ft³/s Sept. 7, 14, 15, 17, and 21.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	60	39	57	42	54	44	87	29	33	27	120	22
2	100	40	46	63	66	44	68	43	29	26	52	23
3	47	38	66	68	48	40	49	324	29	29	43	23
4	39	36	60	48	42	40	52	92	31	57	37	22
5	35	124	48	53	38	54	47	55	31	29	34	22
6	33	74	168	47	36	44	48	45	31	28	32	21
7	32	43	98	49	34	40	42	44	28	186	30	20
8	32	39	55	51	33	44	41	41	29	50	66	30
9	33	40	49	38	32	43	42	37	29	69	40	25
10	33	36	47	36	31	39	41	36	27	39	31	24
11	33	39	53	35	31	38	41	4	26	33	26	25
12	31	39	58	34	980	64	39	34	27	28	26	22
13	31	37	54	33	300	52	39	36	26	26	24	21
14	32	37	49	32	100	43	36	35	26	24	25	20
15	50	56	52	31	76	40	38	32	27	31	24	20
16	33	39	48	31	64	38	39	32	65	149	23	21
17	31	37	47	30	60	37	38	58	111	38	23	20
18	33	39	44	30	62	36	35	98	40	30	22	21
19	32	49	46	29	64	35	33	47	32	27	24	21
20	39	44	54	28	64	37	33	37	29	26	24	21
21	35	39	51	28	54	37	33	36	30	25	27	20
22	41	39	79	28	55	35	32	59	28	37	25	22
23	96	37	57	27	75	45	32	49	27	33	22	23
24	65	38	49	27	72	54	31	49	26	22	21	24
25	52	37	54	27	64	56	32	37	26	27	55	24
26	42	39	45	27	54	43	33	33	25	34	51	30
27	40	36	42	26	55	41	30	30	27	230	31	1250
28	47	49	43	26	46	41	28	31	28	70	25	281
29	113	313	42	26	---	43	29	42	28	46	24	59
30	53	112	41	33	---	42	28	34	27	41	25	42
31	43	---	39	43	---	43	---	31	---	110	29	---
TOTAL	1396	1644	1741	1126	2690	1332	1196	1620	978	1627	1063	2219
MEAN	45.0	54.8	56.2	36.3	96.1	43.0	39.9	52.3	32.6	52.5	34.3	74.0
MAX	113	313	168	68	980	64	87	324	111	230	120	1250
MIN	30	36	39	26	31	35	28	29	25	22	21	20
†	4.2	4.2	4.1	3.9	4.2	4.8	4.0	3.7	3.8	3.7	4.5	4.4
MEAN†	49.2	59.0	60.3	40.2	100.3	47.9	43.9	56.0	36.4	56.2	38.8	78.4
CFSM†	.89	1.02	1.10	.73	1.82	.87	.80	1.02	.66	1.02	.71	1.43
IN†	1.03	1.20	1.26	.84	1.90	1.00	.89	1.17	.74	1.18	.81	1.59

CAL YR 1984	TOTAL	39266	MEAN	107	MAX	1920	MIN	30	MEAN†	109	CFSM†	1.98	IN†	26.91
WTR YR 1985	TOTAL	18632	MEAN	51.0	MAX	1250	MIN	20	MEAN†	55.2	CFSM†	1.00	IN†	13.63

† Diversion from Rock Run Reservoir, furnished by the City of Coatesville.

‡ Adjusted for diversion.

CHRISTINA RIVER BASIN

01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA, PA--Continued

PERIOD OF RECORD.--October 1969 to October 1978, August 1981 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: May 1971 to October 1978, August 1981 to current year.

pH: May 1971 to October 1978, August 1981 to current year.

WATER TEMPERATURES: May 1971 to October 1978, August 1981 to current year.

DISSOLVED OXYGEN: May 1971 to October 1978, August 1981 to current year.

INSTRUMENTATION.--Water-quality monitor May 1971 to October 1978, August 1981 to current year.

REMARKS.--Not operated Dec. 4 to Feb. 28. Other interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 858 microsiemens Jan. 10, 1977; minimum, 88 microsiemens Nov. 30, 1976.

pH: Maximum, 10.0 Dec. 21, 1971, minimum, 6.3 April 3, 1975.

WATER TEMPERATURE: Maximum, 33.5°C July 19, 1977; minimum, freezing point on many days during winter months.

DISSOLVED OXYGEN: Maximum, 16.3 mg/L Dec. 30, 1976; minimum, 0.6 mg/L Nov. 1, 3, 1974.

WATER QUALITY DATA, WATER OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	COLI- FORM, FECAL, 0.45 UM-MF (COLS./ 100 ML)
OCT							
02...	1430	107	224	7.2	14.5	10.3	8200
08...	1430	39	334	8.2	16.0	10.2	--
15...	1400	39	310	8.2	17.0	10.4	K430
22...	1430	42	298	7.8	20.0	8.6	2400
29...	1330	130	219	6.9	19.5	8.6	70000
NOV							
06...	1400	64	238	7.7	14.5	9.6	K4500
12...	1430	46	308	9.2	11.0	10.7	K200
19...	1430	56	286	7.6	8.5	11.9	K56
26...	1430	46	308	7.1	8.0	12.2	--
MAR							
06...	1500	47	292	7.8	9.0	11.2	--
12...	1200	53	252	7.6	10.0	10.9	--
19...	1430	40	300	8.0	10.0	12.1	<22
25...	1430	64	248	8.3	11.0	12.8	K50
APR							
01...	1530	94	216	8.0	12.0	11.5	K280
09...	1430	49	268	7.9	10.0	11.9	K89
MAY							
13...	1500	40	296	8.0	24.5	8.3	K810
21...	1400	40	284	7.7	20.5	8.4	K730
28...	1200	16	284	8.2	22.5	9.3	11000
JUN							
04...	1300	24	298	7.8	21.5	8.8	--
10...	1500	34	322	7.9	25.0	8.8	--
17...	1430	97	220	7.3	20.5	8.2	230000
25...	1430	32	329	7.7	23.5	7.7	--
JUL							
01...	1430	34	300	7.5	22.0	7.7	K810
08...	1430	39	245	7.1	22.5	6.2	7600
16...	1230	138	143	7.0	23.0	8.0	320000
31...	1500	261	297	7.3	25.0	6.5	--
AUG							
05...	1500	161	300	7.9	26.0	8.0	K160
13...	1500	30	315	7.8	26.5	8.3	K2000
20...	1530	30	312	7.2	25.5	8.2	2000
27...	1530	37	305	7.8	26.0	7.9	K14000
SEP							
05...	1230	7.0	293	8.1	26.5	11.6	2200
09...	1300	25	320	8.1	27.0	8.4	8400
17...	1230	2.0	340	7.3	20.5	8.5	3200
26...	1030	12	346	7.6	18.0	6.8	3900
30...	1400	47	314	7.7	18.5	9.2	K95

CHRISTINA RIVER BASIN

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01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	291	200	254	306	274	288	280	244	262			
2	272	174	217	304	280	288	282	262	269			
3	301	272	286	310	274	289	272	221	249			
4	320	290	303	304	278	287	---	---	---			
5	329	299	312	287	143	202	---	---	---			
6	352	299	320	270	207	232	---	---	---			
7	331	301	313	290	269	278	---	---	---			
8	340	304	312	298	276	287	---	---	---			
9	317	296	309	295	269	284	---	---	---			
10	321	301	311	325	285	304	---	---	---			
11	326	301	313	326	294	306	---	---	---			
12	365	306	321	308	289	293	---	---	---			
13	337	303	320	294	274	286	---	---	---			
14	328	304	315	311	290	299	---	---	---			
15	333	310	320	321	283	300	---	---	---			
16	330	301	314	313	289	298	---	---	---			
17	342	315	330	298	277	287	---	---	---			
18	329	305	318	314	275	288	---	---	---			
19	335	314	325	286	268	276	---	---	---			
20	348	271	316	297	262	277	---	---	---			
21	343	308	322	304	277	288	---	---	---			
22	319	210	303	301	282	292	---	---	---			
23	268	204	236	302	283	292	---	---	---			
24	272	251	260	308	280	294	---	---	---			
25	313	252	275	297	275	285	---	---	---			
26	299	273	284	315	283	294	---	---	---			
27	330	282	300	325	276	290	---	---	---			
28	324	188	299	306	157	290	---	---	---			
29	260	173	223	213	155	182	---	---	---			
30	280	249	263	250	200	223	---	---	---			
31	289	269	280	---	---	---	---	---	---			
MONTH	365	173	296	326	143	278	---	---	---			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	289	266	278	244	210	222	328	302	319
2	---	---	---	306	264	283	250	204	225	328	222	286
3	---	---	---	300	266	281	268	246	253	232	134	160
4	---	---	---	298	270	281	264	232	247	244	180	216
5	---	---	---	282	261	268	286	242	261	258	232	245
6	---	---	---	292	257	271	282	256	265	271	250	261
7	---	---	---	286	264	276	266	252	260	288	256	272
8	---	---	---	284	264	274	286	256	267	302	260	278
9	---	---	---	296	256	275	274	246	260	310	268	282
10	---	---	---	286	264	276	294	250	268	310	280	293
11	---	---	---	292	266	274	282	258	269	320	288	299
12	---	---	---	278	230	255	294	266	278	320	286	304
13	---	---	---	270	228	250	296	266	281	306	280	291
14	---	---	---	312	260	273	296	272	283	312	278	292
15	---	---	---	290	258	270	300	270	285	308	276	291
16	---	---	---	288	258	272	302	272	286	300	280	290
17	---	---	---	300	266	275	296	268	282	290	220	259
18	---	---	---	294	260	274	314	276	292	222	178	201
19	---	---	---	300	264	280	334	288	304	272	222	244
20	---	---	---	306	274	288	324	292	306	300	258	271
21	---	---	---	308	276	289	312	288	302	296	254	278
22	---	---	---	300	282	291	330	296	309	280	214	249
23	---	---	---	292	264	277	350	300	318	266	230	250
24	---	---	---	264	246	255	326	298	312	306	224	242
25	---	---	---	264	240	249	326	296	311	294	254	270
26	---	---	---	282	240	260	322	290	307	344	268	281
27	---	---	---	300	254	269	344	286	309	326	270	294
28	289	264	275	302	268	281	334	290	302	336	282	299
29	---	---	---	290	264	278	364	286	309	278	244	255
30	---	---	---	288	268	279	356	296	315	316	258	275
31	---	---	---	280	250	270	---	---	---	292	272	283
MONTH	---	---	---	312	228	273	364	204	283	344	134	269

CHRISTINA RIVER BASIN

01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	300	250	283	319	286	303	232	142	190	310	292	303
2	306	276	291	348	300	319	239	200	222	318	289	305
3	310	282	297	319	286	308	291	226	251	321	299	313
4	316	280	296	296	145	228	309	281	291	334	296	312
5	304	272	289	316	250	279	312	290	301	329	293	312
6	308	278	292	319	300	310	320	283	298	338	304	322
7	312	280	295	311	103	175	313	216	291	336	303	324
8	315	286	296	255	180	224	281	155	216	332	195	292
9	316	282	296	258	180	219	---	---	---	338	295	307
10	332	290	308	290	240	263	292	274	282	339	308	328
11	322	288	307	306	247	284	305	284	294	341	309	320
12	326	288	308	318	280	299	325	299	310	350	312	329
13	368	300	317	318	300	310	320	298	310	350	323	337
14	330	300	313	317	300	308	319	296	308	359	338	350
15	318	290	305	319	208	304	329	295	312	360	317	344
16	301	174	235	255	112	166	333	299	313	353	330	346
17	246	128	200	259	200	228	331	302	317	353	312	332
18	290	246	271	295	244	266	324	290	310	362	271	347
19	332	278	297	311	284	297	331	297	315	364	328	346
20	324	294	307	312	283	302	334	298	318	362	332	345
21	324	292	308	316	284	305	322	281	300	---	---	---
22	352	290	315	318	250	290	332	286	303	---	---	---
23	334	292	316	303	240	269	328	292	313	---	---	---
24	352	302	326	318	280	302	335	300	320	---	---	---
25	356	314	330	330	184	287	318	237	259	---	---	---
26	337	300	317	---	---	---	279	240	260	---	---	---
27	337	280	308	199	146	176	322	271	293	---	---	---
28	310	281	303	---	---	---	324	293	308	---	---	---
29	315	281	299	---	---	---	339	300	321	---	---	---
30	314	281	301	306	281	292	331	298	317	---	---	---
31	---	---	---	304	152	258	302	274	289	---	---	---
MONTH	368	128	299	348	103	270	339	142	291	364	195	326

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.7	7.5	7.6	8.0	7.5	7.7	7.8	7.5	7.6			
2	7.9	7.5	7.6	8.0	7.6	7.7	8.0	7.6	7.7			
3	8.2	7.6	7.8	8.1	7.6	7.8	7.7	7.6	7.6			
4	8.3	7.5	7.8	8.2	7.6	7.8	---	---	---			
5	8.4	7.5	7.9	7.7	7.5	7.5	---	---	---			
6	8.3	7.5	7.9	7.9	7.5	7.7	---	---	---			
7	8.5	7.6	7.9	8.3	7.6	7.8	---	---	---			
8	8.4	7.6	7.9	8.2	7.6	7.8	---	---	---			
9	8.3	7.5	7.8	8.1	7.7	7.8	---	---	---			
10	8.4	7.5	7.9	8.1	7.6	7.8	---	---	---			
11	8.4	7.5	7.9	7.9	7.6	7.7	---	---	---			
12	8.4	7.5	7.8	8.3	7.6	8.0	---	---	---			
13	8.5	7.5	7.9	8.2	7.7	7.9	---	---	---			
14	8.5	7.5	7.9	8.2	7.7	7.9	---	---	---			
15	8.5	7.5	7.9	8.2	7.7	7.8	---	---	---			
16	8.4	7.5	7.8	8.1	7.6	7.8	---	---	---			
17	8.4	7.4	7.8	8.2	7.7	7.9	---	---	---			
18	8.5	7.4	7.9	8.2	7.7	7.8	---	---	---			
19	8.4	7.4	7.8	8.0	7.6	7.7	---	---	---			
20	8.1	7.3	7.6	8.1	7.6	7.8	---	---	---			
21	8.1	7.4	7.6	8.1	7.7	7.8	---	---	---			
22	8.2	7.4	7.6	8.2	7.7	7.8	---	---	---			
23	7.8	7.5	7.6	8.2	7.7	7.8	---	---	---			
24	7.7	7.5	7.6	8.1	7.6	7.8	---	---	---			
25	8.1	7.6	7.8	8.2	7.6	7.8	---	---	---			
26	8.1	7.6	7.8	7.9	7.6	7.7	---	---	---			
27	8.2	7.5	7.8	8.1	7.5	7.7	---	---	---			
28	8.3	7.5	7.8	8.1	7.5	7.7	---	---	---			
29	7.7	7.5	7.5	7.7	7.3	7.4	---	---	---			
30	8.0	7.5	7.7	7.6	7.5	7.6	---	---	---			
31	8.1	7.5	7.7	---	---	---	---	---	---			
MONTH	8.5	7.3	7.8	8.3	7.3	7.8	---	---	---			

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01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA,,PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	7.9	7.7	7.8	8.0	7.5	7.7	8.1	7.3	7.6
2	---	---	---	7.9	7.7	7.8	8.2	7.5	7.8	8.0	7.3	7.5
3	---	---	---	7.9	7.7	7.8	8.1	7.5	7.7	7.5	7.3	7.4
4	---	---	---	7.8	7.7	7.7	8.3	7.6	7.9	7.6	7.4	7.5
5	---	---	---	8.0	7.7	7.8	8.4	7.4	7.8	7.8	7.4	7.6
6	---	---	---	7.9	7.7	7.8	8.2	7.4	7.7	7.7	7.4	7.5
7	---	---	---	7.9	7.6	7.7	8.2	7.4	7.8	7.9	7.4	7.7
8	---	---	---	7.8	7.6	7.7	8.2	7.5	7.7	7.9	7.5	7.7
9	---	---	---	7.9	7.6	7.7	8.2	7.4	7.7	8.2	7.4	7.7
10	---	---	---	7.9	7.6	7.7	8.3	7.5	7.8	8.0	7.4	7.6
11	---	---	---	7.9	7.5	7.7	8.2	7.4	7.7	8.1	7.2	7.6
12	---	---	---	8.0	7.5	7.6	8.3	7.4	7.8	8.2	7.3	7.6
13	---	---	---	8.1	7.6	7.8	8.4	7.3	7.8	8.1	7.2	7.6
14	---	---	---	8.1	7.6	7.8	8.4	7.3	7.8	8.2	7.3	7.7
15	---	---	---	8.1	7.6	7.8	8.1	7.2	7.5	8.4	7.4	7.8
16	---	---	---	8.1	7.6	7.8	8.0	7.2	7.5	8.2	7.3	7.5
17	---	---	---	8.3	7.6	7.9	7.9	7.2	7.5	7.7	7.3	7.5
18	---	---	---	8.2	7.6	7.9	7.9	7.2	7.5	7.8	7.4	7.6
19	---	---	---	8.1	7.6	7.8	7.7	7.1	7.3	7.9	7.4	7.6
20	---	---	---	8.1	7.5	7.7	7.8	7.0	7.3	7.7	7.3	7.5
21	---	---	---	8.3	7.5	7.8	8.0	7.0	7.4	7.9	7.3	7.5
22	---	---	---	8.3	7.5	7.8	8.0	7.0	7.4	8.1	7.4	7.7
23	---	---	---	7.9	7.4	7.6	8.5	7.1	7.7	7.6	7.4	7.5
24	---	---	---	8.1	7.4	7.6	7.5	7.2	7.3	7.9	7.4	7.6
25	---	---	---	8.4	7.4	7.8	8.0	7.2	7.5	7.9	7.4	7.6
26	---	---	---	8.4	7.5	7.9	8.1	7.3	7.7	8.1	7.3	7.6
27	---	---	---	8.5	7.5	7.9	8.3	7.3	7.7	8.3	7.4	7.7
28	7.9	7.7	7.8	8.5	7.4	7.8	8.2	7.3	7.7	8.0	7.3	7.6
29	---	---	---	8.5	7.3	7.8	8.1	7.4	7.7	8.0	7.4	7.7
30	---	---	---	8.3	7.3	7.7	8.0	7.3	7.6	8.1	7.4	7.7
31	---	---	---	8.0	7.4	7.6	---	---	---	7.9	7.4	7.6
MONTH	---	---	---	8.5	7.3	7.8	8.5	7.0	7.6	8.4	7.2	7.6
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	8.1	7.4	7.6	8.0	7.1	7.4	7.9	7.4	7.6	8.4	7.3	7.6
2	8.2	7.3	7.6	8.2	7.1	7.5	7.9	7.4	7.6	8.4	7.3	7.7
3	8.3	7.3	7.6	8.4	7.0	7.5	7.9	7.4	7.6	8.4	7.2	7.7
4	7.9	7.2	7.6	7.9	7.0	7.4	8.0	7.3	7.6	8.4	7.2	7.6
5	7.6	7.3	7.4	8.0	7.1	7.4	8.2	7.3	7.7	8.4	7.2	7.6
6	8.1	7.3	7.6	7.9	7.0	7.3	8.3	7.4	7.7	8.4	7.2	7.6
7	8.2	7.3	7.6	7.4	7.0	7.1	8.3	7.4	7.7	8.9	7.2	7.7
8	7.6	7.3	7.4	7.4	7.0	7.2	7.9	7.3	7.6	7.7	7.2	7.3
9	8.2	7.3	7.5	7.6	7.1	7.4	---	---	---	8.1	7.2	7.4
10	8.2	7.2	7.6	7.5	7.0	7.3	8.0	7.3	7.6	8.1	7.2	7.4
11	8.0	7.3	7.6	7.6	7.0	7.3	8.1	7.3	7.6	7.9	7.2	7.5
12	8.2	7.3	7.6	7.6	7.0	7.3	8.0	7.3	7.5	8.2	7.3	7.5
13	8.3	7.3	7.7	8.0	7.1	7.5	8.2	7.2	7.6	8.4	7.3	7.5
14	8.3	7.4	7.7	8.2	7.0	7.6	8.3	7.3	7.7	8.0	7.3	7.5
15	8.4	7.3	7.6	8.1	7.1	7.5	8.3	7.3	7.7	8.3	7.2	7.4
16	7.9	7.3	7.5	7.5	7.0	7.2	8.1	7.3	7.6	7.6	7.1	7.3
17	7.6	7.3	7.4	7.6	7.1	7.3	8.4	7.3	7.7	8.3	7.1	7.5
18	7.6	7.4	7.5	7.6	7.0	7.3	8.1	7.3	7.4	8.3	7.3	7.6
19	7.8	7.4	7.6	7.9	7.1	7.4	8.0	7.2	7.5	8.8	7.2	7.6
20	7.9	7.3	7.5	8.1	7.1	7.5	8.2	7.2	7.4	8.4	7.2	7.6
21	8.1	7.3	7.6	8.5	7.1	7.6	7.9	7.3	7.5	---	---	---
22	8.2	7.3	7.6	8.2	7.0	7.5	8.3	7.3	7.6	---	---	---
23	8.2	7.3	7.5	8.5	7.1	7.7	8.2	7.3	7.6	---	---	---
24	7.9	7.2	7.4	8.5	7.0	7.7	8.4	7.3	7.7	---	---	---
25	7.6	7.3	7.5	7.5	7.0	7.6	7.6	7.2	7.4	---	---	---
26	8.1	7.4	7.6	7.9	7.3	7.6	7.9	7.3	7.5	---	---	---
27	8.1	7.1	7.5	7.5	7.4	7.4	8.0	7.3	7.5	---	---	---
28	8.4	7.0	7.5	---	---	---	8.2	7.3	7.7	---	---	---
29	8.2	7.1	7.5	---	---	---	8.3	7.3	7.7	---	---	---
30	7.6	7.0	7.3	8.0	7.3	7.6	8.3	7.3	7.6	---	---	---
31	---	---	---	7.9	7.3	7.5	8.3	7.3	7.6	---	---	---
MONTH	8.4	7.0	7.5	8.5	7.0	7.4	8.4	7.2	7.6	8.9	7.1	7.5

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TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	16.0	14.0	15.0	17.5	17.0	17.0	9.0	6.5	7.5			
2	15.0	13.0	14.0	17.0	14.0	16.0	8.5	6.5	7.5			
3	16.0	12.5	14.0	14.0	12.0	13.0	8.5	7.0	8.0			
4	17.0	13.5	15.0	14.0	11.5	12.5	---	---	---			
5	17.5	14.0	15.5	15.5	13.5	14.5	---	---	---			
6	17.5	14.0	15.5	15.0	12.5	14.0	---	---	---			
7	15.5	13.0	14.5	12.5	10.5	12.0	---	---	---			
8	15.5	14.0	15.0	11.5	9.0	10.5	---	---	---			
9	18.0	15.5	16.5	12.0	9.0	10.5	---	---	---			
10	18.0	16.0	17.0	13.5	11.0	12.0	---	---	---			
11	19.5	16.5	17.5	13.0	11.5	12.5	---	---	---			
12	19.5	16.0	17.5	12.0	9.5	11.0	---	---	---			
13	19.0	16.0	17.5	9.5	8.0	9.0	---	---	---			
14	18.5	15.5	17.0	9.5	7.0	8.5	---	---	---			
15	18.0	15.5	16.5	10.0	7.5	9.0	---	---	---			
16	17.5	15.5	16.5	11.0	8.5	10.0	---	---	---			
17	18.0	16.5	17.0	9.0	7.5	8.5	---	---	---			
18	19.5	17.0	18.0	8.5	7.5	8.0	---	---	---			
19	20.0	17.0	18.5	8.5	8.0	8.0	---	---	---			
20	20.5	18.5	19.5	7.0	5.5	6.0	---	---	---			
21	20.5	18.5	19.5	7.0	5.0	6.0	---	---	---			
22	20.5	18.5	19.5	7.0	5.0	6.0	---	---	---			
23	20.0	17.5	18.5	7.0	4.5	5.5	---	---	---			
24	17.5	16.0	16.5	7.5	4.5	6.0	---	---	---			
25	18.5	15.5	16.5	8.0	5.5	6.5	---	---	---			
26	19.0	17.0	18.0	8.5	6.0	7.0	---	---	---			
27	21.5	18.5	19.5	9.0	6.0	7.5	---	---	---			
28	21.5	19.0	20.0	12.5	8.0	10.0	---	---	---			
29	20.5	18.5	19.5	12.0	6.5	8.5	---	---	---			
30	19.0	17.0	18.0	7.5	5.5	7.0	---	---	---			
31	19.0	17.0	18.0	---	---	---	---	---	---			
MONTH	21.5	12.5	17.0	17.5	4.5	10.0	---	---	---			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	8.0	5.0	6.5	12.0	9.0	10.5	23.0	17.0	19.5
2	---	---	---	10.5	6.5	8.5	11.0	8.0	9.5	19.0	14.5	17.5
3	---	---	---	10.0	7.0	8.0	9.0	7.5	8.5	14.5	11.5	12.5
4	---	---	---	7.5	6.5	6.5	10.5	7.0	9.0	17.0	11.0	14.0
5	---	---	---	11.5	7.0	9.0	15.5	9.5	12.5	19.5	14.5	17.0
6	---	---	---	9.0	6.0	7.5	17.5	13.0	15.0	18.5	17.0	18.0
7	---	---	---	8.0	5.0	6.5	14.5	11.5	13.0	18.5	16.0	17.5
8	---	---	---	9.0	7.0	8.0	13.5	10.0	11.5	20.0	15.0	17.0
9	---	---	---	11.5	7.5	9.0	10.5	7.5	9.5	20.5	15.0	17.5
10	---	---	---	11.5	7.5	9.0	12.0	7.0	9.0	22.5	16.5	19.5
11	---	---	---	9.5	7.5	8.5	11.5	9.0	10.0	24.5	19.0	21.5
12	---	---	---	11.0	8.5	9.5	14.5	9.0	11.5	25.0	20.5	22.5
13	---	---	---	11.5	7.0	9.5	16.0	12.0	13.5	25.5	20.5	22.5
14	---	---	---	12.5	9.5	10.5	16.0	12.5	14.0	25.5	21.0	23.0
15	---	---	---	11.0	8.0	9.5	15.0	14.0	14.5	23.0	19.5	21.0
16	---	---	---	11.5	7.0	9.0	17.5	14.0	15.5	20.0	18.5	19.0
17	---	---	---	11.5	8.0	9.5	17.0	12.5	14.5	19.0	17.0	18.0
18	---	---	---	9.5	6.0	7.5	18.0	12.5	15.0	19.0	15.5	17.0
19	---	---	---	10.0	5.5	7.5	20.5	15.0	18.0	20.0	15.0	17.5
20	---	---	---	10.0	7.5	8.5	23.0	17.5	20.0	22.5	16.5	19.5
21	---	---	---	11.0	7.0	8.5	23.5	18.0	20.5	21.5	19.0	20.0
22	---	---	---	9.0	7.5	8.0	24.5	18.5	21.5	22.0	18.0	20.0
23	---	---	---	8.5	7.5	8.0	23.5	19.0	21.0	19.5	16.5	18.0
24	---	---	---	8.5	8.0	8.0	19.0	15.5	17.0	20.5	15.5	18.0
25	---	---	---	10.5	7.0	8.5	18.0	15.0	16.0	23.0	17.0	20.0
26	---	---	---	12.0	7.0	9.0	21.0	15.0	18.0	24.0	18.5	21.0
27	---	---	---	13.5	8.0	10.5	22.0	17.5	19.5	25.5	19.5	22.5
28	9.0	6.0	7.0	15.5	11.0	13.0	19.5	16.0	17.5	23.5	20.5	22.0
29	---	---	---	17.0	13.5	15.0	20.5	14.0	17.0	20.5	18.5	19.5
30	---	---	---	15.5	13.0	14.5	22.0	15.0	18.5	23.0	17.0	20.0
31	---	---	---	13.0	9.5	11.5	---	---	---	20.0	19.0	19.5
MONTH	---	---	---	17.0	5.0	9.0	24.5	7.0	14.5	25.5	11.0	19.0

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TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	24.5	19.0	21.5	23.0	18.0	20.5	24.5	22.0	23.0	22.5	20.5	21.5
2	24.5	19.0	21.5	25.0	19.5	22.0	25.0	21.0	23.0	25.0	20.5	22.5
3	24.5	19.5	22.0	26.0	20.0	22.5	26.0	25.0	23.5	26.5	21.5	24.0
4	23.0	20.5	21.5	26.0	20.0	23.0	25.5	21.0	23.0	27.5	22.5	25.0
5	21.5	19.0	20.0	26.0	21.0	23.5	26.0	20.5	23.0	28.0	23.5	25.5
6	24.0	18.5	21.0	25.5	22.0	23.5	25.5	21.0	23.0	27.5	24.0	26.0
7	23.0	18.5	20.5	23.0	20.0	22.0	26.5	22.0	24.0	28.5	24.0	26.0
8	21.0	19.0	20.0	22.5	20.0	21.5	25.5	23.0	24.0	26.5	24.5	25.5
9	24.0	19.0	21.0	25.0	20.0	22.0	---	---	---	27.0	24.0	25.5
10	25.5	20.5	23.0	24.5	22.0	23.0	28.0	24.0	25.5	27.0	23.5	25.5
11	24.0	21.0	22.0	27.0	20.5	24.0	27.0	24.0	25.5	25.0	21.0	23.5
12	25.0	21.0	22.5	25.5	22.0	23.5	27.5	23.0	25.0	23.0	19.0	21.0
13	22.0	18.5	20.5	27.5	21.0	24.0	27.0	22.0	24.5	20.5	17.5	19.0
14	22.0	17.0	19.5	28.0	22.0	25.0	29.0	24.0	26.5	20.5	16.0	18.5
15	23.0	17.5	20.0	27.5	23.0	25.0	29.5	25.0	27.0	21.5	16.0	18.5
16	22.0	19.0	20.0	26.0	22.0	24.0	26.5	24.5	25.5	22.0	16.0	19.0
17	---	---	---	27.5	22.0	24.0	26.5	22.5	24.5	22.0	17.0	19.5
18	---	---	---	27.5	21.0	24.0	24.0	22.0	22.5	22.0	17.5	19.5
19	---	---	---	27.5	21.0	24.5	25.5	21.5	23.0	23.0	18.0	20.5
20	---	---	---	27.5	22.0	25.0	25.5	23.0	24.5	24.0	18.5	21.5
21	---	---	---	28.0	22.5	25.5	25.5	22.4	23.5	---	---	---
22	---	---	---	27.5	24.5	26.0	24.5	21.0	22.5	---	---	---
23	---	---	---	27.0	22.0	24.5	25.0	19.5	22.0	---	---	---
24	---	---	---	25.5	20.0	23.0	25.0	20.0	22.5	---	---	---
25	---	---	---	25.5	20.0	23.0	23.0	21.0	21.5	---	---	---
26	22.5	19.0	21.0	25.0	23.0	23.5	24.0	21.0	22.5	---	---	---
27	22.0	17.0	19.5	24.5	21.5	23.0	26.0	22.5	24.0	---	---	---
28	21.0	17.5	19.0	---	---	---	26.0	22.0	24.0	---	---	---
29	24.5	17.5	20.5	---	---	---	26.0	21.5	24.0	---	---	---
30	21.0	20.0	20.5	27.5	22.5	24.5	26.0	22.5	24.0	---	---	---
31	---	---	---	25.5	23.0	24.0	23.0	22.0	22.5	---	---	---
MONTH	25.5	17.0	24.5	28.0	18.0	23.5	29.5	19.5	24.0	28.5	16.0	22.5

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	8.8	7.2	8.2	9.1	7.2	8.3	11.6	10.7	11.1			
2	10.3	8.8	9.5	9.3	7.5	8.3	11.9	10.7	11.3			
3	10.8	8.4	9.6	10.3	8.3	9.2	11.3	10.8	10.9			
4	10.8	8.2	9.2	10.5	8.2	9.4	---	---	---			
5	11.0	8.1	9.3	9.4	8.2	9.0	---	---	---			
6	11.0	8.1	9.2	9.7	8.6	9.1	---	---	---			
7	11.4	8.1	9.6	10.4	8.6	9.5	---	---	---			
8	10.3	7.5	9.1	10.7	9.0	9.9	---	---	---			
9	9.8	7.3	8.3	10.8	8.9	9.9	---	---	---			
10	9.9	7.1	8.3	10.3	8.3	9.3	---	---	---			
11	10.1	6.8	8.2	9.8	8.4	9.0	---	---	---			
12	10.1	6.6	8.1	10.7	8.8	9.3	---	---	---			
13	10.1	6.5	7.9	11.4	9.5	10.5	---	---	---			
14	9.8	6.5	7.9	11.7	10.0	10.9	---	---	---			
15	10.6	6.5	8.2	11.9	9.5	10.8	---	---	---			
16	10.3	6.8	8.2	11.3	9.4	10.4	---	---	---			
17	10.0	6.6	8.0	11.8	9.9	10.8	---	---	---			
18	10.4	6.6	8.1	11.7	10.1	10.9	---	---	---			
19	10.0	6.4	7.8	11.9	10.3	11.0	---	---	---			
20	9.1	6.3	7.3	12.4	10.6	11.5	---	---	---			
21	9.3	6.2	7.5	12.6	10.9	11.7	---	---	---			
22	9.2	6.3	7.5	12.6	11.0	11.8	---	---	---			
23	8.8	7.1	8.0	12.6	10.9	11.7	---	---	---			
24	8.5	7.6	8.1	12.5	10.4	11.5	---	---	---			
25	9.2	7.3	8.3	12.3	10.5	11.4	---	---	---			
26	8.9	6.6	7.8	12.2	10.6	11.3	---	---	---			
27	9.0	6.1	7.4	12.4	10.1	11.2	---	---	---			
28	8.8	6.1	7.0	11.7	9.3	10.6	---	---	---			
29	8.6	5.9	7.3	11.6	9.9	11.0	---	---	---			
30	9.4	7.6	8.3	11.9	10.9	11.5	---	---	---			
31	9.6	7.4	8.3	---	---	---	---	---	---			
MONTH	11.4	5.9	8.3	12.6	7.2	10.4	---	---	---			

CHRISTINA RIVER BASIN

01480617 WEST BRANCH BRANDYWINE CREEK AT MODENA, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	12.1	10.8	11.5	11.8	10.2	10.9	9.2	5.0	6.9
2	---	---	---	11.6	10.4	11.0	12.3	10.1	11.3	8.8	5.0	7.2
3	---	---	---	11.8	10.3	11.0	12.3	10.1	11.2	9.6	8.0	9.3
4	---	---	---	11.6	10.6	11.1	12.8	9.7	11.4	9.7	7.8	8.9
5	---	---	---	11.2	10.3	10.9	12.4	8.2	10.5	8.9	7.0	8.2
6	---	---	---	12.0	10.5	11.1	11.0	8.1	9.4	8.4	6.9	7.6
7	---	---	---	11.8	10.5	11.1	12.0	8.3	10.0	8.7	7.0	7.8
8	---	---	---	11.0	9.8	10.5	12.0	8.8	10.3	9.2	7.1	8.2
9	---	---	---	11.0	9.6	10.3	12.4	9.1	10.7	9.4	6.7	8.1
10	---	---	---	11.1	9.6	10.2	12.9	9.5	11.1	8.8	5.8	7.4
11	---	---	---	11.1	9.6	10.2	12.0	9.4	10.6	8.8	5.5	7.1
12	---	---	---	11.2	9.4	10.3	12.8	8.5	10.6	9.0	5.6	6.9
13	---	---	---	12.1	9.9	11.2	12.3	8.1	10.0	8.4	5.0	6.6
14	---	---	---	11.6	9.8	10.5	12.2	7.8	9.8	8.6	5.6	7.0
15	---	---	---	12.0	9.8	10.9	11.8	7.5	9.3	9.5	5.0	7.0
16	---	---	---	12.5	10.2	11.2	11.8	7.1	9.3	8.9	5.4	6.9
17	---	---	---	12.3	10.1	11.0	12.4	7.2	9.8	7.8	5.8	6.7
18	---	---	---	12.7	10.2	11.3	12.8	7.5	9.9	8.5	7.0	7.8
19	---	---	---	13.0	9.8	11.2	12.3	7.0	9.4	8.7	6.2	7.7
20	---	---	---	11.7	9.4	10.4	12.6	7.0	9.3	8.5	5.7	7.1
21	---	---	---	12.3	9.4	10.7	13.4	6.8	9.5	8.6	5.6	7.0
22	---	---	---	12.3	9.5	10.7	13.6	6.9	9.6	9.4	6.0	7.9
23	---	---	---	11.4	9.7	10.4	13.8	7.0	9.7	8.1	7.0	7.7
24	---	---	---	11.7	9.7	10.5	11.0	7.3	9.2	9.2	6.7	8.2
25	---	---	---	12.8	9.8	11.1	12.8	8.5	9.6	8.9	5.8	7.5
26	---	---	---	13.4	10.0	11.6	12.3	5.7	8.8	9.0	5.8	7.2
27	---	---	---	13.2	9.2	11.2	9.6	5.4	7.3	9.4	5.1	7.1
28	12.1	10.6	11.5	12.7	8.1	10.3	9.6	5.4	7.4	9.3	5.1	6.7
29	---	---	---	12.0	7.7	9.7	9.6	5.8	7.7	9.6	5.9	8.1
30	---	---	---	11.6	7.6	9.4	9.0	5.3	7.2	10.0	6.3	8.3
31	---	---	---	11.3	8.3	9.9	---	---	---	8.9	6.2	7.5
MONTH	---	---	---	13.4	7.6	10.7	13.8	5.3	9.7	10.0	5.0	7.5
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	9.4	5.4	7.5	8.3	4.2	6.4	8.5	6.5	7.7	9.4	3.7	6.2
2	9.4	5.3	7.3	8.3	4.1	6.3	8.5	5.4	7.2	10.8	3.6	6.3
3	9.8	5.2	7.0	8.9	3.9	6.3	8.6	4.6	6.7	10.7	2.9	6.2
4	9.1	5.3	7.0	8.2	4.0	6.7	8.3	4.6	6.5	10.1	2.6	5.6
5	7.9	5.3	6.8	7.9	3.7	5.9	9.0	4.1	6.5	11.6	2.4	5.7
6	9.7	5.3	7.6	7.2	3.7	5.4	8.7	3.8	6.2	10.5	2.3	5.2
7	9.9	5.2	7.4	7.9	4.1	6.9	10.0	3.6	6.2	10.6	2.0	5.3
8	8.5	5.0	6.9	7.1	6.0	6.3	8.6	3.6	6.9	8.0	2.0	4.2
9	9.6	4.9	7.2	8.1	5.1	7.2	---	---	---	8.8	2.2	4.8
10	9.8	4.1	6.8	7.1	4.8	6.0	8.1	3.9	5.9	7.7	2.1	4.2
11	8.8	3.9	6.5	7.2	4.0	6.1	8.8	3.3	5.7	7.6	3.6	4.8
12	9.0	4.0	6.4	7.2	4.1	5.9	8.3	3.2	5.4	8.5	3.0	5.6
13	9.2	3.8	6.5	8.0	4.0	6.1	8.6	3.0	5.5	8.6	3.5	5.9
14	9.4	4.3	6.7	8.4	4.0	6.0	8.6	2.9	5.6	8.6	3.6	5.9
15	9.9	4.1	6.6	8.1	4.1	5.7	8.8	2.7	5.4	10.3	4.0	6.2
16	8.7	5.6	7.2	8.0	5.7	7.1	8.2	2.8	5.0	8.6	3.3	5.8
17	8.4	6.9	7.8	7.7	4.8	6.5	10.3	3.2	6.0	9.7	3.6	6.0
18	7.9	5.8	7.2	7.8	4.0	6.2	7.8	3.5	5.1	10.6	3.7	6.4
19	8.3	5.2	7.0	8.4	4.0	6.3	8.6	3.1	5.5	10.3	3.3	6.3
20	8.2	4.7	6.6	8.3	3.7	6.1	8.3	2.9	5.2	10.5	2.8	6.1
21	8.6	5.0	7.0	---	---	---	8.5	3.5	5.5	---	---	---
22	9.0	4.9	6.9	---	---	---	10.3	3.6	6.1	---	---	---
23	9.2	4.6	6.7	---	---	---	10.6	3.3	6.4	---	---	---
24	8.6	3.6	6.2	---	---	---	10.8	3.3	6.5	---	---	---
25	8.0	3.6	6.1	---	---	---	7.9	4.9	6.4	---	---	---
26	8.2	3.9	6.3	8.4	4.3	6.6	8.4	4.8	7.0	---	---	---
27	8.3	4.0	6.2	8.4	7.5	8.0	8.3	3.7	5.8	---	---	---
28	8.4	4.4	6.4	---	---	---	9.5	3.5	6.2	---	---	---
29	8.3	4.0	6.4	---	---	---	10.1	3.1	6.2	---	---	---
30	7.6	4.2	5.9	8.2	5.2	6.3	10.4	3.1	5.9	---	---	---
31	---	---	---	8.0	2.9	6.4	9.4	3.8	6.2	---	---	---
MONTH	9.9	3.6	6.8	8.9	2.9	6.4	10.8	2.7	6.1	11.6	2.0	5.6

CHRISTINA RIVER BASIN

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01480675 MARSH CREEK NEAR GLENMOORE, PA

LOCATION.--Lat 40°05'52", long 75°44'31", Chester County, Hydrologic Unit 02040205, on left bank, 200 ft north of Pennsylvania Turnpike, 1.2 mi downstream from Lyons Run, 1.8 mi upstream from Black Horse Creek, and 3 mi northeast of Glenmoore.

DRAINAGE AREA.--8.57 mi².

PERIOD OF RECORD.--July 1966 to current year.

REVISED RECORDS.--WDR PA-74-1: 1967(M), 1971-72(P).

GAGE.--Water-stage recorder and concrete control. Altitude of gage is 450 ft, from topographic map.

REMARKS.--Estimated daily discharges during the water year: Jan. 11-30, Feb. 4-8. Records good except for periods of estimated discharge, which are poor. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--19 years, 13.0 ft³/s, 20.60 in/yr.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 946 ft³/s June 22, 1972, gage height, 4.68 ft; minimum, 0.3 ft³/s Aug. 31, 1966, gage height, 0.98 ft.

EXTREMES FOR CURRENT YEAR.--Peak discharges above base of 130 ft³/s and maximum (*):

Date	Time	Discharge (ft ³ /s)	Gage height (ft)	Date	Time	Discharge (ft ³ /s)	Gage height (ft)
Feb. 12	2345	266	2.80	Sept. 27	2145	*275	*2.83

Minimum discharge, 1.3 ft³/s Sept. 12, 22, gage height, 1.23 ft.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	7.4	6.0	11	6.0	4.9	7.8	14	2.8	3.8	2.4	3.3	2.0
2	18	5.4	7.1	11	6.7	8.0	9.5	9.0	3.1	2.3	2.4	2.0
3	14	4.8	7.8	14	6.1	7.1	7.2	78	2.8	2.2	2.0	1.8
4	6.8	4.4	10	8.6	5.7	6.9	7.4	40	2.8	2.2	2.0	1.6
5	4.4	18	7.4	8.3	5.3	10	6.4	11	3.1	2.2	1.9	1.5
6	3.7	18	19	7.4	4.9	8.4	6.4	7.3	3.4	9.5	1.8	1.4
7	3.4	9.0	20	7.6	4.6	6.1	5.2	8.3	2.8	22	1.9	1.5
8	3.3	5.9	10	8.1	4.3	7.6	5.3	6.2	2.8	10	5.2	1.6
9	3.4	5.1	7.2	4.1	4.2	7.9	5.3	4.7	3.1	6.8	5.8	1.9
10	3.4	4.9	7.2	3.6	4.0	6.5	4.7	4.2	3.0	4.6	3.0	2.2
11	3.4	5.1	8.0	3.5	4.2	5.8	4.8	4.0	2.3	3.5	2.1	2.0
12	3.3	5.3	7.1	3.3	67	11	4.8	3.9	2.3	2.7	1.7	1.6
13	3.2	4.8	6.3	3.2	126	10	4.4	4.6	2.2	2.4	1.5	1.4
14	3.2	4.1	5.7	3.1	33	7.7	4.2	3.9	2.0	2.3	13	1.4
15	3.0	3.8	7.1	3.0	15	6.5	4.6	3.4	2.0	6.5	18	1.3
16	2.9	4.0	6.8	2.9	11	5.	5.0	3.6	15	14	5.4	1.3
17	3.0	3.9	6.3	2.8	9.7	5.5	4.7	9.7	22	4.1	2.8	1.3
18	3.3	3.9	5.9	2.8	9.9	5.0	3.7	23	12	2.6	2.1	1.3
19	3.2	6.3	6.1	2.7	11	4.3	3.7	11	5.2	2.2	2.1	1.3
20	3.6	5.8	7.3	2.7	12	5.1	3.4	5.2	3.3	2.2	2.0	1.3
21	3.9	4.1	7.1	2.6	11	4.9	3.3	4.9	2.9	2.0	2.4	1.3
22	4.1	3.8	13	2.5	14	4.6	3.2	12	2.6	2.1	2.3	1.3
23	14	3.7	10	2.5	21	8.0	3.0	9.5	2.3	1.9	2.1	1.4
24	16	3.8	6.9	2.4	20	9.5	3.1	8.9	2.3	1.8	2.0	1.4
25	11	4.0	7.7	2.4	15	11	3.5	5.9	2.0	2.0	5.9	1.3
26	7.7	4.1	5.4	2.4	12	7.3	3.4	4.0	2.0	3.2	14	1.5
27	5.6	4.1	5.2	2.3	11	5.7	3.0	3.5	2.0	12	9.0	157
28	5.3	4.6	6.1	2.3	8.9	5.7	2.8	3.9	2.6	9.1	3.9	140
29	27	39	6.4	2.3	---	6.2	2.7	4.5	3.0	3.8	2.5	21
30	20	29	5.7	2.3	---	5.9	2.6	3.6	2.6	2.5	2.3	7.4
31	8.9	---	5.1	3.5	---	6.0	---	3.6	---	3.1	2.5	---
TOTAL	223.4	228.7	251.9	136.2	462.4	217.1	145.3	308.1	123.3	150.2	128.9	365.3
MEAN	7.21	7.62	8.13	4.39	16.5	7.00	4.84	9.94	4.11	4.85	4.16	12.2
MAX	27	39	20	14	126	11	14	78	22	22	18	157
MIN	2.9	3.7	5.1	2.3	4.0	4.3	2.6	2.8	2.0	1.8	1.5	1.3
CFSM	.84	.89	.95	.51	1.93	.82	.56	1.16	.48	.57	.49	1.42
IN.	.97	.99	1.09	.59	2.01	.94	.63	1.34	.54	.65	.56	1.59

CAL YR 1984	TOTAL	7120.1	MEAN	19.5	MAX	213	MIN	2.5	CFSM	2.28	IN.	30.91
WTR YR 1985	TOTAL	2740.8	MEAN	7.51	MAX	157	MIN	1.3	CFSM	.88	IN.	11.90

CHRISTINA RIVER BASIN

01480685 MARSH CREEK NEAR DOWNINGTOWN, PA

LOCATION.--Lat 40°03'19", long 75°43'00", Chester County, Hydrologic Unit 02040205, on left bank 1,000 ft downstream from Marsh Creek Dam, 0.2 mi upstream from mouth and 3.0 mi north of Downingtown.

DRAINAGE AREA.--20.3 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--June 1973 to current year.

GAGE.--Water-stage recorder and concrete control. Altitude of gage is 280 ft, from topographic map.

REMARKS.--No periods of estimated daily discharge in this water year. Flow completely regulated since November 1973 by Marsh Creek Reservoir (station 01480684) 1,000 ft upstream.

AVERAGE DISCHARGE.--12 years, 33.0 ft³/s, 22.09 in/yr, adjusted for storage since November 1973.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 560 ft³/s Dec. 14, 1983, gage height, 3.70 ft, from rating curve extended above 200 ft³/s; minimum daily, 0.31 ft³/s Dec. 22, 23, 1973.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 349 ft³/s Dec. 10, gage height, 3.32 ft; minimum daily, 4.6 ft³/s Apr. 12-16.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP		
1	13	22	20	13	6.8	6.1	4.9	5.0	12	9.8	12	10		
2	16	20	20	11	6.9	5.0	4.8	5.2	11	9.2	9.2	10		
3	17	17	20	7.8	6.9	5.0	4.8	24	9.4	10	8.2	10		
4	17	16	20	7.8	6.9	5.1	4.8	73	9.1	11	7.6	9.7		
5	16	21	20	7.9	6.9	5.0	4.8	71	8.4	10	6.9	11		
6	15	35	20	7.9	6.8	5.1	4.8	37	7.5	10	7.2	13		
7	14	38	21	8.1	6.8	5.2	4.8	16	7.1	13	8.0	11		
8	13	33	20	11	8.0	5.1	4.8	17	7.0	14	10	11		
9	13	30	20	19	11	5.1	4.8	16	7.1	16	10	11		
10	12	28	151	19	11	5.2	4.8	13	7.2	15	9.6	11		
11	12	26	237	19	11	5.0	4.7	7.1	6.9	14	9.3	11		
12	12	24	235	19	13	5.1	4.6	7.5	7.1	13	8.6	11		
13	11	22	139	19	23	5.0	4.6	9.0	11	12	7.7	10		
14	10	21	8.8	19	55	4.9	4.6	9.1	13	11	8.3	8.1		
15	9.8	20	8.8	19	61	4.8	4.6	8.4	12	10	9.8	8.1		
16	9.5	20	8.8	19	61	4.8	4.6	8.1	15	16	8.7	8.1		
17	9.5	20	8.8	19	61	4.8	4.8	10	14	16	8.4	8.1		
18	9.3	20	8.8	19	61	4.8	4.8	28	13	15	8.4	8.1		
19	9.3	20	8.9	17	61	4.8	4.8	36	13	14	8.6	7.3		
20	9.8	20	8.8	13	61	4.8	4.8	24	12	12	8.8	6.8		
21	9.8	20	8.9	13	60	4.8	4.8	15	10	11	10	8.3		
22	10	20	8.9	13	59	4.8	4.9	16	9.1	12	11	10		
23	14	20	8.9	11	59	4.8	5.0	17	8.8	11	10	12		
24	17	20	9.1	6.8	60	4.8	5.0	17	10	9.3	9.6	12		
25	17	20	41	6.7	59	4.8	5.0	16	11	9.0	11	10		
26	17	19	59	6.7	59	4.8	4.9	15	10	11	15	9.6		
27	17	19	59	6.7	43	4.8	4.9	15	9.8	17	14	31		
28	16	19	59	6.7	12	4.8	5.0	14	10	17	12	89		
29	23	20	36	6.7	---	4.8	4.9	14	10	16	12	123		
30	26	20	13	6.7	---	4.8	4.9	13	10	13	11	106		
31	24	---	13	6.7	---	4.8	---	12	---	11	11	---		
TOTAL	439.0	670	1320.5	385.2	957.0	153.5	144.3	588.4	301.5	388.3	301.9	605.2		
MEAN	14.2	22.3	42.6	12.4	34.2	4.95	4.81	19.0	10.0	12.5	9.74	20.2		
MAX	26	38	237	19	61	6.1	5.0	73	15	17	15	123		
MIN	9.3	16	8.8	6.7	6.8	4.8	4.6	5.0	6.9	9.0	6.9	6.8		
MEAN‡	17.3	14.9	18.1	12.4	41.4	15.7	12.9	22.9	8.5	14.6	7.9	31.1		
CFSM‡	.85	.73	.89	.61	2.04	.77	.64	1.13	.42	.72	.39	1.53		
IN‡	.98	.82	1.03	.70	2.12	.89	.71	1.30	.47	.83	.45	1.71		
CAL YR 1984	TOTAL	18513.8	MEAN	50.6	MAX	326	MIN	6.4	MEAN‡	47.8	CFSM‡	2.35	IN‡	31.98
WTR YR 1985	TOTAL	6254.8	MEAN	17.1	MAX	237	MIN	4.6	MEAN‡	17.9	CFSM‡	.88	IN‡	11.97

† Adjusted for change in contents in Marsh Creek Reservoir.

CHRISTINA RIVER BASIN

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01480685 MARSH CREEK NEAR DOWNINGTOWN, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: October 1973 to current year.

INSTRUMENTATION.--Temperature recorder October 1973 to current year.

REMARKS.--Interruptions in the record were due to malfunctions of the instruments.

EXTREMES FOR PERIOD OF DAILY RECORD.--

WATER TEMPERATURE: Maximum, 31.5°C, Aug. 2, 1975, July 19, 1977; minimum, freezing point, February 3, 1980, Feb. 17, 1985.

EXTREMES FOR CURRENT YEAR.--

WATER TEMPERATURE: Maximum, 28.0°C, Aug. 3; minimum, 0.0°C, Feb. 17.

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	18.0	17.5	18.0	18.0	17.0	17.5	8.5	8.0	8.0	7.0	6.0	6.5
2	17.5	17.5	17.5	17.0	15.0	16.5	8.5	7.5	8.0	7.0	6.0	6.5
3	18.0	16.5	17.5	16.5	15.5	15.5	8.0	7.5	8.0	6.0	5.5	5.5
4	18.0	16.5	17.0	16.5	15.0	15.5	8.0	7.0	7.5	6.0	5.0	5.5
5	18.5	16.5	17.0	16.5	15.0	15.5	7.5	7.5	7.5	6.0	4.5	5.0
6	18.0	16.5	17.0	15.5	14.5	15.0	7.5	6.5	7.0	5.5	4.5	4.5
7	17.0	16.0	16.5	15.0	14.0	14.5	7.0	5.0	6.0	6.0	4.5	5.0
8	17.0	15.5	16.5	14.5	14.0	14.0	7.0	5.5	6.0	5.5	4.5	4.5
9	17.5	16.0	17.0	14.5	13.5	14.0	7.0	5.0	6.0	4.5	4.0	4.0
10	18.0	16.5	17.0	14.0	13.5	13.5	6.5	5.5	6.0	4.0	3.5	4.0
11	18.0	16.5	17.0	14.0	13.5	13.5	6.5	6.0	6.0	4.0	3.0	3.5
12	18.5	16.5	17.5	13.5	12.5	13.0	6.5	6.0	6.0	4.0	3.0	3.5
13	18.0	16.0	17.0	12.5	12.0	12.5	6.5	6.0	6.0	4.0	3.0	3.5
14	17.5	16.0	16.5	12.5	11.5	12.0	6.5	6.0	6.0	4.0	3.0	3.5
15	17.0	16.0	16.5	12.0	11.0	11.5	6.5	5.5	6.0	3.5	2.5	3.0
16	17.0	16.0	16.5	12.0	11.0	11.5	6.5	5.5	6.0	3.0	2.0	2.5
17	16.5	16.0	16.0	11.5	10.5	11.0	7.0	6.0	6.0	2.5	2.0	2.5
18	18.0	16.0	16.5	11.0	10.5	10.5	6.5	5.5	6.0	2.5	2.0	2.5
19	17.5	15.5	16.5	10.5	10.0	10.5	6.0	6.0	6.0	3.0	2.0	2.5
20	18.5	16.0	17.0	10.5	9.5	9.5	6.5	5.0	6.0	2.0	2.0	2.0
21	18.0	16.0	17.0	10.0	9.0	9.5	6.0	5.0	5.5	---	---	---
22	18.0	16.0	17.0	10.0	9.0	9.0	7.0	5.5	6.5	---	---	---
23	18.0	17.0	17.5	9.5	8.5	9.0	7.0	5.0	6.0	---	---	---
24	17.5	16.5	17.0	9.0	7.5	8.5	7.0	4.5	5.5	---	---	---
25	18.5	16.5	17.5	9.5	8.0	8.5	6.0	5.5	6.0	---	---	---
26	17.5	17.0	17.0	9.0	8.0	8.5	6.0	5.5	6.0	---	---	---
27	19.5	17.0	17.5	9.0	8.0	8.0	6.0	5.5	6.0	---	---	---
28	19.5	17.0	18.0	9.5	8.0	8.5	6.0	5.5	6.0	---	---	---
29	19.5	17.5	18.5	9.0	8.0	8.0	7.0	6.0	6.0	---	---	---
30	19.5	17.0	18.5	9.0	7.5	8.0	7.0	6.0	6.5	---	---	---
31	19.0	16.5	18.0	---	---	---	6.0	5.5	6.0	---	---	---
MONTH	19.5	15.5	17.0	18.0	7.5	12.0	8.5	4.5	6.5	7.0	2.0	4.0

CHRISTINA RIVER BASIN

01480685 MARSH CREEK NEAR DOWNINGTOWN, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	3.5	3.0	3.5	8.5	4.5	6.5	12.5	8.0	10.5
2	---	---	---	5.0	3.5	4.0	7.5	5.5	6.5	11.0	9.0	9.5
3	---	---	---	5.5	3.5	4.0	6.0	6.0	6.0	13.0	9.5	11.5
4	---	---	---	4.0	3.5	3.5	7.0	6.0	6.5	12.0	9.5	11.0
5	---	---	---	6.0	3.5	4.5	9.0	4.5	6.5	11.5	8.5	11.0
6	---	---	---	5.0	4.0	4.0	9.5	6.0	7.0	12.0	8.0	11.5
7	---	---	---	4.5	4.5	4.5	8.0	5.5	7.0	14.0	9.5	12.5
8	---	---	---	5.0	4.5	4.5	8.0	6.0	7.0	15.0	7.0	12.5
9	---	---	---	6.5	4.5	5.0	7.0	6.5	6.5	13.0	10.5	12.0
10	---	---	---	6.5	5.0	5.5	8.5	5.5	7.0	14.5	12.0	13.0
11	---	---	---	6.0	5.0	5.5	6.5	5.5	6.0	19.0	13.5	15.5
12	---	---	---	6.0	6.0	6.0	9.0	6.0	7.0	17.5	12.5	15.5
13	---	---	---	---	---	---	8.5	6.5	7.5	20.5	15.5	17.5
14	---	---	---	5.0	4.0	4.5	9.0	6.0	7.5	20.5	16.0	18.5
15	---	---	---	6.0	3.5	4.5	8.0	6.5	7.5	18.5	14.5	17.0
16	---	---	---	6.0	3.5	4.5	8.5	6.5	8.0	16.5	16.0	16.5
17	.0	.0	.0	6.0	4.0	4.5	11.5	6.5	9.0	16.5	16.0	16.5
18	.0	.0	.0	5.5	3.5	4.0	11.0	6.0	9.0	---	---	---
19	.5	.5	.5	6.0	3.5	4.5	12.5	5.0	9.0	---	---	---
20	.5	.5	.5	5.0	4.5	4.5	12.0	7.5	9.5	---	---	---
21	1.0	1.0	1.0	6.0	3.5	4.5	12.5	8.0	10.0	---	---	---
22	1.5	1.0	1.0	5.0	4.5	4.5	13.0	8.5	10.0	---	---	---
23	2.0	1.5	1.5	5.0	2.0	5.0	12.0	8.5	10.0	---	---	---
24	2.5	1.5	2.0	4.5	3.5	4.0	9.0	9.0	9.0	---	---	---
25	2.5	2.0	2.0	6.5	2.5	4.5	11.0	8.5	9.5	---	---	---
26	2.0	2.0	2.0	7.5	3.5	5.0	12.0	8.0	10.0	---	---	---
27	2.5	2.5	2.5	7.0	2.5	5.0	14.0	9.0	10.5	---	---	---
28	3.5	2.5	3.0	7.0	4.0	5.5	11.5	8.0	10.0	---	---	---
29	---	---	---	7.5	2.5	5.5	13.5	6.5	10.5	---	---	---
30	---	---	---	7.5	5.5	6.5	12.0	6.0	10.0	---	---	---
31	---	---	---	7.0	3.0	6.0	---	---	---	---	---	---
MONTH	3.5	.0	.5	7.5	2.0	4.5	14.0	4.5	8.0	20.5	7.0	13.5
DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
JUNE			JULY			AUGUST			SEPTEMBER			
1	---	---	---	20.0	18.0	19.0	26.5	25.5	26.0	14.0	13.0	13.5
2	---	---	---	21.0	12.5	17.0	26.5	25.0	25.5	15.0	13.5	14.0
3	---	---	---	13.0	11.5	12.0	28.0	24.5	26.0	15.0	13.0	13.5
4	22.0	17.0	19.5	14.0	11.5	12.5	27.0	25.0	26.0	15.0	12.5	13.5
5	20.5	15.5	20.0	13.0	11.5	12.5	27.0	24.5	25.5	14.0	11.5	12.5
6	23.5	16.5	21.0	13.0	11.5	12.0	25.5	20.5	24.0	12.5	11.0	11.5
7	22.5	17.0	21.0	17.5	13.5	16.0	20.5	19.5	20.0	12.0	10.5	11.0
8	---	---	---	17.5	16.0	17.0	22.5	20.0	21.0	11.5	10.5	11.0
9	---	---	---	20.5	17.5	18.0	23.5	21.5	22.5	11.5	10.5	10.5
10	---	---	---	19.0	17.5	18.0	23.5	22.0	22.5	11.5	10.5	10.5
11	---	---	---	19.0	17.0	18.0	23.5	21.5	22.5	11.5	10.5	11.0
12	---	---	---	17.5	16.5	17.0	23.0	21.0	22.0	11.5	10.0	10.5
13	---	---	---	17.0	16.0	16.5	21.5	20.0	20.5	11.0	10.0	10.5
14	19.5	16.5	17.5	16.5	15.5	16.0	23.0	20.5	21.5	11.5	9.5	10.5
15	18.5	16.5	17.0	18.5	15.5	15.5	25.5	23.0	24.0	11.5	10.0	10.5
16	18.5	17.0	18.0	23.5	19.5	22.0	23.0	21.5	22.5	11.5	10.0	10.5
17	22.5	18.0	20.5	23.5	21.0	22.0	23.0	20.5	21.5	11.5	10.0	10.5
18	23.0	21.5	22.0	24.0	22.0	23.0	21.0	20.5	21.0	11.5	10.5	10.5
19	23.5	21.5	22.5	24.0	21.5	22.5	20.5	17.5	19.0	19.0	10.5	13.0
20	24.0	21.5	22.5	23.5	21.5	22.5	18.0	17.0	17.5	22.0	19.0	20.5
21	24.5	21.5	22.5	23.0	21.5	22.0	17.0	15.0	16.5	22.0	20.0	21.0
22	23.5	21.5	22.5	23.5	20.5	22.5	16.5	14.5	15.0	22.0	20.5	21.0
23	25.0	22.0	23.0	23.0	21.0	22.0	15.5	14.0	14.5	22.0	21.0	21.5
24	24.5	21.5	23.0	21.5	19.5	20.5	14.5	13.0	14.0	22.5	21.5	22.0
25	22.5	20.5	21.5	20.5	16.5	19.0	15.0	13.0	14.0	23.0	21.0	21.5
26	22.0	18.5	20.5	20.0	18.0	18.5	18.0	15.5	17.0	21.5	19.0	21.0
27	21.0	18.5	19.5	23.5	20.0	21.5	17.5	15.5	16.5	22.0	18.5	20.5
28	20.0	18.5	19.0	23.5	21.5	22.5	17.0	15.0	15.5	22.5	21.0	22.0
29	21.0	18.5	19.5	23.0	21.5	22.0	16.5	15.0	15.5	22.0	20.5	21.0
30	19.5	18.5	19.0	26.5	20.5	23.5	16.0	14.5	15.0	21.0	20.5	20.5
31	---	---	---	26.0	22.0	24.5	15.0	13.5	14.0	---	---	---
MONTH	25.0	15.5	20.5	26.5	11.5	19.0	28.0	13.0	20.0	23.0	9.5	15.0

CHRISTINA RIVER BASIN

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01480700 EAST BRANCH BRANDYWINE CREEK NEAR DOWNINGTOWN, PA

LOCATION.--Lat 40°02'05", long 75°42'32", Chester County, Hydrologic Unit 02040205, on right bank 20 ft downstream from bridge on Dowlin Forge Road, 200 ft east of State Highway 282, 0.4 mi downstream from Shamona Creek, 1.5 mi downstream from Marsh Creek, 2.0 mi upstream from Beaver Creek, and 2.2 mi north of Downingtown.

DRAINAGE AREA.--60.6 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--Occasional low-flow measurements, water years 1948-57, October 1965 to current year.

GAGE.--Water-stage recorder. Altitude of gage is 270 ft, from topographic map. Prior to July 30, 1966, norecording gage at same site and datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 21-31, Feb. 4, 6, 8-11. Records good except for periods of estimated record, which are poor. Flow regulated since November 1973 by Marsh Creek Reservoir (station 01480684) 1.9 mi upstream. Several observations of water temperature were made during the year.

AVERAGE DISCHARGE.--20 years, 93.1 ft³/s, 20.85 in/yr, adjusted for storage since November 1973.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,070 ft³/s June 22, 1972, gage height, 12.06 ft, from flood-mark, from rating curve extended above 5,000 ft³/s; minimum, 7.2 ft³/s Sept. 2, 3, 11, 12, 13, 1966, gage height, 1.80 ft.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 2,490 ft³/s Sept. 27, minimum daily, 17 ft³/s Sept. 20.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	55	57	68	44	42	40	65	18	35	24	62	29
2	87	54	59	64	62	39	42	33	30	23	39	29
3	52	50	65	61	45	36	37	385	28	23	34	26
4	46	45	69	46	43	35	39	141	27	37	30	27
5	43	111	58	48	39	45	35	109	27	25	28	25
6	40	77	167	45	38	38	36	82	26	26	27	29
7	38	71	93	45	36	33	33	52	23	109	28	27
8	37	63	66	50	36	37	32	48	23	54	63	27
9	36	59	62	47	35	37	33	45	24	75	42	30
10	36	56	202	46	34	33	31	42	23	43	36	31
11	36	54	307	48	33	32	29	33	21	39	34	31
12	35	53	301	48	592	57	29	32	22	34	31	26
13	35	49	199	49	421	46	28	37	24	30	27	26
14	35	47	41	48	141	37	27	35	27	27	31	22
15	34	45	44	47	115	35	28	32	26	27	31	21
16	34	47	42	47	102	32	28	30	55	144	28	21
17	34	47	41	44	94	32	28	51	83	50	27	21
18	34	47	40	47	93	30	26	106	43	40	26	20
19	35	55	41	45	94	28	24	66	37	36	28	19
20	39	51	46	40	97	29	24	53	33	33	27	17
21	40	48	43	36	93	28	24	40	30	30	31	19
22	40	47	74	33	103	27	23	58	26	43	33	22
23	91	46	52	30	131	37	22	51	24	34	29	27
24	64	47	45	28	115	42	23	56	24	28	27	28
25	57	46	77	27	105	46	23	46	24	28	51	25
26	50	46	91	26	96	35	22	42	23	53	62	23
27	47	46	89	26	83	33	20	39	23	154	41	1040
28	46	48	89	25	48	32	19	39	24	58	35	344
29	135	264	69	25	---	34	19	44	27	47	32	171
30	70	95	44	24	---	32	19	36	27	41	32	139
31	62	---	43	24	---	31	---	35	---	58	33	---
TOTAL	1523	1871	2727	1263	2966	1108	868	1916	889	1473	1085	2346
MEAN	49.1	62.4	88.0	40.7	106	35.7	28.9	61.8	29.6	47.5	35.0	78.2
MAX	135	264	307	64	592	57	65	385	83	154	63	1040
MIN	34	45	40	24	33	27	19	18	21	23	26	17
MEAN†	52.2	55.0	63.5	40.7	113	46.4	37.0	65.7	28.1	49.6	33.2	89.1
CFSM†	.86	.91	1.05	.67	1.86	.77	.61	1.08	.46	.82	.55	1.47
IN†	.99	1.01	1.21	.77	1.94	.88	.68	1.25	.52	.94	.63	1.64

CAL YR 1984 TOTAL 50576 MEAN 138 MAX 1330 MIN 30 MEAN† 135 CFSM† 2.23 IN† 30.25
WTR YR 1985 TOTAL 10035 MEAN 54.9 MAX 1040 MIN 17 MEAN† 55.7 CFSM† .92 IN† 12.48

† Adjusted for change in contents in Marsh Creek Reservoir.

CHRISTINA RIVER BASIN

01480700 EAST BRANCH BRANDYWINE CREEK NEAR DOWNINGTOWN, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--November 1970 to current year.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CACO3)	HARD- NESS NONCAR- BONATE (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)
OCT 30...	1000	69	165	7.8	20.0	15.5	0.7	10.4	58	20	15	5.0
DATE		SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY WH WAT TOTAL FIELD MG/L AS CACO3	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)
OCT 30...		7.9	3.2	38	16	12	11	106	93	--	<.010	1.0
DATE		NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS. (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	IRON, DIS- SOLVED (UG/L AS FE)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	METHY- LENE BLUE ACTIVE SUB- STANCE (MG/L)
OCT 30...		0.03	0.37	.40	--	<0.01	<0.01	0.02	20	71	23	--

CHRISTINA RIVER BASIN

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01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA

LOCATION.--Lat 39°58'07", long 75°40'25", Chester County, Hydrologic Unit 02040205, on left bank at downstream side of Sugars Bridge (State Highway 322), 2,000 ft upstream from Valley Creek, 1.5 mi north of Marshallton, and 3.3 mi southeast of Downingtown.

DRAINAGE AREA.--89.9 mi².

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--February 1972 to current year.

REVISED RECORDS.--WDR PA-75-1: 1972(P), 1973, 1974.

GAGE.--Water-stage recorder. Altitude of gage is 195 ft, from topographic map. Feb. 1 to Apr. 10, June 25 to Nov. 17, 1972, nonrecording gage at same site and datum.

REMARKS.--Estimated daily discharges during the year: Jan. 21-23, 26-31, Feb. 5-11. Records good except for periods of estimated records, which are poor. Flow regulated since November 1973 by Marsh Creek Reservoir (station 01480684) about 7.5 mi upstream.

AVERAGE DISCHARGE.--13 years, 157 ft³/s, 23.68 in/yr, adjusted for storage since November 1973.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 8,160 ft³/s June 22, 1972, gage height, 13.4 ft, from floodmark, from rating curve extended above 3,600 ft³/s on basis of slope-area measurement of peak flow; minimum, 22 ft³/s Sept. 25, 1980; minimum gage height, 1.97 ft July 25, 1977.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 4,320 ft³/s Sept. 27, gage height, 10.38 ft; minimum daily, 27 ft³/s Sept. 18, 20.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	96	73	78	51	49	68	117	33	55	37	144	46
2	138	70	66	67	75	66	72	58	46	33	65	45
3	82	64	75	72	50	63	66	623	42	35	53	41
4	71	61	82	51	40	60	68	228	42	90	47	40
5	65	167	64	56	38	77	62	168	43	40	42	37
6	61	103	222	51	37	64	62	137	42	35	40	43
7	59	93	122	50	36	58	59	82	36	150	44	42
8	58	83	83	53	35	63	56	74	36	114	153	45
9	58	77	73	51	34	63	57	66	37	149	72	50
10	58	74	174	48	33	57	55	64	35	68	57	55
11	57	72	294	51	32	55	52	53	31	56	51	52
12	56	70	288	51	1170	94	53	51	31	46	45	41
13	54	65	221	50	678	79	50	62	33	42	39	36
14	53	62	50	49	239	64	50	54	38	37	41	31
15	51	60	53	50	179	60	51	48	36	38	44	30
16	50	61	50	42	157	56	52	48	95	224	38	30
17	51	60	48	47	143	55	51	95	177	72	38	29
18	51	61	46	48	138	53	48	176	67	53	37	27
19	51	73	49	47	139	49	47	103	56	48	41	29
20	58	65	53	38	143	51	47	83	48	43	39	27
21	57	61	52	38	134	50	46	62	46	40	48	29
22	58	59	89	37	145	49	45	85	38	58	49	32
23	131	58	61	37	186	64	43	83	35	47	40	41
24	94	59	52	40	171	73	44	88	34	36	36	44
25	83	59	78	35	157	78	46	70	33	41	111	39
26	71	57	93	33	142	61	45	62	31	86	133	39
27	68	57	93	32	129	57	41	57	39	331	67	2110
28	66	60	93	32	79	55	37	65	39	97	53	589
29	178	327	80	31	---	58	37	74	44	71	48	287
30	95	115	49	31	---	56	34	54	44	61	50	226
31	81	---	47	30	---	56	---	52	---	132	57	---
TOTAL	2260	2426	2978	1399	4588	1912	1593	3059	1409	2410	1822	4214
MEAN	72.9	80.9	96.1	45.1	164	61.7	53.1	98.7	47.0	77.7	58.8	140
MAX	178	327	294	72	1170	94	117	623	177	331	153	2110
MIN	50	57	46	30	32	49	34	33	31	33	36	27
MEAN†	76.0	73.5	72.6	45.1	171	72.4	61.2	103	45.5	79.8	57.0	151
CFSM†	.85	.82	.81	.50	1.90	.81	.68	1.15	.51	.89	.63	1.68
IN†	.98	.91	.93	.58	1.98	.93	.76	1.32	.56	1.02	.73	1.87

CAL YR 1984 TOTAL 80516 MEAN 220 MAX 2190 MIN 46 MEAN† 218 CFSM† 2.41 IN† 32.78
WTR YR 1985 TOTAL 30070 MEAN 82.4 MAX 2110 MIN 27 MEAN† 83.2 CFSM† .93 IN† 12.57

† Adjusted for change in contents in Marsh Creek Reservoir.

CHRISTINA RIVER BASIN

01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--October to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: February 1972 to current year.

pH: February 1972 to current year.

WATER TEMPERATURE: February 1972 to current year.

DISSOLVED OXYGEN: February 1972 to current year.

INSTRUMENTATION.--Water-quality monitor since February 1972.

REMARKS.--Not operated Nov. 4 to Mar. 4. Other interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 652 microsiemens Feb. 6, 1977; minimum, 67 microsiemens July 1, 1984.

pH: Maximum, 9.9 May 13, June 5, 1973; minimum, 5.4 Oct. 24, 26, 1973.

WATER TEMPERATURE: Maximum, 33.0°C July 19, 1977; minimum, 0.0°C on many days during winter months of most years.

DISSOLVED OXYGEN: Maximum, 16.9 mg/L Mar. 28, 1981, Mar. 28, 1982, minimum, 0.8 mg/L July 23, 1984.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	COLI- FORM, FECAL, 0.45 UM-MF (COLS./ 100 ML)
OCT							
03...	1430	81	--	6.8	14.0	--	K3300
09...	1430	56	285	7.3	16.5	11.2	K3100
17...	1400	46	295	7.2	15.5	11.3	560
23...	1400	163	214	6.8	17.5	8.6	5400
29...	1530	170	195	6.6	20.0	7.2	K35000
NOV							
07...	1430	97	210	6.8	11.0	11.2	K670
14...	1400	61	273	7.5	8.5	12.4	K240
20...	1330	63	269	7.8	4.0	13.8	7400
27...	1330	54	187	7.2	5.0	13.8	5400
MAR							
04...	1530	61	296	6.8	6.0	12.1	--
12...	1400	112	255	7.0	10.5	10.8	--
21...	1430	50	291	7.4	10.5	13.4	K110
27...	1500	57	292	7.7	14.0	13.1	880
APR							
03...	1430	67	281	7.7	8.0	14.4	K30000
10...	1200	59	293	7.8	9.5	15.2	1700
MAY							
14...	1430	55	273	7.7	24.5	11.8	6400
22...	1430	94	237	6.7	18.5	10.2	K1100
28...	1230	52	252	6.8	22.0	9.0	--
JUN							
04...	1430	43	296	7.2	21.5	9.5	--
11...	1430	32	302	7.4	22.5	10.4	K550
18...	1400	68	245	6.7	20.5	8.0	3700
26...	1500	34	314	7.4	21.0	10.4	--
JUL							
02...	1430	40	280	7.8	22.0	11.8	<90
09...	1530	103	213	6.7	22.5	7.8	--
17...	1500	70	248	6.9	26.0	8.8	--
AUG							
01...	1500	109	219	6.9	24.5	8.7	--
07...	1330	47	300	7.5	25.0	10.8	K200
14...	1500	43	298	7.6	28.0	10.9	1400
21...	1500	57	299	6.7	23.0	7.3	K1400
29...	1430	52	300	6.7	23.5	8.2	K14000
SEP							
05...	1430	40	320	6.9	26.0	7.8	2800
09...	1430	54	321	6.6	23.5	5.8	K590
17...	1430	34	360	6.6	19.0	7.7	K270
24...	1230	50	300	6.5	20.5	5.6	K280

01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25 °C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	---	---	---	230	200	219						
2	---	---	---	234	203	221						
3	---	---	---	223	164	192						
4	285	236	260	229	172	200						
5	279	235	252	---	---	---						
6	260	224	240	---	---	---						
7	244	209	228	---	---	---						
8	260	218	243	---	---	---						
9	---	---	---	---	---	---						
10	---	---	---	---	---	---						
11	---	---	---	---	---	---						
12	---	---	---	---	---	---						
13	---	---	---	---	---	---						
14	---	---	---	---	---	---						
15	---	---	---	---	---	---						
16	---	---	---	---	---	---						
17	---	---	---	---	---	---						
18	---	---	---	---	---	---						
19	---	---	---	---	---	---						
20	---	---	---	---	---	---						
21	---	---	---	---	---	---						
22	---	---	---	---	---	---						
23	---	---	---	---	---	---						
24	---	---	---	---	---	---						
25	---	---	---	---	---	---						
26	---	---	---	---	---	---						
27	---	---	---	---	---	---						
28	---	---	---	---	---	---						
29	---	---	---	---	---	---						
30	237	189	215	---	---	---						
31	244	201	225	---	---	---						
MONTH	285	189	238	234	164	208						
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	246	197	215	---	---	---
2				---	---	---	252	216	235	---	---	---
3				---	---	---	283	226	256	214	109	132
4				---	---	---	296	249	275	177	135	157
5				320	273	293	331	265	301	197	162	179
6				293	243	273	346	304	325	214	175	166
7				274	224	255	326	288	308	252	208	231
8				277	245	263	337	266	302	264	221	243
9				305	240	269	314	275	298	265	225	246
10				285	240	262	318	258	294	284	230	259
11				267	229	250	318	278	302	329	265	293
12				255	224	236	337	277	311	320	279	298
13				264	215	239	354	297	329	295	262	264
14				288	244	264	363	311	340	313	260	277
15				290	244	267	353	309	335	270	231	252
16				299	238	270	344	310	331	261	232	248
17				298	253	276	352	301	328	---	---	---
18				291	240	266	369	314	340	---	---	---
19				293	236	267	363	319	344	---	---	---
20				285	250	272	390	330	360	---	---	---
21				291	245	270	385	333	362	---	---	---
22				294	251	276	391	345	373	---	---	---
23				288	250	269	386	347	369	---	---	---
24				274	237	256	368	297	326	240	202	223
25				267	224	246	---	---	---	279	221	245
26				296	241	268	---	---	---	271	220	244
27				293	253	277	---	---	---	285	228	253
28				287	252	274	---	---	---	267	205	246
29				294	262	281	---	---	---	224	200	213
30				294	262	281	---	---	---	254	207	232
31				289	247	264	---	---	---	255	232	246
MONTH				320	215	266	391	197	315	329	109	236

CHRISTINA RIVER BASIN

01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	280	230	254	292	248	274	234	159	195	302	263	281
2	283	233	257	303	246	274	275	230	252	290	235	261
3	286	242	266	310	252	279	307	245	274	316	246	285
4	298	251	274	268	189	229	314	259	287	325	277	304
5	285	256	270	290	230	258	324	266	296	328	291	315
6	297	244	271	304	249	275	327	277	305	333	297	320
7	300	254	279	276	131	189	320	287	308	347	303	326
8	298	262	281	---	---	---	307	164	214	339	306	327
9	309	259	283	---	---	---	273	223	246	325	300	320
10	328	279	305	244	211	229	300	260	276	334	281	315
11	311	282	299	269	221	246	285	242	263	318	286	304
12	318	274	296	287	229	261	321	238	276	332	301	319
13	305	269	287	305	251	279	317	269	296	333	299	320
14	296	242	269	314	265	288	303	280	285	357	308	331
15	303	251	273	304	271	287	307	263	285	554	308	338
16	270	189	226	283	116	178	299	252	282	360	322	348
17	216	150	182	254	210	229	313	264	284	374	342	362
18	253	218	237	278	227	252	265	228	248	370	321	347
19	285	236	259	296	244	270	287	225	255	364	325	349
20	285	242	263	304	257	279	288	254	273	386	349	366
21	301	241	272	303	261	281	304	249	279	379	337	364
22	317	260	287	288	243	263	306	260	284	359	307	334
23	323	270	296	285	238	263	317	267	293	339	289	318
24	322	276	301	295	245	272	335	278	301	328	297	317
25	310	266	291	300	256	276	318	183	247	340	301	325
26	321	266	293	254	204	238	254	182	219	352	297	338
27	320	269	295	188	141	160	291	242	267	283	96	125
28	308	266	286	229	180	201	303	255	281	185	126	155
29	331	272	299	253	212	233	308	267	290	204	185	195
30	300	271	285	269	231	251	307	269	289	214	196	205
31	---	---	---	274	157	238	293	249	266	---	---	---
MONTH	331	150	275	314	116	250	335	159	272	386	96	304

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.0	6.5	6.8	7.0	6.7	6.8						
2	7.0	6.9	7.0	7.2	6.7	6.7						
3	7.2	6.8	7.0	7.2	6.6	6.9						
4	7.3	6.7	6.9	7.4	6.8	7.0						
5	7.4	6.7	6.9	7.5	7.0	7.2						
6	7.4	6.7	6.9	7.7	7.3	7.6						
7	7.5	6.6	6.9	---	---	---						
8	7.5	6.6	6.9	---	---	---						
9	7.6	6.7	6.9	---	---	---						
10	7.7	6.6	6.9	---	---	---						
11	7.9	6.6	7.0	---	---	---						
12	7.8	6.6	7.0	---	---	---						
13	7.9	6.6	7.0	---	---	---						
14	7.9	6.5	7.0	---	---	---						
15	7.9	6.5	7.0	---	---	---						
16	7.7	6.5	6.9	---	---	---						
17	7.6	6.5	6.8	---	---	---						
18	7.9	6.6	7.0	---	---	---						
19	7.8	6.6	7.0	---	---	---						
20	7.4	6.5	6.9	---	---	---						
21	7.4	6.8	7.0	---	---	---						
22	7.3	6.9	7.1	---	---	---						
23	---	---	---	---	---	---						
24	---	---	---	---	---	---						
25	---	---	---	---	---	---						
26	---	---	---	---	---	---						
27	---	---	---	---	---	---						
28	---	---	---	---	---	---						
29	---	---	---	---	---	---						
30	7.1	6.6	6.8	---	---	---						
31	7.4	6.7	6.9	---	---	---						
MONTH	7.9	6.5	6.9	7.7	6.6	7.0						

CHRISTINA RIVER BASIN

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01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	7.5	6.5	6.8	8.1	6.7	7.2
2				---	---	---	7.6	6.4	6.9	7.3	6.6	6.8
3				---	---	---	7.8	6.4	6.9	6.6	6.2	6.3
4				7.1	6.8	7.0	7.9	6.6	7.2	6.8	6.4	6.6
5				7.4	6.9	7.1	8.4	6.7	7.4	7.0	6.5	6.7
6				7.3	7.1	7.2	8.6	6.9	7.5	6.9	6.6	6.7
7				7.2	7.0	7.1	8.4	6.8	7.4	7.2	6.6	6.9
8				7.2	6.9	7.0	8.2	6.7	7.3	7.3	6.6	6.9
9				7.3	6.8	7.0	8.0	6.6	7.1	7.5	6.6	6.9
10				7.2	6.8	7.0	8.1	6.5	7.2	7.8	6.6	7.0
11				7.1	6.8	6.9	7.9	6.6	7.1	7.8	6.6	7.1
12				7.1	6.7	6.8	8.3	6.6	7.4	8.0	6.7	7.1
13				7.3	6.6	6.9	8.5	6.8	7.5	8.0	6.7	7.1
14				7.4	6.7	7.0	8.4	6.8	7.5	7.8	6.6	7.1
15				7.2	6.7	6.9	8.0	6.8	7.2	7.7	6.4	6.9
16				7.1	6.6	6.8	8.3	6.8	7.4	7.1	6.4	6.7
17				7.3	6.6	6.9	8.3	6.7	7.4	---	---	---
18				7.2	6.6	6.8	8.3	6.7	7.3	---	---	---
19				7.1	6.5	6.8	8.2	6.7	7.3	---	---	---
20				7.1	6.6	6.8	8.2	6.8	7.3	---	---	---
21				8.3	6.6	7.0	7.7	6.8	7.1	---	---	---
22				7.3	6.7	6.9	7.4	6.8	7.0	---	---	---
23				7.0	6.5	6.7	7.4	6.7	7.0	---	---	---
24				7.1	6.5	6.7	6.6	6.4	6.6	7.2	6.7	6.9
25				7.5	6.5	6.9	7.8	6.4	6.9	7.3	6.7	6.9
26				7.5	6.5	6.9	7.9	6.7	7.1	7.3	6.7	6.9
27				7.6	6.6	7.0	8.0	6.7	7.2	7.4	6.7	7.0
28				8.1	6.7	7.2	7.5	6.8	7.0	7.1	6.4	6.7
29				8.2	6.7	7.3	7.8	6.7	7.1	6.9	6.4	6.6
30				8.0	6.7	7.2	8.0	6.7	7.1	7.1	6.4	6.7
31				7.1	6.5	6.8	---	---	---	6.6	6.4	6.5
MONTH				8.3	6.5	6.9	8.6	6.4	7.2	8.1	6.2	6.8
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	7.1	6.4	6.7	7.5	6.4	6.9	7.0	6.1	6.5	6.6	6.3	6.4
2	7.2	6.4	6.7	7.9	6.4	7.0	7.2	6.4	6.7	6.6	6.2	6.4
3	7.0	6.4	6.6	8.0	6.5	7.1	7.4	6.4	6.8	6.6	6.2	6.4
4	7.5	6.5	6.9	7.2	6.4	6.7	7.4	6.4	6.8	6.7	6.3	6.5
5	6.8	6.6	6.7	7.3	6.5	6.8	7.6	6.4	6.8	7.0	6.4	6.5
6	7.5	6.6	6.9	7.1	6.5	6.8	7.8	6.4	6.9	6.9	6.4	6.6
7	7.5	6.5	6.9	6.7	6.2	6.5	7.8	6.4	6.9	6.8	6.3	6.5
8	7.1	6.6	6.7	---	---	---	6.8	6.3	6.5	6.6	6.4	6.5
9	7.4	6.5	6.9	---	---	---	7.3	6.3	6.7	6.7	6.3	6.4
10	7.5	6.5	6.9	6.8	6.4	6.6	7.1	6.4	6.6	6.7	6.4	6.5
11	7.6	6.6	7.0	7.0	6.4	6.7	7.2	6.3	6.7	6.7	6.4	6.5
12	7.7	6.6	7.0	7.1	6.4	6.7	7.0	6.3	6.6	6.7	6.3	6.5
13	7.5	6.6	6.9	7.3	6.5	6.8	7.3	6.3	6.6	6.6	6.3	6.4
14	7.5	6.5	6.9	7.3	6.5	6.8	7.6	6.4	6.8	6.6	6.2	6.4
15	7.7	6.5	6.9	7.1	6.4	6.6	7.6	6.3	6.7	6.6	6.2	6.4
16	7.1	6.4	6.6	6.5	6.0	6.3	6.9	6.3	6.6	6.5	6.2	6.3
17	6.6	6.3	6.5	7.1	6.3	6.6	7.1	6.3	6.6	6.7	6.2	6.4
18	7.0	6.4	6.7	7.1	6.4	6.6	6.5	6.2	6.4	6.8	6.4	6.5
19	7.3	6.6	6.8	7.2	6.4	6.7	6.7	6.2	6.4	6.9	6.4	6.6
20	7.4	6.6	6.9	7.3	6.4	6.7	6.8	6.3	6.5	6.9	6.4	6.6
21	7.5	6.5	6.9	7.7	6.4	6.9	6.9	6.3	6.5	6.9	6.5	6.6
22	7.7	6.5	7.0	7.8	6.4	6.9	6.9	6.4	6.6	6.8	6.4	6.5
23	7.7	6.5	7.0	7.8	6.3	6.8	6.9	6.4	6.6	6.5	6.4	6.4
24	7.7	6.5	7.0	7.9	6.3	6.8	7.0	6.4	6.6	6.6	6.4	6.5
25	7.7	6.5	6.9	7.9	6.3	6.8	6.5	6.3	6.4	6.8	6.4	6.5
26	7.6	6.5	6.9	7.1	6.3	6.6	6.7	6.3	6.4	6.6	6.4	6.5
27	7.5	6.5	6.8	6.4	6.2	6.3	6.8	6.4	6.6	6.5	5.9	6.1
28	7.4	6.4	6.8	6.9	6.3	6.5	6.9	6.4	6.6	6.4	6.1	6.3
29	7.7	6.5	6.9	6.9	6.3	6.5	6.8	6.4	6.5	6.5	6.4	6.4
30	7.1	6.4	6.7	7.1	6.3	6.6	6.7	6.3	6.5	6.5	6.4	6.5
31	---	---	---	6.7	6.1	6.4	6.6	6.3	6.4	---	---	---
MONTH	7.7	6.3	6.8	8.0	6.0	6.7	7.8	6.1	6.6	7.0	5.9	6.4

CHRISTINA RIVER BASIN

01480870 EAST BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	17.0	14.0	15.0	17.0	16.0	16.5						
2	18.0	16.0	17.5	16.5	12.5	15.5						
3	18.0	13.5	15.5	12.5	10.5	11.5						
4	15.5	12.0	13.5	14.5	10.5	12.5						
5	15.5	12.0	14.0	---	---	---						
6	15.0	12.5	14.0	---	---	---						
7	14.0	11.0	12.5	---	---	---						
8	15.0	12.5	14.0	---	---	---						
9	---	---	---	---	---	---						
10	---	---	---	---	---	---						
11	---	---	---	---	---	---						
12	---	---	---	---	---	---						
13	---	---	---	---	---	---						
14	---	---	---	---	---	---						
15	---	---	---	---	---	---						
16	---	---	---	---	---	---						
17	---	---	---	---	---	---						
18	---	---	---	---	---	---						
19	---	---	---	---	---	---						
20	---	---	---	---	---	---						
21	---	---	---	---	---	---						
22	---	---	---	---	---	---						
23	---	---	---	---	---	---						
24	---	---	---	---	---	---						
25	---	---	---	---	---	---						
26	---	---	---	---	---	---						
27	---	---	---	---	---	---						
28	---	---	---	---	---	---						
29	---	---	---	---	---	---						
30	18.5	16.0	17.5	---	---	---						
31	18.5	16.5	17.5	---	---	---						
MONTH	18.5	11.0	15.0	17.0	10.5	14.0						
DAY	MAX	MIN FEEURARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	12.0	8.5	10.0	24.0	16.0	19.5
2				---	---	---	10.5	7.5	9.0	20.0	15.0	17.5
3				---	---	---	9.0	6.0	7.5	15.0	11.5	13.0
4				---	---	---	11.0	6.0	8.5	17.5	11.5	14.5
5				12.5	6.5	9.0	16.5	9.0	13.0	20.0	14.0	17.0
6				9.5	5.5	7.0	19.0	14.0	16.0	18.0	16.0	17.0
7				7.5	4.0	6.0	15.5	11.5	13.0	18.5	16.5	17.0
8				9.5	7.0	8.0	13.5	9.0	11.0	20.0	14.5	17.0
9				12.0	7.0	9.5	10.0	7.0	8.5	19.5	13.5	16.5
10				12.5	7.0	9.5	12.0	5.0	8.5	22.5	15.5	18.5
11				10.0	7.0	9.0	11.0	8.0	9.0	24.5	18.0	21.0
12				11.5	8.5	9.5	15.0	7.5	11.0	25.0	20.0	21.5
13				11.5	6.5	9.0	16.5	11.5	14.0	25.0	20.0	21.5
14				13.0	9.5	10.5	17.0	12.5	14.5	23.5	19.5	21.0
15				11.5	7.5	9.0	15.5	14.0	14.5	22.0	18.5	20.0
16				10.5	5.5	8.0	18.0	14.0	16.0	19.0	17.5	18.0
17				11.5	7.0	8.5	18.5	12.5	15.0	---	---	---
18				9.5	5.0	7.0	19.5	11.5	15.5	---	---	---
19				9.5	3.5	6.5	22.5	15.5	19.0	---	---	---
20				9.5	6.5	7.5	24.0	18.0	20.5	---	---	---
21				10.5	5.5	8.0	26.0	18.5	22.0	---	---	---
22				8.5	6.0	7.0	26.5	19.0	22.5	---	---	---
23				8.0	6.5	7.0	25.5	19.5	22.0	---	---	---
24				8.0	7.0	7.5	20.0	15.0	17.0	19.5	15.5	17.5
25				11.0	6.5	8.5	18.5	14.0	16.0	22.0	16.5	19.0
26				11.5	5.5	8.5	22.5	14.0	18.0	23.0	17.0	20.0
27				13.5	6.5	10.0	24.0	17.0	20.0	24.5	18.5	21.5
28				15.5	10.5	13.0	19.5	15.5	17.5	22.5	20.0	21.0
29				17.0	13.5	15.5	21.5	13.5	17.0	20.0	18.0	19.0
30				15.5	13.0	14.5	23.5	14.5	19.0	22.0	16.0	19.0
31				12.5	9.0	11.0	---	---	---	19.5	18.5	19.0
MONTH				17.0	3.5	9.0	22.0	5.0	15.0	25.0	11.5	18.5

CHRISTINA RIVER BASIN

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01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	24.0	18.5	21.0	21.0	18.0	19.5	25.0	22.0	23.0	21.0	19.0	20.0
2	23.5	18.0	20.5	23.5	18.0	20.5	24.5	20.5	22.5	22.5	18.5	20.0
3	23.0	19.0	21.0	24.5	19.5	21.5	25.5	20.0	22.0	24.5	20.0	22.0
4	22.5	20.0	21.0	24.5	20.0	22.0	25.0	20.5	22.5	26.0	21.0	23.0
5	20.5	18.0	19.0	24.5	20.5	22.0	26.0	20.0	23.0	26.5	22.0	24.0
6	23.0	17.0	19.5	23.5	21.0	22.0	25.5	20.5	23.0	26.0	22.5	24.0
7	21.5	17.0	19.5	24.0	20.0	21.5	26.5	22.0	24.0	26.0	22.0	24.0
8	19.5	18.0	18.5	---	---	---	24.5	22.5	23.5	24.0	22.5	23.5
9	22.5	17.5	20.0	---	---	---	26.0	22.0	24.0	24.0	21.0	22.5
10	25.5	19.5	22.0	23.0	20.5	22.0	26.5	23.5	24.5	24.0	21.0	22.5
11	23.0	20.0	21.5	25.5	20.5	22.5	25.5	23.0	24.0	23.0	19.0	21.0
12	24.5	20.0	22.0	24.0	20.5	22.0	27.0	21.5	24.0	20.5	16.5	18.0
13	21.5	18.0	20.0	25.5	20.5	23.0	26.0	21.0	23.5	17.5	15.0	16.0
14	21.0	15.5	18.0	27.0	22.0	24.5	28.0	23.5	25.5	18.5	13.5	15.5
15	21.5	16.0	18.5	26.0	23.0	24.5	29.0	24.5	26.5	19.0	13.5	16.0
16	21.0	18.5	19.5	25.5	21.5	23.5	26.0	24.0	25.0	20.0	14.0	16.5
17	21.0	17.0	19.0	26.5	22.0	24.0	25.0	22.0	23.5	20.0	15.0	17.0
18	22.0	19.5	20.5	26.5	21.0	23.5	22.5	21.0	21.5	20.0	15.5	17.5
19	24.0	19.5	21.5	27.0	21.5	24.0	24.0	20.0	22.0	21.5	16.0	18.5
20	24.0	19.0	21.0	26.5	22.5	24.5	25.0	22.0	23.0	22.0	17.0	19.5
21	23.5	17.5	20.5	28.0	22.5	25.0	23.5	21.5	23.0	21.5	17.5	19.5
22	24.0	19.0	21.5	27.0	24.0	25.0	23.5	20.0	21.5	20.5	18.0	19.5
23	26.0	21.0	23.0	26.5	22.0	24.0	23.0	18.5	20.5	20.0	19.0	19.5
24	27.0	21.5	24.0	26.5	19.5	22.5	23.0	18.5	20.5	22.0	19.5	20.5
25	24.0	20.0	22.0	26.5	21.0	22.5	21.5	20.0	20.5	21.5	17.5	19.5
26	21.0	18.5	19.5	24.5	23.0	23.5	23.0	20.0	21.5	19.0	17.0	18.5
27	20.5	17.0	19.0	24.5	21.5	23.0	25.0	21.5	23.0	19.0	18.0	18.5
28	20.0	17.5	18.5	25.5	21.0	23.0	24.5	20.5	22.5	19.0	17.0	18.0
29	23.0	18.0	20.0	25.0	21.5	23.0	24.5	20.0	22.0	20.0	16.5	18.5
30	21.0	19.5	20.5	26.0	21.5	23.5	24.0	21.0	22.5	19.5	16.5	18.0
31	---	---	---	24.5	23.0	24.0	22.0	20.0	21.0	---	---	---
MONTH	26.0	15.5	20.5	28.0	18.0	23.5	29.0	18.5	23.0	26.5	13.5	19.5

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	11.5	9.8	10.4	11.7	10.3	10.8						
2	10.3	9.4	9.8	11.7	10.0	10.7						
3	10.6	8.7	9.7	12.7	10.9	12.3						
4	10.4	8.5	9.2	12.7	10.7	12.0						
5	10.8	8.4	9.3	---	---	---						
6	10.8	8.4	9.3	---	---	---						
7	11.5	8.5	9.7	---	---	---						
8	11.1	7.8	9.3	---	---	---						
9	---	---	---	---	---	---						
10	---	---	---	---	---	---						
11	---	---	---	---	---	---						
12	---	---	---	---	---	---						
13	---	---	---	---	---	---						
14	---	---	---	---	---	---						
15	---	---	---	---	---	---						
16	---	---	---	---	---	---						
17	---	---	---	---	---	---						
18	---	---	---	---	---	---						
19	---	---	---	---	---	---						
20	---	---	---	---	---	---						
21	---	---	---	---	---	---						
22	---	---	---	---	---	---						
23	---	---	---	---	---	---						
24	---	---	---	---	---	---						
25	---	---	---	---	---	---						
26	---	---	---	---	---	---						
27	---	---	---	---	---	---						
28	---	---	---	---	---	---						
29	---	---	---	---	---	---						
30	10.0	7.8	9.1	---	---	---						
31	11.8	10.0	10.8	---	---	---						
MONTH	11.8	7.8	9.7	12.7	10.0	11.5						

CHRISTINA RIVER BASIN

01480870 EAST BRANCH BRANDYWINE CREEK BELOW DOWNINGTOWN, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	13.1	9.2	10.9	11.7	4.9	7.6
2				---	---	---	14.4	9.2	11.4	9.8	4.9	7.1
3				---	---	---	14.5	9.3	11.4	8.7	7.0	8.2
4				---	---	---	15.0	9.3	11.8	8.8	5.4	7.4
5				12.4	11.3	11.8	15.7	7.1	11.2	8.4	5.4	6.8
6				13.7	11.3	12.6	15.2	6.8	9.6	8.2	6.6	7.4
7				14.4	12.3	13.2	15.3	7.1	10.3	9.6	6.6	8.1
8				13.3	11.5	12.4	15.3	8.1	11.2	10.5	7.7	9.0
9				13.4	10.1	11.9	15.4	8.7	11.6	11.1	7.5	9.1
10				12.0	9.8	10.7	15.6	8.8	11.9	11.3	6.6	8.7
11				11.8	9.6	10.6	14.4	8.5	10.9	11.1	6.0	8.0
12				11.9	9.1	10.4	15.6	7.5	11.3	10.8	5.8	7.7
13				13.5	10.1	11.9	15.2	6.7	10.3	10.7	5.5	7.5
14				13.2	9.8	11.1	14.4	6.1	9.5	11.8	5.4	7.6
15				13.6	10.0	11.7	12.5	5.9	8.4	11.6	5.2	7.6
16				14.1	10.8	12.2	13.3	5.6	8.9	9.9	5.8	7.4
17				13.8	10.4	11.8	13.9	5.5	9.1	---	---	---
18				14.1	10.3	12.1	14.2	5.4	9.2	---	---	---
19				14.5	11.2	12.6	13.8	4.5	8.3	---	---	---
20				14.0	10.4	11.8	13.5	4.3	7.9	---	---	---
21				14.2	10.0	11.6	12.9	3.7	7.4	---	---	---
22				13.4	9.5	11.2	12.2	3.5	6.8	---	---	---
23				12.4	9.7	10.6	12.1	3.5	6.9	---	---	---
24				12.4	9.6	10.7	---	---	---	9.2	7.1	8.2
25				13.2	9.4	10.9	---	---	---	9.1	6.8	7.8
26				13.5	9.0	11.0	11.5	4.8	8.7	9.0	6.5	7.6
27				13.3	8.5	10.4	10.7	4.1	6.9	9.1	6.2	7.4
28				14.0	7.4	10.2	9.4	4.1	6.4	8.6	6.1	7.0
29				13.8	7.0	9.6	11.4	5.5	8.0	9.2	6.6	7.9
30				14.2	6.8	9.5	11.5	5.2	7.8	9.5	6.4	8.0
31				12.0	8.0	9.8	---	---	---	7.8	6.2	6.9
MONTH				14.5	6.8	11.3	15.7	3.5	9.4	11.8	4.9	7.8
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	8.9	5.8	7.2	10.7	6.2	8.1	8.7	5.5	6.9	8.1	4.2	5.6
2	9.4	5.9	7.4	11.9	6.1	8.3	9.3	5.2	6.8	8.8	3.7	5.7
3	9.0	5.6	6.8	12.4	5.7	8.1	10.0	5.0	6.9	7.5	3.2	5.0
4	9.8	5.7	7.5	9.6	5.8	7.3	10.3	4.5	6.7	7.4	2.9	4.6
5	7.8	6.0	6.9	9.7	5.9	7.3	11.1	4.3	6.8	7.8	2.7	4.6
6	9.9	6.4	7.9	9.0	5.7	7.1	11.9	3.7	6.9	7.3	2.6	4.4
7	10.2	6.2	7.9	7.9	5.6	7.1	11.5	3.2	6.1	7.2	2.4	4.1
8	9.1	6.2	7.3	---	---	---	8.1	3.1	5.8	5.8	2.4	3.8
9	9.7	5.7	7.6	---	---	---	9.5	3.6	6.1	6.1	2.7	4.0
10	9.2	5.4	6.9	7.7	6.0	6.7	8.7	3.3	5.2	6.7	2.6	4.1
11	10.8	5.1	7.5	8.0	5.7	6.7	9.3	3.1	5.4	7.2	3.1	5.0
12	10.8	6.0	7.7	8.5	5.6	6.7	8.7	2.7	4.8	7.8	4.1	5.7
13	10.9	5.7	8.0	8.6	5.1	6.7	9.7	2.7	5.3	7.6	4.5	5.9
14	11.1	6.7	8.6	8.6	4.5	6.1	10.9	2.3	5.2	8.2	4.1	5.7
15	11.6	6.3	8.2	8.4	4.1	5.6	10.1	2.0	4.8	7.9	3.7	5.1
16	9.8	6.0	7.6	7.0	4.2	6.1	7.3	1.9	4.3	6.7	3.2	4.5
17	8.4	6.8	7.8	8.8	5.4	6.6	9.3	2.5	4.9	7.7	3.1	4.6
18	9.0	6.6	7.4	8.8	5.3	6.7	6.7	2.9	4.5	8.3	3.5	5.5
19	9.6	6.4	7.7	9.2	4.6	6.4	7.7	3.1	4.9	8.5	3.4	5.4
20	10.0	6.3	7.7	9.7	4.3	6.3	7.9	2.7	4.7	8.0	2.9	4.7
21	10.5	6.4	8.1	10.9	4.0	6.6	7.7	2.7	4.6	7.9	2.8	4.5
22	11.0	5.8	8.1	10.7	3.5	6.4	8.7	3.6	5.7	7.9	2.7	4.4
23	10.4	5.1	7.3	11.6	3.8	6.7	8.2	3.7	5.6	5.3	2.8	3.5
24	10.0	4.5	6.7	12.4	4.3	7.1	9.1	3.6	5.7	6.4	2.6	3.9
25	10.4	4.2	6.6	12.2	3.9	6.9	6.4	3.4	5.2	8.1	3.1	5.2
26	10.8	4.9	7.3	8.8	3.6	5.7	7.6	4.3	6.2	6.8	3.6	4.9
27	10.8	5.4	7.4	7.3	5.2	6.6	7.4	4.1	5.5	8.3	5.6	7.7
28	10.9	5.3	7.6	8.5	5.6	7.0	7.9	4.0	5.6	8.6	7.8	8.3
29	11.0	5.8	7.7	8.9	5.4	6.7	8.3	3.7	5.4	8.6	7.5	8.1
30	9.4	5.1	7.0	9.4	4.6	6.6	8.0	3.6	5.4	8.3	7.1	7.8
31	---	---	---	7.5	3.9	5.4	7.8	4.0	5.6	---	---	---
MONTH	11.6	4.2	7.5	12.4	3.5	6.8	11.9	1.9	5.6	8.8	2.4	5.2

CHRISTINA RIVER BASIN

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01481000 BRANDYWINE CREEK AT CHADDS FORD, PA

LOCATION.--Lat 39°52'11", long 75°35'37", Delaware County, Hydrologic Unit 02040205, on left bank 27 ft upstream from Penn Central Railroad bridge at Chadds Ford, 150 ft upstream from Harvey Run and 1,200 ft downstream from highway bridge on U.S. Highway 1.

DRAINAGE AREA.--287 mi², including that of Harvey Run.

WATER-DISCHARGE RECORDS

PERIOD OF RECORD.--August 1911 to December 1953, October 1962 to current year. Monthly discharge only for some periods, published in WSP 1302.

REVISED RECORDS.--WSP 756: Drainage area. WSP 1202: 1917-18 (M), 1919-20, 1922-31 (M), 1932-33. 1934 (M), 1936, 1938 (P), 1939 (M), 1942, 1944-46 (M).

GAGE.--Water-stage recorder. Datum of gage is 150.45 ft above National Geodetic Vertical Datum of 1929. Prior to May 21, 1927, nonrecording gage at same site and datum.

REMARKS.--Estimated daily discharges during the water year: Jan. 21-31, Feb. 5-11. Records good except for periods of estimated record, which are poor. Flow regulated since November 1973 by Marsh Creek Reservoir (station 01480684) about 17 mi upstream.

AVERAGE DISCHARGE.--65 years (water years 1911-53, 1962-85), 400 ft³/s, 18.92 in/yr, adjusted for storage since November 1973.

EXTREMES FOR PERIOD OF RECORD.--Maximum discharge, 23,800 ft³/s June 22, 1972, gage height, 16.56 ft from rating curve extended above 9,000 ft³/s on basis of area-velocity study; minimum, 4.9 ft³/s Oct. 2, 1941, gage height, 0.28 ft; minimum daily, 42 ft³/s Sept. 12, 1966.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 8,700 ft³/s Feb. 13, gage height, 11.46 ft; minimum daily, 89 ft³/s Sept. 20.

DISCHARGE, IN CUBIC FEET PER SECOND, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MEAN VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	285	214	282	197	275	244	406	145	170	128	670	123
2	441	209	234	213	553	240	298	164	153	125	197	117
3	274	200	244	279	288	229	240	1350	151	122	146	112
4	222	190	293	213	205	225	252	593	166	212	133	106
5	203	573	230	227	195	266	232	346	149	141	126	103
6	196	360	639	218	185	242	224	297	150	124	120	104
7	185	252	473	207	180	216	217	238	140	359	121	102
8	185	223	284	215	170	231	205	218	140	228	816	105
9	189	211	250	190	165	233	209	200	145	400	243	125
10	190	207	292	175	160	217	207	191	141	180	185	130
11	185	201	466	196	155	209	200	181	131	159	146	127
12	182	204	466	191	2750	278	200	170	129	139	137	106
13	181	192	443	200	3570	283	193	197	129	132	122	99
14	178	184	221	192	827	226	190	176	130	124	123	94
15	172	181	218	187	655	216	194	161	124	122	122	94
16	173	184	212	162	620	207	198	158	204	404	117	94
17	176	179	206	190	628	208	190	285	466	185	118	93
18	178	175	199	191	629	201	182	468	204	131	116	91
19	178	215	202	184	636	193	177	267	162	124	121	90
20	197	199	218	160	485	195	175	213	143	114	119	89
21	192	181	208	155	330	194	173	183	143	114	121	94
22	185	178	307	150	326	190	168	221	133	129	126	91
23	388	174	262	145	394	223	161	223	130	156	116	97
24	324	177	217	140	400	248	166	248	123	113	111	101
25	272	174	242	135	367	271	169	199	122	110	192	100
26	229	177	248	130	338	229	169	178	117	204	328	98
27	217	174	243	125	330	209	160	168	115	715	166	3720
28	206	175	244	125	266	206	152	159	135	314	131	2350
29	454	888	240	125	---	207	151	206	134	163	119	509
30	292	481	200	120	---	212	147	169	139	141	118	361
31	233	---	188	120	---	205	---	159	---	239	132	---
TOTAL	7162	7332	8671	5457	16082	6953	6005	8131	4618	6051	5658	9625
MEAN	231	244	280	176	574	224	200	262	154	195	183	321
MAX	454	888	639	279	3570	283	406	1350	466	715	816	3720
MIN	172	174	188	120	155	190	147	145	115	110	111	89
MEAN†	234	237	256	176	581	235	208	266	152	197	181	332
CFSM†	.82	.83	.89	.61	2.02	.82	.72	.93	.53	.69	.63	1.16
IN†	.94	.92	1.03	.71	2.11	.94	.81	1.07	.59	.79	.73	1.29

CAL YR 1984	TOTAL	230915	MEAN	631	MAX	4400	MIN	172	MEAN†	628	CFSM†	2.19	IN†	29.72
WTR YR 1985	TOTAL	91745	MEAN	251	MAX	3720	MIN	89	MEAN†	252	CFSM†	.88	IN†	11.92

† Adjusted for change in contents in Marsh Creek Reservoir.

CHRISTINA RIVER BASIN

01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

WATER-QUALITY RECORDS

PERIOD OF RECORD.--July 1963 to current year.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: October 1965 to current year.

pH: October 1965 to September 1966, December 1971 to current year.

WATER TEMPERATURE: October 1964 to current year.

DISSOLVED OXYGEN: October 1971 to current year.

SUSPENDED-SEDIMENT DISCHARGE: July 1963 to September 1978.

INSTRUMENTATION.--Water-quality monitor since August 1971.

REMARKS.--Not operated Dec. 6 to Mar. 4. Other interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 445 microsiemens Oct. 25, 1971; minimum, 42 microsiemens Nov. 26, 1979.

pH: Maximum, 9.8 Apr. 9, 1975; minimum, 6.1 Feb. 22, 1976.

WATER TEMPERATURE: Maximum, 31.0°C July 18, 19, 1977; minimum daily, freezing point on many days during winter months.

DISSOLVED OXYGEN: Maximum, 17.1 mg/L Dec. 5, 1976; minimum, 3.0 mg/L June 21, 1984.

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUCT- ANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	OXYGEN, DIS- SOLVED (MG/L)	COLI- FORM, FECAL, 0.45 UM-MF (COLS./ 100 ML)
OCT							
04...	1430	222	243	7.4	14.0	10.1	1200
10...	1400	188	258	7.8	16.0	10.3	400
16...	1430	162	255	7.6	15.5	10.0	K140
23...	1500	326	225	6.4	15.5	8.6	4600
31...	1300	226	244	7.3	18.0	9.5	K3800
NOV							
08...	1430	226	243	7.1	9.0	11.0	K360
13...	1400	188	246	7.1	8.5	10.9	K160
23...	1500	170	246	6.9	4.0	13.3	--
28...	1330	170	254	7.3	8.0	12.6	860
MAR							
05...	1430	300	257	8.5	9.0	13.3	--
13...	1430	274	234	8.7	9.5	13.6	--
20...	1430	207	250	8.8	7.5	13.9	<15
28...	1400	207	249	8.9	13.0	14.5	1100
APR							
02...	1430	300	223	7.8	9.5	12.5	540
10...	1400	211	247	8.9	9.0	14.7	K89
MAY							
15...	1500	162	254	7.5	23.0	8.4	--
23...	1430	218	247	7.6	15.5	8.8	770
29...	1330	215	255	7.8	19.5	9.2	1100
JUN							
06...	1445	151	--	--	19.0	10.4	--
13...	1500	121	280	7.9	22.0	9.4	400
19...	1400	158	241	7.4	23.0	8.8	K270
27...	1530	111	280	8.2	20.5	10.3	--
JUL							
03...	1400	123	268	8.4	24.0	10.4	K140
10...	1130	158	218	7.2	24.0	7.5	--
18...	1330	125	226	7.5	26.0	8.8	K6400
AUG							
02...	1600	177	207	7.4	24.5	7.9	--
08...	1430	802	162	6.7	23.0	7.3	240000
15...	1500	118	287	8.5	29.5	10.7	2800
22...	1430	123	285	8.0	24.0	10.6	K2400
30...	1430	111	285	8.0	25.0	10.0	3600
SEP							
06...	1400	102	291	7.7	27.0	9.4	2400
11...	1430	502	292	7.5	25.0	8.3	K740
19...	1430	88	316	8.0	18.5	8.2	K6100
25...	1430	98	306	7.7	21.5	9.5	K230

CHRISTINA RIVER BASIN

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01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	245	234	241	254	246	250	228	206	220			
2	237	220	229	258	250	254	240	227	235			
3	230	214	220	262	254	257	243	237	240			
4	247	227	239	258	251	254	241	226	237			
5	254	246	250	252	190	217	---	---	---			
6	258	251	254	220	197	208	---	---	---			
7	263	255	258	232	221	228	---	---	---			
8	258	249	253	245	232	240	---	---	---			
9	259	248	253	251	245	248	---	---	---			
10	260	255	257	255	250	252	---	---	---			
11	259	251	256	255	246	252	---	---	---			
12	258	252	256	253	242	247	---	---	---			
13	261	252	257	251	243	247	---	---	---			
14	267	255	260	255	250	252	---	---	---			
15	262	251	257	257	249	253	---	---	---			
16	269	254	260	260	255	258	---	---	---			
17	272	264	268	259	253	256	---	---	---			
18	270	266	269	256	249	253	---	---	---			
19	269	265	267	247	237	242	---	---	---			
20	270	262	265	246	239	243	---	---	---			
21	265	260	262	246	244	245	---	---	---			
22	270	255	260	252	245	249	---	---	---			
23	---	---	---	250	242	247	---	---	---			
24	---	---	---	247	238	241	---	---	---			
25	---	---	---	249	238	242	---	---	---			
26	---	---	---	250	238	243	---	---	---			
27	---	---	---	251	240	246	---	---	---			
28	---	---	---	257	250	253	---	---	---			
29	230	216	222	248	175	207	---	---	---			
30	242	231	237	206	181	193	---	---	---			
31	247	244	245	---	---	---	---	---	---			
MONTH	272	214	252	262	175	243	243	206	232			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	246	225	236	272	261	266
2				---	---	---	226	223	224	274	262	268
3				---	---	---	233	226	230	259	155	195
4				---	---	---	242	230	238	201	162	184
5				---	---	---	242	235	239	218	202	212
6				252	239	245	248	237	243	226	218	224
7				248	239	242	249	242	246	242	227	234
8				248	241	244	246	236	243	249	242	247
9				246	238	243	249	237	243	252	246	249
10				246	238	242	247	244	246	254	250	252
11				245	240	242	247	241	244	257	249	252
12				245	237	241	246	242	244	265	254	259
13				248	231	239	245	239	242	260	256	257
14				238	231	236	254	241	246	257	251	253
15				247	238	245	257	244	249	261	253	256
16				253	244	250	255	246	249	267	258	261
17				254	245	250	249	244	246	267	233	251
18				254	245	249	253	244	248	235	212	223
19				252	243	247	254	248	252	---	---	---
20				253	246	249	260	246	253	---	---	---
21				251	246	249	269	252	259	---	---	---
22				252	246	249	271	256	263	---	---	---
23				256	246	250	271	261	267	---	---	---
24				252	236	246	269	264	267	---	---	---
25				241	233	237	272	264	268	---	---	---
26				237	233	235	269	257	263	---	---	---
27				246	237	242	269	262	265	---	---	---
28				252	245	248	274	264	266	---	---	---
29				249	245	246	274	261	269	---	---	---
30				252	246	249	274	259	266	---	---	---
31				257	247	251	---	---	---	---	---	---
MONTH				257	231	245	274	223	250	274	155	241

CHRISTINA RIVER BASIN

01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25°C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	---	---	---	272	262	265	245	156	173	292	280	284
2	---	---	---	266	260	263	221	178	199	299	286	292
3	---	---	---	270	265	267	247	221	235	293	280	285
4	---	---	---	279	244	267	269	245	253	289	283	286
5	---	---	---	246	237	242	271	265	267	293	283	289
6	---	---	---	245	237	239	276	270	273	295	287	291
7	---	---	---	272	180	240	280	273	277	300	292	298
8	266	260	264	195	170	180	288	128	190	300	293	297
9	268	263	266	213	189	198	221	192	205	323	288	297
10	269	262	266	221	213	218	248	213	229	296	245	285
11	270	264	268	249	221	234	266	247	255	---	---	---
12	275	268	271	257	249	253	268	260	263	---	---	---
13	287	275	279	269	257	261	271	263	266	---	---	---
14	283	278	281	273	268	270	283	272	277	---	---	---
15	291	278	282	280	272	276	287	280	283	---	---	---
16	291	251	270	280	184	241	288	260	284	---	---	---
17	250	195	218	214	175	188	287	280	283	---	---	---
18	223	195	207	238	215	226	293	287	290	---	---	---
19	251	223	239	261	238	248	294	277	284	---	---	---
20	261	250	254	271	262	266	284	276	280	---	---	---
21	268	261	263	278	268	273	293	276	281	---	---	---
22	274	268	269	284	277	280	286	279	282	317	308	312
23	275	271	273	283	253	261	284	277	281	322	315	318
24	280	270	275	275	257	267	---	---	---	324	314	319
25	282	272	276	274	265	268	---	---	---	---	---	---
26	278	273	276	272	254	264	---	---	---	---	---	---
27	281	275	279	255	174	212	247	217	234	---	---	---
28	284	278	282	212	184	197	268	247	255	---	---	---
29	281	271	274	244	213	229	275	269	271	---	---	---
30	280	271	274	262	244	252	285	277	282	---	---	---
31	---	---	---	272	196	248	294	287	290	---	---	---
MONTH	291	195	265	284	170	245	294	128	259	324	245	296

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.7	7.5	7.5	7.4	7.3	7.4	7.5	7.4	7.5	---	---	---
2	7.5	7.4	7.5	7.5	7.3	7.4	7.6	7.5	7.5	---	---	---
3	7.6	7.4	7.5	7.6	7.4	7.5	7.6	7.5	7.5	---	---	---
4	7.6	7.4	7.5	7.7	7.5	7.6	7.6	7.5	7.5	---	---	---
5	7.7	7.4	7.6	7.6	7.2	7.3	7.6	7.5	7.5	---	---	---
6	7.8	7.5	7.6	7.3	7.2	7.3	---	---	---	---	---	---
7	7.9	7.5	7.7	7.5	7.3	7.4	---	---	---	---	---	---
8	7.9	7.5	7.7	7.5	7.4	7.5	---	---	---	---	---	---
9	7.9	7.5	7.7	7.5	7.4	7.5	---	---	---	---	---	---
10	8.0	7.5	7.7	7.5	7.4	7.5	---	---	---	---	---	---
11	8.1	7.5	7.8	7.5	7.4	7.4	---	---	---	---	---	---
12	8.1	7.6	7.8	7.5	7.4	7.5	---	---	---	---	---	---
13	8.1	7.5	7.8	7.6	7.1	7.5	---	---	---	---	---	---
14	8.1	7.6	7.8	7.6	7.5	7.5	---	---	---	---	---	---
15	8.1	7.5	7.7	7.6	7.5	7.5	---	---	---	---	---	---
16	7.7	7.4	7.5	7.6	7.5	7.5	---	---	---	---	---	---
17	7.4	7.2	7.3	7.6	7.5	7.5	---	---	---	---	---	---
18	7.5	7.3	7.4	7.6	7.5	7.5	---	---	---	---	---	---
19	7.5	7.3	7.4	7.5	7.4	7.5	---	---	---	---	---	---
20	7.3	7.2	7.3	7.6	7.5	7.5	---	---	---	---	---	---
21	7.3	7.2	7.2	7.6	7.5	7.6	---	---	---	---	---	---
22	7.3	7.2	7.2	7.6	7.5	7.6	---	---	---	---	---	---
23	---	---	---	7.8	7.5	7.6	---	---	---	---	---	---
24	---	---	---	7.8	7.7	7.8	---	---	---	---	---	---
25	---	---	---	7.8	7.7	7.7	---	---	---	---	---	---
26	---	---	---	7.8	7.7	7.7	---	---	---	---	---	---
27	---	---	---	7.8	7.7	7.7	---	---	---	---	---	---
28	---	---	---	7.8	7.3	7.6	---	---	---	---	---	---
29	7.3	7.2	7.3	7.5	7.3	7.3	---	---	---	---	---	---
30	7.4	7.3	7.3	7.4	7.2	7.3	---	---	---	---	---	---
31	7.4	7.3	7.4	---	---	---	---	---	---	---	---	---
MONTH	8.1	7.2	7.5	7.8	7.1	7.5	7.6	7.4	7.5	---	---	---

CHRISTINA RIVER BASIN

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01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	7.9	7.4	7.6	7.5	7.2	7.3
2				---	---	---	8.3	7.4	7.8	7.3	7.1	7.2
3				---	---	---	8.2	7.6	7.9	7.2	7.1	7.1
4				---	---	---	8.6	7.6	8.1	7.2	7.1	7.2
5				---	---	---	8.8	7.7	8.4	7.3	7.2	7.2
6				8.8	7.8	8.4	8.7	7.7	8.4	7.3	7.1	7.2
7				8.8	7.7	8.4	8.7	8.0	8.5	7.4	7.1	7.3
8				8.7	7.7	8.3	8.9	7.8	8.4	7.4	7.3	7.4
9				8.9	7.7	8.4	8.9	8.3	8.7	7.5	7.3	7.4
10				8.9	8.0	8.6	9.0	8.5	8.8	7.5	7.3	7.4
11				8.9	8.0	8.6	8.9	8.5	8.8	7.6	7.5	7.4
12				8.7	7.7	8.3	9.2	8.4	8.9	7.5	7.2	7.4
13				9.0	7.5	8.3	9.3	8.8	9.1	7.6	7.2	7.4
14				9.0	7.8	8.6	9.2	9.0	9.1	7.5	7.2	7.3
15				9.1	8.1	8.7	9.1	8.4	8.7	7.6	7.2	7.4
16				9.1	8.4	8.8	9.0	7.7	8.5	7.5	7.3	7.4
17				9.1	8.4	8.8	9.1	8.4	8.8	7.3	7.3	7.3
18				9.0	8.5	8.9	9.1	8.5	8.9	7.4	7.3	7.3
19				9.0	8.5	8.8	9.1	8.4	8.8	---	---	---
20				9.0	8.3	8.7	8.9	8.0	8.6	---	---	---
21				9.1	8.2	8.7	8.7	7.6	8.2	---	---	---
22				9.1	8.6	8.9	8.3	7.3	7.8	---	---	---
23				8.9	8.2	8.5	7.9	7.2	7.5	---	---	---
24				8.6	7.7	8.2	7.4	7.2	7.2	---	---	---
25				9.0	7.6	8.4	7.5	7.2	7.3	---	---	---
26				9.0	8.0	8.6	7.6	7.2	7.4	---	---	---
27				9.1	8.2	8.8	7.5	7.2	7.3	---	---	---
28				9.2	8.3	8.8	7.4	7.2	7.2	---	---	---
29				9.0	8.2	8.7	7.5	7.2	7.3	---	---	---
30				8.7	7.7	8.2	7.5	7.2	7.3	---	---	---
31				8.0	7.5	7.7	---	---	---	---	---	---
MONTH				9.2	7.5	8.6	9.3	7.2	8.2	7.6	7.1	7.3
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	---	---	---	8.0	7.5	7.8	7.3	7.0	7.1	8.0	7.5	7.7
2	---	---	---	8.3	7.5	7.9	7.4	7.2	7.3	8.1	7.5	7.7
3	---	---	---	8.6	7.6	7.8	7.6	7.4	7.5	8.1	7.4	7.7
4	---	---	---	8.2	7.7	8.0	7.8	7.4	7.6	8.1	7.4	7.6
5	---	---	---	8.3	7.4	7.7	8.1	7.5	7.7	8.0	7.4	7.6
6	---	---	---	8.3	7.4	7.8	8.4	7.6	8.0	8.1	7.3	7.6
7	---	---	---	7.8	7.2	7.5	8.7	7.8	8.2	8.0	7.4	7.6
8	7.6	7.4	7.5	7.2	7.1	7.1	8.3	7.0	7.5	7.7	7.4	7.5
9	7.8	7.4	7.6	7.2	7.2	7.2	7.4	7.2	7.3	7.7	7.4	7.4
10	7.9	7.4	7.6	7.4	7.1	7.3	7.5	7.3	7.4	7.6	7.3	7.4
11	7.9	7.4	7.6	7.6	7.2	7.4	7.7	7.4	7.5	---	---	---
12	8.0	7.4	7.7	7.7	7.3	7.5	7.9	7.4	7.6	---	---	---
13	7.9	7.5	7.6	7.9	7.4	7.6	8.2	7.5	7.8	---	---	---
14	8.1	7.6	7.9	8.2	7.4	7.8	8.4	7.5	7.9	---	---	---
15	8.2	7.6	7.9	8.3	7.5	7.8	8.5	7.5	7.9	---	---	---
16	8.0	7.4	7.7	7.8	7.2	7.4	8.4	7.6	8.0	---	---	---
17	7.6	7.2	7.4	7.4	7.1	7.2	8.5	7.6	8.0	---	---	---
18	7.4	7.2	7.3	7.7	7.2	7.4	8.0	7.6	7.8	---	---	---
19	7.7	7.2	7.4	8.1	7.4	7.7	8.1	7.5	7.7	---	---	---
20	7.8	7.4	7.6	8.4	7.5	7.9	8.2	7.5	7.8	---	---	---
21	8.0	7.5	7.7	8.7	7.6	8.1	8.0	7.4	7.7	---	---	---
22	8.2	7.5	7.9	8.6	7.6	8.2	8.0	7.5	7.7	8.0	7.5	7.7
23	8.3	7.6	7.9	8.2	7.6	7.9	8.2	7.5	7.8	7.7	7.4	7.5
24	8.3	7.6	7.9	8.3	7.5	7.8	---	---	---	7.7	7.4	7.5
25	8.4	7.6	8.0	8.3	7.5	7.8	---	---	---	---	---	---
26	8.3	7.7	8.0	7.8	7.4	7.6	---	---	---	---	---	---
27	8.2	7.7	8.0	7.5	7.2	7.3	7.6	7.2	7.4	---	---	---
28	8.3	7.7	7.9	7.3	7.2	7.2	7.8	7.3	7.5	---	---	---
29	8.2	7.6	7.9	7.4	7.2	7.3	7.9	7.3	7.6	---	---	---
30	8.0	7.6	7.8	7.7	7.3	7.4	8.1	7.4	7.7	---	---	---
31	---	---	---	7.6	7.2	7.4	7.8	7.5	7.6	---	---	---
MONTH	8.4	7.2	7.7	8.7	7.1	7.6	8.7	7.0	7.7	8.1	7.3	7.6

CHRISTINA RIVER BASIN

01481000 BRANDYWINE CREEK AT CHADDS FORD, PA---Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	15.0	13.5	14.5	17.5	16.5	17.0	7.0	6.0	6.5			
2	13.5	13.0	13.5	16.5	14.0	16.0	6.5	5.5	6.0			
3	13.5	11.5	13.0	14.0	11.0	12.5	7.0	6.5	6.5			
4	14.5	12.5	13.5	12.5	10.5	11.5	7.0	5.0	6.0			
5	14.5	13.0	14.0	14.5	12.5	14.0	---	---	---			
6	15.0	13.5	14.0	14.5	12.5	13.5	---	---	---			
7	14.0	12.5	13.0	12.0	9.5	11.0	---	---	---			
8	14.0	13.0	13.5	9.5	8.0	8.5	---	---	---			
9	15.5	14.0	15.0	9.5	8.0	8.5	---	---	---			
10	16.5	15.5	16.0	12.0	9.5	10.5	---	---	---			
11	17.5	16.0	16.5	11.5	11.0	11.5	---	---	---			
12	17.0	15.5	16.5	12.5	9.0	10.5	---	---	---			
13	16.5	15.5	16.0	9.0	7.5	8.0	---	---	---			
14	16.5	15.0	15.5	7.5	6.0	7.0	---	---	---			
15	16.0	14.5	15.5	7.5	6.0	6.5	---	---	---			
16	15.5	14.5	15.0	9.0	7.5	8.0	---	---	---			
17	15.5	15.0	15.0	7.5	6.5	7.0	---	---	---			
18	17.0	15.5	16.5	6.5	6.0	6.5	---	---	---			
19	18.0	16.5	17.0	6.5	6.0	6.5	---	---	---			
20	18.5	18.0	18.0	6.0	4.0	5.0	---	---	---			
21	19.5	18.0	18.5	4.5	3.0	3.5	---	---	---			
22	19.5	18.5	19.0	4.0	2.5	3.5	---	---	---			
23	---	---	---	4.0	2.5	3.0	---	---	---			
24	---	---	---	4.5	3.0	3.5	---	---	---			
25	---	---	---	5.0	3.5	4.5	---	---	---			
26	---	---	---	5.5	4.0	5.0	---	---	---			
27	---	---	---	6.0	4.5	5.0	---	---	---			
28	---	---	---	10.0	5.5	7.5	---	---	---			
29	20.0	18.0	18.5	10.5	8.0	10.0	---	---	---			
30	18.0	17.5	---	8.0	6.5	7.0	---	---	---			
31	18.0	17.5	---	---	---	---	---	---	---			
MONTH	20.0	11.5	15.5	17.5	2.5	8.5	7.0	4.5	6.5			
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	11.0	9.0	10.0	21.5	17.5	20.0
2				---	---	---	10.0	8.5	9.5	20.5	16.0	18.5
3				---	---	---	9.0	7.0	7.5	16.0	12.5	13.5
4				---	---	---	9.0	6.5	8.0	15.5	11.5	14.0
5				---	---	---	13.5	8.5	11.0	19.0	14.5	16.5
6				8.0	6.0	7.0	16.0	13.5	15.0	18.5	17.5	18.0
7				6.0	4.5	5.5	14.5	13.0	13.5	18.0	17.0	17.5
8				7.0	5.5	6.5	12.5	11.0	12.0	18.5	16.0	17.5
9				9.0	6.5	8.0	10.5	7.5	9.5	19.0	16.0	17.5
10				9.5	7.5	8.5	9.5	6.5	8.0	21.0	17.5	19.5
11				9.0	7.5	8.0	9.5	8.5	9.0	23.5	20.0	22.0
12				9.5	8.0	9.0	12.0	8.0	10.0	25.0	22.5	23.5
13				10.5	7.5	9.0	14.5	11.5	13.0	25.0	22.5	24.0
14				11.5	9.5	10.5	15.0	13.0	14.0	25.5	23.0	24.5
15				10.0	8.5	9.5	15.0	14.5	14.5	24.0	21.0	22.5
16				9.0	7.0	8.0	16.5	14.5	15.5	21.0	19.5	20.0
17				10.0	7.5	8.5	16.0	14.0	15.5	19.5	17.0	18.5
18				8.0	6.0	7.0	16.5	13.5	15.0	18.5	16.5	17.5
19				7.0	4.5	6.0	19.5	16.0	18.0	---	---	---
20				8.0	6.5	7.0	21.5	18.5	20.0	---	---	---
21				8.5	6.5	7.5	23.0	19.5	21.5	---	---	---
22				7.5	6.5	7.0	24.0	20.5	22.5	---	---	---
23				7.0	6.5	7.0	24.0	21.5	22.5	---	---	---
24				7.5	7.0	7.5	21.5	16.5	19.0	---	---	---
25				9.5	7.0	8.0	17.0	15.5	16.0	---	---	---
26				9.5	7.0	8.5	19.0	15.0	17.0	---	---	---
27				11.0	7.5	9.5	21.0	18.0	19.5	---	---	---
28				13.5	11.0	12.5	19.5	17.0	18.5	---	---	---
29				16.0	13.5	14.5	19.0	15.5	17.5	---	---	---
30				15.5	14.0	15.0	20.0	16.0	18.5	---	---	---
31				13.5	10.0	12.0	---	---	---	---	---	---
MONTH				16.0	4.5	8.5	24.0	6.5	14.5	25.5	11.5	19.0

CHRISTINA RIVER BASIN

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01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	---	---	---	21.5	19.5	20.5	24.0	23.0	23.5	22.5	21.0	21.5
2	---	---	---	23.0	19.5	21.5	24.5	22.0	23.5	23.5	20.5	22.0
3	---	---	---	24.5	21.5	23.0	25.5	22.0	23.5	25.5	22.0	23.5
4	---	---	---	25.0	22.5	24.0	25.0	22.5	24.0	26.5	23.0	25.0
5	---	---	---	26.0	23.5	24.5	25.5	22.0	24.0	27.5	24.5	26.0
6	---	---	---	25.5	23.5	24.5	25.5	22.5	24.0	27.5	25.5	26.5
7	---	---	---	24.5	23.5	24.0	26.5	23.5	25.0	28.0	25.5	26.5
8	21.0	19.5	20.0	23.5	21.5	22.5	26.0	22.0	24.0	27.0	26.0	26.5
9	21.5	19.0	20.0	23.5	21.0	22.0	25.5	23.0	24.5	26.5	25.0	25.5
10	24.0	21.0	22.5	24.0	22.5	23.5	27.0	24.0	25.5	26.0	24.0	25.0
11	24.5	22.0	23.0	26.0	22.5	24.0	27.0	25.0	26.0	---	---	---
12	24.5	22.5	23.5	25.0	23.5	24.0	27.0	24.5	26.0	---	---	---
13	23.5	20.0	21.5	25.5	22.5	24.5	26.5	23.5	25.5	---	---	---
14	20.5	18.0	19.5	27.5	24.0	26.0	28.0	25.0	26.5	---	---	---
15	21.5	18.0	19.5	28.0	25.5	26.5	29.5	26.5	28.0	---	---	---
16	21.5	19.5	20.5	26.5	24.0	25.0	28.5	26.5	27.5	---	---	---
17	21.5	19.0	20.5	26.0	23.5	25.0	26.5	24.5	25.5	---	---	---
18	22.5	20.5	21.5	27.0	23.5	25.0	25.0	22.5	23.5	---	---	---
19	23.5	21.0	22.0	27.0	23.5	25.5	24.5	22.0	23.5	---	---	---
20	24.0	21.0	22.5	27.5	23.5	26.0	25.5	23.5	24.5	---	---	---
21	23.0	20.0	21.5	28.0	24.5	26.5	25.0	23.5	24.0	---	---	---
22	23.5	20.5	22.0	28.5	25.5	27.0	24.0	22.0	23.0	21.0	19.5	20.0
23	25.5	22.0	23.5	27.0	24.5	26.0	23.5	21.0	22.0	20.5	20.0	20.0
24	26.5	24.0	25.5	26.5	23.0	24.5	---	---	---	22.0	20.0	20.5
25	25.5	23.0	24.0	27.0	23.5	25.0	---	---	---	---	---	---
26	23.5	21.0	22.0	25.5	24.5	25.0	---	---	---	---	---	---
27	21.0	19.0	20.0	24.5	23.5	24.0	25.0	23.0	24.0	---	---	---
28	20.0	18.5	19.5	25.5	22.5	24.0	25.5	22.5	24.0	---	---	---
29	22.0	18.5	20.0	25.5	23.5	24.5	25.0	22.5	24.0	---	---	---
30	21.5	20.5	21.0	26.0	23.0	24.5	25.0	23.0	24.0	---	---	---
31	---	---	---	26.0	24.0	25.0	24.0	22.0	23.0	---	---	---
MONTH	26.5	18.0	21.5	28.5	19.5	24.5	29.5	21.0	24.5	28.0	19.5	23.5

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	9.4	8.8	9.1	9.3	8.6	9.1	12.0	11.7	11.8			
2	9.6	9.0	9.3	9.7	8.8	9.3	12.5	11.9	12.2			
3	10.3	9.4	9.8	11.3	9.7	10.6	12.2	11.7	11.9			
4	10.2	9.2	9.6	11.9	10.8	11.3	12.5	11.7	12.1			
5	10.3	9.0	9.7	10.8	9.4	9.7	---	---	---			
6	10.4	9.1	9.7	10.1	9.4	9.8	---	---	---			
7	11.0	9.3	10.1	11.4	10.2	11.0	---	---	---			
8	10.9	9.4	10.1	12.3	10.7	11.3	---	---	---			
9	10.6	9.0	9.8	11.2	10.6	10.8	---	---	---			
10	10.4	8.7	9.5	10.6	9.9	10.3	---	---	---			
11	10.6	8.4	9.4	9.9	9.4	9.6	---	---	---			
12	10.4	8.3	9.3	10.2	9.3	9.7	---	---	---			
13	10.3	8.3	9.3	10.9	10.1	10.6	---	---	---			
14	10.2	8.3	9.2	11.8	11.0	11.3	---	---	---			
15	10.5	8.3	9.3	12.0	11.3	11.5	---	---	---			
16	10.0	8.5	9.1	11.6	11.0	11.2	---	---	---			
17	9.5	8.2	8.7	11.9	11.1	11.5	---	---	---			
18	9.4	7.9	8.5	12.2	11.6	11.8	---	---	---			
19	9.0	7.6	8.2	11.9	11.5	11.7	---	---	---			
20	7.9	7.0	7.5	12.8	12.0	12.4	---	---	---			
21	8.1	7.0	7.3	13.5	12.8	13.1	---	---	---			
22	7.7	6.9	7.3	13.8	13.2	13.4	---	---	---			
23	---	---	---	13.6	12.9	13.2	---	---	---			
24	---	---	---	13.4	12.7	13.0	---	---	---			
25	---	---	---	13.1	12.4	12.7	---	---	---			
26	---	---	---	13.0	12.3	12.6	---	---	---			
27	---	---	---	13.0	12.2	12.5	---	---	---			
28	---	---	---	12.6	10.9	11.9	---	---	---			
29	7.9	6.9	7.4	10.9	10.0	10.5	---	---	---			
30	8.2	7.4	7.6	11.7	10.8	11.4	---	---	---			
31	---	---	---	---	---	---	---	---	---			
MONTH	11.0	6.9	9.0	13.8	8.6	11.3	12.5	11.7	12.0			

CHRISTINA RIVER BASIN

01481000 BRANDYWINE CREEK AT CHADDS FORD, PA--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1				---	---	---	11.8	10.2	10.9	8.9	6.3	7.4
2				---	---	---	12.8	10.3	11.5	7.7	5.9	6.8
3				---	---	---	13.0	10.6	11.8	8.9	7.4	8.4
4				---	---	---	14.0	11.0	12.5	8.9	8.1	8.6
5				---	---	---	13.9	10.6	12.1	8.5	7.5	8.0
6				14.3	10.9	12.7	12.3	8.5	10.4	7.8	6.9	7.4
7				14.2	10.7	12.6	12.7	8.8	10.7	8.5	7.1	7.7
8				13.2	10.6	12.0	13.9	9.3	11.6	8.8	7.6	8.1
9				13.6	10.1	11.8	14.3	10.3	12.3	8.9	7.6	8.2
10				13.5	10.2	11.9	15.1	11.7	13.4	8.8	7.4	8.0
11				13.4	10.1	11.9	13.8	10.6	12.2	8.5	6.9	7.6
12				12.2	9.8	11.0	15.4	10.6	13.0	8.1	6.3	7.1
13				13.8	9.3	11.3	15.0	10.0	12.5	7.9	6.0	6.8
14				13.7	9.6	11.6	13.8	9.5	11.6	7.7	5.8	6.7
15				14.1	9.8	12.0	11.4	8.8	10.0	8.5	5.9	7.0
16				14.9	10.7	12.8	13.2	8.4	10.7	8.0	6.7	7.2
17				14.6	10.6	12.7	13.7	8.4	11.1	7.5	6.8	7.2
18				14.6	10.5	12.6	13.8	8.9	11.3	8.2	7.4	7.7
19				15.0	11.4	13.2	12.8	8.1	10.4	---	---	---
20				14.6	11.0	12.6	11.6	7.1	9.4	---	---	---
21				15.2	10.9	13.1	10.6	6.4	8.4	---	---	---
22				14.9	11.3	13.2	9.5	5.7	7.5	---	---	---
23				13.2	10.9	12.1	9.0	5.2	7.0	---	---	---
24				13.0	10.5	11.9	6.5	5.5	6.0	---	---	---
25				14.3	10.3	12.3	8.7	6.3	7.4	---	---	---
26				14.4	10.4	12.4	9.2	6.9	7.9	---	---	---
27				14.6	10.4	12.5	8.7	6.3	7.3	---	---	---
28				14.9	9.5	12.1	7.9	5.9	6.9	---	---	---
29				13.9	9.2	11.5	9.2	6.5	7.7	---	---	---
30				12.2	8.3	10.2	9.1	6.7	7.7	---	---	---
31				10.7	9.3	10.2	---	---	---	---	---	---
MONTH				15.2	8.3	12.1	15.4	5.2	10.3	8.9	5.8	7.6
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	---	---	---	10.6	8.2	9.4	6.9	6.3	6.7	10.0	7.5	8.6
2	---	---	---	11.1	8.3	9.6	8.0	6.7	7.2	10.4	7.6	8.7
3	---	---	---	10.6	8.2	9.1	8.6	7.3	7.8	10.3	7.3	8.5
4	---	---	---	9.4	7.4	8.3	8.9	7.3	8.0	10.1	7.0	8.1
5	---	---	---	9.9	6.6	8.0	9.7	7.5	8.4	9.9	6.6	7.7
6	---	---	---	9.9	6.8	8.2	10.4	7.6	8.8	9.9	6.3	7.5
7	---	---	---	8.5	6.9	7.6	11.0	7.5	9.0	9.6	6.5	7.6
8	8.6	7.4	7.9	7.2	6.5	6.8	8.1	6.2	7.4	8.1	6.3	7.0
9	9.4	7.6	8.4	7.5	6.9	7.3	8.0	7.1	7.5	8.6	6.4	7.1
10	9.2	7.2	8.1	8.0	6.4	7.1	8.2	7.0	7.5	8.5	6.5	7.3
11	9.2	6.9	8.0	8.7	6.9	7.7	8.4	6.8	7.6	8.3	7.0	7.4
12	9.2	6.8	7.9	8.8	6.8	7.7	9.2	7.0	7.9	9.1	7.0	7.8
13	9.4	7.0	8.2	9.5	7.1	8.2	10.0	7.1	8.5	9.5	7.8	8.5
14	10.3	8.1	9.2	10.1	7.0	8.3	10.5	7.1	8.5	10.4	8.3	9.1
15	10.9	8.4	9.4	10.0	6.6	7.9	10.7	6.7	8.5	10.8	8.6	9.4
16	9.9	8.1	8.8	7.5	6.7	7.1	10.0	6.5	8.1	11.0	8.7	9.4
17	8.5	7.7	8.1	8.1	6.5	7.2	10.8	6.7	8.5	10.8	8.5	9.3
18	8.5	7.3	7.8	9.0	6.6	7.7	8.8	7.1	7.9	10.9	8.5	9.3
19	8.9	7.1	8.0	10.0	7.0	8.3	10.1	7.1	8.3	---	---	---
20	9.4	7.2	8.2	10.8	7.1	8.7	10.2	7.1	8.4	---	---	---
21	9.8	7.6	8.6	11.0	7.0	8.9	9.7	6.9	8.0	---	---	---
22	10.3	7.7	8.9	10.3	6.7	8.4	10.6	7.3	8.7	10.2	7.9	8.7
23	10.1	7.6	8.7	9.2	6.5	7.8	11.1	7.9	9.3	9.0	7.3	8.1
24	9.6	7.1	8.3	10.1	6.9	8.2	---	---	---	9.1	7.3	7.9
25	9.7	6.8	8.1	9.9	7.1	8.1	---	---	---	---	---	---
26	9.6	7.2	8.4	8.2	6.8	7.3	---	---	---	---	---	---
27	10.4	7.7	9.0	7.1	6.6	6.9	9.3	7.5	8.3	---	---	---
28	11.1	8.7	9.7	7.4	6.7	7.0	9.9	7.4	8.5	---	---	---
29	10.9	8.5	9.6	7.7	6.5	7.0	10.3	7.5	8.8	---	---	---
30	10.0	8.2	9.0	8.4	6.7	7.4	10.5	7.5	8.6	---	---	---
31	---	---	---	8.0	6.5	7.0	9.1	7.1	8.0	---	---	---
MONTH	11.1	6.8	8.5	11.1	6.4	7.9	11.1	6.2	8.2	11.0	6.3	8.2

CHRISTINA RIVER BASIN

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RESERVOIR IN CHRISTINA RIVER BASIN

01480684 MARSH CREEK RESERVOIR.--Lat 40°03'24", long 75°43'06", Chester County, Hydrologic Unit 02040205, on right bank at dam on Marsh Creek, 0.3 mi upstream from mouth and 3.2 mi north of Downingtown. DRAINAGE AREA, 20.1 mi² PERIOD OF RECORD, November 1973 to current year. GAGE, water-stage recorder. Datum of gage is National Geodetic Vertical Datum of 1929 (levels by Pennsylvania Department of Environmental Resources). Reservoir formed by earthfill dam with concrete spillway at elevation 359.5 ft. Storage began November 1973. Total capacity 22,190 acre-ft at elevation 373 ft. Reservoir is used for water supply, flood control, and recreation. Figures given herein represent contents above lowest gate sill at elevation 289.5 ft. Records furnished by Pennsylvania Department of Environmental Resources.

EXTREMES FOR PERIOD OF RECORD: Maximum contents, 16,380 acre-ft Jan. 25, 1979, elevation, 363.49 ft; minimum (after first filling), 10,410 acre-ft Mar. 3, 1976, elevation, 351.75 ft.

EXTREMES FOR CURRENT YEAR: Maximum contents, 15,180 acre-ft Sept. 29, elevation, 361.30 ft; minimum, 12,570 acre-ft Jan. 23-25, elevation 356.32 ft.

MONTHEND ELEVATION AND CONTENTS AT 2400, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

Date	Elevation (feet)	Contents (acre- feet)	Change in contents (equivalent in cfs)
<u>01480684 Marsh Creek Reservoir</u>			
Sept. 30	359.90	14400	--
Oct. 31	360.24	14590	+ 3.1
Nov. 30	359.45	14150	- 7.4
Dec. 31	356.45	12640	- 24.5
CAL YR 1984	--	--	- 2.8
Jan. 31	356.45	12640	0
Feb. 28	357.25	13040	+ 7.2
Mar. 31	358.59	13700	+ 10.7
Apr. 30	359.50	14180	+ 8.1
May 31	359.92	14420	+ 3.9
June 30	359.77	14330	- 1.5
July 31	360.00	14460	+ 2.1
Aug. 31	359.80	14350	- 1.8
Sept. 30	360.91	15000	+ 10.9
WTR YR 1985	--	--	+ 0.8

DELAWARE RIVER BASIN

01481602 DELAWARE RIVER BELOW CHRISTINA RIVER AT WILMINGTON, DE

LOCATION.--Lat 39°43'00", long 75°31'03", New Castle County, DE, Hydrologic Unit 02040206, on right bank, 1,000 ft from mouth of Christina River at the Wilmington Marine Terminal at Wilmington, 2.0 mi upstream of Delaware Memorial Bridge, and at mile 69.70.

DRAINAGE AREA.--11,030 mi².

TIDE ELEVATION DATA

PERIOD OF RECORD.--December 1982 to current year. July 1967 to May 1983 published as Delaware River at Delaware Memorial Bridge, at Wilmington, DE (sta. 01482100). Tidal volumes published from July 1967 to September 1973.

GAGE.--Water-stage recorder and crest-stage gage. Datum of gage is -18.05 ft below National Geodetic Vertical Datum of 1929. Prior to Dec. 1982, water-stage recorder at Delaware River at Delaware Memorial Bridge, 2.0 mi downstream at datum 8.05 ft higher. Gage-height record converted to elevation above or below (-) National Geodetic Vertical Datum 1929 for publication.

REMARKS.--No gage-height or doubtful record: Dec. 4 to Jan. 1 and Jan. 21 to Feb. 14. Summaries for months with short periods of no gage-height record have been estimated with negligible or no loss of accuracy unless otherwise noted. Some periods cannot be estimated and are noted by dash (--) lines.

EXTREMES FOR PERIOD OF RECORD.--Maximum elevation, 7.88 ft, Oct. 25, 1980; minimum, -5.86 ft, Apr. 4, 1975.

EXTREMES OUTSIDE PERIOD OF RECORD.--Maximum elevation known, 8.4 ft, Nov. 23, 1950, provided by U.S. Army Corps of Engineers; minimum, -9.1 ft, Dec. 31, 1962.

EXTREMES FOR CURRENT YEAR.--Maximum elevation, 5.4 ft, Feb. 12, estimated by comparison with Delaware River at Palmyra, NJ (01467060) and Delaware River at Chester, PA, (01477050), maximum recorded, 5.09 ft, May 3; minimum recorded, -4.06 ft, Mar. 6.

Summaries of tide elevations during current year are as follows:

TIDE ELEVATIONS, IN FEET, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

		OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
Maximum	Elevation	4.94	4.62	--	4.72	5.4	4.30	4.74	5.09	4.99	4.89	4.79	4.79
high tide	Date	15	11	--	19	12	12	6	3	27	1,31	19	27
Minimum	Elevation	-2.29	-2.93	--	-4.05	--	-4.06	-3.04	-2.61	-2.66	-2.60	-2.60	-2.80
low tide	Date	23	21	--	20	--	6	9	6	14	27	16	28
Mean high tide		3.84	3.31	--	--	--	3.04	3.38	3.65	3.69	3.78	3.80	3.72
Mean water level		1.32	.88	--	--	--	.54	.81	1.12	1.02	1.15	1.13	1.11
Mean low tide		-1.41	-1.73	--	--	--	-2.16	-1.94	-1.65	-1.88	-1.75	-1.74	-1.67

DELAWARE RIVER BASIN

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01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE

LOCATION.--Lat 39°30'03", long 75°34'07", New Castle County, Hydrologic Unit 02040205, on platform about 0.4 mi downstream from Reedy Island near Port Penn.

DRAINAGE AREA.--11,200 mi² approximately.

PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: October 1963 to current year.

pH: February 1970 to current year.

WATER TEMPERATURE: February 1970 to current year.

DISSOLVED OXYGEN: February 1970 to current year.

INSTRUMENTATION.--Water-quality monitor since February 1970.

REMARKS.--Interruptions in the daily record were due to malfunctions of the instrument.

EXTREMES FOR PERIOD OF DAILY RECORD.--

SPECIFIC CONDUCTANCE: Maximum, 35,600 microsiemens Nov. 15, 1978, minimum, 100 microsiemens on several days in 1969, 1970, 1974, and 1979.

pH: Maximum, 8.9 Mar. 4, 1980; minimum, 5.4 Dec. 31, 1972.

WATER TEMPERATURE: Maximum 31.5°C July 19, 1982; minimum, 0.0°C on many days during winter months.

DISSOLVED OXYGEN: Maximum, 17.1 mg/L Dec. 16, 19, 1976; minimum, 0.3 mg/L Sept. 16, 17, 1971.

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25 °C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN	MAX	MIN	MEAN
		OCTOBER			NOVEMBER			DECEMBER			JANUARY	
1	22600	13200	17400	---	---	---	19800	12500	15500	16900	7200	11900
2	20600	14300	17400	---	---	---	19000	10800	14700	16700	7040	11700
3	21000	12700	16800	---	---	---	20600	11600	15900	16100	8200	11800
4	19800	12600	15100	---	---	---	19600	11100	14900	18400	8400	13000
5	20300	12000	15700	---	---	---	18000	9320	12800	17500	9280	12900
6	20900	12700	16100	---	---	---	20600	10400	14700	18400	8480	12300
7	18700	13000	15700	---	---	---	15400	9200	11800	17300	7760	10600
8	19200	12600	15200	---	---	---	17800	7960	11500	---	---	---
9	18700	12400	15000	---	---	---	17500	7360	10900	---	---	---
10	19400	12300	15200	---	---	---	18700	8520	12700	---	---	---
11	---	---	---	---	---	---	18200	9080	12600	---	---	---
12	---	---	---	---	---	---	18200	9000	12800	---	---	---
13	---	---	---	---	---	---	17400	9000	12600	---	---	---
14	---	---	---	---	---	---	17500	8600	12200	---	---	---
15	---	---	---	---	---	---	17900	9240	13000	---	---	---
16	22600	16000	18900	---	---	---	17000	8920	13000	---	---	---
17	22600	15400	18300	19900	12000	15100	16500	9360	12200	---	---	---
18	21600	15200	18100	22000	11600	16400	16300	9160	11600	---	---	---
19	23200	14800	18300	22800	12300	17300	17400	9440	12300	---	---	---
20	21600	14600	17800	22600	13500	17300	18000	9400	12200	---	---	---
21	22400	14200	17500	23000	13500	16800	16900	9360	11700	---	---	---
22	20700	14400	17000	23000	13600	17400	18300	9760	12800	---	---	---
23	---	---	---	24500	14400	18400	15400	8920	10900	---	---	---
24	---	---	---	23400	14400	17500	16100	8200	10700	---	---	---
25	---	---	---	23600	14300	17700	12800	6200	9140	---	---	---
26	---	---	---	23600	14300	17700	12800	6200	9140	---	---	---
27	---	---	---	22800	13900	18000	11800	5720	8280	---	---	---
28	---	---	---	21300	14100	17100	---	---	---	---	---	---
29	---	---	---	22800	14300	18300	---	---	---	---	---	---
30	---	---	---	21500	14700	17500	12700	5760	8720	---	---	---
31	---	---	---	20100	13200	15900	12300	6200	8830	---	---	---
31	---	---	---	---	---	---	16300	6760	10800	---	---	---
MONTH	23200	12000	16800	24500	11600	17200	20600	5720	12100	18400	7040	12000

01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE--Continued

SPECIFIC CONDUCTANCE, MICROSIEMENS PER CENTIMETER AT 25 °C, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	---	---	---	18400	9730	13800	17500	8170	12000
2	---	---	---	15600	7130	11800	17200	9250	12200	18800	8610	12200
3	---	---	---	16300	5570	10200	18400	8210	12100	19300	8410	13200
4	---	---	---	17900	7130	11700	15300	7170	10600	20300	8250	13400
5	---	---	---	16100	8090	11200	15500	7170	10200	18600	7810	11500
6	---	---	---	---	---	---	14900	6090	9700	---	---	---
7	---	---	---	---	---	---	13800	5850	8900	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	15300	6770	9860	---	---	---	---	---	---
13	---	---	---	11100	4720	6890	---	---	---	---	---	---
14	---	---	---	13200	4560	7590	---	---	---	---	---	---
15	---	---	---	13800	4440	7070	---	---	---	14900	6930	10000
16	---	---	---	11000	3680	6340	---	---	---	13200	6650	9470
17	---	---	---	12900	3760	7470	---	---	---	14200	7130	9660
18	17600	8810	12600	13300	4000	7770	---	---	---	14500	6570	9390
19	18000	8850	12000	17300	5290	10500	---	---	---	14300	6450	9120
20	18100	8490	11900	16200	6770	10600	---	---	---	15100	6090	9300
21	16000	8290	11900	13300	5610	8610	---	---	---	14800	5810	8340
22	16100	8410	11700	12600	6170	8540	---	---	---	13900	5250	7990
23	14000	7170	10200	12900	6450	9560	14600	6250	9360	14000	5850	8710
24	14600	7650	10600	14700	6810	10500	15000	7410	10300	14700	5930	9340
25	14900	7090	10000	15500	7050	10400	14200	6570	9800	14600	6410	9900
26	14100	6810	10200	13300	6490	9500	14000	6770	10200	14900	7010	10200
27	16600	7690	11800	14400	6250	9740	15500	7330	10200	15200	7330	10400
28	---	---	---	15200	7170	10300	15500	7210	11200	14700	6930	10000
29	---	---	---	15400	7210	10400	15300	7570	11100	17300	7330	11200
30	---	---	---	16300	7130	11700	16900	7890	12200	16700	8370	11900
31	---	---	---	16100	8210	12300	---	---	---	16500	8530	11300
MONTH	18100	6810	11300	17900	3680	9610	18400	5850	10800	20300	5250	10400
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	15900	7530	10300	18600	9970	12900	16400	7510	10000	19700	11900	15100
2	16000	7250	9790	19500	10200	13200	15500	7860	10600	20500	12100	15500
3	15500	7330	10300	19000	10400	13200	16600	8760	11600	18400	11500	14400
4	16500	8370	10800	18700	10300	12900	14800	8280	10600	18900	12100	15100
5	16800	8850	11500	18900	10400	13300	14400	7850	9260	18900	11900	14500
6	16100	8610	11200	18300	10000	13200	13900	8570	10800	---	---	---
7	15700	8410	11100	16500	9450	12100	15200	9050	11700	---	---	---
8	16300	8850	11200	16600	9450	12400	13800	7370	10700	---	---	---
9	16800	8370	11500	17400	9410	13000	---	---	---	---	---	---
10	15100	8410	11000	17500	10300	13300	---	---	---	22600	12600	17200
11	15800	8050	10900	17900	9770	12900	---	---	---	24200	13300	17400
12	16300	8970	11900	18300	9370	13300	16700	7730	11300	22600	14000	18200
13	16100	8530	11600	16000	8570	11800	19200	7610	12300	23300	14700	17600
14	16600	7930	11100	15700	7810	11200	18000	8410	11900	23200	14800	18700
15	19200	7450	11500	19500	7730	12400	19100	8050	11900	23300	14700	18400
16	18600	8130	12400	17900	8610	12000	18700	8850	12000	23800	15200	18800
17	17800	8370	11900	18500	9010	12000	18600	9290	12800	24200	15400	19300
18	18600	8490	12200	19200	8890	13700	18000	10100	13900	23700	15600	19200
19	18400	8290	11800	20300	10900	14500	19400	10800	14400	23800	15700	18900
20	18700	8490	11700	20600	10500	14000	19300	10700	14600	23300	15800	18600
21	17300	7730	11300	18500	10500	13700	18400	10900	14200	23100	15900	18400
22	17300	8370	11600	20800	10200	14200	19500	11000	14800	23400	15700	18400
23	17000	8010	10700	16100	9930	12400	19400	11100	14400	24300	15800	19300
24	15400	7450	10600	16900	9810	12900	20100	11800	15000	24800	16700	20600
25	15400	7170	10200	17300	10300	12800	18400	11700	14200	24900	16300	19400
26	16500	7810	10900	16000	9730	12400	18300	10700	13200	24300	17100	20200
27	20300	8610	13400	15400	7650	10100	17800	10300	12600	24500	15100	19500
28	19300	9690	14100	17400	8090	10700	17700	10100	12300	17800	2560	13200
29	19100	9810	12800	18400	8930	11600	18300	10400	12900	13900	5530	9720
30	18500	9770	12300	17600	9050	11900	19400	10800	14100	13700	4400	8140
31	---	---	---	18200	8660	12100	19000	10900	14000	---	---	---
MONTH	20300	7170	11500	20800	7650	12600	20100	7370	12600	24900	2560	17100

DELAWARE RIVER BASIN

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01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.5	7.4	7.4	---	---	---	7.9	7.8	7.9	7.9	7.7	7.8
2	7.5	7.4	7.4	---	---	---	7.9	7.8	7.8	7.9	7.7	7.8
3	7.6	7.4	7.5	---	---	---	7.9	7.8	7.9	7.9	7.7	7.8
4	7.6	7.4	7.5	---	---	---	7.9	7.8	7.8	7.9	7.7	7.8
5	7.5	7.4	7.5	---	---	---	7.9	7.8	7.8	7.9	7.7	7.8
6	7.6	7.4	7.5	---	---	---	7.9	7.8	7.8	7.9	7.7	7.8
7	7.5	7.4	7.5	---	---	---	7.9	7.8	7.8	8.0	7.7	7.8
8	7.6	7.4	7.5	---	---	---	7.9	7.8	7.9	---	---	---
9	7.5	7.4	7.5	---	---	---	7.9	7.8	7.9	---	---	---
10	7.5	7.4	7.4	---	---	---	7.9	7.8	7.8	---	---	---
11	---	---	---	---	---	---	8.1	7.8	8.0	---	---	---
12	---	---	---	---	---	---	8.1	7.9	8.0	---	---	---
13	---	---	---	---	---	---	8.1	7.9	8.0	---	---	---
14	---	---	---	---	---	---	8.0	7.9	8.0	---	---	---
15	---	---	---	---	---	---	8.1	7.9	8.0	---	---	---
16	7.7	7.6	7.6	---	---	---	8.0	7.9	7.9	---	---	---
17	7.6	7.5	7.5	7.9	7.8	7.9	8.0	7.8	7.9	---	---	---
18	7.6	7.5	7.5	8.0	7.8	7.9	8.0	7.8	7.9	---	---	---
19	7.6	7.5	7.6	7.9	7.8	7.9	7.9	7.8	7.9	---	---	---
20	7.6	7.5	7.5	7.9	7.8	7.9	7.9	7.8	7.8	---	---	---
21	7.6	7.4	7.5	8.0	7.9	7.9	7.9	7.7	7.8	---	---	---
22	7.5	7.4	7.4	8.0	7.8	7.9	7.9	7.8	7.8	---	---	---
23	---	---	---	8.0	7.8	7.9	7.9	7.8	7.8	---	---	---
24	---	---	---	8.0	7.8	7.9	7.9	7.7	7.8	---	---	---
25	---	---	---	8.2	7.9	8.0	7.8	7.7	7.8	---	---	---
26	---	---	---	8.0	7.9	7.9	7.8	7.7	7.8	---	---	---
27	---	---	---	7.9	7.8	7.9	---	---	---	---	---	---
28	---	---	---	7.9	7.8	7.9	---	---	---	---	---	---
29	---	---	---	7.9	7.8	7.8	7.9	7.7	7.8	---	---	---
30	---	---	---	7.9	7.8	7.8	7.9	7.8	7.8	---	---	---
31	---	---	---	---	---	---	7.9	7.7	7.8	---	---	---
MONTH	7.7	7.4	7.4	8.2	7.8	7.8	8.1	7.7	7.8	7.9	7.7	7.8
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	7.9	7.7	7.8	8.5	7.9	8.3	8.1	7.6	7.8
2	---	---	---	8.0	7.7	7.8	8.4	7.9	8.1	8.1	7.6	7.8
3	---	---	---	8.0	7.7	7.8	8.5	7.9	8.1	8.0	7.7	7.9
4	---	---	---	8.1	7.7	7.8	8.3	7.8	8.0	8.1	7.7	7.9
5	---	---	---	7.9	7.7	7.8	8.3	7.8	8.0	8.0	7.6	7.7
6	---	---	---	---	---	---	8.3	7.7	7.9	---	---	---
7	---	---	---	---	---	---	8.2	7.7	7.8	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	8.0	7.7	7.8	---	---	---	---	---	---
13	---	---	---	7.8	7.7	7.7	---	---	---	---	---	---
14	---	---	---	8.0	7.7	7.8	---	---	---	7.6	7.4	7.5
15	---	---	---	8.0	7.7	7.8	---	---	---	7.7	7.5	7.6
16	---	---	---	8.0	7.7	7.8	---	---	---	7.5	7.4	7.4
17	---	---	---	8.1	7.7	7.8	---	---	---	7.4	7.4	7.4
18	---	---	---	8.2	7.7	7.9	---	---	---	7.6	7.3	7.4
19	7.9	7.7	7.8	8.4	7.9	8.1	---	---	---	7.5	7.3	7.4
20	7.9	7.7	7.8	8.4	7.8	8.1	---	---	---	7.5	7.3	7.4
21	7.9	7.7	7.8	8.2	7.8	7.9	---	---	---	7.4	7.3	7.4
22	7.9	7.7	7.8	8.2	7.8	7.9	---	---	---	7.4	7.2	7.3
23	7.9	7.7	7.8	8.2	7.8	8.0	8.3	7.6	7.9	7.4	7.2	7.3
24	8.0	7.8	7.8	8.3	7.8	8.0	8.3	7.7	7.9	7.4	7.3	7.3
25	8.0	7.8	7.9	8.3	7.8	8.0	8.2	7.6	7.8	7.3	7.2	7.2
26	8.0	7.7	7.8	8.2	7.8	8.0	8.1	7.6	7.8	7.2	7.1	7.2
27	8.0	7.3	7.8	8.3	7.8	8.0	8.2	7.6	7.8	7.2	7.1	7.2
28	---	---	---	8.4	7.8	8.1	8.1	7.6	7.9	7.2	7.1	7.1
29	---	---	---	8.4	7.8	8.1	8.1	7.6	7.8	7.3	7.1	7.2
30	---	---	---	8.4	7.8	8.1	8.1	7.6	7.9	7.3	7.2	7.3
31	---	---	---	8.4	7.9	8.2	---	---	---	7.4	7.2	7.3
MONTH	8.0	7.3	7.8	8.4	7.7	7.9	8.5	7.6	7.9	8.1	7.1	7.4

DELAWARE RIVER BASIN

01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE--Continued

PH (STANDARD UNITS), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	7.4	7.3	7.3	7.4	7.3	7.3	7.3	7.2	7.3	7.4	7.3	7.3
2	7.4	7.2	7.3	7.3	7.3	7.3	7.4	7.2	7.3	7.5	7.3	7.4
3	7.4	7.0	7.2	7.3	7.2	7.3	7.4	7.2	7.3	7.4	7.3	7.4
4	7.1	7.0	7.0	7.3	7.2	7.2	7.5	7.2	7.3	7.4	7.3	7.3
5	7.1	7.0	7.0	7.3	7.2	7.2	7.5	7.2	7.3	7.5	7.3	7.4
6	7.1	7.0	7.1	7.2	7.2	7.2	7.4	7.2	7.3	7.6	7.3	7.5
7	7.1	7.0	7.1	7.2	7.1	7.2	7.4	7.2	7.3	---	---	---
8	7.1	7.1	7.1	7.2	7.1	7.2	7.3	7.1	7.2	---	---	---
9	7.2	7.1	7.1	7.3	7.2	7.2	---	---	---	---	---	---
10	7.1	7.1	7.1	7.3	7.1	7.2	---	---	---	7.6	7.4	7.5
11	7.2	7.0	7.1	7.3	7.2	7.2	---	---	---	7.6	7.4	7.5
12	7.2	7.1	7.1	7.3	7.1	7.2	---	---	---	7.6	7.5	7.6
13	7.3	7.1	7.2	7.3	7.1	7.2	7.6	7.2	7.4	7.7	7.5	7.6
14	7.3	7.2	7.2	7.3	7.1	7.2	7.4	7.2	7.3	7.7	7.6	7.6
15	7.4	7.2	7.3	7.3	7.1	7.2	7.4	7.1	7.3	7.7	7.6	7.6
16	7.3	7.2	7.3	7.2	7.1	7.2	7.3	7.1	7.2	7.7	7.6	7.6
17	7.3	7.2	7.2	7.3	7.1	7.2	7.4	7.2	7.2	7.7	7.6	7.6
18	7.3	7.2	7.2	7.3	7.1	7.2	7.3	7.1	7.2	7.6	7.6	7.6
19	7.3	7.2	7.2	7.3	7.1	7.2	7.3	7.2	7.3	7.6	7.5	7.6
20	7.3	7.2	7.2	7.2	7.1	7.2	7.3	7.2	7.2	7.6	7.5	7.5
21	7.3	7.1	7.2	7.2	7.1	7.2	7.3	7.1	7.2	7.5	7.5	7.5
22	7.2	7.2	7.2	7.2	7.1	7.2	7.3	7.1	7.2	7.5	7.4	7.5
23	---	---	---	7.3	7.1	7.2	7.4	7.2	7.2	7.6	7.4	7.5
24	---	---	---	7.3	7.2	7.2	7.4	7.2	7.3	7.6	7.5	7.5
25	7.2	7.1	7.2	7.4	7.2	7.3	7.3	7.2	7.3	7.6	7.5	7.5
26	7.3	7.1	7.2	7.4	7.2	7.3	7.3	7.2	7.3	7.6	7.5	7.5
27	7.4	7.2	7.3	7.3	7.2	7.2	7.3	7.2	7.3	7.7	7.5	7.6
28	7.4	7.3	7.3	7.4	7.2	7.3	7.3	7.2	7.3	7.8	7.4	7.5
29	7.4	7.3	7.3	7.3	7.2	7.3	7.4	7.2	7.3	7.5	7.3	7.4
30	7.4	7.3	7.3	7.3	7.2	7.2	7.4	7.2	7.3	7.4	7.2	7.4
31	---	---	---	7.3	7.1	7.2	7.3	7.2	7.3	---	---	---
MONTH	7.4	7.0	7.1	7.4	7.1	7.2	7.6	7.1	7.2	7.8	7.2	7.5

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	19.0	17.5	18.0	---	---	---	9.0	8.0	8.0	8.5	7.5	7.5
2	18.0	17.0	17.5	---	---	---	8.5	8.0	8.0	8.0	7.5	8.0
3	18.0	17.0	17.5	---	---	---	8.5	8.0	8.0	7.5	7.0	7.0
4	18.0	17.0	17.5	---	---	---	8.0	7.5	8.0	7.0	6.5	7.0
5	18.0	17.0	17.5	---	---	---	7.5	7.0	7.5	7.0	6.5	6.5
6	18.0	16.5	17.0	---	---	---	7.5	7.0	7.0	7.5	6.0	6.5
7	17.5	16.5	17.0	---	---	---	7.0	6.0	6.5	8.5	6.5	6.5
8	17.5	16.5	17.0	---	---	---	6.5	5.5	6.0	---	---	---
9	17.5	17.0	17.0	---	---	---	6.5	5.5	6.0	---	---	---
10	18.0	17.0	17.0	---	---	---	6.5	6.0	6.5	---	---	---
11	---	---	---	---	---	---	7.0	6.5	6.5	---	---	---
12	---	---	---	---	---	---	6.5	6.0	6.5	---	---	---
13	---	---	---	---	---	---	7.5	6.5	7.0	---	---	---
14	---	---	---	---	---	---	7.0	7.0	7.0	---	---	---
15	---	---	---	---	---	---	7.5	7.0	7.0	---	---	---
16	17.5	16.5	17.0	12.0	10.5	---	7.5	7.0	7.0	---	---	---
17	17.0	17.0	17.0	11.0	10.0	10.5	8.0	7.0	7.5	---	---	---
18	17.5	17.0	17.0	10.5	10.0	10.0	8.5	7.5	7.5	---	---	---
19	18.0	17.0	17.5	10.0	9.0	10.0	7.5	7.0	7.5	---	---	---
20	18.5	17.5	17.5	9.5	8.5	9.0	8.0	7.5	7.5	---	---	---
21	19.0	17.5	18.0	9.0	8.0	8.5	7.5	7.0	7.5	---	---	---
22	19.0	18.0	18.5	8.5	7.5	8.0	8.5	7.5	8.0	---	---	---
23	---	---	---	8.5	7.5	8.0	8.0	7.0	7.5	---	---	---
24	---	---	---	8.0	7.5	8.0	8.0	7.0	7.5	---	---	---
25	---	---	---	8.5	7.5	8.0	7.5	6.5	7.0	---	---	---
26	---	---	---	8.5	7.5	8.0	7.5	6.0	6.5	---	---	---
27	---	---	---	8.5	7.5	8.0	---	---	---	---	---	---
28	---	---	---	9.0	8.0	8.5	7.5	7.0	7.0	---	---	---
29	---	---	---	8.5	8.0	8.0	8.0	7.0	7.5	---	---	---
30	---	---	---	9.0	8.0	8.0	8.0	7.5	7.5	---	---	---
31	---	---	---	---	---	---	7.5	7.0	7.5	---	---	---
MONTH	19.0	16.5	17.5	12.0	7.5	8.5	9.0	5.5	7.0	8.5	6.0	7.0

DELAWARE RIVER BASIN

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01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE--Continued

TEMPERATURE, WATER (°C), WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	---	---	---	10.5	9.0	9.5	19.5	17.0	18.0
2	---	---	---	---	---	---	10.0	9.0	9.5	18.0	16.5	17.5
3	---	---	---	---	---	---	9.5	8.5	9.0	16.5	16.0	16.5
4	---	---	---	---	---	---	10.0	9.0	9.5	18.0	16.0	16.5
5	---	---	---	---	---	---	11.5	9.5	10.0	18.0	16.5	17.0
6	---	---	---	---	---	---	11.5	10.5	11.0	---	---	---
7	---	---	---	---	---	---	11.0	9.0	10.5	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	7.5	7.0	7.5	---	---	---	---	---	---
12	---	---	---	8.0	7.0	7.5	---	---	---	---	---	---
13	---	---	---	8.5	7.0	8.0	---	---	---	21.5	19.5	20.0
14	---	---	---	9.0	7.5	8.0	---	---	---	22.0	20.0	20.5
15	---	---	---	9.0	7.5	8.0	---	---	---	21.0	19.5	20.0
16	---	---	---	9.0	7.5	8.0	---	---	---	21.0	19.5	20.0
17	---	---	---	9.0	7.5	8.0	---	---	---	20.5	20.0	20.0
18	3.5	2.0	2.5	8.0	7.0	7.5	---	---	---	20.5	19.5	20.0
19	3.0	2.0	2.5	8.5	6.0	7.0	---	---	---	20.0	19.0	19.5
20	3.5	2.0	2.5	8.5	7.0	7.5	---	---	---	21.0	19.0	20.0
21	3.0	2.0	2.5	8.0	7.0	7.5	---	---	---	21.5	20.0	20.5
22	4.0	2.5	3.5	7.5	7.0	7.5	17.0	15.5	16.0	21.5	20.0	20.5
23	4.5	3.5	4.0	7.5	7.0	7.5	16.5	15.5	16.0	20.5	20.0	20.5
24	5.5	4.0	5.0	7.5	7.0	7.5	16.0	15.5	15.5	20.5	19.5	20.0
25	6.0	5.0	5.5	8.0	7.0	7.5	17.0	15.5	16.5	22.0	20.0	20.5
26	6.0	5.0	5.5	8.0	7.0	7.5	18.0	16.5	17.5	22.0	20.5	21.0
27	6.5	4.5	5.5	10.0	7.5	8.0	18.5	17.0	18.0	23.0	20.5	21.5
28	---	---	---	10.0	8.0	9.0	18.5	17.5	18.0	23.0	21.5	22.0
29	---	---	---	10.5	8.5	9.5	18.5	17.5	18.0	21.5	21.0	21.0
30	---	---	---	10.0	9.0	9.5	19.5	16.5	17.5	22.5	21.0	21.5
31	---	---	---	9.5	9.0	9.0	---	---	---	22.0	21.0	21.5
MONTH	6.5	2.0	4.0	10.5	5.5	7.5	19.5	5.5	13.0	23.0	16.0	20.0
DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	23.0	21.5	22.0	24.0	22.5	23.0	27.0	26.0	26.5	25.5	24.5	25.0
2	23.5	21.5	22.0	24.0	23.0	23.5	27.0	26.0	26.5	26.0	24.5	25.5
3	23.5	22.0	22.5	24.5	23.0	23.5	27.5	26.0	26.5	26.5	25.0	25.5
4	23.5	22.5	23.0	25.5	23.5	24.0	27.5	26.0	26.5	26.5	25.5	26.0
5	23.0	22.5	22.5	25.0	24.0	24.5	27.5	26.0	26.5	27.0	26.0	26.5
6	23.5	22.0	22.5	25.0	24.5	24.5	26.5	26.0	26.5	---	---	---
7	23.5	22.0	22.5	25.5	24.5	25.0	27.0	26.0	26.5	---	---	---
8	22.5	22.0	22.0	25.5	24.5	25.0	27.5	26.0	26.5	---	---	---
9	23.5	22.0	22.5	27.0	24.5	25.0	---	---	---	28.0	26.0	26.5
10	24.0	22.5	23.0	26.0	25.0	25.5	---	---	---	28.0	27.0	27.5
11	24.5	23.0	23.5	26.5	25.0	25.5	---	---	---	27.0	25.5	26.5
12	24.0	23.0	23.5	26.0	25.5	25.5	28.0	27.0	27.5	26.0	24.5	25.5
13	23.5	22.5	23.0	27.0	25.5	26.0	28.5	26.5	27.5	24.5	23.5	24.0
14	23.0	22.0	22.5	28.0	26.0	26.5	29.0	27.0	27.5	24.0	22.5	23.5
15	23.5	22.0	22.5	28.0	26.5	27.0	29.0	27.5	28.0	24.0	22.5	23.0
16	23.5	22.0	22.5	28.0	26.5	27.0	28.5	27.5	28.0	24.0	22.5	23.0
17	23.5	22.5	23.0	28.0	26.0	27.0	28.0	27.0	27.5	23.5	22.5	23.0
18	24.0	22.5	23.0	28.5	26.0	27.0	27.5	26.5	27.0	23.5	22.5	23.0
19	24.0	22.5	23.0	27.5	26.5	27.0	27.5	26.5	27.0	23.5	22.5	23.0
20	23.5	23.0	23.0	27.5	26.5	27.0	27.5	26.5	27.0	24.0	23.0	23.0
21	24.0	22.5	23.5	28.0	27.0	27.5	27.0	26.0	26.5	24.0	23.0	23.5
22	24.0	23.0	23.5	28.0	27.0	27.5	26.5	26.0	26.0	24.0	23.0	23.5
23	25.0	23.5	24.0	27.5	26.5	27.0	26.5	25.5	26.0	23.5	23.0	23.0
24	25.5	24.0	23.5	27.5	26.5	27.0	26.5	25.0	26.0	24.0	23.0	23.0
25	25.0	24.0	24.5	28.0	26.5	27.0	26.0	25.0	25.5	24.0	22.5	23.0
26	24.0	23.0	24.0	27.5	26.5	27.0	26.5	25.5	26.0	23.0	22.0	22.5
27	24.0	22.5	23.0	28.5	26.5	27.0	27.0	25.5	26.0	23.0	22.0	22.5
28	23.5	22.5	23.0	28.5	26.5	27.0	26.5	25.5	26.0	22.5	21.5	22.0
29	24.5	22.5	23.0	27.5	26.5	27.0	27.0	25.5	26.0	23.0	21.5	22.0
30	24.0	23.0	23.5	28.0	26.5	27.0	26.5	25.5	26.0	22.5	21.5	22.0
31	---	---	---	27.5	26.5	27.0	26.0	25.0	25.5	---	---	---
MONTH	25.5	21.5	23.0	28.5	22.5	26.0	29.0	25.0	26.5	28.0	21.5	24.5

01482800 DELAWARE RIVER AT REEY ISLAND JETTY, DE--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN OCTOBER	MEAN	MAX	MIN NOVEMBER	MEAN	MAX	MIN DECEMBER	MEAN	MAX	MIN JANUARY	MEAN
1	7.6	6.9	7.3	---	---	---	10.9	10.4	10.6	11.5	11.0	11.3
2	8.8	7.0	7.9	---	---	---	10.9	10.4	10.6	11.6	10.8	11.2
3	8.7	8.0	8.4	---	---	---	11.0	10.4	10.7	12.4	11.2	11.7
4	8.6	8.1	8.4	---	---	---	11.2	10.7	10.9	11.6	11.1	11.3
5	8.5	7.9	8.3	---	---	---	11.1	10.5	10.8	13.6	11.1	11.7
6	8.7	8.1	8.3	---	---	---	10.8	10.5	10.7	14.0	11.5	12.2
7	8.6	8.1	8.3	---	---	---	10.9	10.4	10.6	13.2	11.5	12.0
8	9.1	8.0	8.6	---	---	---	10.9	10.5	10.6	---	---	---
9	8.9	8.5	8.7	---	---	---	10.8	10.4	10.6	---	---	---
10	8.7	8.0	8.3	---	---	---	10.7	10.3	10.5	---	---	---
11	---	---	---	---	---	---	11.8	10.2	11.1	---	---	---
12	---	---	---	---	---	---	11.7	11.4	11.5	---	---	---
13	---	---	---	---	---	---	11.5	11.1	11.3	---	---	---
14	---	---	---	---	---	---	11.3	10.9	11.1	---	---	---
15	---	---	---	---	---	---	11.3	10.8	11.0	---	---	---
16	8.6	7.9	8.5	---	---	---	11.0	10.6	10.8	---	---	---
17	8.6	8.1	8.3	9.9	9.4	9.7	10.9	10.5	10.6	---	---	---
18	8.5	8.1	8.3	9.6	9.3	9.5	10.7	10.2	10.5	---	---	---
19	8.6	8.0	8.4	10.2	9.2	9.7	11.2	10.2	10.8	---	---	---
20	8.7	8.1	8.4	10.1	9.6	9.8	10.9	10.4	10.7	---	---	---
21	8.6	7.4	8.1	10.0	9.6	9.8	10.7	10.2	10.5	---	---	---
22	8.4	7.5	8.0	10.2	9.7	9.9	10.7	10.3	10.5	---	---	---
23	---	---	---	10.1	9.7	9.9	10.6	10.2	10.4	---	---	---
24	---	---	---	10.0	9.6	9.8	10.8	10.2	10.5	---	---	---
25	---	---	---	10.0	9.7	9.9	10.9	10.3	10.6	---	---	---
26	---	---	---	10.5	9.7	10.1	11.1	10.4	10.6	---	---	---
27	---	---	---	10.4	10.0	10.2	---	---	---	---	---	---
28	---	---	---	11.1	10.1	10.5	---	---	---	---	---	---
29	---	---	---	11.2	10.7	11.0	12.8	11.2	11.5	---	---	---
30	---	---	---	11.1	10.6	10.8	11.8	11.4	11.6	---	---	---
31	---	---	---	---	---	---	11.8	11.1	11.5	---	---	---
MONTH	9.1	6.9	8.3	11.2	9.2	10.0	12.8	10.2	10.8	14.0	10.8	11.6
DAY	MAX	MIN FEBRUARY	MEAN	MAX	MIN MARCH	MEAN	MAX	MIN APRIL	MEAN	MAX	MIN MAY	MEAN
1	---	---	---	---	---	---	12.4	11.5	11.8	8.8	8.0	8.3
2	---	---	---	13.2	12.3	12.8	12.0	11.3	11.6	8.7	7.7	8.2
3	---	---	---	13.0	12.0	12.5	11.7	10.9	11.4	8.9	7.9	8.3
4	---	---	---	12.8	11.9	12.3	11.6	10.8	11.2	8.4	7.6	8.1
5	---	---	---	13.4	11.7	12.5	11.4	10.6	11.0	8.7	7.6	8.2
6	---	---	---	---	---	---	11.3	10.1	10.6	---	---	---
7	---	---	---	---	---	---	11.6	10.3	10.6	---	---	---
8	---	---	---	---	---	---	---	---	---	---	---	---
9	---	---	---	---	---	---	---	---	---	---	---	---
10	---	---	---	---	---	---	---	---	---	---	---	---
11	---	---	---	---	---	---	---	---	---	---	---	---
12	---	---	---	11.9	11.1	11.4	---	---	---	---	---	---
13	---	---	---	11.5	11.0	11.3	---	---	---	---	---	---
14	---	---	---	11.7	11.0	11.4	---	---	---	8.0	7.1	7.5
15	---	---	---	11.8	10.8	11.2	---	---	---	7.8	6.8	7.2
16	---	---	---	11.7	10.7	11.0	---	---	---	7.5	6.6	7.1
17	---	---	---	11.3	10.6	11.0	---	---	---	7.3	6.7	7.0
18	---	---	---	11.3	10.6	11.0	---	---	---	7.6	6.7	7.1
19	15.5	13.7	14.1	11.8	10.7	11.3	---	---	---	7.6	6.7	7.2
20	15.2	13.6	13.8	11.8	11.0	11.4	---	---	---	8.0	7.2	7.7
21	13.9	13.4	13.6	11.9	11.2	11.5	---	---	---	7.6	7.0	7.3
22	13.9	13.3	13.6	11.8	11.1	11.4	---	---	---	7.3	6.8	7.1
23	14.1	13.0	13.3	11.9	11.2	11.5	9.8	8.6	9.2	7.0	6.6	6.8
24	13.4	12.8	13.1	12.0	11.2	11.5	9.9	8.3	9.0	6.9	6.5	6.7
25	13.3	12.5	12.8	12.0	11.2	11.6	9.0	8.0	8.4	7.0	6.4	6.7
26	13.1	12.4	12.7	11.9	11.2	11.5	8.8	8.1	8.4	6.9	6.4	6.6
27	13.3	12.2	12.7	12.5	11.3	11.9	9.2	8.3	8.7	6.8	6.3	6.6
28	---	---	---	12.8	11.7	12.1	8.9	7.9	8.4	6.7	6.3	6.5
29	---	---	---	12.8	11.2	12.0	9.1	8.3	8.6	7.5	6.4	7.0
30	---	---	---	12.5	11.0	12.0	9.3	8.2	8.7	7.5	6.8	7.1
31	---	---	---	12.2	11.0	11.7	---	---	---	7.2	6.7	7.0
MONTH	15.5	12.2	13.3	13.4	10.6	11.7	12.4	7.9	9.9	8.9	6.3	7.3

DELAWARE RIVER BASIN

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01482800 DELAWARE RIVER AT REEDY ISLAND JETTY, DE--Continued

OXYGEN, DISSOLVED (DO), MG/L, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DAY	MAX	MIN JUNE	MEAN	MAX	MIN JULY	MEAN	MAX	MIN AUGUST	MEAN	MAX	MIN SEPTEMBER	MEAN
1	7.2	6.7	7.0	7.5	5.9	6.7	6.5	5.8	6.2	7.2	6.4	6.7
2	7.1	6.7	6.9	7.2	6.8	7.0	6.5	5.6	6.1	7.1	6.4	6.8
3	6.9	6.3	6.6	7.5	7.0	7.2	6.4	5.6	6.0	7.6	6.5	6.9
4	6.7	6.1	6.5	7.4	6.8	7.1	6.5	5.7	6.1	6.9	6.2	6.4
5	6.7	6.3	6.5	7.2	6.9	7.0	6.7	5.9	6.2	6.8	5.8	6.1
6	7.1	6.7	6.9	7.2	6.8	7.0	7.2	6.5	6.8	---	---	---
7	7.6	7.2	7.4	7.1	6.7	6.9	6.8	5.5	6.1	---	---	---
8	7.8	7.4	7.6	7.3	6.9	7.1	6.9	5.2	6.0	---	---	---
9	8.3	7.7	7.9	7.7	7.0	7.2	---	---	---	7.1	6.1	6.5
10	8.3	6.1	7.8	7.1	6.6	6.9	---	---	---	6.8	5.9	6.4
11	6.5	5.9	6.2	7.1	6.3	6.5	---	---	---	7.2	6.3	6.8
12	6.5	6.1	6.3	6.5	6.0	6.2	7.3	6.0	6.6	7.2	6.4	6.7
13	6.5	6.2	6.4	6.7	5.8	6.2	7.2	5.4	6.2	7.2	6.5	6.8
14	6.7	6.1	6.4	6.2	5.5	5.9	6.8	5.7	6.4	7.7	6.6	7.2
15	6.7	6.1	6.3	7.0	5.6	6.2	6.9	5.5	6.1	7.4	6.7	7.0
16	7.1	6.3	6.8	6.5	5.5	6.1	7.0	5.7	6.2	7.9	7.2	7.5
17	7.1	6.4	6.8	6.4	5.3	5.7	7.1	6.4	6.7	7.5	6.7	7.1
18	7.0	6.4	6.9	6.4	5.4	5.8	6.5	6.0	6.3	7.0	6.4	6.7
19	7.0	6.6	6.8	6.3	5.7	5.9	6.9	5.9	6.3	7.2	6.5	6.8
20	7.2	6.5	6.8	6.1	5.5	5.7	6.3	5.6	6.0	7.5	6.3	7.0
21	7.2	6.6	6.9	6.4	5.6	5.9	6.1	5.3	5.7	7.3	6.7	7.0
22	7.0	6.5	6.8	6.3	4.9	5.6	6.3	5.2	5.7	7.5	6.8	7.1
23	7.1	6.7	6.9	5.9	5.2	5.5	6.4	5.5	5.8	7.3	6.7	7.0
24	7.2	6.6	6.8	6.1	5.6	5.8	6.4	5.5	6.0	7.0	6.3	6.6
25	6.9	6.5	6.7	6.3	5.6	5.9	6.4	5.6	6.1	6.8	6.0	6.4
26	7.0	6.5	6.7	6.1	5.5	5.8	6.3	5.7	6.0	6.8	5.9	6.2
27	7.1	6.6	6.8	6.5	5.3	5.5	6.8	5.6	6.2	7.7	6.5	6.9
28	7.0	6.4	6.7	6.3	5.5	5.8	7.1	6.3	6.7	9.0	6.1	6.7
29	6.6	6.2	6.4	6.5	5.3	5.8	7.3	6.4	6.8	6.6	5.9	6.2
30	6.5	5.9	6.2	6.4	5.6	6.0	6.7	6.1	6.4	6.9	5.5	5.9
31	---	---	---	6.3	5.7	6.1	6.6	6.2	6.5	---	---	---
MONTH	8.3	5.9	6.6	7.7	4.9	6.3	7.3	5.2	6.2	9.0	5.5	6.7

As the number of streams on which streamflow information is likely to be desired far exceeds the number of stream-gaging stations feasible to operate at one time, the Geological Survey collects limited streamflow data at sites other than stream-gaging stations. When limited streamflow data are collected on a systematic basis over a period of years for use in hydrologic analyses, the site at which the data are collected is called a partial-record station. Data collected at these partial-record stations are usable in low-flow or floodflow analyses, depending on the type of data collected. In addition, discharge measurements are made at other sites not included in the partial-record program. These measurements are generally made in times of drought or flood to give better areal coverage to those events. Those measurements and others collected for some special reason are called measurements at miscellaneous sites.

Records collected at partial-record stations are presented in two tables. The first is a table of annual maximum stage and discharge at crest-stage stations, and the second is a table of discharge measurements at low-flow partial-record stations. Discharge measurements made at miscellaneous sites for both low flow and high flow are given in a third table.

Crest-stage partial-record stations

The following table contains annual maximum discharges for crest-stage stations. A crest-stage gage is a device which will register the peak stage occurring between inspections of the gage. A stage-discharge relation for each gage is developed from discharge measurements made by indirect measurements of peak flow or by current meter. The date of the maximum discharge is not always certain but is usually determined by comparison with nearby continuous-record stations, weather records, or local inquiry. Only the maximum discharge for each water year is given. Information on some lower floods may have been obtained but is not published herein. The years given in the period of record represent water years for which the annual maximum has been determined.

Annual maximum discharge at crest-stage partial record stations

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Date	Annual Maximum Gage height (feet)	Dis-charge (ft ³ /s)
LACKAWAXEN RIVER BASIN							
01427950	W.B. Lackawaxen River near Aldenville, Pa.	Lat 41°40'28", long 75°22'35", Wayne County, at bridge on State Highway 247, 0.3 mi downstream from Johnsons Creek and 2.0 mi northwest of Aldenville. Datum of gage is 1,244.60 ft National Geodetic Vertical Datum of 1929.	40.6	1975-85	9-27-85	6.87	2,800
01429300	Dyberry Creek above Reservoir near Honesdale, Pa.	Lat 41°39'26", long 75°17'12", Wayne County, on right bank 955 ft downstream from bridge on West Branch Dyberry Creek at Tanners Falls, 0.2 mi downstream from confluence of the east and west branches of Dyberry Creek, and 6 mi north of Dyberry. Datum of gage is 1,023.43 ft National Geodetic Vertical Datum of 1929.	45.8	1975-85	9-27-85	11.75	3,460
01430000	Lackawaxen River near Honesdale, Pa.	Lat 41°35'43", long 75°14'54", Wayne County, at Lemnitzer Bridge in Honesdale, on U.S. Highway 6 and 1.2 mi downstream from Dyberry Creek.	164	1949-69† 1974-85	9-27-85	7.00	5,220
01431000	Middle Creek near Hawley, Pa.	Lat 41°29'05", long 75°13'20", Wayne County, at bridge on L.R. 63022, 0.1 mi below Red Shale Brook, 2 mi northwest of Hawley, and 2.5 mi above mouth.	78.4	1945-60† 1961-85	9-27-85	8.82	4,210
VANDERMARK CREEK BASIN							
01438300	Vandermark Creek at Milford, Pa.	Lat 41°19'35", long 74°47'50", Pike County, at stone bridge on Broad Street in Milford, and 0.4 mi above mouth. Datum of gage is 490.50 ft National Geodetic Vertical Datum of 1929.	5.36	1962-85	9-27-85	2.33	52.1
BRODHEAD CREEK BASIN							
01440300	Mill Creek at Mountainhome, Pa.	Lat 41°09'50", long 75°16'00", Monroe County, at stone-arch bridge on macadam road 0.5 mi east of Mountainhome, and 1.5 mi above mouth.	5.84	1961-85	9-27-85	7.76	351

† Operated as a continuous-record station.

Annual maximum discharge at crest-stage partial-record stations--Continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Date	Annual Maximum Gage height (feet)	Dis-charge (ft ³ /s)
BRODHEAD CREEK BASIN--CONTINUED							
01440900	McMichael Creek near Stroudsburg,	Lat 40°48'04", long 75°13'08", Monroe County, at bridge on Dreher Ave., 2 mi southwest of Stroudsburg, 3.2 mi upstream from mouth.	63.9	1975-85	9-27-85	7.60	2,890
MARTINS CREEK BASIN							
01446600	Martins Creek near East Bangor, Pa.	Lat 40°54'00", long 75°12'08", Northampton County, at stone-arch culvert on Township Road 722, 1.8 mi northwest of East Bangor	10.4	1961-78† 1979-85	9-27-85	3.41	529
LEHIGH RIVER BASIN							
01450455	Buckwha Creek at Little Gap, Pa.	Lat 40°49'21", long 75°32'04", Carbon County, at bridge on L.R. 13035, 0.35 mi upstream from mouth and 0.75 mi south of Little Gap.	42.5	1975-85	9-27-85	6.74	1,170
01451192	Lehigh River at Allentown, Pa.	Lat 40°36'23", long 75°27'17", Lehigh County, on upstream side of Hamilton Street Bridge, at Allentown, 200 ft downstream from lock and dam, and 0.7 mi upstream from Little Lehigh Creek.	1,033	1977-81d 1982-85	9-27-85	45.36	34,100
SCHUYLKILL RIVER BASIN							
01467500	Schuylkill River at Pottsville, Pa.	Lat 40°40'53", long 76°11'25", Schuylkill County, at bridge on State Highway 61 at Pottsville, and 1.7 mi downstream from Mill Creek.	53.4	1975-85	11-29-84	5.23	764
01467948	West Branch Schuylkill River near Cressona, Pa.	Lat 40°38'30", long 76°11'43", Schuylkill County, at bridge on Gordon-Nagle Trail, 0.75 mi upstream from Panther Creek, and 1.0 mi north of Cressona.	52.5	1975-85	-	<4.70	<888
01470190	Little Schuylkill River at Port Clinton, Pa.	Lat 40°35'24", long 76°01'43", Schuylkill County, 0.65 mi upstream from Rattling Run and 0.7 mi north of Port Clinton.	132	1975-85	11-29-84	6.29	2,200
01470748	Sacony Creek near Virginville, Pa.	Lat 40°31'27", long 75°51'29", Berks County, at bridge on L.R. 06135, 1.0 mi upstream from mouth, and 1.0 mi east of Virginville.	54.1	1975-85	9-27-85	7.99	1,890
01470766	Schuylkill River at Temple, Pa.	Lat 40°24'52", long 75°56'23", Berks County, at concrete bridge on State Highway Route 383, 0.7 mi downstream from mouth of Maiden Creek, 0.6 mi west of Temple.	641	1978-85	11-29-84	Not Determined	

† Operated as a continuous-record station.

d Operated as a low-flow partial-record station.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

Annual maximum discharge at crest-stage partial-record stations--Continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Date	Annual Maximum Gage height (feet)	Dis-charge (ft ³ /s)
SCHUYLKILL RIVER BASIN--CONTINUED							
01470810	Northkill Creek at Bernville, Pa.	Lat 40°26'22", long 76°07'12", Berks County, at bridge on State Highway 183, 0.3 mi upstream from Little Northkill Creek and 0.7 mi northwest of Bernville.	18.8	1975-85	10-22-84	4.87	668
01470818	Little Northkill Creek near Bernville, Pa.	Lat 40°26'33", long 76°07'23", Berks County, at bridge on L.R. 06013, 1.5 mi west of Bernville and 1.6 mi upstream from mouth.	21.2	1975-81 1983-85	5- 3-85	5.63	822
01471660	Schuylkill River at Birdsboro, Pa.	Lat 40°16'04", long 75° 48'40", Berks county, on Railroad Bridge, on right bank 1,000 feet upstream from Route 82 Bridge, Crossing Schuylkill River in Birdsboro.	976	1981-85	9-27-85	149.30	9,460
01472162	Schuylkill River at Phoenixville, Pa.	Lat 40°08'11", long 75°30'41", Chester County, on the downstream end of the left bank wingwall of Reading Railroad bridge across the mouth of French Creek at Phoenixville.	1,280	1971-85	9-27-85	85.31	29,300
01473193	Schuylkill River at Port Kennedy, Pa.	Lat 40°06'29", long 75°25'16", Montgomery County, on left bank 200 ft upstream from Betzwood Bridge, and 4.0 mi downstream from Perkiomen Creek at Port Kennedy.	1,691	1977-85	9-27-85	70.04	39,800
01473470	Stony Creek at Norristown, Pa.	Lat 40°07'38", long 75°20'43", Montgomery County, on right bank at culvert on Steiger Street in Norristown, 0.1 mi downstream from dam, 0.7 mi downstream from unnamed tributary, and 1.1 mi upstream from mouth.	20.4	1975-85	2-12-85	6.97	5,100
01473500	Schuylkill River at Norristown, Pa.	Lat 40°06'40", long 75°20'50", Montgomery County, on right bank at Conrail Bridge pier, 600 ft upstream from Dekalb Street Bridge in Norristown.	1,760	1981-85	9-27-85	62.52	40,500
DARBY CREEK BASIN							
01475555	Hermesprota Creek at Darby, Pa.	Lat 39°54'02", long 75°16'19", Delaware County, on right bank at culvert on Linden Avenue in Darby, 1.7 mi upstream from mouth.	1.01	1975-85	9-26-75 8- 9-76 9-19-77 1-26-78 3-21-80 8- 8-81 8- 8-82 5-21-83 7- 7-84 9-27-85	6.68 4.53 6.42 5.63 3.41 7.26 6.45 6.02 5.02 4.34	1,400 322 1,230 770 103 1,900 1,250 960 530 345
01475560	Stony Creek at Prospect Park, Pa.	Lat 39°53'14", long 75°19'00", Delaware County, on left bank at culvert and dam on 13th Street in Propsect Park.	2.29	1975-85	2-17-85 9-27-85	10.55 +	259 +
01475600	Muckinipattis Creek at Glenolden, Pa.	Lat 39°53'44", long 75°19'00", Delaware County, on left bank at Glenolden Avenue in Glenolden, 1.5 mi upstream from mouth.	3.50	1975-85	9-27-85	4.50	581

‡ Operated as a continuous-record station.

+ Not determined.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

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Annual maximum discharge at crest-stage partial-record stations--Continued

					Annual Maximum		
CRUM CREEK BASIN							
01476000	Crum Creek at Bullens Lane near Woodlyn, Pa.	Lat 39°52'44", long 75°20'58", Delaware County, on right bank at bridge on Bullens Lane in Woodlyn.	33.3	1931-37† 1975-85	9-27-85	4.85	516
RIDLEY CREEK BASIN							
01476435	Ridley Creek at Dutton Mill near West Chester, Pa.	Lat 39°58'52", long 75°31'02", Chester County, on left bank at Strasburg Road, 0.1 mi west of Dutton Mill and 4.9 mi east of West Chester.	9.70	1975-85	9-27-85	5.33	745
01476500	Ridley Creek at Moylan, Pa.	Lat 39°54'08", long 75°23'32", Delaware County, on upstream left bank of Manchester Road bridge intersection with Knowlton Road, at Moylan, and 1.0 mi south of Media.	31.9	1978-85	1-26-78 9- 6-79 11-26-79 8- 8-81 4-10-83 4- 5-84 9-27-85	7.26 6.09 7.42 5.90 5.13 6.09 5.57	2,450 1,630 2,600 1,520 1,100 1,630 1,330
CHESTER CREEK BASIN							
01476836	East Branch Chester Creek near West Chester, Pa.	Lat 39°56'09", long 75°32'29", Chester County, at bridge on Street Road, 0.4 mi upstream from Goose Run, 1.1 mi northwest of Cheyney, and 3.8 mi east of the intersection of Pa. route 100, and U.S. Highway 202 in West Chester.	10.8	1975-85	9-27-85	7.33	912
01476853	East Branch Chester Creek at Cheyney, Pa.	Lat 39°55'58", long 75°31'03", Delaware County, at bridge on Station Road, 0.5 mi northeast of Cheyney and 1.5 mi downstream from Goose Run.	22.8	1975-85	9-27-85	9.95	1,150
01476950	West Branch Chester Creek near Chester Heights, Pa.	Lat 39°52'36", long 75°27'05", Delaware County, at bridge on Pirney Road at Aston Mills, 1.2 mi upstream from confluence with East Branch, and 1.8 mi southeast of Chester Heights.	18.0	1975-85	2-12-85	3.50	348
CHRISTINA CREEK BASIN							
01478200	Middle Branch White Clay Creek near Landenberg, Pa.	Lat 39°46'54", long 75°48'03", Chester County, at bridge on L.R. 15017, 1.4 mi above mouth, and 1.7 mi west of Landenberg.	12.7	1960-85	2-12-85	9.50e	1,980e
01480610	Sucker Run near Coatesville, Pa.	Lat 39°58'20", long 75°51'03", Chester County, at concrete bridge on South Park Avenue at State Highway 372, 1.6 mi above mouth, and 2 mi west of Coatesville.	2.57	1964-85	2-12-85	5.55	+

+ Not determined.

b Revised

e Estimated

† Operated as a continuous-record station.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

Low-flow partial-record stations

Measurements of streamflow in the area covered by this report made at low-flow partial-record stations are given in the following table. These measurements were made during periods of base flow when streamflow is primarily from ground-water storage. These measurements, when correlated with the simultaneous discharge of a nearby stream where continuous records are available, will give a picture of the low-flow potentiality of the stream. The column headed "Period of record" shows the water years in which measurements were made at the same, or practically the same, site.

Discharge measurements made at low-flow partial-record stations during water year 1985

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Measurements Date	Discharge (cfs)
EQUINUNK CREEK BASIN						
01427200	Equinunk Creek near Equinunk, Pa.	Lat 41°50'15", long 75°13'55", Wayne County, at highway bridge 700 ft downstream from South Branch Equinunk Creek, and 1.4 mi above mouth and Equinunk.	56.3	1946-57 1978-85	10-17-84	3.99
					10-26-84	18.2
					4-23-85	51.4c
					5- 2-85	32.4c
					5-16-85	18.7
					6- 7-85	17.9
					7-10-85	16.9
					8-14 85	8.79
					9- 4-85	9.55
					01427203	Equinunk Creek at Equinunk, Pa.
4-23-85	51.4					
4-23-85	58.6					
9- 9-85	36.4					
CALKINS CREEK BASIN						
01427700	Calkins Creek at Milanville, Pa.	Lat 41°40'12", long 75°04'07", Wayne County, at Milanville, 300 ft downstream from confluence of North and South Branches, and 0.6 mi upstream from mouth.	44.0	1958-64 1966-69 1981-85	10-17-84	2.94
					4-23-85	30
					9- 9-85	9.64
LACKAWAXEN RIVER BASIN						
01428800	West Branch Lackawaxen River at Aldenville, Pa.	Lat 41°38'38", long 75°21'36", Wayne County, at bridge on State Highway 170, 0.3 mi southeast of Aldenville, and 4.5 mi north of Prompton.	48.9	1970-78 1981-85	10-17-84	12.6
					4-23-85	59.2
					9- 9-85	10.6
SHOHOLA CREEK BASIN						
01432500	Shohola Creek at Shohola, Pa.	Lat 41°27'20", long 74°55'25", Pike County, 1.7 mi upstream from mouth, and 1.4 mi south of Shohola. Prior to 1959 at highway bridge 0.4 mi upstream.	83.6	1920-28‡ 1957-80b 1981-85	10-17-84	4.08
					10-25-84	6.58
					4-23-85	92.7
					4-24-85	91.1
					6-10-85	103 c
					7-10-85	39.6
					8-14-85	14.0
					9- 9-85	30.1
					9-15-85	9.77
					BUSH KILL BASIN	
01439700	Little Bush Kill at Bushkill Pa.	Lat 41°05'30", long 75°00'15", Pike County, at highway bridge 175 ft upstream from mouth, at Bush Kill.	33.0	1958-69 1981-85	10-17-84	2.70
					4-23-85	30.0
					9- 9-85	5.74
BRODHEAD CREEK BASIN						
01440500	Paradise Creek at Henryville, Pa.	Lat 41°06'00", long 75°15'05", Monroe County, 400 ft upstream from concrete bridge on State Highway 191, about 600 ft upstream from confluence with Cranberry Creek, and 0.5 mi northwest of Henryville.	30.2	1908-14‡ 1981-85	10-16-84	11.5
					4-24-85	33.2
					9-11-85	16.5

† Operated as a continuous-record station.

b Operated as a miscellaneous station.

c Not base flow.

Discharge measurements made at low-flow partial-record stations during water year 1985--Continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Measurements Date	Discharge (cfs)
BRODHEAD CREEK BASIN--Continued						
01441000	McMichael Creek at Stroudsburg, Pa.	Lat 40°58'45", long 75°12'05", Monroe County, at bridge on Interstate Highway 80, 0.25 mi upstream from Little Pocono Creek, and 0.7 mi southwest of Stroudsburg.	65.3	1911-38‡ 1970-74 1981-85	10-18-84 4-24-85 9-11-85	25.3 63.7 23.9
01441500	Pocono Creek near Stroudsburg, Pa.	Lat 40°59'10", long 75°13'35", Monroe County, at bridge on county road, 0.3 mi upstream from Flagler Run, 1.3 mi west of Stroudsburg, and 1.9 mi upstream from mouth.	41.0	1911-19‡ 1970-76 1982-85	10-18-84 4-24-85 9-11-85	12.3 47.4 14.1
01442600	Marshall Creek at Minisink Hills, Pa.	Lat 40°59'53", long 75°08'25", Monroe County, at bridge on rural road, 600 ft upstream from mouth, at Minisink Hills.	27.1	1958-72 1981-85	10-17-84 4-24-85 9-10-85	4.34 21.0 5.21
JACOBY CREEK BASIN						
01443100	Jacoby Creek at Portland, Pa.	Lat 40°55'00", long 75°06'19", Northampton County, at county highway bridge, 0.6 mi southwest of Portland and 0.7 mi upstream from mouth.	6.17	1970-85	10-18-84 4-24-85 9-10-85	10.9 7.88 6.36
MARTINS CREEK BASIN						
01446650	Martins Creek below Little Martins Creek at Martins Creek, Pa.	Lat 40°47'02", long 75°11'08", Northampton County, at bridge on State Highway 611 in village of Martins Creek and 0.9 mi upstream from mouth.	43.4	1932 1970-85	9-10-85	20.7
BUSHKILL CREEK BASIN						
01446900	Bushkill Creek near Easton, Pa.	Lat 40°42'38", long 75°14'46", Northampton County, at bridge just west of Bushkill Drive at Coilton, 0.8 mi downstream from Schoeneck Creek and 2.5 mi north of Easton.	72.0	1970-78b 1982-85	09-10-85	54.9
LEHIGH RIVER BASIN						
01447750	Bear Creek near White Haven, Pa.	Lat 41°10'42", long 75°45'21", Luzerne County, at bridge on State Highway 115, at Bear Creek, 200 ft downstream from Bear Creek Dam, 8 mi southeast of Wilkes-Barre, and 8.3 mi north of White Haven.	35.0	1959-69 1981-85	10-16-84 4-22-85 9-11-85	7.11 38.4 74.0
01448100	Sandy Run near White Haven, Pa.	Lat 41°00'31", long 75°46'08", Luzerne County, at bridge on L.R. 40118, 800 ft upstream from Pond Creek, and 3.8 mi south of White Haven.	10.9	1970-78 1981-85	10-16-84 4-22-85 9-11-85	3.49 9.85 4.63
01449300	Mahoning Creek at Lehighon, Pa.	Lat 40°49'30", long 75°42'04", Carbon County, at mouth at Lehighon.	38.3	1946 1955 1981-85	10-16-84 4-22-85 9-11-85	5.78 26.5 7.97
01449355	Middle Creek at Kresgeville, Pa.	Lat 40°54'03", long 75°29'50", Monroe County, at bridge on U.S. Highway 209 at Kresgeville, 0.5 mi downstream from Dotters Creek, and 0.5 mi upstream from mouth.	18.6	1970-78 1981-85	10-16-84 4-24-85 9-11-85	8.56 17.1 6.78
01451110	Hokendauqua Creek near Northampton, Pa.	Lat 40°42'50", long 75°29'45", Northampton County, at bridge on county road, 1.7 mi north of Northampton, and 3.3 mi upstream from mouth.	38.1	1970-78 1981-85	4-22-85 9-10-85	25.8 10.9

‡ Operated as a continuous-record station.

b Operated as a miscellaneous station.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

Discharge measurements made at low-flow partial-record stations during water year 1985--Continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Measurements Date	Discharge (cfs)
LEHIGH RIVER BASIN--Continued						
01451165	Catasauqua Creek at Catasauqua, Pa.	Lat 40°38'52", long 75°28'06", Lehigh County, at bridge on North Daulphin Street, Catasauqua, 0.1 mi upstream from mouth.	15.7	1970-78 1981-85	4-22-85 9-10-85	4.23 3.08
01451900	Jordan Creek near Stetlersville, Pa.	Lat 40°37'46", long 75°33'13", Lehigh County, at covered bridge on rural road, 0.5 mi north of Stetlersville.	70.4	1967-69b 1981-85	4-22-85 9-10-85	20.9 6.31
01452300	East Branch Monocacy Creek near Bath, Pa.	Lat 40°43'10", long 75°22'10", Northampton County, on left bank 25 ft downstream from bridge on L.R. 40863, 1.5 mi southeast of Bath, and 2.5 mi upstream from mouth. Datum of gage is 372.06 ft, National Geodetic Vertical Datum of 1929.	5.35	1962-68† 1969-81c 1982-85	4-24-85 9-11-85	0.10 0
01457790	Cooks Creek at Durham Furnace, Pa.	Lat 40°34'56", long 75°12'20", Bucks County, on east side of Red Brick Road, 0.1 mi north of State Highway 212, 0.5 mi upstream from mouth and Durham Furnace.	29.4	1934,1944 1949-50 1970-78 1981-85	4-23-85 9-18-85	15 8.49
TINICUM CREEK BASIN						
01458900	Tinicum Creek near Ottsville, Pa.	Lat 40°28'14", long 75°08'13", Bucks County, at concrete bridge on gravel road, 0.9 mi below confluence of Rapp Creek and Beaver Creek, 1.5 mi east of Ottsville, and 5.3 mi above mouth.	14.7	1971-81c 1982-85	4-23-85 9-12-85	4.0 .31
TOHICKON CREEK BASIN						
01459100	Beaver Run tributary at Quakertown, Pa.	Lat 40°26'37", long 75°19'42", Bucks County, at concrete weir upstream from twin concrete-arch culvert on Erie Avenue at intersection with Elm Street in Quakertown, 0.2 mi upstream from mouth.	2.42	1961-68 1981-85	4-24-85 9-12-85	.32 .22
01459150	Tohickon Creek near Quakertown, Pa.	Lat 40°26'26", long 76°18'42", Bucks County, 1,000 ft downstream from county highway bridge and 1 mi east of Quakertown.	27.5	1970-78 1981-85	4-24-85 9-12-85	6.3 2.4
JERICHO CREEK BASIN						
01462300	Jericho Creek at Washington Crossing, Pa.	Lat 40°18'40", long 74°54'23", Bucks County, at bridge on State Highway 32, 0.3 mi upstream from mouth, and 2.5 mi northwest of Washington Crossing.	9.52	1971-85	11-13-84 4-30-85 9-18-85	.40 .78 0
NESHAMINY CREEK BASIN						
01464750	Neshaminy Creek near Rushland, Pa.	Lat 40°15'33", long 75°02'06", Bucks County, 0.25 mi upstream from Little Neshaminy Creek, at Rushland.	91	1933,1950 1963-64b 1981-85	11-15-84 4-30-85 9-18-85	26 22 23
01464900	Park Creek near Warrington, Pa.	Lat 40°13'24", long 75°08'42", Bucks County, at mouth, 0.3 mi upstream from bridge on State Highway 611 across Little Neshaminy Creek, and 2.0 mi southwest of Warrington.	11.8	1946-57 1981-84	11-14-84 5- 1-85 9-17-85	.75 .79 0

† Operated as a continuous-record station.

b Operated as miscellaneous station.

c Operated as a crest-stage partial-record station.

Discharge measurements made at low-flow partial-record stations during water year 1985--continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Measurements Date	Discharge (cfs)
NESHAMINY CREEK BASIN--Continued						
01465000	Neshaminy Creek at Rushland, Pa.	Lat 40°15'20", long 75°02'00", Bucks County, at Railroad bridge 0.1 mi downstream from Little Neshaminy Creek, 0.2 mi southwest of Rushland, and 0.4 mi upstream from Mill Creek.	134	1885-1913† 1932-34 ‡ 1981-85	11-14-84 4-30-85 9-18-85	36 33 18
01465100	Mill Creek at Rushland, Pa.	Lat 40°15'35", long 75°01'34", Bucks County, at bridge on L.R. 09047 at Rushland.	21.6	1950 1981-85	11-14-84 4-30-85 9-18-85	2.3 2.2 .44
POQUESSING CREEK BASIN						
01465790	Byberry Creek at Chalfont Road, Philadelphia, Pa.	Lat 40°05'01", long 74°58'57", Philadelphia County, on right bank 200 ft downstream from Chalfont Road Bridge, 0.2 mi downstream from Walton Run, at Philadelphia.	5.34	1964-78‡ 1981-85	11-13-84 5- 1-85 9-17-85	.29 .28 .30
FRANKFORD CREEK BASIN						
01467084	Rock Creek above Curtis Arboretum near Philadelphia Pa.	Lat 40°04'54", long 75°09'03", Montgomery County, on right bank 60 ft upstream from stone-arch bridge, 1,600 ft upstream from Washington Lane, Cheltenham Township, and about 1.2 mi upstream from mouth.	1.15	1971-78‡ 1981-85	11-13-84 5- 1-85 9-17-85	.87 .65 .46
SCHUYLKILL RIVER BASIN						
01469290	Pine Creek at Barnesville, Pa.	Lat 40°49'09", long 76°01'06", Schuylkill County, 0.1 mi south of State Highway 45, and 0.8 mi east of Barneville.	7.33	1964b 1981-85	4-22-85 9-11-85	7.0 2.2
01470800	Tulpehocken Creek at Bernville, Pa.	Lat 40°25'35", long 76°06'45", Berks County, at a single-span concrete highway bridge on L.R. 06047, 600 ft upstream from confluence with Northkill Creek, and 0.5 mi south of Bernville.	84.8	1944 1951 1955 1957 1972-77b 1981-85	9-11-85	52
01471520	Wyomissing Creek at West Reading, Pa.	Lat 40°19'46", long 75°56'23", Berks County, at West Reading, and 180 ft upstream from mouth.	15.6	1948-53d 1981-85	5- 2-85 9-11-85	27 13
01471620	Allegheny Creek at Gibraltar, Pa.	Lat 40°17'06", long 75°52'25", Berks County, 600 ft upstream from Schuylkill Canal, at Gibraltar.	17.9	1967b 1981-85	5- 2-85 9-11-85	26 8.1
01471800	Pine Creek near Manatawny, Pa.	Lat 40°24'43", long 75°44'02", Berks County, at steel bridge on macadam road, at Lobachsville, 0.5 mi upstream from mouth, 0.5 mi below West Branch Pine Creek and 2 mi north of Manatawny.	15.6	1970-81* 1982-85	9-24-85	2.3
01471900	Manatawny Creek at Earlville, Pa.	Lat 40°19'05", long 75°44'01", Berks County, at bridge on State Highway 562 at Earlville, and 2.7 mi south of Spangsville.	60.9	1947-57 1981-85	9-24-85	24
01472130	French Creek near St. Peters, Pa.	Lat 40°11'03", long 75°45'10", Chester county, at highway bridge, 1.2 mi northwest of St. Peters.	11.8	1932-33 1981-85	4-29-85 9-26-85	5.8 2.5
01472150	French Creek At Coventryville, Pa.	Lat 40°10'16", long 75°41'26", Chester county, at highway bridge, 0.1 mi south of State Highway 23, at Coventryville, 0.3 mi downstream from South Branch, 0.6 mi southwest of Pottstown.	36.9	1951-69 1981-85	4-29-85 9-26-85	19 4.4

* Also a crest-stage partial-record station.

† Operated as a continuous-record station.

‡ Operated as a miscellaneous station.

d Published as Wyomissing Creek near Reading.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

Discharge measurements made at low-flow partial-record stations during water year 1985--Continued

Station No.	Station name	Location	Drainage area (mi ²)	Period of record	Measurements Date	Discharge (cfs)
SCHUYLKILL RIVER BASIN--Continued						
01472175	Unnamed tributary to Pickering Creek near Ludwigs Corne, Pa.	Lat 40°06'06", long 75°39'32", Chester County, at bridge on rural road, 2.1 mi southeast of Ludwigs Corner.	1.87	1967-68b 1981-85	4-26-85	.09
01472280	Macoby Creek at Green Lane, Pa.	Lat 40°20'22", long 75°28'20", Montgomery County, at bridge on State Highway 29, at Green Lane, and 0.1 mi upstream from mouth.	17.4	1949 1981-85	4-25-85 9-12-85	3.2 1.2
01472450	Unami Creek at Sumneytown, Pa.	Lat 40°19'34", long 75°27'00", Montgomery County, at bridge on State Highway 63, at Sumneytown.	47	1946a,b 1951a,b 1981-85	4-25-85 9-12-85	10 3.8
01472800	East Branch Perkiomen Creek near Harleysville, Pa.	Lat 40°16'25", long 75°24'55", Montgomery County, at bridge on L.R. 46023, and 1.5 mi southwest of Harleysville.	56.4	1958-69 1981-85	4-25-85 9-12-85	10 4.5
01473100	Zacharias Creek near Skippack, Pa.	Lat 40°12'26", long 75°21'57", Montgomery County, at concrete weir, 1.2 mi upstream from mouth, and 2.2 mi southeast of skippack.	7.27	1960-80* 1981-85	9-24-85	.09
01473200	Trout Creek near Valley Forge, Pa.	Lat 40°05'25", long 75°25'24", Chester County, at bridge on Richard Road, 750 ft upstream from bridge on State Highway 23, and 2.2 mi east of Valley Forge.	6.55	1946-57 1981-85	4-29-85	.35
CHRISTINA CREEK BASIN						
01478150	East Branch White Clay Creek at Landenberg, Pa.	Lat 39°46'40", long 75°46'18", Chester County, at county highway bridge at Landenberg, 1.4 mi downstream from Egypt Run and 4 mi southeast of West Grove.	25.6	1970-78 1980-85	4-30-85	17
01479700	West Branch Red Clay Creek near Kennett Square, Pa.	Lat 39°48'39", long 75°42'19", Chester County, at county highway bridge on Kaolin Road, 1 mi upstream from East Branch Red Clay Creek, 1.4 mi east of Kaolin and 2.5 mi south of Kennett Square.	17.0	1970-78 1980-85	4-30-85	13
01480630	Buck Run near Doe Run, Pa.	Lat 39°55'40", long 75°48'22", Chester County, 1,300 ft downstream from bridge on county road, 0.65 mi upstream from Doe Run, and 2.0 mi southwest of Mortonville.	24.4	1949 1955 1981-85	9-25-85	15
01480665	East Branch Brandywine Creek at Dorlan	Lat 40°03'08", long 75°43'28", Chester County, 300 ft upstream from bridge on private road, 0.3 mi upstream from Marsh Creek, and 0.5 mi northwest of Dorlan.	33.4	1967-68† 1981-85	4-26-85	16
01494980	Big Elk Creek near Lewisville, Pa.	Lat 39°44'08", long 75°52'53", Chester County, at Fergusons Bridge on State Highway 841, 0.9 mi north of Lewisville.	31.2	1976-79b 1981-85	4-30-85	15

* Also a crest-stage partial-record station.

† Operated as a continuous-record station.

a Published as "at Camp Belmont".

b Operated as a miscellaneous station.

DISCHARGE AT PARTIAL-RECORD STATIONS AND MISCELLANEOUS SITES

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Discharge measurements made at miscellaneous sites during water year 1985

Stream	Tributary to	Location	Drainage area (mi ²)	Measured previously (water years)	Measurements Date	Discharge (ft ³ /s)
SCHUYLKILL RIVER BASIN						
Pigeon Creek	Schuylkill River	Lat 40°12'03", long 75°37'10", Chester County, at bridge on Ellis Woods Road, 1.8 mi west of Parker Ford and 3 mi upstream from mouth.	12.0	1970-76 1978-85	11-20-84 4-26-85 5-21-85 6-20-85	5.1 7.1 8.6 5.8
NESHAMINY CREEK BASIN						
Ironworks Creek	Mill Creek	Lat 40°11'54", long 75°15'41", Montgomery County, at lower Holland Road Bridge 300 ft east of Bustleton Pike and 1.3 mi south of Richboro.	3.69	1981b 1982-85	11- 7-84 12-18-84 3- 7-85 5-16-84 6-19-85 9-17-85	.86 .50 1.2 1.3 .79 .30

b Operated as a low-flow partial-record station.

LEHIGH RIVER BASIN

Little Lehigh Creek seepage investigations--Weilersville to Allentown, PA

One series of discharge measurements were made during the 1985 water year, on May 1, on the Little Lehigh Creek and tributaries in Pennsylvania, to study channel gains and losses. The reach for the first seepage investigation is 8.9 mi in length and extends from Weilersville to the gaging station at Allentown (01451500). The measurements were made during periods of constant base flow of the stream. Tributary flow was considered a contribution and not a gain. Indicated gains or losses may be substantially in error as affected by small inaccuracies in open-channel measurements.

May 1, 1985

Results of Seepage Investigation On The Little Lehigh Creek and Tributaries

Mile	Stream	Location	Site Number	Tributary	Discharge in Cubic Feet per second (ft ³ /s)		
					Main stream	Segment Gain/loss measurement error	Cumulative Gain/loss measurement error
8.90	Little Lehigh	Weilersville	-	-	-	-	-
8.50	Little Lehigh	Zion Church	4031350753635	-	11.70	-	-
8.10	Spring Creek	Rt. 100	4032010753604	7.64	-	-	-
8.05	Little Lehigh	Rt. 100	4032030753600	-	14.85	3.15	3.15
7.30	Little Lehigh	Kneppers Farm	4032350753456	-	12.95	-1.90	1.25
5.00	Little Lehigh	Bartholomew	4032160753141	-	15.54	0.53	1.78
5.90a	Swabia Creek	Brookside C.C.	4031360753256	2.60	-	-	-
5.90b	Swabia Creek	Alburtis	4030060753553	2.03	-	-	-
4.64	Little Lehigh	Camp Olympic	4032180753119	-	22.32	5.43	7.21
4.64c	Lieberts Creek	Emmaus	4031170753031	1.35	-	-	-
4.07	Little Lehigh	L.V. Conservancy	4032290753039	-	24.58	2.66	9.87
1.70	Little Lehigh	Gage at Allentown	4034560752900	-	45.30	20.32	30.19

a: denotes that station is .8 miles upstream from confluence.

b: denotes that station is 2.2 miles upstream from confluence.

c: denotes that station is 1.5 miles upstream from confluence.

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

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WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CACO3)	HARD- NESS, NONCAR- BONATE (MG/L CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)
01472080 - PIGEON CREEK NEAR PARKER FORD, PA. (LAT 40 12 03 LONG 075 37 10)											
OCT	22...	16	141	7.4	23.0	16.0	.70	8.0	53	18	14
01472109 - STONY RUN NEAR SPRING CITY, PA. (LAT 40 10 11 LONG 075 34 45)											
OCT	09...	.53	---	7.6	21.5	14.0	1.0	9.9	82	34	21
NOV	20...	.29	230	7.3	--	5.0	--	--	--	--	--
DEC	13...	.71	240	7.1	--	9.5	--	--	81	39	21
01472138 - FRENCH CREEK NEAR COVENTRYVILLE, PA. (LAT 40 10 14 LONG 075 41 50)											
OCT	10...	10	125	7.7	20.0	13.0	.50	10.6	47	5	12
01472140 - SOUTH BRANCH FRENCH CREEK AT COVENTRYVILLE, PA. (LAT 40 09 18 LONG 075 42 52)											
OCT	10...	7.8	185	8.1	21.5	15.0	.40	10.6	68	20	18
01472154 - FRENCH CREEK NEAR PUGHTOWN, PA. (LAT 40 09 17 LONG 075 38 25)											
OCT	10...	23	150	7.7	20.0	13.0	.60	11.0	56	14	15
014721612 - FRENCH CREEK AT RAILROAD BRIDGE AT PHOENIXVILLE, PA (LAT 40 08 10 LONG 075 30 41)											
OCT	10...	35	200	7.8	16.5	14.0	.80	10.6	78	24	21
01472170 - PICKERING CREEK NEAR EAGLE, PA. (LAT 40 04 43 LONG 075 39 14)											
OCT	05...	1.8	205	7.8	21.0	13.5	1.0	10.3	80	39	21
01472174 - PICKERING CREEK NEAR CHESTER SPRINGS, PA. (LAT 40 05 22 LONG 075 37 50)											
OCT	05...	4.0	200	7.7	16.5	9.5	.60	10.7	77	25	21
NOV	20...	3.0	180	7.2	--	4.5	--	--	--	--	--
DEC	13...	4.2	195	7.1	--	8.0	--	--	73	28	20
014721854 - PICKERING CREEK AT MERLIN, PA (LAT 40 06 25 LONG 075 35 34)											
OCT	05...	14	175	7.9	17.5	11.0	.40	11.4	74	20	20
014721884 - PICKERING CREEK AT CHARLESTOWN RAILROAD BRIDGE. AT CHARLESTOWN, PA (LAT 40 05 57 LONG 075 33 20)											
OCT	09...	17	190	8.0	16.5	12.0	.50	10.8	75	23	20
01472190 - PICKERING CREEK NEAR PHOENIXVILLE, PA. (LAT 40 06 33 LONG 075 31 42)											
OCT	22...	23	206	7.8	23.0	16.0	.50	9.3	83	27	22
01473167 - LITTLE VALLEY CREEK AT HOWELLVILLE, PA. (LAT 40 04 00 LONG 075 28 22)											
OCT	09...	6.0	480	8.8	20.0	14.0	.40	10.9	210	40	56
NOV	21...	4.1	480	8.2	--	8.0	--	--	--	--	--
DEC	12...	5.1	460	8.5	--	7.5	--	--	220	51	58

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATION

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)
01472080 - PIGEON CREEK NEAR PARKER FORD, PA. (LAT 40 12 03 LONG 075 37 10)											
OCT 22...	4.5	6.8	1.7	36	18	7.6	15	91	90	1.6	.040
01472109 - STONY RUN NEAR SPRING CITY, PA. (LAT 40 10 11 LONG 075 34 45)											
OCT 09...	7.1	14	3.2	48	24	19	17	145	130	4.6	.050
NOV 20...	--	--	--	44	--	21	--	146	--	4.3	.010
DEC 13...	7.0	12	3.0	42	24	22	--	156	--	4.5	.050
01472138 - FRENCH CREEK NEAR COVENTRYVILLE, PA. (LAT 40 10 14 LONG 075 41 50)											
OCT 10...	4.1	5.0	1.2	42	9.4	6.9	16	81	80	--	<.010
01472140 - SOUTH BRIDGE FRENCH CREEK AT COVENTRYVILLE, PA. (LAT 40 09 18 LONG 075 42 52)											
OCT 10...	5.5	7.6	1.9	48	16	12	19	121	110	--	<.010
01472154 - FRENCH CREEK NEAR PUGHTOWN, PA. (LAT 40 09 17 LONG 075 38 25)											
OCT 10...	4.6	7.4	1.5	42	14	9.4	16	92	93	--	<.010
014721612 - FRENCH CREEK AT RAILROAD BRIDGE AT PHOENIXVILLE, PA (LAT 40 08 10 LONG 075 30 41)											
OCT 10...	6.2	9.3	1.9	54	22	13	15	127	120	--	<.010
01472170 - PICKERING CREEK NEAR EAGLE, PA. (LAT 40 04 43 LONG 075 39 14)											
OCT 05...	6.8	8.8	1.8	42	15	24	20	137	120	--	<.010
01472174 - PICKERING CREEK NEAR CHESTER SPRINGS, PA. (LAT 40 05 22 LONG 075 37 50)											
OCT 05...	6.0	8.1	1.9	52	16	16	18	127	120	--	<.010
NOV 20...	--	--	--	52	--	16	--	122	--	--	<.010
DEC 13...	5.7	7.1	1.8	46	17	17	--	107	--	--	<.010
014721854 - PICKERING CREEK AT MERLIN, PA (LAT 40 06 25 LONG 075 35 34)											
OCT 05...	5.9	8.3	1.8	54	17	16	17	117	120	--	<.010
014721884 - PICKERING CREEK AT CHARLESTOWN RAILROAD BRIDGE. AT CHARLESTOWN, PA (LAT 40 05 57 LONG 075 33 20)											
OCT 09...	6.1	9.0	1.7	52	17	17	17	121	120	--	<.010
01472190 - PICKERING CREEK NEAR PHOENIXVILLE, PA. (LAT 40 06 33 LONG 075 31 42)											
OCT 22...	6.7	7.8	2.3	56	18	20	17	126	130	1.2	.040
01473167 - LITTLE VALLEY CREEK AT HOWELLVILLE, PA. (LAT 40 04 00 LONG 075 28 22)											
OCT 09...	18	25	2.1	174	34	41	7.6	297	290	--	<.010
NOV 21...	--	--	--	178	--	48	--	301	--	--	<.010
DEC 12...	19	25	2.0	172	35	48	--	303	--	2.4	.040

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

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WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	CADMIUM DIS- SOLVED (UG/L AS CD)
01472080 - PIGEON CREEK NEAR PARKER FORD, PA. (LAT 40 12 03 LONG 075 37 10)											
OCT 22...	1.6	.060	.64	.70	--	.030	.060	.070	20	--	--
01472109 - STONY RUN NEAR SPRING CITY, PA. (LAT 40 10 11 LONG 075 34 45)											
OCT 09...	4.6	.070	.33	.40	--	.140	.100	.100	<10	--	--
NOV 20...	4.3	<.010	--	--	--	--	--	.060	--	--	--
DEC 13...	4.5	<.010	--	--	--	--	--	.110	--	--	--
01472138 - FRENCH CREEK NEAR COVENTRYVILLE, PA. (LAT 40 10 14 LONG 075 41 50)											
OCT 10...	.77	.020	.28	.30	--	.040	.020	.020	10	--	--
01472140 - SOUTH BRIDGE FRENCH CREEK AT COVENTRYVILLE, PA. (LAT 40 09 18 LONG 075 42 52)											
OCT 10...	3.4	.040	.46	.50	--	.050	.030	.020	10	--	--
01472154 - FRENCH CREEK NEAR PUGHTOWN, PA. (LAT 40 09 17 LONG 075 38 25)											
OCT 10...	1.8	.040	.16	.20	--	.080	.080	.040	<10	--	--
014721612 - FRENCH CREEK AT RAILROAD BRIDGE AT PHOENIXVILLE, PA (LAT 40 08 10 LONG 075 30 41)											
OCT 10...	1.7	.020	.18	.20	--	.030	.020	.010	10	<1	<1
01472170 - PICKERING CREEK NEAR EAGLE, PA. (LAT 40 04 43 LONG 075 39 14)											
OCT 05...	2.8	.060	.14	.20	--	.030	<.010	.010	10	--	--
01472174 - PICKERING CREEK NEAR CHESTER SPRINGS, PA. (LAT 40 05 22 LONG 075 37 50)											
OCT 05...	2.8	.050	.15	.20	--	.020	.010	.010	10	--	--
NOV 20...	2.4	<.010	--	--	--	--	--	<.010	--	--	--
DEC 13...	2.5	<.010	--	--	--	--	--	<.010	--	--	--
014721854 - PICKERING CREEK AT MERLIN, PA (LAT 40 06 25 LONG 075 35 34)											
OCT 05...	1.9	.070	.53	.60	--	.030	<.010	.020	<10	--	--
014721884 - PICKERING CREEK AT CHARLESTOWN RAILROAD BRIDGE AT CHARLESTOWN, PA (LAT 40 05 57 LONG 075 33 20)											
OCT 09...	1.9	.080	.22	.30	--	.020	.010	.020	20	--	--
01472190 - PICKERING CREEK NEAR PHOENIXVILLE, PA. (LAT 40 06 33 LONG 075 31 42)											
OCT 22...	1.2	.070	.13	.20	--	<.010	.040	.010	20	--	--
01473167 - LITTLE VALLEY CREEK AT HOWELLVILLE, PA. (LAT 40 04 00 LONG 075 28 22)											
OCT 09...	2.7	.030	.27	.30	--	.050	.020	.020	10	<1	<1
NOV 21...	2.8	<.010	--	--	--	--	--	.010	--	--	--
DEC 12...	2.4	.020	--	--	--	--	--	.010	--	--	--

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	CHROMIUM, DIS-SOLVED (UG/L AS CR)	COPPER, DIS-SOLVED (UG/L AS CU)	IRON, DIS-SOLVED (UG/L AS FE)	LEAD, DIS-SOLVED (UG/L AS PB)	LITHIUM DIS-SOLVED (UG/L AS LI)	MANGANESE, DIS-SOLVED (UG/L AS MN)	MERCURY DIS-SOLVED (UG/L AS HG)	NICKEL, DIS-SOLVED (UG/L AS NI)	SILVER, DIS-SOLVED (UG/L AS AG)	ZINC, DIS-SOLVED (UG/L AS ZN)	METHYLENE BLUE ACTIVE SUBSTANCE (MG/L)
	01472080 - PIGEON CREEK NEAR PARKER FORD, PA. (LAT 40 12 03 LONG 075 37 10)										
OCT 22...	--	--	51	--	--	12	--	--	--	--	--
	01472109 - STONY RUN NEAR SPRING CITY, PA. (LAT 40 10 11 LONG 075 34 45)										
OCT 09...	--	--	35	--	--	44	--	--	--	--	--
NOV 20...	--	--	--	--	--	--	--	--	--	--	--
DEC 13...	--	--	47	--	--	56	--	--	--	--	.05
	01472138 - FRENCH CREEK NEAR COVENTRYVILLE, PA. (LAT 40 10 14 LONG 075 41 50)										
OCT 10...	--	--	130	--	--	16	--	--	--	--	--
	01472140 - SOUTH BRIDGE FRENCH CREEK AT COVENTRYVILLE, PA. (LAT 40 09 18 LONG 075 42 52)										
OCT 10...	--	--	69	--	--	11	--	--	--	--	--
	01472154 - FRENCH CREEK NEAR PUGHTOWN, PA. (LAT 40 09 17 LONG 075 38 25)										
OCT 10...	--	--	61	--	--	8	--	--	--	--	--
	014721612 - FRENCH CREEK AT RAILROAD BRIDGE AT PHOENIXVILLE, PA (LAT 40 08 10 LONG 075 30 41)										
OCT 10...	<1	3	100	5	--	39	<.1	2	<1	<3	--
	01472170 - PICKERING CREEK NEAR EAGLE, PA. (LAT 40 04 43 LONG 075 39 14)										
OCT 05...	--	--	93	--	--	35	--	--	--	--	--
	01472174 - PICKERING CREEK NEAR CHESTER SPRINGS, PA. (LAT 40 05 22 LONG 075 37 50)										
OCT 05...	--	--	67	--	--	33	--	--	--	--	--
NOV 20...	--	--	--	--	--	--	--	--	--	--	--
DEC 13...	--	--	80	--	--	44	--	--	--	--	.03
	014721854 - PICKERING CREEK AT MERLIN, PA (LAT 40 06 25 LONG 075 35 34)										
OCT 05...	--	--	59	--	--	18	--	--	--	--	--
	014721884 - PICKERING CREEK AT CHARLESTOWN RAILROAD BRIDGE AT CHARLESTOWN, PA (LAT 40 05 57 LONG 075 33 20)										
OCT 09...	--	--	59	--	--	16	--	--	--	--	--
	01472190 - PICKERING CREEK NEAR PHOENIXVILLE, PA. (LAT 40 06 33 LONG 075 31 42)										
OCT 22...	--	--	48	--	--	3	--	--	--	--	--
	01473167 - LITTLE VALLEY CREEK AT HOWELLVILLE, PA. (LAT 40 04 00 LONG 075 28 22)										
OCT 09...	<1	1	9	4	9	7	<.1	1	<1	<3	--
NOV 21...	--	--	--	--	--	--	--	--	--	--	--
DEC 12...	--	--	11	--	--	10	--	--	--	--	.04

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

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WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CaCO3)	HARD- NESS, NONCAR- BONATE (MG/L AS CaCO3)	CALCIUM DIS- SOLVED (MG/L AS Ca)
01473168 - VALLEY CREEK NEAR VALLEY FORGE, PA. (LAT 40 04 11 LONG 075 28 25)											
OCT 09...	1630	17	535	9.2	19.5	14.0	.70	11.1	240	25	46
01475840 - CRUM CREEK AT WHITEHORSE, PA. (LAT 39 59 54 LONG 075 27 38)											
OCT 25...	1000	6.3	150	7.7	15.0	12.0	.50	10.2	68	12	14
01476430 - RIDLEY CREEK AT GOSHENVILLE, PA. (LAT 39 59 28 LONG 075 32 40)											
OCT 25...	1400	2.7	199	7.5	21.5	14.0	.50	8.8	72	24	15
01476435 - RIDLEY CREEK AT DUTTON MILL NEAR WEST CHESTER, PA. (LAT 39 58 52 LONG 075 31 02)											
OCT 15...	1330	8.7	185	8.4	20.0	13.0	.70	12.7	64	20	13
01476790 - EAST BRANCH CHESTER CREEK AT GREEN HILL, PA. (LAT 39 59 49 LONG 075 35 40)											
OCT 11...	0900	1.1	215	7.1	16.5	11.5	.60	10.2	63	39	13
01476830 - EAST BRANCH CHESTER CREEK AT MILLTOWN, PA. (LAT 39 58 21 LONG 075 32 57)											
OCT 11...	1100	3.7	268	7.9	17.5	15.0	.60	11.1	100	31	23
01476835 - EAST BRANCH CHESTER CREEK AT WESTTOWN SCHOOL, PA. (LAT 39 56 26 LONG 075 32 30)											
OCT 11...	1400	6.0	280	7.8	20.5	16.0	.90	10.0	99	35	23
01476848 - EAST BRANCH CHESTER CREEK BELOW GOOSE CREEK NEAR WEST CHESTER, PA (LAT 39 55 45 LONG 075 32 00)											
OCT 11...	1530	21	625	8.0	20.0	18.0	.90	11.4	120	18	30
01478120 - EAST BRANCH WHITE CLAY CREEK AT AVONDALE, PA. (LAT 39 49 42 LONG 075 46 52)											
OCT 19...	1430	9.9	298	8.3	25.0	14.5	.70	11.9	130	42	32
01478190 - EAST BRANCH WHITE CLAY CREEK AT WICKERTON, PA. (LAT 39 47 44 LONG 075 49 27)											
OCT 18...	1530	6.8	195	7.6	22.5	15.0	.90	9.9	70	33	16
01478220 - WEST BRANCH WHITE CLAY CREEK NEAR CHESTERVILLE, PA. (LAT 39 45 56 LONG 075 47 47)											
OCT 18...	1400	5.4	150	7.6	22.5	15.0	.50	10.4	49	17	12
01479680 - WEST BRANCH RED CLAY CREEK AT KENNETT SQUARE, PA (LAT 39 50 13 LONG 075 43 33)											
OCT 19...	0830	8.5	270	7.7	14.5	12.5	1.0	10.1	120	37	28
01479800 - EAST BRANCH RED CLAY CREEK NEAR FIVE POINT, PA. (LAT 39 49 11 LONG 075 41 29)											
OCT 19...	1030	6.7	275	8.3	24.0	14.5	.50	14.1	110	45	28
01480434 - WEST BRANCH BRANDYWINE CREEK AT ROCK RUN, PA (LAT 39 59 36 LONG 075 49 41)											
OCT 30...	1430	38	200	7.5	19.0	15.5	4.1	9.8	70	28	17

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)
01473168 - VALLEY CREEK NEAR VALLEY FORGE, PA. (LAT 40 04 11 LONG 075 28 25)											
OCT 09...	30	29	3.0	214	31	42	7.7	311	320	2.2	.030
01475840 - CRUM CREEK AT WHITEHORSE, PA. (LAT 39 59 54 LONG 075 27 38)											
OCT 25...	8.0	7.5	2.2	56	12	11	16	109	100	--	<.010
01476430 - RIDLEY CREEK AT GOSHENVILLE, PA. (LAT 39 59 28 LONG 075 32 40)											
OCT 25...	8.3	11	2.2	48	17	18	11	128	110	--	<.010
01476435 - RIDLEY CREEK AT DUTTON MILL NEAR WEST CHESTER, PA. (LAT 39 58 52 LONG 075 31 02)											
OCT 15...	7.6	9.2	1.5	44	15	17	12	115	100	2.6	.030
01476790 - EAST BRANCH CHESTER CREEK AT GREEN HILL, PA. (LAT 39 59 49 LONG 075 35 40)											
OCT 11...	7.5	15	1.2	24	13	31	7.5	128	100	--	<.010
01476830 - EAST BRANCH CHESTER CREEK AT MILLTOWN, PA. (LAT 39 58 21 LONG 075 32 57)											
OCT 11...	11	11	2.9	72	21	24	14	156	150	2.6	.020
01476835 - EAST BRANCH CHESTER CREEK AT WESTTOWN SCHOOL, PA. (LAT 39 56 26 LONG 075 32 30)											
OCT 11...	10	13	3.2	64	24	25	14	165	150	2.9	.010
01476848 - EAST BRANCH CHESTER CREEK BELOW GOOSE CREEK NEAR WEST CHESTER, PA (LAT 39 55 45 LONG 075 32 00)											
OCT 11...	12	76	9.0	106	75	74	19	392	370	5.8	.530
01478120 - EAST BRANCH WHITE CLAY CREEK AT AVONDALE, PA. (LAT 39 49 42 LONG 075 46 52)											
OCT 19...	13	6.9	2.6	92	26	16	14	201	170	4.7	.040
01478190 - EAST BRANCH WHITE CLAY CREEK AT WICKERTON, PA. (LAT 39 47 44 LONG 075 49 27)											
OCT 18...	7.4	7.4	3.0	38	15	15	13	131	100	5.0	.080
01478220 - WEST BRANCH WHITE CLAY CREEK NEAR CHESTERVILLE, PA. (LAT 39 45 56 LONG 075 47 47)											
OCT 18...	4.6	6.7	2.9	32	14	12	12	99	84	3.6	.040
01479680 - WEST BRANCH RED CLAY CREEK AT KENNETT SQUARE, PA (LAT 39 50 13 LONG 075 43 33)											
OCT 19...	12	7.4	3.0	82	14	12	15	170	140	4.6	.050
01479800 - EAST BRANCH RED CLAY CREEK NEAR FIVE POINT, PA. (LAT 39 49 11 LONG 075 41 29)											
OCT 19...	10	9.2	3.8	66	34	19	15	168	160	3.9	.050
01480434 - WEST BRANCH BRANDYWINE CREEK AT ROCK RUN, PA (LAT 39 59 36 LONG 075 49 41)											
OCT 30...	6.7	6.6	7.4	42	20	13	13	137	110	--	<.010

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

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WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, DIS- TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	CADMIUM DIS- SOLVED (UG/L AS CD)
01473168 - VALLEY CREEK NEAR VALLEY FORGE, PA. (LAT 40 04 11 LONG 075 28 25)											
OCT 09...	2.2	.050	.25	.30	--	.020	.010	.020	10	<1	<1
01475840 - CRUM CREEK AT WHITEHORSE, PA. (LAT 39 59 54 LONG 075 27 38)											
OCT 25...	.86	.020	.18	.20	--	<.010	<.010	<.010	20	--	--
01476430 - RIDLEY CREEK AT GOSHENVILLE, PA. (LAT 39 59 28 LONG 075 32 40)											
OCT 25...	1.7	.050	.35	.40	--	.080	.050	.050	20	--	--
01476435 - RIDLEY CREEK AT DUTTON MILL NEAR WEST CHESTER, PA. (LAT 39 58 52 LONG 075 31 02)											
OCT 15...	2.6	.070	.23	.30	--	.030	.030	.030	20	--	--
01476790 - EAST BRANCH CHESTER CREEK AT GREEN HILL, PA. (LAT 39 59 49 LONG 075 35 40)											
OCT 11...	5.0	.030	.17	.20	--	.020	.020	.010	<10	--	--
01476830 - EAST BRANCH CHESTER CREEK AT MILLTOWN, PA. (LAT 39 58 21 LONG 075 32 57)											
OCT 11...	2.6	.020	.28	.30	--	.020	.020	.010	10	--	--
01476835 - EAST BRANCH CHESTER CREEK AT WESTTOWN SCHOOL, PA. (LAT 39 56 26 LONG 075 32 30)											
OCT 11...	2.9	.080	.22	.30	--	.390	.370	.360	10	<1	<1
01476848 - EAST BRANCH CHESTER CREEK BELOW GOOSE CREEK NEAR WEST CHESTER, PA (LAT 39 55 45 LONG 075 32 00)											
OCT 11...	6.3	.810	.79	1.6	--	2.00	1.70	1.80	10	<1	<1
01478120 - EAST BRANCH WHITE CLAY CREEK AT AVONDALE, PA. (LAT 39 49 42 LONG 075 46 52)											
OCT 19...	4.7	.040	.36	.40	--	.010	.020	.020	20	--	--
01478190 - EAST BRANCH WHITE CLAY CREEK AT WICKERTON, PA. (LAT 39 47 44 LONG 075 49 27)											
OCT 18...	5.1	.060	.74	.80	--	.190	.190	.190	10	--	--
01478220 - WEST BRANCH WHITE CLAY CREEK NEAR CHESTERVILLE, PA. (LAT 39 45 56 LONG 075 47 47)											
OCT 18...	3.6	.060	.34	.40	--	<.010	.010	.020	20	--	--
01479680 - WEST BRANCH RED CLAY CREEK AT KENNETT SQUARE, PA (LAT 39 50 13 LONG 075 43 33)											
OCT 19...	4.6	.050	.35	.40	--	.030	.030	.030	20	<1	<1
01479800 - EAST BRANCH RED CLAY CREEK NEAR FIVE POINT, PA. (LAT 39 49 11 LONG 075 41 29)											
OCT 19...	3.9	.040	.66	.70	--	.050	.060	.060	20	<1	<1
01480434 - WEST BRANCH BRANDYWINE CREEK AT ROCK RUN, PA (LAT 39 59 36 LONG 075 49 41)											
OCT 30...	1.7	.030	.77	.80	--	.150	.070	.090	90	--	--

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	CHROMIUM, DIS- SOLVED (UG/L AS CR)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGANESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	NICKEL, DIS- SOLVED (UG/L AS NI)	SILVER, DIS- SOLVED (UG/L AS AG)	ZINC, DIS- SOLVED (UG/L AS ZN)	METHYLENE BLUE ACTIVE SUB- STANCE (MG/L)
	01473168 - VALLEY CREEK NEAR VALLEY FORGE, PA. (LAT 40 04 11 LONG 075 28 25)										
OCT 09...	2	1	7	1	100	9	<.1	1	<1	<3	--
	01475840 - CRUM CREEK AT WHITEHORSE, PA. (LAT 39 59 54 LONG 075 27 38)										
OCT 25...	--	--	120	--	--	9	--	--	--	--	--
	01476430 - RIDLEY CREEK AT GOSHENVILLE, PA. (LAT 39 59 28 LONG 075 32 40)										
OCT 25...	--	--	100	--	--	19	--	--	--	--	--
	01476435 - RIDLEY CREEK AT DUTTON MILL NEAR WEST CHESTER, PA. (LAT 39 58 52 LONG 075 31 02)										
OCT 15...	--	--	79	--	--	19	--	--	--	--	--
	01476790 - EAST BRANCH CHESTER CREEK AT GREEN HILL, PA. (LAT 39 59 49 LONG 075 35 40)										
OCT 11...	--	--	13	--	--	10	--	--	--	--	--
	01476830 - EAST BRANCH CHESTER CREEK AT MILLTOWN, PA. (LAT 39 58 21 LONG 075 32 57)										
OCT 11...	--	--	57	--	--	24	--	--	--	--	--
	01476835 - EAST BRANCH CHESTER CREEK AT WESTTOWN SCHOOL, PA. (LAT 39 56 26 LONG 075 32 30)										
OCT 11...	<1	<1	55	2	--	29	<.1	3	<1	<3	--
	01476848 - EAST BRANCH CHESTER CREEK BELOW GOOSE CREEK NEAR WEST CHESTER, PA (LAT 39 55 45 LONG 075 32 00)										
OCT 11...	<1	4	68	1	--	54	.6	1	<1	9	--
	01478120 - EAST BRANCH WHITE CLAY CREEK AT AVONDALE, PA. (LAT 39 49 42 LONG 075 46 52)										
OCT 19...	--	--	19	--	--	12	--	--	--	--	--
	01478190 - EAST BRANCH WHITE CLAY CREEK AT WICKERTON, PA. (LAT 39 47 44 LONG 075 49 27)										
OCT 18...	--	--	48	--	--	20	--	--	--	--	--
	01478220 - WEST BRANCH WHITE CLAY CREEK NEAR CHESTERVILLE, PA. (LAT 39 45 56 LONG 075 47 47)										
OCT 18...	--	--	39	--	--	11	--	--	--	--	--
	01479680 - WEST BRANCH RED CLAY CREEK AT KENNETT SQUARE, PA (LAT 39 50 13 LONG 075 43 33)										
OCT 19...	2	1	51	2	--	40	<.1	2	<1	6	--
	01479800 - EAST BRANCH RED CLAY CREEK NEAR FIVE POINT, PA. (LAT 39 49 11 LONG 075 41 29)										
OCT 19...	<1	1	36	<1	--	17	<.1	1	<1	<3	--
	01480434 - WEST BRANCH BRANDYWINE CREEK AT ROCK RUN, PA (LAT 39 59 36 LONG 075 49 41)										
OCT 30...	--	--	230	--	--	24	--	--	--	--	--

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS
WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

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DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	TUR- BID- ITY (NTU)	OXYGEN, DIS- SOLVED (MG/L)	HARD- NESS (MG/L AS CACO3)	HARD- NESS, NONCAR- BONATE (MG/L AS CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)
01480629 - BUCK RUN AT DOE RUN, PA. (LAT 39 55 46 LONG 075 49 24)											
OCT 31...	0900	18	220	7.3	17.0	14.0	1.1	10.5	80	34	20
01480632 - DOE RUN AT SPRINGDELL, PA. (LAT 39 54 25 LONG 075 49 42)											
OCT 31...	1100	10	135	7.5	22.5	14.0	.90	11.2	51	23	12
01480640 - WEST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 34 LONG 075 39 47)											
OCT 16...	1130	100	225	8.2	20.5	13.0	.40	11.4	84	32	21
01480648 - EAST BRANCH BRANDYWINE CREEK NEAR CUPOLA, PA. (LAT 40 05 41 LONG 075 51 14)											
OCT 17...	1000	2.9	185	7.5	17.0	12.5	.80	10.2	70	22	18
01480653 - EAST BRANCH BRANDYWINE CREEK AT GLENMOORE, PA. (LAT 40 05 48 LONG 075 46 44)											
OCT 17...	1330	9.1	178	7.8	18.5	12.5	.70	11.6	68	20	18
01480656 - INDIAN RUN NEAR SPRINGTON, PA. (LAT 40 04 33 LONG 075 46 52)											
OCT 17...	1600	2.7	170	7.6	17.5	12.0	.50	9.9	63	13	18
01480903 - VALLY CREEK AT MULLSTEINS MEADOWS NEAR DOWNINGTOWN, PA. (LAT 39 59 00 LONG 075 39 55)											
OCT 16...	1500	11	370	8.7	18.5	14.0	.40	12.8	150	48	33
01480950 - EAST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 35 LONG 075 38 54)											
OCT 16...	0930	68	290	7.8	15.0	13.0	1.3	12.4	110	24	26
01481030 - BRANDYWINE CREEK NEAR CHADDS FORD, PA (LAT 39 51 15 LONG 075 35 58)											
OCT 15...	1600	165	230	8.4	21.0	14.0	.60	12.4	89	27	22
01494900 - EAST BRANCH ELK CREEK AT ELKVIEW, PA (LAT 39 48 45 LONG 075 54 04)											
OCT 18...	0830	7.4	148	7.3	18.0	13.0	.90	9.9	49	21	11
01494950 - WEST BRANCH BIG ELK CREEK NEAR OXFORD, PA (LAT 39 46 45 LONG 075 55 27)											
OCT 18...	1030	7.0	155	7.6	21.0	14.0	.80	11.8	46	20	10

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)
	01480629 - BUCK RUN AT DOE RUN, PA. (LAT 39 55 46 LONG 075 49 24)										
OCT 31...	7.2	9.1	3.0	46	17	15	8.4	126	110	--	<.010
	01480632 - DOE RUN AT SPRINGDELL, PA. (LAT 39 54 25 LONG 075 49 42)										
OCT 31...	5.0	5.3	2.0	28	9.3	8.7	9.2	82	68	--	<.010
	01480640 - WEST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 34 LONG 075 39 47)										
OCT 16...	7.6	9.6	2.6	52	20	18	8.3	135	120	3.6	.050
	01480648 - EAST BRANCH BRANDYWINE CREEK NEAR CUPOLA, PA. (LAT 40 05 41 LONG 075 51 14)										
OCT 17...	6.0	6.4	2.8	48	16	11	15	130	100	3.4	.060
	01480653 - EAST BRANCH BRANDYWINE CREEK AT GLENMOORE, PA. (LAT 40 05 48 LONG 075 46 44)										
OCT 17...	5.5	6.8	2.2	48	14	12	17	132	100	3.7	.040
	01480656 - INDIAN RUN NEAR SPRINGTON, PA. (LAT 40 04 33 LONG 075 46 52)										
OCT 17...	4.4	8.4	1.3	50	8.2	11	25	120	110	3.4	.040
	01480903 - VALLEY CREEK AT MULLSTEINS MEADOWS NEAR DOWNINGTOWN, PA. (LAT 39 59 00 LONG 075 39 55)										
OCT 16...	16	9.7	2.1	100	42	19	4.5	196	190	3.0	.040
	01480950 - EAST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 35 LONG 075 38 54)										
OCT 16...	10	16	2.7	82	25	22	9.0	175	160	2.9	.090
	01481030 - BRANDYWINE CREEK NEAR CHADDS FORD, PA (LAT 39 51 15 LONG 075 35 58)										
OCT 15...	8.2	11	2.6	62	22	18	8.8	143	130	2.8	.040
	01494900 - EAST BRANCH BIG ELK CREEK AT ELKVIEW, PA (LAT 39 48 45 LONG 075 54 04)										
OC 18...	0830	7.4	148	7.3	18.0	13.0	.90	9.9	49	21	11
	01494950 - WEST BRANCH BIG ELK CREEK NEAR OXFORD, PA (LAT 39 46 45 LONG 075 55 27)										
OCT 18...	1030	7.0	155	7.6	21.0	14.0	.80	11.8	46	20	10

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

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WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, DIS- SOLVED TOTAL (MG/L AS P)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	CADMIUM DIS- SOLVED (UG/L AS CD)
01480629 - BUCK RUN AT DOE RUN, PA. (LAT 39 55 46 LONG 075 49 24)											
OCT 31...	3.9	.020	.28	.30	--	.080	.070	.060	20	--	--
01480632 - DOE RUN AT SPRINGDELL, PA. (LAT 39 54 25 LONG 075 49 42)											
OCT 31...	3.4	.040	.26	.30	--	<.010	<.010	<.010	10	--	--
01480640 - WEST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 34 LONG 075 39 47)											
OCT 16...	3.6	.070	.33	.40	--	.130	.130	.130	30	<1	<1
01480648 - EAST BRANCH BRANDYWINE CREEK NEAR CUPOLA, PA. (LAT 40 05 41 LONG 075 51 14)											
OCT 17...	3.5	.130	.47	.60	--	.050	.040	.040	20	--	--
01480653 - EAST BRANCH BRANDYWINE CREEK AT GLENMOORE, PA. (LAT 40 05 48 LONG 075 46 44)											
OCT 17...	3.7	.090	.41	.50	--	.030	.030	.030	30	--	--
01480656 - INDIAN RUN NEAR SPRINGTON, PA. (LAT 40 04 33 LONG 075 46 52)											
OCT 17...	3.4	.100	.20	.30	--	.140	.160	.150	20	--	--
01480903 - VALLEY CREEK AT MULLSTEINS MEADOWS NEAR DOWNINGTOWN, PA. (LAT 39 59 00 LONG 075 39 55)											
OCT 16...	3.0	.050	.35	.40	--	.060	.070	.060	20	--	--
01480950 - EAST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 35 LONG 075 38 54)											
OCT 16...	3.0	.070	.23	.30	--	.710	.670	.700	20	<1	<1
01481030 - BRANDYWINE CREEK NEAR CHADDS FORD, PA (LAT 39 51 15 LONG 075 35 58)											
OCT 15...	2.8	.070	.43	.50	--	.250	.250	.260	20	--	--
01494900 - EAST BRANCH BIG ELK CREEK AT ELKVIEW, PA (LAT 39 48 45 LONG 075 54 04)											
OCT 18...	5.4	.120	.28	.40	--	.090	.090	.100	20	<1	<1
01494950 - WEST BRANCH BIG ELK CREEK NEAR OXFORD, PA (LAT 39 46 45 LONG 075 55 27)											
OCT 18...	5.3	.080	.22	.30	--	.100	.080	.110	20	<1	<1

ANALYSES OF SAMPLES COLLECTED AT WATER-QUALITY PARTIAL-RECORD STATIONS

WATER QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DATE	CHROMIUM, DIS-SOLVED (UG/L AS CR)	COPPER, DIS-SOLVED (UG/L AS CU)	IRON, DIS-SOLVED (UG/L AS FE)	LEAD, DIS-SOLVED (UG/L AS PB)	LITHIUM DIS-SOLVED (UG/L AS LI)	MANGANESE, DIS-SOLVED (UG/L AS MN)	MERCURY DIS-SOLVED (UG/L AS HG)	NICKEL, DIS-SOLVED (UG/L AS NI)	SILVER, DIS-SOLVED (UG/L AS AG)	ZINC, DIS-SOLVED (UG/L AS ZN)	METHYLENE BLUE ACTIVE SUBSTANCE (MG/L)
	01480629 - BUCK RUN AT DOE RUN, PA. (LAT 39 55 46 LONG 075 49 24)										
OCT 31...	--	--	71	--	--	27	--	--	--	--	--
	01480632 - DOE RUN AT SPRINGDELL, PA. (LAT 39 54 25 LONG 075 49 42)										
OCT 31...	--	--	35	--	--	11	--	--	--	--	--
	01480640 - WEST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 34 LONG 075 39 47)										
OCT 16...	2	1	46	3	--	18	<.1	3	<1	6	--
	01480648 - EAST BRANCH BRANDYWINE CREEK NEAR CUPOLA, PA. (LAT 40 05 41 LONG 075 51 14)										
OCT 17...	--	--	120	--	--	33	--	--	--	--	--
	01480653 - EAST BRANCH BRANDYWINE CREEK AT GLENMOORE, PA. (LAT 40 05 48 LONG 075 46 44)										
OCT 17...	--	--	69	--	--	16	--	--	--	--	--
	01480656 - INDIAN RUN NEAR SPRINGTON, PA. (LAT 40 04 33 LONG 075 46 52)										
OCT 17...	--	--	31	--	--	5	--	--	--	--	--
	01480903 - VALLEY CREEK AT MULLSTEINS MEADOWS NEAR DOWNINGTOWN, PA. (LAT 39 59 00 LONG 075 39 55)										
OCT 16...	--	--	13	--	21	4	--	--	--	--	--
	01480950 - EAST BRANCH BRANDYWINE CREEK AT WAWASET, PA. (LAT 39 55 35 LONG 075 38 54)										
OCT 16...	1	1	41	1	--	21	<.1	2	<1	<3	--
	01481030 - BRANDYWINE CREEK NEAR CHADDS FORD, PA (LAT 39 51 15 LONG 075 35 58)										
OCT 15...	--	--	50	--	--	18	--	--	--	--	--
	01494900 - EAST BRANCH BIG ELK CREEK AT ELKVIEW, PA (LAT 39 48 45 LONG 075 54 04)										
OCT 18...	<1	2	44	<1	--	11	<.1	<1	<1	6	--
	01494950 - WEST BRANCH BIG ELK CREEK NEAR OXFORD, PA (LAT 39 46 45 LONG 075 55 27)										
OCT 18...	1	<1	35	1	--	17	<.1	1	<1	<3	--

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES

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Samples collected at sites other than gaging stations and partial-record stations to give better areal coverage in river basin. Such sites are referred to as miscellaneous sites.

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DELAWARE RIVER BASIN

DATE	TIME	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER ATURE (DEG C)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LILITY FIELD (MG/L AS CACO3)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SULFATE DIS- SOLVED (MG/L AS SO4)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)	
400423074545301 - DELAWARE RIVER AT NESHAMINY PARK (LAT 40 04 23 LONG 074 54 53)													
OCT 25...	1320	255	7.0	20.0	21	8.0	15	2.2	62	20	30	.10	
		SILICA, DIS- SOLVED (MG/L AS SI02)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	IRON DIS- SOLVED (UG/L AS FE)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	CARBON, ORGANIC DIS- SOLVED (MG/L AS C)
OCT 25...		1.6	1.6	.070	1.7	.230	.07	.30	.130	.100	100	190	2.5

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN

DATE	TIME	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	ALKA- LITY FIELD AS CACO3)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)
401857076110500 - FURNACE CREEK SW SAM(2) (LAT 40 18 57 LONG 076 11 05)										
OCT 11...	1400	112	6.7	14.5	12	4.4	3.7	1.3	26	<.010
DATE	PHOS- PHORUS, DIS- SOLVED (MG/L AS P)	ARSENIC DIS- SOLVED (UG/L AS AS)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	ZINC, DIS- SOLVED (UG/L AS ZN)
OCT 11...	<.010	<1	1	<1	2	20	<1	<10	<.1	<10

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

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WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN--Continued

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	ALKA- LINITY FIELD (MG/L AS CACO3)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	LITHIUM DIS- SOLVED (UG/L AS LI)	BORON, DIS- SOLVED (UG/L AS B)
400130075344501 - VALLEY CREEK TRIBUTARY AT GLENCCH (LAT 40 01 30 LONG 075 34 45)									
OCT 11...	0835	.20	350	7.8	13.0	120	218	<10	<20
400233075334701 - VALLEY CREEK TRIBUTARY AT CHESTER VALLEY GOLF COURSE (LAT 40 02 33 LONG 075 34 45)									
OCT 11...	1710	.70	445	8.1	17.0	148	249	10	30
400235075343001 - VALLEY CREEK NEAR SWEDES FORD ROAD (LAT 40 02 35 LONG 075 34 30)									
AUG 22...	1130	.60	475	8.1	16.0	146	322	--	--
OCT 11...	0910	.23	455	7.9	13.5	143	264	<10	20
400248075335101 - VALLEY CREEK TRIBUTARY AT CHURCH ROAD AND RAILROAD BRIDGE (LAT 40 02 48 LONG 075 33 51)									
OCT 11...	1020	.89	460	7.8	15.0	164	262	10	30
400300075333101 - VALLEY CREEK TRIBUTARY AT ROUTE 401 (LAT 40 03 00 LONG 075 33 31)									
OCT 11...	1355	.87	475	8.3	17.0	170	276	50	40
400307075335301 - VALLEY CREEK AT MOORES ROAD (LAT 40 03 07 LONG 075 33 53)									
MAR 13...	1120	.09	390	8.6	13.0	168	249	<10	40

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN--Continued

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	HARD- NESS (MG/L AS CACO3)	HARD- NESS, NONCAR- BONATE (MG/L CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)
400303075331701 - VALLEY CREEK AT MILL LANE (LAT 40 03 03 LONG 075 33 17)											
OCT 21...	0820	--	640	7.4	9.5	230	44	51	24	55	2.5
MAR 20...	1445	11	505	8.8	14.0	--	--	--	--	--	--
APR 26...	1100	12	510	8.0	14.0	--	--	--	--	--	--
MAY 22...	1145	8.5	495	8.0	17.0	--	--	--	--	--	--
JUN 12...	1300	7.9	510	8.1	18.0	--	--	--	--	--	--
JUL 17...	1130	6.9	495	7.9	17.5	--	--	--	--	--	--
AUG 22...	0930	3.9	530	7.5	14.5	--	--	--	--	--	--
SEP 18...	1135	2.4	575	7.5	13.0	--	--	--	--	--	--
OCT 11...	1820	2.9	605	7.5	14.0	--	--	--	--	--	--
NOV 21...	1135	2.1	560	7.8	8.5	--	--	--	--	--	--
DEC 12...	1335	2.7	630	7.7	9.0	--	--	--	--	--	--
MAR 13...	1315	2.4	610	8.6	13.0	--	--	--	--	--	--

DATE	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SiO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)
OCT 21...	182	46	78	8.1	410	390	2.8	.040	2.8	<.010
MAR 20...	138	--	--	--	--	--	--	--	--	--
APR 26...	144	--	--	--	322	--	--	--	--	--
MAY 22...	160	--	--	--	326	--	--	--	--	--
JUN 12...	142	--	--	--	305	--	--	--	--	--
JUL 17...	156	--	--	--	308	--	--	--	--	--
AUG 22...	174	--	--	--	324	--	--	--	--	--
SEP 18...	174	--	54	--	320	--	--	--	--	--
OCT 11...	178	--	--	--	323	--	--	--	--	--
NOV 21...	182	--	--	--	376	--	--	--	--	--
DEC 12...	196	--	65	--	367	--	--	--	--	--
MAR 13...	188	--	--	--	362	--	--	--	--	--

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN--Continued

DATE	NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BORON, DIS- SOLVED (UG/L AS B)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)
400303075331701 - VALLEY CREEK AT MILL LANE (LAT 40 03 03 LONG 075 33 17)										
OCT 21...	--	.30	3.1	.120	.110	<10	1	--	<1	20
MAR 20...	--	--	--	--	--	--	--	--	--	--
APR 26...	--	--	--	--	--	--	--	--	--	--
MAY 22...	--	--	--	--	--	--	--	--	--	--
JUN 12...	--	--	--	--	--	--	--	--	--	--
JUL 17...	--	--	--	--	--	--	--	--	--	--
AUG 22...	--	--	--	--	--	10	--	--	--	--
SEP 18...	--	--	--	--	--	--	--	90	--	--
OCT 11...	--	--	--	--	--	--	--	110	--	--
NOV 21...	--	--	--	--	--	--	--	130	--	--
DEC 12...	--	--	--	--	--	--	--	120	--	--
MAR 13...	--	--	--	--	--	--	--	120	--	--

DATE	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	NICKEL, DIS- SOLVED (UG/L AS NI)	SILVER, DIS- SOLVED (UG/L AS AG)	ZINC, DIS- SOLVED (UG/L AS ZN)	CYANIDE DIS- SOLVED (MG/L AS CN)
OCT 21...	1	10	1	830	27	<.1	2	<1	7	<.01
MAR 20...	--	--	--	380	--	--	--	--	--	<.01
APR 26...	--	--	--	330	--	--	--	--	--	--
MAY 22...	--	--	--	350	--	--	--	--	--	--
JUN 12...	--	--	--	360	--	--	--	--	--	--
JUL 17...	--	--	--	360	--	--	--	--	--	--
AUG 22...	--	--	--	500	--	--	--	--	--	--
SEP 18...	--	--	--	600	--	--	--	--	--	--
OCT 11...	--	--	--	720	--	--	--	--	--	--
NOV 21...	--	--	--	800	--	--	--	--	--	--
DEC 12...	--	--	--	760	--	--	--	--	--	--
MAR 13...	--	--	--	780	--	--	--	--	--	--

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1984

SCHUYLKILL RIVER BASIN--Continued

		STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	ALKA- LINITY FIELD (MG/L AS CAC03)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BARIUM, DIS- SOLVED (UG/L AS BA)	
400305075330501 - VALLEY CREEK AT ROUTE 401 (LAT 40 03 05 LONG 075 33 05)												
OCT 12...	1415	2.9	640	8.0	15.0	184	65	337	<10	<1	28	
400332075315001 - VALLEY CREEK WHITELAND PARK (LAT 40 03 32 LONG 075 31 50)												
OCT 12...	1530	4.9	770	7.4	15.0	241	89	424	<10	<1	49	
DATE		BORON, DIS- SOLVED (UG/L AS B)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	SILVER, DIS- SOLVED (UG/L AS AG)	ZINC, DIS- SOLVED (UG/L AS ZN)
400305075330501 - VALLEY CREEK AT ROUTE 401 (LAT 40 03 05 LONG 075 33 05)												
OCT 12...	110	<1	30		2	14	1	710	5	<.1	--	5
400332075315001 - VALLEY CREEK WHITELAND PARK (LAT 40 03 32 LONG 075 31 50)												
OCT 12...	130	<1	10		2	19	2	300	36	<.1	--	7

SCHUYLKILL RIVER BASIN--Continued

[illegible]

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN--Continued

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	HARD- NESS (MG/L AS CACO3)	HARD- NESS, NONCAR- BONATE (MG/L CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)
400344075310701 - VALLEY CREEK AT CHURCH ROAD (LAT 40 03 44 LONG 075 31 07)											
OCT 21...	0955	--	720	7.7	9.5	280	34	56	33	63	4.3
DATE		NITRO- GEN, ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN,AM- MONIA + ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, ORTHOPHOS- PHORUS, TOTAL (MG/L AS P)	PHOS- PHORUS, ORTHOPHOS- PHORUS, TOTAL (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BORON, DIS- SOLVED (UG/L AS B)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)
OCT 21...	.77	1.2	3.2	.120	.030	10	1	--	<1	1	
DATE		ALKA- LINITY FIELD DIS- SOLVED (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)
OCT 21...	242	39	89	8.0	453	450	1.9	.110	2.0	.430	
DATE		COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	NICKEL, DIS- SOLVED (UG/L AS NI)	SILVER, DIS- SOLVED (UG/L AS AG)	ZINC, DIS- SOLVED (UG/L AS ZN)	CYANIDE DIS- SOLVED (MG/L AS CN)
OCT 21...	1	10	2	250	17	<.1	2	<1	<3	<.01	

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

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WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

SCHUYLKILL RIVER BASIN--Continued

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	ALKA- LINITY FIELD (MG/L AS CACO3)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	LITHIUM DIS- SOLVED (UG/L AS LI)	BORON, DIS- SOLVED (UG/L AS B)
400354075310601 - VALLEY CREEK AT CHURCH RAILROAD BRIDGE (LAT 40 03 54 LONG 075 31 06)									
OCT 10...	1305	5.3	730	7.9	14.5	230	416	260	120

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DELAWARE RIVER BASIN

DATE	TIME	STREAM- FLOW, INSTAN- TANEOUS (CFS)	SPE- CIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE (DEG C)	HARD- NESS (MG/L AS CACO3)	HARD- NESS, NONCAR- BONATE (MG/L CACO3)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)
395708075325601 - EAST BRANCH CHESTER CREEK AT WESTTOWN ROAD (LAT 39 57 08 LONG 075 32 56)											
OCT 26...	0945	--	220	7.3	11.0	83	33	19	8.7	7.2	3.3
400056075333801 - RIDLEY CREEK TRIBUTARY NEAR HERSHEY MILL (LAT 40 00 56 LONG 075 33 38)											

OCT 27...	0905	--	205	6.7	9.0	60	37	13	6.7	12	2.3
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SCHUYLKILL RIVER BASIN

400257075312901 - LITTLE VALLEY CREEK AT STATE ROUTE 29 (LAT 40 03 57 LONG 075 31 29)

OCT 21...	0900	--	415	7.9	9.5	170	49	43	14	23	2.3
--------------	------	----	-----	-----	-----	-----	----	----	----	----	-----

DATE	NITRO- GEN, AM- ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN, AM- ORGANIC DIS- SOLVED (MG/L AS N)	NITRO- GEN DIS- SOLVED (MG/L AS N)	PHOS- PHORUS, ORTH- TOTAL (MG/L AS P)	PHOS- PHORUS, ORTH- TOTAL (MG/L AS P)	ALUM- INUM, DIS- SOLVED (UG/L AS AL)	ARSENIC DIS- SOLVED (UG/L AS AS)	BORON, DIS- SOLVED (UG/L AS B)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, DIS- SOLVED (UG/L AS CR)
395708075325601 - EAST BRANCH CHESTER CREEK AT WESTTOWN ROAD (LAT 39 57 08 LONG 075 32 56)										
OCT 26...	--	.50	2.1	.080	.040	10	1	--	<1	<1
400056075333801 - RIDLEY CREEK TRIBUTARY NEAR HERSHEY MILL (LAT 40 00 56 LONG 075 33 38)										
OCT 27...	--	.80	4.2	.380	.410	<10	--	--	--	--
400257075312901 - LITTLE VALLEY CREEK AT STATE ROUTE 29 (LAT 40 03 57 LONG 075 31 29)										
OCT 21...	--	.30	3.4	.110	.100	20	1	--	<1	<1

DATE	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	SOLIDS, SUM OF CONSTI- TUENTS, DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)	NITRO- GEN, AMMONIA DIS- SOLVED (MG/L AS N)
395708075325601 - EAST BRANCH CHESTER CREEK AT WESTTOWN ROAD (LAT 39 57 08 LONG 075 32 56)										
OCT 26...	50	22	16	13	132	120	--	<.010	1.6	<.010
400056075333801 - RIDLEY CREEK TRIBUTARY NEAR HERSHEY MILL (LAT 40 00 56 LONG 075 33 38)										
OCT 27...	23	20	21	6.4	118	97	--	<.010	3.4	<.010
400257075312901 - LITTLE VALLEY CREEK AT STATE ROUTE 29 (LAT 40 03 57 LONG 075 31 29)										
OCT 21...	116	27	44	7.7	254	240	3.1	.040	3.1	<.010

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

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WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DELAWARE RIVER BASIN--Continued

DATE	COPPER, DIS- SOLVED (UG/L AS CU)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	LITHIUM DIS- SOLVED (UG/L AS LI)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	MERCURY DIS- SOLVED (UG/L AS HG)	NICKEL, DIS- SOLVED (UG/L AS NI)	SILVER, DIS- SOLVED (UG/L AS AG)	ZINC, DIS- SOLVED (UG/L AS ZN)	CYANIDE DIS- SOLVED (MG/L AS CN)
395708075325601 - EAST BRANCH CHESTER CREEK AT WESTTOWN ROAD (LAT 39 57 08 LONG 075 32 56)										
OCT 26...	1	92	1	--	21	<.1	2	<1	12	--
400056075333801 - RIDLEY CREEK TRIBUTARY NEAR HERSHEY MILL (LAT 40 00 56 LONG 075 33 38)										
OCT 27...	--	37	--	--	15	--	--	--	--	--
SCHUYLKILL RIVER BASIN--Continued										
400257075312901 - LITTLE VALLEY CREEK AT STATE ROUTE 29 (LAT 40 03 57 LONG 075 31 29)										
OCT 21...	1	7	1	8	12	<.1	2	<1	8	<.01

ANALYSES OF SAMPLES COLLECTED AT MISCELLANEOUS SITES--Continued

WATER-QUALITY DATA, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985

DELAWARE RIVER BASIN--Continued

DATE	TIME	SPECIFIC CON- DUC- TANCE (US/CM)	PH (STAND- ARD UNITS)	TEMPER- ATURE, AIR (DEG C)	TEMPER- ATURE (DEG C)	CALCIUM DIS- SOLVED (MG/L AS CA)	MAGNE- SIUM, DIS- SOLVED (MG/L AS MG)	SODIUM, DIS- SOLVED (MG/L AS NA)	POTAS- SIUM, DIS- SOLVED (MG/L AS K)	
01476950 - WEST BRANCH CHESTER CREEK NEAR CHESTER HEIGHTS, PA. (LAT 39 52 36 LONG 075 27 05)										
DEC 20...	1230	210	6.3	.0	1.0	15	6.3	9.2	2.0	
DATE	TIME	PHOS- PHORUS, ORTHO, DIS- SOLVED (MG/L AS P)	ARSENIC DIS- SOLVED (UG/L AS AS)	CADMIUM DIS- SOLVED (UG/L AS CD)	CHRO- MIUM, HEXA- VALENT, DIS. (UG/L AS CR)	IRON, DIS- SOLVED (UG/L AS FE)	LEAD, DIS- SOLVED (UG/L AS PB)	MANGA- NESE, DIS- SOLVED (UG/L AS MN)	NICKEL, DIS- SOLVED (UG/L AS NI)	PHENOLS TOTAL (UG/L)
01476950 - WEST BRANCH CHESTER CREEK NEAR CHESTER HEIGHTS, PA. (LAT 39 52 36 LONG 075 27 05)										
DEC 20...	.050	1	<1	<1	92	4	49	2	1	
DATE	TIME	ALKA- LINITY FIELD (MG/L AS CACO3)	SULFATE DIS- SOLVED (MG/L AS SO4)	CHLO- RIDE, DIS- SOLVED (MG/L AS CL)	FLUO- RIDE, DIS- SOLVED (MG/L AS F)	SILICA, DIS- SOLVED (MG/L AS SIO2)	SOLIDS, RESIDUE AT 180 DEG. C DIS- SOLVED (MG/L)	NITRO- GEN, NITRATE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NITRITE DIS- SOLVED (MG/L AS N)	NITRO- GEN, NO2+NO3 DIS- SOLVED (MG/L AS N)
01476950 - WEST BRANCH CHESTER CREEK NEAR CHESTER HEIGHTS, PA. (LAT 39 52 36 LONG 075 27 05)										
DEC 20...	26	21	20	<.10	16	130	2.7	.010	2.7	

BERKS COUNTY

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402615075530501. Local number, BE 623.

LOCATION.--Lat 40°26'15", long 75°53'05", Hydrologic Unit 02040203, at Wesner Road, Blandon.

Owner: Maiden Creek Township Water Authority.

AQUIFER.--Dolomite of Leithsville Formation of Early and Middle Cambrian age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 8 in, depth 385 ft, casing information not available.

DATUM.--Altitude of land-surface datum is 430 ft. Measuring point: Top of plywood shelf, 1.30 ft above land-surface datum. Prior to Apr. 30, 1981, top of casing, 1.30 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--January 1975 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 113.55 ft below land-surface datum, June 6, 1984; lowest, 140.82 ft below surface datum, Dec. 23, 1981.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	125.90	128.79	131.13	131.77	132.94	132.77	133.52	134.83	133.97	135.23	135.81	135.30
2	125.95	129.02	131.17	131.79	133.03	132.84	133.57	134.84	134.03	135.23	134.87	135.29
3	126.07	129.05	131.18	131.77	133.17	132.89	133.59	134.79	134.10	135.27	134.28	135.33
4	126.21	129.04	131.22	131.67	133.17	132.84	133.67	134.23	134.15	135.31	133.99	135.38
5	126.39	129.12	131.24	131.85	133.17	132.87	133.60	133.85	134.16	135.33	133.89	135.47
6	126.44	129.37	131.07	131.82	133.22	132.93	133.77	133.55	134.19	135.41	133.81	135.57
7	126.44	129.49	131.12	131.86	133.31	132.93	133.77	133.42	134.20	135.43	133.80	135.60
8	126.45	129.54	131.18	132.00	133.31	132.78	133.78	133.43	134.19	135.43	133.79	135.73
9	126.59	129.56	131.18	132.00	133.36	132.89	133.91	133.43	134.25	135.47	133.83	135.66
10	126.65	129.59	131.25	132.02	133.46	132.90	133.95	133.40	134.34	135.54	133.85	135.75
11	126.72	129.75	131.19	131.96	133.49	132.90	133.96	133.33	134.37	135.57	133.94	135.81
12	126.72	129.91	131.19	131.92	133.43	132.89	133.99	133.33	134.40	135.63	134.02	135.84
13	126.78	130.06	131.37	131.95	133.21	132.91	134.02	133.33	134.56	135.65	134.05	135.91
14	126.88	130.22	131.42	131.95	133.01	132.91	134.02	133.44	134.67	135.66	134.08	135.92
15	127.02	130.23	131.41	132.25	132.93	133.05	133.98	133.44	134.68	135.70	134.19	135.94
16	127.22	130.41	131.41	132.28	132.88	133.05	134.19	133.41	134.68	135.79	134.31	135.96
17	127.32	130.53	131.37	132.24	132.92	132.97	134.27	133.36	134.60	135.81	134.37	136.04
18	127.42	130.54	131.47	132.19	133.01	133.15	134.23	133.34	134.63	135.85	134.40	136.06
19	127.54	130.74	131.46	132.27	132.89	133.15	134.27	133.36	134.71	135.87	134.47	136.13
20	127.75	130.86	131.58	132.29	132.94	133.26	134.33	133.36	134.82	135.91	134.51	136.14
21	127.86	130.95	131.60	132.29	133.00	133.32	134.33	133.36	134.83	135.94	134.58	136.19
22	128.00	131.00	131.58	132.30	132.94	133.28	134.38	133.36	134.84	136.03	134.71	136.27
23	128.00	131.04	131.59	132.34	132.92	133.22	134.46	133.37	134.84	136.11	134.74	136.28
24	128.08	131.05	131.57	132.45	132.81	133.28	134.47	133.44	134.93	136.14	134.81	136.36
25	128.16	130.96	131.67	132.57	132.90	133.40	134.43	133.45	134.95	136.14	134.87	136.41
26	128.21	131.06	131.69	132.79	132.88	133.43	134.51	133.55	135.03	136.14	134.90	136.38
27	128.34	131.11	131.64	132.79	132.84	133.36	134.67	133.63	135.08	136.15	134.97	136.33
28	128.43	131.10	131.53	132.79	132.84	133.36	134.69	133.70	135.08	136.15	134.98	135.59
29	128.59	131.08	131.72	132.87	---	133.46	134.70	133.75	135.18	136.16	135.01	134.82
30	128.66	130.99	131.77	132.87	---	133.57	134.70	133.87	135.22	136.20	135.08	134.27
31	128.77	---	131.71	132.87	---	133.57	---	133.87	---	136.21	135.24	---
MEAN	127.22	130.14	131.35	132.17	133.02	133.04	134.08	133.60	134.56	135.73	134.39	135.73
MAX	128.77	131.11	131.77	132.87	133.49	133.57	134.70	134.84	135.22	136.21	135.81	136.41
MIN	125.80	128.72	130.84	131.51	132.67	132.58	133.39	133.33	133.84	135.21	133.76	134.04
WTR WY 1985	MEAN	132.91	HIGH	125.80	LOW	136.41						

BUCKS COUNTY

402643075150501. Local number, BK 929.

LOCATION.--Lat 40°26'43", long 75°15'05", Hydrologic Unit 02040105, at Nockamixon State Park.

Owner: U.S. Geological Survey.

AQUIFER.--Shale of Brunswick Formation of Late Triassic age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 116 ft, cased to 27 ft, open hole.

DATUM.--Altitude of land-surface datum is 490 ft. Measuring point: Top of plywood shelf, 1.30 ft above land-surface datum. Prior to Mar. 17, 1980, to top of casing, 1.05 ft above land-surface datum.

PERIOD OF RECORD.--November 1967 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 40.11 ft below land-surface datum, Apr. 15, 1980; lowest, 59.75 ft below land-surface datum, Nov. 26, 1968.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	45.57	46.76	45.67	43.78	43.89	43.07	42.72	43.48	43.32	44.98	46.27	47.66
2	45.62	46.54	45.78	43.78	44.02	42.97	42.81	43.60	43.43	44.86	46.45	47.61
3	45.62	46.56	45.66	43.80	44.45	43.18	42.81	43.43	43.52	44.74	46.50	47.56
4	45.86	46.40	45.72	43.46	44.48	43.17	42.96	43.49	43.69	44.85	46.49	47.46
5	46.11	45.93	45.76	43.36	44.43	42.89	42.84	43.38	43.66	44.95	46.55	47.50
6	46.25	46.13	45.10	43.40	44.03	43.33	42.95	43.09	43.77	44.96	46.52	47.58
7	46.22	46.28	45.28	43.21	44.20	43.35	43.11	42.99	43.85	45.03	46.52	47.73
8	46.10	46.32	45.19	43.29	44.20	42.96	43.04	43.16	43.66	45.06	46.42	47.77
9	46.07	46.13	45.26	43.55	44.43	42.87	43.21	43.24	43.57	45.01	46.51	47.69
10	46.17	45.84	45.08	43.55	44.52	42.92	43.32	43.07	43.78	45.10	46.56	47.74
11	46.18	45.55	44.76	43.23	44.58	42.93	43.22	42.90	43.83	45.32	46.55	48.00
12	46.12	45.51	44.72	43.03	44.36	42.51	43.34	42.87	43.63	45.41	46.72	48.13
13	46.02	45.54	44.78	42.95	44.00	42.64	43.37	42.75	43.94	45.50	46.76	48.25
14	45.98	45.77	44.95	42.80	44.09	42.72	43.29	42.92	44.11	45.50	46.76	48.32
15	46.13	45.77	44.88	43.21	44.09	42.96	43.06	42.98	44.19	45.41	46.76	48.26
16	46.35	45.52	44.84	43.43	44.00	43.01	42.81	42.78	44.08	45.57	46.87	48.15
17	46.40	45.63	44.52	43.22	44.03	42.65	43.17	42.38	44.04	45.72	46.97	48.25
18	46.37	45.63	44.49	42.85	44.17	42.92	43.17	42.50	43.92	45.78	46.99	48.40
19	46.31	45.70	44.48	42.94	43.94	42.98	42.96	42.84	44.07	45.78	46.93	48.41
20	46.44	45.86	44.48	43.09	43.87	42.89	43.12	42.90	44.30	45.72	47.00	48.32
21	46.48	45.96	44.54	43.14	43.96	43.10	43.12	42.86	44.45	45.74	47.07	48.40
22	46.55	45.98	44.30	43.17	43.77	43.10	43.06	42.94	44.53	45.76	47.14	48.54
23	46.69	45.81	44.46	43.21	43.58	42.86	43.20	42.95	44.48	46.07	47.21	48.53
24	46.72	45.63	44.33	43.22	43.26	42.68	43.24	42.91	44.45	46.22	47.23	48.46
25	46.75	45.72	44.57	43.15	43.40	43.04	43.03	42.84	44.52	46.23	47.25	48.62
26	46.69	45.79	44.57	43.73	43.38	43.14	43.09	42.96	44.51	46.05	47.31	48.57
27	46.59	45.82	44.50	43.74	43.18	42.97	43.23	42.97	44.61	46.15	47.38	48.41
28	46.53	45.67	44.13	43.69	43.25	42.65	43.36	43.07	44.60	46.28	47.42	48.60
29	46.49	45.42	43.69	43.94	---	42.72	43.47	43.33	44.73	46.29	47.39	48.59
30	46.58	45.46	44.04	44.04	---	43.04	43.48	43.41	44.91	46.25	47.30	48.33
31	46.67	---	44.04	44.01	---	43.08	---	43.27	---	46.25	47.51	---
MEAN	46.20	45.77	44.65	43.24	43.87	42.80	43.02	42.95	43.99	45.50	46.82	48.05
MAX	46.75	46.76	45.78	44.04	44.58	43.35	43.48	43.60	44.91	46.29	47.51	48.62
MIN	45.38	45.03	43.57	42.51	42.83	42.11	42.51	42.10	42.93	44.66	46.03	47.41
WTR YR 1985	MEAN	44.74	HIGH	42.10	LOW	48.62						

CARBON COUNTY

249

410123075425401. Local number, CB 104.

LOCATION.--Lat 41°01'23", long 75°42'54", Hydrologic Unit 02040106, at Hickory Run State Park.

Owner: U.S. Geological Survey.

AQUIFER.--Shale of Lower Member of Mauch Chunk Formation of Late Mississippian age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 125 ft, cased to 20 ft, open hole.

DATUM.--Altitude of land-surface datum is 1,305 ft. Measuring point: Top of plywood shelf, 3.12 ft above land-surface datum. Prior to May 28, 1980, top of casing, 3.00 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--September 1969 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 18.44 ft below land-surface datum, Apr. 17, 1983; lowest, 90.58 ft below land-surface datum, Jan. 31, 1981.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	---	---	84.26	---	62.86	38.39	49.16	54.72	54.87	---	65.19	68.59
2	---	---	84.26	---	63.29	38.64	49.14	55.18	55.46	---	63.52	68.95
3	---	---	84.27	---	63.80	39.14	48.44	55.25	56.10	---	62.09	69.26
4	---	---	84.27	---	64.15	39.35	47.69	52.42	56.64	---	61.02	69.62
5	---	---	84.27	---	64.24	40.25	47.05	47.48	57.07	---	60.34	69.94
6	---	---	84.14	---	64.75	41.12	46.56	44.07	57.08	---	59.91	70.32
7	---	81.57	84.11	---	65.15	41.50	46.56	42.16	56.84	---	59.63	70.66
8	---	81.68	83.99	---	65.52	42.07	46.48	41.27	56.27	---	59.54	70.96
9	---	81.80	83.92	---	66.00	42.81	46.56	40.91	55.98	---	59.65	71.28
10	---	81.93	---	---	66.37	43.47	46.63	40.64	55.98	56.44	59.82	71.62
11	---	82.05	---	---	66.64	43.81	46.52	40.83	56.01	57.12	60.10	71.95
12	---	82.18	---	---	66.66	44.27	46.62	41.20	56.21	57.75	60.42	72.28
13	---	82.32	---	---	66.46	44.31	46.70	41.68	56.60	58.28	60.73	72.60
14	---	82.43	---	---	63.15	43.87	46.74	42.36	57.00	58.66	61.09	72.69
15	---	82.53	---	---	59.59	43.25	46.84	42.86	57.35	59.08	61.45	73.16
16	---	82.67	---	---	56.36	42.95	47.21	43.34	57.46	59.59	61.93	73.44
17	---	82.79	---	---	53.64	42.52	47.63	43.86	57.18	60.02	62.36	73.73
18	---	82.86	---	---	51.59	42.85	47.80	44.75	53.94	60.44	62.75	74.00
19	---	83.04	---	---	49.87	43.05	48.35	45.57	51.09	60.81	63.19	74.27
20	---	83.17	---	---	48.83	43.52	48.88	46.23	49.19	61.25	63.57	74.51
21	---	83.28	---	---	48.22	44.02	49.30	46.93	48.10	61.61	64.09	74.78
22	---	83.36	---	---	47.59	44.35	49.81	47.62	47.55	62.13	64.57	75.05
23	---	83.51	---	---	47.21	44.80	50.39	48.32	47.26	62.60	65.03	75.27
24	---	83.60	---	---	46.23	45.33	50.77	49.03	47.45	63.01	65.44	75.54
25	---	83.73	---	60.05	43.52	46.05	51.36	49.76	47.59	63.34	65.86	75.79
26	---	83.84	---	60.62	41.20	46.52	51.87	50.54	47.98	63.74	66.28	75.98
27	---	83.95	---	60.86	39.45	46.90	52.46	51.30	---	64.19	66.70	75.98
28	---	84.06	---	61.31	38.82	47.43	53.06	52.07	---	64.50	67.07	73.78
29	---	84.18	---	61.77	---	48.06	53.65	52.83	---	64.79	67.43	65.15
30	---	84.23	---	62.14	---	48.70	54.07	53.53	---	65.13	67.80	58.30
31	---	---	---	62.41	---	48.97	---	53.98	---	65.27	68.24	---
MEAN	---	82.83	---	---	55.92	43.38	48.62	46.73	53.54	61.13	62.89	71.53
MAX	---	84.23	---	---	66.66	48.97	54.07	55.25	57.46	65.27	68.24	75.98
MIN	---	81.44	---	---	38.39	38.20	46.41	40.52	47.23	55.84	59.46	53.98
WTR YR 1985	MEAN	58.50	HIGH	38.20	LOW	84.23						

CHESTER COUNTY

395450075485401. Local number, CH 10.

LOCATION.--Lat 39°54'50", long 75°48'54", Hydrologic Unit 02040205, at intersection of Routes 82 and 841, Doe Run.

Owner: Robert J. Kleberg, Jr.

AQUIFER.--Cockeysville Marble of Paleozoic age.

WELL CHARACTERISTICS.--Drilled unused water-table well, diameter 6 in, depth 34 ft, casing information not available.

DATUM.--Altitude of land-surface datum is 300 ft. Measuring point: Top of plywood shelf, 5.23 ft above land-surface datum. Prior to June 24, 1981, top of casing, 1.00 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--August 1951 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 8.28 ft below land-surface datum, Mar. 30, 1958; lowest, 16.22 ft below land-surface datum, Nov. 3, 1963.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	12.33	12.67	12.67	12.72	14.79	13.85	---	---	14.38	---	---	15.03
2	12.27	12.69	12.68	12.77	14.59	13.89	---	---	14.40	---	---	15.04
3	12.18	12.73	12.66	12.79	---	13.94	---	---	14.41	---	---	15.06
4	12.24	12.74	12.31	12.80	---	13.98	---	---	14.42	---	---	15.08
5	12.29	12.74	12.26	12.84	---	14.01	---	---	14.43	---	---	15.10
6	12.34	12.52	12.28	12.86	---	14.06	---	---	14.44	---	---	15.11
7	12.35	12.49	12.33	12.86	---	14.07	---	---	14.46	---	---	15.13
8	12.39	12.53	---	12.89	---	14.07	---	---	14.47	---	---	15.16
9	12.43	12.55	---	12.94	---	14.11	---	---	14.49	---	---	15.16
10	12.46	12.59	---	12.97	---	14.14	---	---	14.50	---	---	15.17
11	12.48	12.63	---	12.97	---	14.16	---	---	14.53	---	---	15.18
12	12.51	12.68	---	13.00	---	14.17	---	---	14.53	---	---	15.20
13	12.54	12.74	---	13.04	---	14.19	---	---	14.56	---	---	15.21
14	12.56	12.78	---	13.06	---	14.21	---	---	14.58	---	---	15.22
15	12.61	12.79	---	13.13	---	14.25	---	---	14.59	---	---	15.23
16	12.64	12.83	---	13.17	---	14.27	---	---	14.60	---	---	15.24
17	12.67	12.87	---	13.18	---	14.28	---	---	14.60	---	---	15.26
18	12.70	12.88	---	13.22	---	14.32	---	---	14.59	---	---	15.27
19	12.73	12.90	---	13.25	---	14.36	---	---	14.60	---	---	15.32
20	12.73	12.93	---	13.29	---	---	---	---	14.62	---	---	15.33
21	12.73	12.96	---	13.33	13.67	---	---	14.20	14.63	---	---	15.34
22	12.76	12.98	---	14.71	13.72	---	---	14.22	14.64	---	---	15.36
23	12.75	13.01	---	14.73	13.75	---	---	14.24	14.66	14.94	---	15.37
24	12.65	13.06	---	14.75	13.76	---	---	14.25	14.67	14.96	---	15.38
25	12.57	13.10	---	14.78	13.79	---	---	14.26	14.71	14.97	---	15.39
26	12.53	13.10	---	14.78	13.79	---	---	14.28	14.72	14.97	---	15.41
27	12.56	12.91	---	14.82	13.80	---	---	14.29	14.73	14.97	---	15.41
28	12.60	12.69	---	14.86	13.83	---	---	14.31	14.76	14.98	---	14.66
29	12.60	12.68	12.58	14.88	---	---	---	14.33	---	14.99	---	14.32
30	12.60	12.68	12.65	14.88	---	---	---	14.34	---	15.01	---	14.25
31	12.65	---	12.70	14.88	---	---	---	14.36	---	15.02	---	---
MEAN	12.51	12.76	---	13.55	---	---	---	---	14.56	---	---	15.13
MAX	12.76	13.10	---	14.88	---	---	---	---	14.76	---	---	15.41
MIN	12.15	12.46	---	12.70	---	---	---	---	14.36	---	---	14.24

DELAWARE COUNTY

251

395040075341801. Local number, DE 3.

LOCATION.--Lat 39°50'40", long 75°34'18", Hydrologic Unit 02040205, at Birmingham Township.

Owner: Mrs. Hope W. Ebert.

AQUIFER.--Oligoclase-mica schist of Wissahickon Formation (age uncertain, Early Paleozoic to Precambrian).

WELL CHARACTERISTICS.--Dug unused water-table well, diameter 42 in, depth 18.5 ft, (formerly reported as 22 ft), cased with stone.

DATUM.--Altitude of land-surface datum is 280 ft. Measuring point: Top of concrete base, 1.80 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--June 1951 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level measured, 7.90 ft below land-surface datum, Aug. 22, 1955; lowest measured, dry many times since 1964.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
ONCE-DAILY

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	15.98	16.92	17.45	17.61	17.24	15.45	14.61	14.86	14.33	15.34	16.44	17.30
2	16.02	16.93	17.48	17.60	17.23	15.35	14.64	14.89	14.36	15.37	16.51	17.32
3	16.05	16.96	17.48	17.61	17.24	15.33	14.63	14.85	14.35	15.40	16.55	17.34
4	16.09	16.98	17.50	17.59	17.24	15.27	14.65	14.87	14.37	15.45	16.57	17.37
5	16.13	16.97	17.53	17.56	17.22	15.15	14.63	14.87	14.37	15.50	16.60	17.39
6	16.17	17.01	17.49	17.59	17.17	15.16	14.61	14.87	14.38	15.48	16.64	17.41
7	16.20	17.05	15.53	17.57	17.18	15.13	14.69	14.87	14.42	15.57	16.66	17.44
8	16.22	17.07	17.53	17.55	17.17	15.03	14.69	14.91	14.41	15.61	16.67	17.47
9	16.25	17.08	17.55	17.58	17.15	14.99	14.69	14.95	14.42	15.64	16.70	17.49
10	16.28	17.10	17.56	17.57	17.14	14.95	14.74	14.94	14.45	15.68	16.73	17.51
11	16.32	17.11	17.55	17.53	17.13	14.91	14.72	14.94	14.50	15.73	16.75	17.54
12	16.34	17.13	17.56	17.53	17.09	14.81	14.75	14.95	14.48	15.78	16.78	17.57
13	16.37	17.15	17.57	17.52	16.92	14.83	14.75	14.95	14.56	15.81	16.81	17.59
14	16.40	17.18	17.58	17.49	16.82	14.79	14.74	14.96	14.62	15.84	16.83	17.62
15	16.43	17.19	17.58	17.47	16.72	14.77	14.70	15.00	14.67	15.88	16.86	17.64
16	16.47	17.20	17.59	17.49	16.64	14.77	14.68	14.97	14.68	15.92	16.88	17.66
17	16.50	17.22	17.58	17.46	16.56	14.70	14.74	14.93	14.72	15.97	16.92	17.68
18	16.53	17.24	17.59	17.43	16.45	14.70	14.75	14.71	14.76	16.00	16.94	17.70
19	16.55	17.25	17.60	17.40	16.34	14.71	14.73	14.67	14.80	16.04	16.96	17.72
20	16.58	17.28	17.60	17.42	16.25	14.66	14.74	14.69	14.85	16.07	16.99	17.75
21	16.61	17.30	17.61	17.40	16.16	14.70	14.76	14.67	14.92	16.11	17.01	17.77
22	16.65	17.32	17.58	17.39	16.05	14.68	14.75	14.64	14.97	16.15	17.04	17.79
23	16.67	17.34	17.63	17.37	15.96	14.63	14.77	14.59	14.99	16.20	17.07	17.81
24	16.70	17.36	17.62	17.35	15.86	14.62	14.79	14.55	15.03	16.25	17.10	17.83
25	16.74	17.38	17.62	17.33	15.78	14.64	14.75	14.51	15.08	16.29	17.11	17.86
26	16.75	17.40	17.64	17.32	15.70	14.69	14.79	14.48	15.12	16.31	17.14	17.88
27	16.78	17.40	17.63	17.33	15.58	14.65	14.79	14.44	15.17	16.35	17.17	17.81
28	16.80	17.40	17.62	17.30	15.54	14.62	14.81	14.41	15.20	16.40	17.20	17.44
29	16.83	17.40	17.61	17.30	---	14.61	14.84	14.40	15.24	16.44	17.23	17.38
30	16.87	17.43	17.62	17.29	---	14.64	14.87	14.40	15.30	16.47	17.25	17.34
31	16.89	---	17.62	17.27	---	14.68	---	14.36	---	16.52	17.27	---
MEAN	16.46	17.19	17.57	17.46	16.63	14.86	14.73	14.75	14.72	15.92	16.88	17.58
MAX	16.89	17.43	17.64	17.61	17.24	15.45	14.87	15.00	15.30	16.52	17.27	17.88
MIN	15.98	16.92	17.45	17.27	15.54	14.61	14.61	14.36	14.33	15.34	16.44	17.30

WTR YR 1985 MEAN 16.23 HIGH 14.33 LOW 17.88

LOCATION.--Lat 39°55'12", long 75°29'37", Hydrologic Unit 02040202, at Glen Mills School, in Thornbury Township.

Owner: Glen Mills School.

AQUIFER.--Felsic Hornblende bearing Gneiss of Precambrian Age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 6 in, depth 300 ft, casing information not available.

DATUM.—Altitude of land-surface datum is 280 ft. Measuring point: Top of plywood shelf, 2.66 ft above land-surface datum. Prior to May 11, 1984, top of plywood shelf, 1.20 ft above land-surface datum.

REMARKS.--Data published for both 1983 and 1984 water years.

PERIOD OF RECORD.--April 1983 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 2.78 ft below land-surface datum, April 25, 1983; lowest, 9.95 ft below land-surface datum, Aug. 3, 1983.

[illegible]

LEBANON COUNTY

253

402207076180801. Local number, LB 372.

LOCATION.--Lat 40°22'07", long 76°18'08", Hydrologic Unit 02040203, at Myerstown.

Owner: Kohl Brothers, Inc.

AQUIFER.--Dolomite of Ontelaunee Formation of Middle Ordovician age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 6 in, depth 80 ft, casing information not available, open hole.

DATUM.--Altitude of land-surface datum is 444 ft. Measuring point: Top of plywood shelf, 2.70 ft above land-surface datum. Prior to Apr. 22, 1981, top of casing, 3.50 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--July 1973 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 4.02 ft below land-surface datum, Jan. 27, 1976; lowest, 11.32 ft below land-surface datum, Jan. 23, 30, 1981.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	8.82	9.51	9.20	9.24	9.74	8.33	9.23	10.05	9.79	10.05	10.20	10.49
2	8.79	9.56	9.27	9.25	9.78	8.37	9.35	9.96	9.72	10.06	10.10	10.43
3	8.84	9.65	9.29	9.20	9.80	8.40	9.41	9.07	9.71	10.04	10.16	10.56
4	8.94	9.67	9.25	9.21	9.86	8.45	9.45	9.05	9.78	10.06	10.19	10.71
5	8.95	9.66	9.29	9.31	9.79	8.52	9.45	9.21	9.84	10.06	9.99	10.65
6	9.01	9.55	9.29	9.34	9.79	8.62	9.46	9.31	9.66	10.11	10.07	10.77
7	8.99	9.63	8.95	9.38	9.81	8.68	9.44	9.37	9.75	10.02	10.31	10.71
8	9.03	9.66	9.09	9.33	9.82	8.71	9.49	9.45	9.76	10.07	10.32	10.71
9	9.05	9.71	9.12	9.34	9.82	8.75	9.59	9.50	9.64	10.15	10.27	10.56
10	9.07	9.78	9.15	9.35	9.79	8.75	9.65	9.49	9.71	10.21	10.28	10.45
11	9.10	9.79	9.15	9.35	9.83	8.80	9.68	9.46	9.77	10.18	10.29	10.27
12	9.14	9.81	9.20	9.44	9.84	8.81	9.70	9.34	9.79	10.25	10.13	10.39
13	9.22	9.82	9.25	9.44	7.30	8.87	9.70	9.34	9.91	10.21	10.16	10.47
14	9.25	9.83	9.28	9.47	7.43	8.95	9.68	9.54	9.90	10.25	10.30	10.51
15	9.27	9.85	9.38	9.43	7.55	9.03	9.72	9.64	9.90	10.26	10.25	10.24
16	9.27	9.89	9.43	9.44	7.69	9.04	9.76	9.64	9.73	10.27	10.34	10.47
17	9.29	9.96	9.45	9.45	7.78	9.07	9.78	9.61	9.56	10.32	10.34	10.58
18	9.31	9.98	9.39	9.50	7.85	9.12	9.80	9.39	9.56	10.32	10.29	10.63
19	9.35	9.94	9.39	9.61	7.94	9.21	9.80	9.18	9.69	10.35	10.31	10.72
20	9.42	9.95	9.41	9.66	8.01	9.24	9.80	9.45	9.76	10.34	10.53	10.72
21	9.45	9.97	9.43	9.68	8.09	9.28	9.80	9.57	9.72	10.35	10.52	10.73
22	9.46	9.96	9.12	9.59	8.14	9.33	9.84	9.45	9.80	10.35	10.59	10.43
23	9.00	9.94	9.15	9.58	8.15	9.39	9.88	9.53	9.80	10.32	10.57	10.60
24	9.15	10.05	9.18	9.59	8.13	9.34	9.93	9.49	9.78	10.33	10.61	10.66
25	9.26	10.08	9.07	9.63	8.07	9.37	9.93	9.56	9.86	10.30	10.55	10.73
26	9.34	10.09	9.11	9.74	8.15	9.40	9.94	9.56	9.96	10.30	10.35	10.82
27	9.41	10.07	9.11	9.75	8.19	9.43	9.96	9.62	10.01	10.33	10.55	10.40
28	9.43	10.08	9.12	9.77	8.29	9.45	9.94	9.64	10.03	9.82	10.53	8.67
29	9.39	8.74	9.23	9.71	---	9.45	9.99	9.72	10.05	9.83	10.63	9.06
30	9.45	9.04	9.25	9.72	---	9.43	10.00	9.78	10.03	10.13	10.59	9.34
31	9.48	---	9.28	9.73	---	9.42	---	9.83	---	10.18	10.63	---
MEAN	9.15	9.73	9.19	9.47	8.65	8.98	9.69	9.44	9.75	10.15	10.28	10.26
MAX	9.48	10.09	9.45	9.77	9.86	9.45	10.00	10.05	10.05	10.35	10.63	10.82
MIN	8.51	8.28	8.86	9.08	6.37	8.29	9.12	8.50	9.38	9.70	9.80	7.01
WTR YR 1985	MEAN	9.57	HIGH	6.37	LOW	10.82						

LEHIGH COUNTY

403429075392401. Local number, LE 644.

LOCATION.--Lat 40°34'29", long 75°39'24", Hydrologic Unit 02040106, at Haafsville.

Owner: Charles J. Haaf.

AQUIFER.--Beekmantown Group of Middle Ordovician age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 10 in, depth 184 ft, cased to 63 ft, open hole.

DATUM.--Altitude of land-surface datum is 470 ft. Measuring point: Top of plywood shelf, 2.65 ft above land-surface datum. Prior to Mar. 18, 1981, top of plywood cover, 1.45 ft above land-surface datum.

REMARKS.--Water-quality records for 1973-75 are available in files of district office.

PERIOD OF RECORD.--January 1971 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 36.65 ft below land-surface datum, June 27, 1972; lowest, 93.42 ft below land-surface datum, Feb. 6, 1971.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	50.86	55.85	61.12	62.10	64.72	63.88	66.27	69.95	69.60	---	72.29	72.93
2	51.03	56.09	61.12	62.22	64.59	63.71	66.52	69.99	69.56	---	71.95	73.03
3	51.16	56.03	61.25	62.32	64.68	63.73	66.64	69.87	69.69	---	71.95	73.37
4	51.53	55.93	61.50	62.30	64.97	63.81	66.79	69.02	69.96	---	71.93	73.46
5	51.77	56.20	61.69	62.09	65.05	64.12	66.76	68.36	70.03	---	71.93	73.56
6	51.85	56.48	61.70	62.05	65.14	64.26	66.62	68.05	70.05	---	72.04	73.63
7	51.94	56.70	61.85	61.96	65.25	64.27	66.66	68.22	70.17	---	72.21	73.65
8	52.25	56.89	61.84	62.08	65.25	64.38	66.89	68.28	70.15	---	72.23	73.44
9	52.66	56.94	61.65	62.17	65.26	64.40	67.11	68.27	69.94	---	72.09	73.52
10	52.87	56.93	61.77	62.26	65.31	64.23	67.30	68.28	70.10	---	72.11	73.86
11	53.16	56.84	62.07	62.34	65.58	64.37	67.57	68.13	70.21	---	72.11	74.14
12	53.32	57.11	62.19	62.37	65.60	64.46	67.70	67.97	70.31	72.37	72.17	74.42
13	53.33	57.47	62.43	62.31	65.17	64.56	67.50	68.16	---	72.45	72.30	74.57
14	53.44	57.83	62.59	62.36	64.67	64.69	67.42	68.46	---	72.51	72.17	74.49
15	53.83	58.13	62.55	62.63	64.53	64.84	67.61	68.54	---	72.54	72.38	74.40
16	54.23	58.50	62.34	62.71	64.46	64.75	67.88	68.53	---	72.58	72.49	74.63
17	54.39	58.58	62.57	62.66	64.14	64.60	68.09	68.59	---	72.61	72.41	74.80
18	54.64	58.60	62.90	62.78	64.09	65.03	68.18	68.36	---	72.67	72.38	74.95
19	54.84	59.07	62.98	62.92	64.23	65.10	68.32	68.31	---	72.81	72.61	75.10
20	54.92	59.48	63.25	62.92	64.35	65.26	68.35	68.48	---	72.89	72.94	75.22
21	55.02	59.80	63.29	63.08	64.38	65.39	68.37	68.66	---	72.84	73.02	75.22
22	55.34	59.78	63.15	63.34	64.38	65.42	68.62	68.80	---	72.94	73.20	75.20
23	55.37	59.70	62.85	63.46	64.17	65.36	68.84	68.90	---	73.18	73.37	75.33
24	55.37	59.78	62.59	63.55	63.89	65.28	69.02	68.96	---	73.27	73.30	75.61
25	55.45	59.87	62.42	63.77	63.86	65.62	69.20	68.86	---	73.43	73.12	75.82
26	55.60	60.09	62.48	63.88	63.90	65.82	69.34	68.72	---	73.46	72.96	75.92
27	55.65	60.39	62.51	63.85	64.00	65.86	69.20	68.79	---	73.25	73.16	75.88
28	55.64	60.62	62.43	64.12	64.02	66.05	69.19	69.16	---	72.57	73.26	71.22
29	55.65	60.91	62.35	64.38	---	66.16	69.47	69.32	---	72.55	73.18	68.35
30	55.66	61.10	62.31	64.56	---	66.12	69.72	69.47	---	72.70	73.19	66.76
31	55.82	---	62.26	64.67	---	66.08	---	69.60	---	72.85	73.06	---
MEAN	53.71	58.12	62.14	62.81	64.53	64.80	67.79	68.64	---	---	72.47	73.66
MAX	55.82	61.10	63.29	64.67	65.60	66.16	69.72	69.99	---	---	73.37	75.92
MIN	50.59	55.78	61.03	61.76	63.65	63.63	65.90	67.88	---	---	71.64	66.27
WTR YR 1985	MEAN	65.50	HIGH	50.59	LOW	75.92						

LEHIGH COUNTY

255

403226075343001. Local number, LE 860.

LOCATION.--Lat 40°32'26", long 75°34'30", Hydrologic Unit 02040106, at Lower Macungie Township.

Owner: Paul Knepper.

AQUIFER.--Dolomite of Allentown Formation of Late Cambrian age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 100 ft, cased to 58 ft, open hole.

DATUM.--Altitude of land-surface datum is 358 ft. Measuring point: Top of plywood shelf, 2.95 ft above land-surface datum. Prior to Mar. 18, 1981, top of casing, 2.00 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--June 1969 to April 1986 (discontinued).

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 0.01 ft below land-surface datum, July 7, 1984; lowest 12.07 ft below land-surface datum, Dec. 18, 1981.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	---	5.30	5.98	6.39	7.10	6.68	7.47	---	---	---	---	---
2	---	5.35	6.00	6.40	7.13	6.74	7.49	---	---	---	---	---
3	---	5.37	6.00	6.38	7.19	6.79	7.49	---	---	---	---	---
4	---	5.37	6.02	6.36	7.20	6.80	7.52	---	---	---	---	---
5	4.75	5.37	6.05	6.39	7.20	6.84	7.53	---	---	---	---	---
6	4.78	5.38	6.03	6.40	7.23	6.89	7.57	---	---	---	---	---
7	4.79	5.43	5.98	6.40	7.27	6.91	7.58	---	---	---	---	---
8	4.82	5.45	6.02	6.46	7.27	6.91	7.60	---	---	---	---	---
9	4.86	5.47	6.06	6.48	7.29	6.95	7.62	---	---	---	---	---
10	4.89	5.49	6.09	6.48	7.34	6.97	7.64	---	---	---	---	---
11	4.92	5.51	6.09	6.50	7.36	7.00	7.67	---	---	---	---	---
12	4.94	5.54	6.12	6.52	7.36	7.00	7.68	---	---	---	---	---
13	4.97	5.59	6.15	6.54	7.36	7.01	7.70	---	---	---	---	---
14	5.01	5.63	6.20	6.56	7.34	7.03	7.71	---	---	---	---	---
15	5.05	5.63	6.21	6.62	7.29	7.09	7.71	---	---	---	---	---
16	5.11	5.69	6.23	6.67	7.39	7.11	7.74	---	---	---	---	---
17	5.12	5.71	6.24	6.67	7.45	7.12	7.77	---	---	---	---	---
18	5.14	5.71	6.27	6.68	7.48	7.20	7.78	---	---	---	---	---
19	5.15	5.76	6.27	6.72	7.51	7.24	7.80	---	---	---	---	---
20	5.17	5.80	6.31	6.76	7.57	7.27	7.83	---	---	---	---	---
21	5.24	5.82	6.33	6.76	7.60	7.28	7.85	---	---	---	---	---
22	5.24	5.83	6.28	6.74	7.61	7.31	7.87	---	---	---	---	---
23	5.09	5.85	6.24	6.79	7.61	7.31	7.88	---	---	---	---	---
24	5.11	5.87	6.24	6.82	7.58	7.33	7.89	---	---	---	---	---
25	5.14	5.90	6.31	6.86	7.58	7.38	7.90	---	---	---	---	---
26	5.15	5.93	6.35	6.92	7.58	7.39	7.94	---	---	---	---	---
27	5.17	5.95	6.35	6.94	7.66	7.39	7.98	---	---	---	---	---
28	5.24	5.95	6.35	6.97	7.67	7.41	8.01	---	---	---	---	---
29	5.24	5.95	6.35	7.01	---	7.43	8.05	---	---	---	---	---
30	5.23	5.91	6.39	7.06	---	7.46	8.07	---	---	---	---	---
31	5.28	---	6.39	7.08	---	7.47	---	---	---	---	---	---
MEAN	---	5.64	6.17	6.64	6.80	7.11	7.74	---	---	---	---	---
MAX	---	5.95	6.39	7.08	7.36	7.47	8.07	---	---	---	---	---
MIN	---	5.28	5.91	6.32	6.21	6.68	7.47	---	---	---	---	---

MONROE COUNTY

411223075234901. Local number, MO 190.

LOCATION.--Lat 41°12'23", long 75°23'49", Hydrologic Unit 02040106, at Tobyhanna State Park.

Owner: U.S. Geological Survey.

AQUIFER.--Sandstone of Catskill Formation of Late Devonian age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 98 ft, cased to 59 ft, open hole.

DATUM.--Altitude of land-surface datum is 1,990 ft. Measuring point: Top of plywood shelf, 2.96 ft above land-surface datum. Prior to Mar. 28, 1980, top of plywood cover, 2.57 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--October 1967 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 6.83 ft below land-surface datum, Apr. 5, 1984; lowest, 16.87 ft below land-surface datum, Oct. 24, 25, 1980.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	14.07	---	---	12.85	12.74	11.35	10.38	10.97	9.75	10.65	11.04	12.55
2	14.07	---	---	12.72	12.78	11.20	10.22	10.97	8.92	10.74	11.04	12.56
3	14.06	---	---	12.62	12.85	11.20	10.13	10.70	8.78	10.87	11.02	12.53
4	14.09	---	---	12.46	12.85	11.14	10.22	9.45	8.98	10.98	11.15	12.57
5	14.16	---	---	12.37	12.85	10.94	10.07	9.04	8.98	11.07	11.20	12.60
6	14.16	---	---	12.37	12.90	10.91	10.05	8.78	8.33	11.19	11.29	12.71
7	14.19	---	---	12.32	12.93	10.79	10.06	8.83	8.36	11.09	11.31	12.78
8	14.21	---	---	12.28	12.94	10.65	10.01	8.97	8.46	11.06	11.31	12.83
9	14.26	---	---	12.29	13.00	10.61	9.96	9.02	8.62	11.14	11.32	12.83
10	14.31	---	---	12.29	13.04	10.61	9.87	9.07	8.96	11.21	11.35	12.73
11	14.35	---	---	12.21	13.06	10.60	9.88	9.25	9.03	11.21	11.50	12.59
12	14.40	---	---	12.18	13.06	10.46	10.00	9.34	9.27	11.21	11.52	12.56
13	14.40	---	---	12.18	12.87	10.21	10.01	9.47	9.47	11.21	11.87	12.73
14	14.46	14.81	---	12.17	12.88	10.11	10.00	9.74	9.68	11.00	11.90	13.06
15	14.51	---	---	12.29	12.88	10.01	10.00	9.82	9.80	10.89	11.93	12.60
16	14.52	---	---	12.31	12.91	10.02	10.16	9.83	9.80	10.95	11.97	12.62
17	14.54	---	---	12.27	12.95	9.92	10.29	9.88	8.60	11.01	12.00	12.70
18	14.61	---	---	12.24	12.97	10.10	10.29	9.86	8.45	11.12	12.11	12.77
19	14.62	---	14.24	12.29	12.97	10.11	10.34	9.71	8.70	11.21	12.15	12.82
20	14.69	---	14.23	12.32	12.99	10.18	10.40	9.78	8.98	11.31	12.51	12.89
21	14.69	---	14.21	12.36	13.00	10.28	10.42	9.87	9.22	11.31	12.54	12.95
22	14.71	---	14.13	12.40	12.98	10.27	10.47	10.01	9.34	11.31	12.69	13.04
23	14.66	---	14.00	12.43	12.94	10.24	10.53	10.10	9.52	11.31	12.71	13.04
24	14.61	---	13.90	12.44	12.65	10.24	10.54	10.28	9.69	11.31	12.74	13.05
25	14.61	---	13.79	12.44	12.23	10.37	10.57	10.38	9.82	11.31	12.77	13.09
26	14.65	---	13.79	12.57	11.89	10.42	10.64	10.52	10.02	11.31	12.81	13.10
27	14.64	---	13.72	12.57	11.63	10.40	10.74	10.64	10.16	11.30	12.84	13.07
28	14.66	---	13.61	12.61	11.54	10.39	10.78	10.62	10.27	11.17	13.09	11.34
29	14.67	---	13.44	12.68	---	10.50	10.87	10.12	10.40	11.18	12.88	11.19
30	14.68	---	13.17	12.70	---	10.58	10.88	9.90	10.53	11.26	12.93	11.04
31	14.69	---	13.04	12.70	---	10.58	---	9.87	---	11.30	12.65	---
MEAN	14.43	---	---	12.38	12.72	10.45	10.26	9.75	9.17	11.10	11.96	12.55
MAX	14.71	---	---	12.85	13.06	11.35	10.88	10.97	10.53	11.31	13.09	13.10
MIN	14.04	---	---	12.15	11.36	9.89	9.84	8.73	8.21	10.52	10.96	10.87
WTR YR 1985	MEAN	11.48	HIGH	8.21	LOW	14.71						

MONTGOMERY COUNTY

257

400808075210401. Local number, MG 225.

LOCATION.--Lat 40°08'08", long 75°21'04", Hydrologic Unit 02040203, at Willow and Locust Streets, Norristown.

Owner: Norristown State Hospital.

AQUIFER.--Sandstone of Stockton Formation of Late Triassic age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 12 in, depth 300 ft, casing information not available.

DATUM.--Altitude of land-surface datum is 165 ft. Measuring point: Top of plywood shelf, 2.35 ft above land-surface datum. Prior to Mar. 17, 1981, top of casing, 0.75 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--September 1956 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 11:00 ft below land-surface datum, May. 31, 1984; lowest, 60.25 ft below land-surface datum, Nov. 5, 6, 1963.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	28.71	29.42	29.48	28.03	29.13	26.58	28.45	28.94	23.18	25.09	---	26.82
2	28.60	29.43	29.54	28.11	29.11	26.77	28.40	29.37	23.19	25.05	---	26.80
3	28.42	29.46	29.53	28.09	29.23	26.92	28.36	29.36	23.14	25.03	---	26.75
4	28.39	29.42	29.58	27.98	29.29	26.92	28.37	28.31	23.13	25.07	---	26.71
5	28.45	29.34	29.57	28.06	29.29	27.03	28.32	27.94	23.22	25.08	---	26.89
6	28.51	29.06	29.44	28.04	29.37	27.16	28.53	27.90	23.54	25.06	---	27.12
7	28.51	29.02	28.88	27.94	29.47	27.16	28.61	27.01	23.64	25.03	---	27.28
8	28.50	29.02	28.67	27.90	29.48	27.05	28.67	26.83	23.69	25.03	---	27.33
9	28.56	28.97	28.59	27.91	29.59	27.07	28.80	26.90	23.72	24.97	---	27.33
10	28.63	28.89	28.53	27.89	29.63	27.07	28.88	26.18	23.88	25.19	---	27.37
11	28.68	28.87	28.44	27.73	29.66	27.06	28.96	25.56	23.92	25.52	---	27.49
12	28.71	28.94	28.46	27.65	29.60	26.94	29.06	25.27	23.92	25.70	---	27.55
13	28.72	28.98	28.49	27.60	27.80	26.97	29.12	25.07	24.03	25.87	---	27.61
14	28.79	29.06	28.53	27.55	26.78	27.06	29.13	24.98	24.09	25.95	---	27.62
15	28.85	29.08	28.50	27.70	26.63	27.19	29.11	25.03	24.12	26.03	---	27.61
16	28.95	29.05	28.51	27.72	26.59	27.21	29.19	24.99	24.04	26.12	---	27.59
17	28.99	29.14	28.45	27.63	26.63	27.13	29.30	24.90	24.00	26.22	---	27.82
18	29.05	29.16	28.49	27.57	26.64	27.27	29.29	24.61	23.91	26.27	---	28.02
19	29.10	29.21	28.47	27.61	26.60	27.39	29.26	24.21	23.93	26.29	---	28.08
20	29.21	29.31	28.52	27.67	26.60	27.69	29.30	24.08	23.92	26.29	26.65	28.11
21	29.30	29.38	28.50	27.66	26.60	27.91	29.32	23.93	24.21	26.31	26.66	28.18
22	29.39	29.38	28.38	27.66	26.55	28.01	29.30	23.89	24.37	26.27	26.63	28.28
23	29.43	29.38	28.36	27.67	26.48	28.09	29.32	23.82	24.50	---	26.75	28.33
24	29.45	29.40	28.27	27.66	26.38	28.21	29.29	23.71	24.62	---	27.02	28.49
25	29.46	29.47	28.27	27.67	26.40	28.37	29.20	23.59	24.72	---	27.09	28.63
26	29.47	29.51	28.27	27.86	26.38	28.42	29.18	23.52	24.81	---	27.00	28.70
27	29.52	29.56	28.21	27.89	26.44	28.36	29.17	23.48	24.90	---	26.81	28.56
28	29.53	29.55	28.12	28.17	26.55	28.37	29.14	23.41	24.93	---	26.79	25.50
29	29.48	29.45	28.02	28.56	---	28.48	29.14	23.43	24.99	---	26.78	24.46
30	29.39	29.43	28.13	28.81	---	28.59	29.09	23.39	25.06	---	26.72	24.21
31	29.40	---	28.11	29.01	---	28.59	---	23.27	---	---	26.78	---
MEAN	28.92	29.19	28.55	27.83	27.72	27.45	28.93	25.26	23.99	25.53	26.76	27.26
MAX	29.53	29.56	29.58	29.01	29.66	28.59	29.32	29.37	25.06	26.31	27.09	28.70
MIN	28.28	28.78	27.98	27.44	26.17	26.54	28.22	23.14	22.99	24.94	26.60	24.13
WTR YR 1985	MEAN	27.28	HIGH	23.02	LOW	29.66						

401310075181702. Local number, MG 884

LOCATION.--Lat 40°13'10", long 75°18'17", Hydrologic Unit 02040203, at Upper Gwynedd Township, near West Point.

Owner: Merck, Sharp, and Dohme, Inc.

AQUIFER.--Shale of Brunswick Formation of Late Triassic age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 12 in to 10 in, depth 600 ft, casing information not available.

DATUM.--Altitude of land-surface datum is 351 ft. Measuring point: Top of plywood shelf, 2.55 ft above land-surface datum. Prior to May 1, 1981, top of casing, 1.30 ft above land-surface datum.

REMARKS.--Well originally drilled to 300 ft. Water-level data for August 1956 to December 1965 published in U.S. Geological Survey Water-Supply Papers under local number MG-127. Well deepened to 600 ft in December 1965 and assigned local number MG-884.

PERIOD OF RECORD.--March 1966 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 38.40 ft below land-surface datum, June 30, 1972; lowest, 93.17 ft below land-surface datum, Oct. 20, 1966.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	64.28	67.64	68.94	67.87	68.07	67.55	66.14	65.81	61.44	57.27	59.46	60.06
2	64.41	67.85	68.95	67.69	68.19	67.56	66.09	65.83	61.43	57.14	59.66	59.86
3	64.49	67.84	68.93	67.68	68.28	67.56	66.06	65.70	61.15	57.02	59.70	59.67
4	64.74	67.77	69.00	67.42	68.27	67.47	66.13	65.67	60.93	57.06	59.74	59.48
5	64.95	67.73	69.03	67.41	68.21	67.44	65.95	65.52	60.69	57.07	59.75	59.38
6	65.02	67.92	68.98	67.40	68.21	67.52	65.96	65.28	60.37	57.03	59.71	59.28
7	65.02	67.99	69.09	67.11	68.33	67.49	65.96	65.03	60.26	57.03	59.61	59.30
8	65.01	68.03	69.05	67.15	68.33	67.21	65.76	64.97	59.85	57.03	59.46	59.26
9	65.17	68.01	69.06	67.19	68.45	67.30	65.78	64.90	59.71	56.98	59.63	59.15
10	65.30	68.00	68.90	67.13	68.46	67.21	65.79	64.72	59.57	57.15	59.77	59.09
11	65.39	68.00	68.90	67.01	68.45	67.14	65.73	64.60	59.44	57.83	59.99	59.09
12	65.48	68.07	68.85	66.97	68.32	67.00	65.78	64.56	59.05	58.11	60.18	59.05
13	65.51	68.13	68.99	66.97	68.41	67.05	65.72	64.46	59.00	58.27	60.33	59.02
14	65.60	68.28	69.07	66.84	68.47	67.00	65.62	64.54	59.00	58.26	60.48	58.95
15	65.72	68.28	69.02	67.11	68.47	67.07	65.47	64.54	58.87	58.30	60.67	58.82
16	65.90	68.36	69.00	67.17	68.47	67.05	65.47	64.33	58.61	58.52	60.95	58.70
17	66.00	68.42	68.84	67.01	68.41	66.78	65.62	64.08	58.44	58.61	61.10	58.69
18	66.15	68.41	68.92	67.07	68.45	66.90	65.54	64.03	58.22	58.54	61.13	58.71
19	66.33	68.50	68.91	67.17	68.23	66.90	65.49	64.04	58.07	58.50	61.16	58.66
20	66.49	68.59	68.99	67.20	68.19	66.83	65.52	63.95	58.03	58.35	61.21	58.61
21	66.58	68.64	69.03	67.19	68.19	66.93	65.51	63.78	58.02	58.31	61.17	58.58
22	66.71	68.66	69.06	67.27	68.03	66.82	65.45	63.67	57.91	58.23	61.13	58.64
23	66.90	68.58	69.06	67.32	67.98	66.65	65.52	63.50	57.70	58.34	61.11	58.64
24	67.04	68.59	68.92	67.36	67.81	66.58	65.52	63.28	57.56	58.38	60.99	58.66
25	67.13	68.62	68.96	67.50	67.87	66.65	65.56	63.03	57.51	58.30	60.86	58.74
26	67.26	68.61	68.87	67.73	67.78	66.66	65.62	62.81	57.36	58.07	60.77	58.68
27	67.32	68.62	68.72	67.67	67.70	66.47	65.71	62.67	57.35	58.05	60.63	58.68
28	67.33	68.56	68.49	67.70	67.70	66.35	65.77	62.40	57.32	58.06	60.50	58.72
29	67.45	68.75	68.27	67.80	---	66.33	65.81	62.30	57.26	57.96	60.35	58.64
30	67.52	68.78	68.28	67.91	---	66.38	65.80	62.12	57.32	58.51	60.17	58.37
31	67.63	---	68.17	67.96	---	66.35	---	61.81	---	58.86	60.06	---
MEAN	65.93	68.22	68.80	67.28	68.16	66.91	65.66	64.02	58.77	57.81	60.29	58.90
MAX	67.63	68.78	69.09	67.96	68.47	67.61	66.14	65.83	61.37	58.84	61.21	60.06
MIN	64.12	67.52	67.89	66.71	67.57	65.98	65.28	61.33	57.13	56.83	58.87	57.88

WTR YR 1985 MEAN 64.21 HIGH 57.13 LOW 69.09

NORTHAMPTON COUNTY

259

403618075203801. Local number, NP 85.

LOCATION.--Lat 40°36'18", long 75°20'38", Hydrologic Unit 02040106, at Bethlehem.

Owner: City of Bethlehem.

AQUIFER.--Dolomite of Leithsville Formation of Early and Middle Cambrian age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 12 in, depth 344 ft, cased to 73 ft, open hole.

DATUM.--Altitude of land-surface datum is 230 ft. Measuring point: Top of casing, 1.00 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--July 1969 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 0.33 ft below land-surface datum, Sept. 24, 1975; lowest, 4.60 ft below land-surface datum, June 29, 30, July 1, 1984.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	3.72	3.69	---	3.20	3.78	---	3.71	---	3.80	3.71	3.36	---
2	---	3.70	---	3.17	3.81	---	3.73	---	3.75	---	3.49	---
3	3.72	3.70	---	---	3.81	---	3.73	---	3.79	---	3.54	3.64
4	---	3.71	---	---	3.82	---	3.73	---	3.81	---	3.59	3.65
5	---	3.66	---	---	3.82	3.62	3.73	---	3.81	---	3.62	3.66
6	---	3.56	---	---	3.81	3.67	3.69	---	3.64	---	3.63	3.66
7	---	3.66	---	3.58	3.82	3.70	3.70	3.54	3.72	---	3.63	3.67
8	---	3.66	---	3.64	3.83	3.70	3.72	3.55	3.73	---	3.56	3.69
9	---	3.68	---	3.66	3.84	3.70	3.73	3.63	3.72	---	3.60	3.66
10	---	3.68	3.62	3.66	3.85	3.70	3.74	3.69	3.78	---	3.60	3.61
11	---	3.68	3.65	3.66	3.83	3.72	3.73	3.70	3.79	---	3.62	3.60
12	---	3.70	3.67	---	3.81	3.70	3.75	3.74	3.81	---	3.60	3.66
13	---	3.70	3.69	---	---	3.56	3.75	3.72	3.81	---	3.66	3.66
14	---	---	3.72	---	---	3.62	3.76	3.71	3.83	---	3.58	3.68
15	---	---	3.71	---	---	3.66	3.74	3.72	3.83	---	3.60	3.69
16	---	---	3.72	---	---	3.68	3.75	3.72	3.83	---	---	3.70
17	3.83	---	3.71	---	---	3.68	3.76	3.71	3.48	3.70	---	3.69
18	3.82	---	3.73	---	---	3.69	3.77	3.55	3.56	3.72	---	3.70
19	3.82	---	3.73	---	---	3.70	3.80	3.49	3.66	3.72	---	3.69
20	3.81	---	3.69	---	---	3.71	3.80	3.54	3.70	3.70	---	3.69
21	3.80	---	3.72	---	---	3.73	3.81	3.56	3.73	3.70	---	3.70
22	3.80	---	3.29	---	---	3.74	3.81	3.56	3.73	3.65	---	3.70
23	3.50	---	3.44	---	---	3.73	3.83	3.57	3.71	3.69	---	3.70
24	3.60	---	3.53	3.79	---	3.71	3.82	3.60	3.71	3.72	---	3.69
25	3.65	---	3.60	3.78	---	3.72	3.72	3.61	3.68	3.72	---	3.65
26	3.65	---	3.62	3.81	---	3.76	3.71	3.60	3.71	3.50	---	3.68
27	3.66	---	3.63	3.78	---	3.75	3.71	3.62	3.70	3.30	---	3.69
28	3.69	---	3.61	3.79	---	3.73	3.71	3.62	3.71	3.43	---	.98
29	3.53	---	3.46	3.79	---	3.74	---	3.62	3.71	3.52	---	1.72
30	3.63	---	---	3.80	---	3.75	---	3.82	3.72	3.54	---	2.27
31	3.68	---	---	3.78	---	3.76	---	3.82	---	3.54	---	---
MAX	3.38	3.71	3.73	3.81	3.85	3.76	3.83	3.82	3.83	3.72	3.66	3.70

PHILADELPHIA COUNTY

395342075102101. Local number, PH 12.

LOCATION.--Lat 39°53'42", long 75°10'21", Hydrologic Unit 02040202, at Barracks and East Fourth Streets,

Philadelphia. Owner: U.S. Naval Base.

AQUIFER.--Middle Sand Unit of Potomac-Raritan-Magothy aquifer system of Late Cretaceous age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 8 in, depth 104 ft, cased to 94 ft, screened 94-104 ft.

DATUM.--Altitude of land-surface datum is 8.64 ft. Measuring point: Top of casing, 1.80 ft above land-surface datum.

REMARKS.--Mean daily fluctuation caused by tidal loading, 0.20 ft.

PERIOD OF RECORD.--January 1952 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 14.26 ft below land-surface datum, May 7,8, 1984; lowest, 39.60 ft below land-surface datum, July 20, 1955.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	15.08	14.59	15.16	15.59	15.96	16.27	15.62	16.00	15.17	16.18	15.70	16.04
2	15.11	14.48	15.57	15.52	15.88	16.24	15.77	16.17	15.32	16.05	15.73	15.93
3	15.07	14.82	15.22	15.66	16.00	16.33	15.76	16.03	15.42	15.86	15.85	15.80
4	15.08	14.42	15.44	15.32	16.38	16.32	15.79	16.06	15.58	15.95	15.94	15.74
5	15.45	14.25	15.38	14.99	15.78	16.20	15.67	15.89	15.50	16.04	16.00	15.71
6	15.60	14.36	14.97	15.21	15.68	16.50	15.76	15.78	15.64	16.05	15.97	15.67
7	15.54	14.82	15.20	15.53	15.78	15.93	15.86	15.91	15.66	16.06	15.86	15.87
8	15.35	15.05	15.46	15.30	16.03	15.95	15.89	16.19	15.55	16.11	15.78	15.87
9	15.30	14.82	15.68	15.62	16.22	15.93	16.14	16.19	15.42	16.02	15.85	15.85
10	15.38	14.57	15.34	16.28	16.42	15.64	16.21	16.07	15.46	16.03	15.85	15.80
11	15.38	14.40	15.35	15.92	16.18	15.72	16.16	15.91	15.53	16.19	15.83	16.05
12	15.23	14.57	15.33	15.79	15.38	15.77	16.21	15.94	15.25	16.25	16.01	16.12
13	15.09	14.82	15.37	15.79	15.38	15.99	16.23	15.85	15.51	16.25	16.03	16.29
14	14.83	15.00	15.68	15.71	15.59	16.09	16.16	16.05	15.66	16.21	15.97	16.33
15	14.88	14.95	15.72	15.39	15.73	---	15.83	16.16	15.75	16.10	15.92	16.26
16	14.99	14.89	15.58	15.51	15.79	---	15.51	15.80	15.50	16.18	16.05	16.11
17	15.10	15.11	15.46	16.18	15.82	---	15.90	15.40	15.42	16.28	16.09	16.09
18	15.04	15.11	15.46	15.57	16.02	---	16.00	15.39	15.25	16.28	16.08	16.09
19	14.98	15.02	15.34	15.48	15.91	---	15.78	15.59	15.39	16.25	15.92	16.04
20	14.98	15.21	15.43	15.37	16.05	---	15.85	15.62	15.63	16.08	15.91	15.98
21	15.09	15.53	15.41	15.61	16.21	---	15.83	15.47	15.73	16.07	15.90	15.90
22	15.10	15.55	15.19	15.93	16.16	---	15.81	15.49	15.79	15.98	15.88	15.97
23	15.11	15.21	15.56	16.04	16.05	---	16.03	15.42	15.73	16.22	16.00	15.94
24	15.15	15.15	15.47	15.93	15.85	---	16.00	15.26	15.73	16.33	15.99	15.73
25	15.05	15.26	15.40	15.75	16.30	---	15.76	15.17	15.79	16.30	15.88	15.96
26	14.76	15.36	16.08	15.83	16.26	16.18	15.79	15.12	15.82	16.05	15.89	15.90
27	14.73	15.45	15.98	16.18	16.31	15.99	15.86	15.14	15.91	16.08	16.00	15.64
28	14.57	14.88	15.62	16.09	16.33	15.65	15.91	15.14	15.89	16.20	16.04	16.04
29	14.58	14.83	15.54	16.22	---	15.73	16.04	15.37	15.93	16.18	16.02	16.04
30	14.76	15.16	15.51	16.35	---	16.01	16.09	15.38	16.13	16.15	15.81	15.85
31	14.82	---	15.93	16.09	---	16.07	---	15.17	---	16.10	15.87	---
MEAN	15.16	15.07	15.63	15.89	16.03	---	15.80	15.57	15.51	16.05	15.84	15.86
MAX	15.60	15.55	16.08	16.35	16.42	---	16.23	16.19	16.13	16.33	16.09	16.33
MIN	14.74	14.40	15.34	15.32	15.59	---	15.32	14.84	14.78	15.71	15.51	14.89
WTR YR 1985	MEAN	15.62	HIGH	14.40	LOW	16.42						

PIKE COUNTY

261

410940074583401. Local number, PI 200.

LOCATION.--Lat 41°09'40", long 74°58'34", Hydrologic Unit 02040104, at Pocono Mountain Lake Estates.

Owner: Pocono Mountain Lake Estates.

AQUIFER.--Sandstone and siltstone of Towamensing Member of Catskill Formation of Late Devonian age.

WELL CHARACTERISTICS.--Drilled unused artesian well, diameter 8 in, depth 799 ft, cased to 86 ft, open hole.

DATUM.--Altitude of land-surface datum is 1,180 ft. Measuring point: Top of plywood shelf, 1.40 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--July 1981 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 24.88 ft below land-surface datum, Apr. 18, 1983; lowest, 61.48 ft below land-surface datum, July 30, 1984.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	44.24	45.87	46.53	34.36	40.80	32.88	37.39	41.32	36.06	37.51	42.44	46.43
2	44.12	45.83	46.52	34.38	41.39	33.33	36.89	42.52	32.34	37.56	41.14	47.13
3	44.08	46.03	46.54	34.21	41.93	34.16	36.11	42.56	31.64	37.84	41.15	47.20
4	43.88	46.71	45.99	33.93	42.20	34.50	37.24	36.15	32.19	38.80	42.42	46.73
5	43.99	47.47	45.04	33.90	42.29	34.51	37.69	32.88	32.51	40.29	43.57	46.10
6	44.51	47.46	44.45	34.51	42.19	33.85	37.62	32.23	32.12	41.56	43.88	45.60
7	45.43	46.76	43.64	34.66	41.93	33.33	37.24	31.74	30.85	42.30	43.62	45.47
8	45.49	46.47	43.44	34.68	41.89	33.23	37.01	31.28	30.86	42.46	42.80	46.54
9	45.45	46.37	43.30	34.82	42.24	33.44	36.21	31.71	31.72	42.16	41.92	46.57
10	45.10	46.27	43.32	34.96	42.49	34.01	35.73	32.27	32.55	41.14	42.66	46.24
11	44.74	46.51	43.27	35.01	42.50	34.24	35.54	33.47	32.96	41.35	43.53	45.40
12	44.77	46.59	46.86	35.16	42.54	34.23	35.57	34.88	33.34	42.12	44.26	44.99
13	45.74	46.53	46.97	35.74	42.21	33.76	35.84	35.36	33.64	42.66	44.71	44.62
14	46.04	46.34	46.02	35.98	42.27	33.19	36.14	35.47	34.13	44.36	44.71	45.04
15	46.13	46.85	44.61	36.14	42.01	33.19	36.15	35.69	35.07	44.60	44.40	46.27
16	45.90	46.89	43.86	36.35	40.53	33.53	36.09	35.74	35.31	44.30	44.50	46.73
17	46.23	46.84	43.51	36.38	39.55	34.03	35.80	35.71	34.95	43.60	44.57	46.76
18	46.34	46.93	43.11	36.46	39.32	34.32	35.86	35.60	34.13	42.99	45.25	46.56
19	46.33	46.94	42.60	36.91	39.25	34.41	36.25	33.85	33.90	42.89	46.24	46.06
20	46.14	46.89	41.99	37.51	38.92	34.42	37.03	33.34	34.08	43.86	46.74	45.83
21	46.45	46.71	41.49	38.07	38.43	34.56	37.99	33.26	34.30	46.75	46.56	46.16
22	46.47	46.97	40.94	38.24	37.99	34.92	38.53	33.04	34.31	46.87	45.77	47.37
23	46.09	47.44	38.64	38.53	37.53	35.46	39.07	33.26	---	46.18	45.11	47.65
24	45.79	47.76	37.42	41.02	36.06	36.08	39.07	33.67	---	45.02	45.05	47.39
25	45.69	48.01	36.61	43.82	35.01	36.46	38.68	34.84	---	44.27	45.84	46.56
26	45.68	48.07	36.07	43.94	34.11	36.48	38.00	36.76	---	43.77	45.85	46.03
27	45.84	47.93	35.84	43.29	33.31	36.45	39.66	37.99	36.29	43.15	45.53	45.61
28	46.23	48.03	35.85	42.18	32.82	36.41	41.56	38.06	36.32	43.70	45.34	40.69
29	46.33	47.82	35.79	41.29	---	36.56	41.63	37.65	36.56	43.75	45.49	37.62
30	46.15	47.06	34.79	40.73	---	36.90	41.54	36.72	37.14	43.35	45.62	36.89
31	45.84	---	34.13	40.64	---	37.38	---	36.34	---	42.97	45.52	---
MEAN	45.39	46.79	41.55	37.09	39.52	34.46	37.20	34.85	33.50	42.33	44.06	45.09
MAX	46.47	48.07	46.97	43.94	42.54	37.38	41.63	42.56	37.14	46.87	46.74	47.65
MIN	43.85	45.75	33.88	33.61	32.71	32.72	35.44	31.09	30.49	37.16	40.57	36.27
WTR YR 1985	MEAN	40.15	HIGH	45.75	LOW	48.07						

SCHUYLKILL COUNTY

404708076070701. Local number, SC 296.

LOCATION.--Lat 40°47'08", long 76°07'07", Hydrologic Unit 02040203, at Locust Lake State Park.

Owner: U.S. Geological Survey.

AQUIFER.--Mauch Chunk Formation of Early Pennsylvanian age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 242 ft, cased to 40 ft, open hole.

DATUM.--Altitude of land-surface datum is 1,290 ft. Measuring point: Top of plywood shelf, 2.78 ft above land-surface datum. Prior to June 26, 1980, top of casing, 2.30 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--July 1975 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 29.09 ft below land-surface datum, Apr. 6, 1984; lowest, 55.86 ft below land-surface datum, Nov. 14, 1980.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	49.39	50.54	46.03	41.98	47.22	41.25	45.55	46.95	46.69	48.38	48.08	50.44
2	49.36	50.55	46.52	41.88	47.33	41.48	44.06	47.00	46.79	48.40	48.51	50.38
3	49.36	50.67	46.63	41.78	47.26	41.88	44.03	46.18	46.93	48.43	48.90	50.32
4	49.41	50.64	46.50	41.73	47.44	42.03	43.94	42.04	47.01	48.68	49.30	50.49
5	49.59	50.52	46.30	41.73	47.51	42.44	43.81	42.09	47.03	48.79	49.36	50.59
6	49.59	49.62	46.29	41.91	47.52	42.88	43.78	41.71	47.00	48.80	49.42	50.57
7	49.59	49.92	46.11	41.97	47.49	43.19	43.60	41.55	47.29	48.93	49.63	50.55
8	49.73	50.08	46.18	42.24	47.63	43.48	43.51	41.29	47.34	48.94	49.52	50.71
9	49.76	50.20	46.29	42.52	48.02	43.80	43.50	41.03	47.45	48.81	49.54	50.75
10	49.86	50.31	46.20	42.73	48.04	44.25	43.56	41.04	47.68	48.73	49.77	50.76
11	49.74	50.31	46.16	42.94	48.19	44.42	43.76	41.35	47.83	48.75	49.86	50.80
12	49.82	50.40	45.93	43.25	48.27	44.43	43.91	41.78	47.94	48.78	49.93	50.86
13	50.00	50.50	45.97	43.46	45.01	44.17	43.80	42.29	48.05	48.90	50.04	50.86
14	50.12	50.63	46.02	43.78	45.07	44.25	44.04	42.79	48.33	49.02	50.09	51.00
15	50.12	50.73	45.92	44.11	45.34	44.69	44.07	43.21	48.35	48.94	50.09	51.17
16	49.98	50.70	45.88	44.29	45.57	44.89	44.30	43.51	48.13	49.12	50.36	51.18
17	50.02	50.77	45.86	44.64	45.58	44.89	44.41	43.75	47.05	49.22	50.37	51.22
18	50.07	50.83	46.07	44.85	45.67	45.10	44.67	43.94	47.10	49.34	50.47	51.24
19	50.01	50.84	46.07	45.14	45.54	45.31	44.87	44.26	47.29	49.34	50.58	51.40
20	50.04	50.88	45.94	45.33	45.31	45.49	45.11	44.70	47.28	49.35	50.60	51.36
21	49.87	51.02	45.90	45.48	44.98	45.51	45.39	45.26	47.70	49.38	50.65	51.46
22	50.01	51.04	45.47	45.74	44.53	45.55	45.44	45.51	47.77	49.36	50.69	51.52
23	49.77	51.12	43.55	45.78	43.65	45.52	45.49	45.61	48.18	49.44	50.63	51.53
24	49.81	51.11	43.71	45.93	41.29	45.63	45.87	45.81	48.18	49.91	50.71	51.55
25	49.95	51.07	43.88	46.07	40.82	45.70	45.95	46.01	48.38	49.97	50.64	51.58
26	50.07	51.20	43.96	46.28	40.92	45.91	46.30	46.19	48.38	50.02	50.15	51.61
27	50.15	51.27	43.96	46.50	40.96	46.07	46.57	46.36	48.38	49.47	50.05	46.66
28	50.20	51.36	43.91	46.65	41.03	45.96	46.78	46.60	48.38	49.22	50.16	47.66
29	50.25	50.47	43.09	46.82	---	45.89	46.88	46.63	48.38	49.49	50.36	48.32
30	50.36	45.24	42.30	47.07	---	45.94	46.91	46.71	48.40	49.61	50.48	48.71
31	50.49	---	42.16	47.12	---	46.01	---	46.71	---	49.61	50.44	---
MEAN	49.81	50.24	45.17	44.14	45.29	44.34	44.67	43.97	47.59	49.04	49.88	50.42
MAX	50.49	51.36	46.63	47.12	48.27	46.07	46.91	47.00	48.40	50.02	50.71	51.61
MIN	49.25	44.23	41.99	41.62	40.48	41.03	43.39	40.93	46.67	48.21	47.77	45.93
WTR YR 1985	MEAN	47.05	HIGH	40.48	LOW	51.61						

WAYNE COUNTY

263

414333075153201. Local number, WN 64.

LOCATION.--Lat 41°43'33", long 75°15'32", Hydrologic Unit 02040103, at State Game Land Number 159.

Owner: U.S. Geological Survey.

AQUIFER.--Sand and gravel of Glacial Outwash of Quaternary age.

WELL CHARACTERISTICS.--Drilled observation artesian well, diameter 6 in, depth 52 ft, cased to 52 ft, open end.

DATUM.--Altitude of land-surface datum is 1,350 ft. Measuring point: Top of plywood shelf, 2.63 ft above land-surface datum. Prior to Apr. 30, 1980, top of plywood cover, 2.57 ft above land-surface datum.

REMARKS.--None.

PERIOD OF RECORD.--October 1967 to current year.

EXTREMES FOR PERIOD OF RECORD.--Highest water level, 7.88 ft below land-surface datum, Nov. 17, 1972; lowest, 32.77 ft below land-surface datum, Oct. 24, 25, 1980.

WATER LEVEL, IN FEET BELOW LAND-SURFACE DATUM, WATER YEAR OCTOBER 1984 TO SEPTEMBER 1985
MAXIMUM VALUES

DAY	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP
1	30.78	31.14	30.32	26.93	29.25	28.18	27.32	27.36	27.81	29.06	26.54	29.68
2	30.79	31.13	30.24	27.04	29.30	28.24	27.18	27.42	27.71	29.04	26.69	29.72
3	30.83	31.14	29.93	27.03	29.37	28.25	27.01	27.42	27.51	29.00	26.83	29.75
4	30.88	31.14	29.76	26.88	29.42	28.13	26.92	27.38	27.42	28.98	26.97	29.79
5	30.92	31.12	29.61	27.06	29.42	28.01	26.74	27.22	27.32	29.00	27.11	29.82
6	30.96	31.05	29.28	27.12	29.43	28.08	26.72	27.01	27.33	28.94	27.25	29.87
7	30.98	31.03	29.37	27.12	29.47	28.01	26.74	26.84	27.35	28.81	27.35	29.92
8	30.99	31.00	29.26	27.37	29.50	27.78	26.70	26.79	27.37	28.67	27.51	29.96
9	31.02	30.98	29.27	27.53	29.56	27.83	26.68	26.76	27.44	28.45	27.65	29.98
10	31.06	30.95	29.20	27.56	29.60	27.75	26.67	26.68	27.59	28.23	27.80	29.99
11	31.08	30.90	29.14	27.61	29.63	27.68	26.62	26.68	27.69	28.02	27.95	30.03
12	31.11	30.87	29.05	27.67	29.62	27.39	26.65	26.75	27.81	27.85	28.08	30.07
13	31.13	30.83	28.98	27.76	29.56	27.07	26.67	26.84	27.97	27.65	28.20	30.13
14	31.15	30.84	28.97	27.78	29.56	26.86	26.67	27.05	28.14	27.41	28.30	30.16
15	31.18	30.82	28.71	28.04	29.56	26.87	26.61	27.18	28.26	27.14	28.41	30.19
16	31.23	30.75	28.54	28.14	29.56	26.88	26.64	27.27	28.32	26.47	28.54	30.23
17	31.26	30.76	28.26	28.14	29.56	26.76	26.75	27.35	28.43	25.98	28.65	30.27
18	31.28	30.75	28.23	28.21	29.56	26.93	26.76	27.49	28.51	25.86	28.75	30.30
19	31.30	30.71	28.21	28.33	29.58	26.93	26.80	27.61	28.60	25.73	28.85	30.34
20	31.34	30.71	28.05	28.42	29.58	27.05	26.85	27.66	28.72	25.72	28.95	30.36
21	31.34	30.61	28.04	28.51	29.58	27.13	26.85	27.71	28.83	25.79	29.05	30.39
22	31.34	30.62	27.75	28.59	29.54	27.15	26.85	27.76	28.89	25.73	29.16	30.43
23	31.28	30.63	27.74	28.66	29.52	27.12	26.90	27.80	28.96	25.57	29.26	30.46
24	31.24	30.66	27.50	28.71	29.38	27.18	26.92	27.85	28.97	25.50	29.34	30.49
25	31.23	30.69	27.58	28.79	29.28	27.31	26.92	27.96	28.97	25.46	29.37	30.53
26	31.22	30.73	27.54	28.92	28.99	27.35	26.96	28.05	29.02	25.48	29.42	30.55
27	31.18	30.75	27.50	28.94	28.51	27.32	27.04	26.14	29.05	25.67	29.46	30.50
28	31.15	30.75	27.41	29.02	28.50	27.31	27.12	28.16	29.05	25.84	29.53	30.07
29	31.13	30.70	27.34	29.11	---	27.40	27.21	28.19	29.05	26.00	29.57	29.98
30	31.13	30.54	27.38	29.17	---	27.48	27.25	28.14	29.06	26.23	29.59	29.80
31	31.14	---	27.30	29.19	---	27.48	---	27.99	---	26.35	29.65	---
MEAN	31.11	30.82	28.49	27.99	29.36	27.37	26.81	27.35	28.15	27.00	28.32	30.09
MAX	31.34	31.14	30.32	29.19	29.63	28.25	27.32	28.19	29.06	29.06	29.65	30.55
MIN	30.78	30.30	26.94	26.76	28.19	26.63	26.51	26.62	27.25	25.37	26.35	29.65
WTR YR 1985	MEAN	28.57	HIGH	25.37	LOW	31.34						

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FACTORS FOR CONVERTING INCH-POUND UNITS TO INTERNATIONAL SYSTEM UNITS (SI)

The following factors may be used to convert the inch-pound units published herein to the International System of Units (SI). This report contains both the inch-pound and SI unit equivalents in the station manuscript descriptions.

Multiply inch-pound units	By	To obtain SI units
<i>Length</i>		
inches (in)	2.54×10^1	millimeters (mm)
	2.54×10^{-2}	meters (m)
feet (ft)	3.048×10^{-1}	meters (m)
miles (mi)	1.609×10^0	kilometers (km)
<i>Area</i>		
acres	4.047×10^3	square meters (m ²)
	4.047×10^{-1}	square hectometers (hm ²)
	4.047×10^{-3}	square kilometers (km ²)
square miles (mi ²)	2.590×10^0	square kilometers (km ²)
<i>Volume</i>		
gallons (gal)	3.785×10^0	liters (L)
	3.785×10^0	cubic decimeters (dm ³)
	3.785×10^{-3}	cubic meters (m ³)
million gallons	3.785×10^3	cubic meters (m ³)
	3.785×10^{-3}	cubic hectometers (hm ³)
cubic feet (ft ³)	2.832×10^1	cubic decimeters (dm ³)
	2.832×10^{-2}	cubic meters (m ³)
acre-feet (acre-ft)	1.233×10^3	cubic meters (m ³)
	1.233×10^{-3}	cubic hectometers (hm ³)
	1.233×10^{-6}	cubic kilometers (km ³)
<i>Flow</i>		
cubic feet per second (ft ³ /s)	2.832×10^1	liters per second (L/s)
	2.832×10^1	cubic decimeters per second (dm ³ /s)
	2.832×10^{-2}	cubic meters per second (m ³ /s)
gallons per minute (gal/min)	6.309×10^{-2}	liters per second (L/s)
	6.309×10^{-2}	cubic decimeters per second (dm ³ /s)
	6.309×10^{-5}	cubic meters per second (m ³ /s)
million gallons per day	4.381×10^1	cubic decimeters per second (dm ³ /s)
	4.381×10^{-2}	cubic meters per second (m ³ /s)
<i>Mass</i>		
tons (short)	9.072×10^{-1}	megagrams (Mg) or metric tons

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