

SANTEE RIVER BASIN

257

02161000 BROAD RIVER AT ALSTON, SC

LOCATION.--Lat 34°14'35'', long 81°19'11'', Fairfield County, Hydrologic Unit 03050106, on left bank at Southern Railway Alston-Peak trestle, 1.2 mi downstream from Parr Shoals Dam, and at mile 200.2.

DRAINAGE AREA.--4,790 mi².

PERIOD OF RECORD.--October 1896 to December 1907, October 1980 to current year.

REVISED RECORDS.--WRD SC-82-1: 1982(M).

GAGE.--Data collection platform. Datum of gage is 211.91 ft above NGVD of 1929. Oct. 1, 1896 to Dec. 31, 1907, nonrecording gage at same site at different datum.

REMARKS.--Records good except for estimated daily discharges, which are poor. Records for the 1897-1908 water years are poor. Regulation at low and medium flow by powerplants above station.

Discharge, cubic feet per second
WATER YEAR OCTOBER 2002 TO SEPTEMBER 2003
DAILY MEAN VALUES

| DAY | OCT | NOV | DEC | JAN | FEB | MAR | APR | MAY | JUN | JUL | AUG | SEP |
|-------|-------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|
| 1 | 1760 | 3140 | 2080 | 3780 | 5740 | 13500 | 9130 | 4110 | 2980 | 4150 | 17600 | 4480 |
| 2 | 654 | 2820 | 1820 | 5210 | 6010 | 12600 | 4970 | 5780 | 9210 | 15400 | 18400 | 4850 |
| 3 | 704 | 959 | 1670 | 6080 | 5350 | 15800 | 7520 | 4270 | 5740 | 20000 | 7040 | 3910 |
| 4 | 1440 | 945 | 2030 | 5280 | 4270 | 4340 | 5540 | 11700 | 6630 | 25200 | 8450 | 4510 |
| 5 | 1700 | 1280 | 2280 | 3650 | 4240 | 5960 | 4400 | 6810 | 12700 | 13800 | 13400 | 5520 |
| 6 | 1180 | 2870 | 5400 | 3850 | 4000 | 24200 | 6780 | 8330 | 9250 | 11400 | 17900 | 4150 |
| 7 | 840 | 4200 | 8710 | 4090 | 4390 | 27600 | 14400 | 20400 | 12600 | 5240 | 18800 | 4420 |
| 8 | 666 | 4490 | 10400 | 4060 | 5210 | 25300 | 24800 | 24200 | 13700 | 7260 | 20500 | 4320 |
| 9 | 866 | 4210 | 7430 | 3000 | 5680 | 16500 | 27900 | 25100 | 29900 | 4590 | 20000 | 2590 |
| 10 | 1330 | 3230 | 3570 | 3610 | 10600 | 11300 | 31700 | 14000 | 23800 | 5210 | 12300 | 3430 |
| 11 | 1430 | 2280 | 3250 | 3510 | 5520 | 5170 | 45700 | 7190 | 11300 | 10100 | 8000 | 3140 |
| 12 | 1530 | 3810 | 5190 | 3620 | 3710 | 5480 | 51000 | 10600 | 7240 | 3590 | 10600 | 3620 |
| 13 | 1460 | 14400 | 12600 | 4120 | 3620 | 8210 | 34100 | 5270 | 10900 | 3650 | 10900 | 3410 |
| 14 | 2240 | 12900 | 18800 | 2490 | 4220 | 4460 | 22700 | 7500 | 7820 | 15000 | 8960 | 2900 |
| 15 | 1680 | 6930 | 17900 | 2750 | 3770 | 4610 | 8160 | 4640 | 6920 | 16400 | 7210 | 3290 |
| 16 | 2760 | 4560 | 12100 | 3110 | 8020 | 6960 | 8590 | 6630 | 5670 | 5910 | 8440 | 2220 |
| 17 | 6490 | 10600 | 5600 | 4130 | 5770 | 17100 | 11800 | 5650 | 10000 | 6960 | 9820 | 3920 |
| 18 | 10100 | 15400 | 5840 | 3590 | 5090 | 17300 | 16000 | 6490 | 5520 | 6310 | 9330 | 3100 |
| 19 | 7470 | 7630 | 4720 | 2930 | 5720 | 21100 | 40700 | 6100 | 10500 | 5920 | 10900 | 2930 |
| 20 | 4910 | 5880 | 5500 | 2760 | 5150 | 33200 | 50600 | 8250 | 10900 | 5900 | 10800 | 3230 |
| 21 | 3460 | 4910 | 8760 | 2010 | 9150 | 71700 | 27800 | 7550 | 4890 | 8090 | 5020 | 2690 |
| 22 | 2190 | 5390 | 7220 | 2400 | 5710 | 91600 | 16400 | 11300 | 9800 | 4400 | 5330 | 2150 |
| 23 | 1640 | 5230 | 8170 | 2720 | 22500 | 52000 | 9370 | 38400 | 4660 | 5980 | 5830 | 2850 |
| 24 | 1640 | 3740 | 6850 | 3180 | 25900 | 27100 | 10200 | 66400 | 4610 | 5410 | 5250 | 3930 |
| 25 | 1680 | 3220 | 22900 | 3520 | 17200 | 12300 | 9170 | 53600 | 4620 | 5530 | 7720 | 7380 |
| 26 | 1570 | 1790 | 32900 | 3670 | 12500 | 8960 | 7530 | 31500 | 5090 | 4960 | 3690 | 4650 |
| 27 | 1550 | 2770 | 22300 | 2000 | 9480 | 8270 | 7650 | 18000 | 4040 | 4260 | 4130 | 2690 |
| 28 | 1650 | 3480 | 10600 | 2580 | 22300 | 6460 | 12300 | 16100 | 4460 | 3750 | 4800 | 2820 |
| 29 | 1760 | 2260 | 7100 | 2560 | --- | 5260 | 5560 | 8400 | 7470 | 3970 | 4310 | 3970 |
| 30 | 2000 | 2460 | 5030 | 3980 | --- | e9760 | 8610 | 6060 | 4340 | 4320 | 4150 | 4230 |
| 31 | 2820 | --- | 9080 | 14000 | --- | 11600 | --- | 9480 | --- | 5520 | 4080 | --- |
| TOTAL | 73170 | 147784 | 277800 | 118240 | 230820 | 585700 | 541080 | 459810 | 267260 | 248180 | 303660 | 111300 |
| MEAN | 2360 | 4926 | 8961 | 3814 | 8244 | 18890 | 18040 | 14830 | 8909 | 8006 | 9795 | 3710 |
| MAX | 10100 | 15400 | 32900 | 14000 | 25900 | 91600 | 51000 | 66400 | 29900 | 25200 | 20500 | 7380 |
| MIN | 654 | 945 | 1670 | 2000 | 3620 | 4340 | 4400 | 4110 | 2980 | 3590 | 3690 | 2150 |
| CFSM | 0.49 | 1.03 | 1.87 | 0.80 | 1.72 | 3.94 | 3.77 | 3.10 | 1.86 | 1.67 | 2.04 | 0.77 |
| IN. | 0.57 | 1.15 | 2.16 | 0.92 | 1.79 | 4.55 | 4.20 | 3.57 | 2.08 | 1.93 | 2.36 | 0.86 |

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1897 - 2003, BY WATER YEAR (WY)

| | 1897 | 1898 | 1899 | 1900 | 1901 | 1902 | 1903 | 1904 | 1905 | 1906 | 1907 | 1908 |
|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|------|-------|-------|
| MEAN | 4155 | 4436 | 6661 | 8009 | 10250 | 10860 | 8385 | 5661 | 5347 | 3857 | 5565 | 3693 |
| MAX | 17360 | 14500 | 15680 | 18770 | 22650 | 25610 | 20430 | 14830 | 20820 | 9319 | 27730 | 17100 |
| (WY) | 1991 | 1993 | 1908 | 1906 | 1903 | 1903 | 1901 | 2003 | 1903 | 1905 | 1901 | 1901 |
| MIN | 1059 | 1276 | 1894 | 2517 | 2537 | 3685 | 2864 | 1783 | 968 | 849 | 546 | 1042 |
| (WY) | 2002 | 2002 | 2002 | 2001 | 2001 | 1981 | 1986 | 2001 | 2002 | 2002 | 2002 | 1999 |

SANTEE RIVER BASIN

02161000 BROAD RIVER AT ALSTON, SC--Continued

| SUMMARY STATISTICS | FOR 2002 CALENDAR YEAR | | FOR 2003 WATER YEAR | | WATER YEARS 1897 - 2003 | |
|--------------------------|------------------------|--------|---------------------|--------|-------------------------|-------------|
| ANNUAL TOTAL | 1154801 | | 3364804 | | 6366 | |
| ANNUAL MEAN | 3164 | | 9219 | | 11750 | |
| HIGHEST ANNUAL MEAN | | | | | 2002 | |
| LOWEST ANNUAL MEAN | | | | | 1903 | |
| HIGHEST DAILY MEAN | 32900 | Dec 26 | 91600 | Mar 22 | 130000 | Jun 7 1903 |
| LOWEST DAILY MEAN | 48 | Sep 12 | 654 | Oct 2 | 48 | Sep 12 2002 |
| ANNUAL SEVEN-DAY MINIMUM | 200 | Aug 11 | 1030 | Oct 2 | 200 | Aug 11 2002 |
| MAXIMUM PEAK FLOW | | | 96600 | Mar 22 | a 140000 | Jun 7 1903 |
| MAXIMUM PEAK STAGE | | | 24.67 | Mar 22 | a 29.02 | Jun 7 1903 |
| ANNUAL RUNOFF (CFSM) | 0.66 | | 1.92 | | 1.33 | |
| ANNUAL RUNOFF (INCHES) | 8.97 | | 26.13 | | 18.06 | |
| 10 PERCENT EXCEEDS | 6640 | | 20200 | | 12300 | |
| 50 PERCENT EXCEEDS | 2180 | | 5600 | | 4210 | |
| 90 PERCENT EXCEEDS | 467 | | 2250 | | 1600 | |

a At datum then in use.

e Estimated

