

Water-Data Report 2008

07077555 CACHE RIVER NEAR COTTON PLANT, AR

White Basin
Cache Subbasin

LOCATION.--Lat 35°02'08", long 91°19'21" referenced to North American Datum of 1983, in SE ¼ SW ¼ sec.21, T.5 N., R.3 W., Woodruff County, AR, Hydrologic Unit 08020302, on left bank on downstream side of bridge on Woodruff County Road 790, 1.4 mi upstream from Roaring Slough, and 4.2 mi northwest of Cotton Plant.

DRAINAGE AREA.--1,170 mi², from report "Drainage Areas of Streams in Arkansas, White River Basin".

SURFACE-WATER RECORDS

PERIOD OF RECORD.--May 1987 to current year.

REVISED RECORDS.—WDR Arkansas 1989: 1988 (M).

GAGE.--Water-stage recorder. Datum of gage is 164.17 ft above NGVD of 1929. Nonrecording gage Oct 10, 1989 to Sep 27, 1990 at same site and datum.

REMARKS.--Water-discharge records fair except estimated daily discharges, which are poor. Satellite telemeter at station.

EXTREMES FOR CURRENT YEAR.--Maximum discharge, 9,330 ft³/s, Apr 6, gage height, 20.05 ft; minimum discharge, 27 ft³/s, Oct 13, 14, gage height, 3.51 ft.

07077555 CACHE RIVER NEAR COTTON PLANT, AR—Continued

DISCHARGE, CUBIC FEET PER SECOND
WATER YEAR OCTOBER 2007 TO SEPTEMBER 2008
DAILY MEAN VALUES

[e, estimated]

Day	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
1	93	2,350	1,060	4,360	253	2,320	6,730	2,820	170	74	253	980
2	87	2,330	1,270	4,020	329	2,180	7,350	2,750	195	88	301	983
3	125	2,260	1,490	3,720	391	2,080	7,870	2,710	207	100	339	993
4	168	2,150	1,700	3,420	458	2,070	8,760	2,590	218	114	353	e1,070
5	193	2,020	1,810	3,100	534	2,030	9,060	2,470	222	128	337	e1,090
6	193	1,870	1,830	2,800	619	2,000	9,080	2,330	215	137	289	e1,070
7	172	1,700	1,790	2,590	660	2,050	8,940	2,190	191	155	232	1,010
8	136	1,510	1,690	2,420	688	2,210	8,830	2,100	165	171	195	942
9	103	1,330	1,560	2,240	724	2,480	8,810	2,060	142	195	168	899
10	76	1,120	1,430	2,050	694	2,860	8,550	2,040	136	221	168	903
11	54	837	1,290	1,880	e665	3,380	8,300	2,020	130	249	182	972
12	38	555	1,170	1,700	e784	3,750	8,000	1,960	118	257	187	e1,060
13	29	290	1,090	1,520	862	3,950	7,860	1,870	112	258	229	e1,080
14	41	143	979	1,360	1,010	4,150	7,740	1,790	107	256	296	e1,100
15	113	101	1,030	1,210	1,170	4,380	7,460	1,690	103	248	362	e1,120
16	194	79	1,170	1,070	1,330	4,530	7,200	1,580	99	247	427	e1,120
17	248	66	1,350	972	1,510	4,490	6,950	1,470	103	260	459	e1,100
18	448	55	1,660	901	1,740	4,240	6,770	1,350	108	277	454	e1,080
19	538	46	2,010	843	1,970	4,430	6,620	1,210	98	295	415	1,000
20	560	39	2,450	775	2,190	4,460	6,410	1,060	93	319	389	880
21	621	44	3,050	696	2,410	4,610	6,140	939	86	351	475	763
22	738	52	3,670	588	2,620	4,850	5,950	826	81	377	572	654
23	937	41	4,200	474	2,810	5,000	5,670	714	80	394	631	538
24	1,210	41	4,620	363	2,990	5,140	5,450	576	77	382	659	417
25	1,500	83	4,850	296	3,050	5,400	5,090	438	70	334	704	320
26	1,750	275	4,970	238	2,930	5,650	4,590	331	63	264	763	279
27	1,960	402	5,020	212	2,740	5,690	4,070	258	57	218	805	294
28	2,110	518	4,990	195	2,590	5,640	3,700	223	62	184	831	344
29	2,230	668	4,910	191	2,450	5,490	3,350	198	66	170	858	406
30	2,300	851	4,780	179	---	5,540	3,050	175	70	179	907	462
31	2,350	---	4,610	185	---	5,820	---	162	---	208	953	---
Total	21,315	23,826	79,499	46,568	43,171	122,870	204,350	44,900	3,644	7,110	14,193	24,929
Mean	688	794	2,564	1,502	1,489	3,964	6,812	1,448	121	229	458	831
Max	2,350	2,350	5,020	4,360	3,050	5,820	9,080	2,820	222	394	953	1,120
Min	29	39	979	179	253	2,000	3,050	162	57	74	168	279
Ac-ft	42,280	47,260	157,700	92,370	85,630	243,700	405,300	89,060	7,230	14,100	28,150	49,450
Cfsm	0.59	0.68	2.19	1.28	1.27	3.38	5.81	1.24	0.10	0.20	0.39	0.71
In.	0.68	0.76	2.52	1.48	1.37	3.90	6.49	1.43	0.12	0.23	0.45	0.79

STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1987 - 2008, BY WATER YEAR (WY)

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
Mean	613	1,026	2,114	2,311	2,168	2,242	1,818	1,297	684	662	681	560
Max	2,067	3,211	5,102	6,779	5,238	5,759	6,812	3,595	2,026	1,413	2,591	1,570
(WY)	(1991)	(1997)	(2002)	(1991)	(1989)	(1989)	(2008)	(1991)	(2000)	(1994)	(1998)	(2003)
Min	55.9	16.6	24.5	203	377	303	387	217	116	229	162	201
(WY)	(1988)	(2000)	(2006)	(2006)	(2000)	(1996)	(2006)	(1987)	(1988)	(2008)	(2007)	(1987)

07077555 CACHE RIVER NEAR COTTON PLANT, AR—Continued

SUMMARY STATISTICS

	Calendar Year 2007		Water Year 2008		Water Years 1987 - 2008	
Annual total	445,818		636,375			
Annual mean	1,221		1,739		1,353	
Highest annual mean					2,356	
Lowest annual mean					422	
Highest daily mean	6,240	Jan 21	9,080	Apr 6	9,770	Dec 28, 1987
Lowest daily mean	14	Jun 6	29	Oct 13	7.8	Nov 1, 2000
Annual seven-day minimum	20	Jun 2	45	Nov 18	8.6	Oct 28, 2000
Maximum peak flow			9,330	Apr 6	9,950	Dec 28, 1987
Maximum peak stage			20.05	Apr 6	20.23	Dec 21, 2001
Instantaneous low flow			27	Oct 13 ^a	7.8	Dec 1, 1999 ^b
Annual runoff (ac-ft)	884,300		1,262,000		980,300	
Annual runoff (cfs)	1.04		1.48		1.15	
Annual runoff (inches)	14.15		20.20		15.69	
10 percent exceeds	2,960		4,980		3,380	
50 percent exceeds	629		922		772	
90 percent exceeds	102		103		114	

^a Also occurred on Oct 14

^b Also Nov 1-2, 2000

