



Water-Data Report 2010

**02108000 NORTHEAST CAPE FEAR RIVER NEAR CHINQUAPIN, NC**

Cape Fear Basin  
Northeast Cape Fear Subbasin

LOCATION.--Lat 34°49'44", long 77°49'56" referenced to North American Datum of 1983, Duplin County, NC, Hydrologic Unit 03030007, on right bank 540 ft downstream of bridge on North Carolina Highway 41, 0.5 mi downstream of Muddy Creek, and 1.2 mi west of Chinquapin.

DRAINAGE AREA.--599 mi<sup>2</sup>.

**SURFACE-WATER RECORDS**

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

REVISED RECORDS.--WDR NC-81-1: Drainage area.

GAGE.--Water-stage recorder. Datum of gage is 17.28 ft above National Geodetic Vertical Datum of 1929. Satellite telemetry at streamgage.

REMARKS.--Records good except those for estimated daily discharges, which are poor. Minimum discharge for period of record and current water year also occurred September 26, 2010.

EXTREMES OUTSIDE PERIOD OF RECORD.--Flood in 1908 reached a stage of 22.6 ft at old bridge site 1,000 ft upstream from current gage site. Flood in 1928 reached a stage 0.8 ft lower than the flood in 1908, from information by North Carolina State Highway Commission.

## 02108000 NORTHEAST CAPE FEAR RIVER NEAR CHINQUAPIN, NC—Continued

**DISCHARGE, CUBIC FEET PER SECOND**  
**WATER YEAR OCTOBER 2009 TO SEPTEMBER 2010**  
**DAILY MEAN VALUES**

[e, estimated]

Day	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
1	262	46	608	2,030	2,270	960	763	103	282	29	168	38
2	183	46	610	2,050	2,040	911	730	94	217	26	151	30
3	134	48	1,430	1,990	1,960	1,430	680	84	179	24	130	26
4	107	50	2,120	1,830	1,900	1,900	692	77	154	22	92	22
5	96	50	2,350	1,570	1,870	2,000	688	73	133	20	72	18
6	98	51	2,610	1,320	2,810	2,010	614	73	112	17	104	15
7	110	51	2,770	1,170	4,780	1,970	529	68	90	15	115	13
8	106	49	2,640	1,060	5,540	1,970	466	63	72	13	88	12
9	98	47	2,430	956	5,550	1,880	415	56	59	12	67	11
10	90	50	2,500	849	5,170	1,600	376	50	50	11	52	9.7
11	82	e80	2,830	751	4,470	1,300	345	46	44	41	41	9.0
12	75	e500	3,080	686	3,550	1,270	322	42	39	28	34	9.9
13	72	2,890	3,010	659	2,720	1,290	315	39	37	18	29	9.3
14	73	3,540	2,710	640	2,160	1,260	307	37	33	42	26	8.2
15	83	3,710	2,380	599	1,900	1,220	290	34	33	44	22	7.9
16	109	3,330	2,030	568	1,780	1,130	268	32	33	48	18	7.7
17	113	2,700	1,640	669	1,670	1,010	246	31	179	41	15	7.3
18	107	2,180	1,300	979	1,550	894	219	32	313	32	13	8.2
19	97	1,850	1,260	1,130	1,410	810	192	46	369	33	26	6.8
20	87	1,560	1,390	1,190	1,270	754	173	73	320	48	20	6.2
21	78	1,340	1,470	1,140	1,140	702	173	84	229	37	32	5.6
22	72	1,160	1,470	1,360	1,040	655	159	81	167	44	72	5.4
23	66	1,130	1,350	1,760	1,110	617	156	81	130	83	103	5.1
24	60	1,200	1,180	1,920	1,170	577	150	97	101	66	82	4.8
25	54	1,180	1,130	2,190	1,210	549	148	120	95	47	107	4.4
26	48	1,120	2,300	2,810	1,210	529	148	167	71	39	129	5.4
27	43	1,020	3,260	3,480	1,140	498	141	258	51	42	118	102
28	43	884	3,540	3,600	1,050	471	129	289	39	36	113	600
29	43	760	3,260	3,330	---	489	120	331	33	35	95	855
30	44	670	2,630	2,930	---	664	111	369	31	105	69	4,030
31	45	---	2,100	2,590	---	734	---	351	---	178	49	---
<b>Total</b>	2,778	33,292	65,388	49,806	65,440	34,054	10,065	3,381	3,695	1,276	2,252	5,892.9
<b>Mean</b>	89.6	1,110	2,109	1,607	2,337	1,099	336	109	123	41.2	72.6	196
<b>Max</b>	262	3,710	3,540	3,600	5,550	2,010	763	369	369	178	168	4,030
<b>Min</b>	43	46	608	568	1,040	471	111	31	31	11	13	4.4
<b>Cfsm</b>	0.15	1.85	3.52	2.68	3.90	1.83	0.56	0.18	0.21	0.07	0.12	0.33
<b>In.</b>	0.17	2.07	4.06	3.09	4.06	2.11	0.63	0.21	0.23	0.08	0.14	0.37

## STATISTICS OF MONTHLY MEAN DATA FOR WATER YEARS 1940 - 2010, BY WATER YEAR (WY)

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep
<b>Mean</b>	454	473	691	1,034	1,180	1,190	825	462	393	541	637	692
<b>Max</b>	3,237	3,063	2,225	2,548	4,399	3,506	2,958	1,901	1,953	3,922	2,681	7,329
<b>(WY)</b>	(2000)	(2007)	(1949)	(1993)	(1998)	(1983)	(1973)	(1969)	(1961)	(1962)	(1955)	(1999)
<b>Min</b>	7.59	15.6	59.6	158	249	261	145	64.9	17.3	14.7	13.8	11.0
<b>(WY)</b>	(1955)	(1955)	(1955)	(1955)	(1955)	(1955)	(1986)	(1995)	(1994)	(2009)	(1954)	(1954)

02108000 NORTHEAST CAPE FEAR RIVER NEAR CHINQUAPIN, NC—Continued

SUMMARY STATISTICS

	Calendar Year 2009		Water Year 2010		Water Years 1940 - 2010	
<b>Annual total</b>	194,406.4		277,319.9			
<b>Annual mean</b>	533		760		713	
<b>Highest annual mean</b>					1,243	1973
<b>Lowest annual mean</b>					279	1951
<b>Highest daily mean</b>	3,710	Nov 15	5,550	Feb 9	29,900	Sep 18, 1999
<b>Lowest daily mean</b>	7.4	Jul 11	4.4	Sep 25	4.4	Sep 25, 2010
<b>Annual seven-day minimum</b>	8.1	Jul 10	5.3	Sep 20	5.3	Sep 20, 2010
<b>Maximum peak flow</b>			5,640	Feb 8	30,700	Sep 18, 1999
<b>Maximum peak stage</b>			13.97	Feb 8	23.51	Sep 18, 1999
<b>Instantaneous low flow</b>			<sup>a</sup> 4.4	Sep 25	<sup>a</sup> 4.4	Sep 25, 2010
<b>Annual runoff (cfsm)</b>	0.889		1.27		1.19	
<b>Annual runoff (inches)</b>	12.07		17.22		16.18	
<b>10 percent exceeds</b>	1,450		2,280		1,680	
<b>50 percent exceeds</b>	297		167		399	
<b>90 percent exceeds</b>	35		23		56	

<sup>a</sup> See Remarks.

