



Water-Data Report 2011

**355323089552101, 15N11E28CAC1**

Mississippi embayment aquifer system  
Wilcox Group

Mississippi County, AR

LOCATION.--Lat 35°53'23", long 89°55'21" referenced to North American Datum of 1927, in SW ¼ NE ¼ SW ¼ sec.28, T.15 N., R.11 E., Mississippi County, AR, Hydrologic Unit 08020203, near Dogwood.

**WATER-QUALITY RECORDS**

WELL CHARACTERISTICS.--Depth 1,400 ft. Upper casing diameter 8.00 in; top of first opening 1,337 ft, bottom of last opening 1,400 ft.

DATUM.--Land-surface datum is 250 ft above National Geodetic Vertical Datum of 1929. Measuring point: Undefined, 2.00 ft above land-surface datum, Mar 8, 1968, to current year.

PERIOD OF RECORD.—Jun 1970, Apr 1975, Jun 1982, Jul 1987, Jul 1992, Aug 1996, Jul 2001, Aug 2006, and Aug 2011.

**WATER-QUALITY DATA  
WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

Part 1 of 11

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	pH, water, unfiltered, field, standard units (00400)	Specific conductance, water, unfiltered, µS/cm at 25 °C (00095)	alpha-HCH-d6, surrogate, water, filtered (0.7 micron glass fiber filter), percent recovery (91065)	Diazinon-d10, surrogate, water, filtered (0.7 micron glass fiber filter), percent recovery (91063)	Dissolved solids dried at 180 °C, water, filtered, mg/L (70300)	Dissolved solids, water, filtered, sum of constituents, mg/L (70301)	Dissolved solids, water, filtered, tons per acre-foot (70303)	Hardness, water, mg/L as CaCO <sub>3</sub> (00900)	Calcium, water, filtered, mg/L (00915)
08-16-2011	1400	6.8	207	103	103	131	125	.18	27.2	7.04

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**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

Part 2 of 11

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	Magnesium, water, filtered, mg/L (00925)	Potassium, water, filtered, mg/L (00935)	Sodium adsorption ratio, water, number (00931)	Sodium fraction of cations, percent in equivalents of major cations (00932)	Sodium, water, filtered, mg/L (00930)	Alkalinity, water, filtered, inflection-point, incremental titration method, field, mg/L as CaCO <sub>3</sub> (39086)	Bicarbonate, water, filtered, inflection-point, incremental titration method, field, mg/L (00453)	Carbon dioxide, water, unfiltered, mg/L (00405)
08-16-2011	1400	2.22	3.50	2.50	67	29.6	94.0	115	32

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

Part 3 of 11

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	Chloride, water, filtered, mg/L (00940)	Fluoride, water, filtered, mg/L (00950)	Silica, water, filtered, mg/L as SiO <sub>2</sub> (00955)	Sulfate, water, filtered, mg/L (00945)	Ammonia plus organic nitrogen, water, filtered, mg/L as N (00623)	Ammonia, water, filtered, mg/L as N (00608)	Nitrate plus nitrite, water, filtered, mg/L as N (00631)	Nitrite, water, filtered, mg/L as N (00613)	Orthophosphate, water, filtered, mg/L (00660)
08-16-2011	1400	1.11	.05	11.1	9.76	.24	.207	< .02	< .001	.383

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

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[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	Orthophosphate, water, filtered, mg/L as P (00671)	Barium, water, filtered, µg/L (01005)	Beryllium, water, filtered, µg/L (01010)	Cadmium, water, filtered, µg/L (01025)	Chromium, water, filtered, µg/L (01030)	Cobalt, water, filtered, µg/L (01035)	Copper, water, filtered, µg/L (01040)	Iron, water, filtered, µg/L (01046)	Lead, water, filtered, µg/L (01049)
08-16-2011	1400	.125	91.5	< .1	< 0.4	< 0.6	M	< 1	2,910	.12

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**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

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[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	Lithium, water, filtered, µg/L (01130)	Manganese, water, filtered, µg/L (01056)	Molybdenum, water, filtered, µg/L (01060)	Nickel, water, filtered, µg/L (01065)	Silver, water, filtered, µg/L (01075)	Strontium, water, filtered, µg/L (01080)	Vanadium, water, filtered, µg/L (01085)	Boron, water, filtered, µg/L (01020)	2,6-Diethyl-aniline, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82660)
08-16-2011	1400	33	105	< 2	< 1	< 1	326	< 0.6	66	< .006

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

Part 6 of 11

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Date	Sample start time	2-Chloro-4-isopropyl-amino-6-amino-s-triazine, water, filtered, recoverable, µg/L (04040)	Acetochlor, water, filtered, recoverable, µg/L (49260)	Alachlor, water, filtered, recoverable, µg/L (46342)	alpha-HCH, water, filtered, recoverable, µg/L (34253)	Atrazine, water, filtered, recoverable, µg/L (39632)	Azinphos-methyl, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82686)	Benfluralin, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82673)	Butylate, water, filtered, recoverable, µg/L (04028)	Carbaryl, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82680)
08-16-2011	1400	< .006	< .010	< .008	< .004	< .008	< .120	< .014	< .004	< .060

**WATER-QUALITY DATA**  
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Date	Sample start time	Carbofuran, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82674)	Chlorpyrifos, water, filtered, recoverable, µg/L (38933)	cis-Permethrin, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82687)	Cyanazine, water, filtered, recoverable, µg/L (04041)	DCPA, water, filtered (0.7 micron glass fiber filter), recoverable, µg/L (82682)	Desulfinyl-fipronil amide, filtered, recoverable, µg/L (62169)	Desulfinyl-fipronil, water, filtered, recoverable, µg/L (62170)	Diazinon, water, filtered, recoverable, µg/L (39572)	Dieldrin, water, filtered, recoverable, µg/L (39381)
08-16-2011	1400	< .060	< .004	< .010	< .022	< .008	< .029	< .012	< .006	< .008

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**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

Part 8 of 11

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; mg/L, milligrams per liter; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; <, less than; M, presence verified but not quantified]

Date	Sample start time	Disulfoton,	EPTC,	Ethal-	Ethoprop,	Fipronil sulfide,	Fipronil sulfone,	Fipronil,	Fonofos,	Lindane,
		water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,					
		µg/L (82677)	µg/L (82668)	µg/L (82663)	µg/L (82672)	µg/L (62167)	µg/L (62168)	µg/L (62166)	µg/L (04095)	µg/L (39341)
08-16-2011	1400	< .04	< .006	< .006	< .016	< .012	< .024	< .018	< .005	< .004

**WATER-QUALITY DATA**  
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Date	Sample start time	Linuron,	Malathion,	Methyl parathion,	Metolachlor,	Metribuzin,	Molinate,	Napropamide,	p,p'-DDE,	Parathion,
		water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,
		µg/L (82666)	µg/L (39532)	µg/L (82667)	µg/L (39415)	µg/L (82630)	µg/L (82671)	µg/L (82684)	µg/L (34653)	µg/L (39542)
08-16-2011	1400	< .060	< .016	< .008	< .020	< .012	< .004	< .008	< .002	< .020

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2010 TO SEPTEMBER 2011**

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Date	Sample start time	Pebulate,	Pendi-methalin,	Phorate,	Prometon,	Propachlor,	Propanil,	Propargite,	Propyzamide,	Simazine,
		water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,	water, filtered (0.7 micron glass fiber filter), recoverable,
		µg/L (82669)	µg/L (82683)	µg/L (82664)	µg/L (04037)	µg/L (04024)	µg/L (82679)	µg/L (82685)	µg/L (82676)	µg/L (04035)
08-16-2011	1400	< .016	< .012	< .020	< .012	< .006	< .010	< .02	< .004	< .006

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Part 11 of 11

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Date	Sample start time	Tebu-	Terbacil,	Terbufos,	Thioben-	Triallate,	Trifluralin,	Alpha	Gross beta
		thiuron,	water,	water,	carb,	water,	water,	radioactivi	radioactivi
		water,	water,	water,	water,	water,	water,	ty, water,	ty, water,
		filtered	filtered	filtered	filtered	filtered	filtered	filtered,	filtered,
		(0.7 micron	Th-230	Cs-137					
		glass fiber	curve,	curve,					
		filter),	filter),	filter),	filter),	filter),	filter),	picocuries	picocuries
		recover-	recover-	recover-	recover-	recover-	recover-	per liter	per liter
		able,	able,	able,	able,	able,	able,	(04126)	(03515)
		µg/L	µg/L	µg/L	µg/L	µg/L	µg/L		
		(82670)	(82665)	(82675)	(82681)	(82678)	(82661)		
08-16-2011	1400	<.03	<.024	<.02	<.016	<.005	<.018	2.2	3.2