

## Water-Data Report 2012

**0208117904 ALBEMARLE SOUND NEAR DURANT ISLAND, NC**

 Albemarle-Chowan Basin  
 Albemarle Subbasin

LOCATION.--Lat 36°01'05", long 75°57'36" referenced to North American Datum of 1983, Tyrrell County, NC, Hydrologic Unit 03010205, downstream from Alligator River and approximately 4 mi northwest of Durant Island.

DRAINAGE AREA.--Indeterminate.

**WATER-QUALITY RECORDS**

PERIOD OF RECORD.--July to August 2012.

REMARKS.--Station operated in 2012 to define water quality in the Albemarle Sound as part of the National Monitoring Network for U.S. Coastal Waters and their Tributaries. Water-quality samples were collected through a zone equal to double the secchi depth using the depth-integration sampling technique.

**WATER-QUALITY DATA  
WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012**

Part 1 of 5

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; m, meters; mg/L, milligrams per liter; mm Hg, millimeters of mercury; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; --, no data; <, less than]

Date	Sample start time	Medium name	Sample type	Barometric pressure, mm Hg (00025)	Temperature, air, °C (00020)	Depth to bottom from water surface, at sampling location, meters (82903)		Dissolved oxygen, water, unfiltered, mg/L (00300)	water, unfiltered, field, standard units (00400)	pH, water, unfiltered, standard units (00400)	Specific conductance, water, unfiltered, µS/cm at 25°C (00095)
07-13-2012	1400	Surface water	Regular	766	27.5	5.60	8.3	8.0	7,670		
08-28-2012	1000	Surface water	Regular	761	28.0	18.0	8.7	8.4	7,680		

**0208117904 ALBEMARLE SOUND NEAR DURANT ISLAND, NC—Continued**

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012**

Part 2 of 5

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; m, meters; mg/L, milligrams per liter; mm Hg, millimeters of mercury; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; --, no data; <, less than]

Date	Sample start time	Temperature, water, °C (00010)	Transparency, water, in situ, Secchi disc, m (00078)	micromole s of photons per square meter per second (99988)	Sampling depth, m (00098)	Photosynthetically active radiation (average flux density on a horizontal surface during measurement interval), micromole s of photons per square meter per second (99988)		Dissolved solids dried at 180°C, water, filtered, mg/L (70300)		Suspended solids, water, unfiltered, mg/L (00530)	Calcium, water, filtered, mg/L (00915)	Magnesium, water, filtered, mg/L (00925)	Potassium, water, filtered, mg/L (00935)
						Sampling depth, m (00098)	Dissolved solids dried at 180°C, water, filtered, mg/L (70300)	Suspended solids, water, unfiltered, mg/L (00530)	Calcium, water, filtered, mg/L (00915)	Magnesium, water, filtered, mg/L (00925)	Potassium, water, filtered, mg/L (00935)		
07-13-2012	1400	28.2	0.85	1,280	1.7	4,350	15	49.4	143	42.2			
08-28-2012	1000	27.2	.80	1,020	1.6	4,310	< 15	55.1	149	45.6			

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012**

Part 3 of 5

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; m, meters; mg/L, milligrams per liter; mm Hg, millimeters of mercury; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; --, no data; <, less than]

Date	Sample start time	Sodium, water, filtered, mg/L (00930)	Alkalinity, water, filtered, mg/L as CaCO <sub>3</sub> (29801)	Chloride, method, laboratory, mg/L as CaCO <sub>3</sub> (39086)	Fluoride, field, water, filtered, mg/L (00940)	Silica, water, filtered, mg/L as SiO <sub>2</sub> (00955)	Sulfate, water, filtered, mg/L (00945)	Alkalinity, water, filtered, mg/L as CaCO <sub>3</sub> (pH 4.5) titration, inflection-point, fixed endpoint, incremental titration		Ammonia plus organic nitrogen, water, unfiltered, mg/L as N (00625)		Ammonia, water, filtered, mg/L as N (00608)	
								Chloride, method, laboratory, mg/L as CaCO <sub>3</sub> (39086)	Fluoride, field, water, filtered, mg/L (00940)	Silica, water, filtered, mg/L as SiO <sub>2</sub> (00955)	Sulfate, water, filtered, mg/L (00945)	Ammonia plus organic nitrogen, water, unfiltered, mg/L as N (00625)	Ammonia, water, filtered, mg/L as N (00608)
07-13-2012	1400	1,220	40.1	37.4	2,420	0.23	1.31	318	0.71	0.020			
08-28-2012	1000	1,140	--	36.0	2,360	.17	.858	306	.91	.024			

**0208117904 ALBEMARLE SOUND NEAR DURANT ISLAND, NC—Continued**

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012**

Part 4 of 5

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; m, meters; mg/L, milligrams per liter; mm Hg, millimeters of mercury; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; --, no data; <, less than]

Date	Sample start time	Nitrate plus nitrite, water, filtered, mg/L as N (00631)	Nitrite, water, filtered, mg/L as N (00613)	Orthophosphate, water, filtered, mg/L as P (00671)	Phosphorus, unfiltered, mg/L as P (00665)	Chlorophyll a, phyto-plankton, chromato-graphic-fluorometric method, µg/L (70953)	Aluminum, water, filtered, µg/L (01106)	Cobalt, water, filtered, µg/L (01035)	Copper, water, filtered, µg/L (01040)
07-13-2012	1400	<.040	<.001	<.004	0.037	14.9	<11.0	2.10	<4.0
08-28-2012	1000	<.040	.002	<.004	.039	30.2	<11.0	.980	<4.0

**WATER-QUALITY DATA**  
**WATER YEAR OCTOBER 2011 TO SEPTEMBER 2012**

Part 5 of 5

[CaCO<sub>3</sub>, calcium carbonate; N, nitrogen; P, phosphorus; SiO<sub>2</sub>, silicon dioxide; m, meters; mg/L, milligrams per liter; mm Hg, millimeters of mercury; °C, degrees Celsius; µS/cm, microsiemens per centimeter; µg/L, micrograms per liter; --, no data; <, less than]

Date	Sample start time	Iron, water, filtered, µg/L (01046)	Lead, water, filtered, µg/L (01049)	Manganese, water, filtered, µg/L (01056)	Molybdenum, water, filtered, µg/L (01060)	Nickel, water, filtered, µg/L (01065)	Zinc, water, filtered, µg/L (01090)
07-13-2012	1400	<3.2	0.169	2.87	2.84	0.64	<7.0
08-28-2012	1000	<12.8	<.125	2.08	2.93	.51	<7.0