

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION II

**DATE:**

**SUBJECT:** New York Bight Monitoring Program Observations, 2002

**FROM:** Helen Grebe, Regional Coastal Monitoring Coordinator  
Monitoring Operations Section (DESA-MOS)

**TO:** Barbara A. Finazzo, Director  
Division of Environmental Science and Assessment (DESA)

**THRU:** Randy Braun, Acting Chief  
Monitoring and Assessment Branch (DESA-MAB)

Attached for your information is the fourth update of the 2002 NY Bight Monitoring Program. This update covers the period from June 15 - 21, 2002.

Attachment

cc: Jane Kenny, 2RA, via LAN  
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Richard Caspe, DECA, via LAN  
Walter Mugdan, DEPP, via LAN  
Bonnie Bellow, 2CD, via LAN  
Herbert Barrack, 2OPM, via LAN  
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2MOS-MAB-DESA:HGrebe:hg:x6797:bldg209:finalized:6/21/02

2MOS-MAB      2MOS-MAB      2MAB-DESA

Grebe

Glogower

Braun

UPDATE OF NY BIGHT MONITORING PROGRAM FROM June 15 - 21, 2002.

**NY Bight Sampling has been as follows:**

June 15	NY/NJ Harbor Complex	Canceled due to weather
June 17	NY/NJ Harbor Complex	Overflight
June 18	NY/NJ Harbor Complex	Overflight
	Long Island Beaches	Rockaway to Shinnecock Inlet
June 19	NY/NJ Harbor Complex	Overflight
	NJ Beaches	Sandy Hook to Long Branch
June 20	NY/NJ Harbor Complex	Overflight
	NJ Beaches	Long Branch to Cape May
June 21	NY/NJ Harbor Complex	Overflight
	NJDEP 200 Station Network	Sandy Hook to Strathmere

**Projected:**

June 22	NY/NJ Harbor Complex	Overflight
June 24	NY/NJ Harbor Complex	Overflight
	NJDEP 200 Station	Strathmere to Delaware Bay
June 25	Network	Overflight
	NY/NJ Harbor Complex	Rockaway to Shinnecock Island
June 26	Long Island Beaches	Overflight
	NY/NJ Harbor Complex	Sandy Hook to Cape May
June 27		Overflight
	New Jersey Beaches	NYB20's, JC14, JC 27, JC 41, JC53
June 28	NY/NJ Harbor Complex	Overflight
	Perpendiculars	JC61, JC69, JC75, JC85, JC90
	NY/NJ Harbor Complex	
	Perpendiculars	

### **Floatables**

The New York/New Jersey Complex was monitored for floatables a total of five times from June 15 - 21, 2002. The floatables run was canceled on June 15 due to weather. The Harbor Complex was clear of significant floatables on all five days.

### **Bacteria**

Bacteriological samples were collected along the Long Island coast from Rockaway (LIC01) to Shinnecock Inlet (LIC28) on June 18, and along the New Jersey coast from Sandy Hook (JC01) to Long Branch (JC13) on June 19 and from Long Branch (JC14) to Cape May Point (JC99) on June 20. The samples were tested for fecal coliform (FC) and enterococcus bacteria.

Along the Long Island coast, the highest FC count, 6 FC/100ml, occurred at Cedar Island Beach (LIC16). The highest enterococcus count, 1 enterococcus/100ml, occurred at Point Lookout (LIC10), Cedar Island Beach (LIC16), and Moriches Inlet West. The majority of the remaining results was zero.

Along the New Jersey coast, the highest FC count, 49 FC/100ml, occurred at Shark River Inlet (JC26). The highest enterococcus count, 20 enterococci/100ml, occurred at Strathmere (JC85). The majority of the remaining results was zero.

### **Phytoplankton**

Phytoplankton samples were collected along the New Jersey coast, in Raritan Bay, Sandy Hook Bay, Barnegat Bay, Great Bay, Great Egg Harbor and Delaware Bay, on June 20. Samples were given to the New Jersey Department of Environmental Protection, Bureau of Marine Water Monitoring's Leeds Point Laboratory for analysis. The results, reported by NJDEP are as follows

#### **Raritan/Sandy Hook Bay Area**

The waters of Raritan Bay were generally clear with sparse algal concentrations. No toxic species were detected.

In Sandy Hook Bay waters, there was a significant amount of detritus with sparse algal concentrations. No toxic species were detected.

#### **New Jersey Coastal Area**

The coastal waters, near Long Branch were generally clear with algal concentrations sparse. *Prorocentrum* sp. was present, but at levels so low it is not considered to be toxic.

The coastal waters, near Manasquan, were generally clear with algal concentrations sparse. *Prorocentrum* sp. was present, but at levels so low it is not considered to be toxic.

The coastal waters near Cape May were generally clear with sparse algal concentrations. No toxic species were detected.

### **Barnegat Bay Area**

In the northern portion of Barnegat Bay, algal concentrations were sparse, with significant amounts of detritus. No toxic species were detected.

In the section of Barnegat Bay from near Barnegat Inlet to near Tuckerton, picoplankton was dominant. This is the area where the picoplankton, *Aureococcus anophagefferens*, has caused extensive "Brown Tides" in recent years. Monitoring being performed by Dr. Mary Downes-Gastrich of the NJDEP's Division of Science and Research, has indicated a bloom of *Aureococcus anophagefferens* occurring in this area. Estimated cell counts by light microscopy, ranged from 73,000 (station 1670D) to 280,000 cells/ml (station 1800B) on 6/20/02. No toxic species were detected.

### **Great Bay and Great Egg Harbor**

The waters of the Great Bay and Great Egg Harbor were generally clear with sparse algal concentrations. No toxic species were detected.

### **Delaware Bay/Capeshore Area**

The waters of the Delaware Bay contained a sparse mix of diatoms with very few flagellates. Both stations contained significant amounts of detritus. No toxic species were detected.

## **NJDEP Daily Surveillance Report**

On June 20, during a routine surveillance flight, Virginia Loftin of NJDEP Atlantic Coastal Bureau reported a 1.5 mile long slick of trash observed in the surf and extending 50 yards offshore from Harvey Cedars south to North Beach. The county and local health departments were notified.

Other observations included, bright red water visible in the surf to approximately ½ mile offshore from Ventnor south to Corson's Inlet. Ventnor lifeguards also reported the red water to the Atlantic County Health Department. The NJDEP Bureau of Marine Water Monitoring collected a water sample outside Corson's Inlet. The results showed a mix of non-toxic dinoflagellate species in well below bloom concentrations. Afternoon observations from the beach in Ventnor reported large amounts of seaweed in the surf and washing onto the beaches.

