

Day in the Life of the Hudson River 10/05/2023

Fort Totten, Queens, NY

EAST RIVER MILE: 15.2

Salt Front: ~RM 52

John Bowne High School-Michelle Theodorou

26 students, 11th-12th grade, 7 adults

Latitude 40.79339°N & Longitude -73.780723°W



Location: Little Bay, Fort Totten Park, Queens, NY

Surrounding Land Use: 80% Urban/Residential, 30% Beach

Sampling Site: Forested, Beach, Altered Banks, Rip Rap, Marshy

Shoreline: 50% Sandy & 50% Rocky

Water: Calm

River Bottom: Muddy, Sandy, Weedy & Rocky

Plants in the water: 20% Seaweed

*NR = Not read/recorded

<i>ITEM</i>	<i>Time</i>	<i>Reading</i>		<i>Comments</i>	
<i>Physical</i>					
<i>Air Temperature</i>	10:00 AM 10:23 AM 11:26 AM 12:26 AM	23°C 20°C 22.24°C 22.8°C	73.3°F 68°F 72°F 73°F		
<i>Wind Speed:</i>	10:25 AM	<i>Anemometer</i> 4 mph	<i>Beaufort</i> 2	<i>Direction</i> Southeast	
<i>Weather today</i>	10:00 AM	<25% Cloud Cover	No Rain		
<i>Weather the past 3 days:</i>	Sunny with high temperatures, Clear				
<i>Tides-</i>	<i>Time</i>	<i>Rising, Falling, Unchanged</i>		<i>Height (cm)</i>	
	10:30 AM 11:30 AM 12:30 PM	- Unchanged (slack) Unchanged (slack)		46.02 cm 46.02 cm 46.02 cm	
<i>Current-</i>	<i>Time</i>	<i>Cm/sec</i>	<i>Knots</i>	<i>North/South</i>	<i>Ebb/Flood/Slack</i>
	10:54 AM 11:27 AM 11:57 AM 12:27 PM	0.078 0.078 0.078 0.078			
<i>Water Temperature-</i>	10:35 AM	29°C		84.2°F	

	11:11 AM 11:25 AM 11:40 AM	26°C 22°C 22°C	79°F 71.6°F 71.6°F			
Turbidity- Long Sight Tube (120 cm)	11:00 AM	36.5 cm 35.5 cm				
Chemical						
Student Salinity- Hydrometer	10:55 AM	19,000 ppm	19 ppt			
DO – Hach Drop Count Kit	<i>Time</i>	<i>Temp</i>	<i>ppm DO</i>	<i>% saturation</i>		
	10:45 AM 11:11 AM 12:04 PM	15°C 20.56°C 26°C	17 ppm 10 ppm 14 ppm	150% 120% 150%		
pH – Color Match Test Kit	11:24 AM 11:45 AM	8 7.4				
Nitrates- Drop Test Kit	11:35 AM	5 ppm				
Phosphates- Drop Test Kit	11:40 AM	0.5 ppm				
Biological						
Fish-Seine (5 Hauls)	Number	Name	Length of longest	Notes		
10:00 AM-12:00 PM	1 1 16 1 1	Striped Killifish (M) Atlantic Menhaden Atlantic Silverside Cunner Northern Pipefish	5.08 cm 3.81 cm 11.4 cm 7.62 cm 10.16 cm			
Fish Totals	TOTAL: 20	Diversity: 5				
Macroinvertebrates	Number	Name	Length of longest			
	4 14 10 3	Blue Crab (M) Palaemonetes Shrimp Periwinkle Snails Hermit Crabs	15.24 cm 4.06 cm 2.54 cm 2.3 cm			
Macroinvertebrate Totals	TOTAL: 31	Diversity: 4				
Sediment Core -NR	Time	Oxid Top	H₂S Smell	Oil	Grain Size	Other Features

Boats-NR					
Commercial/ Recreational	Time	Name	Color	Southbound/ Northbound	Light/ Loaded