

**Day in the Life of the Hudson River 10/05/2023**  
**Henry Hudson Riverfront Park, Columbia County, NY**

**RIVER MILE: 117**

*Salt Front: ~ RM 52*

**Chatham High School-Sandra Fischer**

**Cary Institute of Ecosystem Studies- Ashley Alred**

**32 students, 11<sup>th</sup> & 12<sup>th</sup> grade, 4 adults**

**Latitude 42.25369°N & Longitude -73.79935°W**



**Location:** Henry Hudson Riverfront Park, City of Hudson, Columbia County, NY

**Surrounding Land Use:** 100% Industrial/Commerical

**Sampling Site:** Waterfront with banks altered to include wooden & concrete bulkheads and large riprap on shoreline.

**Shoreline:** 100% Rocky

**Water:** Calm

**River Bottom:** 100% Rocky

**Plants in the water:** 5% Water Chestnuts & 5% Duckweed

\*NR = Not read/recorded

<i>ITEM</i>	<i>Time</i>	<i>Reading</i>		<i>Comments</i>	
<i>Physical</i>					
<i>Air Temperature</i>	8:56 AM	17.5° C	64.04° F		
	9:26 AM	18.2° C	64.76° F		
	12:30 PM	25.7° C	78.26° F		
	12:42 PM	25.7° C	78.26° F		
<i>Wind Speed:</i>	NR 12:41 PM	<i>Anemometer</i> 1.5 mph	<i>Beaufort</i> 2 1	<i>Direction</i> North	
<i>Weather today</i>	10:30 AM	<25% Cloud Cover	No Rain		
<i>Weather the past 3 days:</i>	Warm and clear; foggy in mornings				
<i>Tides- Tide Stick</i>	<i>Time</i>	<i>Rising, Falling, Unchanged</i>		<i>Height (cm)</i>	
	12:10 PM	N/A		57 cm	
	12:15 PM	Falling		50 cm	
	12:20 PM	Falling		48 cm	
	12:25 PM	Falling		47 cm	
	12:30 PM	Falling		45 cm	
	12:35 PM	Falling		44 cm	
<i>Current-</i>	<i>Time</i>	<i>Cm/sec</i>	<i>Knots</i>	<i>North/South</i>	<i>Ebb/Flood/Slack</i>
	9:26 AM	43.29	0.84		Ebb
	9:59 AM	11.18	0.22		Ebb
	10:00 AM	18.28			Ebb

	10:40 AM 12:33 PM 12:40 PM	30.48 25.4 25.4	0.49 0.49		Ebb Ebb Ebb
<b>Water Temperature-</b>	10:49 AM 10:50 AM 12:38 PM	20.9°C 20.65°C 20.45°C		69.62°F 69.17°F 68.81°F	
<b>Turbidity- Long Sight Tube (120 cm)</b>	9:35 AM 10:36 AM	33.93 cm 37 cm			
<b>Secchi Disk (cm)</b>	12:36 PM	57.6 cm			

**Chemical**

<b>Standardized Salinity- Low Range Quantabs</b>	12:50 PM	30 ppm Cl-	54 ppm Total Salinity	1.4 quantab reading
<b>DO – Meter/Probe</b>	<i>Time</i>	<i>Temp</i>	<i>ppm DO</i>	<i>% saturation</i>
	9:55 AM 10:54 AM 12:02 PM	19°C 21.8°C 20.4°C	8.31 ppm 8.25 ppm 8.31 ppm	89.7% 90% 90%
<b>pH – Meter</b>	10:42 AM	7.6		
<b>Test Stripes</b>	10:46 AM	7		

**Biological**

<b>Fish-Seine (6 Hauls)</b>	<b>Number</b>	<b>Name</b>	<b>Length of longest</b>	<b>Notes</b>		
9:00 AM-11:00 AM & 12:00 PM-1:00 PM	17 1 25 77	Banded Killifish Striped Bass Pumpkinseed Bluegill	9.5 cm 7.3 cm 14 cm 7.5 cm			
<b>Fish Totals</b>	<b>TOTAL: 120</b>	<b>Diversity: 4</b>				
<b>Macroinvertebrates</b>	<b>Number</b>	<b>Name</b>	<b>Length of longest</b>			
	2	Blue Crab (M)				
<b>Macroinvertebrate Totals</b>	<b>TOTAL:</b>	<b>Diversity:</b>				
<b>Sediment Core</b>	<b>Time</b>	<b>Oxid Top</b>	<b>H<sub>2</sub>S Smell</b>	<b>Oil</b>	<b>Grain Size</b>	<b>Other Features</b>
7.62 cm		No	No	No	Abundant: mud Common: gravel & pebbles	Abundant: Brick Rare: Wood

**Boats**

<b>Commercial/Recreational</b>	<b>Time</b>	<b>Name</b>	<b>Color</b>	<b>Southbound/Northbound</b>	<b>Light/Loaded</b>
Recreational	9:10 AM		White	Southbound	
Recreational	9:26 AM		White	Southbound	
Commercial	9:26 AM		White	Southbound	Light
Commercial	12:31 PM		Black	Southbound	Loaded
Commercial	12:44 PM		Black	Southbound	Light