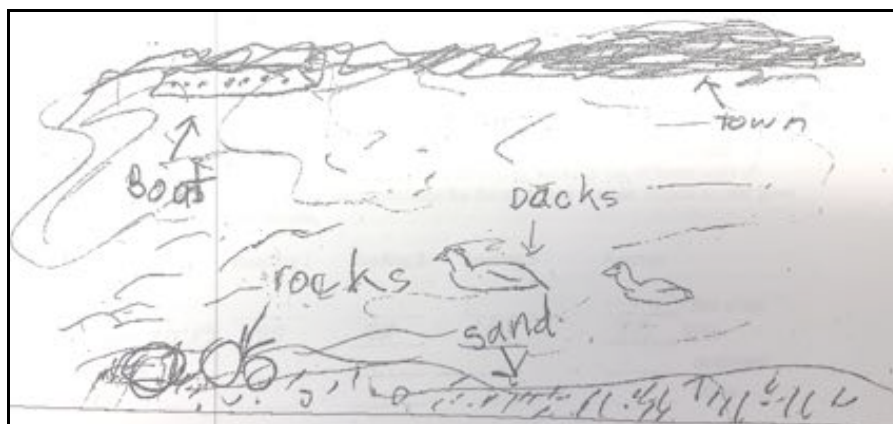


**Day in the Life of the Hudson River 10/16/18 Data**  
**UPPER NYACK STATE PARK- LOWER BEACH**  
 Nyack, NY  
**RIVER MILE: 30.4**  
*Salt Front: ~ RM 24*  
**Blue Rock School-**  
**52 students 4<sup>th</sup> -8<sup>th</sup> grade, 10 adults**  
**Laurie Seeman & Joanna Dickey, Strawtown Studios**  
**Charlotte Jack, Lorraine Madden, Blue Rock School**  
**Latitude 41.119759 N & Longitude – 73.912429 W**



**Location:** Upper Nyack State Park, South Beach, Nyack, Rockland County, NY

**Area:** Near Hook Mountain Sandy Beach right side of riverfront area, park/boat launch, sandy beach area on the point with riprap

**Surrounding Land Use:** 30% forested, 50% beach, 20% parking lot

**Sampling Site:** Sandy beach with retaining wall enclosing it and behind a lot of trees, picnic tables, sandy and rocky at edges, covered with vegetation beyond the beach, stone wall, riprap shore, concrete docking. Boat launch spits the site and steep bank behind picnic table area. Sandy beach is only available during lower to mid tide. Pipe enter river ~25 ft. south of sampling area.

**Shoreline:** Beach area, shoreline riprap (large rocks), concrete docking

**Water Depth:** 1 foot

**Plants in area:** 5% of area is covered with plants in the water (*Vallisneria Americana*/water celery)

**River Bottom description:** sandy, muddy

<i>ITEM</i>	<i>Time</i>	<i>Reading</i>		<i>Comments</i>
<b>Physical</b>				
<i>Air Temperature</i>	10:30 AM	15 ° C	60 ° F	
	12:00 PM	15.56 ° C	59 ° F	
<i>Wind Speed: Beaufort Force</i>		6	North	Water choppy
<i>Weather today</i>	No rain, partly cloudy			
<i>Weather recently</i>	The last three days it was humid, cloudy, cold, and drizzly			
<b>Water Temperature</b>	10:45 AM	16, 16, 16	Avg: 16 ° C	60.8 ° F
	11:30 AM	15, 16, 16	Avg: 15.6 ° C	60.08 ° F
	12:53 PM	16, 16, 16	Avg: 16 ° C	60.8 ° F
	2:15 PM	15, 16, 15	Avg: 15.3 ° C	59.54 ° F
<b>Turbidity - short sight tube</b>	12:53 PM	100 JTUs, 40 JTUs, 100 JTUs		Average: 80 JTUs
<b>Chemical</b>				

<i>Salinity- High Range Quantabs</i>	10:45 AM	1.0, 0.8 <i>Estimation of Quantab Units</i>		<i>* Below Detection for this method</i>
<i>DO – Indicator Tabs</i>	<i>Time</i>	<i>Temp</i>	<i>ppm DO</i>	<i>% saturation</i>
	10:15 AM	16° C	4	88%
<i>pH – Indicator solution</i>	10:45 AM	7.5, 7.5		
<i>Nitrates-Estuary Wide Sampling Kit (low resolution kit)</i>	10:45 AM	5, 5, 5 Avg: *5 ppm		<i>*5ppm NO<sub>3</sub><sup>-</sup> is very high;</i>
<i>Phosphates- Estuary Wide Sampling Kit (low resolution )</i>		1, 1, 2 Avg: 1.3 ppm		<i>* Estuary wide kit is</i>
<b><i>Fish</i></b>	<b><i>Number</i></b>	<b><i>Name</i></b>	<b><i>Length of longest</i></b>	
<i>Seine- 28 foot net</i>	3 7 1 3	American Eel Striped Bass Brown Bullhead Alewife		
<b>Fish Totals</b>	<b>TOTAL: 14</b>	<b>Diversity: 4</b>		
<b><i>Macroinvertebrates</i></b>	<b><i>Number</i></b>	<b><i>Name</i></b>	<b><i>Length of longest</i></b>	
	21 6 5	Mud Crab Blue Crab Shore Shrimp		1 female 3 females
<b>Macroinvertebrate Totals</b>	<b>TOTAL: 32</b>	<b>Diversity: 3</b>		
<b><i>Tides-</i></b>	<b><i>Time</i></b>	<b><i>Rising, Falling, Unchanged</i></b>	<b><i>Height (cm)</i></b>	<b><i>Rate of Tidal Change (cm/min)</i></b>
	10:30 AM 10:45 AM 11:10 AM 11:30 AM 11:50 AM 1:15 PM 1:34 PM 1:54 PM	Rising Rising Rising Rising Rising Rising Rising Rising	1 3 3 6.5 20 30 34 45	- 0.133 - 0.175 0.675 0.118 0.211 0.55
<b><i>Current-</i></b>	<b><i>cm/second</i></b>	<b><i>Knots</i></b>	<b><i>North/South</i></b>	<b><i>Ebb/Flood/ Still</i></b>
11:48 AM 1:34 PM	4.8 9	0.093 0.175	South North	Ebb Flood
<b><i>Boat Traffic-recreational</i></b>	<b><i>Name</i></b>	<b><i>Color</i></b>	<b><i>North or South</i></b>	<b><i>Loaded or Light</i></b>
10:35 AM 12:00 PM 12:00 PM	Recreational Recreational Recreational		South North South	Light Light Light