

Day in the Life of the Hudson River 10/14/21

Nutten Hook Unique Area

RIVER MILE: 124.5

Salt Front: ~ 49

Elena Oldendorf & Averill Park High School

63 students & 9 adults

Latitude 42.358271 N & Longitude – 73.78818 W

Location: Nutten Hook, Green County, NY

Area:

Surrounding Land Use: 80% forested and 70% beach

Sampling Site: Beach, forested bluff, large march behind bluff, DEC public access, used for picnics, water access after walking down to the beach area.

Shoreline: Beach that is 40% sandy, 40% muddy and 20% rocky

Plants in area: Water Chestnuts

River Bottom description: muddy and sandy

*NR = Not read/recorded

| <i>ITEM</i> | <i>Time</i> | <i>Reading</i> | | <i>Comments</i> |
|--|--|--|---|-----------------------------|
| <i>Physical</i> | | | | |
| <i>Air Temperature</i> | 10:30 AM 11:45 AM | 24 ° C 24 ° C | 75 ° F 75 ° F | |
| <i>Wind Speed:</i> | 11:45 AM 12:40 PM | <i>Anemometer</i> 1.3 mph 1.5 mph | <i>Beaufort</i> 1 1 | <i>Direction</i> NW W |
| <i>Weather today</i> | 11:35 AM 12:30 PM | 51-75% cloud cover >75% cloud cover | No rain No rain | |
| <i>Weather the past 3 days:</i> | Dry | | | |
| <i>Tides-</i> | <i>Time</i> | <i>Rising, Falling, Unchanged</i> | <i>Height (cm)</i> | |
| | 11:35 AM 11:40 AM 11:45 AM 12:30 PM 12:35 PM 12:40 PM 12:45 PM | NA Unchanged/slack Falling/ebb Falling Falling Falling Falling | 45 cm 45 cm 44 cm 34 cm 32 cm 31 cm 29 cm | |
| <i>Current-</i> | <i>Time</i> | <i>Cm/sec</i> | <i>Knots</i> | <i>North/South</i> |
| | NR | NR | NR | NR |
| <i>Water Temperature-</i> | 10:40 AM 11:40 AM | 14° C 17.6° C | 57.2 ° F 63.7 ° F | |
| <i>Turbidity- Long Sight Tube</i> | 12:15 PM | 55.8 cm | | |
| <i>Chemical</i> | | | | |
| <i>Salinity- Meter/probe</i> | 10:40 AM 11:40 AM | 130 ppm 172 ppm | | |
| <i>Low Range quantabs</i> | 11:44 AM | 61 ppm CL- | 110 ppm TS | |
| <i>Standardized Salinity- Low range Quantabs</i> | 12:57 PM | BD | | |
| <i>DO – Meter/probe</i> | <i>Time</i> | <i>Temp</i> | <i>ppm DO</i> | <i>% Saturation</i> |
| | 10:50 AM 11:42 AM | 14° C 17.6° C | 8.36 7.9 | 63% 80% |

| | | | | | |
|----------------------------------|-------------------------------|--|------------------------------------|--|--|
| <i>pH – Meter</i> | 10:40 AM 11:40 AM | 7.5 7.2 | 11:50 hydrion paper 11:50 meter | 7.0 7.47 | |
| <i>Nitrates-</i> | | NR | | | |
| <i>Phosphates-</i> | | NR | | | |
| Biological | | | | | |
| <i>Fish -</i> | <i>Number</i> | <i>Name</i> | <i>Length of longest</i> | <i>Length of smallest</i> | |
| *16 pulls | 13 10 21 6 2 1 | Herring sp. American Shad Spottail Shiner Banded Killifish Smallmouth Bass Tessellated Darter | NR | NR | |
| Fish Totals | TOTAL: 53 | Diversity: 6 | | | |
| <i>Macroinvertebrates</i> | <i>Number</i> | <i>Name</i> | <i>Length of longest</i> | <i>Length of smallest</i> | |
| | | | NR | NR | |
| Macroinvertebrate Totals | TOTAL:0 | Diversity: 0 | | | |
| Sediment Core | | | | | |
| Length | H2S smell | Oxid Top | Oil | Grain Size | Other Features |
| 11 cm | No | No | No | Rare: clay, gravel, pebbles Abundant: mud, sand | Rare: leaves, wood, brick, coal Common: living vegetation |
| Boats | | | | | |
| | Time | Name | Color | North/Southbound | Light/Loaded |
| Commercial | 10:32 AM | RTC100 barge | Black, tan, red | Southbound | Light |
| | 11:34 AM | NR | Black & white | NR | NR |
| | 11:47 AM | NR | Blue | Southbound | Loaded |
| Residential - NR | 11:48 AM | | Black/White | Southbound | |
| | 12:30 PM | | White | Southbound | |