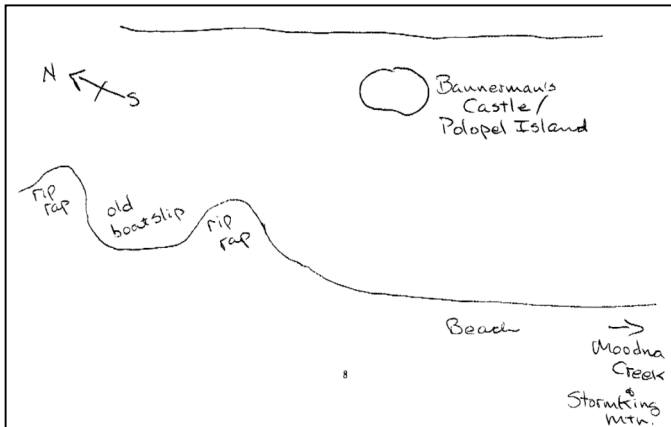


**Snapshot Day 10/8/09 Data  
(Salt Front RM 60.3)  
RIVER MILE 58**

**Kowawese Unique Area, Plum Point, New Windsor, Orange County, NY  
Pam Golben & Judy Onufer, Museum of the Hudson Highlands  
Bernadette Kleister, Bishop Dunn Memorial School - 7th grade – 34 students  
GPS Latitude 41°27'44"N Longitude 74°00'41"W**



**Location:** Sandy beach at Kowawese, New Windsor, Orange County, Public Shore, Picnic Area



**Area:** Sandy beach with scattered tidal debris, forested above beach to South, grass and trees and picnic area to North. Rip Rap, broken wood in boat launch area. Parking above beach area. No swimming. People fish and launch boats here.

**Surrounding Land Use:** Forested 25%, beach 50%, Urban/residential 25%

**Sampling Site:** sandy beach (cove), vegetation 500 ft. south of

sampling site, Much wood washed up on beach.

**Plants in area:** < 25% of sampling area – 75% of plants Water celery – sporadic not dense; 25% - other vegetation.

Other trees in area – mostly wooded – oak, tulip, poplar and maple.

**Water depth:** <1 meter; EXTREMELY LOW TIDE

**River Bottom** –Mostly mud/sand with a few larger rocks. Due to low tide we were able to walk out to weed beds offshore.

<i>ITEM</i>	<i>Time</i>	<i>Reading 1</i>	<i>Reading 2</i>	<i>Comments</i>
<b><i>Physical</i></b>				
Air Temperature	10:44 AM	20°C 64°F		
	11:17 AM	19°C 63°F		
Wind Speed	2 knot	N		
Cloud Cover	Partly cloudy			
Weather today	No rain,			
Weather recently	rained previous day			
<b><i>Water Surface</i></b>	calm			
<b><i>Water Temperature</i></b>	10:45 AM	63.7° F 17.6°C		
	11:15 AM	61.7° F 16.5°C		
	12:30 PM	63.1° F 17.3°C		
<b><i>Water Calm</i></b>	yes			
<b><i>Turbidity sight tube</i></b>	11:15 AM	55 JTU		
<b><i>Chlorophyll</i></b>	10:30 AM	0.1		
<b><i>Chemical</i></b>				
DO (drop kit)	10:30 AM	11.0 mg/L	17.6°C	112%
pH (litmus paper)	10:45 AM	7.0		
	11:15 AM	7.0		
	12:30 PM	7.0		
Salinity Quantabs – low range strips –	10:30 AM	0.009 % 0.010 % 0.010 %	Average 61 ppm Cl	76.5 ppm salinity
<b><i>Fish Catch</i></b> 40 ft. seine X ~200 ft. pull	<b><i>Number Caught</i></b>	<b><i>Species</i></b>	<b><i>CPUE</i></b>	<b><i>Seine</i></b> 2 seines
	1	American Eel	7 inch	
	2	Banded Killifish	4 inch	
	15	Blue crab	1.5-3 inch	
	7	4 spine Stickleback	1-2 inch	
	5	Pumpkinseed Sunfish	3 inch	
	6	Striped Bass	2-3 inches	
	4	White Perch	3 inches	

	12	Tesselated Darter	2-3.5 inches	
<b>Seine</b>	<b>Time</b>	<b>Total Catch</b>	<b>Length Pull</b>	<b>CPUE</b>
1	9:30 AM	25	200	
2	9:45 AM	25	200	
<b>Tides</b>	<b>Time</b>	<b>Height in cm</b>	<b>Rate of change</b>	<b>Rising/falling</b>
	10:35 AM	17.5 cm	0.55 cm/min	Rising
	10:53 AM	27.5 cm	0.55 cm/min	Rising
	11:25 AM	40.0 cm	0.38 cm/min	Rising
	11:47 AM	55.0 cm	1.47 cm/min	Rising
	12:45 PM	70.0 cm	0.26 cm/min	Rising
<b>Currents</b>	10:41 AM	Flood		
	11:30 AM	Flood		
<b>Core</b>	7 inches	5 inch top – sand layer	2 inch lower layer - clay	Color dark gray, little or no organics, slight metallic smell
<b>Traffic</b>	9:45 AM	Barge	Southbound	Full
	11:15 AM	Speedboat	North	2 passengers
	12:45 PM	Paddleboat	South	Full
	12:56 PM	Sailboat	South	
<b>Other</b>	Saw an adult Bald Eagle come down off the hillside, catch a fish, and then go back to its feeding perch.at low tide between Moodna Creek outlet and Sloop Hill			