HydroEnvironmental
SOLUTIONS, INC.

October 30, 2009

Mr. Ray Tartaglione
RJT Motorists Services, Inc.
101 Westmoreland Avenue
White Plains, New York 10606

RE: Hen Island Percolation Holes
Rye, New York

Dear Mr. Tartaglione:

As requested, HydroEnvironmental Solutions, Inc. (HES) observed the installation of two percolation test holes on October 15, 2009 at the above referenced site (**Figure 1**). The following letter summarizes the results of the field activities completed on this date.

Field Activities

On October 15, 2009, HES observed the installation of two percolation test holes, one on the southeast side of the island and one on the northwest side of the island. The holes were excavated using a post hole digger and rock bar. The holes were logged by the on-site HES hydrogeologist to their completion depths. The following descriptions detail the two excavated post holes:

PH-1: Southwest side of Hen Island

- Completion depth: 36 inches
- Upon return to inspect for the presence of water in the test hole approximately 30 minutes after installation, the hole had been backfilled by others.
- Hole located approximately 10 feet from the visible high tide boundary and approximately 3 feet from the sewage pit servicing the Minard cottage.
- Soil composed of fine sandy loam, mottling observed at 32 inches below grade.
- Seasonal high water table believed to be 32 inches below grade based on field observations.

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PH-2: Northwest side of Hen Island

- Completion depth: 32 inches
- Groundwater was observed at the test hole completion depth. Water noted entering hole.
- Hole located approximately 8 feet from the visible high tide boundary and approximately 5 feet from the Sternberg cottage sewage pit.
- Soil composed of fine sandy loam and silty loam, mottling observed at 30 inches below grade.
- Seasonal high water table believed to be 30 inches below grade based on field observations.

Discussion of Results

The results of percolation test hole installation observations indicate that the soils beneath the investigated areas of Hen Island are composed of fine sandy loam. The seasonal high water table was documented based on the presence of grey mottling at 30 and 32 inches below grade. Additionally, at the percolation hole located on the northwest side of the island (PH-2), HES noted groundwater entering the hole at the completion depth of 32 inches below grade.

Based on field observations, the areas investigated are not suitable for subsurface wastewater disposal systems (septic systems) according to the current Westchester County Department of Health (WCDOH) Regulations without significant alteration to any proposed disposal area. The WCDOH requires a minimum of 5 feet of separation from the bottom of the leaching field to the water table and 7 feet of separation from the bottom of the leaching field to bedrock. Thus, construction or use of subsurface leaching fields for the sanitary treatment of wastewater effluent streams on Hen Island would result in septic impacts (nitrogen loading and pathogen impacts) to the groundwater beneath the island. Additionally, given the presence of the documented shallow water table beneath the island, impacts to the nearby Long Island Sound due to mounding effects from effluent breakout at grade will result.

Conclusions

1. Observation and logging of percolation test holes during installation indicated that both the seasonal high and observed water table are within 32 inches of grade at the two investigated sites on the southeast and northwest sides of Hen Island.

2. Based on the noted soil type and the high water table beneath the investigated areas, modern engineered subsurface wastewater disposal systems in compliance with WCDOH septic system regulations are not feasible on Hen Island without substantial modifications to a proposed site (i.e.: fill material and re-grading).

3. HES believes the current subsurface disposal of residential wastewater on Hen Island is impacting the groundwater and the waters of the Long Island Sound based on soil type and the presence of a high water table.

Please contact me at (914) 276-2560 if you have any questions or should you require any additional information regarding this matter.

Very truly yours,
HydroEnvironmental Solutions, Inc.

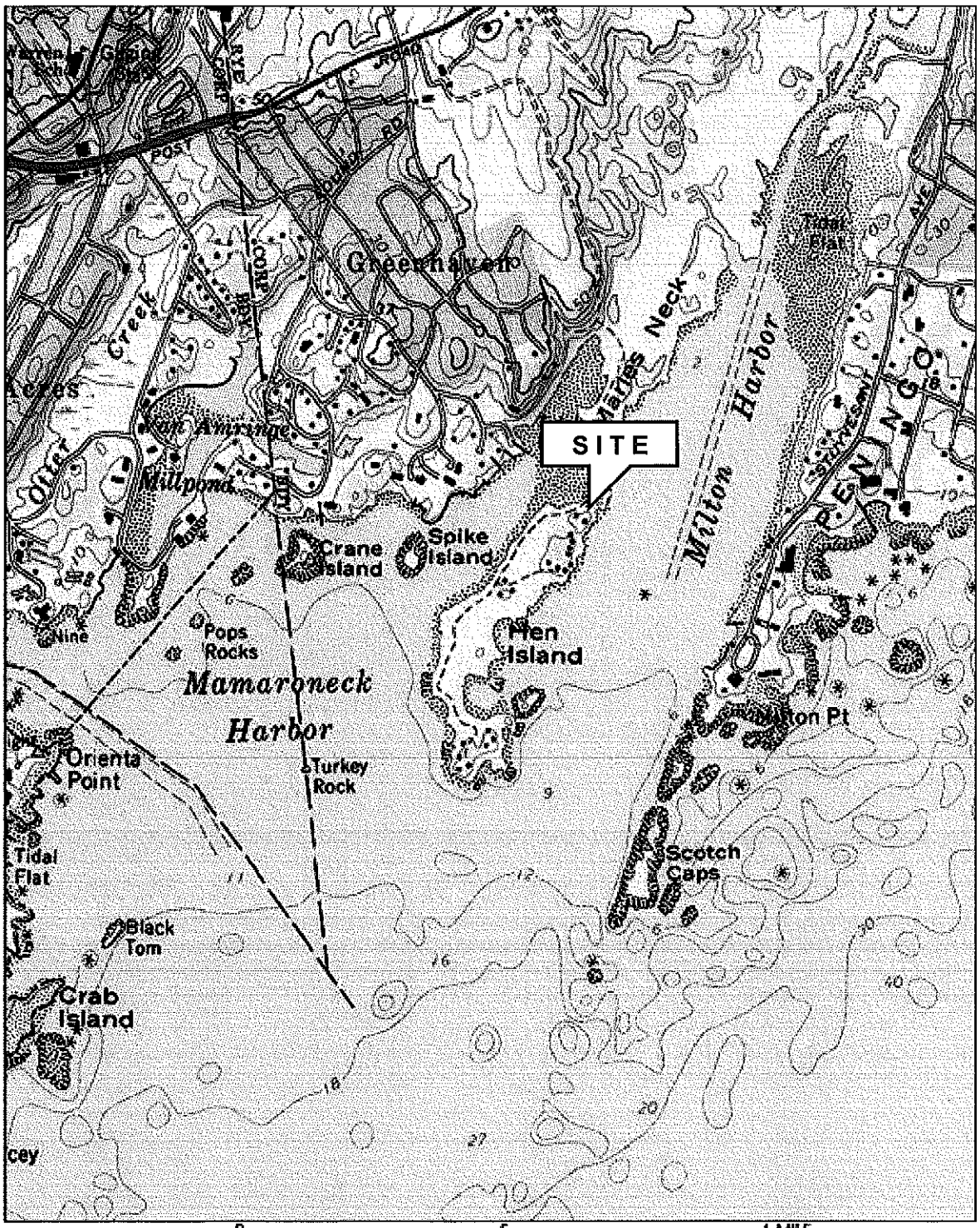
William A. Canavan, CG, PG
President

Enclosures

cc: File

FIGURE 1
SITE LOCATION MAP

Hen Island
Rye, New York



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