Special Note

The partners of the SLELO PRISM have identified 24 Priority Conservation Areas on which we conduct early detection surveillance on a two year rotation. This report is to be considered as an addendum to the original field report. The original report is attached to the end of this report.

St. Lawrence Eastern Lake Ontario Partnership for Regional Invasive Species Management

2014 Field Survey
Addendum to
Whetstone Reservoir

Aquatic Invasive Species (Hydrilla and Water Chestnut) Assessment

SLELO-PRISM Early Detection Surveillance

June 16 & 17 2014

Report prepared by Elizabeth MacEwen and Sabrina Dreythaler

Figure 1. Panoramic view of Whetstone Reservoir. Photo taken by Elizabeth MacEwen

Summary

In June of 2014, field crew members Elizabeth MacEwen and Sabrina Dreythaler returned to the Whetstone Reservoir, Figure 1, to conduct early detection surveillance targeting Water Chestnut (*Trapa natans)*, Hydrilla (*Hydrilla verticillata)*, Asian Clam (*Corbicula fluminea)* and Rusty Crayfish (*Orconectes rusticus).*

Figure 2. Shoreline of G&W road, location of Rusty Crayfish and Asian Clam surveying

Methods

This survey was conducted using the same methods used in the 2012 survey. However, in 2012 the survey was split up into two separate searches (one for Water Chestnut and one for Hydrilla). In 2014 both species were surveyed for

at the same time. In 2014 it was decided that Asian Clam and Rusty Crayfish should also be surveyed for. Crayfish and clams were surveyed by looking manually under rocks along the shore of the G&W Road Figure 2 while aquatic plant populations were sampled using the standard rake toss method (waypoints and travel route are presented in Figure 3). Data for the 2014 field season is presented in Table 1.

Observations

There were no occurrences of Water Chestnut, Hydrilla, Asian Clam or Rusty Crayfish. There were also no occurrences of any Prevention or Target Management Species[1]. Dominant floating vegetation observed included Yellow Pond Lily (*Nuphar lutea)* and Water Shield (*Brasenia schreberi).* The submerged vegetation was dominated by *Elodea.*

No occurrences of SLELO-PRISM Prevention Species were detected during the 2014 survey of the perimeter.

Figure 3. *Map of HPAs and route taken around Whetstone Reservoir.*

[1]For a list of targeted and prevention species, see the SLELO-PRISM 2012-2016 Strategic Plan, pp. 36 & 37

Table 1. Rake toss data collected at HPAS with correlating waypoints, continues on following page

Location: Whetstone Reservoir					Dates: 6/16/14, 6/17/14	
HPA	**Waypoint**	**Latitude Longitude**	**Throw**	**Depth(ft)**	**# Species**	**# Invasives**
218	**015**	43.674217	1	1.5	3	0
		-75.50501	2		1	0
219	**016**	43.675529	1	1.5	3	0
		-75.50567	2		5	0
220	**017**	43.676526	1	4	0	0
		-75.50742	2		0	0
221	**018**	43.678496	1	3	1	0
		-75.50743	2		3	0
222	**019**	43.680752	1	2	3	0
		-75.50729	2		5	0
223	**020**	43.682504	1	3.5	2	0
		-75.50832	2		3	0
224	**021**	43.682763	1	2	1	0
		-75.50893	2		2	0
225	**022**	43.682559	1	5	1	0
		-75.50953	2		2	0
226	**023**	43.682233	1	2.5	3	0
		-75.50941	2		2	0
227	**024**	43.680525	1	2	1	0
		-75.50887	2		1	0
228	**025**	43.678566	1	2.5	2	0
		-75.50903	2		2	0
229	**026**	43.676529	1	2.5	2	0
		-75.50833	2		3	0
230	**027**	43.674571	1	1.5	0	0
		-75.50803	2		3	0
231	**028**	43.673908	1	5.5	1	0
		-75.51003	2		3	0
232	**029**	43.673904	1	2	2	0
		-75.51154	2		1	0
233	**030**	43.672762	1	3	1	0
		-75.51028	2		3	0
234	**031**	43.672339	1	4	5	0
		-75.50793	2		2	0
235	**001**	43.670073	1	3	2	0
		-75.51397	2		1	0
236	**002**	43.670018	1	3.5	1	0
		-75.51594	2		2	0

237	**003**	43.66889	1	3	1	0
		-75.519	2		2	0
238	**004**	43.667564	1	1	2	0
		-75.52178	2		1	0
239	**005**	43.668087	1	5	2	0
		-75.52273	2		1	0
240	**006**	43.668819	1	2	4	0
		-75.52234	2		2	0
241	**007**	43.669797	1	2.5	2	0
		-75.51967	2		1	0
242	**009**	43.670826	1	3	1	0
		-75.51639	2		2	0
243	**010**	43.671412	1	3	3	0
		-75.51474	2		3	0
244	**011**	43.672169	1	2	2	0
		-75.514	2		2	0
245	**012**	43.672395	1	1.5	2	0
		-75.51285	2		4	0
246	**013**	43.672964	1	4	3	0
		-75.51203	2		0	0
247	**014**	43.671988	1	3	3	0
		-75.51019	2		2	0
248	**034**	43.672123	1	3.5	3	0
		-75.50782	2		4	0
249	**033**	43.671037	1	2	1	0
		-75.50589	2		1	0
250	**032**	43.673501	1	2	2	0
		-75.50465	2		2	0

Original Report

St. Lawrence Eastern Lake Ontario Partnership for Regional Invasive Species Management

Whetstone Reservoir

SLELO-PRISM Water Chestnut and Hydrilla Surveillance 2012

June 5 & 6 (Water Chestnut); July 31 & August 1 (Hydrilla)

Report drafted by Greg Chapman and Mike McHale, 6/7/12 & 8/21/12.

Figure 1: Panoramic view of Whetstone Reservoir, June 6, 2012. Photo by Mike McHale.

Introduction and Background

Whetstone Reservoir is an approximately 161-acre freshwater artificial water body located within Whetstone Gulf State Park and the Lesser Wilderness State Forest in the eastern Tug Hill region of New York. Water supplied by the Whetstone Creek inlet at the western end of the reservoir is retained by a small concrete dam at the northeastern end of the water body.Public access is provided by an unimproved boat launch near the dam. G&W Road also provides access along the southern portion of the reservoir for shoreline fishing and launching of canoes and other small watercraft.

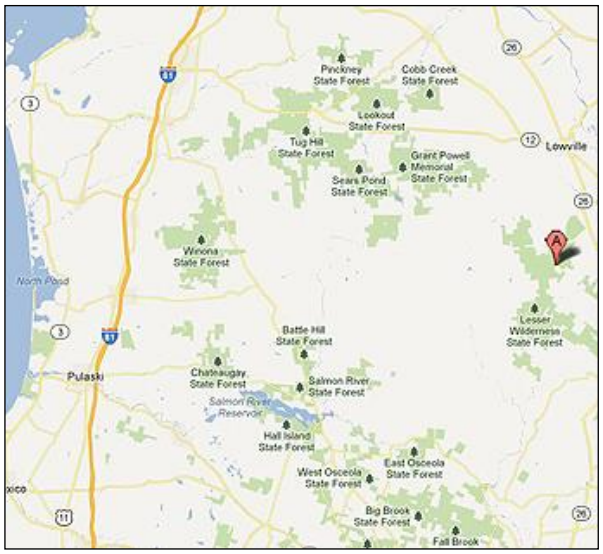

Figure 2: Map showing location of Whetstone Reservoir within the Tug Hill region.

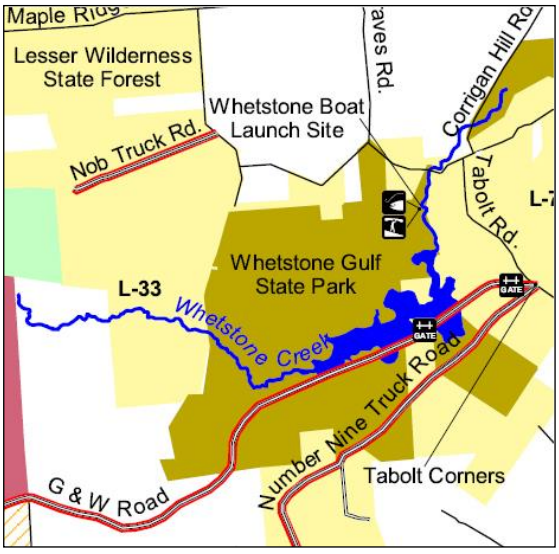

Figure 3: Map showing Whetstone Reservoir and surrounding area.

SLELO PRISM
c/o The Nature Conservancy
269 Ouderkirk Road. Pulaski, NY 13142
Rob Williams, PRISM Coordinator

Actions Taken

A survey targeting Water Chestnut (*Trapa natans*) and other aquatic and riparian invasive species (for species list, see the SLELO-PRISM 2012 – 2016 Strategic Plan, pp. 36 – 37) was undertaken by SLELO-PRISM seasonal employees Mike McHale and Greg Chapman on June 5 & 6, 2012. The reservoir was visually inspected both from accessible shoreline and via canoe, which was launched at various locations on each day. See Figure 6 for a map detailing the survey route.

Figure 4: Picture showing an area dominated by water shield (Brasenia schreberi) at Whetstone Reservoir, June 6, 2012. Photo by Mike McHale.

A subsequent survey targeting Hydrilla (*Hydrilla verticillata*) was undertaken by SLELO-PRISM seasonal employees Mike McHale and Greg Chapman on July 31 & August 1, 2012. During this survey, rake toss sampling was conducted at various locations throughout the reservoir. See Figure 7 and Table 1 for survey map and results.

Invasive species occurrences were to be recorded using the iMapInvasives Observation Field Form and reported to the iMapInvasives database. A Garmin hand-held GPS unit was used to record invasive species occurrence coordinates as well as tracking the route taken during the survey.

Figure 5: Typical rake toss results (August 1, 2012) from Whetstone Reservoir, showing submerged vegetation consisting largely of Elodea. Photo by Greg Chapman.

Observations - Water Chestnut Surveillance

No Water Chestnut occurrences were observed during the two-day survey, nor were occurrences of other targeted species noted.

Dominant floating vegetation observed within the reservoir included yellow pond lily (*Nuphar lutea*) and water shield (*Brasenia schreberi*). Observed submerged vegetation included several areas dominated by *Elodea*.

Observations - Hydrilla Surveillance

No occurrences of Hydrilla were observed during the two-day survey, nor were occurrences of any other targeted invasive species noted.

Maps and Data Tables

Figure 6: Satellite image of Whetstone Reservoir. The thin white lines detail the route taken by the canoe during the course of the Water Chestnut survey, June 5 & 6, 2012.

Figure 7: Rake toss locations and survey route taken during Hydrilla surveillance, July 31 and August 1, 2012. See Table 1 for corresponding data.

Table 1: Rake toss data for Whetstone Reservoir (*continued on following two pages*).

Location: Whetstone Reservoir							Dates: 7/31/12 & 8/1/12
Point	**Lat/Long**	**Throw**	**Depth (ft)**	**# Spp.**	**# Inv.**	**Invasive Spp. present**	**Notes**
218	43.67405609	1	3	1	0		
	-75.50527015	2	3	1	0		
219	43.67552276	1	3	1	0		
	-75.50598806	2	3	1	0		
220	43.67649933	1	6	0	0		
	-75.5076869	2	6	0	0		
221	43.67852029	1	2	3	0		
	-75.50734609	2	2	3	0		
222	43.68106127	1	2	2	0		
	-75.50719983	2	2	2	0		
223	43.68245568	1	2	2	0		
	-75.5085603	2	2	2	0		
224	43.68283714	1	12	0	0		
	-75.50932431	2	12	0	0		
225	43.68264696	1	9	1	0		
	-75.50951516	2	9	0	0		
226	43.68224077	1	2	3	0		
	-75.50939362	2	2	3	0		
227	43.68044486	1	2	5	0		
	-75.50880656	2	2	3	0		
228	43.67826029	1	2	3	0		
	-75.50928717	2	2	2	0		
229	43.67645726	1	1.5	2	0		
	-75.50827322	2	2	2	0		
230	43.67480049	1	2	3	0		
	-75.50823047	2	2	1	0		
231	43.67452531	1	2	1	0		
	-75.51078611	2	1.5	2	0		
232	43.67362929	1	1.5	1	0		
	-75.51181566	2	1	1	0		
233	43.67292822	1	2	1	0		
	-75.5102091	2	2	1	0		
234	43.67237217	1	3.5	2	0		

	-75.50817263	2	4	2	0		
235	43.66998148	1	1	2	0		
	-75.51401105	2	1	4	0		
236	43.66979146	1	3	2	0		
	-75.51609345	2	1.5	3	0		
237	43.66885856	1	6	4	0		
	-75.5193033	2	5	3	0		
238	43.66769356	1	2	2	0		
	-75.52168854	2	2	1	0		
239	43.66811056	1	4	3	0		
	-75.52288757	2	3	3	0		
240	43.66865111	1	1.5	3	0		
	-75.52224803	2	1.5	4	0		
241	43.66986397	1	1.5	1	0		
	-75.51954377	2	1.5	1	0		
242	43.67104917	1	2	1	0		
	-75.5163294	2	2	1	0		
243	43.67110927	1	6	1	0		
	-75.51490406	2	4	2	0		
244	43.6721161	1	3	1	0		
	-75.51449619	2	2	1	0		
245	43.67242145	1	2	2	0		
	-75.51262284	2	2	2	0		
246	43.67266294	1	5	2	0		
	-75.51191021	2	3	1	0		
247	43.67185643	1	3	2	0		
	-75.51065007	2	3	3	0		
248	43.67212406	1	2.5	1	0		
	-75.50772881	2	2.5	1	0		
249	43.67113718	1	1	2	0		
	-75.50627883	2	1.5	2	0		
250	43.67327406	1	2	1	0		
	-75.50487544	2	2.5	1	0		