

CITIZEN SCIENCE: HONEYEYE LAKE AQUATIC PLANT SURVEY PROGRAM



INCREASING CONCERN FOR RECENT INFESTATIONS OF AQUATIC INVASIVE PLANTS

- ▶ **HYDRILLA - CAYUGA LAKE - ITHACA AND AURORA**
- ▶ **STARRY STONEWORT - KEUKA LAKE OUTLET**
- ▶ **WATER CHESTNUT - WEST RIVER INLET OF
CANANDAIGUA LAKE, SODUS BAY, BRADDOCK'S BAY,
BEACON ON THE HUDSON RIVER**

HYDRILLA

Hydrilla verticillata
Hydrilla

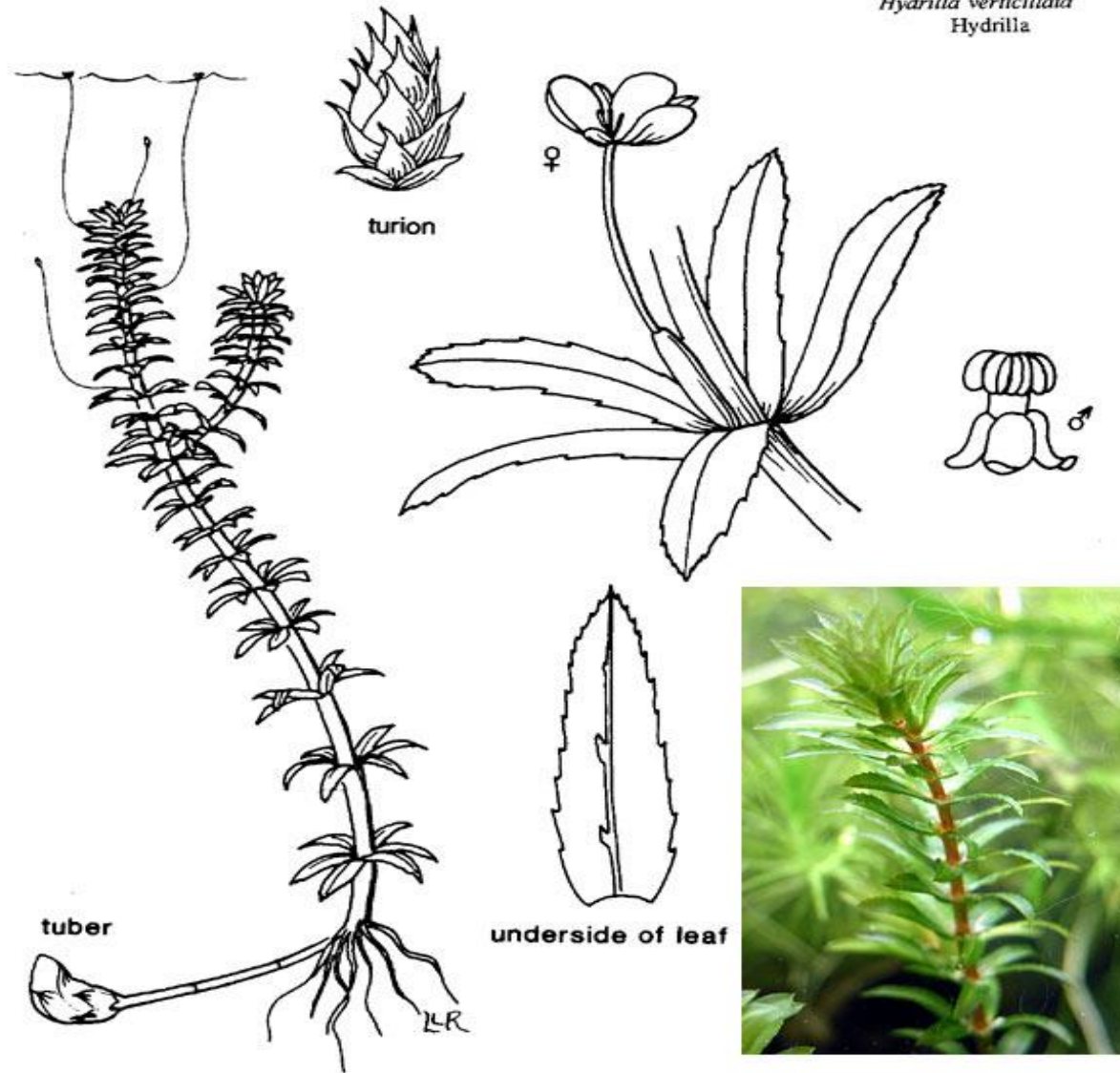


Illustration provided by:
IFAS, Center for Aquatic Plants
University of Florida, Gainesville, 1990

HYDRILLA IN CAYUGA INLET



STARRY STONEWORT



STARRY STONEWORT



WATER CHESTNUT



WATER CHESTNUT HUDSON RIVER



FORMATION OF HONEYE'S PLANT SURVEY PROGRAM

- * Early 2007 Jack Starke authors a program to survey plant species
- * June 2007 Jack and Don Cook train original volunteers
- * From 2007 till 2018 Don Cook has led teams of 5 to 6 volunteers in doing a rake toss survey in June and August

SURVEY EQUIPMENT

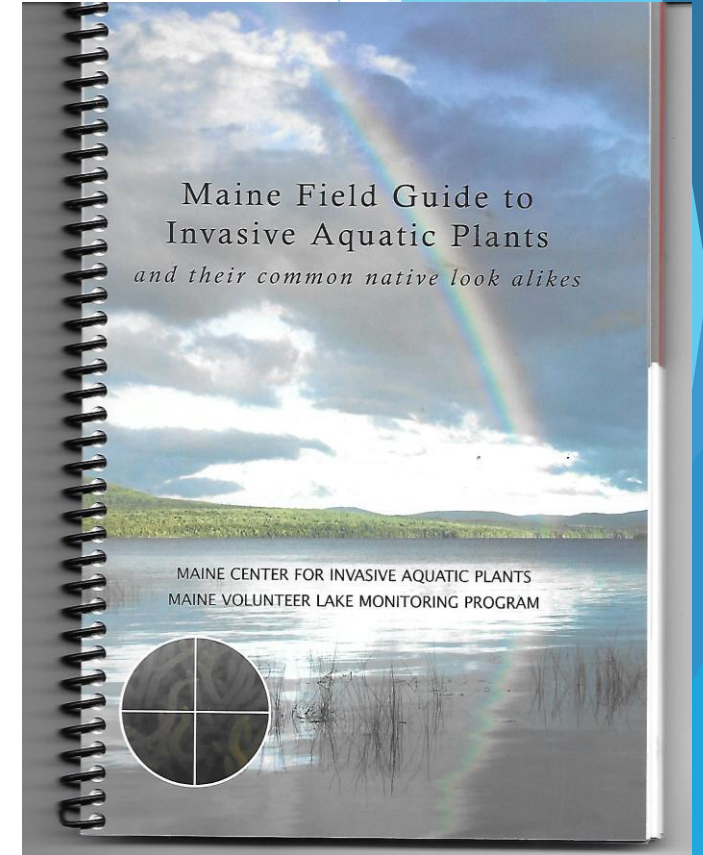


AQUATIC PLANT RAKE

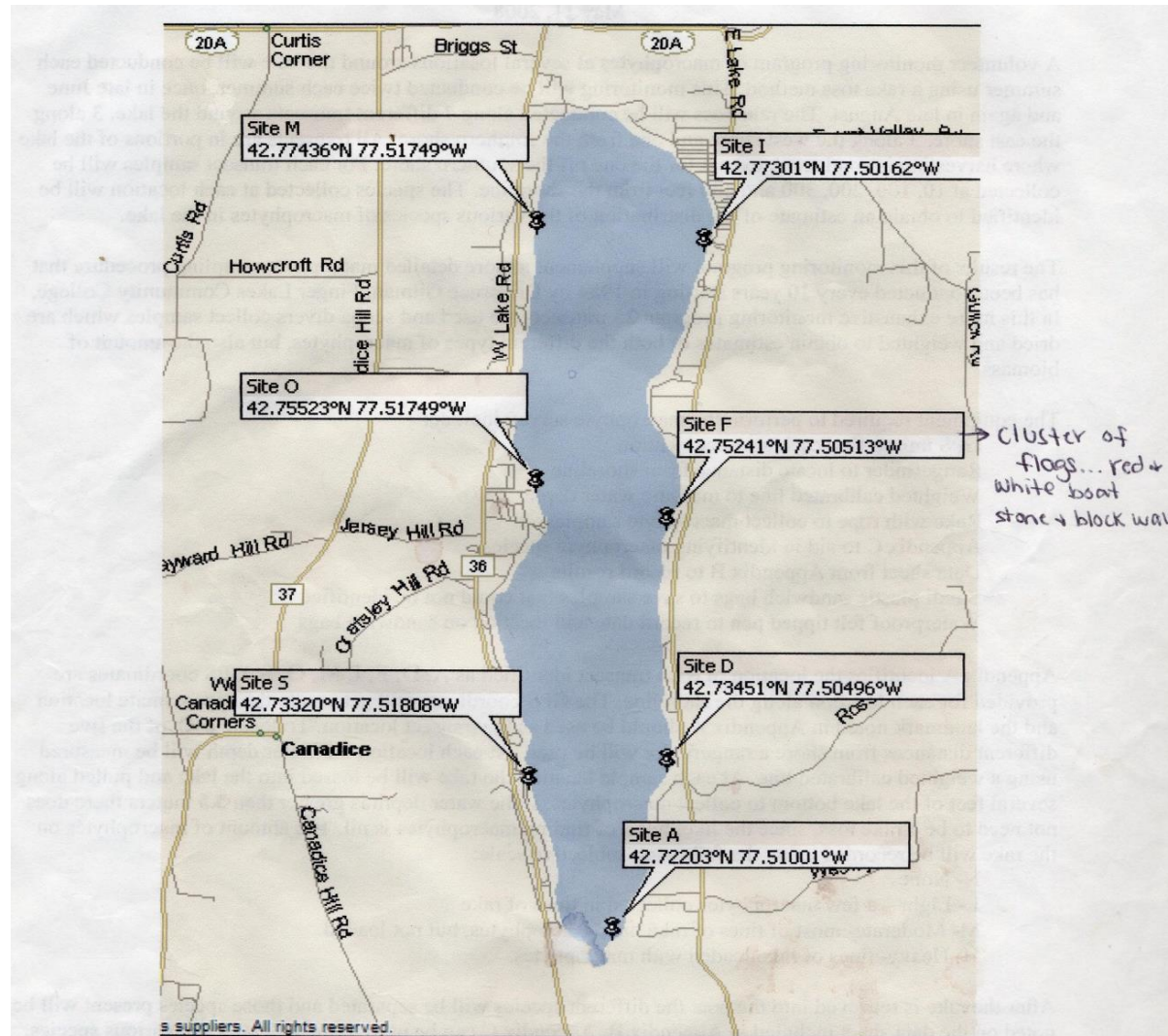
DR. GILMAN - WHAT IS THE NAME OF THIS PLANT?



RANGE FINDER



SURVEY LOCATIONS



- Site A- East of channel, tall lone small diameter tree
- Site D- Helen Johnson Green Boathouse
- Site F- American flag and block retaining wall
- Site I- White house gray railing. Clump of 3 large trees
- Site M- Red A-frame house
- Site O- Red cottage, posted sign, clump of 2 large trees
- Site S- Two story blue house on double lot

SURVEY RECORD SHEET

JUNE 23, 2018

Date of Sampling June 23, 2018

Linda Vanderbeck Karen Haskell

Name of Recorder Anant Patel Other Participants - Don Cook, Frank Powell, Kenki

Macrophyte Rake Toss Sampling Data Sheet

100' = 33.3 yds. 200' = 66.7 yds. 300' = 100 yds. 400' = 133.3 yds. If depth > 5.5m skip rake toss

Sampler	Location	Depth (ft.)	Amount N, L, M, H	Curly Leaf Pondweed	Coontail	Eelgrass	Eurasian Milfoil	Waterstargrass	Large-leaved Pondweed	Elodea	Flat-stem Pondweed	Starleafed Duckweed	Filamentous Algae	Pickrel Weed	Small Leaved Pondweed	Water Buttercup	Green Arrow Arum	Muskgrass, Chara	Slender Naiad	Bushy Pondweed	Water Lily	Claspingleaf Pondweed	Bladderwort	Southern Naiad	Slender Pondweed
	A-10	3.0		M	M		M	M							M										
	A-100	5.0		M																					
	A-200	8.5		H	H			H	H						H										
	A-300	9.0		L	L																				
	A-400	15.0																							
	D-10	6.0			M				M							M									
	D-100	15.0		H	H											H									
	D-200	20.0		M	M	M										M									
	D-300	16.6																							
	D-400	17.7																							
	F-10	6.0		L	L	L			L		L					L									
	F-100	27.0		L							L					L									
	F-200	17.4																							
	F-300	28.5																							
	F-400	30.5																							
	I-10	4.0		L	H			H								L									
	I-100	7.0			M						M					M									
	I-200	9.0																							
	I-300	13.0																							
	I-400	15.0																							
	M-10	6.0		M		M			M		M					M									
	M-100	12.0				M	M									M									
	M-200	13.0		H	H							H				M									
	M-300	15.0		H	H	H										M									
	M-400	15.1		M												M									
	O-10	3.0		H																					
	O-100	6.0		L	L											XL									
	O-200	15.0																							
	O-300	18.0																							
	O-400	9.9																							
	S-10	3.0				L	L				L														
	S-100	10.0		M	M	M				M						M									
	S-200	15.0		M								M				M									
	S-300	15.9			H				H							M									
	S-400	13.8		N	N	N	N									L									
	BL-N																								
	BL-M			M	M																				

BL-S

L L

L

SURVEY RECORD SHEET

CLOSEUP

Macrophyte Rake Toss Sampling Data Sheet

100' = 33.3 yds. 200' = 66.7 yds. 300' = 100 yds. 400' = 133

[illegible]

SUMMARY SHEET OF EACH SURVEY

PLANT SUMMARY

2017

June 24th

PLANTS FOUND - COONTAIL, EELGRASS, EURASIAN MILLFOIL WATERSTARGRASS, ELODEA, SMALL LEAF PONDWEED, FLAT-STEMMED PONDWEED, SPIROGYRA

Predominantly Flat Stemmed Pondweed

Density/Amount - moderate to light at South end (3 locations) light at Southeast location (2 locations)

light to heavy on Eastside (2 locations)

light to heavy at Northeast corner (4 locations)

nothing at Northwest corner (2 location)

moderate to very heavy middle Westside (2 locations)

heavy in close, heavy at 10 and none farther out at southwest side (1 locations)

New York State Boat Launch - 3 locations - north light, west heavy and south moderate

Plants found were curly leaf pondweed, coontail, Eurasian millfoil and eel grass

SOME RESULTS

- ▶ No sign of Hydrilla, Water Chestnut or Starry Stonewort
- ▶ PREDOMINANT PLANTS
- ▶ 2007 JUNE - CURLY LEAF PONDWEED, EURASIAN MILFOIL
AUGUST - EURASIAN MILFOIL, WATER STAR GRASS, ELODEA
- ▶ 2011 JUNE - CURLY LEAF PONDWEED, LARGE LEAF PONDWEED
AUGUST - COONTAIL, WATER STARGRASS, EELGRASS
- ▶ 2016 JUNE - SMALL LEAVED PONDWEED, CURLY LEAF PONDWEED
AUGUST - COONTAIL, EEL GRASS, EURASIAN MILFOIL
- ▶ 2018 JUNE - SMALL LEAVED PONDWEED, CURLY LEAF PONDWEED AND COONTAIL

HONEOYE LAKE PLANT SURVEY JUNE 2018



OTHER CITIZEN SCIENCE PROGRAMS

- ▶ NEW YORK STATE FEDERATION OF LAKE ASSOCIATIONS'- CITIZENS STATEWIDE LAKE ASSESSMENT PROGRAM/CSLAP
- ▶ FINGER LAKES INSTITUTE'S - FINGER LAKES MACROPHYTE SURVEY PROGRAM-
- ▶ HYDRILLA HUNTS - NYSFOLA AND FLI

ANOTHER LOCAL CITIZEN SCIENCE PROGRAM IN WEST CAYUGA LAKE



From your boat or on shore, help with the weed problem in our lakes. Use this net to remove floating weeds from the lakes, especially Milfoil.

"SEE IT, SCOOP IT, TRASH IT"

Compliments of:
WEST CAYUGA LAKE ASSOCIATION

SURVEY TRAINING PROGRAMS

INVASIVE SPECIES AWARENESS WEEK

JULY 8 THROUGH 14, 2018

AQUATIC INVASIVE SPECIES HANDS-ON WORKSHOP

ON JULY 10, 2018

HELD ON FINGER LAKES INSTITUTE WITH INSTRUCTION BY

BOB JOHNSON

OR

CITIZEN SCIENCE PROGRAM

COORDINATED BY PATTY BROWN AT FINGER LAKES INSTITUTE

QUESTIONS?