# Ε

## **APPENDIX E**

Fisheries Reports and Data Summaries



#### LAKE: BIG ST GERMAIN

#### COUNTY: VILAS

YEAR: 2011

The Department of Natural Resources surveyed Big St. Germain Lake, Vilas County, from April 28 through May 18, 2011, to determine the health of its fishery. The survey was primarily focused on estimating the abundance of the lake's walleye and muskellunge populations. Big St. Germain Lake is a drainage lake with chiefly sand substrate and a moderately abundant walleye population. It has a surface area of 1,617 acres, 7.6 miles of shoreline and a maximum depth of 42 feet.

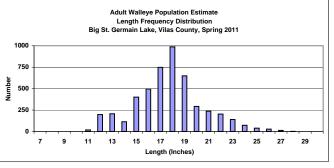


Figure 1. Length frequency distribution of 4843 adult\* walleye estimated to be in Big St. Germain Lake, Vilas County, based on a spring 2011 survey.

\* Note: Adult walleye are defined as all sexable walleye and walleye of unknown sex  $\geq$  15 inches long.

#### Smallmouth Bass

Smallmouth bass were not a primary target of our survey of Big St. Germain Lake. The majority of our sampling occurred prior to peak smallmouth bass spawning.

We captured 78 smallmouth bass, 8 inches or larger, during our fyke netting and electro-fishing sampling of Big St. Germain Lake. Approximately 69% of those smallmouth (54 of 78) were 14 inches long or larger. The largest smallmouth bass we captured was 19.9 inches long.

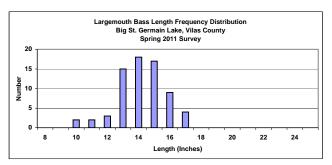


Figure 3. Length frequency distribution of 70 largemouth bass ≥ 8° captured during a fisheries survey of Big St. Germain Lake, Vilas County, in spring 2011.

#### Walleye

We conducted a mark-recapture survey of Big St. Germain Lake's adult\* walleye population from April 28th through May 3rd, 2011. We captured and marked (fin clipped) 1,359 adult walleye in six days of fyke netting. Two crews sampled Big St. Germain Lake with electro-fishing boats on May 3rd and captured 112 adult walleye. Nearly 26% (29 of 112) of those walleye bore the fin clip given during fyke netting.

Based on those results, we estimated that Big St. Germain Lake is home to 4,843 adult walleye (3.0/acre). Nearly 89% (4,307 of 4,843) of adult walleye were 15 inches long or larger. The largest walleye we captured was a 28.2inch female.

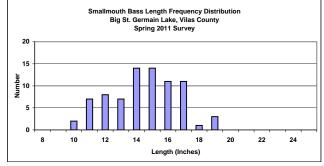


Figure 2. Length frequency distribution of 78 smallmouth bass  $\geq 8^{\circ}$  captured during a fisheries survey of Big St. Germain Lake, Vilas County, in spring 2011.

#### Largemouth Bass

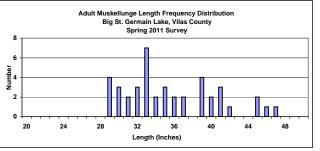
We captured 70 largemouth bass, 8 inches or larger, incidental to our fyke netting and electro-fishing sampling of Big St. Germain Lake. Most of our sampling was prior to the largemouth bass spawning period.

Nearly 69% (48 of 70) of largemouth bass captured were 14 inches long or larger. The biggest largemouth bass we captured was 17.9 inches long.

### Northern Pike

We captured 87 adult\* northern pike from Big St. Germain Lake with fyke nets and boomshockers from April 28 through May 18, 2011. Approximately 85% (74 of 87) of adult northern pike we captured were less than 26 inches long. The largest northern pike we captured was a 34.6-inch female.

\* Note: Adult northern pike are defined as all sexable northern pike and northern pike of unknown sex  $\geq$  12 inches long.





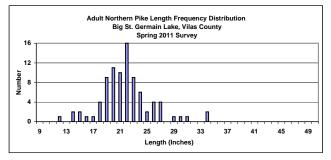


Figure 4. Length frequency distribution of 87 adult\* northern pike captured during a fisheries survey of Big St. Germain Lake, Vilas County, in spring 2011.

#### <u>Muskellunge</u>

We captured 42 adult\* muskellunge during our fyke netting and electro-fishing sampling of Big St. Germain Lake. Nearly 55% of the adult muskellunge (23 of 42) we captured were 34 inches long or larger. Roughly one in four muskellunge (10 of 42) were 40 inches long or larger. The largest muskellunge we captured was a 47.5-inch female.

 $^{*}$  Note: Adult muskellunge are defined using PSD stock size as all sexable muskellunge and muskellunge of unknown sex  $\geq$  20 inches. long.

#### Other Species

We captured ten species of fish in our fyke netting and electro-fishing sampling of Big St. Germain Lake in addition to the game fish mentioned above. Black crappie, bluegill, rock bass and yellow perch were the most abundant species in our fyke net catches. We also caught burbot, golden shiner, pumpkinseed, silver redhorse, white sucker and yellow bullhead. In-water sampling will conclude with a survey of young-of-year walleye in fall 2011.

We are also conducting a creel (angler harvest) survey on Big St. Germain Lake this year. Creel clerk Marty Kiepke will count and interview anglers and examine their catch throughout the 2011-12 fishing season.

FISH SPECIES	OPEN SEASON	DAILY LIMIT	MINIMUM LENGTH
Walleye	May 7 - March 4	2	15 inches
Largemouth and Smallmouth Bass	May 7 - June 17 (C&R)	None	
	June 18 - March 4 (Harvest)	5 in total	14 inches
Muskellunge	May 28 - Nov. 30	1	34 inches
Northern Pike	May 7 - March 4	5	None

#### Table 1. General Fishing Regulations for Big St. Germain Lake, Vilas County, 2011

A brief summary of selected fishing regulations for Big St. Germain Lake is included above (Table 1). While the regulatory information provided was current at the time the surveys were conducted, it is not comprehensive and should not be used as a substitute for the current fishing regulation pamphlet. You may obtain a copy of current fishing regulations when you purchase your fishing license, or download a copy from our web site at:

http://www.dnr.wi.gov/fish/regulations/

This report is interim only; data and findings should not be considered final. Results of creel surveys should be available by June 2012. Watch for survey summaries at: http://dnr.wi.gov/fish/nor/northern.html or contact:

Dennis Scholl, Treaty Fisheries Supervisor Wisconsin Department of Natural Resources 8770 Highway J Woodruff, WI 54568 (715) 356-5211 Ext. 210 Email: Dennis.Scholl@Wisconsin.gov For answers to questions about fisheries management activities and plans for Big St. Germain Lake, Vilas County, contact:

Steve Gilbert, Fisheries Biologist Wisconsin Department of Natural Resources 8770 Highway J Woodruff, WI 54568 (715) 356-5211 Ext. 229 Email: Stephen.Gilbert@Wisconsin.gov