

LAKE MANAGEMENT PLAN

Updated July 2012 – William Baker

Water(s): Fish Lake (Spokane Co.)

Location: Fish Lake is located 3 miles northeast of Cheney, WA. Sections 4 & 5, Township 23 North, Sections 32 & 33, Township 24 North, Range 42 East WM.

	Size:	Max. Depth:	Volume:
Fish Lake	47 acres	48 ft	1,357 acre feet

Water Source: Unnamed intermittent tributary and springs

Outflow: Yes, outflow to Minnie Creek.

Management History:

Fish Lake has been managed as a trout fishery for several decades. It was planted primarily with rainbow trout from the mid 1940's through the early 1960's. Beginning in 1965, the lake was switched to an eastern brook trout plant. Planting of eastern brook trout has continued until the present, and these fish are the staple of this fishery. In addition to eastern brook trout, the Washington Department of Fish and Wildlife (WDFW) began planting tiger trout in 2001, and they have quickly become a popular component of the fishery. In May 2008, a state record tiger trout (13.75 lbs) was caught in Fish Lake. This record stood until spring of 2012, when it was broken by a fish (15.04 lbs) caught in Roses Lake (Okanogan County).

Fish Lake has been treated 4 times with rotenone (1956, 1968, 1975 and 1998) and once with toxaphene (1963) since it was chosen to be trout-only management water. Previous treatments primarily targeted bullhead catfish, yellow perch, pumpkinseed sunfish, and goldfish. The lake is proposed to be treated in 2012 to control an overabundant pumpkinseed sunfish population that is limiting trout recruitment through inter-specific competition. In addition, during pre-season trout sampling conducted by WDFW in spring 2012, a northern pike was captured. Currently, the only known northern pike populations in Washington State occur in the Pend Oreille and Spokane river drainages. However, WDFW has documented illegal introductions of northern pike into two other lowland lakes within Spokane County (Newman and Liberty lakes, 2010). Northern pike suppression activities (targeted gill netting) occurred on Box Canyon Reservoir, located on the Pend Oreille River, in spring 2012 in an attempt to reduce the pike population, as it had expanded rapidly since 2004, posing risks to fishery resources downstream and in adjacent waters. Northern pike are not currently wide-spread in the state, and WDFW is actively working to prevent/reduce further encroachment.

T&E Flora and Fauna: Professionals from many resource agencies have visited this site countless times during the last 50 years. No known report exists of any threatened or endangered species habitually found in or near this lake. Occasional visits from both bald and golden eagles occur, although no nests of these two species are known to exist in the area. Protected species of waterfowl and other birds are sporadically observed here as well.

Current Management Objectives:

Fish Lake is a lowland lakes opener (4th Saturday in April to September 30) production trout fishery (5 fish limit, no size or gear restrictions). Angler harvest rate targets are 4 to 5 fish/angler/trip on the opener and 2 to 3 fish/angler/trip for the remainder of the season. The carryover harvest rate should be 10 to 15 percent.

Stocking Objectives following lake rehabilitation:

<u>Lake</u>	<u>Species</u>	<u>Number of Fish Stocked</u>			<u>Planting Month</u>
		<u>Total</u>	<u>/Acre</u>	<u>/Pound</u>	
Year 1	Rainbow	5000	106	2.5	March/April
	Eastern brook	12,500	266	100	April/May
	Tiger	12,000	255	20	April/May
Year 2	Eastern brook	12,500	266	100	April/May
	Tiger	12,000	255	20	April/May
Year 3	Eastern brook	165,000	739	100	April-May
	Tiger	12,000	255	20	April/May
Year 4	Eastern brook	165,000	739	100	April-May
	Tiger	12,000	255	20	April/May
Year 5	Eastern brook	165,000	739	100	April-May
	Tiger	12,000	255	20	April/May
Year 6	Eastern brook	165,000	739	100	April-May
	Tiger	12,000	255	100	April/May

Management Strategy:

- A. Plant rainbow trout catchables during spring 2013. Do not use catchables in this fishery

again until fry recruitment reduces substantially from competition with unwanted fish species. Plant eastern brook trout spring fry and tiger trout fall fry (20 fpp) annually to maintain trout fishery.

- B. Check yearling growth; should be ~11 inches on May 1st of each spring. Adjust stocking density as necessary to achieve targeted trout growth.
- C. Monitor annually with Opening Day creel and gill netting, and periodically with electrofishing.
- D. Control undesirable species with rotenone when trout survival is inadequate to produce an acceptable fishery.