Development of the Upper Missouri River Reservoir Fisheries Management Plan 2000-2009

- Began in late 1998; Finalized in late 1999
- Workgroup attempted to represent all parties with a stake in the management of these reservoirs (minus unaffiliated anglers)
- Eight meetings (two public) over five months
- Plan in compliance with MEPA (public comment, etc.)
- Plan approved by FWP Commission
- Two end results (agreement) and 12 recommendations to FWP

Management Plan Work Group Representatives

- MFWP-Steve Leathe/Bruce Rich
- Business Interests-Terry McArdle
- Federal Agencies-Pete Schendel
- General Anglers-Fred Easy
- Hauser/Holter Anglers-Clete Daily
- Local Government-Doug Brecker
- Montana Power (PPLM)-Brent Mabbott
- Trout Interests-Bill Holdorf
- Upstream/Downstream Interests-Bruce Farling
- Walleye Interests-Mike Sedlock

Management Plan Work Group End Result #1

- The fisheries management goal for this three-reservoir system should be to managed as a high quality, cost-effective, multi-species fishery with high levels of angler satisfaction. This will be a difficult goal to achieve.

Management Plan Work Group End Result #2

- The process for monitoring and evaluating the implementation of the new 10-year plan should be open to the public and other affected parties.

Hauser/Holter Reservoirs Fisheries Update 2003

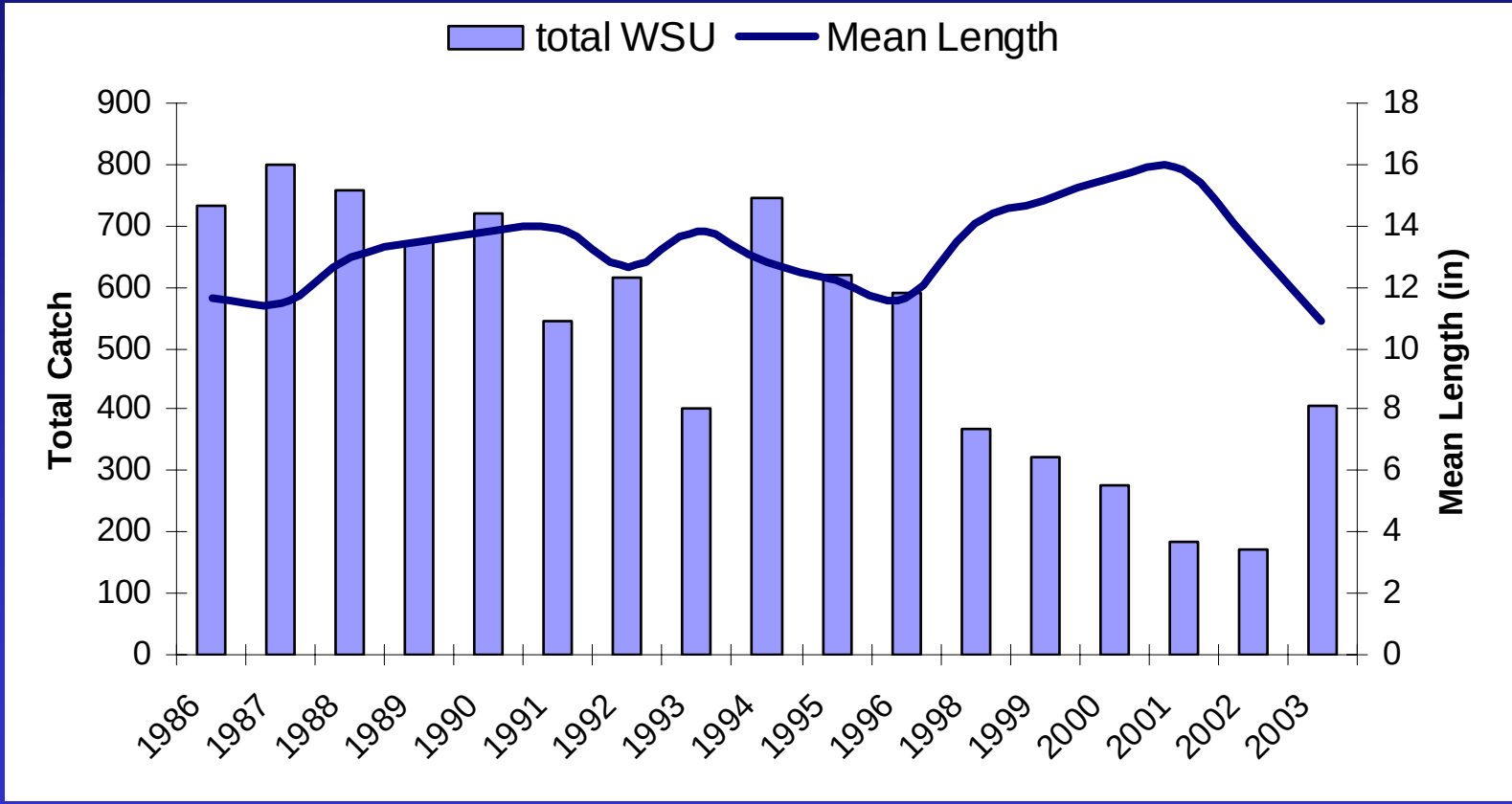
Netting Trends

Angler Catch Rate Targets (fish/hour) and 3-Year Averages (2003)

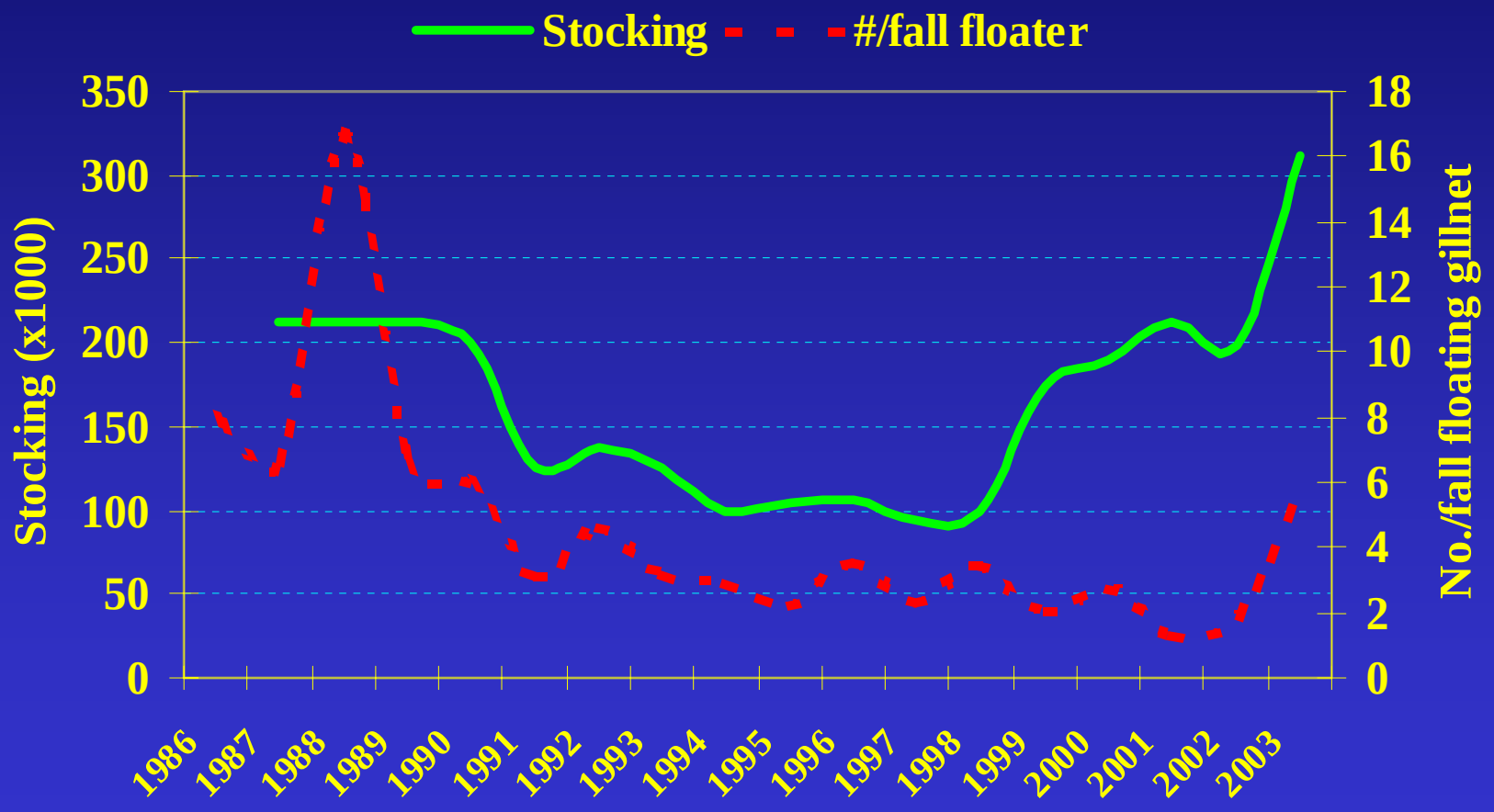
Species	Hauser		Holter	
	Target	Current (3-yr ave.)	Target	Current (3-yr ave.)
Rainbow	.15-.20	.11	.25	.15
Kokanee	.10	0	N/A	.007
Perch	.3-.4	.03	1-2	1.1
Walleye	.02	.04	.02	.08

Hauser White Suckers

Total Gillnet Catch Vs. Average Length



Rainbow Trout stocking vs. recruitment to fall floating gillnets Hauser Reservoir



Rainbow Trout Evaluation

2003 Rainbow Marking

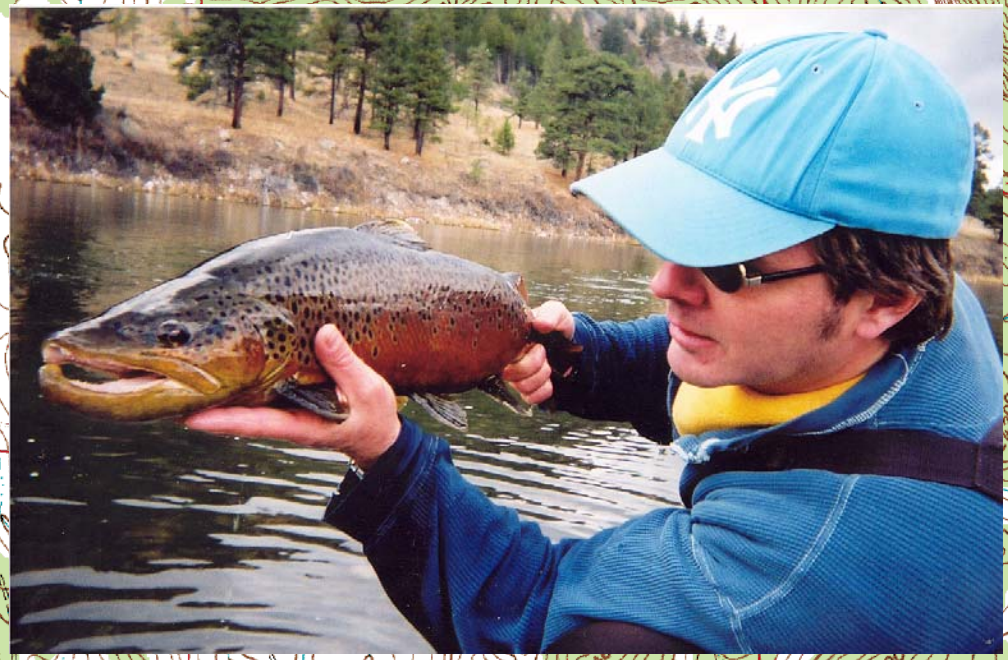
- 200,000 Arlee Fin Clipped (Hauser and Holter)
- 100,000 Eagle Lake Coded Wire Tagged (Hauser)

Rainbow Trout stocking vs. recruitment to fall gillnets Hauser Reservoir (1996-2002)

Yr of Release	# Stocked (x1,000)	Strain	Size @ Release	Month of Release	Return Index*
1996	94.2	A	5”	July	9.3
1997	98.7	A	5”	July	8.1
1998	98.2	A	5”	July	9.2
1999	174.3	A:EL	3.7”/5”	July	2.4
2000	189.2	A	5”	July	3.9
2001	211.8	A	5”	July	0.2
2002	100.5	A	5”	July	7.0
2003	98.6	A	7.5”	October	4.0

***Return Index. Calculated as the total number of fish recaptured in nets, divided by the number of fish stocked, then multiplied by 100,000, divided by the number of year of return (max 4 years)**

Hauser Tailrace Electrofishing Section



Rainbow Trout Estimates for Hauser Tailrace Section 1982 - 2003

	1982[1]	1983[1]	1985[2]	1986[2]	1987[2]	1989[2]	2003
Total Est. (all ages)	5,061 (864)	6,044 (1,422)	8,214 (1,597)	17,087 (4,618)	9,252 (786)	8,875 (917)	7,795*
# Per Mile	1,770	2,113	2,872	5,974	3,235	3,103	4,585*

*Provisional Estimates

- Estimates for 1982-1989 were conducted in a 2.9 mile section
- 2003 estimate was conducted in a 1.7 mile section
- [1]White et al. (1984)
- [2]Lere M. (1990)

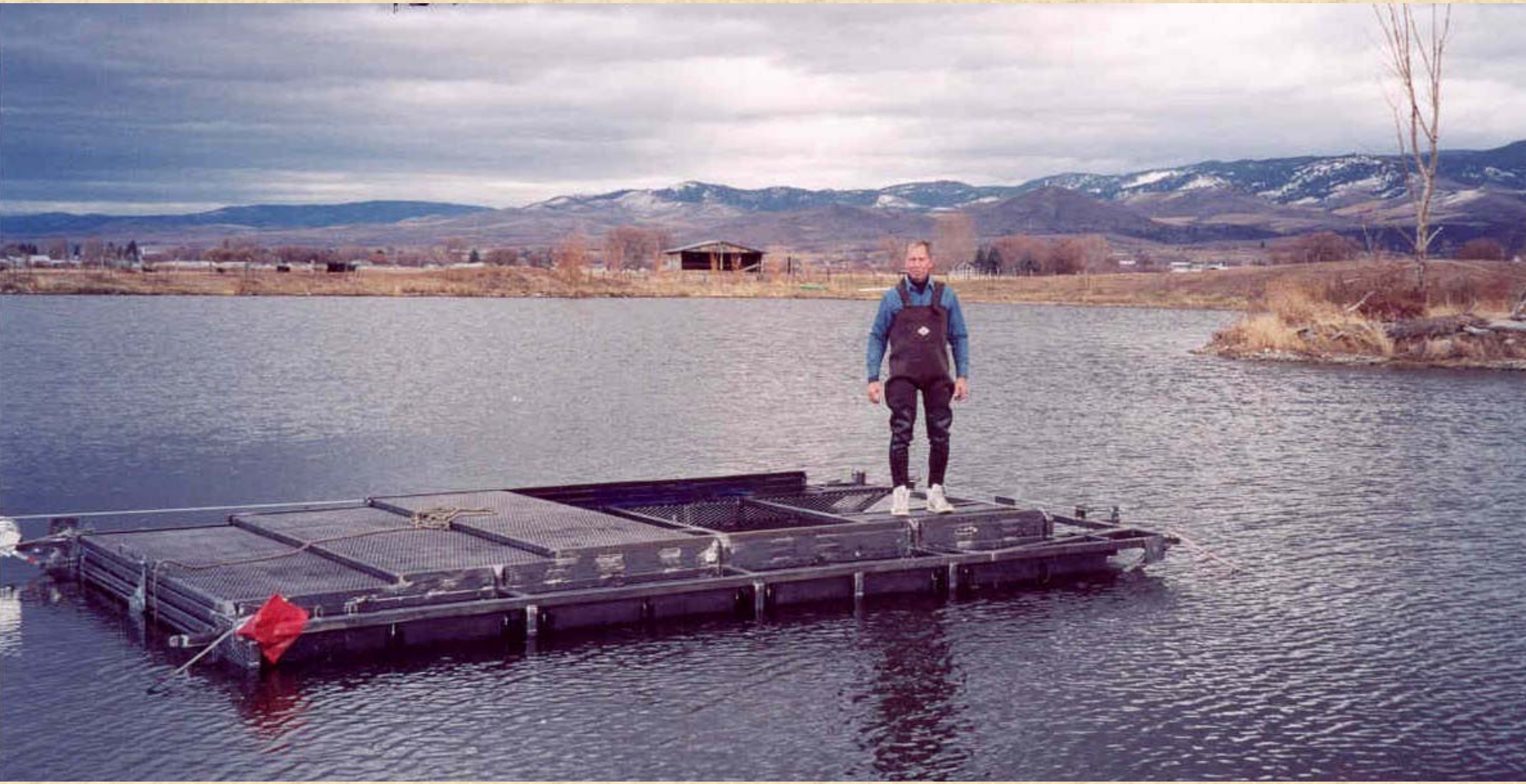
Brown Trout Estimates for Hauser Tailrace Section 1982 - 2003

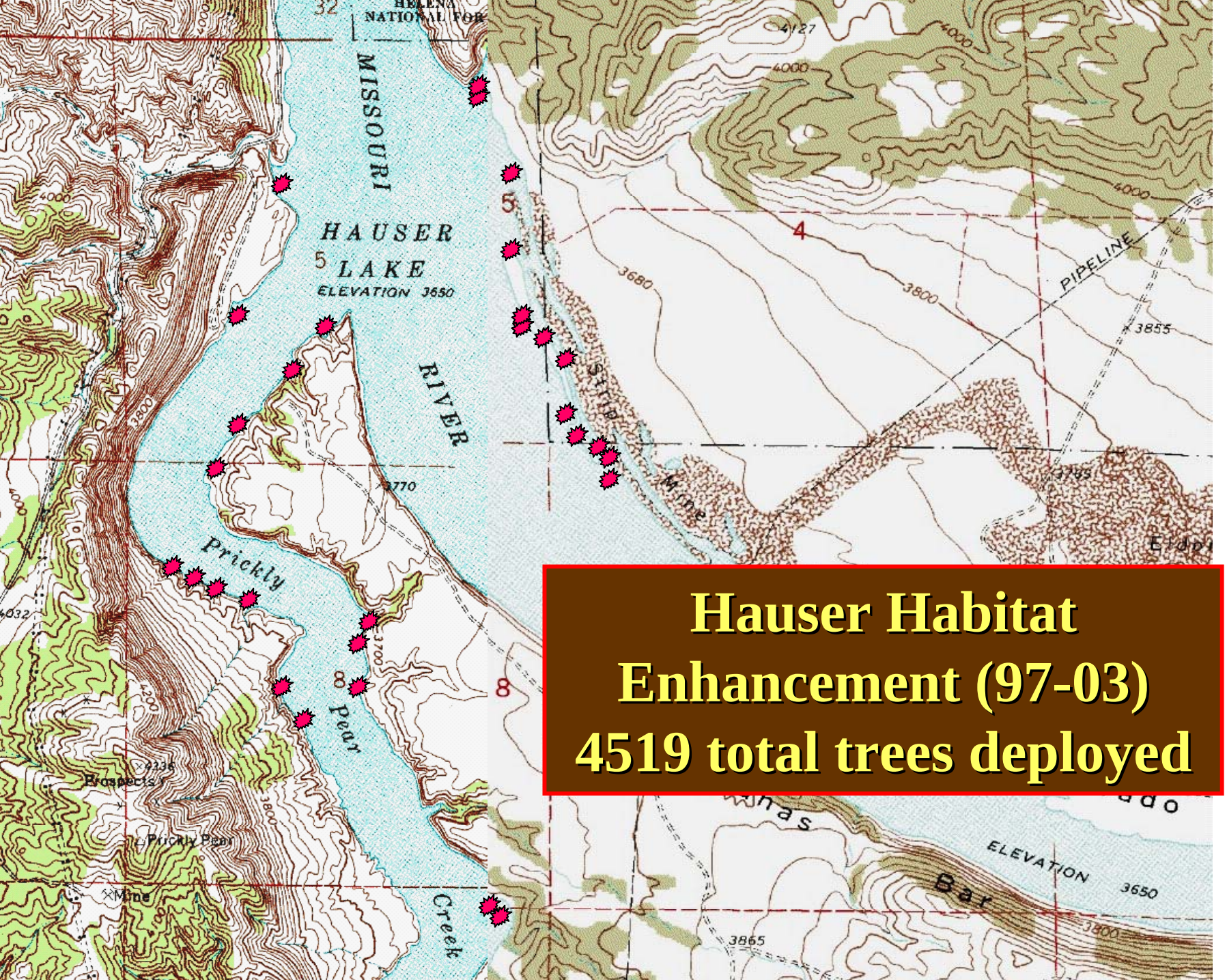
	1982[1]	1983[1]	1985[2]	1986[2]	1987[2]	1989[2]	2003
Total Est. (all ages)	1,387 (181)	1,346 (212)	1,406 (304)	1,260 (468)	750 (112)	555 (124)	219*
# Per Mile	485	471	492	441	262	194	129*

*Provisional Estimates

- Estimates for 1982-1989 were conducted in a 2.9 mile section
- 2003 estimate was conducted in a 1.7 mile section
- [1]White et al. (1984)
- [2]Lere M. (1990)

Causeway Fish trap





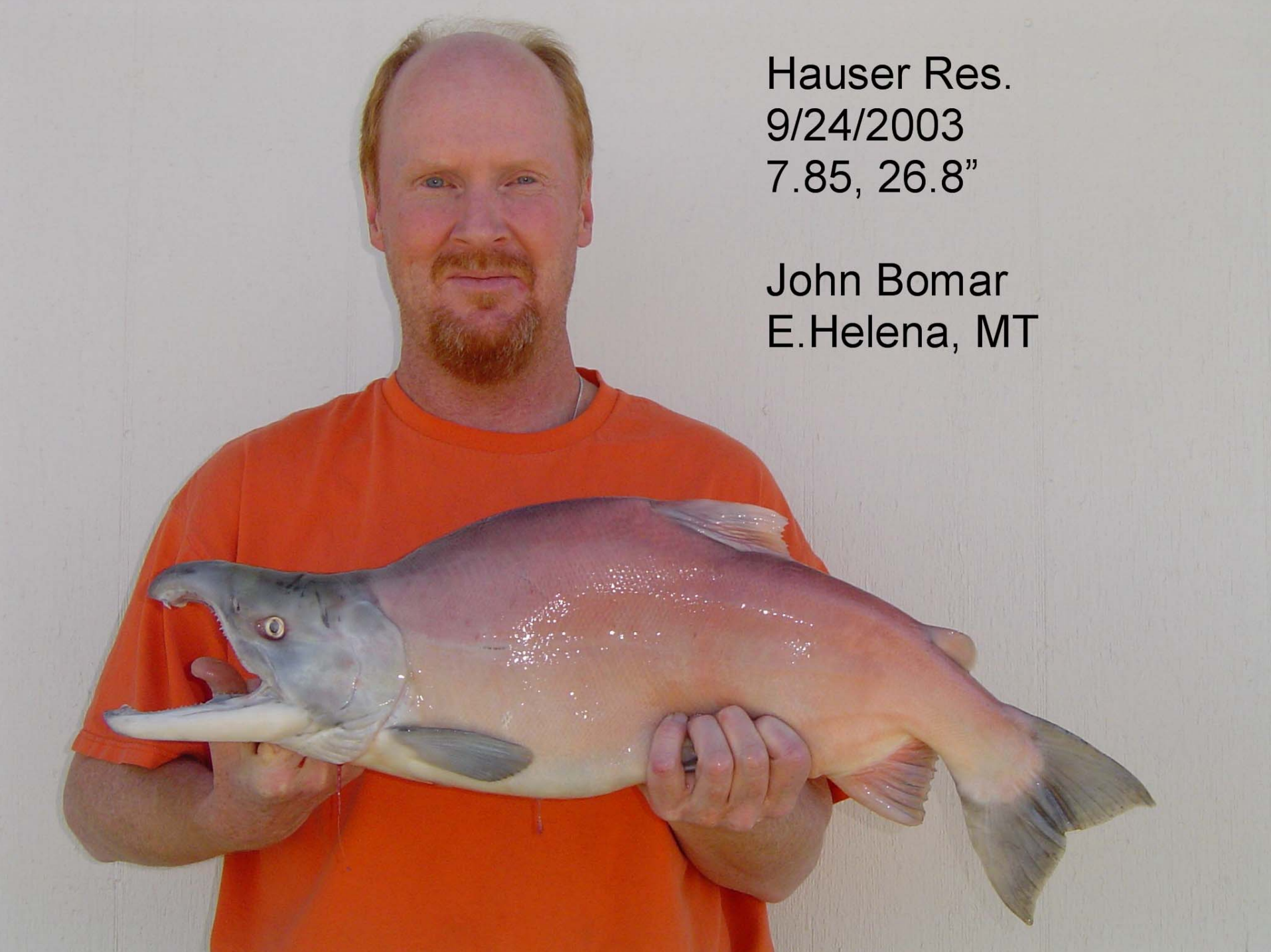
Hauser Habitat Enhancement (97-03) 4519 total trees deployed

Dissolved Oxygen Update

- BOR will continue to monitor water quality below Canyon Ferry Dam
- Efforts will continue in 2004 to try air injection into turbines

Impacts of Low DO
(Other Studies)

- Severe O_2 stress below 4.16mg/l (Davis 1975)
- Reduced swimming performance in salmon (Kutty and Sanders 1973)
- Reduced angler success rates for rainbow trout (Weithman and Haas 1984)
- DO's influence on predator/prey overlap (Pientka and Parrish 2002; Breitburg et al. 1997


Hauser Res.
9/24/2003
7.85, 26.8”
John Bomar
E.Helena, MT