

F-78-R-6
DD
Region 7

Montana Department of Fish, Wildlife and Parks
Fisheries Division

Job Progress Report

STATE: Montana PROJECT: Statewide Fisheries Investigations

PROJECT NO. F-78-R-6 STUDY TITLE: Survey and Inventory of
Warmwater Lakes

JOB NO: IV-D JOB TITLE: Southeast Montana Warmwater Lakes
Investigations

PROJECT PERIOD: July 1, 1999 through June 30, 2000

REPORT PERIOD: April 1, 1999 through March 31, 2000

ABSTRACT

Small fishing reservoirs in 11 counties were sampled to obtain fisheries information in 1999. A total of 48 reservoirs were sampled. Three of these had never been planted or had not been planted in recent years. They were visited to determine fisheries potential. Two of these were determined to have sufficient potential that a fish plant was warranted. Of the remaining reservoirs, sampling efforts produced no fish in seven. Thirtyeight reservoirs had fishable populations of target fish species.

PROCEDURES

Pond depths were determined by sounding with a calibrated, weighted rope. Fish populations were sampled with 125 feet long sinking experimental gill nets, a 1/4 inch bag seine of 100 feet length or hook and line.

RESULTS AND DISCUSSION
Survey of New Ponds

Three new ponds were surveyed to determine suitability for producing fish (Table 1). Coleman Murnion Reservoirs #1 and #2 are located near the town of Jordan, MT and should provide easily accessible fishing to the residents of the community. Rainbow

trout will be planted in both reservoirs initially. Largemouth bass will be added to Murnion #1 at a later date if it maintains sufficient water to support bass. Trout planting would be discontinued at that time.

Survey of Previously Planted Reservoirs

Carter County

Yellow perch and northern pike were found to be present in Talcott Reservoir (Table 2). Five trout reservoirs were sampled in Carter County in 1999 and all five had rainbow trout present.

Custer County

Cody Taylor Reservoir is a small bullhead pond. Sampling and fisherman reports indicates that bullheads are no longer present. It will be restocked via transplant. Spotted Eagle Pond near Miles City has a variety of game and non-game fish, but fishing opportunity is limited due to other recreational uses. Largemouth bass were sampled at Dan Haughian Reservoir. Northern pike are also present here, the result of an illegal plant.

Dawson County

Yellow perch are abundant and providing a popular winter fishing opportunity in Johnson Reservoir, but smallmouth bass are not abundant. A variety of fish species are present in Hollecker Reservoir (Table 2). Management efforts have shifted to a put, grow and take urban catchable rainbow trout fishery. Sampling at Lindsey Reservoir produced yellow perch, northern pike and black bullheads. Carp have been present in past sampling efforts. Rainbow trout were present in Marvin Burman reservoir.

Fallon County

Rainbow trout are present in Pruet, Schweigert and Rush Hall Reservoirs. Largemouth bass are doing well in MacKay Ranch Reservoir. Maier Reservoir has both largemouth bass and smallmouth bass.

Garfield County

Sampling at Brooks #3 and McRae #1 Reservoirs produced no rainbow trout. Both of these reservoirs are subject to periotic fish kills. Kreider #2 Reservoir had rainbow trout present. Kreider #1

and McRae #2 both have abundant largemouth bass. Rainbow trout were not sampled at Smith Reservoir #1 but owner reports trout are present. This reservoir is being switched to largemouth bass management at the request of the land owner. Largemouth bass were not sampled at Smith Cattle #2 and will not be restocked.

Powder River County

Rainbow trout are present in Mud Turtle Reservoir. This is a small Forest Service pond that is planted annually with catchable trout.

Prairie County

Ayers Trout Reservoir has not been over wintering rainbow trout and will not be replanted. Sampling at Ayers Bass Reservoir produced largemouth bass, blue gill and some larger rainbow trout. Largemouth bass were not sampled in Don Lee Bass reservoir but rainbow trout were present. Rainbow trout were present in Don Lee Trout and Reukauf Reservoirs. Largemouth bass appear to be established in Clark Reservoir after transplanting yearling bass in 1997. Young-of-the-year bass were not sampled however. Green sunfish which were planted illegally are present as are a few rainbow trout left over from when reservoir was managed for trout.

Richland County

Sampling at Gartside Reservoir found six fish species present (Table 2). Northern pike per gill net was up slightly from previous years. A large year class of blue gill that showed up in 1998 was even more abundant in 1999. Yellow perch reproduction was good in 1998 but did not show up as yearlings in 1999. Smallmouth bass and walleye are not showing up as adults. Largemouth bass, black bullheads and white suckers are present in Kvaalen Reservoir. The land owner reports that yellow perch are still present in Wick Reservoir.

Rosebud County

Walleye averaging nearly 1.2 pounds were the most abundant fish in gill net catches at Castle Rock Reservoir (Table 2). Northern pike are also doing well. No blue gill were caught in overnight gill net sets (Table 3). The walleye catch rate was down from 1998 and northern pike numbers appear to be trending upward.

Five rainbow trout reservoirs were sampled in Rosebud County and all had trout present. Schlesinger #1 Reservoir has yellow perch and northern pike.

Treasure County

Kicker #2 Reservoir has an abundance of largemouth bass.

Wibaux County

Sampling efforts at Ray Banister Reservoir produced no fish and only one rainbow trout was caught at the Miske Pond.

Prepared by: Vic Riggs

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Water referred to:

Baker Lake	21-1778
South Sandstone Res.	21-8775
Gartside Reservoir	21-3250
Castle Rock Lake	21-2527

Keywords

Small reservoirs	yellow perch
largemouth bass	crappie
smallmouth bass	northern pike
rainbow trout	

Table 1. Results of new pond surveys in 1999.

Pond Name	County	Location			Max Depth (ft)	Fish Species Present	Management Plan
		T	R	S			
Smith Cattle Inc. #4	Garfield	14N,	41E,	?	N46 58.955 W106 33.401	8	None
Murnion, Coleman #1	Garfield	18N,	38E,	19	N47 17.947 W106 55.512	12	fathead minnow brook stickleback plains killifish
Murnion, Coleman #2	Garfield	18N,	38E,	20	N47 17.651 W106 53.872	9	fathead minnow

Table 2. Results of sampling previously planted reservoirs, 1999.

Pond Name	Type of Sample	Species	No. Caught	No. Measured	Mean Length (mm)	Mean Weight (gm)	Length Range (mm)	Weight Range (gm)
<u>Carter County</u>								
Talcott Reservoir	1 seine haul	No fish						
	2 gill nets	NP	7	7	625	1739	452-787	560-3180
		YP	3	3	239	212	203-274	195-240
Spring Canyon Res.	Observed small trout surfacing.							
LaBree, Pat Res.	1 seine haul	No fish						
	2 gill nets	RBT	16	11	281	366	190-405	100-865
Hanley, Pat Res.	hook & line	RBT	1	1	415	800		
Sidney Reservoir	hook & line	RBT	13	13	300	333	204-395	140-490
Frigid Reservoir	hook & line	RBT	13	13	331	362	300-365	250-470
<u>Custer County</u>								
Taylor, Cody Res.	1 seine haul	No fish						
Spotted Eagle Pond	2 seine hauls	BCR	1	1	235	150		
		WCR	1	1	205	80		
		YP	4	4	165	68	142-180	40-80
		YPYOY	11	11	57		54-62	
		BG	6	6	141	71	120-159	45-95
		RCSU	1	1	526	2580		
		RCSUYOY	1	1	60			
		RHSU	1	1	483	1180		
		CARP	4	4	449	1083	409-506	810-1480
Haughian, Dan Res.	hook & line	LMB	5	3	237	210	220-262	150-270
<u>Dawson County</u>								
Johnson Reservoir	2 gill nets	YP	420	20	170	59	142-215	35-120
		SMB	3	3	264	210	254-272	190-240
Hollecker Reservoir	1 seine haul	minnows	500	mostly fathead minnow				
	2 gill nets	RBT	4	4	279	364	254-296	240-420
		NP	1	1	664	2535		
		SNS	2	2	703	1333	689-717	1195-1470
		RCSU	1	1	409	1040		
		WSU	1	1	315	350		
		CARP	1	1	494	1950		

Table 2. Results of sampling previously planted reservoirs, 1999.

Pond Name	Type of Sample	Species	No. Caught	No. Measured	Mean Length (mm)	Mean Weight (gm)	Length Range (mm)	Weight Range (gm)
<u>Dawson County (cont.)</u>								
Lindsey Reservoir	1 seine haul	BBHYOY	8	8	52		45-60	
	2 gill nets	YP	1	1	171	50		
		NP	1	1	420	380		
		BBH	89	19	159	58	122-186	30-90
Burman, Marvin Res.	hook & line	RBT	63	13	232	180	205-257	120-230
<u>Fallon County</u>								
Maier Reservoir	2 gill nets	SMB	2	2	249	220	221-265	110-280
		LMB	2	2	285	440	247-351	260-800
MacKay Ranch Res.	hook & line	LMB	63	29	228	158	178-292	85-285
Pruett, Clyde Res.	hook & line	RBT	20	20	219	89	169-295	30-200
Schweigert, Wilbert Reservoir	hook & line	RBT	26	10	231	187	173-406	50-735
Hall, Rush Res.	hook & line	RBT	7	7	247	179	205-322	100-345
<u>Garfield County</u>								
Brooks, L.C. #3 Res.	1 gill net	No fish						
Kreider, Dale #2 Res.	hook & line	RBT	15	15	285	223	175-330	40-350
Kreider, Dale #1 Res.	hook & line	LMB	66	35	209	123	183-252	80-180
McRae, Jack #1 Res.	1 gill net	No fish						
McRae, Jack #2 Res.	hook & line	LMB	40	35	289	329	256-310	200-400
Smith Cattle #1 Res.	hook & line	No fish						
Smith Cattle #2 Res.	hook & line	No fish						
<u>Powder River County</u>								
Mud Turtle Res.	hook & line	RBT	13	5	274	214	261-287	180-255

Table 2. Results of sampling previously planted reservoirs, 1999.

Pond Name	Type of Sample	Species	No. Caught	No. Measured	Mean Length (mm)	Mean Weight (gm)	Length Range (mm)	Weight Range (gm)
<u>Prairie County</u>								
Ayers, Courtney Trout Reservoir		Owner reports trout died in 1998.						
Ayers, Courtney Bass Reservoir	hook & line	LMB	83	33	236	214	165-370	50-770
		BG	10	10	196	183	180-212	135-230
	1 gill net	LMB	5					
		RBT	16	11	369	618	347-430	440-830
		BG	1	1	201	120		
Lee, Don Trout Res.	2 gill net	RBT	72	25	197	115	178-227	80-180
Lee, Don Bass Res.	2 gill net	RBT	15	15	196	101	185-209	80-120
Reukauf, Walt Res.	1 seine haul	RBT	30	23	253	205	142-375	40-570
Clark Reservoir	hook & line	LMB	4	4	246	220	217-305	140-450
		GS	8	8	119	29	101-151	20-363
	2 seine hauls	GS	12					
	3 gill nets	LMB	7	7	305	550	230-350	180-860
		RBT	2	2	355	470	348-361	450-490
		GS	25	25	119	31	102-159	15-120
<u>Richland County</u>								
Gartside Reservoir	2 seine hauls	NP	1	1	385	400		
		LMB	2	2	188	93	185-190	90-95
		Juv. LMB	5	5	90		84	100
		SMB	1	1	124	30		
		YP	2	2	177	65	124-214	30-100
		Juv. YP	5	5	95		92-100	
		BG	500	20	111	24	95-134	10-40
		BGYOY	180	30	53		44-64	
		BCR	4	4	204	125	190-214	110-140
		BCRYOY	2	2	75		71-79	
	2 gill nets	NP	8	8	528	1325	346-920	205-6356
		BCR	2	2	190	98	177-202	80-115
Kvaalen, Oscar Res.	hook & line	LMB	1					
		BBH	1					
		WSU	6					
Wick Reservoir	telephone	YP are still present						

Table 2. Results of sampling previously planted reservoirs, 1999.

Pond Name	Type of Sample	Species	No. Caught	No. Measured	Mean Length (mm)	Mean Weight (gm)	Length Range (mm)	Weight Range (gm)
<u>Rosebud County</u>								
Castle Rock Res.	3 seine hauls	LMB	12	12	208	197	100-340	10-700
		LMBOY	109	21	38		32-44	
		SMBYOY	2	2	28		26-30	
		BG	38	22	139	67	103-206	20-180
		BGOY	78	20	59		45-72	
		BCR	6	6	112	43	72-240	5-220
		BCRYOY	5	5	36		32-42	
	3 gill nets	NP	17	17	462	591	301-662	120-1790
		WE	31	31	395	557	224-570	100-1230
		LMB	3	3	312	615	242-347	240-870
		SMB	2	2	292	450	232-351	210-690
Grebe, Ed #1 Res.	hook & line	RBT	39	27	381	596	331-457	320-1090
Grebe, Ed #2 Res.	hook & line	RBT	22	7	279	291	258-291	240-330
Big Timber Trout Pond #1	2 gill nets	RBT	21	14	313	473	235-420	180-970
Hofer, Paul #2 Res.	hook & line	RBT	9	9	229	162	198-261	120-190
		RBTYOY	30					
Schlesinger Res. #1	1 seine haul	YPYOY	11	11	42		39-42	
	2 gill nets	NP	17	14	368	334	340-407	270-430
		YP	79	26	212	178	163-271	100-320
Potts, Dave Trout Reservoir	2 gill nets	RBT	34	29	333	446	270-503	225-1140
<u>Treasure County</u>								
Kicker Reservoir #2	hook & line	LMB	179	29	204	114	189-368	80-710
<u>Wibaux County</u>								
Banister, Ray Res.	2 gill nets	No fish						
Miske Pond	hook & line	RBT	1	1	220	130		

Table 3. Mean total length and catch rate (average number per gill net) of blue gill, walleye and northern pike at Castle Rock Lake.

Year	<u>Bluegill</u>		<u>Walleye</u>		<u>Northern Pike</u>	
	Catch Rate	Mean Length (mm)	Catch Rate	Mean Length (mm)	Catch Rate	Mean Length (mm)
1983	3.0	126	0.3	517	7.0	364
1984	10.5	124	0.5	250	12.8	450
1987	33.3	154	0.2	258	4.2	478
1988	17.2	154	0.7	430	7.8	483
1989	10.0	156	0.0		6.7	445
1990	13.7	164	0.3	321	3.3	494
1991	21.8	170	3.0	409	4.0	422
1992	3.7	162	3.7	408	3.7	476
1994	4.8	176	7.8	408	1.5	466
1995	6.3	165	8.0	415	2.3	495
1996	3.3	172	10.0	334	1.0	506
1997	0.3	182	11.5	396	1.8	491
1998	1.3	158	17.3	425	4.3	485
1999	0	0	10.3	395	5.7	462

How can this be
if we have capture
data?