

Middle Clark Fork River Drainage

Physical Description

The middle Clark Fork River drainage begins at the confluence of the Clark Fork and Blackfoot rivers at Milltown and extends downstream for 120 miles to the mouth of the Flathead River. The river flows generally westward as it runs through Missoula, Mineral and Sanders counties. Just downstream of Missoula, the Bitterroot River enters and nearly doubles the river's discharge. Other major tributary watersheds include Rattlesnake Creek, Grant Creek, Mill Creek, Ninemile Creek, Petty Creek, Trout Creek, Cedar Creek, and the St. Regis River system. River volume roughly doubles again when the Clark Fork joins with the Flathead River near Paradise.

The mainstem Clark Fork River channel is generally entrenched and stable throughout its length. The one exception is a 25 mile section through the Missoula Valley from Kelly Island (west side of Missoula) to the Ninemile Creek area (near Huson), where the river has a wide, accessible floodplain and active lateral migration. The river alternates between relatively narrow rock canyons and wider agricultural valleys as it progresses downstream. Major canyons include Hellgate Canyon (East Missoula), the Alberton Gorge (Alberton), and the "Cutoff" section between St. Regis and the Flathead River confluence. Land ownership along the mainstem is predominantly private, with scattered FWP, Department of Natural Recourses & Conservation, and U.S Forest Service parcels.

Tributary watersheds include more than 50 coldwater trout streams that lie primarily on publicly owned timberlands at high and mid-elevations. As tributaries reach foothills and near the valley floor, private land ownership becomes much more prevalent. Most tributary streams are bisected by major transportation system crossings, such as railroad, interstate highway, and frontage roads, on the valley floor before they reach the Clark Fork River. Many of these crossings on smaller streams act as complete barriers to upstream fish movement.

There are numerous high elevation "mountain" lakes within the middle Clark Fork basin, as well as a few constructed lakes and ponds on the valley floor. More than 120 alpine mountain lakes (> 1 acre) occur in two general areas: in the Bitterroot Mountains along the Montana-Idaho divide from Alberton to Lookout Pass; and within the Rattlesnake National Recreation Area and Wilderness area near Missoula. Although some have been enhanced by dams, nearly all these waters are natural lakes formed in high glacial troughs and cirque basins. Valley ponds and small lakes (managed as public fisheries and recreation sites) are generally man made reservoirs and reclaimed gravel pits. These include Frenchtown Pond, Kreiss Lake, Silvers Lagoon at McCormick Park, and several other small water bodies.

Fisheries Management

Located in the west central part of the state, the middle Clark Fork River is a large system that runs through a major population center (Missoula) and developed valleys downstream. Although the fishery is not as renowned as in some of its major tributaries, such as Rock Creek, Blackfoot River, Bitterroot River, the middle Clark Fork River supports a popular trout fishery. This system has gained national notoriety in the past decade with the removal of Milltown Dam, clean-up of river contaminants at its upper end, and anticipated recovery of fishery resources.

The middle Clark Fork River is managed as a wild trout fishery, emphasizing natural reproduction. Although native bull trout and westslope cutthroat trout are present throughout all reaches, the river fishery is dominated by non-native rainbow trout, rainbow x westslope cutthroat trout hybrids, and brown trout. Rainbow trout and their hybrids generally make up 70-80% of the trout population within this river section. Brown trout are found in moderate densities in the Missoula area, but generally decrease in abundance in lower reaches. Mountain whitefish are common throughout the mainstem river section.

In addition to salmonids, the middle Clark Fork is home to nine other native fish species including peamouth, northern pikeminnow, longnose dace, redside shiner, longnose sucker, largescale sucker, and three species of sculpin. Ten non-native fish species are also common in various parts of the basin, including brown trout, brook trout, rainbow trout, Yellowstone cutthroat trout, northern pike, pumpkinseed, largemouth bass, smallmouth bass, yellow perch, and white sucker. Prior to removal of Milltown Dam and Milltown Reservoir, northern pike were becoming more prevalent in the Clark Fork River. The reservoir served as a primary spawning and rearing area for this species, which then dispersed downstream and occupied the mainstem river in significant numbers. Northern pike numbers initially declined after removal of Milltown Dam in 2009 but have become more abundant in recent years. They are now common in large eddies and backwaters throughout the middle Clark Fork River system. Because northern pike often prey on trout, monitoring northern pike distribution, abundance, movement, and food habits will be key components in managing the river system and regional wild trout fisheries. Smallmouth bass densities have also increased dramatically in the lower Flathead River and there have been reports of this species in the Clark Fork River upstream of the Flathead River confluence. However, these reports appear to be related to seasonal movements with no established resident population in the middle Clark Fork River. Monitoring population status and the expansion of smallmouth bass may become a priority if the species becomes more prevalent in the river system.

Tributary stream drainages support a range of abundant, resident trout species and are essential for spawning and rearing of trout that eventually reside in the mainstem river. Species composition varies greatly among tributaries and, in many streams, changes along a continuum from the headwaters to the mouth. Larger tributaries are generally open to fish movement with the Clark Fork River and are dominated by rainbow x cutthroat trout hybrids and brown trout. From the mainstem, species composition typically transitions to westslope cutthroat trout in an upstream direction, with pockets of brook trout also occurring in many transition areas and warmer tributaries. Smaller tributary systems and those at higher elevations are generally dominated by stream resident westslope cutthroat trout. Many of these genetically unaltered westslope cutthroat trout populations are protected from hybridization with rainbow trout by artificial fish passage barriers associated with the extensive valley transportation system, including road culverts and railroad tunnels.

Bull trout populations are found in the coldest remaining systems with suitable habitat, including Fish Creek, Cedar Creek, and portions of the St. Regis River. The Fish Creek drainage supports the most intact habitat and abundant native trout populations within the middle Clark Fork region. These few remaining bull trout populations provide a limited amount of bull trout recruitment to the Clark Fork River where densities are 1-2 adults per mile in most reaches. Rattlesnake Creek also historically supported a viable migratory bull trout population, but numbers and distribution have declined dramatically over the past decade. The status of this migratory population continues to be monitored closely, but all measures of population trajectory and habitat conditions (particularly water temperature) suggest that long-term

viability is doubtful. The Rattlesnake Creek mouth is also a key location for monitoring and evaluation, given its importance for adult wild and native trout staging and the social context within Missoula. The location receives intense fishing pressure on migratory trout, particularly those staging to spawn in spring and those seeking thermal refuge in summer.

Although nearly all the mountain lakes (> 100) in the basin were historically fishless, roughly half now support trout populations. Many still contain self-sustaining, wild populations of brook trout, westslope cutthroat trout, rainbow trout, and Yellowstone cutthroat trout that were introduced in the mid-1900s. Most of these lakes are no longer stocked, but many others with limited natural reproduction are stocked periodically with westslope cutthroat trout. Management of stocked lakes ranges from high density, frequently planted waters designed for high catch rates to infrequently stocked, low density trophy waters. Many fishless lakes are also maintained to preserve natural ecological integrity (e.g., for conservation of native amphibians such as the long-toed salamander and spotted frogs). Management strategies and information for all mountain lakes in Rattlesnake Wilderness can be found here, and for the middle Clark Fork of the Bitterroot Mountains here.

Angling occurs year-round on the middle Clark Fork River, but is most popular in the early spring, summer, and fall. Opportunities exist for both wade and float angling and while fly fishing is particularly popular, artificial lures and bait fishing are also common. Special fishing regulations have been instituted to protect spawning fish, native fish strongholds and staging areas, and to retain the quality of trout fisheries – despite increasing fishing pressure. Summer and fall also offer excellent angling opportunities on tributary streams and mountain lakes.

Valley lakes and ponds provide popular put-and-grow trout fisheries that are accessible for most of the year. These waters are stocked frequently and offer opportunities for high catch rates and liberal harvest. These fisheries are geared to kids fishing and family-friendly environments with easy access.

The middle Clark Fork River supports a wild trout fishery comprised primarily of salmonids, where remaining native westslope cutthroat trout populations supplement introduced rainbow trout and rainbow x westslope cutthroat trout hybrids. Brown trout are also present but make up a small percentage of the overall trout community (Knotek, 2022).

Total trout abundance generally varies between 200 and 600 catchable trout per mile (Knotek, 2022). Many interacting environmental and biological factors contribute to the abundance of trout in these river reaches. Key factors include, but are not limited to, summer drought and water temperature extremes, winter ice conditions, spawning and juvenile rearing conditions in tributary streams, and major anthropogenic disturbances. Abiotic influences create an unstable, and seasonally stressful, environment for salmonids in the middle Clark Fork River. Low overall trout carrying capacity and observed fluctuations in population abundance reflect this situation for the fishery.

Acute impacts of Milltown Dam and Reservoir remediation were pronounced on the fishery through the Missoula valley (Knotek, 2022). Trout population abundance is inherently volatile in this reach and remediation work at Milltown added to this instability. Trout populations rebounded to pre-Milltown Dam removal levels concurrent with rebounding angling pressure (2011-2017), indicating angler pressure was not significantly constraining population growth. Impacts on trout population abundance below the Bitterroot River was not as pronounced. The addition of Bitterroot River water and its dilution

effect on upper Clark Fork River contaminants likely contributes to trout population stability, although the impacts of Milltown Dam removal are still evident during the 2007-2011 time period.

There has been no discernable trend or change in trout population size structure over time in the two Clark Fork River reaches (Knotek, 2022). Trout size structure has been relatively stable despite temporal differences in abundance and major fluctuations in fishing pressure, again suggesting little effect of fishing pressure on trout populations under current regulations.

Habitat

The middle Clark Fork River is considered a recruitment limited fishery where enhancing spawning access for wild fish and improving the quality of tributary habitats has been a priority for the past two decades. Restoration and improvement efforts have occurred throughout the watershed but have focused on native fish strongholds and tributaries with high production potential. Fish passage improvements, riparian restoration projects, instream enhancements, fish screens, and other habitat improvements have involved several partners on both public and private lands. Notable enhancement projects have been completed on upper Ninemile Creek, Fish Creek, Cedar Creek, Rattlesnake Creek, and many other tributaries. As the largest land manager in the basin, the USFS has also undertaken many activities on their lands associated with fish passage and the forest road system. In addition, key land acquisitions have been completed in tributary drainages to protect spawning and rearing habitat. Notable projects include public acquisition of more than 50,000 acres to form the Fish Creek WMA and purchase of more than 5 miles of riparian corridor on Cedar Creek. Numerous other conservation easements and smaller acquisitions have been completed by public and private organizations throughout the basin.

River and stream dewatering from irrigation is generally not a significant limiting factor in the basin, particularly when compared with neighboring river systems. However, legacy impacts of historic mining and timber management (roads) remain significant factors degrading habitat quality on a large scale and in many tributary drainages. Restoration and remediation activities addressing these impacts will be a priority in the future that will continue to be led by the USFS, Trout Unlimited, FWP and other partners.

Habitat protection through Stream Protection Act (124) and Natural Streambed and Land Preservation Act (310) permitting is important to maintaining trout fisheries in the middle Clark Fork. Rapid development of residential properties, particularly in the Missoula area, can impair habitat in nursery streams that produce trout for important mainstem trout fisheries. Permitting provides the opportunity to condition development to reduce or eliminate aquatic habitat degradation.

Special Management Issues and Emphasis

Mainstem Clark Fork River Habitat and Water Quality

Over the past decade, substantial resources have been invested in the removal of Milltown Dam, remediation of river contaminants, and restoration of the Clark Fork River. Monitoring of river habitat, water quality, and fish and aquatic populations will be essential in evaluating the long-term effects of this work. Similarly, possible contaminant remediation and restoration at the Smurfit-Stone Mill site near Frenchtown could have major benefits for river water quality, floodplain function, and habitat quality in that reach.

Tributary Native Trout Restoration and Enhancement

Although restoration projects occur in most tributary watersheds, Rattlesnake Creek, Fish Creek, Cedar Creek, and the St. Regis River have been the focus of migratory native trout conservation activities in the middle Clark Fork region over the past two decades. Restoration and enhancement activities include large scale removal of fish passage barriers and road decommissioning, instream habitat enhancements, dam removal projects, acquisition of the Fish Creek WMA and other public lands, and many other actions. These types of activities remain a priority for implementation in highlighted native trout priority drainages, in combination with protective fishing regulations and a native trout management emphasis.

Tributary Westslope Cutthroat Trout Conservation

Most wild cutthroat trout populations in western Montana rivers and streams have been inadvertently hybridized by introduced rainbow trout or Yellowstone cutthroat trout. However, 40-45 populations residing in small tributaries to the middle Clark Fork River have been isolated and protected from hybridization by fish passage barriers associated with transportation crossings (e.g., highway and railroad crossings) and other barriers located near the stream mouths. Management of these populations includes ensuring barriers are maintained, monitoring population genetics for hybridization and inbreeding issues, and planning translocation of individuals when genetic diversity is inadequate. These aspects are currently being updated and re-evaluated for all known genetically unaltered westslope cutthroat trout population isolates within Middle Clark Fork River tributaries. Conservation measures and project priorities will be developed over the next five years as genetics and barrier information is integrated into the management program.

Mountain Lake Fishery Monitoring and Evaluation

Mountain lakes in the middle Clark Fork region (in the <u>Rattlesnake Wilderness</u> and <u>middle Clark Fork region of the Bitterroot Mountains</u>) were surveyed and evaluated as part of the management plan formulation process. Ongoing monitoring of mountain lake fisheries is used to assess the status of stocked and self-sustaining fisheries, determine if stocking rates and frequencies are adequate to achieve specific waterbody management goals, and evaluate angler use and preferences. For instance, lakes reliant on natural reproduction are monitored to determine if supplemental stocking is needed and stocking prescriptions at currently planted lakes are evaluated to determine if program adjustments are warranted. Fishless lakes are also monitored to ensure maintenance of natural aquatic communities and to evaluate the suitability of some lakes for establishment of new recreational fisheries.

Monitoring and Evaluation of Introduced Warmwater Fish Species

Unauthorized introductions of northern pike and smallmouth bass have occurred in multiple locations within FWP Region 2, including the middle Clark Fork drainage. As these populations expand and become more prevalent, evaluating their impact on trout populations and other fisheries is a management priority. Monitoring and evaluation objectives include collection of species distribution, movement, and relative abundance. Diet information would be important to directly estimate predation impacts on trout and native nongame species. Similar management objectives and data collection priorities are anticipated if additional unauthorized fish introductions are detected.

Chemical Rehabilitation and Re-stocking of Upper Trio and Moore Lakes

Moore and Upper Trio lakes are two key mountain lakes that lie in the headwaters of South Fork Little Joe (St Regis River basin) and North Fork Fish Creek, respectively. These tributary drainages are native trout strongholds that are core areas for bull trout spawning and rearing. Brook trout in headwater lakes provide marginal fisheries for anglers and represent a hybridization and competition threat for native trout populations in streams below. Removal of brook trout and subsequent introduction of westslope cutthroat trout in the lakes is expected to improve the lake fisheries and reduce threats to migratory native trout in downstream stream reaches.

Monitoring and Evaluation of Angling Impacts at Key Stream Mouths

Tributary stream confluences with the mainstem Clark Fork River are essential staging areas for wild trout spawners and important thermal refugia for native trout during hot summer months and drought periods. Many of these locations, including the mouths of Rattlesnake Creek, Ninemile Creek, Petty Creek, Trout Creek, Cedar Creek, Dry Creek, and the St Regis River support intense fishing pressure when trout and other coldwater fish are concentrated there. This issue is relevant in most Region 2 river reaches but is particularly significant along the middle Clark Fork mainstem because of smaller trout population sizes, declines in fluvial native trout populations, and warm summer river temperatures. The mouth of Rattlesnake Creek is the most prevalent example of these issues and will be examined closely over the next 5 years to evaluate potential fishery impacts and explore viable options to balance fishery resource protection with opportunity for anglers.

Designated Hoot Owl Reaches

Clark Fork River mainstem and tributary stream reaches traditionally affected by drought restrictions are identified below (Table 2.09-1). Native trout populations in these river and tributary reaches have been affected by high water temperatures and low flow levels during drought periods over the past two decades and are likely to be impacted in the future. Classification, criteria, and measurement apply to the entire reach; however, implementation of restrictions may occur in all or parts of a reach depending on specific temperature, flow, and angling pressure at that time. Furthermore, there are times and locations that cutthroat trout and bull trout congregate within a fishery designated as non-native trout, such as when they are seeking cold water refuge in springs or at tributary mouths during warmer months. In these instances, a cutthroat or bull trout criteria may be applied to these areas.

Table 2.09-1: Designated "hoot owl" reaches where drought related fishing restrictions and closures due to fishing pressure, high water temperatures, and/or low flows are expected to be implemented. Drought related restrictions and closures may also be placed on waters not listed here.

Waterbody	Reach	Classification	Criteria
Middle Clark	Flathead River	Non-native	Daily maximum river temperature reaches
Fork River	confluence to	salmonid sport	or exceeds 73°F for three consecutive days
	Blackfoot River	fishery	or stream flows fall below the 5 th
	confluence (RM		percentile of daily mean values for the
	93.3 to 212)		date.

St. Regis River	Confluence with Clark Fork River (including 100 yd radius at the mouth) to Twelvemile	Cutthroat trout fishery	 Measurements relevant for criteria will occur at U.S. Geological Site gage 12353650 at Superior. Measurements at this gage are representative of temperatures throughout the middle Clark Fork. Daily maximum temperatures reach or exceed 66°F for three consecutive days. Measurement for relevant criteria with site-specific temperature monitoring with portable recorders.
Upper Fish Creek	Creek (RM 0.0 to 12.5) Confluence of South and West Forks to the headwaters (RM 9.2 to 17)	Bull trout waters	 Daily maximum temperatures reach or exceed 60°F for three consecutive days. Measurement for relevant criteria with site-specific temperature monitoring with portable recorders.
Lower Fish Creek	Confluence with Clark Fork River (including 100 yd radius at the mouth) to confluence of South and West Forks (RM 0.0 to 9.2)	Cutthroat trout fishery	 Daily maximum temperatures reach or exceed 66°F for three consecutive days. Measurement for relevant criteria with site-specific temperature monitoring with portable recorders.
Cedar Creek	Confluence with Clark Fork River to confluence of Oregon Gulch and Cedar Creek (RM 0.0 to 6.1)	Bull trout waters	 Daily maximum temperatures reach or exceed 60°F for three consecutive days. Measurement for relevant criteria with site-specific temperature monitoring with portable recorders.
Trout Creek (near Superior)	Confluence with Clark Fork River (including 100 yd radius at the mouth) to confluence with Vann Ness Creek (RM 0.0 to 7.1)	Cutthroat trout fishery	 Daily maximum temperatures reach or exceed 66°F for three consecutive days. Measurement for relevant criteria with site specific temperature monitoring with portable recorders.
Rattlesnake Creek	Confluence with Clark Fork	Cutthroat trout fishery	 Daily maximum temperatures reach or exceed 66°F for three consecutive days.

River (including	 Measurement for relevant criteria with
100 yd radius at	site specific temperature monitoring with
the mouth) to	portable recorders.
former dam	
location (RM	
0.0 to 3.8)	

FISHERIES MANAGEMENT DIRECTION FOR MIDDLE CLARK FORK RIVER DRAINAGE

Water	Miles/acres	Species	Recruitment Source	Management Type	Management Direction		
Clark Fork River - Blackfoot River confluence downstream to confluence with	120 miles	Bull trout (N), Westslope cutthroat trout (N)	Wild	Conservation	Continue year-long closure on angling for bull trout. Enhance fluvial populations for conservation and westslope cutthroat trout fishery.		
Flathead River		Rainbow trout, Brown trout	Wild	Quality	Protect fishery quality through fishing regulations. Protect habitat, ensure adequate connectivity with tributaries, and enhance natural recruitment in areas that are not native trout strongholds.		
		Northern pike, Smallmouth bass	Wild	Suppression	No creel limit for pike; encourage harvest of both introduced species to reduce competition with and predation on trout.		
		· ·			n of Smurfit-Stone Mill site and facilitate		
		•		•	ove habitat quality in spawning and rearing areas		
		•			mited fishery. Conduct population status and etic analyses, and other standard fisheries survey		
Kreiss Lake	10 acres	Westslope cutthroat trout	Hatchery	Put-Grow-and-Take	Facilitate high catch rates and quality harvest opportunity.		
		Largemouth bass	Wild	General	Provide liberal harvest opportunity.		
Critical habitat nee	ds and activities	:: Evaluate westslope cutthroat tro	ut stocking pro	escription. Ensure that ade	equate water volume is maintained in lake.		
•	Monitor water quality and status of unauthorized aquatic introductions in cooperation with AIS program and community watershed groups. Monitor fishery and stocking programs through gill-net surveys, creel surveys, and other standard survey methods.						
Silvers Lagoon (McCormick Pond)	5 acres	Westslope cutthroat trout, Rainbow trout	Hatchery	Family Fishing Water	Kids fishing pond - Facilitate high catch rates and quality harvest opportunity for kids.		
		Northern pike,	Wild	General			

Water	Miles/acres	Species	Recruitment Source	Management Type	Management Direction
		Pumpkinseed,			Provide liberal harvest opportunity. Reduce
		Yellow perch			numbers if possible.
Critical habitat n	eeds and activities	s: Reduce entrainment of unwante	ed fish from wa	iter supply canal. Ensure a	idequate water exchange rate. Monitor fishery
and stocking pro	grams through gil	l-net surveys, creel surveys, and o	ther standard s	survey methods.	
Frenchtown Pond	22 acres	Rainbow trout	Hatchery	Family Fishing Water	Facilitate high catch rates and quality harvest opportunity for kids fishing events and families.
		Largemouth bass	Transfer	Quality	Restrictive harvest regulations to ensure quality of fishery. Continue to transport and plant adult fish if available.
		Northern pike, Pumpkinseed, Yellow perch	Wild	General	Provide liberal harvest opportunity. Reduce numbers if possible.
				_	ent presence to promote compliance and rveys, creel surveys, and other standard survey
Fish Creek, Cedar Creek, St Regis River, Rattlesnake Creek	17.0 miles 14.0 miles 38.6 miles 23.3 miles	Bull trout (N), Westslope cutthroat trout (N)	Wild	Conservation	Conserve and enhance migratory and resident populations. Continue yearlong closure on angling for bull trout and catch-and-release regulations for cutthroat trout where appropriate, with protective restrictions at stream mouths.
		Rainbow trout, Brown trout, Brook trout	Wild	General	Maintain present numbers and sizes. Consider management that reduces numbers and distribution if it would improve native trout numbers and westslope cutthroat trout angling opportunities.

Critical habitat needs and activities: Improve habitat to support ecosystem function and production of native trout and whitefish. Enforcement presence needed to ensure compliance. Eliminate brook trout from headwater lakes. Conduct population status and trend monitoring in mainstem river and tributaries using electrofishing surveys, redd counts, weir traps, genetic analyses, and other standard fisheries survey methods.

Water	Miles/acres	Species	Recruitment Source	Management Type	Management Direction
Open Tributary		Bull trout (N),	Wild	Conservation	Conserve and enhance migratory and resident
Systems (Fish		Westslope cutthroat trout (N)			populations. Continue protective regulations to
barriers					enhance westslope cutthroat trout fishery.
generally					Continue yearlong closures on angling for bull
absent):					trout in select areas.
St. Regis River,	38.6 miles				
Ninemile Creek,	25.5 miles	Rainbow trout,	Wild	Quality	Protect adult spawners and fishery quality
Rattlesnake	23.3 miles	Brown trout			through fishing regulations. Protect habitat and
Creek,					ensure adequate connectivity with tributaries to
Grant Creek,	18.3 miles				enhance natural recruitment in areas that are
Dry Creek,	15.3 miles				not native trout strongholds.
Trout Creek,	14.7 miles				
Mill Creek,	13.4 Miles	Brook trout	Wild	General	Provide liberal harvest opportunity and reduce
Albert Creek,	11.4 Miles				numbers if possible.
Nemote Creek,	9.8 Miles				
Sixmile Creek,	8.9 Miles				
Siegel Creek,	7.0 Miles				
Petty Creek	4.3 Miles				

Critical habitat needs and activities: Improve habitat quality and connectivity where needed. Conduct population status and trend monitoring in mainstem river and tributaries using electrofishing surveys, redd counts, weir traps, genetic analyses, and other standard fisheries survey methods.

	8	ishing surveys, read counts, wen tr	- 1, 8	7000, 0000	,
Closed Tributary		Westslope cutthroat trout (N)	Wild	Conservation	Ensure isolation and restrict introduction of
Systems (Barriers					hybridizing species. Restrict harvest to maintain
prevent					or enhance numbers.
upstream					
movement from		Brook trout	Wild	General	Provide liberal harvest opportunity and reduce
Clark Fork River)					numbers where possible.
- with genetically					
unaltered,					
isolated					
westslope					
cutthroat trout					
	18.7 miles				

Water	Miles/acres	Species	Recruitment Source	Management Type	Management Direction	
populations:	9.5 miles					
Rock Creek	9.4 miles					
Rock Creek	8.7 miles					
Deep Creek	8.6 miles					
Tamarack Creek	8.2 miles					
Thompson Creek	7.5 miles					
Flat Creek	7.4 miles					
Deep Creek	7.3 miles					
Second Creek	7.2 miles					
Meadow Creek	6.7 miles					
Cold Creek	6.2 miles					
First Creek	6.1 miles					
Sevenmile Creek	4.8 miles					
Johnson Creek	4.5 miles					
Marshall Creek						
Patrick Creek	4.2 miles					
West Mountain	3.1 miles					
Creek	3.1 miles					
Slowey Gulch	2.7 miles					
Quartz Creek	1.7 miles					
Butler Creek	1.6 miles					
O'Keefe Creek						
Lavalle Creek						
Critical habitat nee	eds and activities	s: Maintain fish passage barriers is	olating popula	tions from Clark Fork Rive	er, improve habitat and connectivity within	
drainages, and res	trict new fish int	roductions – particularly in fish po	onds. Conduct	population status and tre	nd monitoring in mainstem river and tributaries	
using electrofishin	using electrofishing surveys, redd counts, weir traps, genetic analyses, and other standard fisheries survey methods.					
High Elevation	1-30 acres	Westslope cutthroat trout (N)	Wild	Conservation	13 lakes – Self-sustaining fisheries of various	
(Mountain)	each,				quality.	
Lakes: 121 Lakes	861 acres					
Total > 1 acre in	Total	Westslope cutthroat trout (N)	Wild/	Put-Grow-and-Take	14 lakes – Management objective varies by lake,	
<u>Bitterroot</u>			Hatchery		including trophy, quality, and harvest-oriented	
Mountains and					fisheries.	

Water	Miles/acres	Species	Recruitment Source	Management Type	Management Direction
<u>Rattlesnake</u>					
<u>Wilderness</u>					18 lakes – Reduce densities or eliminate to
		Brook trout	Wild	General	improve quality.
See specific					
Mountain Lake					3 lakes – Self-sustaining fisheries of various
Management		Yellowstone cutthroat trout	Wild	General	quality
Plan Reports for					
Each Water					8 lakes - Self-sustaining fisheries of various
Body ³		Rainbow trout	Wild	General	quality
					65 lakes – Maintain ecological integrity.
Fishless Lakes		None	N/A	Conservation	

Critical habitat needs and activities: Evaluate stocking prescriptions for put-grow-and-take fisheries. Maintain fishless lakes. Remove or suppress brook trout to enhance quality of fisheries and complement downstream native fishery goals in Upper Trio and Moore Lakes.