



FUTURE FISHERIES IMPROVEMENT PROGRAM GRANT APPLICATION

All sections must be addressed, or the application will be considered invalid



I. APPLICANT INFORMATION

A Applicant Name: Clark Fork Coalition

Mailing Address: Box 7593

City: Missoula State: MT Zip: 59807

Telephone: 406-396-7716 E-mail: will@clarkfork.org

B Contact Person (if different than applicant): Will McDowell

Address: same

City: _____ State: _____ Zip: _____

Telephone: _____ E-mail: _____

C Landowner and/or Lessee Name
(if different than applicant): Cam Balentine, lessee

Mailing Address: 895 Rt. 3 Browns Gulch Road

City: Butte State: MT Zip: 59701

Telephone: 406-491-1474 E-mail: _____

II. PROJECT INFORMATION

A Project Name: Browns Gulch Diversion #5 and Fish Screen

River, stream, or lake: Browns Gulch

Location: Township: 4N Range: 8W Section: 5

Latitude: 46.1199 Longitude: _____ *within project (decimal degrees)*

County: Silver Bow

B Purpose of Project:

The purpose of this project is to provide upstream fish passage, and prevent entrainment of trout, in the Browns Gulch Irrigation Diversion #5 on Balentine Ranch in the Silver Bow Creek drainage. This project is part of a larger, multi-partner effort to improve the westslope cutthroat trout fishery in Browns Gulch.

C Brief Project Description (attach additional information to end of application):

Browns Gulch is a tributary to Silver Bow Creek, in the Upper Clark Fork drainage. Browns Gulch headwaters are near the Continental divide, and the 80-square mile watershed discharges into Silver Bow Creek near Ramsey, Montana. Browns Gulch has a thriving trout fishery, including hefty brook trout, and genetically pure westslope cutthroat. Recent work by Fish Wildlife and Parks has shown that the westslope cutthroat in Browns Gulch are present throughout the drainage, but particularly common in the upper reaches. One of the primary constraints on expanding westslope cutthroat trout in the basin is fish passage, both upstream passage for adults, and entrainment and mortality of adults and juveniles in irrigation ditches.

Work by the Watershed Restoration Coalition, the Mile Hi Conservation District and the Natural Resource Damage Program has made some remarkable stream improvements in the Browns Gulch drainage since 2013. Several major fish passage barriers (both irrigation diversions and culverts) have been corrected; straightened and degraded channel segments have been restored, and riparian habitat has been protected by fences or natural (downed wood) projects. Today, the highest priority for Fish Wildlife and Parks is to remove four (4) remaining irrigation barriers and entrainment risks from Flume Gulch upstream toward the National Forest, in the heart of the cutthroat stronghold.

The project proposed here is simple, but important. We will work with Balentine Ranch to rebuild an irrigation diversion for Costin Ditch, and install a small corrugated water screen. This ditch is a proven trout killer—the WRC documented a significant trout kill on this ditch when it was shut off for haying in 2016. The landowner is conservation-minded and onboard with this project. The current diversion is a “push-up” pile of cobble which diverts up to three (3) cfs of water. It will be re-built using four rock weirs in a step-pool design (see attached design sheets). The corrugated water screen is a 24-inch wide model installed in a pre-fabricated steel box. The size and location of this diversion is important: it diverts 70 percent of the irrigation water used by this ranch, and is located just below Flume Gulch, a major tributary to Browns Gulch.

The Clark Fork Coalition and WRC have worked closely together for 12 years in the Upper Clark Fork, including on Browns Gulch. We have been involved in design and installation of six (6) corrugated water screens in the last three years in the Upper Clark Fork and Missoula area, including two of the largest fish screen projects in western Montana. We are keenly aware of the challenges of building and maintaining effective fish screens, and have particular interest in the success of corrugated water screens.

This project is the largest of four priority fish passage structures selected by Caleb Uerling of Fish Wildlife and Parks for improvement on or adjacent to Balentine Ranch. The designs of all four structures are complete, but for this grant we are focusing on Costin Ditch only. The Clark Fork Coalition and WRC have submitted a grant proposal to George Grant Trout Unlimited for \$5000. The Clark Fork Coalition is contributing \$3500 cash and \$2500 of project management (in-kind).

We hope that private and state funds provided to this project will provide further leverage to raise more funds to complete the last three diversions/screens on Balentine Ranch in 2022/2023. The CFC staff time to manage this project is covered by other funding. Please see www.clarkfork.org for more information about our restoration work.

Thank you for considering this Project, and for recognizing the value of Brown's Gulch to the native and sport fishery of Silver Bow Creek, and the Upper Clark Fork.

D Length of stream or size of lake that will be treated (project extent): 120 feet
 Length/size of impact, if larger than project extent (e.g. stream miles opened): 12 miles opened

E Project Budget:

Grant Request (Dollars):	\$	<u>31,987</u>
Matching Dollars:	\$	<u>20,500</u>
Matching In-Kind Services:*	\$	<u>2,500</u>
*salaries of government employees <i>are not</i> considered matching contributions		
Other Contributions (not part of this app)	\$	<u> </u>
Total Project Cost:	\$	<u>54,987</u>

F **Attach** itemized (line item) budget – see *budget template*

G **Insert** or **attach** a project location map showing the project area in relation to a major landmark or town. Please indicate if the project location is on public or private property.

PROJECT IS ON PRIVATE PROPERTY, BALENTINE RANCH. See separate project location map.

H **Attach** specific project plans (e.g. detailed sketches, plan views [showing location and type of channel modifications], example photographs), current condition photographs, and maps. **If project involves water leasing or water salvage complete and attach a supplemental questionnaire (fwp.mt.gov/habitat/futurefisheries/supplement2.doc).*

I **Attach** letters or statements of support. This includes landowner consent, community or public support, and fish biologist support.

J The project agreement includes a 20-year maintenance commitment. Please indicate (yes or no) that you will ensure project protection for 20 years. Discuss your ability to meet this commitment.

Yes ☒ No ☐

The landowner is committed to operating and maintaining the infrastructure of the diversion and the screen for 20 years. The WRC commits to providing assistance to cleaning the fish screen using its contractors in the Butte area.

K **Describe** or **attach** land management & maintenance plans, including changing to grazing regimes, that will ensure protection of the restored area.

The area around the new diversion and screen needs to be fenced with rail fence to prevent cattle from damaging the screen.

III. PROJECT BENEFITS (attach additional information to end of application):

A What species of fish will benefit from this project?

The primary species benefiting is genetically pure stock of westslope cutthroat trout inhabiting Browns Gulch. This diversion is in the reach of Browns Gulch which is a stronghold for cutthroat. A secondary species which will benefit is brook trout.

B How will the project protect or enhance wild fish habitat?

The project will enhance the overall wild fish habitat in Browns Gulch in important ways, primarily by reconnecting important parts of the middle and upper watershed for fish movement. Opening the upstream migration of trout into upper Browns Gulch and Flume Gulch (a tributary to Browns Gulch just one-quarter mile upstream of this diversion) will benefit the overall westslope cutthroat trout population. Over 12 miles of fish-bearing water exists upstream of this diversion site in Flume Gulch, Alaska Gulch, and the upper end of Browns Gulch. Much of the upstream habitat is on US Forest Service property.

C Will the project improve fish populations and/or fishing? To what extent? What are the expected short term and long term benefits to the fishery?

We expect a boost in trout populations from this investment, because the entrainment and subsequent mortality rate for juvenile and adult trout will decrease. The short-term benefit is increased survival of trout in this reach. The long-term benefits to the fishery are 1) higher survival rate of juvenile trout, and 2) higher survival rates of adult westslope cutthroat translating to higher productivity of the populations, as more large adult fish live longer.

D Will the project increase public fishing opportunity for wild fish and, if so, how?

There are fishing opportunities on public land only a mile upstream of this diversion. Westslope cutthroat and brook trout in these reaches definitely grow large enough for angling. Some of the private landowners in this area will give permission for fishing if asked, including this landowner.

E What was the cause of habitat degradation in the area of this project and how will the project correct the cause?

Traditional irrigation practices, including the use of rustic push-up dams, broke up the connectivity of the habitat in Browns Gulch. The project is restoring this connectivity, by focusing on high priority irrigation structures, particularly in the westslope cutthroat stronghold reaches in the upper watershed.

F What public benefits will be realized from this project?

Conservation of westslope cutthroat trout is a state-wide public benefit, since this is the state fish, and a favorite target for anglers, including youth anglers. If the population of cutthroat increases in Browns Gulch, and connectivity continues to improve, there is an opportunity to re-establish a migratory cutthroat population between Silver Bow Creek and Browns Gulch.

G Will the project interfere with water or property rights of adjacent landowners? (explain):

No. No changes to water rights are anticipated. The Balentine Ranch diverts this water on their property, and uses the water to the south on the neighboring property, which is leased to Balentine Ranch.

H Will the project result in the development of commercial recreational use on the site? (explain):

No.

I Is this project associated with the reclamation of past mining activity?

No.

Each approved project applicant must enter into a written agreement with Montana Fish, Wildlife & Parks specifying terms and duration of the project. The applicant must obtain all applicable permits prior to project construction. A competitive bid process must be followed when using State funds.

IV. AUTHORIZING STATEMENT

I (we) hereby declare that the information and all statements to this application are true, complete, and accurate to the best of my (our) knowledge and that the project or activity complies with rules of the Future Fisheries Improvement Program.

Applicant Signature:



Date: 12 November, 2021

Sponsor (if applicable):

Submittal: Applications must be signed and received on or before November 15 and May 15 to be considered for the subsequent funding period. Late or incomplete applications will be rejected.

Mail to: FWP Future Fisheries
Fish Habitat Bureau
PO Box 200701
Helena, MT 59620-0701

Email: Future Fisheries Coordinator
FWPFFIP@mt.gov
(electronic submissions must be signed)
For files over 10MB, use <https://transfer.mt.gov> and send
to mmcgree@mt.gov

Applications may be rejected if this form is modified.

BUDGET TEMPLATE SHEET FOR FUTURE FISHERIES PROGRAM APPLICATIONS

002-2022

Both tables must be completed or the application will be returned

PROJECT COSTS					CONTRIBUTIONS			
WORK ITEMS (Itemize by Category)	NUMBER OF UNITS	UNIT DESCRIPTION*	COST/UNIT	TOTAL COST	FUTURE FISHERIES REQUEST	MATCH (Cash or Services)**	OTHER (Not part of this application)	TOTAL
Personnel***								
Survey				\$ -		500.00		\$ 500.00
Design				\$ -		12,000.00		\$ 12,000.00
Engineering				\$ -				\$ -
Permitting				\$ -		400.00		\$ 400.00
Oversight				\$ -		2,000.00		\$ 2,000.00
				\$ -				\$ -
			Sub-Total	\$ -	\$ -	\$ 14,900.00	\$ -	\$ 14,900.00
Travel								
Mileage				\$ -	400.00	-		\$ 400.00
Per diem				\$ -				\$ -
			Sub-Total	\$ -	\$ 400.00	\$ -	\$ -	\$ 400.00
Construction Materials****								
24" Waterman headgate	1	LS	\$2,500.00	\$ 2,500.00	1,500.00	1,000.00		\$ 2,500.00
steel screen box	1	LS	\$7,500.00	\$ 7,500.00	7,500.00			\$ 7,500.00
24" corrugated screen	1	LS	\$7,100.00	\$ 7,100.00		7,100.00		\$ 7,100.00
10" HDPE pipe	32	feet	\$55.00	\$ 1,760.00	1,760.00			\$ 1,760.00
30" rock for weirs	60	CY	\$95.00	\$ 5,700.00	5,700.00			\$ 5,700.00
upland seed	1	lb	\$12.00	\$ 12.00	12.00			\$ 12.00
wetland seed	1	lb	\$15.00	\$ 15.00	15.00			\$ 15.00
				\$ -				\$ -
				\$ -				\$ -
			Sub-Total	\$ 24,587.00	\$ 16,487.00	\$ 8,100.00	\$ -	\$ 24,587.00
Equipment, Labor, and Mobilization								
Trak-hoe w/ operator	6	days	\$1,500.00	\$ 9,000.00	9,000.00			\$ 9,000.00
Dump truck	2	days	\$800.00	\$ 1,600.00	1,600.00			\$ 1,600.00
Skid steer w/ operator	6	days	\$750.00	\$ 4,500.00	4,500.00			\$ 4,500.00
				\$ -				\$ -
				\$ -				\$ -
				\$ -				\$ -
				\$ -				\$ -
				\$ -				\$ -
				\$ -				\$ -

BUDGET TEMPLATE SHEET FOR FUTURE FISHERIES PROGRAM APPLICATIONS

002-2022

				\$ -				\$ -
				\$ -				\$ -
				\$ -				\$ -
			Sub-Total	\$ 15,100.00	\$ 15,100.00	\$ -	\$ -	\$ 15,100.00
TOTALS				\$ 39,687.00	\$ 31,987.00	\$ 23,000.00	\$ -	\$ 54,987.00

OTHER REQUIREMENTS:

All of the columns in the budget table and the matching contribution table MUST be completed appropriately or the application will be invalid. Please see the example budget sheet for additional clarification.

*Units = feet, hours, inches, etc. Do not use lump sum unless there is no other way to describe the costs.

**Can include in-kind materials. Justification for in-kind labor (e.g. hourly rates used). Do not use government salaries as match. Describe here or in text.

***The Review Panel suggests that design and oversight costs associated with a proposed project not exceed 15% of the total project budget. If design and oversight costs are in excess of 15%, applications must include a justification or minimum of two competitive bids for the cost of undertaking the project.

****The Review Panel recommends a maximum fencing cost of \$1.50 per foot. Additional costs may be the responsibility of the applicant and/or partners.

Additional details:

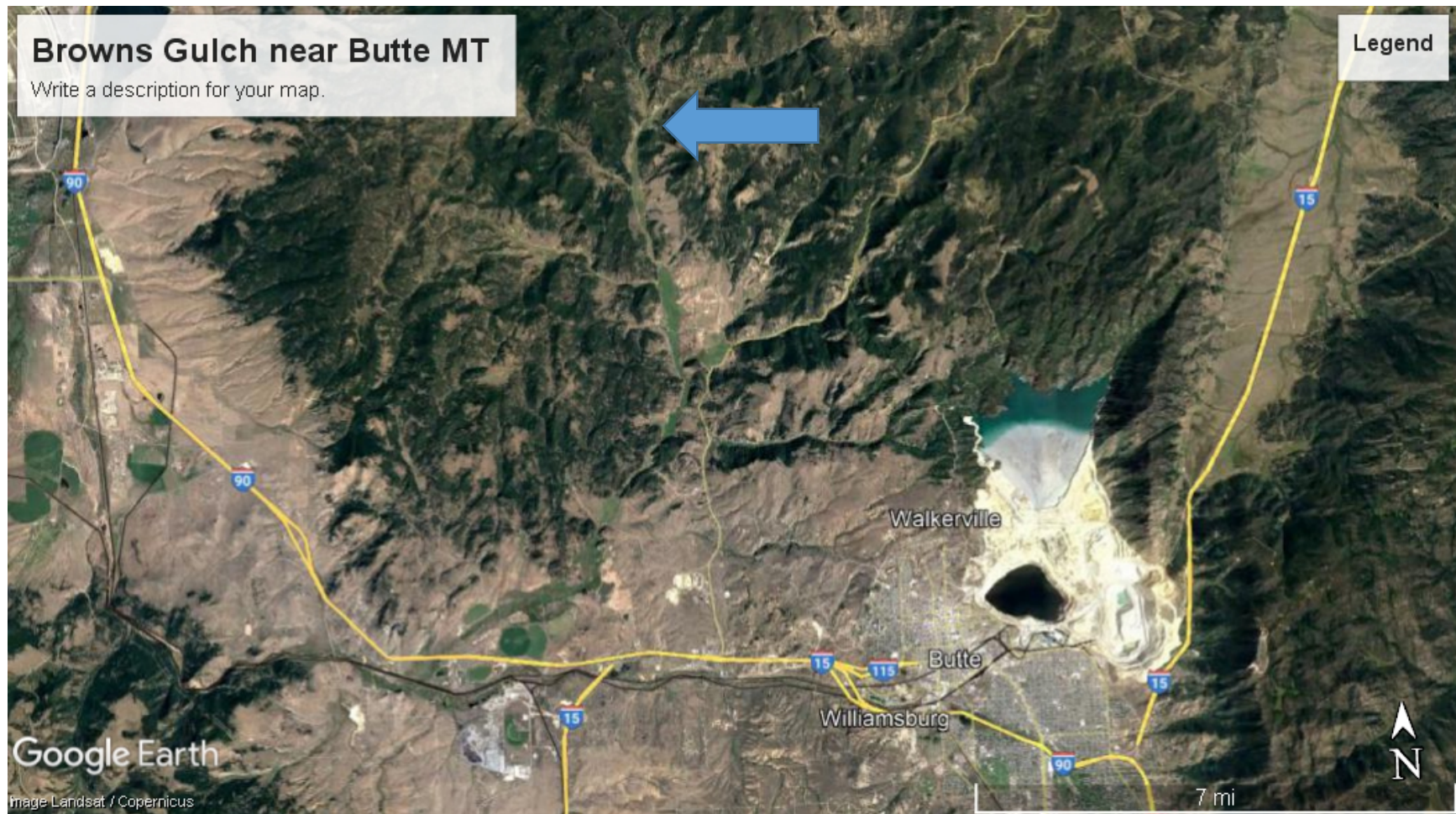
APPLICATION MATCHING CONTRIBUTIONS				
(do not include requested funds or contributions not associated with the application)				
CONTRIBUTOR	IN-KIND	CASH	TOTAL	Secured? (Y/N)
NRDP Montana Dept. Justice	\$ -	\$ 12,000.00	\$ 12,000.00	yes
George Grant Trout Unlimited	\$ -	\$ 5,000.00	\$ 5,000.00	no
Clark Fork Coalition	\$ 2,500.00	\$ 3,500.00	\$ 6,000.00	yes
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
TOTALS	\$ 2,500.00	\$ 20,500.00	\$ 23,000.00	

OTHER CONTRIBUTIONS				
(contributions not associated with the application)				
CONTRIBUTOR	IN-KIND	CASH	TOTAL	Secured? (Y/N)
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	
	\$ -	\$ -	\$ -	

BUDGET TEMPLATE SHEET FOR FUTURE FISHERIES PROGRAM APPLICATIONS

002-2022

	\$	-	\$	-	\$	-	
	\$	-	\$	-	\$	-	
TOTALS	\$	-	\$	-	\$	-	



Browns Gulch Area near Butte, MT. Blue arrow points to upper Browns Gulch.

FWP.MT.GOVTHE **OUTSIDE** IS IN US ALL.

November 12, 2021

Montana Fish, Wildlife & Parks
Future Fisheries Program, Attn: Michelle McGree
PO Box 200701
Helena, MT 59620

RE: Support for the Browns Gulch #5 (Costin Ditch) Diversion Project

Michelle:

I would like to offer my support for the Browns Gulch #5 Diversion replacement and fish screen project on Browns Gulch proposed by the Clark Fork Coalition. Based on studies conducted by Fish, Wildlife and Parks in coordination with the Natural Resource Damage Program, Browns Gulch has been identified as a high priority stream for fishery restoration. It is one of three major tributaries to Silver Bow Creek, and one of few remaining genetically pure westslope cutthroat trout populations in the drainage. The core area of this westslope trout population in Browns Gulch includes the reach on the Balentine Ranch. The Costin Ditch is one of several ditches in this reach that have been identified as an entrainment risk to this population. Providing for fish passage and eliminating entrainment will add resiliency and help us accomplish the goal of having a robust westslope cutthroat trout population in Browns Gulch. Please feel free to contact me with any questions.

Sincerely,

Caleb Uerling
Fisheries Biologist – Upper Clark Fork
Montana Fish, Wildlife & Parks
308 Latigo Ln
Butte, MT 59701

Phone: (406) 493-2694
Email: caleb.uerling@mt.gov

We, Cam and Sue Balentine - 895 Rt 3 Browns Gulch,
Support the design and understand the maintenance
requirements of the Costin Diversion Project in upper
Browns Gulch. The project will replace the current
diversion and provide the infrastructure necessary to
include a much needed fish screen. The project will
improve irrigation practices in the Creek and prevent
fish from being diverted into the irrigation ditch.
Thank you in advance for your time and consideration.

Cam Balentine

Sue Balentine