



**Minutes**  
Water Quality Advisory Council  
June 14, 2016  
Missoula City-County Health Department  
301 West Alder 7:00 p.m.

**Present:**

Chris Brick – WQAC	Paul Parson – Trout Unlimited	Rebecca Paquette - WQAC
Peter Bierbach – WQAC	Jen Harrington – WQAC	Kali Becher – WQAC
Ron Russell – WQAC	Ian Magruder – WQAC	Casey Ryan – WQAC
Peter Nielsen - WQD	Travis Ross - WQD	Brett Rosenburg – WQAC
Amy Chadwick - WQAC		

**Ninemile Creek Restoration Projects – Paul Parson, Trout Unlimited**

Placer mining in the Ninemile watershed caused significant damage to the stream. The placer mining created 30 feet trenches plus a pile of material about 30 feet high that results in a total trench depth of approximately 60 feet from peak to valley. In 2010 Mattie V Creek was rejoined with the main channel by re-establishing a floodplain and then adding a re-contoured channel. A separate project in 2014 moved the main channel back to the center of the valley from the edge. A series of wetlands was also constructed. Very few fish can make it up the Ninemile to spawn due to the tremendous velocities caused by straightened channels. During restoration, the piles of mining waste are removed and repositories are built on the hill but grade of the stream is a problem. Slash is being used to reestablish the banks. There are very little organics because of the tremendous amount of erosion. The floodplain is really raw but a primary goal is to connect the floodplain to the stream which is and has been done through these projects. To prevent scour, logs are buried along with willows.

In this particular placer mining site, no chemicals/mercury was used. This allowed Trout Unlimited to re-grade the material without fear of re-mobilizing mercury in the piles.

This is the largest voluntary mine reclamation in Montana. Two new Beaver structures have been established in the year and a half since this section of channel was completed in 2014.

In order to keep groundwater available, TU has found that mixing clay into the alluvium to make a less porous soil allows more water to be stored in the floodplain. In 2010, during the Mattie V restoration, TU had to install plastic check dams to back up the water enough to keep it flowing.

Martina Creek is known to have genetically pure Cut-throat trout. This project will re-connect it with Ninemile Creek.

Hard rock mining took place in some of the tributaries. The piles of mine tailings have been there since the 1950's and do not support any vegetation. Two mines in Kennedy Creek were reclaimed. TU teamed up with the Forest Service and Missoula County to close these mines. It was designated as a superfund (CERCLA). These were lead and zinc. The tailings would be dumped into the valley bottom which would essentially push the creek to the size of the valley and straighten it. The contract was managed by the Forest Service. There are genetically pure cut throat in Kennedy creek. Trout unlimited spent two months removing materials out. The stream had a 10 percent grade so they had to use a series of pools to allow resting places for fish and keep velocities down.

There have been 7 projects in the Ninemile ranging from 50K to ¼ million in total costs. These sites are quite weedy and TU has been able to manage the weeds without the use of spray. Youth Conservation Corps takes care of this. This mining was done on both Forest Service Lands and Patented Mining Claims.

TU has been pushing the Forest Service to up the bonding requirements to new mining claims on Forest Service Lands. The risk of damage to these restored projects from a mining operation is substantial.

This project has used a lot of graduate school students and capstone students to conduct the monitoring. The aquatic macroinvertebrates are coming back as well as the trout.

Ninemile is impaired due to sediment. Some of the tributaries are impaired due to hard rock mining.

The council is interested in taking action to support work like this in the Ninemile. Elk Creek, Gold Creek Cramer Creek also had significant (albeit not as much as Ninemile) damage. Monitoring is difficult on this section of stream because monitoring is required but not funded in these projects. USGS might be a resource for monitoring. If The Water Quality District boundaries extended into the Ninemile, they could assist with that. Monitoring requirements are generally for 5-6 years to monitor vegetative survival and sediment load reduction. These are requirements for accepting of the grant (efficacy). Generally in Ninemile Creek, Trout Unlimited has seen that if the vegetation survives for 3 years, chances of subsequent survival are very good.

It would be beneficial for the council to do a field trip to this site. This project and future funding could benefit from media attention. This project could be a good candidate for a documentary.

A field trip to these sites will take place en lieu of in the regular July meeting. Count on about 4 hours. TU is concerned that funding for these types of projects through DNRC will go away and perhaps the District/Council could be instrumental in securing some federal funding. Mobilization Fees are huge for this type of project (\$150K) so it makes sense to complete larger projects rather

Ideas for August Meeting:

Stormwater

Smurfit – did another round of sampling a couple of weeks ago

Karin Boyd did an update on the CMZ for the Smurfit Stone

Montana Standard and Restore Our Creek garnered some EPA attention in Butte on

Public Comments for items not on the agenda: None

Submitted by: Travis Ross