## **Mystic Hydroelectric Project (FERC #2301)**

# Fisheries, Aquatic Habitat and Water Quality Technical Advisory Committee Meeting Montana Fish, Wildlife and Parks Office - Bozeman, Montana January 22, 2018

Location: MFWP Conference Room, Bozeman

Meeting Start Time: 10:00AM

#### **MEETING ATTENDEES:**

| Name                 | Affiliation         | E-mail                             | Phone        |
|----------------------|---------------------|------------------------------------|--------------|
| <b>Brent Mabbott</b> | NorthWestern Energy | Brent.Mabbott@northwestern.com     | 406-490-1801 |
| Andy Welch           | NorthWestern Energy | Andrew.Welch@northwestern.com      | 406-444-8115 |
| Jordan Tollefson     | NorthWestern Energy | Jordan.Tollefson@northwestern.com  | 406-565-3879 |
| Ken Fraser           | MT FWP              | kfrazer@mt.gov                     | 406-247-2961 |
| Jason Rhoten         | MT FWP              | Jrhoten@mt.gov                     | 406-328-6160 |
| Jason Garber         | MDEQ                | JGarber2@mt.gov                    | 406-444-2734 |
| Kristi Webb          | New Wave            | kwebb@nw-enviro.com                | 406-239-4484 |
| Mary Gail Sullivan   | NorthWestern Energy | Marygail.sullivan@northwestern.com | 406-497-3382 |

USFS – no representative at meeting due to government shutdown.

Brent will meet with Clint Sestrich, USFS to review meeting notes and discussions from this meeting, including proposed budgets for FWP and USFS and monitoring schedule for 2018.

## **Introductions/NorthWestern Staff Changes**

Andy Welch – took over Jon Jourdonnais position in Fall 2017.

Jordan Tollefson hired in Fall 2017 – took Andy Welch's position

Brent Mabbott – retires end of 2018

NorthWestern – plans to make staff transitions as smooth as possible

## **2017 Monitoring Activities**

Completed 2 years of the new 6-year plan (2016-2021)

## **West Rosebud Creek Bypass Fisheries (Dam to Powerhouse)**

September 2017 – two sections (upper and lower)

FWP also collected scales of fish and aged them. This was not required as part of the monitoring plan or reporting. FWP will provide summary of data collected that will be incorporated into the Annual Report. Group agreed to include aging data in the Annual Report so it is readily available by reference.

Lower Pass – Only one pass completed. FWP took the first pass data to create some comparison to previous years (2012, 2014). Brown trout population estimate trending up.

Rainbow trout population estimate appears stable. All fish population estimates are up from 2012. May be a product of high flows in 2011.

*Upper Bypass* – Completed two passes and provided a population estimate. Results from 2017 show the highest rainbow trout population estimate since 2008.

Relative Weight in bypass (both sections): Condition of rainbow trout are good based on relative weight. Condition is trending up from 2008 for both rainbow and brown trout. Relative weight data will go into FWP DJ report, but not included in Annual Report since not a requirement for FERC compliance.

# West Rosebud and Emerald Lakes Gillnetting (May 2017)

Emerald and West Rosebud Lakes are stocked annually 3 time per year (Rainbow Trout). FY 2018 – 2019 funding cut, but stocking will continue in West Rosebud and Emerald Lake. Stocking 6-inch to 8-inch rainbow trout.

FWP receiving more feedback of anglers Ice fishing on West Rosebud Lake. Not historically known for ice fishing opportunities.

FWP was able to enter in historic data into Godzilla and generate long-term graphs (relative weight, population estimate, biomass rate per net, catch rate by species, catch rate by lake). Metrics for fish were down slightly from long-term average but within historical range. Summary of data will be in the Annual Report.

## West Rosebud Creek Fall Redd Count (no more spring counts)

Redd count was completed in Fall 2016. These data will be summarized in the 2017 annual report. No survey was completed in Fall 2017. FWP/NorthWestern plan on implementing redd count in Fall 2018.

Custer-Gallatin National Forest and Stillwater Valley Watershed Group Stream Assessment on East and West Rosebud creeks, Little Rocky Creek and Fishtail Creek (Clint Sestrich, USFS)

No update – Clint not present at meeting.

# **Water Quality Monitoring and Reporting Schedule**

Next sampling event scheduled for 2018. The results from 2018 will be compared to previous years to develop a 10-year (2010-2019) comprehensive report for TAC review and approval and submittal to FERC in 2019.

10-year (2010-2019) comprehensive report to TAC and FERC by December 31, 2019
 Water temperature monitoring in West Rosebud Creek in 2018 (also part of Fisheries monitoring). Will become part of updated 10-year water quality monitoring program scheduled for updating for 2020.

## **Invasive Aquatic Mussels (Andy Welch)**

Andy is on the Montana invasive species advisory council (MISAC). Invasive mussels were detected in MT (Tiber Reservoir and Canyon Ferry Reservoir) in fall of 2016. An incident command team (ICT) was established to respond to the detection. The ICT developed a framework to respond to the infestation. Implementation of this framework has transitioned to FWP management.

MT Summary for 2017
84,000 boat inspections in MT
17 infected boats intercepted
1400 mussel larvae (veligers) samples collected, zero positive detections

### Requirements for declassification:

3-consecutive years of no-detections in Canyon Ferry

5-years of no-detections in Tiber Reservoir (longer time frame because there was as positive detections in contrast to Canyon Ferry).

NorthWestern starting to educate local staff at hydro facilities to know what to look for annual maintenance activities. Well received and interest in information.

Jason mentioned it's likely that the Joint Application will be updated to include language to address AIS.

In 2016, Clint Sestrich recommended some type of announcement or link on the Mystic whitewater website (managed through NorthWestern) to help educate public on invasive mussels, cleaning methods, etc. Brent/Andy will look into options for incorporating either a message or link to the website to keep boaters/public aware of cleaning protocols and threats of invasive mussels. Now that the AIS program is developed may have a better link to provide. Ken – recommend at Clean, Drain, Dry logo onto NorthWestern website and likely other project websites.

### **2017 Whitewater Recreation Update**

Number of boating days -1 whitewater day in 2017. Number of individuals recreating is unknown.

Whitewater recreation website: http://www.mysticlakeproject.com/whitewater-group.htm Whitewater Flow Enhancement Plan:

http://www.mysticlakeproject.com/pdf\_2014/PROTOCOL-for-WRC-Whitewater-Flow-Enhancement-2014-NWE.pdf

## 2017 Funding (\$25,000)

| Brent requested USFS and FWP | provide summar | y of how fun | iding is | being spent |
|------------------------------|----------------|--------------|----------|-------------|
|------------------------------|----------------|--------------|----------|-------------|

\$11,000 USFS – government shut down no USFS representative present at meeting.
 \$11,000 FWP – provided summary for sampling efforts, travel, equipment maintenance to complete 2017 monitoring activities, as well as data analysis, historical data entry into Godzilla for long-term data analysis, annual meeting preparation and participation.
 \$3,000 Equipment – purchased gillnets

## **2017 FWP Expenditures**

- West Rosebud and Emerald Lake sampling
  - Personnel Hours (2 employees)
  - Travel (miles and perdigm) X 2 days
  - o Equipment preparation and boat maintenance and fuel
- Upper and Lower Bypass sampling
  - Personnel Hours (1 employee)
  - Travel (miles and perdigm)
  - Equipment preparation
- Aged fish from Upper Bypass
  - o Personnel Hours (1 employee)
- Data entry
  - Personnel Hours (1 employee)
  - Entered current and historical data back to the 1980's
- Analysis of data
  - Personnel Hours (1 employee)
  - Create figures and generate report for data collected in 2017
- Annual meeting
  - o Personnel Hours (2 employees)
  - o Travel (miles)

### **2018 Monitoring Activities**

Mystic Lake Fisheries (August 7, 8, 9)
 West Rosebud Creek Water Temperature Monitoring (April – October)
 Redd Count (complete in 2018 because survey was not done in2017) – middle October/early November

## 2016-2021 Fisheries Monitoring Plan

Approved by FERC in a letter dated, June 17, 2016. The following outlines the schedule for continuation of fisheries monitoring activities between 2016 and 2021.

| Year | Α | В | С | D | E | F |
|------|---|---|---|---|---|---|
| 2016 |   |   |   | Х |   | Х |
| 2017 |   | Х | Х |   | Х |   |
| 2018 | Х |   |   |   |   | Х |
| 2019 |   |   |   | Х | Х |   |
| 2020 |   | Х | Х |   |   |   |
| 2021 | Х |   |   |   | Х |   |

A = Mystic Lake monitoring

B = West Rosebud Creek between the dam and powerhouse

C = West Rosebud and Emerald lakes fish monitoring

D = West Rosebud Creek below Emerald Lake electrofishing

E = West Rosebud Creek fall redd counts

F = Water temperature monitoring

2017 Annual Report will be prepared and submitted to TAC for project files (May/June). There is no FERC filing requirement for the annual monitoring reports.

Next submittal to FERC is the 6-year (2016-2021) report due to FERC by December 31, 2022.

## 2018 Funding

Brent – goal to get contracts set up by early March 2018

- \$11,000 USFS
- \$11,000 FWP

FWP facing budget cuts in 2018 that will impact intern program that affects field sampling. Columbus budget cut by 20% in 2018 plus interns were cut in 2018, so about 30% operations dollars cut. Go through 2019.

\$3,000 Equipment – FWP will supply list to Brent. Remaining budget may move to supplement FWP (and/or USFS). Brent will discuss with USFS about having any surplus on equipment budget towards FWP.

## Other – Flow Modification Proposal

Brent proposed a modification to the seasonal flows outlined in the Mystic Lake Project SOP, which currently state the following (note these flows represent an agreement of higher flows than the minimum flows outlined in the license and this proposal would not modify license conditions):

October 1 through November 30December 1 through April 1543 cfs

#### *Recommendation:*

Maintain seasonal flow of 43 cfs, but change end date from April 15 to May 15 to keep redds inundated. Group agreed with proposal. Brent will present recommendation (which was initiated by Mystic Lake plant operators) to operation managers within NorthWestern Energy.

#### **Action Items:**

FWP – provide 2017 data summary to New Wave – Kristi Webb

FWP – provide list of equipment needs for 2018 to NorthWestern - Brent

Brent – provide summary of meeting to Clint Sestrich, USFS

Brent – discuss operations modification for flows to extend from April 15 to May 15 @ 43 cfs with NorthWestern operations managers

Meeting Adjourn: 12:00 pm

Meeting notes and reports are posted and available on the Project website (<a href="http://www.mysticlakeproject.com/index.htm">http://www.mysticlakeproject.com/index.htm</a>).

### Follow Up - Brent's Meeting with Clint January 25, 2018

- F.S. agreed with the proposed flow change in W Rosebud from minimum flows (license)
  April 15 to May 15 to a minimum of 43 cfs during that time frame
- FS agreed to, after purchase of 2018 equipment, allocate the remainder (unspent portion) of the \$3,000 to FWP.
- Brent will write up some sort of memo or MOA about the distribution of the allocated annual \$25,000. Currently \$11,000 each to FWP and FS, remaining \$3,000 for needed equipment
- Brent will check on having the \$25,000 annual funding increase annually by 2.5%, same as Madison/Missouri TAC funding
- FS will send Brent information of how the \$11,000 was spent in 2017.
- Equipment expenditures anticipated for 2018: FS Wader and Boots \$519.91; FWP Backpack for carrying generator \$169.99; Total Expenses \$689.90