

## MEMORANDUM FOR THE RECORD

Subject: Final minutes for the 13 October 2016 FPOM meeting.

The meeting was held at the CRITFC Office in Portland, OR. In attendance:

Last Name	First Name	Agency	Email
Bailey	John	NWW	<a href="mailto:John.C.Bailey@usace.army.mil">John.C.Bailey@usace.army.mil</a>
Barnes	Chuck	NWW	<a href="mailto:Charles.A.Barnes@usace.army.mil">Charles.A.Barnes@usace.army.mil</a>
Baus	Doug	NWD-RCC	<a href="mailto:Douglas.m.baus@usace.army.mil">Douglas.m.baus@usace.army.mil</a>
Bettin	Scott	BPA	<a href="mailto:swbettin@bpa.gov">swbettin@bpa.gov</a>
Conder	Trevor	NOAA	<a href="mailto:trevor.conder@noaa.gov">trevor.conder@noaa.gov</a>
Cordie	Robert	NWP-TDA	<a href="mailto:Robert.P.Cordie@usace.army.mil">Robert.P.Cordie@usace.army.mil</a>
Hausmann	Ben	NWP-BON	<a href="mailto:Ben.J.Hausmann@usace.army.mil">Ben.J.Hausmann@usace.army.mil</a>
Heninges	Steve	NWW	<a href="mailto:Steven.D.Heninges@usace.army.mil">Steven.D.Heninges@usace.army.mil</a>
Hevlin	Bill	NOAA	<a href="mailto:Bill.Hevlin@noaa.gov">Bill.Hevlin@noaa.gov</a>
Johnson	Bobby	NWP	<a href="mailto:bobby.johnson@usace.army.mil">bobby.johnson@usace.army.mil</a>
Kiefer	Russ	IDFG	<a href="mailto:Russ.kiefer@idfg.idaho.gov">Russ.kiefer@idfg.idaho.gov</a>
Kovalchuk	Erin	NWP	<a href="mailto:Erin.H.Kovalchuk@usace.army.mil">Erin.H.Kovalchuk@usace.army.mil</a>
Lorz	Tom	CRITFC	<a href="mailto:lor@critfc.org">lor@critfc.org</a>
Lundell	Tina	NWP	<a href="mailto:Tina.M.Lundell@usace.army.mil">Tina.M.Lundell@usace.army.mil</a>
Mackey	Tammy	NWP	<a href="mailto:Tammy.m.mackey@usace.army.mil">Tammy.m.mackey@usace.army.mil</a>
Martinson	Rick	PSMFC	<a href="mailto:Rickdm@gorge.net">Rickdm@gorge.net</a>
Morrill	Charlie	WDFW	<a href="mailto:Charles.Morrill@dfw.wa.gov">Charles.Morrill@dfw.wa.gov</a>
Peery	Chris	NWW	<a href="mailto:Christopher.A.Peery@usace.army.mil">Christopher.A.Peery@usace.army.mil</a>
Scott	Shane	NWPA	<a href="mailto:shane@sscottandassociates.com">shane@sscottandassociates.com</a>
Setter	Ann	NWW	<a href="mailto:Ann.l.setter@usace.army.mil">Ann.l.setter@usace.army.mil</a>
Swank	Dave	USFWS	<a href="mailto:David_Swank@fws.gov">David_Swank@fws.gov</a>
VanDyke	Erick	ODFW	<a href="mailto:erick.s.vandyke@state.or.us">erick.s.vandyke@state.or.us</a>
Walker	Ricardo	NWP	<a href="mailto:Ricardo.Walker@usace.army.mil">Ricardo.Walker@usace.army.mil</a>
Wertheimer	Robert	NWP	<a href="mailto:Robert.H.Wertheimer@usace.army.mil">Robert.H.Wertheimer@usace.army.mil</a>
Willard	Caleb	NWW	<a href="mailto:Caleb.M.Willard@usace.army.mil">Caleb.M.Willard@usace.army.mil</a>
Wright	Lisa	NWD-RCC	<a href="mailto:Lisa.S.Wright@usace.army.mil">Lisa.S.Wright@usace.army.mil</a>
Zorich	Nathan	NWP	<a href="mailto:Nathan.a.zorich@usace.army.mil">Nathan.a.zorich@usace.army.mil</a>
Zyndol	Miro	NWP	<a href="mailto:Miro.A.Zyndol@usace.army.mil">Miro.A.Zyndol@usace.army.mil</a>

On the phone: Barnes, Hausmann, Johnson, Keifer, Morrill, Sears, Scott, Swank, VanDyke, Willard, Wertheimer, and Zorich.

1. Decisions made at this meeting
  - 1.1. September meeting minutes approved.
  - 1.2. MOCs

- 1.2.1.16BON116 MOC WA SH early outage – FPOM concurred with this action but would like an update at the next FPOM prioritizing the work load.
- 1.2.2.16BON118 MOC BON erosion ROV survey on Oct 26 – FPOM concurred with this action and will not need further coordination if the dates change as long as the time of the survey stays in the afternoon.
- 1.2.3.16JDA04 MOC Avian Line Repair – Concurrence is pending on Fredricks return to comment on the new timeline.
- 1.2.4.16MCN016 Wasco PUD Commissioning testing- FPOM concurred with this action.
- 1.2.5.16LGS15 Discharge Pipe Plug (Willard) – FPOM members concurred with this action.
- 1.3. FPP Change Forms
  - 1.3.1.17BON004 – Ladder Temperature Monitoring (Lorz) – Approved; all maps need to be sent to Wright
  - 1.3.2.17TDA002 – Ladder Temperature Monitoring (Lorz)- Approved
  - 1.3.3.17JDA002 – Ladder Temperature Monitoring (Lorz)- Approved
- 2. The following documents were provided or discussed. Documents may be found at <http://www.nwd-wc.usace.army.mil/tmt/documents/FPOM/2010/>
  - 2.1. *Agenda, Fish Passage O&M Coordination Team.*
  - 2.2. *NWW FPOM outages schedule*
  - 2.3. *NWW Revised Spill plan*
  - 2.4. *Coordination/Notification Forms (NWW/NWP)*
  - 2.5. *FPP change forms. (NWW/NWP)*
  - 2.6. *BPA outages*
- 3. Action Items
  - 3.1. NWW
    - 3.1.1.[Sept 16] MCN would like to change hobo locations for juvenile salmonid temperatures. **ACTION:** Johnson needs to create a change form to discuss. **Status: Setter said that the project will be discussing the annual temperature monitoring and will see if anything needs to change.**
  - 3.2. NWP
    - 3.2.1.[Jul 16] Fishway temperatures from NWP. Lorz created a list of the desired locations for the hobo probes for the temperature program to be implemented this winter. **ACTION:** Wright will make a FPP change form for all three projects. **Status: Completed and posted to FPP website (will be discussed under agenda item 5.2).**
    - 3.2.2.[Aug 16] BON lamprey mortalities. **ACTION:** Lamprey Task Group needs to meet and make a recommendation to BON since the IWW period is coming up quickly. **Status: The lamprey accords group met in Walla Walla. After discussing the relative mortality index from the last several years, the group was satisfied that even though there were more MFRs this year, the percentage mortality at BON was less than previous years.**
    - 3.2.3.[Sept 16] BON PIT TAG Room (Hausmann) **ACTION:** Hausmann will send cost estimate to Mackey. **Status: Pending – one estimate given but Hausmann felt it was not accurate.**
- 4. Completed Action Items or to be discussed later in the agenda
  - 4.1. [Aug 16] JDA avian array. **ACTION:** The PDT needs to write an MOC in order for the region to review the plan. **Status: Complete see 16JDA04 below**
  - 4.2. [Aug 16] BON Sediment Deposition Monitoring. **ACTION:** Hausmann will write an MOC with more detailed information. **Status:** No longer needing an MOC because there won't be any operational changes during monitoring.
  - 4.3. [AUG 16] 16TDA09 **ACTION:** Bettin and Cordie will update the MOC with benefits to fish. **Status: Completed.**

4.4. [August 16] Hazmat Response. **ACTION:** Hazmat Response Task Group will meet after the August FPOM. Status: Hazmat Response TG did meet after the August FPOM. Notes are posted on the website. The task group met briefly after the October FPOM.

## 5. Updates

### 5.1. NWW Updates

#### 5.1.1. Upcoming maintenance/construction/research activities

5.1.1.1. MCN temp data storage (Benner/Setter) - FPC will archive/store MCN temp data and have it available on their website.

5.1.1.2. LGS mods to allow every other day bypass (Setter) – The new bio will be meeting with Johnson from MCN to learn their system. Conder suggested that NOAA may be flexible with the every other day bypass requirement prior to transport if the procedure creates an impact to fish. Debris levels will play a role in this decision. This item will remain on the agenda.

5.1.1.3. FPOM Outages (Setter) – [Handout] LMN – After taking MU1 apart, the contractor found more problems than previously identified and the RTS date has been delayed to the beginning of June. MU2 will remain in service while MU1 is off. IHR – The project is in the process of welding the blades of MU5 at Ice Harbor based on the feedback from MOC. Setter said that they have agreement on the angle that was proposed and that this is considered a long term fix. The welding will take place Nov 1- Dec 15. The new blade design will go out as a revised FPOM MOC and all agencies will have an opportunity to comment. Conder suggested using CRFM to fund a good design since there are many turbine units with the same problem at multiple dams.

5.1.1.4. Revised Summer Spill Plan (Setter) [Handout] – A revised summer spill plan was worked out at ERDC with input from the Navigation section. It is posted to the FPOM website for review. There was no easy fix for the spring spill pattern so that is still under review. The original MOC will dissolve and become a FPP change form. Setter noted that during the summer, there up to 12 lockages in a day which translates into about an hour of transition per lockage. Both the entry and exit to the lock are difficult for the boats. Conder said that the decision to remove the TSW during the summer was based on the old spill pattern and questioned if NOAA would still opt to remove the TSW based on this new spill pattern. Setter said that it was a fair question but this has to be discussed at another forum.

5.1.1.5. Adult ladder winter maintenance (Setter and Peery) – Schedule posted to FPOM website. MCN – ladder going down on 1 Dec. During the winter maintenance, the project will make modifications on the tilting weirs for lamprey, inspect the diffuser gratings and continue working on the floating entrances. The project is addressing the broken Oregon Shore tilting weir and there will not be a specific outage to fix it. The forebay elevation restriction has been extended through October 15 and will turn into a soft constraint through the end of the month. IHR – installing pipes for temperature probes and adding release pipes for the turbine evaluation going on this spring. LGS – inspecting the fall out fence in the collection channel and there are a few issues with calibrating the gauge that measures the water level. The same issue is affecting the gauge controller at LWG and the contractor is fixing that one first then will address the controller at LGS. LWG – working on Phase 1 of the new by-pass facility and the noise issues with the PIT TAG detector. All comments from agencies need to be in by the next FPOM.

### 5.2. NWP updates

#### 5.2.1. Upcoming maintenance/construction/research activities.

- 5.2.1.1. FGE Mods (Walker) – On schedule. PNNL will conduct the post construction studies over the next two years. **ACTION: Rerecich will send out the updated research proposal.** Bettin requested reviewing the research proposal at the next FPOM meeting.
- 5.2.1.2. BON T11/12 outage (16BON14) The dual outage will be 14NOV – 24NOV.
- 5.2.1.3. BON LFS repairs – on schedule to start 14NOV prepping the site. The actual dive is 21-24 NOV. They cannot start early due to fabrication constraints.
- 5.2.1.4. BON B-branch erosion (16BON107) The dates have shifted but will still occur during the IWW period. The updated MOC is on the website.
- 5.2.1.5. 15TDA08 transformer/installation (Walker) – the work has been postponed by one year due to contracting problems. **Action: Walker will update the MOC with the new dates.**
- 5.2.2. Fish Counts and Web Posting (FFU) Due to rigorous cyber security, the fish counts have not been posted daily as before. Maintaining the security access for 53 individuals at 14 locations has been complex and difficult. This year, there have been changes in the cyber security requirements that are forcing USACE to look for new methods for posting the fish counts. The long term plan is to go outside of the USACE network to bypass the security constraints. For the short term, FFU has been manually entering counts and trying to keep up on the security issues. Any specific data needs should go directly to the Fisheries Field Unit – Wertheimer or Zorich. The goal for the long term plan is to have something in the works by next spring. Although there is nothing in the FPP, the FFU is committed to getting the visual counts posted in a maximum of three days. VanDyke commented that he has seen up to a five day lag of counts posted to the website. Peery noted that there are two problems – one with the software itself and the other is with the keeping the individual security permissions of all 53 fish counters. **ACTION: Wertheimer will put together a press release about the situation.**
- 5.2.3. BON PIT TAG Room (Hausmann) covered under Action Items
- 5.2.4. BON FOG Bulkheads (Hausmann) The project needs to close several FOGs for sealions and cannot dewater the collection channel without new bulkheads. Since they are expensive, the project is dividing the costs up. For FY17, BON has requested 30K to start design/P&S and FY18 250K to start purchasing. Although this had been an O&M issue, it is also a CRFM issue due to the sealions and possibly four FOG bulkheads could be justified. **ACTION: Mackey will talk to Chane and Klatte about using CRFM money.**
- 5.2.5. Winter Maintenance Schedule – **ACTION: BON has posted their schedule but TDA and JDA need to send their schedules to Kovalchuk and Mackey for posting.**
- 5.3. Research/FFDRWG updates: Next FFDRWG is October 20<sup>th</sup> at the Mt. St. Helens room of the NOAA offices from 1pm-4pm. JDA PIT antenna should be installed this winter on the south fish ladder. The antenna will be moved down a couple of weirs from the original plan.
- 5.4. RCC Updates
  - 5.4.1. Chum Ops – Starts the first week of November.

Project	Previous day average (kcfs)	5 day forecast average (kcfs)	10 day forecast average (kcfs)	Projected Low/Peak (kcfs) and date.
LWG	21	30	26	31 on 10/16
MCN	114	120	146	146 on 10/22
BON	125	130	156	156 on 10/22

Table 1. RCC forecast

- 5.5. BPA updates- [Handout] No substantial changes. TDA full powerhouse outage took place on October 13.

- 5.6. Pinniped update (Zorich)- The first Stellar sealion was on August 15<sup>th</sup>, average for August was 10 per day, September 30 per day and October was 25 per day. The high count was 46 Stellars on September 15<sup>th</sup>. At the beginning of October, the numbers had fallen but over the last few days, the count has climbed back up to 42. There was an unconfirmed sighting of a California sealion. Cordie noted that there is still one below The Dalles Dam. Hausmann had received an update on a sealion that had been moved to the Bronx Zoo and had pups. Next year, Animal Planet will do a piece on him.
- 5.7. Lamprey update (Zorich and Peery)- LPS counts for the season: Washington Shore – 37,000; Cascade Island – 3,700; Bradford Island- 11,000. New record count for Cascade Island and in the high top three counts for Washington Shore and Bradford Island. Night time and day time counts are available on the website. In the new contract, the software will have the ability to combine counts for a daily total. Setter noted that getting the nighttime and therefore cumulative counts have been problematic for Walla Walla district, especially at Granite. Peery added that at the Quarterly Meeting with the tribes, the issue of accurate counts came up. The struggle is that many fish go through the picketed leads and are not counted. Also, adding day time counts to nighttime counts changes the ability to use day time counts as an index. The lamprey index of daytime counts is very old and necessary for management actions. Bonneville and Lower Granite are key locations. Cordie mentioned that at The Dalles Dam, there is a problem with lamprey going under the crowder. The project is unsure whether to keep them out or give them more room to pass.
- 5.8. Avian Update
- 5.8.1. TDA (Cordie) The project attempted to repair to avian lines using in-house crews without any success. The project is considering contracting with USDA for the repairs. The meeting with USDA was cancelled but the work plans are out to USDA for review.
- 5.8.2. JDA (Zyndol) No update
- 5.8.3. MCN (Setter) This year, the schedule is to start January 1 and they are in the final stages of the MIPR process to USDA. The revised agreement includes a physical fitness requirement and a waiver to the two person requirement for the MCN outfall. The hazer will wear a back pack and table will be fabricated and placed on the outfall pipe. The solution to the training center problem has been resolved with new protocol. Land and shore hazing will be covered this year. The boat location situation has been clarified as well. Morrill has not received any update on the pelican issue and this will be added as an update to the next agenda.

## 6. Coordination/Notification forms (need concurrence/discussion)

- 6.1. **16BON116 MOC WA SH early outage** – The project is requesting to go to orifice flow on November 25<sup>th</sup> and dewatering on November 28<sup>th</sup>. Due to the extended Nav Lock outage and the increased winter maintenance work load, the project needs extra time to ensure all work is completed. **FPOM concurred with this action but would like an update at the next FPOM prioritizing the work load.** Hausmann had verbally discussed with Fredricks. The intake will be dredged before the NavLock outage.
- 6.2. **16BON118 MOC BON erosion ROV survey on Oct 26** – Almost identical to the last survey. There will be multiple surveys during the construction and post construction. Bettin cautioned to have a date range because of the rains and spill load. **FPOM concurred with this action and will not need further coordination if the dates change as long as the time of the survey stays in the afternoon.** VanDyke asked about the results of the surveys but Mackey said that she hasn't seen anything and it could be because that was information for the contractor.
- 6.3. **16JDA04 MOC Avian Line Repair** – Zyndol noted that it wasn't clear in the MOC that the work will not interfere with either upstream or downstream passage. The PDT team had a meeting yesterday about the logistics and short time line. The deadlines have been adjusted and updated in the MOC. All work needs to be completed by May 1 but all boat work needs to be finished April 1. The cost for the fifteen lines is 495k. Due to the high cost, the contract takes

longer to be reviewed and therefore needed the additional month. Lorz requested that any lines affecting the platforms be done first. Hazers will be on site in April. **Concurrence is pending on Fredricks return to comment on the new timeline.**

- 6.4. **16 MCN 016 Wasco PUD Commissioning testing** – Martinson addressed the concerns of the previous comments. MCN will put the weir into manual during testing and adjust as needed. Although this has not been done before, the impact should be minimal as long as Johnson can keep up with change in entrance flows. The testing will take six days. **FPOM members concurred with this action.**
- 6.5. **16IHR008 Unit 5 blade welding(tentative)** – The MOC should be sent out by next week. The work will start Nov 1.
- 6.6. **16LGS15 Discharge Pipe Plug (Willard)** – **FPOM members concurred with this action.**
7. **Fish Passage Plan:** The Current 2016 FPP and Draft 2017 FPP Change Forms are online at: <http://www.nwd-wc.usace.army.mil/tmt/documents/fpp/>.
  - 7.1. Pending FPP Change Forms.
    - 7.1.1. **17BON003** - Nighttime lamprey operations. **Pending – this discussion will be moved to FFDRWG.** Tackley voiced some concerns about the impact on lamprey. NOAA looked into sockeye passage and found that they stop at 11pm. Conder suggested lowering flows from 11pm-4am but Lorz preferred 10pm-4am.
    - 7.1.2. **17LWG001** – Forebay Exit Cooling Pumps (Setter). Revised and emailed May 16. Will revisit at the beginning of 2017. STATUS: No update.
    - 7.1.3. **17AppB002** – Transition to Primary Bypass (Conder). Approved for LMN only; LGS pending coordination with project. Will revisit at Oct FPOM. STATUS: Pushed out to November.
  - 7.2. **New Change Forms**
    - 7.2.1. **17BON004** – Ladder Temperature Monitoring (Lorz) – Approved; all maps need to be sent to Wright
    - 7.2.2. **17TDA002** – Ladder Temperature Monitoring (Lorz)- Approved
    - 7.2.3. **17JDA002** – Ladder Temperature Monitoring (Lorz)- Approved
8. **FCRPS temperature monitoring**
  - 8.1. **IHR probe location** – During the winter maintenance, pipes will be installed at the entrances and exits. Conder wants entrances and exits but mentioned that more locations are fine but not necessary. The other projects have their locations in place already. The current temperature monitoring can be evaluated if managers are needing more data. During a high temperature year, FPC and the projects can work out a temporary solution for uploading data and checking more often. Setter mentioned that she did not ask for FPC to do more work but rather FPC offered to store the temperature data.
  - 8.2. **FCRPS temperature monitoring** – At SCT, Chane was given guidance to install forebay temperature monitoring similar to Walla Walla district. Before starting any program, Division would like to know what FPOM members need for data and management purposes. Conder noted that in 2013, hourly data was very important. Mackey said that FFU did research in the 90s on forebay temperatures in the lower Columbia. USGS collects data from specific location in the river column already. If there is evidence that Bonneville, The Dalles and John Day forebays do not stratify then the USGS data would be acceptable. **ACTION: Lindell will provide the FFU data to FPOM.** Hausman suggested comparing the forebay to the scroll case temperatures but Lorz disagreed that this would be enough evidence of no stratification. Conder mentioned that MCN is usually not stratified until very high temperatures are reached. Zyndol pointed out that the daily temperatures have some variance and small spikes. FPOM members need to figure out what needs they have and will be discussed again next month.

**Next meeting is scheduled for November 10<sup>th</sup> at the CRITFC offices in Portland.**