



**San Juan River Basin Recovery Implementation Program – Biology Committee
Farmington, New Mexico
May 4 – 6, 2004**

MEETING SUMMARY

Members Present:

Chuck McAda
Ron Bliesner
Paul Holden
Vincent Lamarra
Tom Nesler
David Propst
Tom Wesche
Bill Miller

Representing:

U.S. Fish and Wildlife Service
Bureau of Indian Affairs
Jicarilla Apache Nation
Navajo Nation
Colorado Division of Wildlife
New Mexico Dept. of Game and Fish
San Juan Basin Water Users
Miller Ecological Consultants, Inc.

Peer Review Panel

John Pitlick
Steve Ross
Ron Ryel
Mel Warren

Department of Geography
Department of Biological Sciences
Department of Forestry
USDA Forest Southern Research

Others Attending

Mike Buntjer
Brian Hanson
Joann Perea-Richmann
Mark Mckinstry
Steve Harris
Bob Krakow
Ernie Teller
Justin Smith
Matthew Andersen
Julie Jackson
Jasen E. Davis
W. Howard Brandenburg
Sara J. Gottlieb
Rob Ashman
Pamela J. Norris
Carl Woolfolk

U.S. Fish and Wildlife Service, NM Ecological Svc.
U.S. Fish and Wildlife Service, NM Ecological Svc.
U.S. Fish and Wildlife Service, NM Ecological Svc.
U.S. Bureau of Reclamation
Southwestern Water Conservation
Bureau of Indian Affairs - NIIP
Bureau of Indian Affairs
University of New Mexico
Utah Division of Wildlife Resources
Utah Division of Wildlife Resources
U.S. Fish and Wildlife Service
University of New Mexico
University of New Mexico
Public Service Company of NM – SJGS
Public Service Company of NM – SJGS
Arizona Public Service – Four Corners P.P.

May 4, 2004

Welcome and Review of Agenda and Draft Meeting Minutes, Chuck McAda, Committee Chair

Chuck McAda has asked that any information given by committee/presenters to provide abstract in electronic format so that everything is captured.

Meeting summaries were discussed. All drafts will go to the list server for comment by participants and then be finalized at the next meeting. Final summaries will be posted on the web site. Any minutes currently listed on the web site as drafts will be finalized.

INTEGRATION REPORT

The primary topic was the Integration Report. Bill Miller had made some changes from the draft that had been sent out to the committee and he presented his latest outline of the document. Initially a number of topics were discussed. Bill indicated that data from 2003 should be included wherever possible and that he had included it in this most recent draft.

The Peer Review Panel was asked to give their impressions of the draft report and the integration process. Mel Warren indicated a concern for lack of statistical tests and showing standard errors along with any mean numbers used in the analysis. Steve Ross agreed with this issue. Ron Ryel noted that the large number of zeros in the data made it difficult to analyze statistically.

The lack of data on small-bodied native fish, especially small suckers was discussed. The question was raised whether that information was really needed for the integration. Ways to modify sampling protocols to increase the catch of young suckers was also discussed. Ron Ryel had analyzed the adult monitoring data and found that it showed real trends.

Ron Bliesner indicated that the information gathered suggested changes may be needed in the 5,000 cfs and 2,500 cfs portions of the flow recommendations.

After a general discussion of a number of topics, the committee started to go through the monitoring information from 1998-2003 in a more logical order.

Adult Fish Monitoring - Ron Ryel summarized the analysis he had conducted on the adult fish monitoring data. He separated adults out from the juveniles in the data. Statistical analysis showed significant differences among years and significant trends. The monitoring program is giving us sufficient precision to detect a 20% change in native adult fish abundance in most cases. Ron also looked at length frequency information and that showed that strong year classes could also be shown with a high degree of confidence. Overall, the analysis indicated the flannelmouth sucker populations have not changed much over the monitoring period.

Small-bodied Fish Monitoring - The small-bodied fish data were reviewed. The group discussed whether this information was really vital to monitoring if the adult data were good for population tracking and year class strength determination. Alternative sampling methods were also discussed and Dave Propst indicated that electrofishing was going to be tried this year to try to catch the stocked pikeminnow. Ron Ryel indicated that he could do an analysis similar to that on the adult data to see if the small-bodied data showed any trends. The committee agreed that he should do that analysis.

The committee agreed that the adult monitoring will stay in place, small-bodied monitoring needs to see additional analysis.

Larval monitoring - The larval monitoring is primarily for presence/absence and it is doing that very well.

Conclusion: Larval monitoring will stay the same.

Habitat Response - Ron Bliesner and Vince Lamarra discussed the habitat information. Only backwaters and other low velocity types showed any change during the monitoring period. These habitats declined dramatically. This raised the concern of whether the 5,000 cfs flow recommendation, which was supposed to maintain backwaters, was actually working. Ron thinks it is not working and that that part of the flow recommendations, and perhaps the 2,500 cfs level, need to be changed.

Vince Lamarra gave an update on the integration of the adult monitoring large bodied fish data collected by Dale Ryden (USFWS) and the habitat data collected by ERI/KBE. From the entire data set, (1991-2002) he selected the last five years (1998-2002) because the data are the most comprehensive on a river-wide basis and require the least amount of assumptions. The data analysis undertaken involved a database which included habitat data, physical conditions such as flow at mapping and at fish capture, catch per unit effort by life stage and species as well as river mile. The actual analysis involved simple pair wise linear regression, multiple regressions. The dependent variables were the species/life stages as CPUE with the dependent variables being the habitat, flow or river mile data. The habitat data used were the individual mapped categories (IE runs, riffles, slack waters, pocket waters, etc) as well as the generalized categories (IE backwater types, run types, or riffle types). In addition, Principle Components (PCA) was used in conjunction with multiple regressions. This approach suggested by the peer review panel has the advantage in that the principle component axis's are independent (the pair-wise regressions showed a high degree of interrelationships between habitat types). The results of the analysis indicated that both the multiple regressions with specific habitats and the PCA multiple regressions significantly predicted fish CPUE distributions over the entire river. The statistical models used predicted the native suckers (flannelmouth and blueheads) with higher r^2 's compared to the non-native fishes (channel catfish and common carp).

SUMMARY

Everyone will use data through 2003 if possible.

- Dave and Ron Ryel will work on an analysis to include small-bodied fish.
- Larval data is good as is.
- Mapping will continue the way it has been done with the addition of mapping during larval and pikeminnow monitoring periods.
- Write up is to be completed by June 15th and forwarded to Bill Miller who will complete another draft of the report and then forward it to the Biology Committee for comments. Finalized product will go to the Coordination Committee.

It was suggested to rename 5 YR Integration Report, to *Integration Report*.

-- Brian Hanson (FWS) suggested for those outside the Biology Committee it would be useful to add what the recovery actions; what you were doing to monitor those actions and the results for the last four years, and tying in monitoring during this period.

-- Information from Ron Ryel needs to be sent to Bill Miller for the hypothesis write-up by June 15th, 2004, with focus on grouping of different fish. Completed write-up by Bill Miller to be done by June 30th, 2004 to focus on main issues then forward onto the Biology Committee for comments and finalize by August 13th, 2004. Then it will be submitted to the Coordination Committee as final.

IHA ANALYSIS

IHA results using modeled data - Tom Westch (HabiTech, Inc.)

Provided results of stream flow analysis for SJRIP near Bluff, Utah using the Indicators of Hydrologic Alteration (IHA) and Range of Variability Analysis (RVA) methods developed by the Nature Conservancy.

- Results suggest that 1) implementation of the flow recommendations does not necessarily result in “mimicry of the natural hydrograph” as characterized by the 1929-1962 historic period; 2) even at full depletion, we still have flexibility to better manage high flow releases for habitat development and maintenance as indicated by our monitoring results; and 3) hydrologic alteration on the San Juan may not be as critical a limiting factor as elsewhere in the Colorado River system.

MAY 5, 2004

BUDGET PROCESS -- Mark McKinstry – Bureau of Reclamation

Pond RFP – There was an RFP submitted to build some ponds for grow-out. Two proposals were received by the Bureau of Reclamation and were returned with problems in which the Bureau of Reclamation determined they would cancel them due to discrepancies in production and cost. The other concern was the proposal that went out contained some materials which Ron Bliesner provided and were labeled as coming from his company. There was concern about a possible conflict of interest. **Mark states they**

will fix this and resubmit and doesn't feel it will be a problem, but it needs to include where the focus should be with fish or ponds.

Ron Bliesner asked why the Bureau made the final decision on this. Shouldn't it come back to the Committee for final review and action? (The decision was made by the TPEC set up for review).

Under the current administration new regulations are being put into place as to how financial agreements are being handled. This is going to cause increased burdens on program participants. The technical committee can make suggestions/recommendations and it is possible for the Biology committee members to comment. He doesn't know how much this is going to change, but over the course of the next 2 years changes will be made.

New Regulations- Under the current administration new regulations are being put into place as to how financial agreements are being handled. The issue is to have private firms do more of the work being done by government agencies unless it can be done more efficiently by the government agency. Also, the new process would also foster more competition. Several committee members indicated that this is going to cause increased burdens on program participants. The technical committees of the RIP will need to make suggestions/recommendations for work to be done, but everything will have to be done with RFP's. It is possible that some committee members may be involved with contractor selection but only if it is not a conflict of interest. He doesn't know how much this is going to change, but over the course of the next 2 years changes will be made.

In the short term it looks like things are set up fairly well this year. But in the future everything may have to be done on a RFP process. Existing cooperative agreements may be able to run until they run out.

The Bureau of Reclamation is going to try to develop one large RFP with a broad range of goals and objectives so that several things can be submitted at once.

There is approximately 3-4 years left on most existing contracts before they expire. When this happens, new ones may have to be implemented under RFPs. To allow small business' to take part in bidding.

If money is currently going to the state from power revenues and being used as to match Federal money (going to the state and then the state uses it to get other money) it will have to stop.

2004 RFPs – It was mentioned that when RFPs are sent to Bureau of Reclamation they are not responding to everything needed. How can this problem be solved?

Three RFPs are presently out for bid and/or in the review process, Habitat modification, Fruitland/APS Fish ladder needs, and Hogback fish entrainment study.

A subcommittee was established to review technical proposals then forward on to the Peer Review Panel for review and recommendations. The subcommittee will then forward their comment to the Bureau of Reclamation. Subcommittee members are Dave Propst, Tom Nesler and Dale Ryden. **Mark stated he would have Brent from Bureau of Reclamation work with the committee on a pond proposal for production.**

For the other proposals on Habitat, this subcommittee includes Tom Wesche, Ron Bliesner and Bill Miller. They will also review and forward comments to the Biology Committee and then onto Bureau of Reclamation. **Mark will see that the proposals are forwarded directly to the subcommittee and peer reviewers with minimum delay.** Ron Ryel asked if there are any guidelines in which the Bureau of Reclamation needs to be followed, it would be nice to have that information provided to the subcommittee. **Brian will forward ranking system that's used in the Middle Rio Grande to Chuck McAda.**

The FY2004 Budget Plan was discussed. It was concluded that since it was available on the Web, the committee could pull it off and print it. **Brian Hanson stated copies would be made and mailed out.**

Ron Bliesner asked if any attempts were going to be made to modify flow recommendations? The integration report includes a recommendation that modification of the flow recommendations should be examined. This needs to be included in the 2005 Scopes of Work.

AUGMENTATION

The question is do we want to make changes to the monitoring of adult larval and small bodied in their habitats and recovery modification efforts which falls under augmentation. It was mentioned by Chuck McAda that these changes should be presented in their Scopes-of-Work.

SCOPES-OF-WORK

Adult/Juvenile Fish Community Monitoring, USFWS, Grand Junction

Need to wait and see the data analysis tells us about the desirability of redirecting the program to expand on suckers. Does the committee think we still need to look for primarily pike minnow and then out of the standardized monitoring plan drop the reference to other native fish?

Ron Ryel asked do we need to look at larger sized fish? Are we missing something with razorbacks, shiners or is there something else we should be doing? Committee agrees that the larval for other native fish needs to be focused on. **Ron will have his analysis reflect the percentage for all different species of fish.**

Ron Bliesner suggested maybe going back to the monitoring plan goals with electro-fishing for all fish habitats? Does the "monitoring plan needs to be modified to fit the

work plan” or does the “work plan needs to be modified to fit the monitoring plan?” This needs to be clarified.

Paul Holden’s proposal is to add in electro-fishing “not population” within appropriate habitats.

Dave Propst will work on his proposals modifying the current scopes-of-work within the same budget.

San Juan River Larval Colorado Pikeminnow Survey, UNM and Razorback Sucker Surveys, UNM and NMGF

Continue with current protocol for shoreline seining, combine CPM and RZB information into one report. Discontinue light trapping.

San Juan River Specimen Curation, UNM

Continue as currently funded.

Long Term Monitoring – Channel Morphology, Keller-Bliesner Engineering

With the present monitoring program, calls for cross surveys and cobble bar monitoring. It appears that the cobble bars have deteriorated over the last 5 years to the point that these particular bars have only very small areas of open interstitial space and a river-wide survey needs to be conducted to identify other available bars. The monitoring plan anticipated this happening. For 2004, the bars will not be resurveyed, but a river-wide survey for replacement sites made as a conclusion to bar monitoring.

Under the cross section the last mapping showed more detail needs to be done on a shorter reach. The 2005 work plan will be modified to include detailed monitoring of two or three river reaches that include the range of complexity thought to be important to the endangered species.

Cross-section surveys will be completed only once every five years after runoff.

Habitat Mapping – Keller-Bliesner Engineering and ERI

No change in habitat mapping, except that the detailed reaches will be mapped in greater detail to reflect you sampling protocol.

Water Temperature Monitoring, Keller-Bliesner Engineering

No Changes, stay as is.

Water Quality Monitoring, Keller-Bliesner Engineering

This work plan in being dropped as it appears that there is no present impact to the species from water quality and there is little change with implementation of the flow recommendations. The data have been used in recent biological assessments and opinions, so FWS should weigh in on this decision. It may be necessary to pick this work up again if FWS believes it is important.

Update and Maintenance of San Juan River Recovery Implementation Program GIS Database and Development of a Web-based Interactive Interface, UNM

The GIS website (raw data) will be available by the end of the summer. It should be accessible to work with and make comments on.

Peer Review, BIO-WEST

Paul Holden indicated that the budget is hard to figure out due to up's and down's. Funds left behind or not used will be rolled over.

San Juan River Population Model Maintenance, Miller Ecological and ERI

Funding approved for 2004; may need funding for maintenance in 2005.

Assessment of Fish Movement through the Non-Selective Fish Ladder at Hogback, USFWS Albuquerque

Complete

Trophic Relationships among Colorado Pikeminnow and Its Prey in the San Juan River, KSU and NMGF

Proposed budget for FY05.

Assessment of Colorado Pikeminnow Augmentation in the San Juan River, BIO-WEST, NMGF, UNM, UDWR

Proposal 1- add lower river (-) upper (+) 20, 000 fish earlier stocking.

Proposal 2 – Re-create last years transport, then 3 weeks later part with calcium.

Development of Stocking Protocols for Colorado Pikeminnow in the San Juan River, BIO-WEST, USFWS Dexter

Non-Native Species Control, PNM Weir to Shiprock, USFWS, Albuquerque

Expand sampling downstream to Montezuma Creek. Keep total sampling trips the same, but include Shiprock to Montezuma Creek. Continental with five trips PNM Weir to Shiprock and five trips Shiprock to Montezuma Creek.

Non-Native Species Control in the Lower San Juan River, UDWR

Expand trips to downstream from the waterfall. Coordinate with Bio West. Keep number of trips the same, but will require additional time for lower trips.

Razorback Sucker Augmentation and Monitoring, USFWS, Grand Junction

A handout was provided on this subject. Radio telemetry will be reduced and equipment to get fish out of the ponds will be added.

-Discussion of possible switch to new PIT tags

The committee discussed the switch to new PIT tags. Readers from the old tags are not replaceable and wearing out. Chuck will check on costs and provide his information to the committee.

-Review of need for Propagation Coordinator, subcommittees, or other Propagation expertise

The committee discussed the need for a coordinator or pond manager in the Farmington area. Chuck will write-up a position description for this individual and will be forwarded to the committee for review and comments.

Colorado Pikeminnow Fingerling Production, USFWS, Dexter

Shooting for production of 300,000. The committee agreed that justification is needed from Dexter as to why numbers aren't being met as promised.

Stocking of Fingerling Colorado Pikeminnow, USFWS, Grand Junction

Dale will continue as is.

Maintenance of an Interim Holding Facility for Larval Razorback Sucker, UNM

The committee requested an accountability of where money is and where it's being spent. UNM also needs to submit an RFP for FY 2005.

Razorback Sucker Augmentation Ponds Limnological Study, ERI and BIA

This project was targeted to be completed in two years and will be finalized this year with a variety of issues (understand stocking/grading, needs money to stay in loop, coordination and additional personnel is needed).

A budget for the PNM fish ladder work is needed from the Navajos. Whether this position should/could be included with the pond management position was discussed. Some members thought Albert would make a good coordinator for both positions.

May 6, 2004

Chuck McAda noted that a deadline for submittal of altered SOWs was needed and May 21st on the list server was the deadline.

Population Model Discussion – Miller Ecological

Bill Miller gave an overview of the population model. The committee agreed to release funding for FY2004. Part of the finalization will be to test the model using available data.

Next Biology Committee meeting will be a conference call scheduled for July 13th, 2004 @ 1:00 pm – 3:00 pm.