

WCS-RSwickard
PRJ-13.10

Subject: Navajo Unit Operations

Dear Interested Party:

Enclosed is a summary of our April 24, 2008, meeting to coordinate Reclamation's operation of the Navajo Unit. The meeting was held at the Farmington Civic Center, Farmington, New Mexico.

Highlights of the meeting include:

—Based on the Most Probable Inflow Forecast as of April 15, 2008, this year's April through July forecasted inflow is anticipated to be 1,220,000 acre-feet or 158 percent of average inflow into Navajo Reservoir. This is a decrease of 180,000 af from the previous forecast. A decision was made, with several agencies involved, to decrease the release from the anticipated 4,000 cfs to 2,200 cfs after the first 72-inch main outlet inspection which occurred April 7-9th.

— A modified maximum hydrograph release, as outlined in the San Juan River Basin Recovery Implementation Program (SJRIP) Operating Rule Decision Tree, will begin approximately May 23rd and conclude approximately the end of June to the first of July. The approximate center of the hydrograph is designed to coincide with Animas River peak, which occurs on June 4th based on the historic average. The peak flow of 5,000 cfs is expected to occur for approximately 41 days with periodic gate inspections. If the inflow forecast decreases, peak flow days will be removed from the backend of the hydrograph. Most likely the peak release will be for a shorter period of time. The most likely minimum release will be 500 cfs for the remainder of the summer. Releases will to be adjusted based on the 7-day moving mean, using three of the four USGS gages in the critical habitat to achieve the target base flow of 500-1,000 cfs. Information regarding the spring hydrograph release schedule is available online at: www.usbr.gov/uc/wcao/water/rsvrs/notice/nav_rel.html.

—Due to a high reservoir elevation, releases were increased in March to increase storage in the reservoir in order to store the anticipated inflow. The reservoir is now at a manageable elevation and will have enough storage to hold all anticipated inflows.

—With the above average snowpack, no shortage sharing should occur. A new agreement will be drafted for next year's operation plan, if deemed necessary.

UPDATE! Since the meeting, and based on the May Final forecast, Reclamation has revised the proposed operating plan for Navajo Reservoir for 2008. The release will be decreased from 2,200 cfs to 1,000 cfs on Monday, May 12th. The release will remain at 1,000 cfs until Monday, May 19th, when it will be increased to 2,000 cfs. The release will remain at 2,000 cfs until Friday, May 23rd, when it will be increased to 3,000 cfs. The release will remain at 3,000 cfs through Monday, May 26th. On Tuesday, May 27th, releases will be increased

to 4,000 cfs and the following day, Wednesday, May 28th, releases will be increased to 5,000 cfs. Beginning on Thursday, June 19th, the release will begin to be gradually decreased until it reaches 500 cfs or the minimum required to meet the target base flow on Wednesday, July 2nd.

If you have any suggestions on improving the operation meetings or the summaries of the meetings, please let us know. The next operation meeting will be held on **Tuesday, August 26, 2008 at 1:00 in the Civic Center, Farmington, New Mexico (200 West Arrington Street)**. If you have questions, please call Pat Page at (970) 385-6560 or Ruth Swickard at (970) 385-6523.

Sincerely,

/s/

Pat Page, Chief
Southern Water Management Group
Resource Management Division

Enclosure

bc: 86-68140
UC-400, UC-432, UC-430, UC-434, UC-700, UC-735 (ea w/encl)
WCG-CDeAngelis, WCG-EWarner, WCG-DCrabtree, WCG-SMcCall, WCG-MSteves,
WCG-JHock (ea w/encl)
WCD-PPage, WCD-RSwickard, WCD-JSimons, WCD-RChristianson, WCD-MChiarito,
WCD-BDodd, WCD-MVelasquez (ea w/encl)

NAVAJO UNIT OPERATIONS MEETING

April 24, 2008

Participation: This meeting was held in Farmington, New Mexico at the Civic Center.

Purpose of Meeting: The purpose of these meetings, held three times a year, is to gather input for determining upcoming operations for Navajo Reservoir. This input is used in Reclamation's development of an overall 24-month study for operation of Reclamation projects in the Upper Colorado River Basin, which includes plans for Glen Canyon, Flaming Gorge, Aspinall Unit and Navajo. Input from individuals, organizations, and agencies along with other factors such as weather, water rights, endangered species requirements, flood control, hydro power, recreation, fish and wildlife management and reservoir levels, will be considered in the development of these reservoir operation plans. In addition, the meetings are used to coordinate activities and exchange information among agencies, water users, and other interested parties concerning the San Juan River and Navajo Reservoir.

Preliminary April-July 2008 Planned Operation

Based on the Most Probable Inflow Forecast as of April 15, 2008, the April through July forecasted inflow is 1,220,000 acre-feet or 158 percent of average. The reservoir water surface elevation on April 22, 2008 was 6059.47 feet which corresponds to 1,341,100 acre-feet of live storage.

In compliance with the San Juan River Basin Recovery Implementation Program (SJRIP) Operating Rule Decision Tree, a modified maximum hydrograph release consisting of 41 days at 5,000 cfs is the current operating plan. On May 9th, the release will be increased from 2,200 cfs to 3,000 cfs until Friday, May 16th, when it will be increased to 4,000 cfs. The release will remain at 4,000 cfs until Friday, May 23rd, when it will be increased to 5,000 cfs. The release will remain at 5,000 cfs through Monday, July 7th. Beginning on Tuesday, July 8th, the release will begin to be gradually decreased until it reaches 500 cfs or the minimum required to meet the target base flow on Monday, July 14th. This schedule will likely be adjusted as new forecasts are received. Additional updates on releases will be sent if changes occur. For information regarding the spring peak release it will be posted online at www.usbr.gov/uc/wcao/water/rsvrs/notice/nav_rel.html.

UPDATE! Since the meeting, and based on the May Final forecast, Reclamation has revised the proposed operating plan for Navajo Reservoir for 2008. The release will be decreased from 2,200 cfs to 1,000 cfs on Monday, May 12th. The release will remain at 1,000 cfs until Monday, May 19th, when it will be increased to 2,000 cfs. The release will remain at 2,000 cfs until Friday, May 23rd, when it will be increased to 3,000 cfs. The release will remain at 3,000 cfs through Monday, May 26th. On Tuesday, May 27th, releases will be increased to 4,000 cfs and the following day, Wednesday, May 28th, releases will be increased to 5,000 cfs. Beginning on Thursday, June 19th, the release will begin to be gradually decreased until it reaches 500 cfs or the minimum required to meet the target base flow on

Wednesday, July 2nd.

In the discussion of the operating plan for 2008, there was a question regarding the possibility of having the 5,000 cfs extension on the front end of the 41-day hydrograph peak release rather than on the back end. Reclamation would be resistant in doing that because it could result in releasing inflow which never materializes. Placing the extension on the back-end reduces the risk of over releasing.

This information is still preliminary and adjustments may be made to the spring peak release duration if the inflow forecasts change. Reclamation will provide updates to the release schedule if any changes occur.

Releases will be adjusted throughout the summer and fall as necessary in order to meet the SJRIP Flow Recommendations which call for a 7-day moving mean target base flow of between 500 cfs and 1,000 cfs in the critical habitat area (Farmington to Lake Powell).

Recommendations for San Juan River Operation and Administration

Ten major New Mexico water users in the San Juan River Basin developed water sharing recommendations for the years of 2007 and 2008. Based on the current forecast, a shortage is not anticipated this year. Appreciation was given to everyone involved in the previous agreements. There has been no request yet to initiate discussions for water sharing agreements beyond 2008.

Maintenance

At various times throughout the spring peak release, the release will be temporarily reduced in order to accommodate required inspections of the outlet works. These inspections are tentatively planned to occur on May 28th, and the week of June 9th. When the releases are greater than 3,400 cfs the auxiliary outlet works are used and require inspection every 15 days. During this time the release will be lowered to 3,400 cfs (maximum capacity of the main outlet works) while this work is accomplished. The main outlet works is required to be inspected every 30 days when flows are greater than 3000 cfs. When the main outlet works are under inspection, all releases must be made through the auxiliary outlet works with a maximum release of 1,600 cfs. Durations between inspections may be slightly less to avoid weekends, and holidays. These inspections are required as a part of our ongoing operation and maintenance program.

UPDATE! Since the meeting, and based on the May Final forecast, Reclamation has revised the proposed operating plan for Navajo Reservoir for 2008. The next auxiliary outlet inspection is scheduled to occur on Tuesday, June 10th and again during the ramp down on June 23rd. The next main outlet inspection is scheduled to occur on June 24th through June 26th as part of the ramp down.

Agencies Comments

Fish and Wildlife Service – clarified that although the Flow Recommendations are called "recommendations", they are binding on Federal agencies and there would be consequences if a federal agency blatantly ignored or didn't attempt to meet them. Reclamation clarified that operational flexibility was a term identified in the Navajo Operations EIS. It dealt with the fact that, until full water development in the basin occurs and when hydrologic conditions allowed, releases from Navajo Reservoir should not need to lower releases as low as 250 cfs. Operational flexibility however, does not mean Reclamation can blatantly disregard the Flow Recommendations.

Citizen – asked if there was a concern about damage to the outlet works. Answer: There is potential for damage and you can expect normal wear and tear. Reclamation has a very extensive O&M and Safety of Dams Program in place. An additional question was asked if the spillway is inspected on a regular basis, and would it be available to use if outlet works were determined to be not usable? Answer: Yes, the spillway is inspected regularly and would be available in the unlikely event that it would be needed to pass water from the reservoir, though that is not the preferred method for releasing water from the reservoir.

Bureau of Indian Affairs – when the reservoir reaches a lower level, repairs will be done on the NIIP headgate. This work will likely be done this fall.

Concerned Citizens for the San Juan River – stressed the importance of the trout fishery below the dam. Stated that two big issues face the trout fishery: silt and flows.

Citizen – had a question in regard to the flood release from Lake Powell: was it coordinated to coincide with release increase to 3,000 cfs from Navajo? Answer: No. Also, volume released from Powell for the remainder of 2008 will be the same as if there was no flood release; by reducing the base release throughout the year.

Army Corps of Engineers – reminded everyone that Flood Control was one of the primary purposes of the Navajo Unit. They commended Reclamation for their coordination efforts and for being proactive in the operations with the pre-releases that occurred. Coordination calls between Reclamation, the Corps of Engineers, Fish & Wildlife Service, National Weather Service, and local emergency management coordinators would recommence in May when releases are ramped up to 4,000 cfs. Upcoming weather will be closely watched. Largo Wash covers a large drainage area, and flash floods can provide extremely high flows in San Juan River.

New Mexico State Engineers Office - the Aztec office is fully staffed and ready to administer by priority if needed. They would prefer the cooperative approach that has been implemented among water users throughout the basin over the last 5 years.

Bureau of Land Management - wanted to know the status of the Animas-La Plata Project.

Response: Could be testing the pumps as early as this fall; could be filling the reservoir as early as next spring. Maximum pumping rate would be 280 cfs from the Animas River.

Next Meeting - Scheduled for **1:00 p.m. on Tuesday, August 26, 2008** at the Civic Center in Farmington, New Mexico (200 West Arrington Street).

Attendance List – April 24, 2008 Navajo Operations Meeting

Ashcroft, Nick, West Hammond Domestic Water Assoc., Bloomfield NM
Andrews, Roy, San Juan Shrine, Fruitland NM
Bloomfield, Dave, Arizona Public Service, Fruitland NM
Campbell, Dave, US Fish and Wildlife Service, Albuquerque NM
Chavez, Aaron, San Juan Water Commission, Farmington NM
Christianson, Ryan, Bureau of Reclamation, Durango, CO
Crawford, Carroll, Bloomfield Irrigation District, Bloomfield NM
Dennis, Neal, Colorado State Parks, Arboles CO
Goen, Mike, PNM San Juan Generating Station, Waterflow NM
Henderson, Gerald, Shiprock Emergency Management, Shiprock NM
Hurt, Cheston, Dept. of Water Resources, Durango CO
Hodges, Jimmy, NM State Engineer's Office, Aztec NM
Horner, Gary, Citizen, Farmington NM
Howe, Michael, BIA, NIIP, Farmington NM
Johnson, Larry, Soaring Eagle Lodge, Navajo Dam NM
Kimball, John, Corps of Engineers, Albuquerque NM
Lane, Teresa, Hammond Conservancy District, Bloomfield NM
LeFevre, Andrea, Jicarilla Apache Nation, Dulce NM
Lynch, Steve, BIA, NIIP, Farmington NM
McKinnon, Kristen, Wild River Expeditions, Bluff UT
Mendenhall, Mark, Corps of Engineers, Albuquerque NM
Montia, Paul A., City of Farmington, Farmington NM
Mueller, Steve, New Mexico State Parks, Navajo Dam NM
Nez, Marvin, NAPI, Farmington NM
Norlander, Ken, Arizona Public Service, Phoenix AZ
Novak, Andreas, Concerned Citizens for the San Juan River, Farmington NM
Page, Pat, Bureau of Reclamation, Durango CO
Richman, Linda, Bureau of Land Management, Bluff UT
Renfro, Jim, Lee Acres Water Users, Farmington NM
Santillan, Marisol, Arizona Public Service, Phoenix NM
Simons, John, Bureau of Reclamation, Durango CO
Swickard, Ruth, Bureau of Reclamation, Durango CO
Vigil, Max, Jicarilla Nation, Dulce NM
Vigil, Warren, Jicarilla Nation, Dulce NM
Wauneka, Julie, Shiprock Emergency Management, Shiprock NM
Wethington, Marc, New Mexico Department of Game & Fish, Navajo Dam, NM
Whitehead, Bruce, Southwest Water Conservation District, Durango CO
Williams, Shawn, NM State Engineer's Office, Aztec NM