

**BUREAU OF RECLAMATION
NAVAJO RESERVOIR
April 26, 2016 MEETING NOTES
SENT VIA FAX AND E-MAIL**

Dear Interested Party:

Enclosed is a summary of our April 26, 2016, meeting to coordinate Reclamation's operation of the Navajo Unit. The meeting was held at the Civic Center in Farmington, New Mexico.

Highlights of the meeting include:

- The snowpack above Navajo was 80% of median at the time of meeting.
- The modeled soil moisture at the beginning of the winter season was at or below-average for most of the snow producing parts of the basin.
- The reservoir elevation on April 24, 2016 was 6,070.18 feet which corresponds to 1,483,045 acre-feet of live storage. This puts the reservoir at 87% of the live capacity and 79% of active capacity. The current release is 350 cfs.
- The most probable April through July modified unregulated inflow forecast for water year 2016 is 70% of average.
- Based on the most recent (mid-April) most probable inflow forecast, there is available water for a spring peak release with 31 days at 5,000 cfs. The release will likely start in mid to late May.
- Under Most Probable operational forecast, Navajo will reach a reservoir elevation of 6050 ft by September 30th.

Copies of these meeting notes and the material presented at the meeting are available online at <http://www.usbr.gov/uc/wcao/water/rsvrs/mtgs/nmcurrnt.html>.

If you have any suggestions for the operation meetings or the summaries of the meetings, please let us know. The next meeting will be held on **Tuesday, April 26, 2016 at 1:00 at the Farmington Civic Center, Farmington, New Mexico (200 West Arrington Street)**. If you have questions, please call Marc Miller at 970-385-6541 or email mbmiller@usbr.gov or Susan Behery at 970-385-6560 or email sbehery@usbr.gov or Ruth Swickard at 970-385-6523 or email rswickard@usbr.gov.

NAVAJO UNIT OPERATIONS MEETING

April 26, 2016

Participation: This meeting was held in Farmington, New Mexico at the Civic Center. The attendance list is attached.

Purpose of Meeting: The purpose of these meetings, held annually in January, April, and August, 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.

Water Year 2016 Hydrologic Conditions

Water Year 2016 began with rapid snow accumulation during the early winter months, followed by a warm and dry February-March. The snowpack accumulated at average rates until February and since then snow water equivalent in the mountains has leveled off or melted. Snowpack is currently at 80% of median above Navajo.

Going into Water Year 2016, modeled soil moisture was near average in the northern San Juan Mountains, and well below average along the San Juan Mountains on the eastern edge of the basin.

Though 2016 was one of the largest El Nino events in recent history, El Nino has not historically proved to be a great snow producer in the San Juan Mountains, as this area is on the edge between El Nino and La Nina effects. Water year 2016 started out strong, but due to dry late winter/early spring conditions, the resulting snowpack is below average overall.

Review of Water Year 2016 Operations to date

Since January, releases to the river have typically been set at 350 cubic feet per second (cfs) from Navajo Reservoir, which have been sufficient to meet target base flows in the critical habitat area. During February, the inflow forecast was high and the release was increased to 500 cfs for a period of weeks. As the snow failed to materialize and the forecast decreased, the release was brought back to 350 cfs to conserve water for the spring peak release.

Current Conditions

The reservoir elevation on April 24, 2016 was 6070.18 feet which corresponds to 1,483,045 acre-feet of live storage. The reservoir is presently at 87% of the live capacity and 79% of

active capacity. The release is currently 350 cfs. Over the last week, NIIP diverted an average of 370 cfs, and San Juan Chama diverted an average of 270 cfs.

At the Animas-La Plata Project (ALP), Lake Nighthorse pool elevation was 6,880.65 feet and the current storage was 113,042 ac-feet, which was 98% of live capacity. Lake Nighthorse does not currently plan to pump or release any water during 2016.

Vallecito Reservoir was at 7655.7 feet and 100,980 acre-feet of storage on April 24, 2016, putting the reservoir storage at 84% of live capacity.

Lemon Reservoir was at 8124.7 feet pool elevation and 26,568 acre-feet of storage, putting the reservoir storage at 70% of live capacity.

McPhee Reservoir was at 6902.2 feet pool elevation and 291,770 acre-feet of storage, putting the reservoir storage at 76% of live capacity. The most recent forecast at McPhee shows the possibility of a small release for boating over Memorial Day weekend. This may change with evolving weather.

Water Year 2016 Forecasts

Based on the most recent mid-April forecast from the Colorado River Basin Forecast Center (CBRFC), the most probable forecasted inflow for April-July into Navajo is 515,000 acre-feet, which is 70% of average.

The most probable forecast will result in a spring peak release beginning with a 5-day ramp up to 5,000 cfs (note that during the meeting we stated a 3-day ramp up. This ramp up rate has since been revised to 5-days based on meeting input), followed by a peak at 5,000 cfs for up to 31 days, followed by a 12-day ramp back down to base flows. The total number of days may change slightly as weather evolves.

The spring peak release will be timed to coincide with the peak of the Animas. Because of this, the start date is highly dependent on weather. Current plans call for the release to begin either May 16th, or May 23rd. The start date for the spring peak release will not be finalized until approximately one week prior to ramp-up. When finalized, notifications will be sent out.

Following the spring peak release, Navajo releases will be made to satisfy the San Juan River Recovery Implementation Program's target baseflow downstream in the critical habitat reach. Releases will likely vary between 350 cfs and 600 cfs, depending on natural tributary inflows.

Maintenance Activities

Drilling at the downstream face of the dam and up to 500 yards downstream is occurring and will continue through August. Though the work will remain at the toe of the dam, this operation may be audible and visible from the road and along the river immediately downstream.

Plans are being generated for the installation of a flowmeter at the main outlet works during FY2017. The current releases are compiled using a rating curve at the dam.

Agency/Organization Activities and Discussion of Related Activities

New Mexico Office of the State engineer (NMOSE): Measurement stations are up and running (except Jewett Valley).

Keller-Bliessner Engineering: Fruitland diversion replacement planned for 2017-2018

Dine Water Users: Waiting for funding from salinity control program. Fruitland and Hogback projects are converting open ditch to 182,900 feet of pressure pipe. Total of \$6 million dollars. Awards will occur June 1. Habitat restoration and channel rebuilds are prioritized with construction beginning in July.

Navajo Agricultural Products, Inc (NAPI): NGWSP work at Cutter Dam occurring presently.

City of Farmington: New Mexico Environmental Department in conjunction with City of Farmington is holding a forum to discuss Gold King Mine. May 17th-18th at San Juan College.

US Army Corps of Engineers: Plans to watch the spring peak release from Navajo to monitor flood risk management

San Juan River Recovery Implementation Program (SJRIP): Annual Meeting will be held Wednesday, May 11th in Durango at Fort Lewis College.

Next Meeting - Scheduled for **1:00 p.m. on Tuesday, August 23rd, 2016** at the Civic Center in Farmington, New Mexico (200 West Arrington Street).

Attendance List – April 26, 2016 Navajo Operations Meeting

Ashcroft, Nick, West Hammond Domestic Water Assoc., Bloomfield NM
Behery, Susan, Bureau of Reclamation, Durango CO
Carlisle, Alexendra, Navajo Agricultural Products Industry Farmington NM
Christianson, Ryan, Bureau of Reclamation, Grand Junction CO
Day, Henry, Arizona Public Service, Phoenix AZ
Dodd, Stacy, Bloomfield Irrigation District, Bloomfield NM
Duncan, Martin, San Juan River Dineh Water Users Inc., Shiprock NM
Durst, Scott, US Fish and Wildlife Service, Albuquerque NM
Greenberg, Andy, Abe's Store & Motel, Navajo Dam NM
Gronewold, Ryan, US Army Corp of Engineers, Albuquerque NM
Hayden, Ben, Soaring Eagle Lodge, Navajo Dam NM
Hodges, Jimmie, Office of NM State Engineer, Aztec NM
Horner, Gary, Citizen, Farmington NM
Isaacson, Mike, Keller-Bliesner Engineering, Farmington NM
Joe, Jeanette, Navajo Agricultural Products Industry O&M, Farmington NM
Johnson, Larry, Soaring Eagle Lodge, Navajo Dam NM
Johnston, Clay, Turley Manzanares Ditch Co., Blanco NM
Lane, Teresa, Hammond Conservancy District, Bloomfield NM
Lee, Aaron, Lee Acres Water Users Assoc., Farmington NM
Lee, Keith, Lower Valley Water Users, Farmington NM
Lile, Carrie, Southwestern Water Conservation District, Durango CO
Miller, Gordon, San Juan Water Commission, Aztec NM
Miller, Scott, Arizona Public Service, Phoenix AZ
Moline, Cheryl, NM State Park, Navajo Dam NM
Montoia, Paul, City of Farmington, Farmington NM
Nezwood, Shane, Navajo Agricultural Products Industry Farmington NM
Prda, Nam, West Hammond Domestic Water Users, Bloomfield NM
Rasor, Joe & Julie, Landowners, Farmington NM
Richmond, Linda, BLM, Monticello UT
Skeei, Raynaldo, Navajo Agricultural Products Industry O&M, Farmington NM
Stoliker, David, Bureau of Reclamation, Farmington NM
Swickard, Ruth, Bureau of Reclamation, Durango CO
Tavener, John, San Juan River Guide Assoc., Navajo Dam NM
Tensfield, Jerry, Bureau of Reclamation, Navajo Dam NM
Todacheenie, June, San Juan River Dineh Water Users Inc., Shiprock NM
Tsinnijinnie, Ty, Navajo Agricultural Products Industry O&M, Farmington NM
Vandever, Rochelle, Keller-Bliesner Engineering, Farmington NM
Watson, Blaine, NM Office of the State Engineer, Aztec NM
Wethington, Marc, NM Department of Game and Fish, Navajo NM
Whitmore, Sharon, US Fish and Wildlife Services, Albuquerque NM
Williams, Shawn, NM Office of the State Engineer, Aztec NM
Wimsatt, Marian, BHP Billiton NM Coal, Farmington NM
Yazzie, Meeya, Keller-Bliesner Engineering, Farmington NM
Yazzie, Roselyn, Navajo Agricultural Products Industry Farmington NM
Young, Rick, US Army Corp of Engineers, Albuquerque NM