

Aspinall Unit Operations Meeting August 25, 2022

Background: A Record of Decision for the Aspinall Unit Operations Environmental Impact Statement was signed on May 3, 2012. The EIS modifies the operations of the Aspinall Unit to provide sufficient releases of water at times, quantities, and durations necessary to avoid jeopardy to endangered fish species and adverse modification of their designated critical habitat while maintaining and continuing to meet authorized purposes of the Aspinall Unit. Meetings regarding the operations of the Aspinall Unit are open to stakeholders, and take place tri-annually, with meetings typically occurring in January, April, and August of each year.

Spring Forecast and Runoff Review – Ashley Nielson (CBRFC)

October thru March precipitation was 95% of average for the Gunnison Basin, while April and May precipitation came in under 50% of average. The southern side of the basin was drier than the north. Snowpack was mostly above average in the basin but a warm and dry spring lead to an early melt. Summertime precipitation helped reduce irrigation demands as June and July precipitation was 150% to 200% of average.

April thru July runoff for streams within the Gunnison Basin generally came in between 50% and 80% of average. Forecasts for inflows to Blue Mesa Reservoir had the runoff falling in the Average Dry category initially, but by mid-April forecasts had declined into the Moderately Dry category.

Aspinall Unit Operations – Erik Knight (USBR)

Spring Runoff Conditions: The May 1st forecast for Blue Mesa inflow was 490,000 AF, placing Water Year 2022 Aspinall operations within the threshold of the Moderately Dry year category. Runoff forecasts dropped to 425,000 AF by the middle of June. Actual inflow into Blue Mesa ended up at 430,000 AF, which is 68% of average. Most streams in the Gunnison Basin received April-July runoff volumes ranging between 55% and 85% of average.

Black Canyon Peak and Lower Gunnison River Targets: Based on a May 1st forecasted inflow of 490,000 AF, the Black Canyon peak flow requirement was 2,412 cfs. On May 18-19, there was a 2,700 cfs 24-hour peak flow. The peak flow in the Black Canyon was coordinated to match the timing of the peak flow for the lower Gunnison River at the Whitewater gage.

The peak flow target for the lower Gunnison River at Whitewater was 5,000 cfs based on the mid-May runoff forecast of 445,000 AF for Blue Mesa inflow which set the hydrologic year type in the Moderately Dry category. A drought rule allowed for a slight reduction in the normal peak flow target level. The actual peak flow at Whitewater was 5,800 cfs. Due to the dry runoff conditions, there were no half bank or peak flow duration days required at Whitewater.

Operations Past, Present and Future: Blue Mesa Reservoir content peaked at 391,000 AF (47% full) at an elevation of 7464 ft (55 feet below a full reservoir). Blue Mesa Reservoir content is currently 346,000 AF at elevation 7456.6 ft. During Dry and Moderately Dry years, if Blue Mesa Reservoir content drops below 600,000 af, the Whitewater baseflow target is reduced from 1050 cfs to 900 cfs until Blue Mesa Reservoir content exceeds 600,000 af. Gunnison River flows at Whitewater have been above the baseflow target flow of 900 cfs for most of the days this summer. Flows in the Gunnison River through the Black Canyon have ranged between 400 cfs and 550 cfs as Crystal Dam releases have been adjusted to meet the baseflow target at Whitewater.

As of August 25, 2022, the conditions of reservoirs in the basin are as follows:

Reservoir	% of Full Capacity
Paonia	22%
Taylor Park	68%
Crystal	91%
Morrow Point	95%
Blue Mesa	42%
Ridgway	76%
Silver Jack	47%

Flows in the Gunnison River through the Black Canyon will continue to range between 350 cfs and 450 cfs for the next couple months. Blue Mesa Reservoir is expected to end the calendar year with a content of 287,000 AF at an elevation of 7446 feet. This level would be 44 feet below the winter target elevation of 7490 feet.

Weather Outlook – Aldis Strautins (NWS)

Temperatures this water year have been normal to slightly warm, while precipitation remains below normal. Good precipitation occurred in late December and late February, otherwise the winter season was mostly dry. Summer rains provided relief from the dry spring months. The fall months are forecast to be warmer and drier than average. Moderate to severe drought in the upper basin and lower basin continues with some areas of extreme drought. ENSO-La Nina conditions are present and are expected to continue this winter and then transition toward neutral during the spring.