

United States Department of the Interior

BUREAU OF RECLAMATION

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MT-450

Great Plains Region Montana Area Office P.O. Box 30137 Billings, Montana 59107-0137

August 3, 2007

FAXOGRAM: Water Order Change

To: Chief, Power Supply and Billing Division, WAPA, Watertown, South Dakota

Attention: F-6001

Chief, Power Dispatching Branch, WAPA, Loveland, Colorado

Attention: J-4120

Facilities Manager, Hardin, Montana Attention: MT-300: Tom Tauscher Area Manager, Mills, Wyoming

Attention: WY-4000, WY-4100, WY-6400

Assistant Superintendent, National Park Service, Lovell, Wyoming

Attention: Jim Staebler

From: Reservoir and River Operations, Billings, Montana

Subject: Yellowtail Water Release Order - BHR No. 07-36

CURRENT RESERVOIR CONDITIONS:

Elevation: 3634.17; Storage: 1,002,009 acre-feet; River Release: 1,750 cfs; Inflow: 1,665 cfs;

GENERAL COMMENTS:

To assist with the Comprehensive Facility Review and inspection of the physical features of Yellowtail Dam and Afterbay Dam scheduled for August 13-16, 2007, the following operation changes are required at Yellowtail Dam and Powerplant and the Afterbay Dam.

NOTE: This is the time period when fish are more susceptible to high levels of nitrogen gas super-saturation. To provide a more desirable mixing flow of approximately 75% through the spillway gates and 25% through the sluice gates to maintain the total gas super-saturation levels at safe limits, the minimum Afterbay elevation should be maintained at or above elevation 3183 whenever possible. This is only a soft limit and may be deviated from during special or emergency operations.

TURBINE RELEASES:

During all inspections conducted during August 13-15, 2007:

Maintain average daily turbine release at 2,055 cfs ($\approx 1,450$ MW-Hrs/day using 35.2 cfs/mw).

AFTERBAY RELEASE AND OPERATION:

During all inspections conducted during August 13-15, 2007:

Maintain diversions to Bighorn Canal at 375 cfs (gage height = 73.90 with a shift of -0.27). Maintain river release at 1,750 cfs (gage height = 59.45 with a shift of -0.11). Maintain total release from the Afterbay at 2,125 cfs.

Note: During 0900-1700 hour on Monday, August 13, 2007, maintain the Afterbay no lower than elevation 3182 to ensure releasing 1,750 cfs over the Afterbay spillway overflow weir to the river.

Note: During 0900-1200 hour on Wednesday, August 15, 2007, maintain the tailwater of Yellowtail Dam no higher than elevation 3183 to allow for inspection of the Yellowtail Dam spillway tunnel.

Note: During 1300-1700 hour on Wednesday, August 15, 2007, maintain the Afterbay no higher than elevation 3179 to allow for inspection of the upstream side of the Afterbay spillway overflow gates. At the conclusion of the inspections on August 15, normal operations shall resume as previously scheduled.