



IN REPLY REFER TO: MT-450

United States Department of the Interior

BUREAU OF RECLAMATION

Great Plains Region

Montana Area Office

P.O. Box 30137

Billings, Montana 59107-0137



January 16, 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
Project 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. 07-11**

CURRENT RESERVOIR CONDITIONS:

Elevation: 3608.60; Storage: 794,477 acre-feet; River Release: 1,500 cfs; Inflow: 850 cfs;

GENERAL COMMENTS:

Power generation indicates actual river flows are higher than anticipated. In response, the following operation changes are required at Yellowtail Dam and Powerplant, applying a new shift to the river stage.

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:

At 1600 hour on Tuesday, January 16, 2007:

Maintain average daily turbine release at 1,430 cfs (\approx 870 MW-Hrs/day using 39.4 cfs/mw).

AFTERBAY RELEASE AND OPERATION:

At 1600 hour on Tuesday, January 16, 2007:

Maintain diversions to the Bighorn Canal at 0 cfs.

Maintain river release at 1,500 cfs (decrease gage height to 59.43 and apply a shift of -0.36).

Maintain total release from the Afterbay at 1,500 cfs.

/S/ Tim H. Felchle