



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



August 21, 2008

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. 08-50**

CURRENT RESERVOIR CONDITIONS:

Elevation: 3639.30; Storage: 1,061,290 acre-feet; River Release: 2,700 cfs; Inflow: 2,170 cfs;

GENERAL COMMENTS:

The BIA reported the breach in the Bighorn Canal has been repaired and have requested irrigation deliveries be gradually increased. To avoid making any changes in power turbine releases the following operation changes are required at Yellowtail Dam and Powerplant.

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.

YELLOWTAIL TURBINE RELEASE:

At 1100 hour on Thursday, August 21, 2008:

Maintain average daily turbine release at $\approx 2,825$ cfs ($\approx 1,840$ MW-Hrs/day using 36.8 cfs/mw).

At 1230 hour on Thursday, August 21, 2008:

Maintain average daily turbine release at $\approx 2,825$ cfs ($\approx 1,840$ MW-Hrs/day using 36.8 cfs/mw).

AFTERBAY RELEASE AND OPERATION:

At 1100 hour on Thursday, August 21, 2008:

Increase diversions to the Bighorn Canal to 245 cfs (gage height = 72.99 with -0.37 shift).

Decrease river release to 2,650 cfs (decrease gage height to 60.81 & apply shift of -0.69).

Maintain total release from the Afterbay at 2,895 cfs.

At 1230 hour on Thursday, August 21, 2008:

Increase diversions to the Bighorn Canal to 295 cfs (gage height = 73.40 with -0.37 shift).

Decrease river release to 2,600 cfs (gage height = 60.775 with shift of -0.69).

Maintain total release from the Afterbay at 2,895 cfs.

/S/ Tim H. Felchle