

### United States Department of the Interior

BUREAU OF RECLAMATION

Great Plains Region Montana Area Office P.O. Box 30137 Billings, Montana 59107-0137 May 9, 2007



#### Dear Interested Party:

Reclamation continues to closely monitor water supply conditions at Yellowtail Reservoir (Bighorn Lake) and we take these conditions into account in our operations. Inflows to Bighorn Lake during the month of April were only 58 percent of average, and the April end-of-month reservoir elevation was about 2.5 feet lower than what we had projected in our April operations plan. The May through July inflows are forecast to be around 55 percent of average, which unfortunately is a continuation of an undesirable trend. In addition, during May is when we typically begin releases to meet downstream irrigation demands, which places additional demands on reservoir storage. Based on these conditions, and in an effort to conserve storage, we will maintain releases from Yellowtail Dam to the Bighorn River at 1,500 cubic feet per second (cfs) through June. If our most probable inflow projections are realized, this release schedule should enable us to maintain adequate storage through the summer to afford some much-needed operational flexibility this coming fall and winter. Should hydrologic conditions improve significantly, increases in river releases later this spring or early summer will be considered.

As unpopular as our April plan was with some of our stakeholders, we must keep our eye on the long-term and continue a conservative release schedule until we start seeing a major improvement in inflows. If we don't make a concerted effort to conserve now, we will be faced with having to again experience less-than-desirable releases this coming fall and winter, and that is a situation I hope everyone wants to avoid. Regardless of how the next few weeks play out, we will continue to monitor conditions very closely and we will make adjustments to our release schedule, as necessary, depending on actual conditions. Some relief by Mother Nature certainly wouldn't hurt the situation.

Updates to the Yellowtail operations plan can be accessed through our Web site at www.usbr.gov/gp/mtao.

Reclamation remains committed to continue exploring opportunities for enhancing benefits for all Yellowtail beneficiaries through collaborative efforts with interested parties and stakeholders from both Montana and Wyoming. Please feel free to provide us with additional information as this operational season progresses.

Sincerely,

Dan Jewell Area Manager

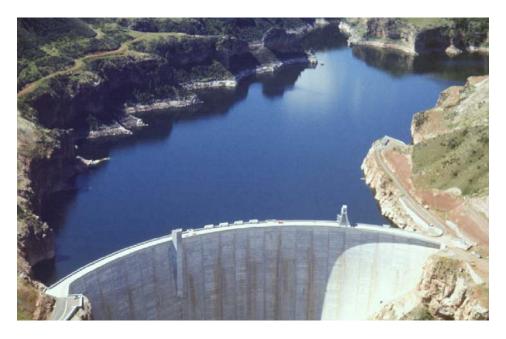
# RECLANIATION Managing Water in the West

May 1, 2007

Dear Customer:

Attached is the monthly water supply outlook and projected reservoir and river operating plans as prepared on May 9, 2007. Mountain snowpack and streamflow into Bighorn Lake continues to remain below normal. Water users are advised to continue making plans to conserve the limited available water supply. We hope you find the information useful. If you have any questions or concerns, please feel free to call me at (406) 247-7318.

Tim H. Felchle Reservoir and River Operations





U. S. Department of the Interior Bureau of Reclamation Montana Area Office River and Reservoir Operations

#### YELLOWTAIL RESERVOIR OPERATIONS

Water Supply Forecasts and Reservoir Operations May 1, 2007

# Present Elevations & Storages:

Reservoir	<u>Elevation</u>	<u>Storage</u>	Percent of Normal
Boysen	4707.80	462,999	
Buffalo Bill	5372.49	485,597	
Bighorn Lake	3611.65	813,848	99

#### **Actual Inflows (1,000 Acre-Feet):**

<u>Inflow</u>	Percent of Normal
528.2	44
1,432.9	57
125.6	66
98.7	61
82.5	56
67.4	48
77.8	54
100.2	56
100.6	58
	528.2 1,432.9 125.6 98.7 82.5 67.4 77.8 100.2

#### Actual Gains Between Boysen and Buffalo Bill to Yellowtail (1,000 Acre-Feet):

Month .	<u>Gains</u>	Percent of Normal				
April-July, 2006	-2.5					
WY-2006 Total	280.6	39				
October	73.5	97				
November	56.9	88				
December	39.6	84				
January	24.0	51				
February	38.7	67				
March	56.7	72				
April	55.0	116				

#### May Forecast of May-July Inflow (1,000 Acre-Feet):

<u>Agency</u>	<u>Inflows</u>	Percent of Normal
USBR	559.5	55

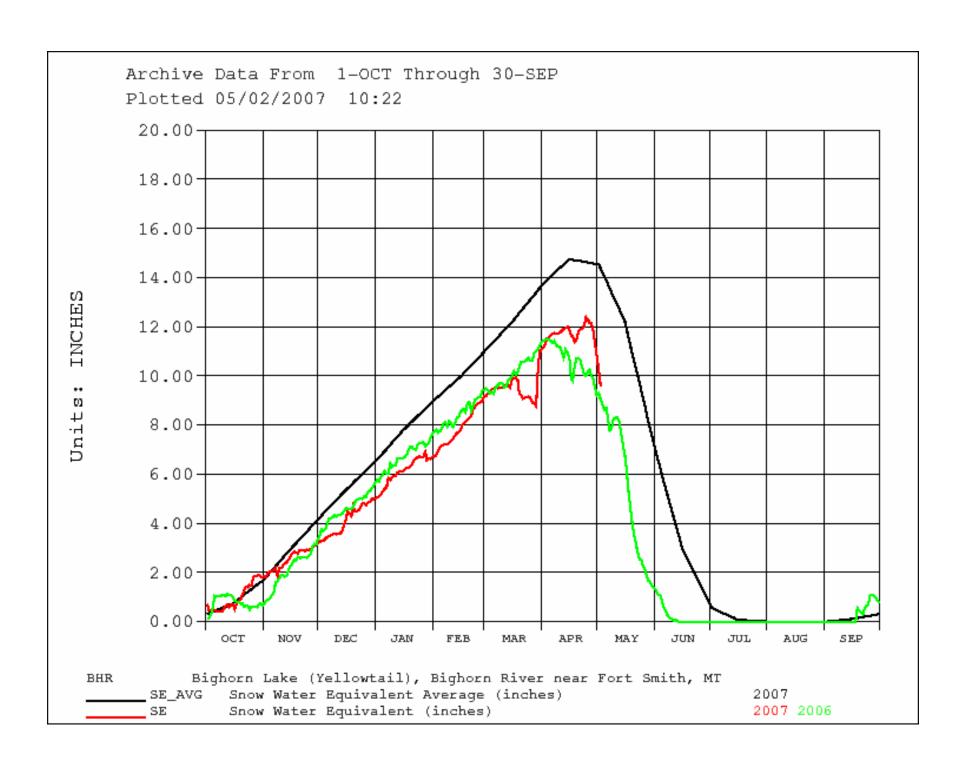
#### **Snowpack Conditions**:

SNOW - PRECIPITATION UPDATE Based on Mountain Data from NRCS SNOTEL Sites

As of TUESDAY: MAY 1, 2007

BASIN Data Site Name	ELEV. (Ft)	SNOW WAT	ER EQUIVA	TOTAL PRECIPITATION %				
		Current	Average	Avg	Current	Average	Avg	
IIDDED VELLOWOODE DE	TARD DACTM							
UPPER YELLOWSTONE RI	LVEK BASIN							
BEARTOOTH LAKE	9275	21.3	25.9	82	21.6	23.5	92	
BOX CANYON	6700	.0	6.0	0	15.3	14.9	103	
BRACKETT CREEK	7320	11.2	21.5	52	23.5	30.7	77	
BURNT MTN	5880	.0	-M	*	14.9	-M	*	
CANYON	8090	7.7	11.3	68	17.3	17.7	98	
COLE CREEK	7850	13.0	19.7	66	14.6	21.9	67	
EVENING STAR	9200	21.2	33.3	64	29.9	29.9	100	
FISHER CREEK	9100	32.4	37.8	86	33.5	41.9	80	

MONUMENT PEAK		16.6		72	22.0	24.8	89
NORTHEAST ENTRANCE		.0	7.1	0	14.8	14.8	
PARKER PEAK	9400	18.9	24.5 19.8	77	20.9	19.5	
PARKER PEAK PLACER BASIN	8830	14.6	19.8	74	21.4	23.5	
PORCIIPTNE	6500			0	15.5		
SACAJAWEA SHOWER FALLS	6550	. 5	12.8	4	23.9	-M	*
SHOWER FALLS	8100	23.2	26.9	86	27.8	30.5	91
S FORK SHIELDS	8100	15.5	19.6	79	24.9	25.6	97
SYLVAN LAKE	8420	14.2	23.8	60	24.4	24.7	99
SYLVAN ROAD	7120	. 0	8.1	0	17.7	20.5	86
THUMB DIVIDE	7980	3.7	14.9	25	17.1	22.0	
TWO OCEAN PLATEAU	9240	26.6	31.8	84	25.3	32.1	79
WHITE MILL WOLVERINE	8700	20.1	26.4	76 0	22.8	31.2 15.2	73
WOLVERINE	7650	. 0	7.2	0	12.8		
YOUNTS PEAK	8350	10.0	18.1		15.4	18.8	
	wide perce						
		88					
WIND RIVER BASIN (WYO	MING)	11 0	12 6	0.1	1 - 1	10 2	7.0
BURROUGHS CREEK	8/50	11.0	13.6	81	15.1	19.3	
COLD SPRINGS DEER PARK	9630	.0 9.7	4.8 18.6	0	10.1	13.9	73
DEER PARK	9700	9.7		52	17.7		66
HOBBS PARK	10100	12.0	18.0	67		16.9	87
KIRWIN LITTLE WARM	9550	10.6 4.9	13.0 11.1	82 44	14.2 11.8	14.2	
LITTLE WARM	9370	4.9	11.1	44	11.8	16.8	
OWL CREEK	0010		4.0	0	8.3		
SOUTH PASS	9040 8620	8.0	18.0 6.1 27.9	44 0	15.2 10.2	22.7 12.1	67
ST. LAWRENCE ALT TOGWOTEE PASS	8620	.0	6.1 27.9	0			84
	9580	18.5	27.9	66	23.0	∠9.U	19
TOWNSEND CREEK	8700	2.8 10.0	9.1	3 L	12.0 15.4	15.5	77
YOUNTS PEAK	8350	10.0		55	15.4	18.8	82
							78
Ragin	wide nerce	nt of av	erage	54			
Basin SHOSHONE RIVER BASIN	wide perce	nt of av	erage	54			78
SHOSHONE RIVER BASIN	(WYOMING)				22 3	24 7	
SHOSHONE RIVER BASIN BLACKWATER	(WYOMING) 9780	21.9	28.8	76			90
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR	(WYOMING) 9780 9200	21.9 21.2	28.8 33.3	76 64	29.9	29.9	90 100
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE	(WYOMING) 9780 9200 8760 8420	21.9 21.2	28.8 33.3	76 64	29.9 12.4	29.9	90 100
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE	(WYOMING) 9780 9200 8760 8420	21.9 21.2 1.9 14.2	28.8 33.3 11.3 23.8	76 64 17 60	29.9 12.4 24.4	29.9 13.7 24.7	90 100 91 99
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD	(WYOMING) 9780 9200 8760 8420 7120	21.9 21.2 1.9 14.2	28.8 33.3 11.3 23.8 8.1	76 64 17 60 0	29.9 12.4 24.4 17.7	29.9 13.7 24.7 20.5	90 100 91 99 86
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE	(WYOMING) 9780 9200 8760 8420	21.9 21.2 1.9 14.2	28.8 33.3 11.3 23.8 8.1	76 64 17 60 0	29.9 12.4 24.4 17.7	29.9 13.7 24.7 20.5	90 100 91 99 86
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK	(WYOMING) 9780 9200 8760 8420 7120	21.9 21.2 1.9 14.2 .0	28.8 33.3 11.3 23.8 8.1 18.1	76 64 17 60 0 55	29.9 12.4 24.4 17.7	29.9 13.7 24.7 20.5	90 100 91 99 86 82
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce	21.9 21.2 1.9 14.2 .0 10.0	28.8 33.3 11.3 23.8 8.1 18.1	76 64 17 60 0 55 	29.9 12.4 24.4 17.7 15.4	29.9 13.7 24.7 20.5 18.8	90 100 91 99 86 82
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK Basin	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce	21.9 21.2 1.9 14.2 .0 10.0 ent of av	28.8 33.3 11.3 23.8 8.1 18.1 erage	76 64 17 60 0 55 	29.9 12.4 24.4 17.7	29.9 13.7 24.7 20.5 18.8	90 100 91 99 86 82
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce	21.9 21.2 1.9 14.2 .0 10.0 ent of av	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5	76 64 17 60 0 55	29.9 12.4 24.4 17.7 15.4	29.9 13.7 24.7 20.5 18.8	90 100 91 99 86 82
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (**) BALD MTN.	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8	76 64 17 60 0 55  56	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3	29.9 13.7 24.7 20.5 18.8	90 100 91 99 86 82  92
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200	21.9 21.2 1.9 14.2 .0 10.0 ent of av	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3	76 64 17 60 0 55  56 94 56 76	29.9 12.4 24.4 17.7 15.4	29.9 13.7 24.7 20.5 18.8	90 100 91 99 86 82  92 85 108
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8	76 64 17 60 0 55  56 94 56 76	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7	90 100 91 99 86 82  92 85 108 90
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3	76 64 17 60 0 55  56 94 56 76 99 64 53	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3	90 100 91 99 86 82  92 85 108 90 105
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3	76 64 17 60 0 55  56 94 56 76 99 64	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9	90 100 91 99 86 82  92 85 108 90 105 100
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1	76 64 17 60 0 55  56 94 56 76 99 64 53	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1	90 100 91 99 86 82  92 85 108 90 105 100 71
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3	76 64 17 60 0 55  56 94 56 76 99 64 53 82 17	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3	76 64 17 60 0 55  56 94 56 76 99 64 53 82 17 74 0	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3	76 64 17 60 0 55  56 94 56 76 99 64 53 82 17 74 0 74	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN ( BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0	76 64 17 60 0 55  56 94 56 76 99 64 53 82 17 74 0	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK SYLVAN LAKE	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580 8420	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6 .0 7.9 16.4 14.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0 10.7 16.8 23.8	76 64 17 60 0 55  56 94 56 76 99 64 53 82 17 74 0 74	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3 14.5 14.7 24.4	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8 16.8 24.7	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87 99
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN ( BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK SYLVAN LAKE SYLVAN ROAD	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580 8420 7120	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6 .0 7.9 16.4 14.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0 10.7 16.8 23.8 8.1	76 64 17 60 55  56 94 53 82 17 74 98 60 0	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3 14.5 14.7 24.4 17.7	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8 16.8 24.7 20.5	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87 99 86
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK SYLVAN LAKE SYLVAN ROAD TIMBER CREEK	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580 8420 7120 7950	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6 .0 7.9 16.4 14.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0 10.7 16.8 23.8 8.1 4.8	76 64 17 60 0 55 56 94 53 82 17 74 98 60 0 19	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3 14.5 14.7 24.4 17.7 10.2	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8 16.8 24.7 20.5 10.5	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87 99 86 97
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN ( BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK SYLVAN LAKE SYLVAN ROAD	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580 8420 7120	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 1.9 10.6 .0 7.9 16.4 14.2	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0 10.7 16.8 23.8 8.1	76 64 17 60 55  56 94 53 82 17 74 98 60 0	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3 14.5 14.7 24.4 17.7	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8 16.8 24.7 20.5	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87 99 86
SHOSHONE RIVER BASIN BLACKWATER EVENING STAR MARQUETTE SYLVAN LAKE SYLVAN ROAD YOUNTS PEAK  Basin BIGHORN RIVER BASIN (** BALD MTN. BEAR TRAP MEADOW BLACKWATER BONE SPRINGS DIV EVENING STAR GRAVE SPRINGS KIRWIN MARQUETTE MIDDLE POWDER OWL CREEK POWDER RIVER PASS SHELL CREEK SYLVAN LAKE SYLVAN ROAD TIMBER CREEK YOUNTS PEAK	(WYOMING) 9780 9200 8760 8420 7120 8350 wide perce WYOMING) 9380 8200 9780 9350 9200 8550 9550 8760 7760 8975 9480 9580 8420 7120 7950	21.9 21.2 1.9 14.2 .0 10.0 ent of av 22.1 1.4 21.9 18.2 21.2 5.9 10.6 .0 7.9 16.4 14.2 .0 .9	28.8 33.3 11.3 23.8 8.1 18.1 erage 23.6 2.5 28.8 18.3 33.3 11.1 13.0 11.3 14.3 4.0 10.7 16.8 23.8 8.1 4.8	76 64 17 60 0 55 5 94 56 76 99 64 53 82 17 74 98 60 0 19	29.9 12.4 24.4 17.7 15.4 18.1 11.8 22.3 19.2 29.9 9.3 14.2 12.4 11.2 8.3 14.5 14.7 24.4 17.7 10.2	29.9 13.7 24.7 20.5 18.8 21.3 10.9 24.7 18.3 29.9 13.1 14.2 13.7 15.8 8.2 15.8 16.8 24.7 20.5 10.5	90 100 91 99 86 82  92 85 108 90 105 100 71 100 91 71 101 92 87 99 86 97



#### BHXAOP V1.12 Run: 07-May-2007 14:41 Based on Most Probable Inflow Forecast

#### BIGHORN LAKE MONTHLY OPERATIONS

Bighorn Reservoir		Ir	nitial Co El		3.8 kaf	Ma	aximum Co		28.4 kaf 7.00 ft	M	inimum C		93.6 kaf 7.00 ft	
20	007	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	Total
-	kaf	65.8	69.6	73.2	66.4	45.5	30.7	23.8	24.6	24.6	23.0	24.6	44.6	516.4
- 2	cfs	1070	1170	1190	1080	765	499	400	400	400	400	400	750	
Buffalo Bill Riv Flo k		64.9	62.7	70.4	63.0	50.0	18.4	8.9	9.2	9.2	8.6	9.2	24.4	398.9
Buffalo Bill Riv Flo c		1055	1054	1145	1025	840	299	150	150	150	150	150	410	
	kaf	64.5	101.1	-12.3	-1.6	38.3	70.4	58.1	41.0	43.8	52.2	71.5	40.9	567.9
	kaf	195.2	233.4	131.3	127.8	133.8	119.5	90.8	74.8	77.6	83.8	105.3	109.9	1483.2
Monthly Inflow o	cfs	3175	3922	2135	2078	2249	1943	1526	1217	1262	1457	1713	1847	
	kaf	99.1	106.9	146.4	145.5	133.6	118.7	114.8	118.7	118.7	111.0	118.7	115.3	1447.4
21	kaf	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
	kaf	99.1	106.9	146.4	145.5	133.6	118.7	114.8	118.7	118.7	111.0	118.7	115.3	1447.4
Total Release c	cfs	1612	1797	2381	2366	2245	1930	1929	1930	1930	1930	1930	1938	
Spring Flow k	kaf	4.3	4.2	4.3	4.3	4.2	4.3	4.2	4.3	4.3	4.0	4.3	4.2	50.9
Irrigation Reqmnt k	kaf	11.2	21.8	27.7	26.8	18.8	0.0	0.0	0.0	0.0	0.0	0.0	0.5	106.8
Afterbay Rels k	kaf	103.4	111.1	150.7	149.8	137.8	123.0	119.0	123.0	123.0	115.0	123.0	119.5	1498.3
Afterbay Rels c	cfs	1682	1867	2451	2436	2316	2000	2000	2000	2000	1999	2000	2008	
River Release k	kaf	92.2	89.3	123.0	123.0	119.0	123.0	119.0	123.0	123.0	115.0	123.0	119.0	1391.5
River Release c	cfs	1499	1501	2000	2000	2000	2000	2000	2000	2000	1999	2000	2000	
Min Release k	kaf	92.2	89.3	123.0	123.0	119.0	123.0	119.0	123.0	123.0	115.0	123.0	119.0	1391.5
End-Month Targets k	kaf			1070.0										
End-Month Content k	kaf	909.9	1036.4	1021.3	1003.6	1003.8	1004.6	980.6	936.7	895.6	868.4	855.0	849.6	
End-Month Elevation	ft	3624.50	3637.23	3635.92	3634.31			3632.13	3627.56	3622.77	3619.32	3617.53	3616.80	
Net Change Content k	kaf	96.1	126.5	-15.1	-17.7	0.2	0.8	-24.0	-43.9	-41.1	-27.2	-13.4	-5.4	35.8
Yellowtail Power 20	007	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	Total
Turbine Release k	kaf	99.1	106.9	146.4	145.5	133.6	118.7	114.8	118.7	118.7	111.0	118.7	115.3	1447.4
Generation g	gwh	37.976	42.551	59.296	58.637	53.695	47.714	45.979	47.026	46.364	42.845	45.485	44.030	571.598
End-Month Power Cap	mw	272.4	284.7	283.4	281.8	281.9	281.9	279.7	275.3	270.8	267.6	265.9	265.3	
% Max Gen		18	21	28	27	26	22	22	22	22	21	21	21	
Ave kwh/af		383	398	405	403	402	402	401	396	391	386	383	382	395
Upstream Generation g	gwh	24.824	25.120	27.160	24.563	19.351	8.120	3.725	3.911	3.950	3.717	4.013	11.412	159.866
Total Generation g	gwh	62.800	67.671	86.456	83.200	73.046	55.834	49.704	50.937	50.314	46.562	49.498	55.442	731.464

## **BIGHORN LAKE**

