

# GLACIER LAKE DAM

## Fact Sheet

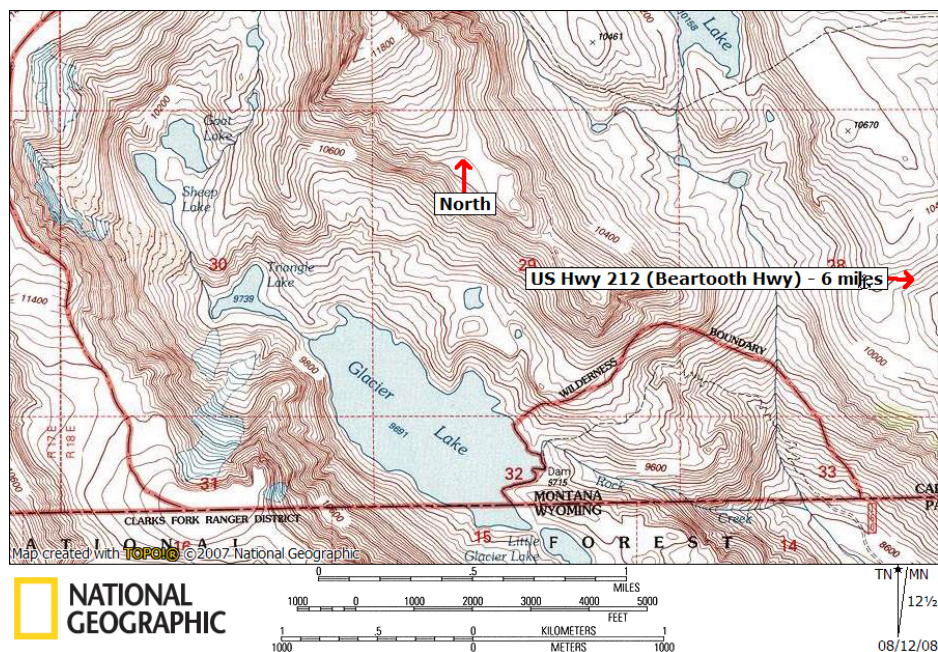
### PROJECT DESCRIPTION

- ◆ Located on Rock Creek, approximately 19 miles southwest of Red Lodge on the Custer National Forest in Carbon County
- ◆ Construction completed in 1937
- ◆ Owned by DNRC & managed by SWPB under a U.S. Forest Service Special Use Permit
- ◆ Operated by Rock Creek Water Users Association (RCWUA) since 1937
- ◆ Project consists of:
  - Two rockfill dams with concrete upstream faces:
    - North Dam – 57 feet high & 230 feet long
    - South Dam – 20 feet high & 253 feet long
  - Uncontrolled rock channel spillway discharging over a concrete weir
  - Low level outlet is a rock tunnel beneath the North Dam, approximately 6.5 feet high by 5.5 feet wide; outlet is controlled by one 48-in X 48-in rectangular slide gate
  - The operating controls are in a wooden gatehouse, located on the on the North Dam crest
- ◆ Normal full-pool storage is 4,200 acre-feet with a surface area of 151 acres.
- ◆ The dam is a “high hazard” structure, which means that its failure could cause loss of life. Farms and ranches, roads, bridges, and utilities are located in the flood plain.



### WATER USE

- ◆ One of two reservoirs that provide 21,770 acre-feet of water for the RCWUA
- ◆ Used to supplement Rock Creek flows during late irrigation and for municipal water (Red Lodge); reservoir also used for water-based recreation
- ◆ There is no motor vehicle access to this remote site.



## REHABILITATION SUMMARY

- ◆ Various maintenance activities are ongoing.

## FUTURE NEEDS

- ◆ Spillway capacity is inadequate based on past safety standards. Evaluation underway to determine if spillway is compliant with current standards.
- ◆ If needed, based on evaluation of spillway capacity, a feasibility study will be conducted for rehabilitation of the spillway.



Upstream face



Outlet



North (top) and South Dams



Spillway