Keeping Dams Safe
Protecting People, Property and Natural Resources

This plunge pool at the bottom of the dam structure meets current NRCS standards for safety.

Mill Creek Watershed

Rehabilitation of Mill Creek structure 10 extends the life of this dam by 50 years. Two homes downstream from the structure were found to be in the breach inundation area of the dam and were in need of floodproofing removing the threat to public safety.

The USDA Natural Resources Conservation Service (NRCS) developed a supplemental watershed plan and environmental assessment which recommended removal of sediment from behind the dam and installation of new riser and base flow inlet. The plunge pool at the bottom of the structure was rebuilt to meet current NRCS standards. Along with the floodproofing measures to the homes and a new zoning ordinance that prohibits development in this zone, the dam now meets the safety requirements of a low hazard, or class “a” dam.

Construction project cost: $139,000

Funding: Sixty-five percent of the project construction cost and 100 percent of the technical assistance costs were provided by NRCS. The remaining cost of the repair work was provided by the project sponsor.

Watershed Project Sponsor:
Richland County Land Conservation Department

The watershed dams built through Public Law 83-566 are important to Wisconsin in many ways. They provide flood control to prime farmland, highways, communities and residences and conserve natural resources.

Wisconsin was chosen in 2000 as a pilot state to rehabilitate several aging watershed dams. Mill Creek Watershed Dam No. 10 is part of this national pilot rehabilitation project. Experience and information gained from this project is being used as other dams are rehabilitated across the nation.

The Mill Creek Watershed Plan, authorized in 1965, included eight flood control dams. Structure No. 10 was completed in 1965.

Mill Creek structure 10 prevents sediment from reaching valuable water resources in the area. Just below Mill creek structure 10 the waters are Class II trout streams. Mill Creek is considered to be an exceptional water resource (ERW). It is a brown trout fishery but brook trout are becoming more prevalent in some of the tributaries.

Newly constructed concrete riser and sediment removal area.
For additional information about this rehabilitation project contact the USDA Natural Resources Conservation Service, 8030 Excelsior Drive, Suite 200, Madison, Wisconsin, 53717, (608) 662-4422. Information about pilot rehabilitation projects in other states and about other issues related to aging watershed dams is available at the NRCS national web site (www.nrcs.usda.gov). Click on Programs then Watershed Rehabilitation.

**Mill Creek Watershed**

- Size: 39,096 acres or 61 square miles
- Dams: 8

- Project Primary Purpose: to prevent loss of life and damage to property and infrastructure due to flooding.

- History: The dams were built from 1959-1965 and were designed for a 50-year life. Prior to construction of structure 10, major floods washed out bridges, flooded basements and the first floor level of businesses in Boaz, Wisconsin. Flooding in the valley downstream from Boaz in the communities of Bosstown and Sabin was also a frequent occurrence jeopardizing the livelihood of the residents.

**Wisconsin Watershed Program**

Eighty-seven small flood control dams have been built in Wisconsin through the Watershed Protection and Flood Control Act of 1954 (Public Law 83-566). Most of these dams were built from the mid-1950’s through the 1980’s. These dams provide flood control to prime farmland, highways, and communities. They are an integral part of the communities and benefit people’s lives every day.

**National Rehabilitation Needs**

- Since 1948 over 11,000 small flood control dams have been built in 2,000 watersheds in 47 states.

- Many of these earlier constructed dams were designed for a 50-year life expectancy. Over one-half of the dams are over 30 years old.

- Today, many of these older dams need rehabilitation. Concrete and metal used in the principal spillways have deteriorated and in some situations public safety and health are at risk.

- Over the next five years it is anticipated that NRCS will receive 900 sponsor requests requiring 1,500 watershed assessments resulting in 700 watershed plans.

- There are currently 110 watershed rehabilitation projects in the Nation.

A total of 118 watershed rehabilitation projects have been funded in 20 states. Fifty-three are in planning, 31 have been authorized and are in implementation (either in design or construction) and 34 projects have been completed.

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