

The September 2009 issue of the North Dakota Water Magazine included an article that introduced the newly completed Harmon Lake Recreation Area, north of Mandan. At the time of completion, it was expected that it would take several years for the reservoir to fill up with water, and be useable for water recreation. Instead, the reservoir filled in just over one week due to record-high spring runoff.

Morton County Officials were caught off guard by the seemingly overnight filling of the reservoir. They were not expecting to open, or to operate the new recreation area during the summer of 2009. As a result, the recreation facilities had not been developed; rather they were still being planned, with development expected to take place over the next several years.

Over the past five years since the opening of the Harmon Lake Recreation Area, there has been significant development and the area has become a magnet for recreation in the Bismarck/Mandan area.



Harmon Lake Improvements (2009-2014):

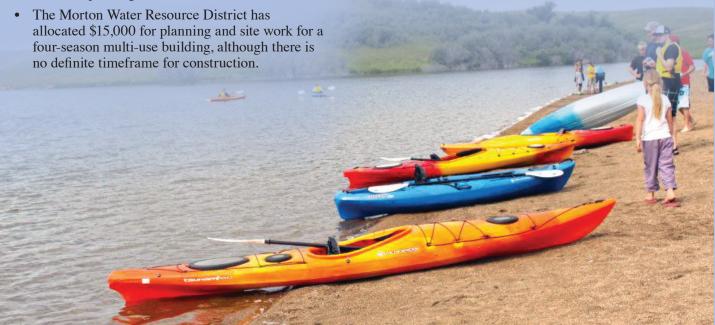
- There have been 23 campsites with electrical and water hookups developed at Harmon Lake, as well as numerous primitive-style camping spots throughout the recreation area, with a RV sewer dump installed in the spring of 2014.
- Three picnic shelters have been built within the recreation area with help from Scheels Sports.
- Fishing piers have teen installed in cooperation with the North Dakota Game and Fish Department, which has routinely stocked fish in the reservoir for the past number of years.
- 9.0 miles of multi-use hiking and mountain biking trails have been constructed surrounding the entire lake.
- Several restroom facilities (vault toilets) have been constructed and more are planned with the expansion of the campground in 2015.
- One playground has been constructed near the beach area, with the possibility of another in the future, depending on demand.

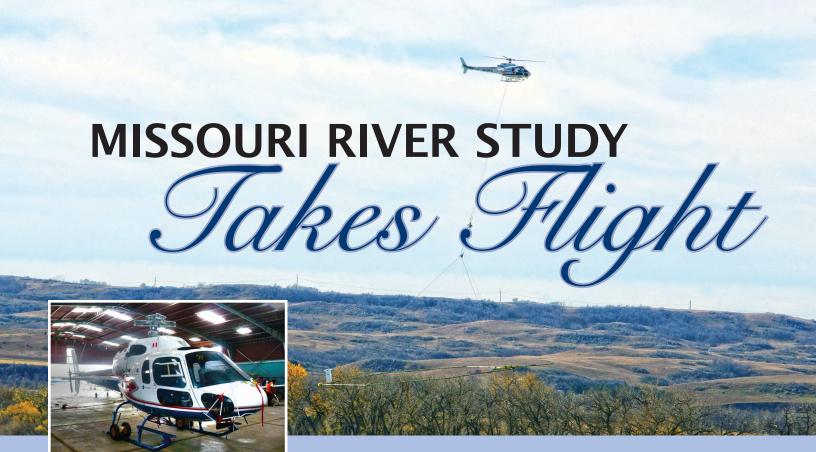
Harmon Lake has become an extremely popular recreation area over the past five years. The trail system has received accolades from both hikers and mountain bikers, and is one of the most utilized facilities within the recreation area. There are plans for a bid to extend the trail on the western side of the recreation area by an additional four miles.

Camping is also a very popular activity. In 2014, Harmon Lake logged over 900 camping uses at their full service campsites, and more than 425 camping uses in the primitive sites. The area uses the same fee schedule at Harmon Lake as they do at other Morton County parks, and it brought in over \$15,000 in revenue from camping fees. The full service campsites were so popular in 2014, that there are plans to add another 20-25 full service campsites in 2015.

Although day use numbers are hard to quantify, it is estimated that there were over 5,000 day use visitors that utilized Harmon Lake in 2014. Day use consists of visitors who come to the recreation area for the day, but do not camp overnight. Common activities amongst day users include kayaking, canoeing, swimming, fishing, picnicking, hiking, and biking. Harmon Lake has also hosted a number of organized competitions. Some include mountain bike races and triathlons.

The Harmon Lake Recreation Area has become a gem for outdoor recreation in the Bismarck/Mandan area. It has been developed nicely and has become very popular. If you have an opportunity for a visit, you will not be disappointed.





The aerial geophysical survey was a key element in the investigation.

In October, the State Water Commission conducted a study to research the feasibility of subsurface water intakes along the Missouri River. These intakes would be evaluated as potential future water sources for a water supply project for eastern North Dakota through a Missouri River Bank filtration intake investigation.

A crucial part of the investigation involved several aerial geophysical surveys. The aerial surveys were performed by a helicopter flying at approximately 100 feet above the ground along the Missouri River, which collected sub surface information. "The helicopter was equipped with a transmitter and receiver that induced a current in the ground and allowed us to gather information to the depth of about 250 feet," noted Bruce Engelhardt, Water Development Director for the State Water Commission. "This data will give us an idea of the porosity of the ground, which is how well the water can flow through the various strata in the ground."

The aerial portion of the Missouri River Bank Filtration Intake Investigation started on October 23, and was completed in approximately five days. The flights took place along the Missouri River between Garrison Dam and the north end of Lake Oahe, which is located south of Bismarck.

"This study is very valuable in that it will help us obtain detailed hydrogeological data to evaluate the feasibility of a water supply project that could potentially serve 40% of the state's population," said Engelhardt.

A second phase of the study involved drilling temporary test wells at locations with the potential to serve as intake structures. The data collected from the test wells will be used to calibrate a computer model developed from the aerial survey. "This model will allow us to have a road map for future intakes along the river. It will tell us what areas have promise and what areas to avoid," noted Engelhardt.

The \$2.5 million project was approved at the State Water Commission's May 29 meeting and is set to be completed by the end of the year.



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