

## **SAN MIGUEL RIVER RANGER REPORT 2011**

River Ranger Program, in its nineteenth season, once again focused on watershed resource and recreation monitoring and environmental education. The river ranger works to monitor and mitigate impacts on variously owned and managed lands in the watershed.

In 2011 funding was provided by USFS, BLM, San Miguel County, Towns of Telluride, Mountain Village, and Ophir, The Nature Conservancy, Telluride Foundation, Southwestern Water Conservation District and private donations.

The river ranger collected surface water samples monthly May through October to follow up previous summers of air quality monitoring. Surface water sampling helps determine how air pollution documented previously is affecting water quality in Waterfall creek.

Monitoring of previously restored sites continue. Some native grasses and spruce trees have survived in revegetation areas. Restriction of motorized access reduces garbage and resource impacts, while areas with motorized access or bordering the highway continue to suffer heavy impacts. BLM facilities in the river corridor consolidate recreation impacts, and provide additional toilets and boat ramps. Use at these areas has increased in the seasons since construction was completed many years ago. River patrols documented commercial and private use patterns, sediment release, water levels, weather patterns, spreading of invasive plants and wildlife sightings.

The river ranger coordinated BLM river rangers and local river guides to remove a river-wide strainer. The river ranger also alerted boaters to river hazards via the local radio station and the email list of the local whitewater group.

The river ranger continued monthly water quality sampling and flow measurements in upper watershed tributaries. Water quality measurements were taken monthly during summer at approximately 30 locations, where tributaries meet the San Miguel River. The database was updated. Information is provided to local government and other interested agencies. Additional monitoring funding from SWCD allowed continuation of the alpine water quality monitoring program. Many watershed tributaries and high alpine lakes were measured near and above timberline. A GPS unit was used to document exact locations of measurements. The photo documentation program was continued, with ongoing emphasis on upstream tributaries, high country mining effects, and in channel river conditions. Photos were used in watershed photo cards.

Recreation use monitoring continued, with a focus on documenting commercial and private river use for BLM, and trail and high country use. River patrols were performed specifically to monitor weekend recreational and commercial use of popular stretches of river. Educational contacts were the emphasis of extensive hiking. Watershed brochure boxes were maintained at many public access recreation sites, and brochures were provided to businesses, outfitters, and visitor information centers throughout the watershed.

The river ranger facilitated interagency cooperation in watershed management. A watershed newsletter was produced in June, serving as the report card update. The newsletter is designed to help keep citizens, government agencies, and private groups informed about current watershed issues. It is distributed throughout the watershed, and beyond to partner agencies. It is mailed to approximately 1000 watershed citizens. It will be posted on the watershed website at [www.sanmiguelwatershed.org](http://www.sanmiguelwatershed.org).

The statewide Riverwatch program, sponsored by CDOW, provides laboratory services to watershed groups and schools. Since 2007, the river ranger has been sampling 4-6 locations on the Howard Fork of the San Miguel to provide more information about mining impacts on water quality, especially pertaining to current tailings cleanup by the USFS. State labs test for metals and nutrients, and data is entered into a statewide database, available to the public at [www.riverwatch@state.co.us](http://www.riverwatch@state.co.us).

The EPA continued their long-term monitoring of water quality in the Howard Fork. The river ranger assisted in this effort.

In summary, progress continues toward better recreation and resource management. The cooperative funding provided for the last nineteen seasons allows the river ranger to work with watershed partners to better manage and protect the San Miguel watershed, preserve its riparian ecosystems, promote responsible recreation, and monitor resource conditions.