



USDA-CSREES 2007 National Water Quality Conference

[The Red River Water Management Consortium](#)

The Red River Water Management Consortium (RRWMC®) program was established in 1996 as a partnership between its members—representing industry, municipalities, and other interested entities—and state and federal governments, to address water supply, flood protection, and water quality issues in the Red River of the North Basin. The Red River of the North Basin drains 49,000 square miles in the northern Great Plains, covering parts of the province of Manitoba, Canada, and the states of Minnesota and North and South Dakota. Extreme fluctuations in the regional climate cycle make both flooding and water shortages common. This, coupled with the complex political makeup of the basin, makes effective water management particularly challenging. Yet water is critical to the sustained development of agricultural, industrial, and municipal activities in the region. The overall goal of the RRWMC is to provide practical stakeholder-driven technical input for the development of a long-term watershed management strategy focusing on water quantity and quality to ensure continued economic development of the area. This presentation discusses several current activities of the RRWMC, including an investigation of alternative water resources to address shortages resulting from continuing population growth and the threat of drought; a study of the transport and fate of phosphorus under different environmental conditions throughout the basin; an assessment of the water quality and quantity impacts of subsurface tile drainage on receiving waters; and an investigation of using rain gardens for the detention of storm water runoff in the extremely flat topographic area.

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