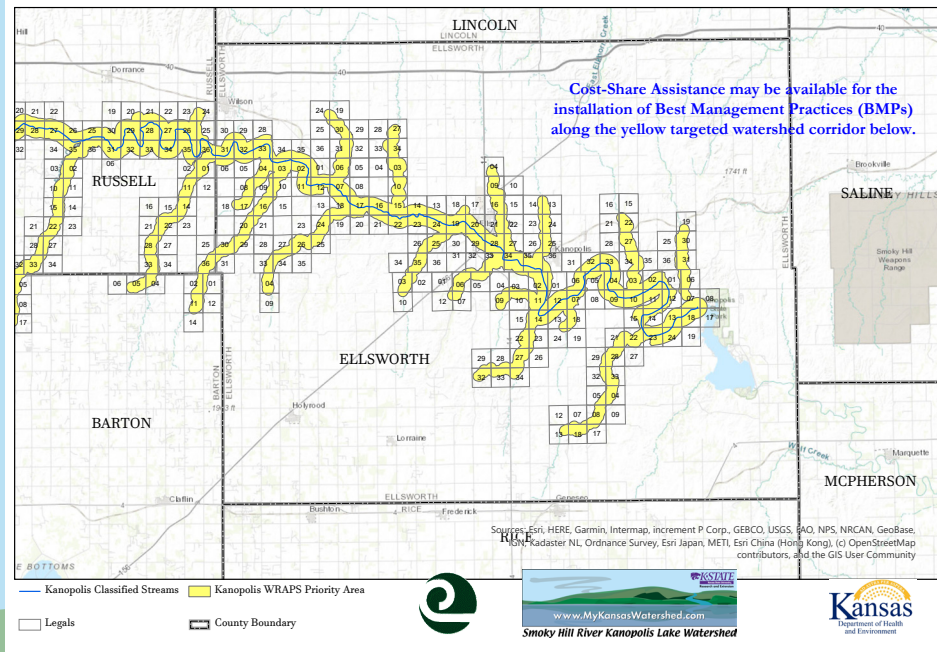
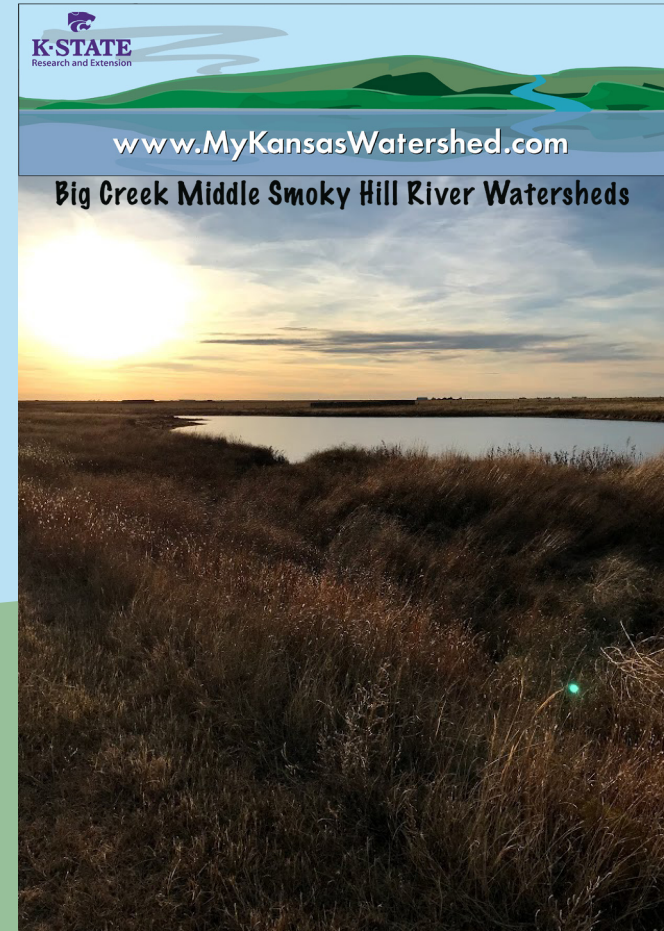


Who are we and what do we do?

Kanopolis WRAPS Ellsworth County



The Big Creek Middle Smoky Hill River Watershed Restoration And Protection Strategies (WRAPS) project began in November 2003 as a process where local agriculture producers, rural residents, along with city, county and state government could identify water quality and quantity concerns. The WRAPS group coordinates these efforts within the 2,400 square miles the watersheds reaching into portions of 10 counties in west-central Kansas which is home to Big Creek, the Smoky Hill River, and Kanopolis Reservoir. We partner with watershed landowners and tenants in water quality protection and improvement by installing BEST MANAGEMENT PRACTICES (BMPs) on their land. We provide cost-share in targeted areas (within 1/2-1 mile of a major tributary, Big Creek, or the Smoky Hill River).



K-STATE
Research and Extension

www.MyKansasWatershed.com

Big Creek Middle Smoky Hill River Watersheds

Watershed Restoration and Protection Strategies: WRAPS



K-STATE
Research and Extension

Kansas
Department of Health and Environment



Kansas State University Agricultural Experiment Station and Cooperative Extension Service
K-State Research and Extension is an equal opportunity provider and employer.

This project has been funded in part through the Section 319 of the Clean Water Act.

✉ sedgett@ksu.edu

☎ 785-769-3297

📘 @KStateKCARE

THE PROBLEM FACING OUR WATERSHED

Non-point sources are the main contributors for eutrophication in the Big Creek Middle Smoky Hill River Watersheds (BCMSHRW). Excess nutrients, total nitrogen (TN) and total phosphorus (TP), originate from rural and urban fertilizer sources, livestock and feedlot manure, wildlife, and failing onsite wastewater systems. *E. coli* bacteria sources in the BCMSHRW are found mainly from non-point sources related to livestock (rural) and pet waste (urban). As a result, there are 303(d) listings and total maximum daily load (TMDL) listings for TN, TP, and *E. coli* bacteria plus total suspended solids (TSS) for Big Creek and the Smoky Hill River and their watersheds.



OUR GOALS

Reduce the levels of nitrogen, phosphorous, and sediment that adversely affect the water quality in the BCMSHRW and in Kanopolis Reservoir with the desire for 303(d) and TMDL delisting on Big Creek and the Smoky Hill River and/or their tributaries.

BIG CREEK MIDDLE SMOKY HILL RIVER WATERSHEDS

A PLAN FOR SUCCESS

Livestock Priority

Targeted livestock BMP implementation such as, but not limited to moving livestock feeding sites away from streams, relocation of winter feeding sites, exclusion fencing, installation of buffers, installation of alternative livestock watering systems (wells, tanks, etc.), and utilizing cover crops for livestock grazing which could include providing a water source, etc.

Soil Health and Intensive Cropping Systems Priority

Provide consistent message for Soil Health to establish living roots in soil and cover in the form of cover crops or residue as many days out of the year as possible. Target soil health and intensive cropping systems BMP implementation such as, but not limited to increased acres to no-till, reduction of idle/fallow days in cropping systems, integrating cover crops, etc.

EDUCATION OUTREACH

engaging stakeholders to benefit our watershed



- Conduct field days highlighting livestock and cropping BMPs installed in the watersheds.
- Hold soil health meetings/workshops/field days to meet producers where they are in better understanding the definition and terminologies across the watersheds on livestock and soil issues to move forward with making meaning changes. Use these opportunities to discover whom they look to for information, how to change their operations and what the stumbling blocks are that prevent change.
- Establish and distribute a quarterly newsletter highlighting BMPs installed in the watersheds, and emerging issues. Continue to partner with County Agents, Conservation District Boards and NRCS Field Offices to discuss possible BMPs and projects to partner on. Continue to work with previously identified landowners/tenants for improvements in their operations for water quality benefits and load reductions.
- Identify and work with small groups with similar interests (soil health, cover crops, tillage systems, grazing cover crops, etc.) to gather ideas and input to make changes in targeted sections of the watersheds.
- Utilize all forms of media (print, newspaper, radio, and social media) to share programs, timely topics, and engage with producers.

