# CHAPTER 4

## POINT AND NONPOINT SOURCE CHARACTERIZATION OF THE BUFFALO RIVER WATERSHED



**4.1. BACKGROUND.** This chapter is organized by HUC-10 subwatershed, and the description of each subwatershed is divided into four parts:

i. General description of the subwatershed
ii. Description of point source contributions
ii.a. Description of facilities discharging to water bodies listed on the 2002 303(d) list
iii. Description of nonpoint source contributions

The Buffalo River Watershed (HUC 06040004) has been delineated into three HUC 10-digit subwatersheds.

Information for this chapter was obtained from databases maintained by the Division of Water Pollution Control or provided in the WCS (Watershed Characterization System) data set. The WCS used was version 2.0 (developed by Tetra Tech, Inc for EPA Region 4) released in 2003.

WCS integrates with ArcView® v3.x and Spatial Analyst® v1.1 to analyze user-delineated (sub)watersheds based on hydrologically connected water bodies. Reports are generated by integrating WCS with Microsoft® Word. Land Use/Land Cover information from 1992 MRLC (Multi-Resolution Land Cover) data are calculated based on the proportion of county-based land use/land cover in user-delineated (sub)watersheds. Nonpoint source data in WCS are based on agricultural census data collected 1992–1998; nonpoint source data were reviewed by Tennessee NRCS staff.

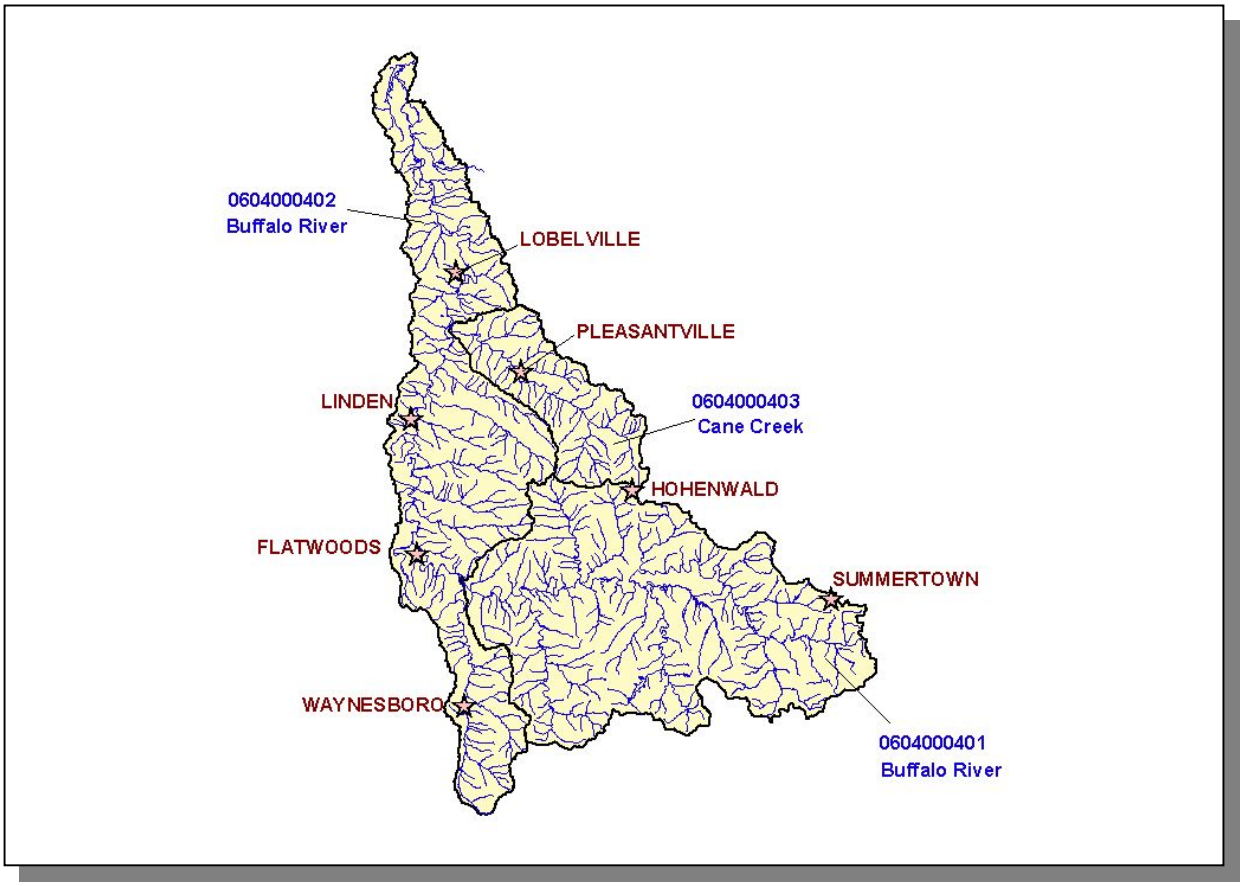


***Figure 4-1. The Buffalo River Watershed is Composed of three USGS-Delineated Subwatersheds (10-Digit Subwatersheds).*** *Locations of Flatwood, Hohenwald, Linden, Lobelville, Pleasantville, Summertown, and Waynesboro are shown for reference.*

**4.2. CHARACTERIZATION OF HUC-10 SUBWATERSHEDS.** The Watershed Characterization System (WCS) software and data sets provided by EPA Region IV were used to characterize each subwatershed in the Buffalo River Watershed.

| HUC-10 | HUC-12 |
|---|---|
| 0604000401 | 060400040101 (Buffalo River) |
| | 060400040102 (Buffalo River) |
| | 060400040103 (Buffalo River) |
| | 060400040104 (Buffalo River) |
| | 060400040105 (Chief Creek) |
| | 060400040106 (Little Buffalo River) |
| | 060400040107 (Buffalo River) |
| | 060400040108 (Fortyeight Creek) |
| | 060400040109 (Buffalo River) |
| | |
| 0604000402 | 060400040201 (Green River) |
| | 060400040202 (Buffalo River) |
| | 060400040203 (Buffalo River) |
| | 060400040204 (Buffalo River) |
| | 060400040205 (Buffalo River) |
| | 060400040206 (Buffalo River) |
| | |
| 0604000403 | 060400040301 (Upper Cane Creek) |
| | 060400040302 (Lower Cane Creek) |

***Table 4-1. HUC-12 Drainage Areas are Nested Within HUC-10 Drainages.*** *NRCS worked with USGS to delineate the HUC-10 and HUC-12 drainage boundaries.*