Bledsoe County is in southwestern East Tennessee. Although the county is part of the Cumberland Plateau, it has three distinct topographic divisions that consist of nearly level rock strata. These include the Cumberland Plateau tableland, Sequatchie Valley, and Walden Ridge, the regional name given to the plateau east of the valley. The plateau tableland represents about two-fifths of the county and includes all of its western side. The remaining three-fifths of the county encompass Sequatchie Valley and Walden Ridge, each roughly equal in area. Pennsylvanian-age sandstones, shales, and conglomerates cap the Cumberland Plateau and Walden Ridge. In Sequatchie Valley, Ordovician-age limestones underlie the floor while Mississippian-age limestones and lesser amounts of dolomites, sandstones, shales, and chert line the valley’s walls. The walls of the valley, known as Cumberland Escarpment, form steep, rugged slopes that rise 700 to 1,300 feet above the floor to the plateau’s rim in a horizontal distance of about one mile.

"Tennessee Topology" by David D. Starnes
TN Div of Geology, Bulletin 86