This map shows the topographic features of Oklahoma using contour lines, or lines of equal elevation above sea level. The highest elevation (4,973 ft) in Oklahoma is on Black Mesa, in the northwest corner of the Panhandle; the lowest elevation (287 ft) is where Little River flows into Arkansas, near the southeast corner of the State. Therefore, the land surface slopes down to the east and south at an average of about 9 ft per mile; the slope ranges from about 15 ft per mile in the Panhandle to about 4 ft per mile in central and eastern Oklahoma. Spot elevations are shown at each map corner, at the highest points of several mountain ranges, and at other key places.

Mountains and streams help define the topography or landscape of Oklahoma. Mountains consist mainly of resistant rocks that were folded, faulted, and thrust upward over geologic time, whereas streams continuously erode less-resistant rocks, lowering the landscape to form hills, broad valleys, and plains. Three principal mountain ranges (Wichita, Arbuckle, and Ouachita) occur in southern Oklahoma, although mountainous and hilly areas exist in other parts of the State. The map on page 8 shows the geomorphic provinces of Oklahoma and describes many of the geographic features mentioned below.

Relief in the Wichita Mountains, mainly in Comanche and Kiowa Counties, ranges from about 400–1,100 ft. The highest elevation in the Wichitas is about 2,475 ft, but the best-known peak is Mt. Scott (2,464 ft). One can easily reach Mt. Scott’s summit by car to observe spectacular views of the Wichitas and their surroundings.

The Arbuckle Mountains are an area of low to moderate hills in Murray, Johnston, and Pontotoc Counties. Relief ranges from 100–600 ft; the highest elevation (about 1,419 ft) is in the West Timbered Hills in western Murray County. Relief in the Arbuckles is low, but it is six times greater than any other topographic feature between Dallas, Texas, and Oklahoma City.

The Ouachita (pronounced “Wa-shi-ta”) Mountains in southeastern Oklahoma and western Arkansas is a curved belt of forested ridges and subparallel valleys. Resistant sandstone, chert, and non-vacuicite form long ridges rising 500–1,500 ft above adjacent valleys that formed in easily eroded shales. The highest elevation is 2,666 ft on Rich Mountain. Major prominent ridges in the Ouachitas are the Winding Stair, Rich, Kiamichi, Blue, Jackfork, and Blackjack Mountains.

Other mountains scattered across the Arkansas River Valley in eastern Oklahoma include the Sans Bois Mountain range and Cavanal, Sugar Loaf, Poteau, Beaver, Hi Early, and Rattlesnake Mountains. These mountains typically are broad features rising 300–1,000 ft above wide, rolling plains. The highest summit is Sugar Loaf Mountain in northeastern Le Flore County with an elevation of 2,568 ft, rising about 2,000 ft above the surrounding plains. The largest mountainous area in the region is the Sans Bois Mountains, in northern Latimer and southern Haskell Counties.

The Ozark uplift in northeastern Oklahoma is a deeply dissected plateau consisting of nearly flat-lying limestones, cherts, and sandstones. The uplift includes parts of the Ozark Plateau, the Brushy Mountains, and the Boston Mountains. Relief typically is 50–400 ft, and the highest elevation (about 1,745 ft) is at Workman Mountain in southeastern Adair County.

The Glass Mountains is an area of “badlands” topography in north-central Major County. Calling them “mountains” is an exaggeration, because they are really prominent mesas, buttes, and escarpments in the Cimarron Gypsum Hills. Local relief ranges from 150–200 ft; the highest elevation is about 1,585 ft.