U.S. GEOLOGICAL SURVEY
CHARLES D. WALCOTT, DIRECTOR

AREAL GEOLOGY

ARKANSAS-MISSOURI
FAYETTEVILLE QUADRANGLE

94°30′ R.33 W. R.32 W. 20′ R.31 W. R.30 W. 10′ R.29 W. 94°00′
36°30′ T.21 N. T.20 N. T.19 N. T.18 N. T.17 N. T.16 N. T.15 N. 36°00′

ARKANSAS MISSOURI BOUNDARY LINE
MC DONALD CO. BENTON CO. BARRY CO.
WASHINGTON CO. BENTON CO.

SULPHUR SPRINGS · DICKSON · SUGAR CREEK · MOUNT VERNON · WALLACE · GRAVETTE · NEBO · OSAGE · BRIGHTWATER · GARLAND · DECATUR · MASON VALLEY · ESCULAPIA · ANDERSON · GENTRY · FLINT · WASHINGTON · BIG SPRING · LOGAN · ELM SPRINGS · SPRINGDALE · BALL · WHEELER · GOSHEN · WEDINGTON · FAYETTEVILLE · MARRS HILL CENTER · RHEAS MILL · PRICE STARR HILL · WHITE RIVER · RICHLAND

Pea Ridge · Pea Ridge Battlefield · Rand Cr. · Sugar Creek · Brightwater · Avoca · Pippin · Butrick · Round Mt. · Elkhorn Tavern · Sulphur Springs · Rocky Comfort · Graham · Holton · Hiwasse · San Fernando Co. · Nebo · Gravette · Race · Pond · Clementine · Seba · Callig · Bentonville · Decatur · Farm · Vaughn · Mason Valley · Osage Mills · Colville · Cross Hollow · Prairie Grove · Lowell · Springtown · Gentry · Big Spring · Hoover · Callahan Mt. · Fitzgerald Mt. · Springdale · Webber Mt. · Hewitt Springs · Sonora · Elm Springs · Blowing Cave · Logan · Gallatin · Robinson · Bloyford · Vaughn Spring · Johnson · Habberton · Wyman · Round Mt. · Baldwin · Harris · McGuire · Robinson · Mt. Comfort · Wheeler · Chambers Spring · Trident · Wedington Gap · Wedington · Roundtop · Farmington · Rickert · Rhea · Vines Grove · Miller Mt. · McCullum Mt. · Baxter Mt. · Elkins Ferry · Lake Sequoyah · Fayetteville · Electric Springs · Rogers · Kessler · Irwin Ferry · Shoe Fork · Cane Hill · Evansville · Huntsville · Eureka Springs · St. Louis · Kansas City · Memphis · Springfield · Ozark · Fayetteville Short Line · Frisco Lines · Missouri Pacific · Kansas City Southern · Missouri & North Arkansas · Wabash · Atlantic & Pacific · Butterfield Overland Mail Route

LEGEND

SEDIMENTARY ROCKS
(Areas of subaqueous deposits are shown by patterns of parallel lines)

Pennsylvanian

Cwl — Winslow formation
(brown sandstone and variegated shale, with fine quartz conglomerate locally near base)

Cmr / Cbr — Morrow formation with Brentwood and Kessler limestone lentils
(gray and yellowish shale and brown sandstone, with beds of carbonaceous shale, thin coal bed, and limestone lentils)

UNCONFORMITY

Mississippian — CARBONIFEROUS

Cp — Pitkin limestone
(light-gray fossiliferous limestone of variable thickness, in places sandy)

Cfv — Fayetteville formation and Wedington sandstone member
(black, carbonaceous, laminated shale often containing calcareous concretions, with dark-blue limestone at base, and heavy brown sandstone near top with thin yellow shale above)

Cbv — Batesville sandstone
(yellowish and gray sandstones, thin-bedded and arenaceous, with local beds of shale and limestone)

UNCONFORMITY

Cbn — Boone formation with St. Joe limestone member
(gray limestone, cherty limestone, and beds of chert, with basal member of even-bedded, gray, noncherty limestone)

(Eureka Springs) — CARBONIFEROUS

De — Chattanooga shale
(black carbonaceous shale, with joint structure and concretions of iron pyrite)

Member of Chattanooga Formation — DEVONIAN

De — Sylamore sandstone
(white to light-brown friable sandstone in massive beds, locally conglomeratic and containing chert, limestone, and phosphatic pebbles)

UNCONFORMITY

Oy — Yellville formation
(light- to dark-gray magnesian limestone and dolomite, even bedded, and locally siliceous or cherty)

ORDOVICIAN

⚒ Coal mines

(Sl. Louis Springs) (Tahlequah)

Jno. H. Renshawe, Geographer in charge.
Triangulation by Geo. T. Hawkins.
Topography by H. B. Blair.
Surveyed in 1899.

Geology by George I. Adams,
assisted by Ernest F. Burchard and A. H. Purdue.
Surveyed in 1900.

APPROXIMATE MEAN DECLINATION 1902.
TRUE NORTH — MAGNETIC NORTH — 8°

Scale 1/125000
1½ 0 1 2 3 4 5 Miles
1½ 0 1 2 3 4 5 Kilometers

Contour interval 50 feet.
Datum is mean sea level.

DIAGRAM OF TOWNSHIP.

6	5	4	3	2	1
7	8	9	10	11	12
18	17	16	15	14	13
19	20	21	22	23	24
30	29	28	27	26	25
31	32	33	34	35	36

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