DIGITAL GEOLOGIC MAP OF THE BOG SPRINGS QUADRANGLE, POLK COUNTY, ARKANSAS AND-Mc CURTAIN COUNTY, OKLAHOMA

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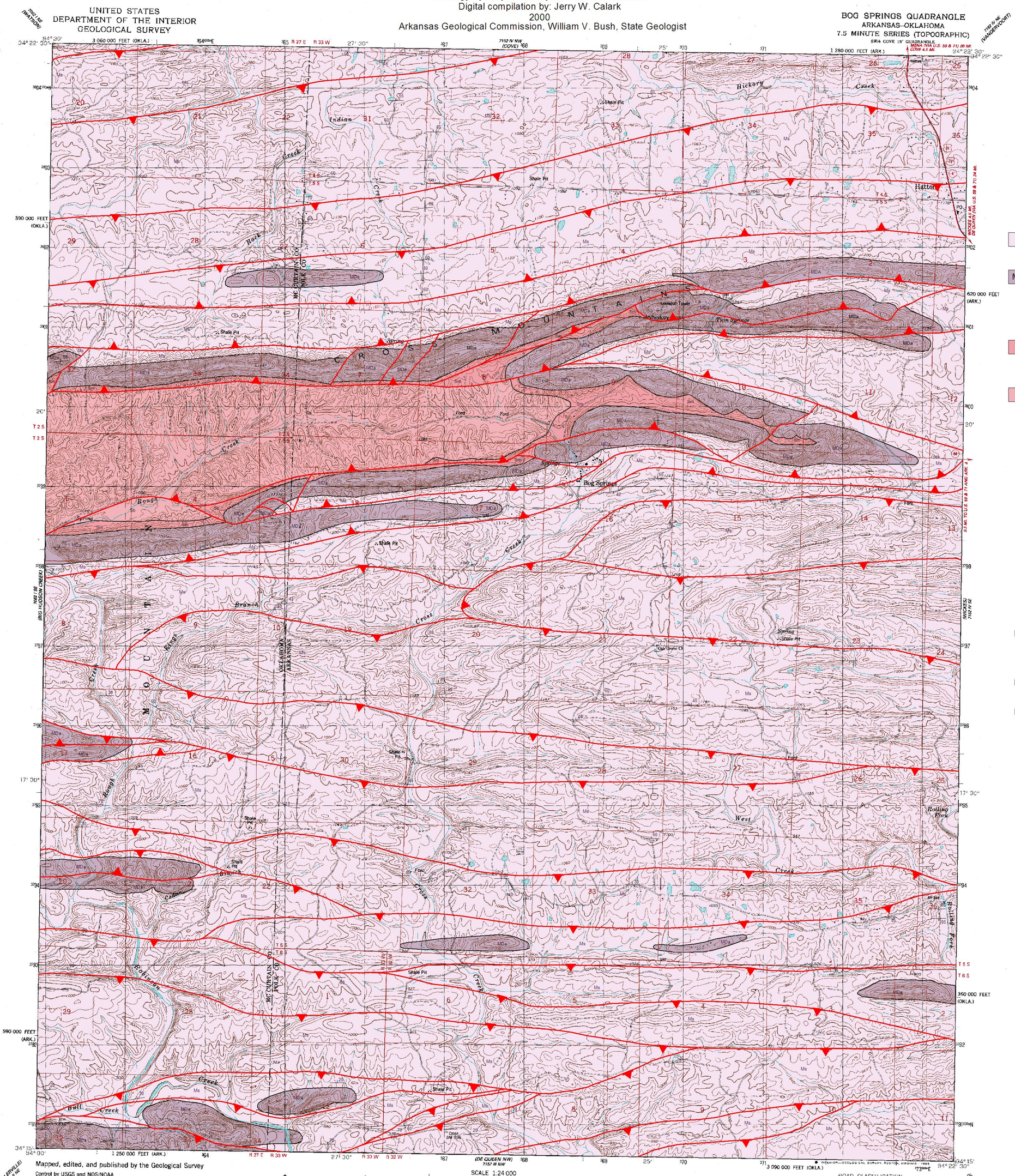
Digital compilation by: Jerry W. Calark
2000
Arkansas Geological Commission, William V. Bush, State Geologist



CORRELATION OF MAP UNITS

Ms, MDa	Mississippian-Devonian	Paleozoic
Sm, Sb	Silurian	Paleozoic

DESCRIPTION OF MAP UNITS

Ms — Stanley Shale (Mississippian)- Stanley is composed of dark-gray shale interbedded with fine-grained sandstone.

MDa — Arkansas Novaculite (Mississippian-Devonian)- Three divisions of the Arkansas Novaculite are recognized. The lower division is white massive-bedded novaculite with some interbedded gray shales near its base.The middle division is greenish to dark-gray shales interbedded with many thin beds of dark novaculite. The upper division is white, thin bedded, often calcareous novaculite.

Sm — Missouri Mountain Shale (Silurian)- Shale interbedded with various amounts of conglomerate, novaculite, and sandstone. The shales are usually gray, green, black, or red but weather to buff, green, yellow, or reddish brown.

Sb — Blaylock Sandstone (Silurian)- Consists of fine-to medium-grained sandstone of tan, dark-gray, or greenish color,interbedded with dark-colored to black fissile shale.

SYMBOLS

- Mine and/or Pit
- 45 — Strike and Dip
- Faults
- Contacts

REFERENCES

Haley, B. R., & Stone, C. G., 1994 Geologic Map of the Bog Spings Quadrangle, Polk County Arkansas and Mc CurtainCounty Oklahoma; AGC Open File Report
Scale: 1:24000

Miser, H. D., and Purdue, A. H., 1929, Geology of the DeQueen and Caddo Gap Quadrangle, Arkansas:United States Geological Survey Bulletin 808, 195 p.

Honess, C. H., 1923, Geology of the Southern Ouachita Mountains of Oklahoma, Oklahoma Geological Survey, Bulletin 32. 278p.

Mapped, edited, and published by the Geological Survey

Control by USGS and NOS/NOAA

Topography by photogrammetric methods from aerial photographs taken 1982. Field checked 1984. Map edited 1985

Projection: Arkansas coordinate system, south zone (Lambert conformal conic)
10,000-foot grid ticks based on Arkansas coordinate system, south zone and Oklahoma coordinate system, south zone
1000-meter Universal Transverse Mercator grid, zone 15
1927 North American Datum
To place on the projected North American Datum 1983, move the projection lines 7 meters south and 19 meters east as shown by dashed corner ticks

Fine red dashed lines indicate selected fence and field lines where generally visible on aerial photographs. This information is unchecked

UTM GRID AND 1985 MAGNETIC NORTH DECLINATION AT CENTER OF SHEET

SCALE 1:24 000

CONTOUR INTERVAL 20 FEET
NATIONAL GEODETIC VERTICAL DATUM OF 1929

THIS MAP COMPLIES WITH NATIONAL MAP ACCURACY STANDARDS
FOR SALE BY U.S. GEOLOGICAL SURVEY, DENVER, COLORADO 80225, OR RESTON, VIRGINIA 22092
AND ARKANSAS GEOLOGICAL COMMISSION, LITTLE ROCK, ARKANSAS 72204
A FOLDER DESCRIBING TOPOGRAPHIC MAPS AND SYMBOLS IS AVAILABLE ON REQUEST

ARKANSAS
QUADRANGLE LOCATION

Funded by the Arkansas Geological Commission in cooperation with the U.S. Geological Survey under the COGEOMAP Program.

ROAD CLASSIFICATION

Primary highway, hard surface — Light-duty road, hard or improved surface
Secondary highway, hard surface — Unimproved road
Interstate Route · U. S. Route · State Route

BOG SPRINGS, ARK.–OKLA.
SW/4 COVE 15' QUADRANGLE
34094-C4-TF-024
1985
DMA 7152 IV SW–SERIES V884