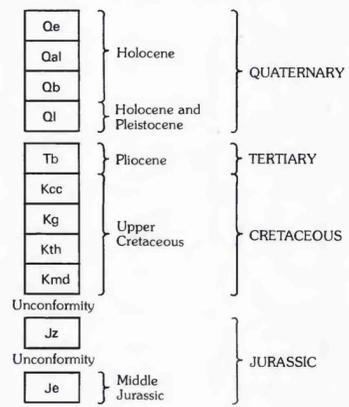


EXPLANATION OF MINERAL RESOURCE POTENTIAL AND KNOWN MINERAL OCCURRENCES

Area having known coal occurrences—Thin beds of impure subbituminous coal in the Crevasse Canyon Formation, not classified as a resource

L/C Geologic terrane having low resource potential for metals, oil and gas, coal, and geothermal energy, at certainty level C—Applies to all parts of all four study areas

CORRELATION OF MAP UNITS



DESCRIPTION OF MAP UNITS

- Oe **Eolian deposits (Holocene)**—Recent accumulations of windblown silt and sand
- Qal **Alluvium (Holocene)**—Stream deposits composed largely of silt and fine sand, includes some eolian and colluvial deposits
- Ob **Basalt flows (Holocene)**—Olivine basalt; mostly McCarty flow, but includes some inliers of older flows. McCarty flow is not accurately dated but is 400–1,000 years old
- Ql **Landslide deposits (Holocene and Pleistocene)**—Composed mostly of Toreva blocks of Tertiary basalt and Cretaceous sandstone and shale that have slid over soft shale units; includes some rock and mudflow slides and talus
- Tb **Basalt flows on Cebollita Mesa (Pliocene)**—Olivine basalt flows and associated scoria that cap mesas, generally 65–100 ft thick
- Kcc **Crevasse Canyon Formation and related rocks (Upper Cretaceous)**—Nonmarine sandstone, siltstone, carbonaceous shale, and thin coal beds. Map unit may include parts of Point Lookout Sandstone and Menefee Formation in southernmost part of map area. Crevasse Canyon Formation includes the Gibson Coal Member, Dalton Sandstone Member, Borrego Pass Lentil, and Dilco Coal Member. Mulatto Tongue of Mancos Shale also included in the map unit
- Kg **Gallup Sandstone (Upper Cretaceous)**—Composed of upper sandstone member, middle silty shale, and lower silty sandstone
- Kth **Tres Hermanos Sandstone (Upper Cretaceous)**—Composed of an upper sandstone unit, a variable middle unit of siltstone, sandstone and carbonaceous shale, and a lower sandstone unit. D-Cross Tongue of Mancos Shale also included at top of map unit
- Kmd **Mancos Shale and Dakota Sandstone (Upper Cretaceous)**—Alternating tongues of sandstone and shale, from the top down: Rio Salado Tongue of Mancos Shale, Twowells Tongue of Dakota Sandstone, Whitewater Arroyo Tongue of Mancos Shale, Paguate Tongue of Dakota Sandstone, Clay Mesa Tongue of Mancos Shale, Oak Canyon Member of Dakota Sandstone, and a basal conglomerate unit of the Dakota Sandstone
- Jz **Zuni Sandstone (Jurassic)**—Yellowish-gray and tan eolian sandstone, forms vertical cliffs and arches; includes at base lateral equivalents of fluvialite Wanakah Formation
- Je **Entrada Sandstone (Middle Jurassic)**—Exposed only at north end of The Narrows; reddish-orange eolian silty sandstone

- Contact
- Fault—Bar and ball on downthrown side, dotted where concealed, dashed where inferred
- Volcanic vent area
- Approximate boundary of study areas
- Oil and gas leases

LEVEL OF RESOURCE POTENTIAL ↑	U/A	H/B	H/C	H/D
	UNKNOWN	HIGH POTENTIAL	HIGH POTENTIAL	HIGH POTENTIAL
		M/B	M/C	M/D
	POTENTIAL	L/B	L/C	L/D
	LOW POTENTIAL	LOW POTENTIAL	N/D	
	A	B	C	D
	LEVEL OF CERTAINTY →			

LEVELS OF RESOURCE POTENTIAL

H High mineral resource potential
M Moderate mineral resource potential
L Low mineral resource potential
U Unknown mineral resource potential
N No known mineral resource potential

LEVELS OF CERTAINTY

A Available data not adequate
B Data indicate geologic environment and suggest level of resource potential
C Data indicate geologic environment, give good indication of level of resource potential, but do not establish activity of resource-forming processes
D Data clearly define geologic environment and level of resource potential and indicate activity of resource-forming processes in ell or part of the area

Diagram showing relationships between levels of mineral resource potential and levels of certainty. Shading shows levels that apply to this study area

MINERAL RESOURCE POTENTIAL, KNOWN COAL OCCURRENCES, GEOLOGY, AND OIL AND GAS LEASES IN THE RIMROCK, SAND CANYON, LITTLE RIMROCK, AND PINYON WILDERNESS STUDY AREAS, CIBOLA COUNTY, NEW MEXICO