



EXPLANATION

ROCK UNITS

Quaternary	Quaternary alluvium Qa, Qp Qa stream deposits consisting of unconsolidated fragments of granite, schist, gneiss, and volcanic rocks. Low to high permeability; generally dry except in canyon in mountainous areas, where the deposits yield small quantities of water to wells. Qp, piñon deposits consisting of unconsolidated silt and clay; wet to green only at Red Lake. Relatively impermeable; unit does not yield water to wells.
Tertiary and Quaternary	Intermediate alluvium Qt Qt, moderately consolidated fragments of granite, schist, gneiss, and volcanic rocks. Locally contains water in fractures and in the interbedded agglomerate and gravel; generally show water table except in piedmont areas, where unit yields moderate quantities of water to wells. Locally may include older and younger alluvium.
Tertiary	Older alluvium Ts Ts, moderately consolidated fragments of granite, schist, gneiss, and volcanic rocks. Occurs as dissected alluvial fans and valley-fill deposits of fluvial and lacustrine (?) origin. Low to high permeability; generally show water table except in piedmont areas, where unit yields moderate quantities of water to wells. Locally may include older and younger alluvium.
Quaternary, Tertiary, and Quaternary	Younger volcanic rocks Tv Tv, basalt flows, basaltic andesite flows and tuff, and rhyolite tuff and agglomerate. Locally contains water in fractures and in the interbedded agglomerate and gravel; the rocks yield moderate quantities of water to wells at Kingman.
Quaternary, Tertiary, and Quaternary	Older volcanic rocks Tkv Tkv, andesite and latite flows and tuff; include Gold Road Lignite in the Black Mountains. May contain water in fractures and tuff beds; not known to yield water to wells.
Cambrian and Devonian	Sedimentary rocks Dcu Dcu, Devonian limestone and Toiyote Group, which, in descending order, include the Moen Limestone, Shinarump Sandstone, and Toiyote Sandstone. The rocks are not known to yield significant amounts of water in the mapped area.
Precambrian	Igneous and metamorphic rocks pcr pcr, granite, gneiss, and schist; include some rocks of late Mesozoic to early Cenozoic age. Locally contains water in fractured and overthrust zones; yield small quantities of water to wells.

CONTACT
Dashed where approximately located.

FAULT
Dashed where approximately located.
U, upthrown side; D, downthrown side.

STRIKE AND DIP OF BEDS
Approximate water-table contour
Shows altitude of water table in spring 1967
Contour interval 100 feet

DRAINAGE DIVIDE
Arrow indicates direction of ground-water flow

WELL
Upper number shows well number; second number shows total dissolved solids, in milligrams per liter; third number shows fluoride, in milligrams per liter; fourth number shows hardness as CaCO₃, in milligrams per liter; lower number shows depth of well, in feet below land surface; dash indicates well depth unknown; single-digit number indicates number of wells at same location.

Observation well with continuous water-level recorder, operated by the U.S. Geological Survey.

Spring

Stream-gaging stations
Operated by the U.S. Geological Survey.
Figure in page number gives in table 1.

Continuous-recording station

Flood-hydragraph recorder

Crest-stage gage

Subsidence-outflow computation site

Line of seismic profile shown on plate 2

GEOHYDROLOGIC MAP OF THE HUALAPAI AND SACRAMENTO VALLEYS, MOHAVE COUNTY, ARIZONA