





Figure 3. LANDSAT mosaic showing cross-section lines, Death Valley region, Nevada and California.

EXPLANATION

Lines of section featured on sheet 2 Lines of section featured on sheet 3 ————— State boundary — — — - Von Schmidt line (historical line) ————— County boundary •••••• Nevada Test Site boundary

— (95) — State highway

Area depicted on the five index maps (figs. 3-7)

	EXPLANATION
	Line of section
	State boundary
	Von Schmidt line (historical line)
	County boundary
	Nevada Test Site boundary
	Interstate highway
	State highway
Comb RGB space	ining LANDSAT 6 spectral bands 2, 5, and 7 in e created this false-color composite image.

dynamic range. The image was further processed in huesaturation space to emphasize specific geologic features. On the image, bedrock exposures of Paleozoic carbonate rocks appear in shades of blue and green; Proterozoic clastic rocks appear in red-brown tones. Bedrock exposures of rhyolitic volcanic rocks in the vicinity of the Nevada Test Site appear in shades of tan and orange. The colors of the basin-filling alluvial fans often reflect the lithology of their source areas. Playa and basinaxis deposits appear in white or light-pink tones; the salt pan in Death Valley appears in bright blue. The area is in general sparsely vegetated. Irrigated domestic and agricultural land appears as bright green, such as the area around Las Vegas and near Pahrump, Nevada.



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U.S. DEPARTMENT OF ENERGY

NATIONAL NUCLEAR SECURITY ADMINISTRATION



SCALE 1:750,000 10 0 10 20 30 40 50 MILES 10 0 10 20 30 40 50 KILOMETERS

Figure 5. Geologic map showing cross-section lines, Death Valley region, Nevada and California.

INTERPRETIVE GEOLOGIC CROSS SECTIONS FOR THE DEATH VALLEY REGIONAL FLOW SYSTEM AND SURROUNDING AREAS, NEVADA AND CALIFORNIA

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EXPLANATION	
	Place names in the Nevada Test Site area
BW	Beatty Wash
CF	Crater Flat
EV FF	Frenchman Flat
FMW	Fortymile Wash
HR	Haltpint Kange Jackass Flats
KV	Kawich Valley
MD	Mid Valley
MV PM	Mercury Valley Pahute Mesa
RM	Rainier Mesa
RV	Rock Valley Specter Bange
YF	Yucca Flat
1	Spotted Panga
2	Ranger Mountains
3	CP Hills Mine Mountain
4 5	Syncline Ridge
6	Eleana Range
7	Gold Meadows Timber Mountain
9	Yucca Mountain
10	Shoshone Mountain
11	Striped Hills
13	Bare Mountain
14 15	Oasis Valley Bullfrog Hills
	Place names in the Spring Mountains, Pahrump Valley, and Amargosa Desert
AD	Amargosa Desert
KR MM	Kingston Range Montgomery Mountains
NR	Nopah Range
RSR	Resting Spring Range
16	Skeleton Hills
17 18	Fairbanks Hills Ash Meadows
19	Point of Rocks
20 21	Eagle Mountain Stewart Valley
21	Stewart valley
AV	Place names in the Death Valley area Avawatz Mountains
BM	Black Mountains
CM ECW/	Cottonwood Mountains
GM	Gold Mountain
GR	Greenwater Range
GVM	Grapevine Mountains
LCR	Last Chance Range
PV SF	Panamint Valley Sarcobatus Flat
SR	Slate Ridge
22	Brown Peak
23	Dublin Hills
24 25	Gold Valley Jubilee Pass
26	Tucki Mountain
27 28	Grapevine Springs Grapevine Canvon
29	Bonnie Claire Flat
	Place names east of the Nevada Test Site area
DR	Desert Range
ISV	Desert Valley Indian Springs Valley
PR	Pahranagat Range
PWR PHV	Pintwater Range Pahranagat Valley
TV	Tikaboo Valley
30	Papoose Range
31	Chert Ridge
32	Buried Hills
	Line of section
	State boundary
	Von Schmidt line (historical line)
	County boundary
	Nevada Test Site boundary
	Interstate highway
	State highway
KB	Abbreviated place name
31	Location of numbered place name
	-

117°45'

SMFRAI DA

37°45'

37°00'

DESCRIPTION OF MAP UNITS

- Playa deposits of Quaternary age—Lake-bed deposits of silt and clay Valley fill of Quaternary-Tertiary age—Alluvial (stream channel and fan gravels), colluvial, ash-fall, and lake deposits Volcanic rocks of Quaternary-Tertiary age-Rhyolitic, andesitic, and basaltic lava flow Volcanic rocks of Tertiary age—Predominantly rhyolitic ash-flow tuffs Volcanic and volcaniclastic rocks of Tertiary age—Tuffs and tuffaceous clastic rocks Granitic rocks of Tertiary–Late Jurassic age Sedimentary and metavolcanic rocks of Mesozoic age-Predominantly sandstones in southeastern part of map area, metavolcanic rocks in southwestern part of map Carbonate rocks of Paleozoic age—Limestones, dolomites, and calcareous shales Clastic rocks of Paleozoic-Late Proterozoic age-Conglomerates, argillites, and quartzite Igneous and metamorphic rocks of Proterozoic age stalline rocks (gneisses, schists, and migmatites) EXPLANATION OF SYMBOLS
- ----- Contact Line of section ————— State boundary
- --- Von Schmidt line (historical line) ————— County boundary •••••• Nevada Test Site boundary
- <u>15</u> Interstate highway





1:250,000-scale Digital Elevation Model; sun

illumination from northwest at 30° above horizon

Hydrogeology after Faunt and others (1997)





Figure 7. Index map of geologic structures and cross-section lines, Death Valley region, Nevada and California.

10 0 10 20 30 40 50 KILOMETERS

ground-water basin, Nevada and California (work in progress)



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