

PLACITAS WATER SUPPLY

SUBMITTED BY AGW CONSULTANTS

The area generally known as Placitas, New Mexico extends from I-25 to the actual Village of Placitas about seven miles to the east. The Placitas area is broken into several distinct water-bearing areas. The part of Placitas near I-25 and extending about four miles to the east obtains its water from the Santa Fe Group aquifer. Further east, beginning slightly west of the fire station, ground water is obtained from much older and less porous rock of Cretaceous age. This rock is cemented sandstone and highly fissile arenaceous shale. Closer to Placitas and in the Village itself, ground water drains from springs along the San Francisco-Suela fault zone. The water originates in the Madera Limestone.

Ground water within the Santa Fe Group is extremely abundant and flows easily to wells. Because the volume of the aquifer is very large there is abundant water stored in it. Subdivisions sited on the Santa Fe Group aquifer and that obtain their water from it will have adequate water.

A 72-hour aquifer performance test (APT) was conducted by AGW Consultants (AGW) using the Anasazi Trails Subdivision Well RG-77562. At a water use of 0.3826 acre feet of diversion per residence per year and no return flow the total water requirement for both subdivisions will be 90.29 acre feet per year. This equates to a continuous pumping rate of 55.97 gpm. The supply wells must be able to sustain this pumping rate for 100 years. This report examined 100-year water availability.

Well RG-77562 was tested at a long-term average pumping rate of 86.08 gpm during the APT. The final pumping rate was 81.68 gpm. The well was tested at a pumping rate of about 1.5 times the pumping rate actually needed for the supply of water to both subdivisions.

The results of the ATP indicate an undamaged aquifer transmissivity of about 262,222 gpd/ft.

The maximum drawdown in the Santa Fe Group Aquifer in Well RG-77562 at the end of 100 years of continuously pumping 55.97 gpm will be about 0.58 feet. The drawdown is *de minimis*.¹

See attached mapping.²




For a full copy of the AGW report, please email us at inquiry@lapuertallc.com.

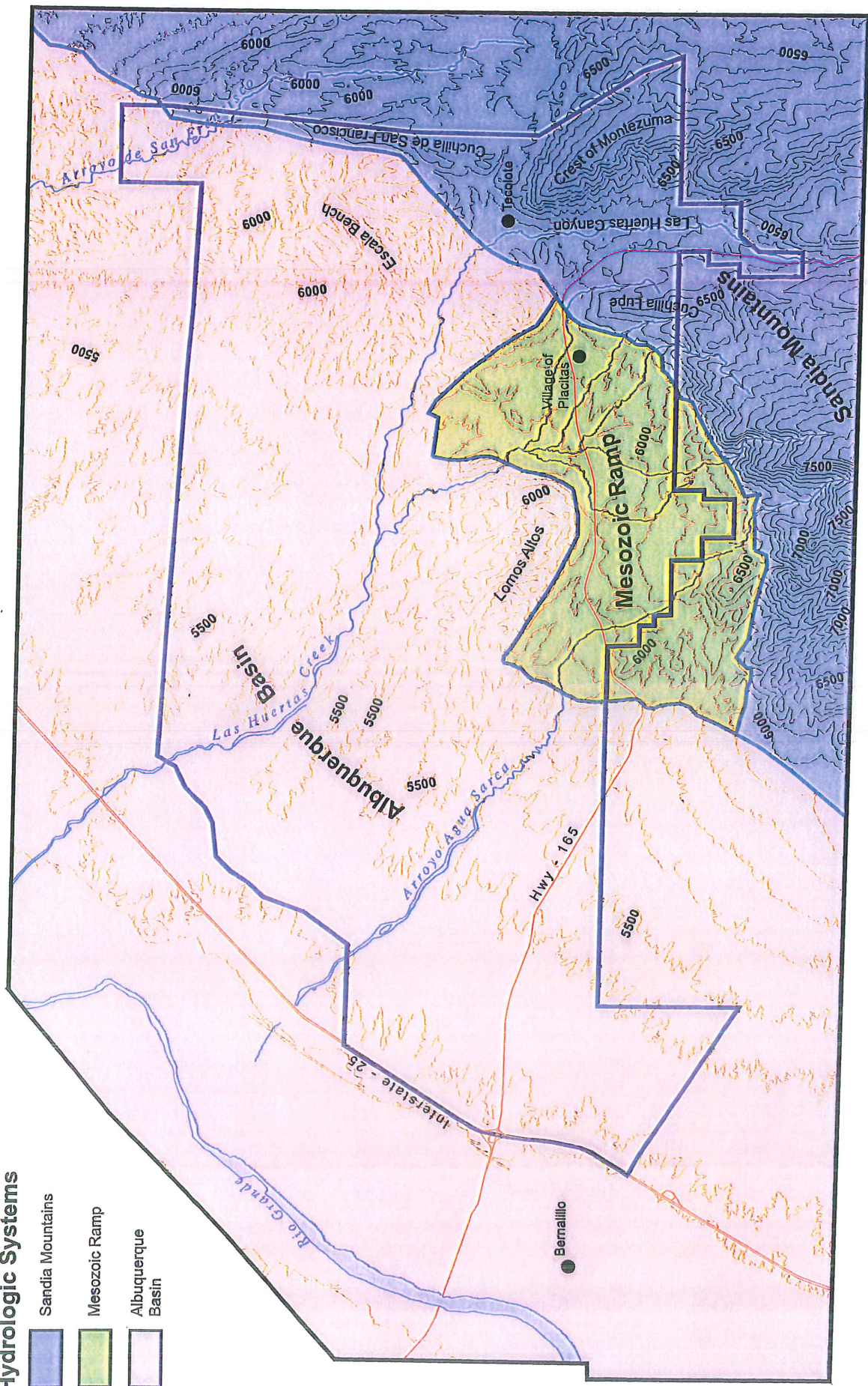
Hydrology and Water Resources of Placitas Area by Peggy Johnson and Andrew Campbell may be viewed at geoinfo.nmt.edu.

¹ Water Supply Study submitted by AGW Consultants March 26th, 2004

² Hydrology and Water Resources of Placitas Area by Peggy Johnson and Andrew Campbell August 2002

Hydrologic Systems

-  Sandia Mountains
-  Mesozoic Ramp
-  Albuquerque Basin



Contour interval 100 feet
1:70,000



Figure 7. Hydrologic systems in the Placitas area.

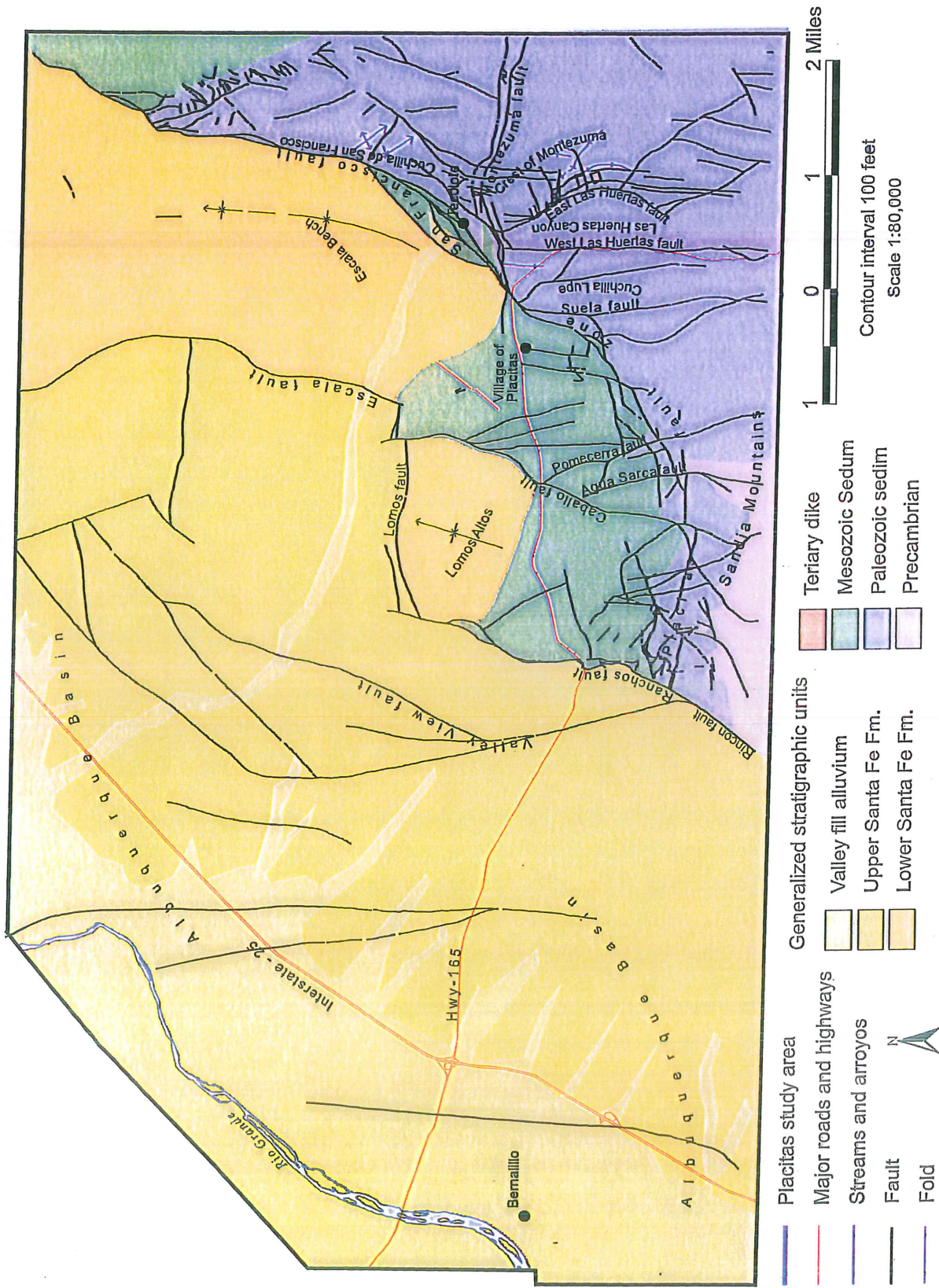


Figure 4. Generalized geologic map of the Placitas area (modified from Connell et al. (1995) and Connell (1998)).