

GROUNDWATER CONDITIONS

HYDROGRAPH APPENDIX A

This appendix includes groundwater level information that was compiled as part of addressing the requirements of the Sustainable Groundwater Management Act (SGMA). The data shown in the following appendix was compiled from several sources.

For the WMA there are five sources of groundwater level data, as follows.

TABLE 1-1.

Type	Summary	Description
Monthly	City of Lompoc	Static water level reads from the City of Lompoc.
Monthly	United States Bureau of Reclamation (USBR)	Groundwater elevation data reported in the USBR Cachuma project monthly reports. The vertical datum of the data was converted from NGVD29 to NAVD88, and includes source NGVD29 data. ¹
Monthly	Vandenberg Village Community Services District (CSD)	Static water level reads from Vandenberg Village CSD.
Semiannual	United States Geological Survey (USGS) National Water Information System (NWIS)	Groundwater level data available from the USGS NWIS. Includes historical data.
Semiannual	County of Santa Barbara	Groundwater level data collected by the County of Santa Barbara.

These data sets were compiled into a database for analysis. Each well with water level data was associated with a particular aquifer using a combination of the geologic units in the perforation intervals zone and the response of water levels at particular wells.

LIST OF ACRONYMS AND ABBREVIATIONS

BGS	below ground surface
DBID	database identification number
CSD	Community Service District
CMA	Central Management Area
FT	feet
MSL	mean sea level

¹ 23 CCR § 352.4 requires that groundwater elevations be reported in North American Vertical Datum of 1988 (NAVD88).

DRAFT

November 2020



USBR	United States Bureau of Reclamation
USGS	United States Geologic Survey
WL	Water Level
WMA	Western Management Area
VVCSD	Vandenberg Village Community Services District

WELL NUMBERING DESCRIPTION

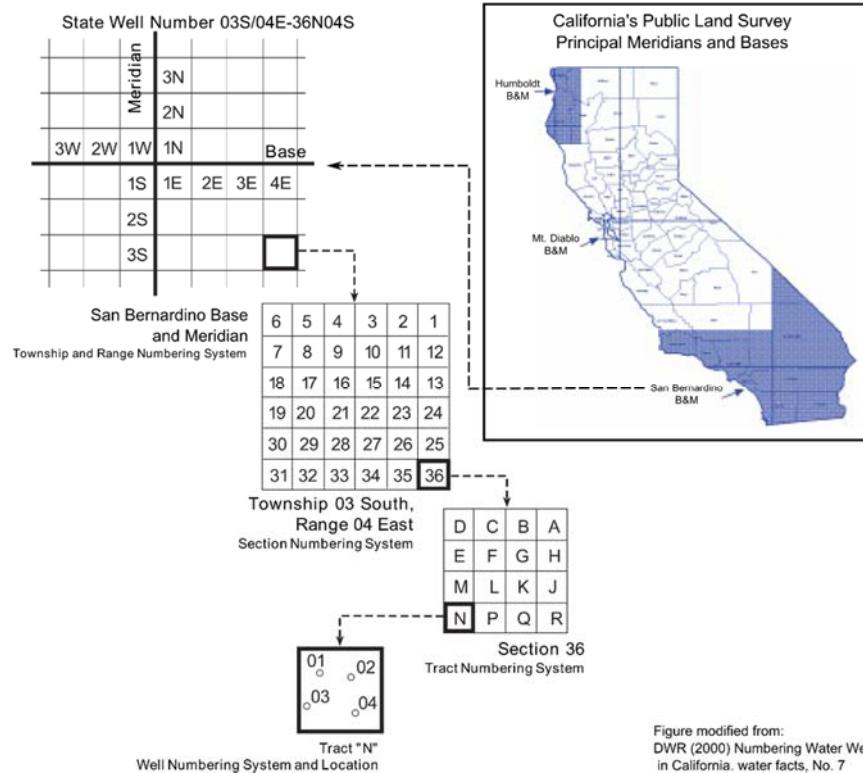
Wells in Santa Ynez River Valley Groundwater Basin have a unique State Well Number assigned by the California Department of Water Resources based on the public land grid, and includes the township, range, and section in which the well is located. Each section is further subdivided into sixteen 40-acre tracts, which are assigned a letter designation as shown in Figure 1 below. All wells in Santa Ynez use the San Bernardino ("S") base line and meridian, so this letter is generally omitted. Lands not part of the Bureau of Land Management Cadastral survey, such as Mexican Land grants land map are interpolated from other sources.

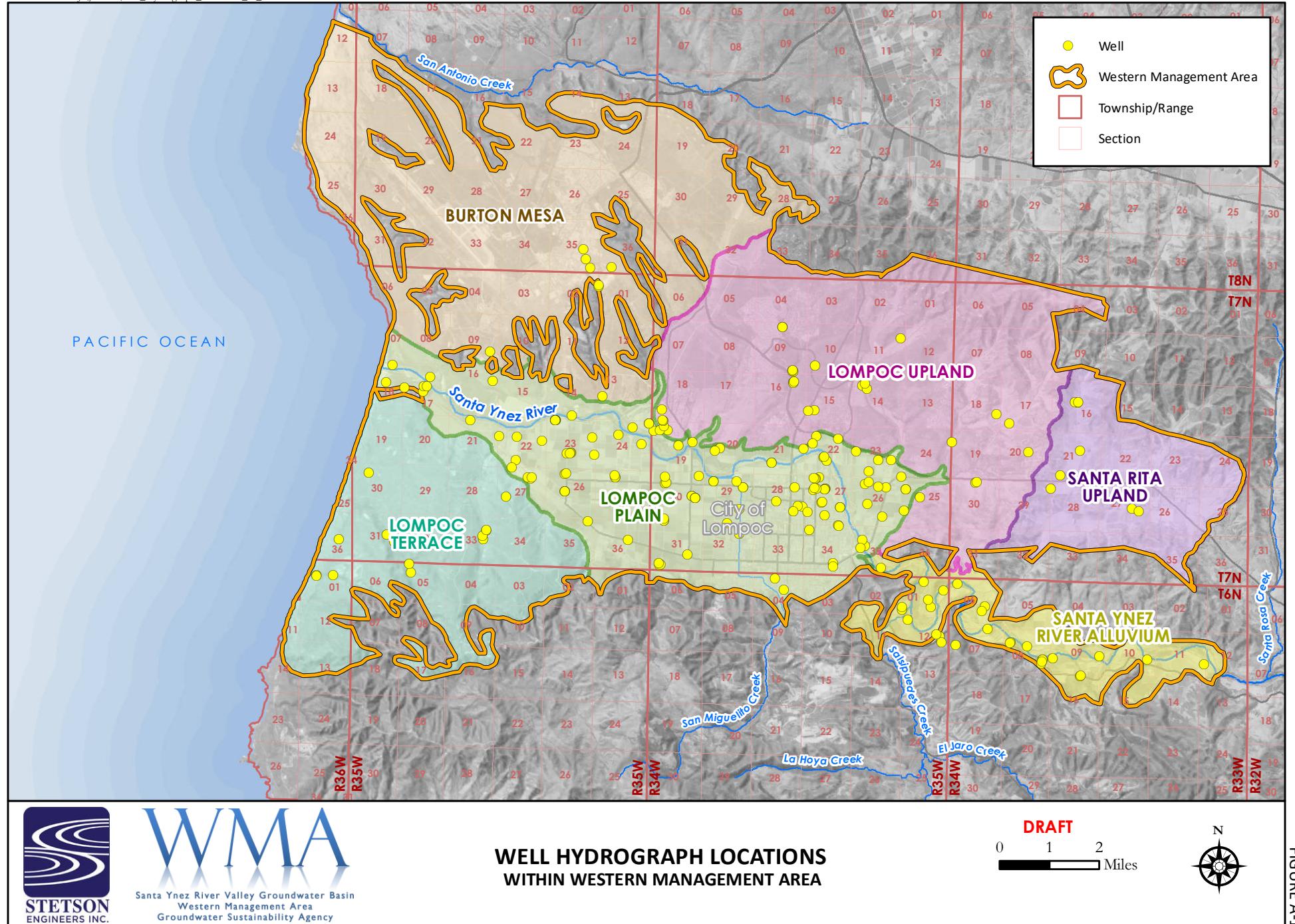
In maps and in texts, Stetson refers to monitoring wells by their section, tract, and well number, following the USGS convention for abbreviation. If the township and range are otherwise made obvious, the well may be shortened further to section, track, and well numbers. Occasional exceptions to this naming scheme are made for wells drilled for other purposes.

The USGS 15-digit well number based on degrees, minutes, and seconds of latitude (6 digits) and longitude (7 digits) and sequential number (2 digits) are also shown on wells that are part of the USGS databases.

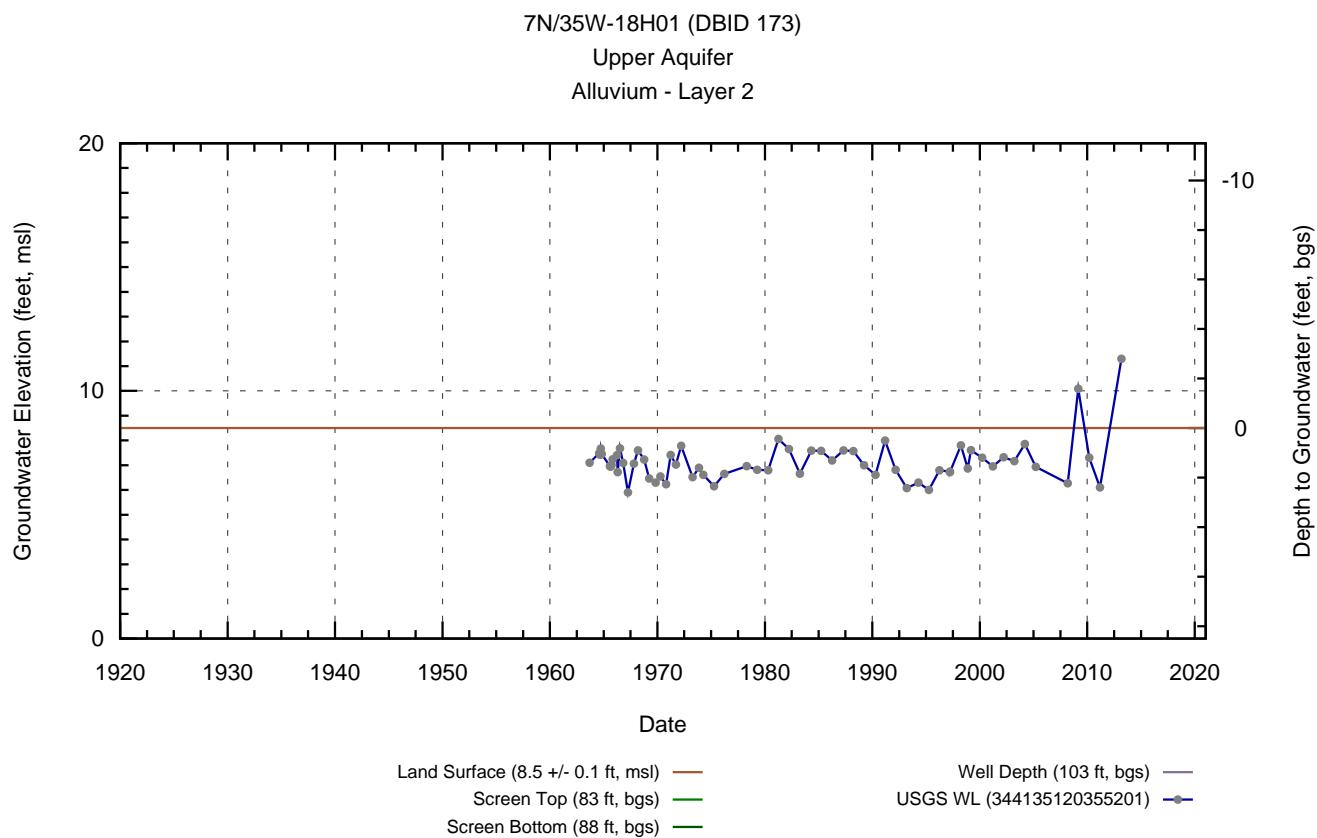
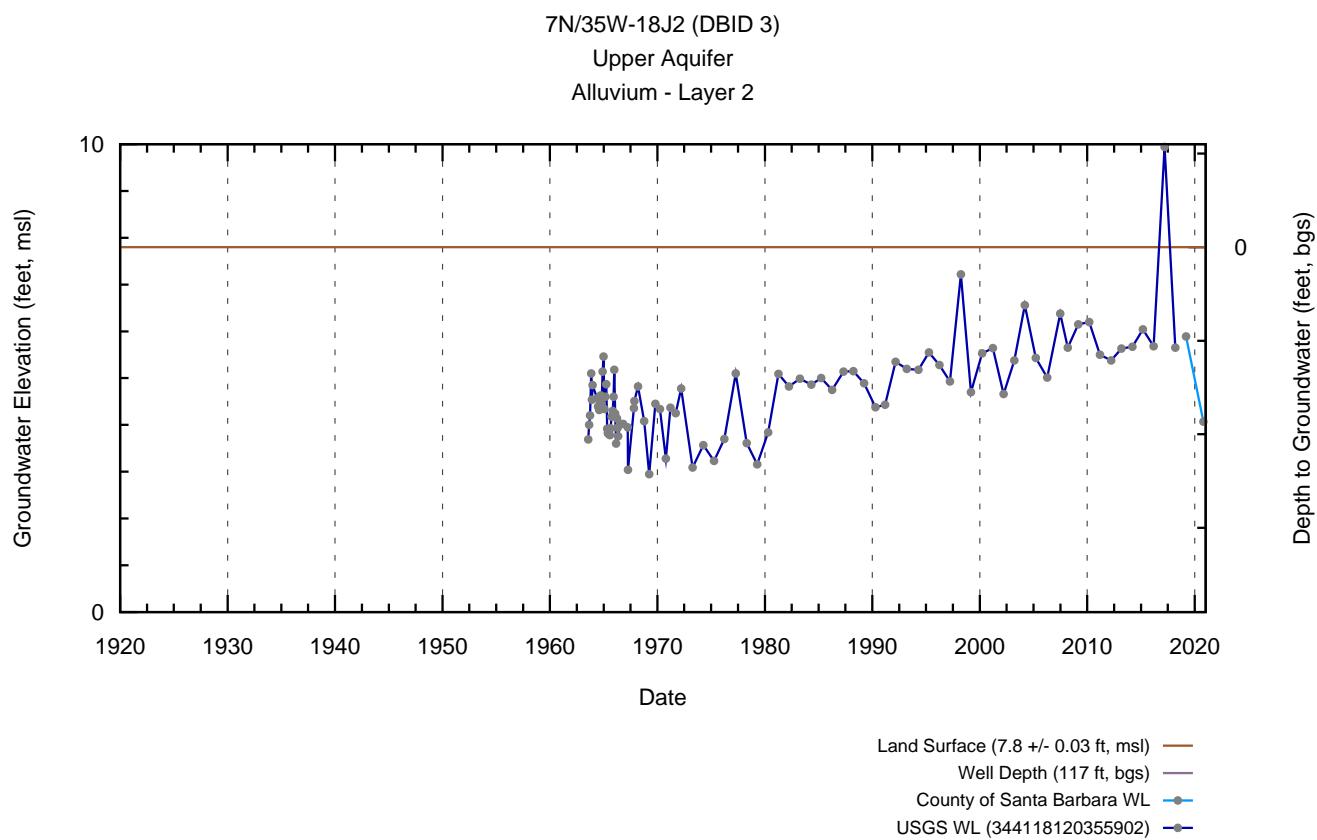
Finally, a 4-digit unique database identification number (DBID) is used in the database management system to connect well information from various sources.

CALIFORNIA DEPARTMENT OF WATER RESOURCES' NUMBERING SYSTEM FOR WATER WELLS

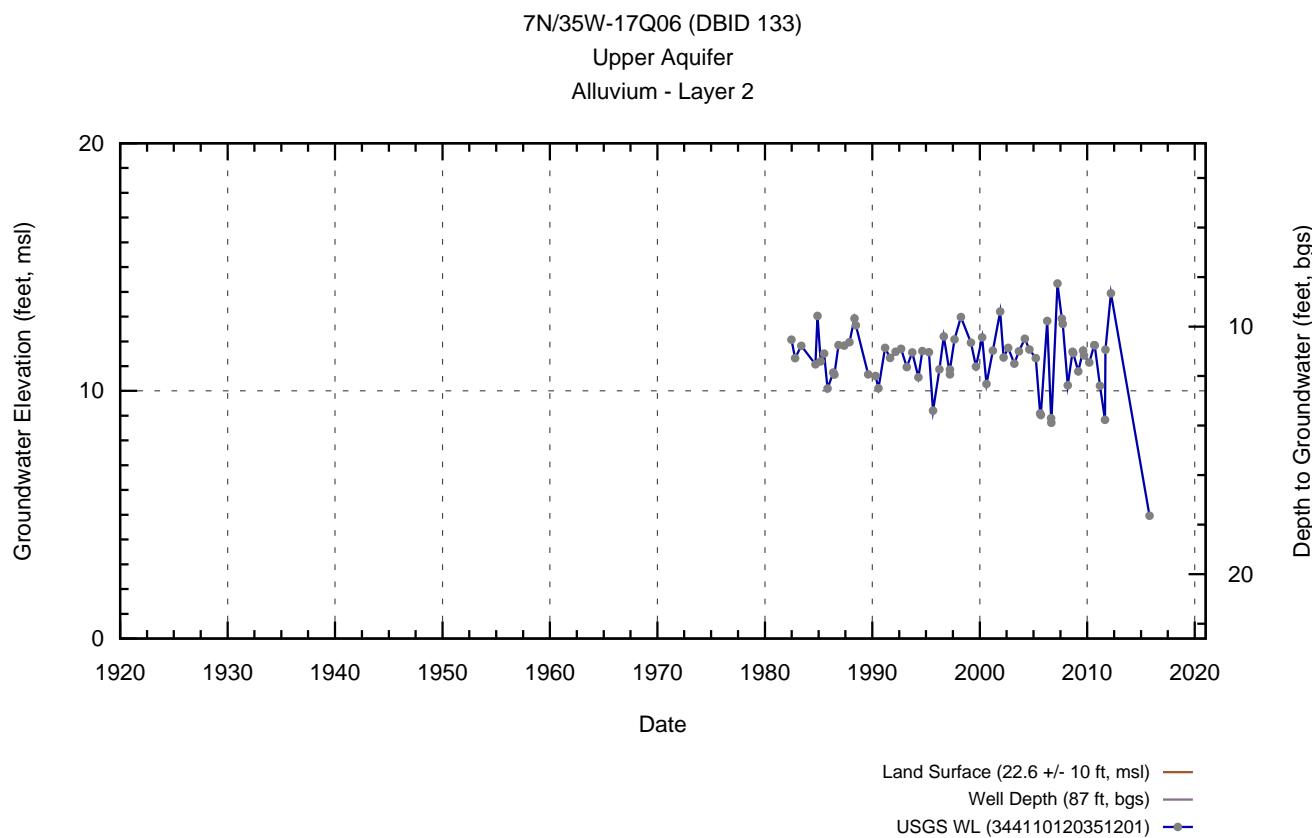
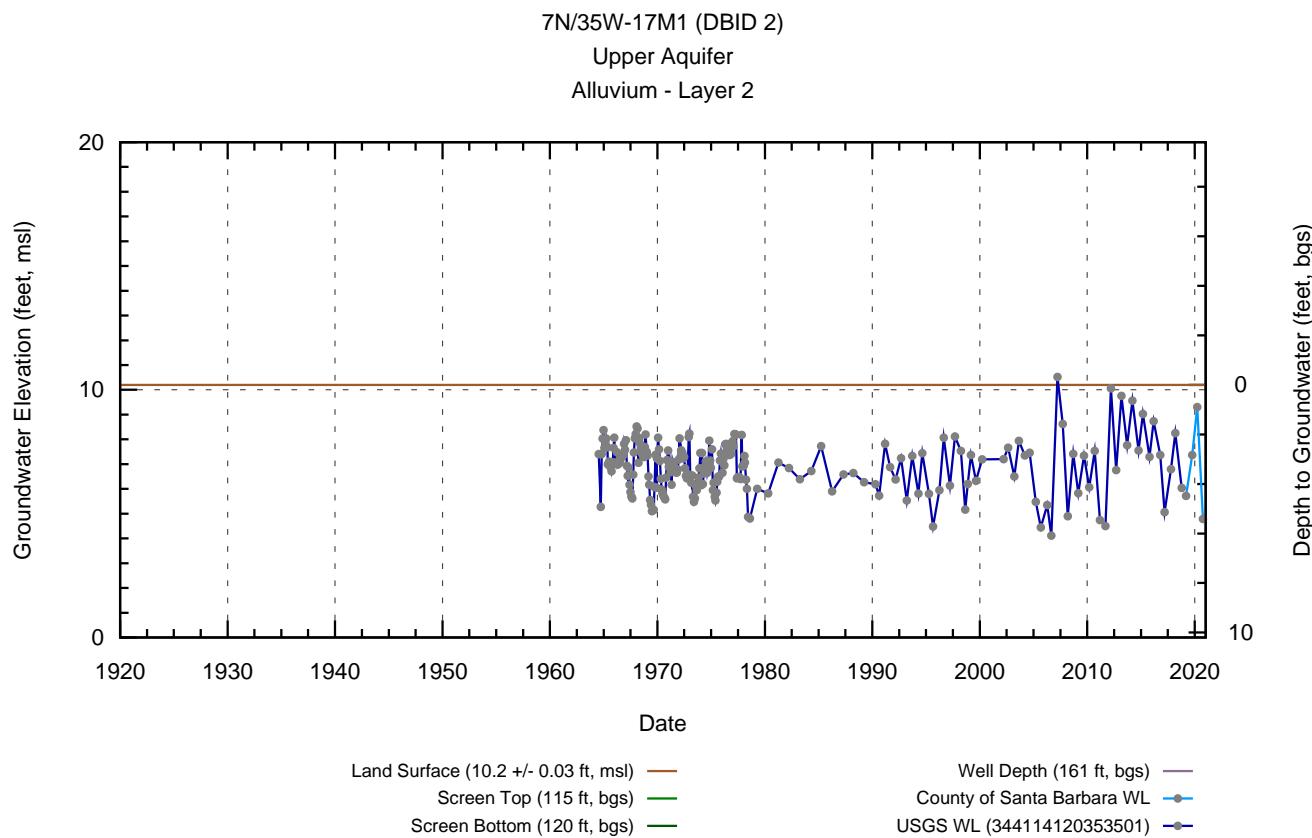




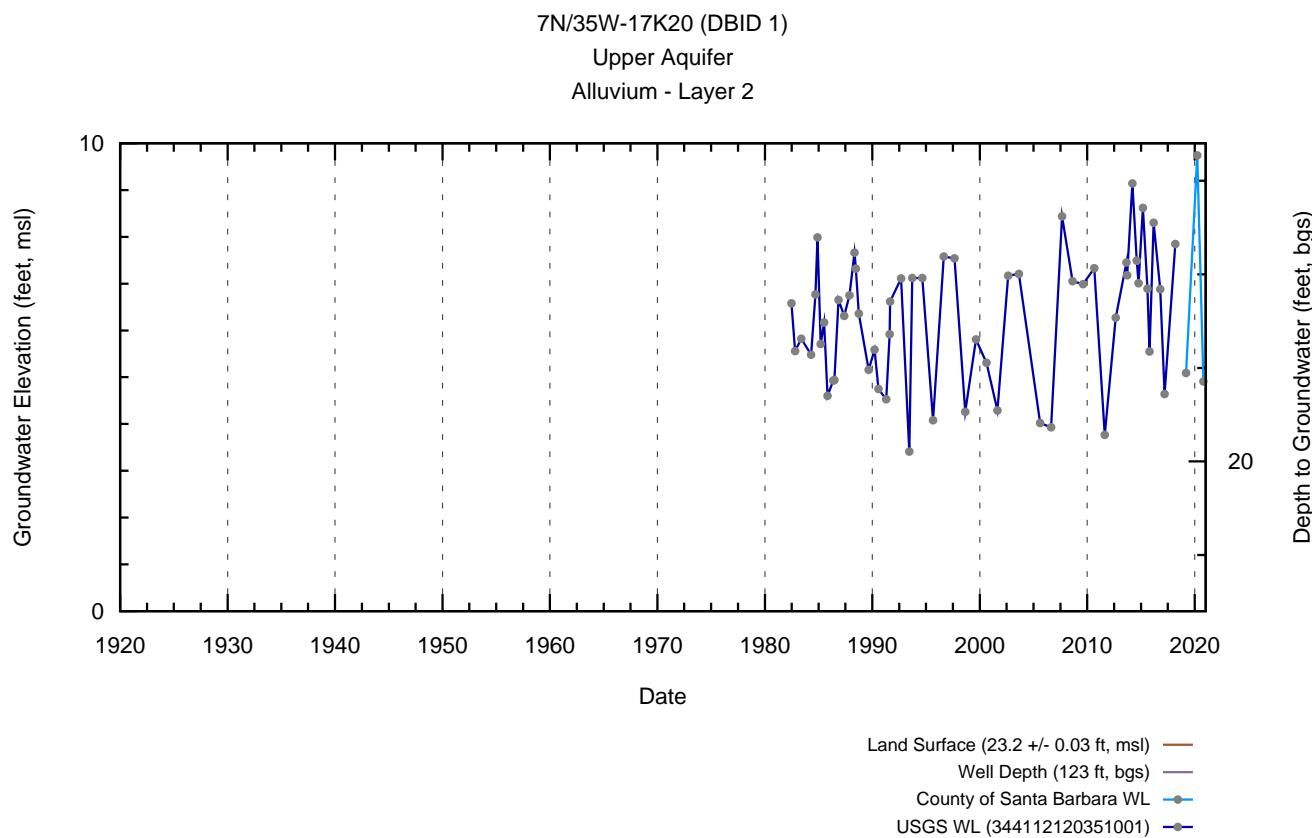
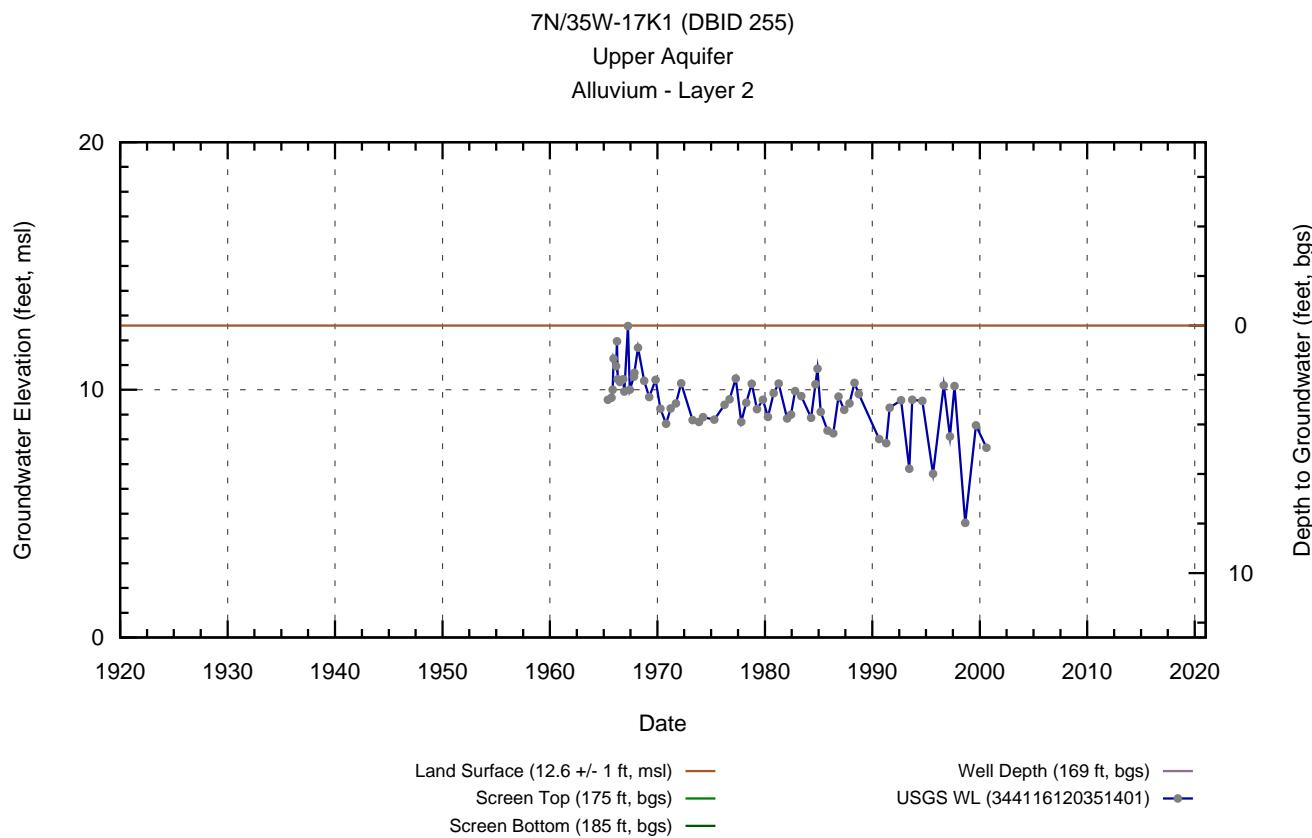
WMA: Lompoc Plain / Santa Ynez Estuary



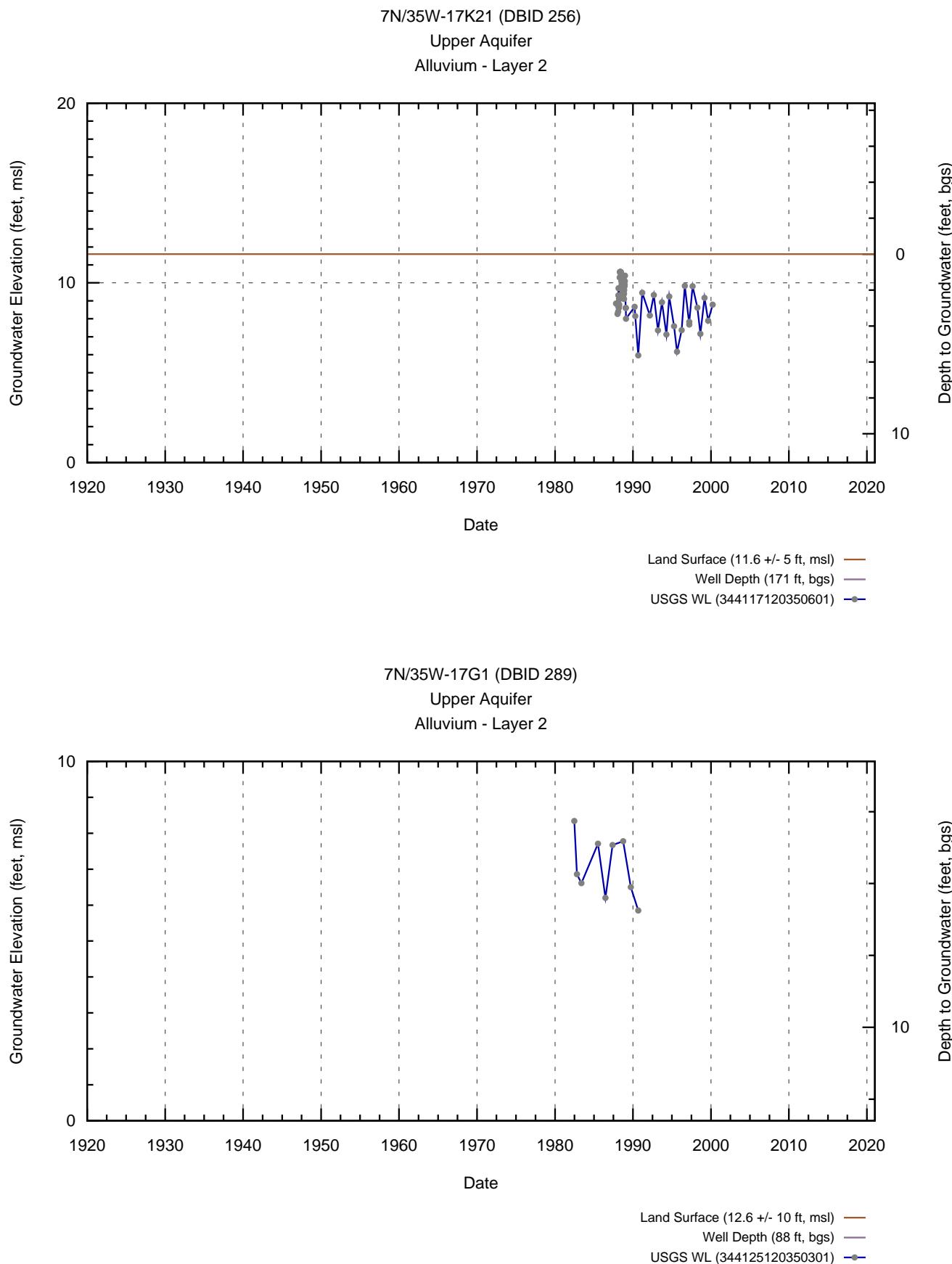
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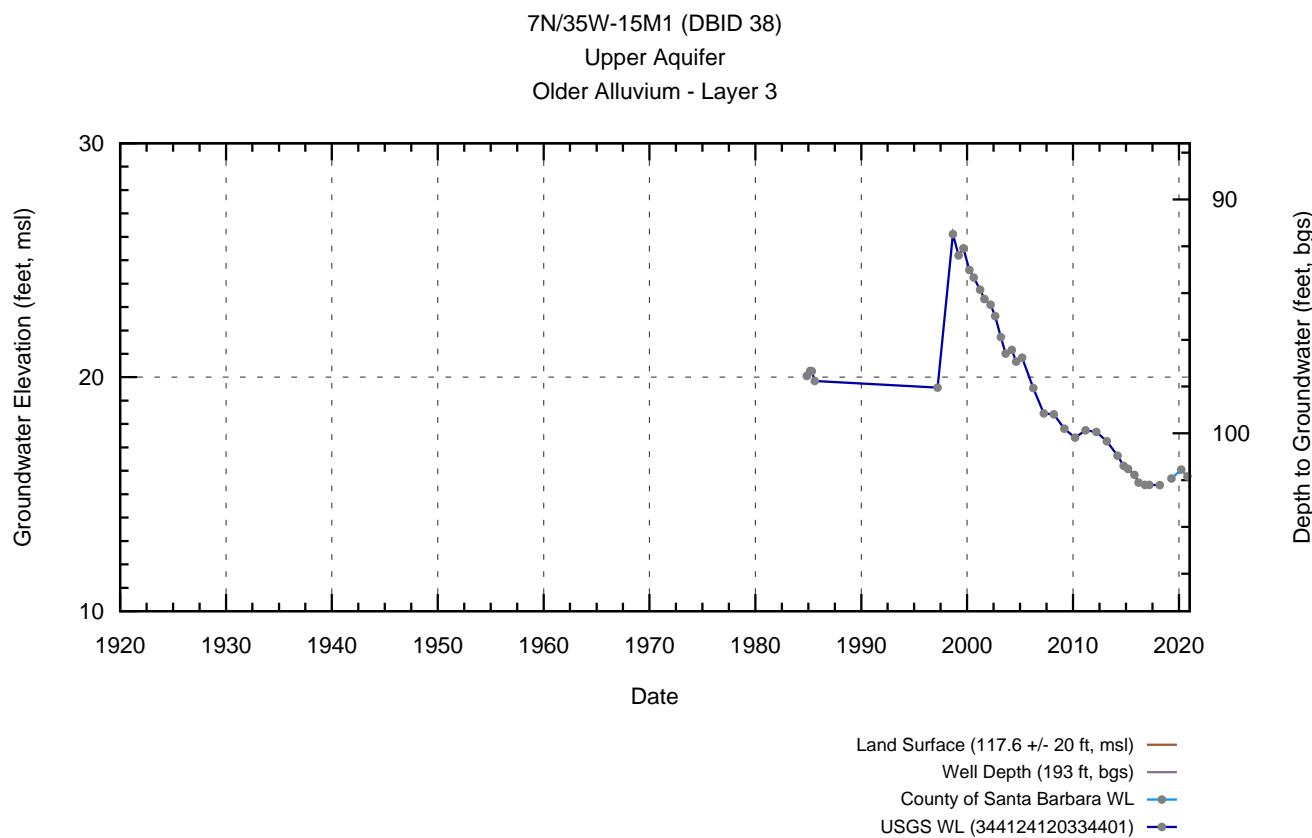
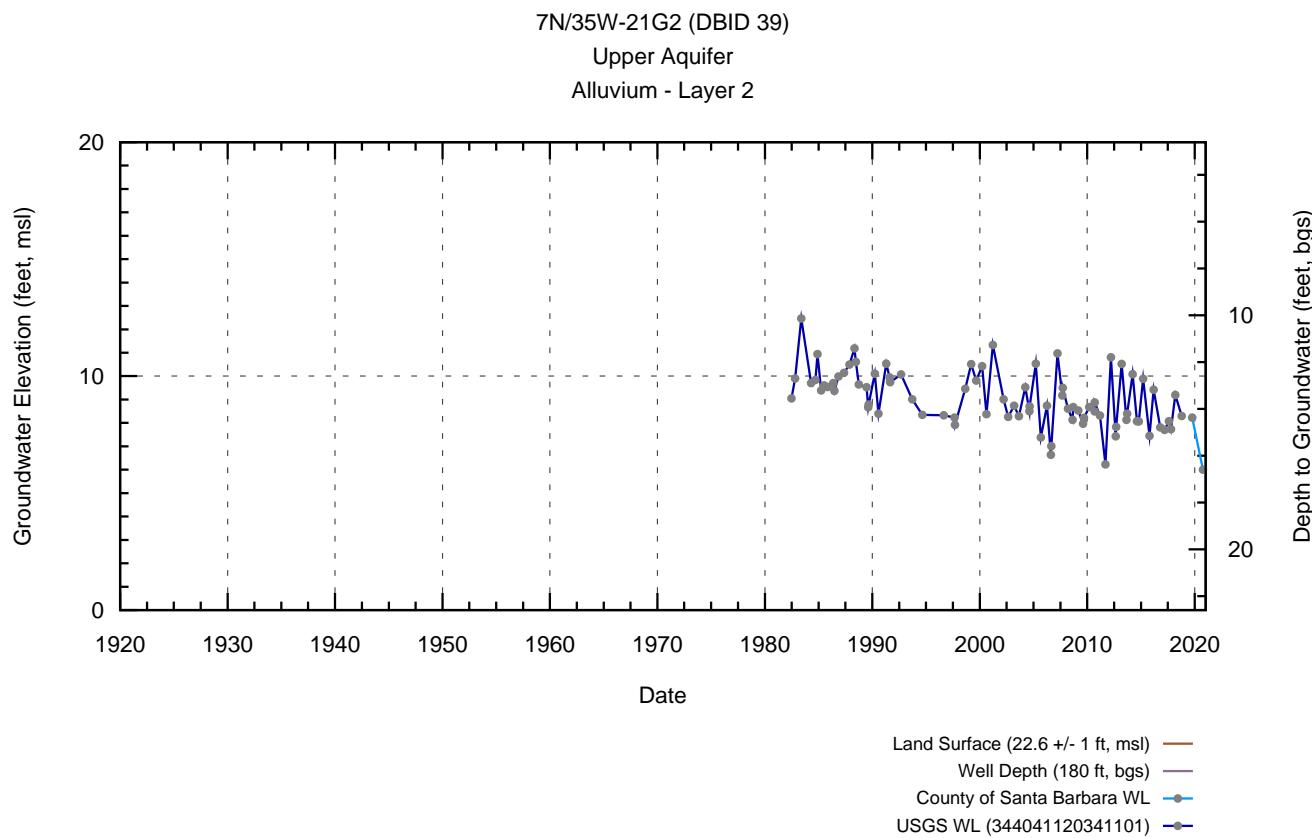
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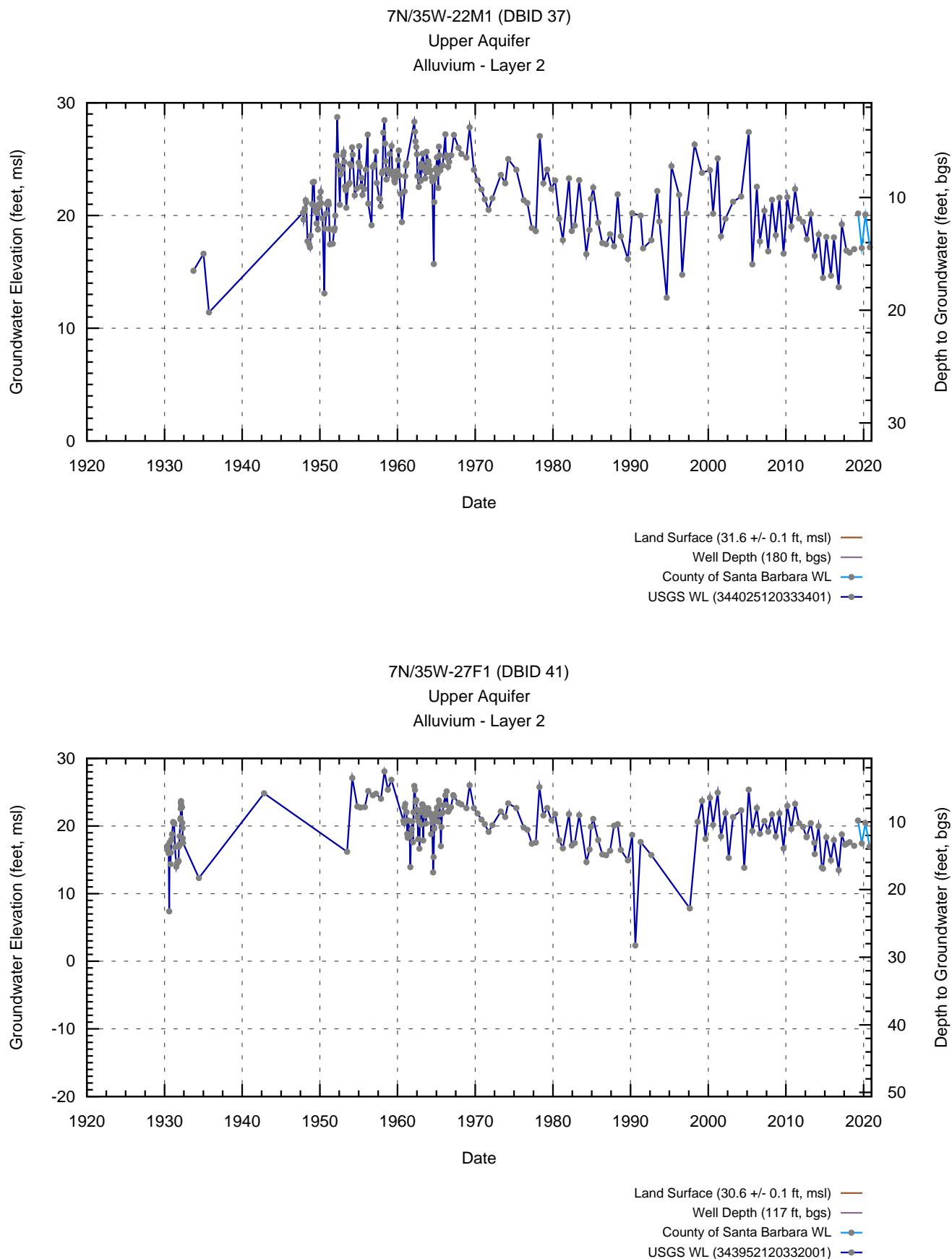
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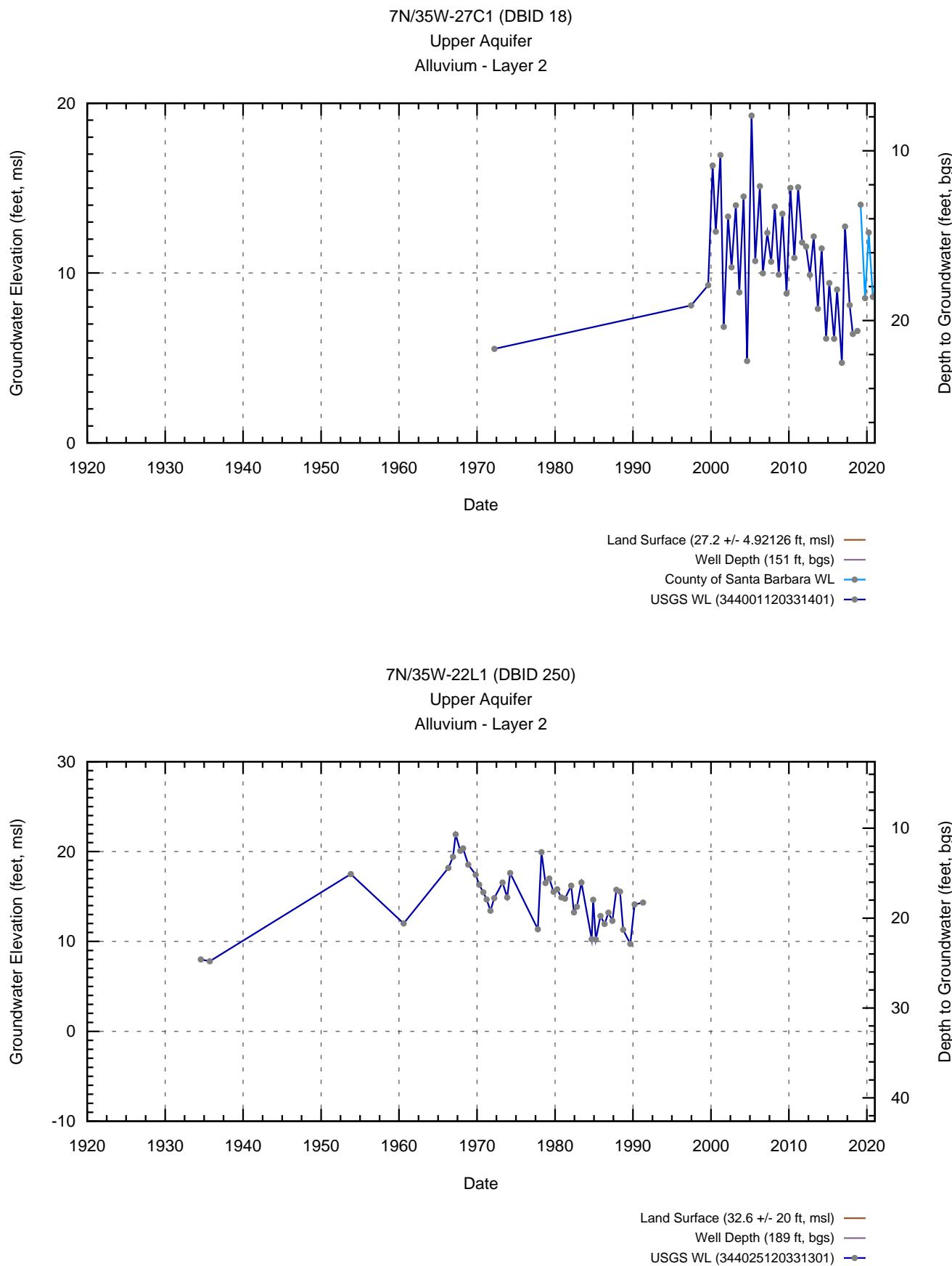
WMA: Lompoc Plain : West of Lower Aquifer / Careaga



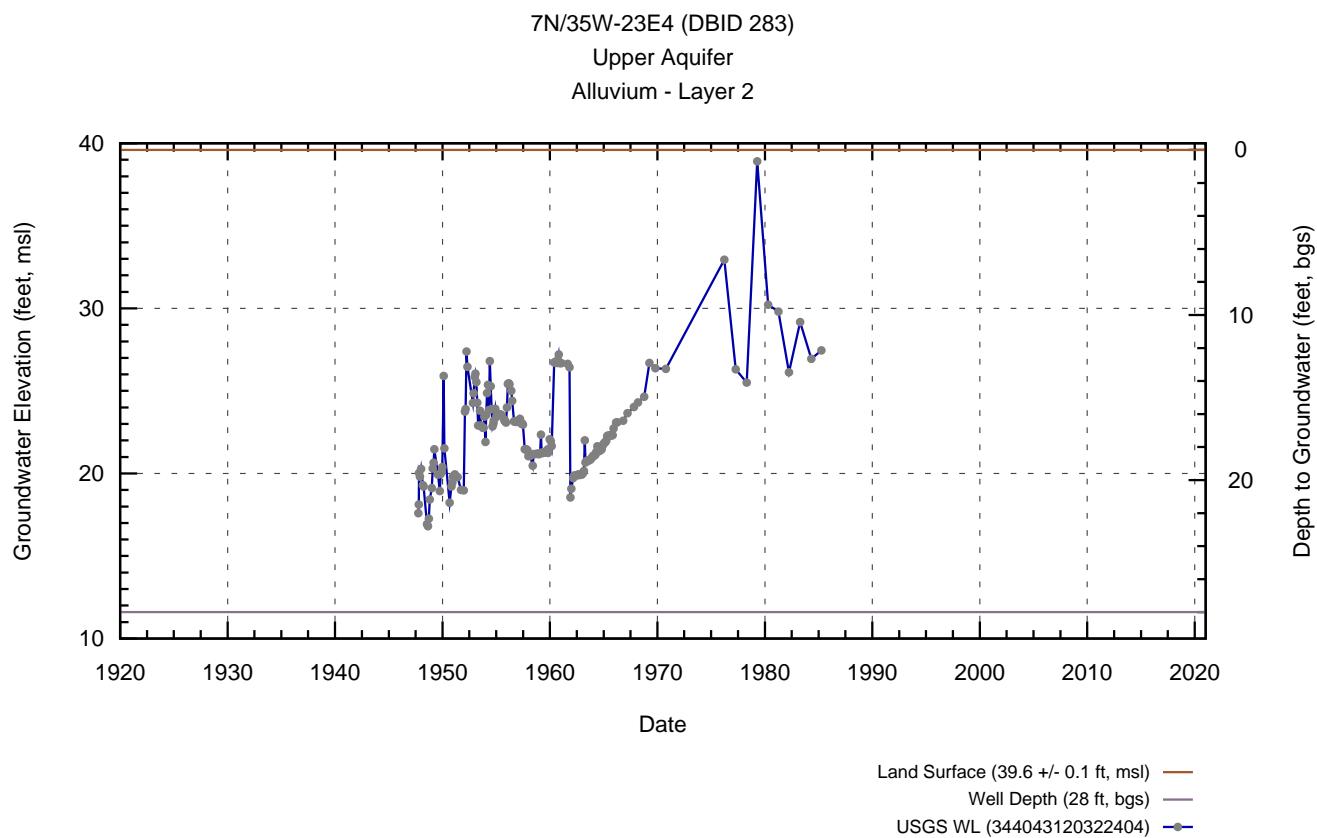
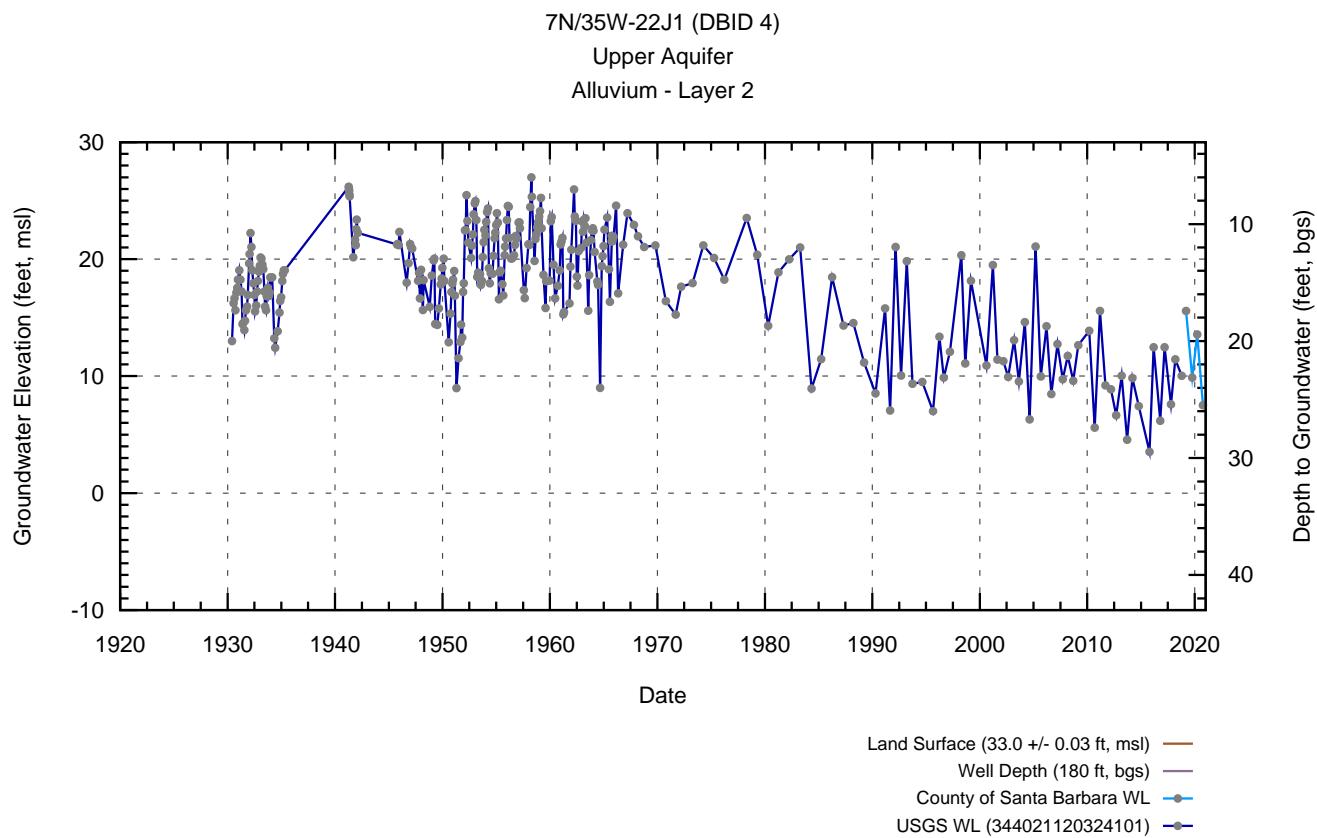
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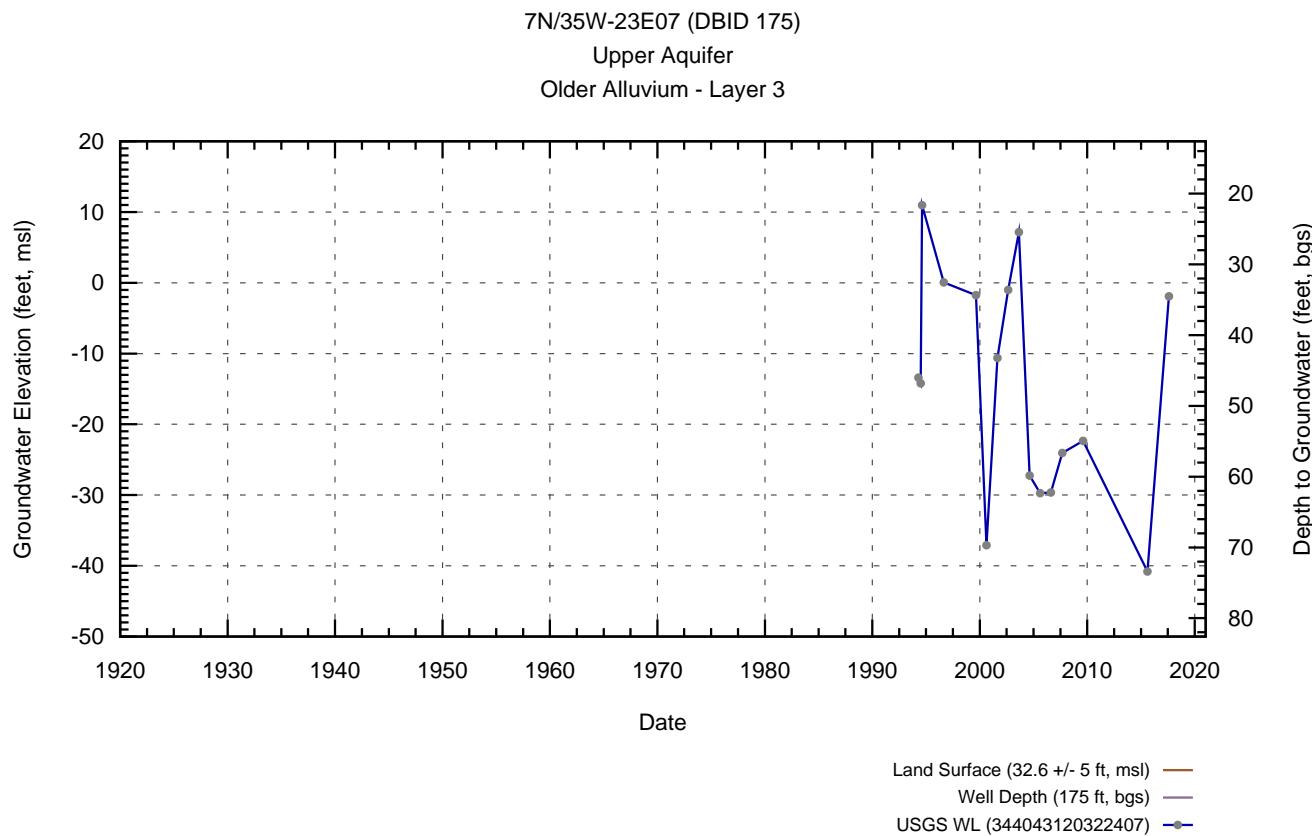
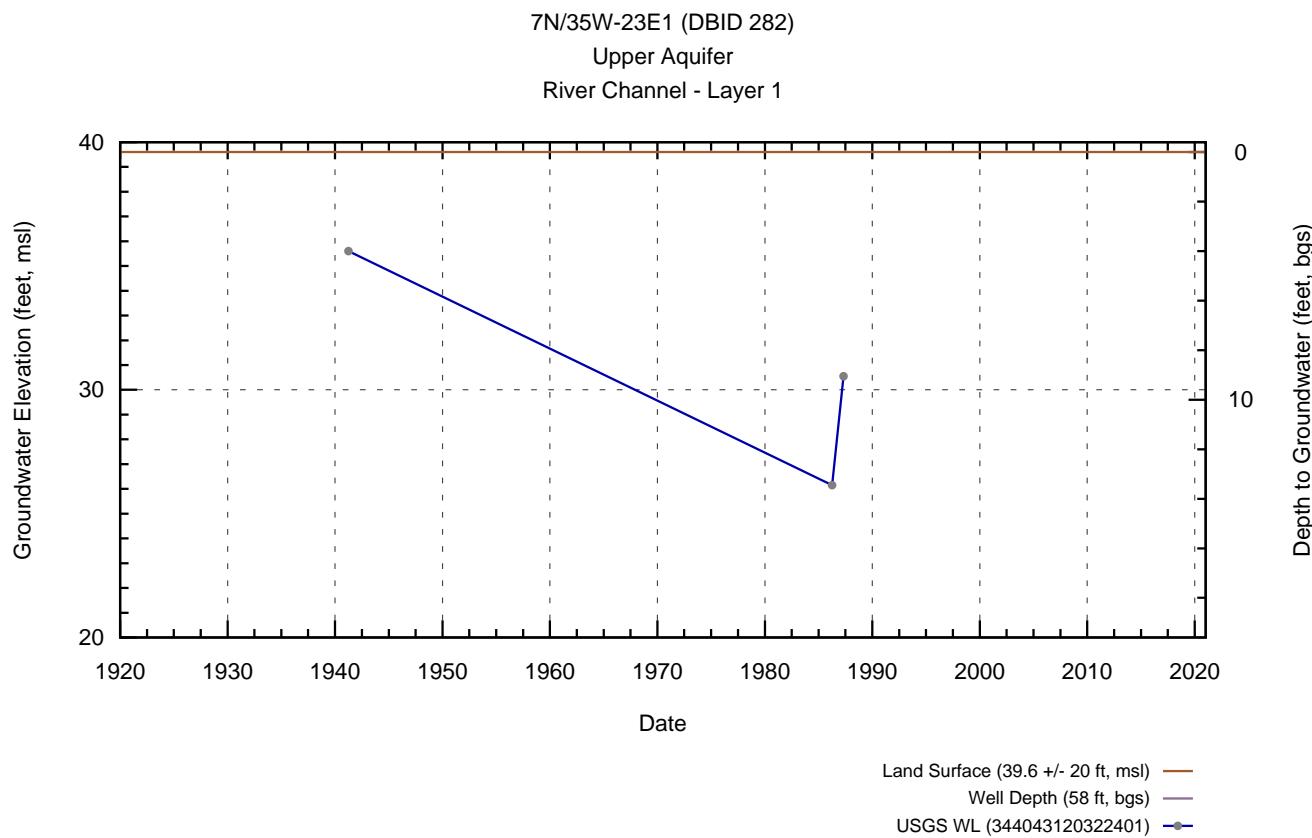
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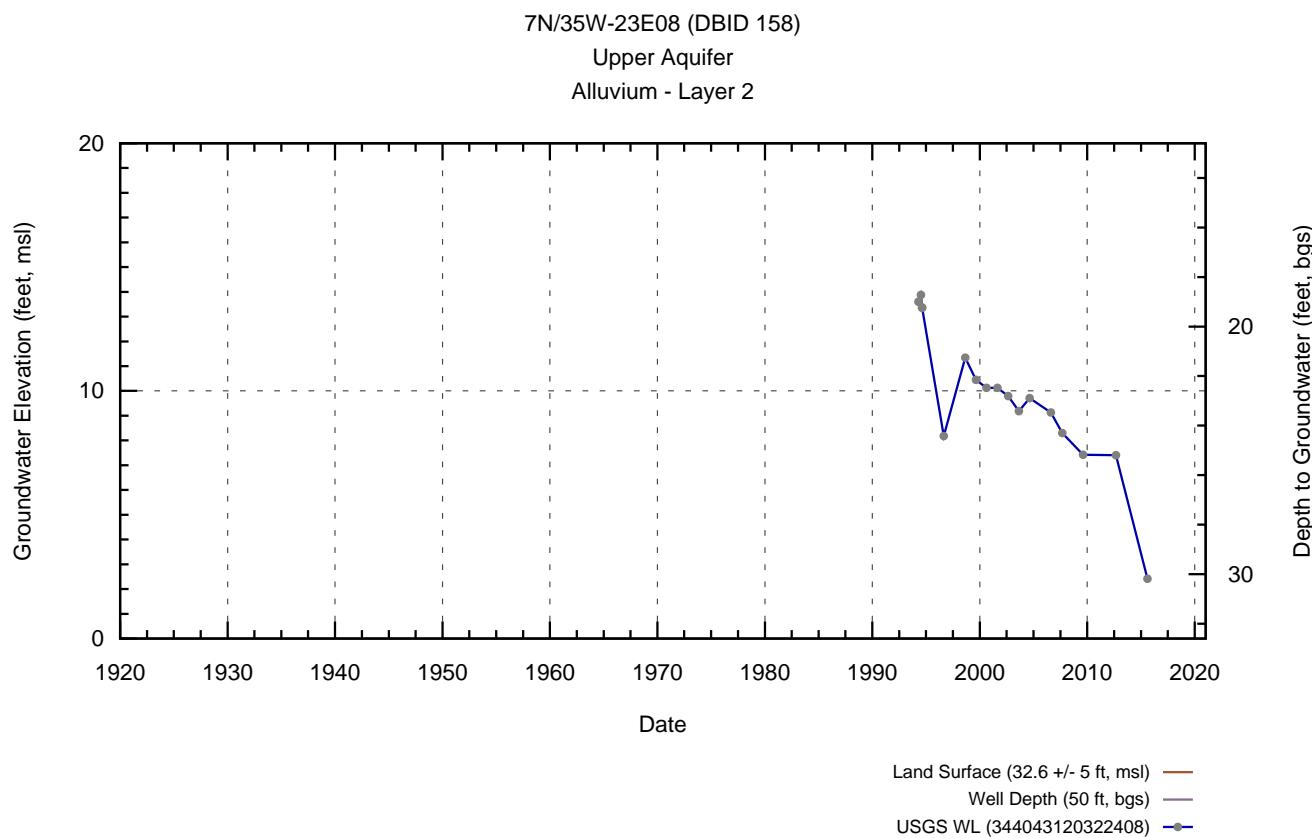
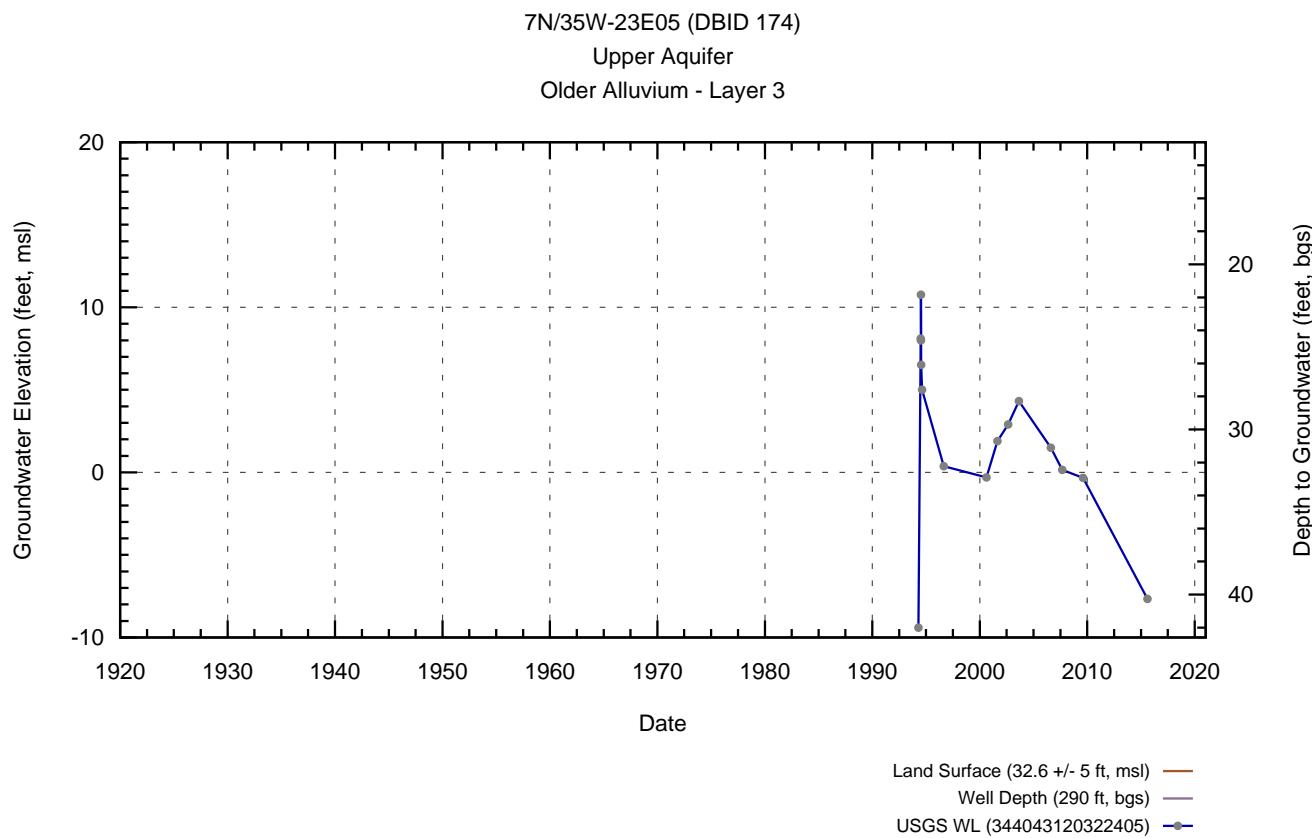
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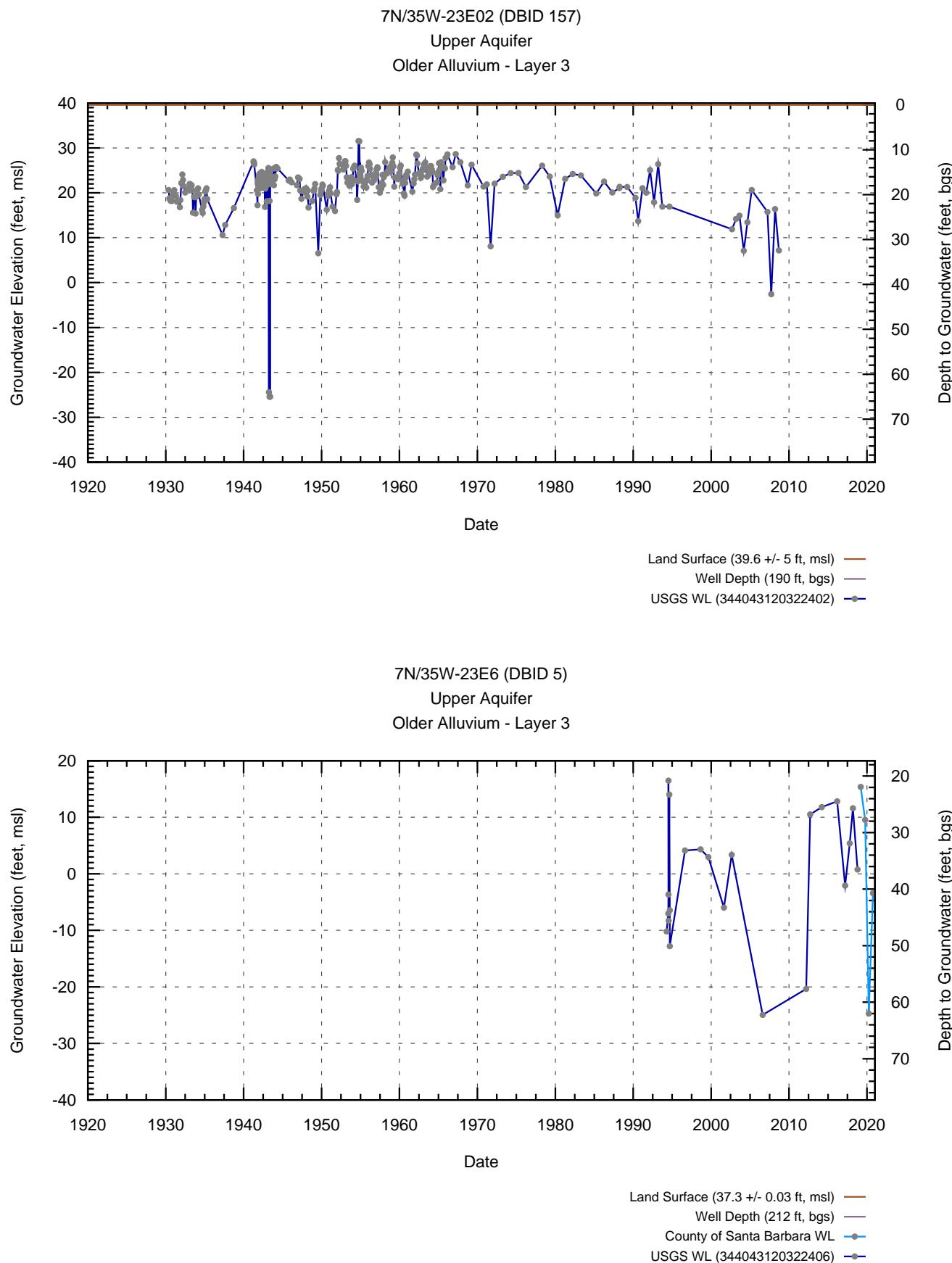
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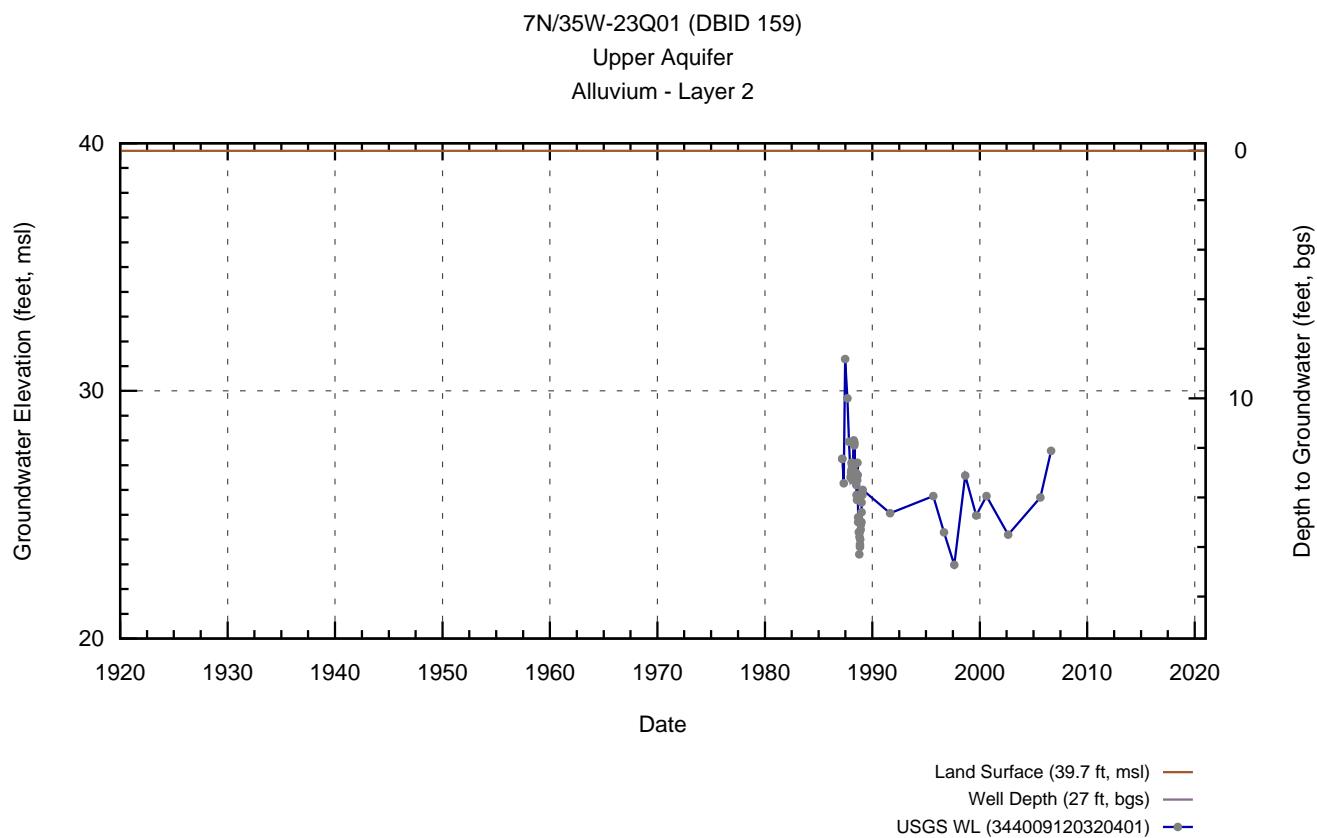
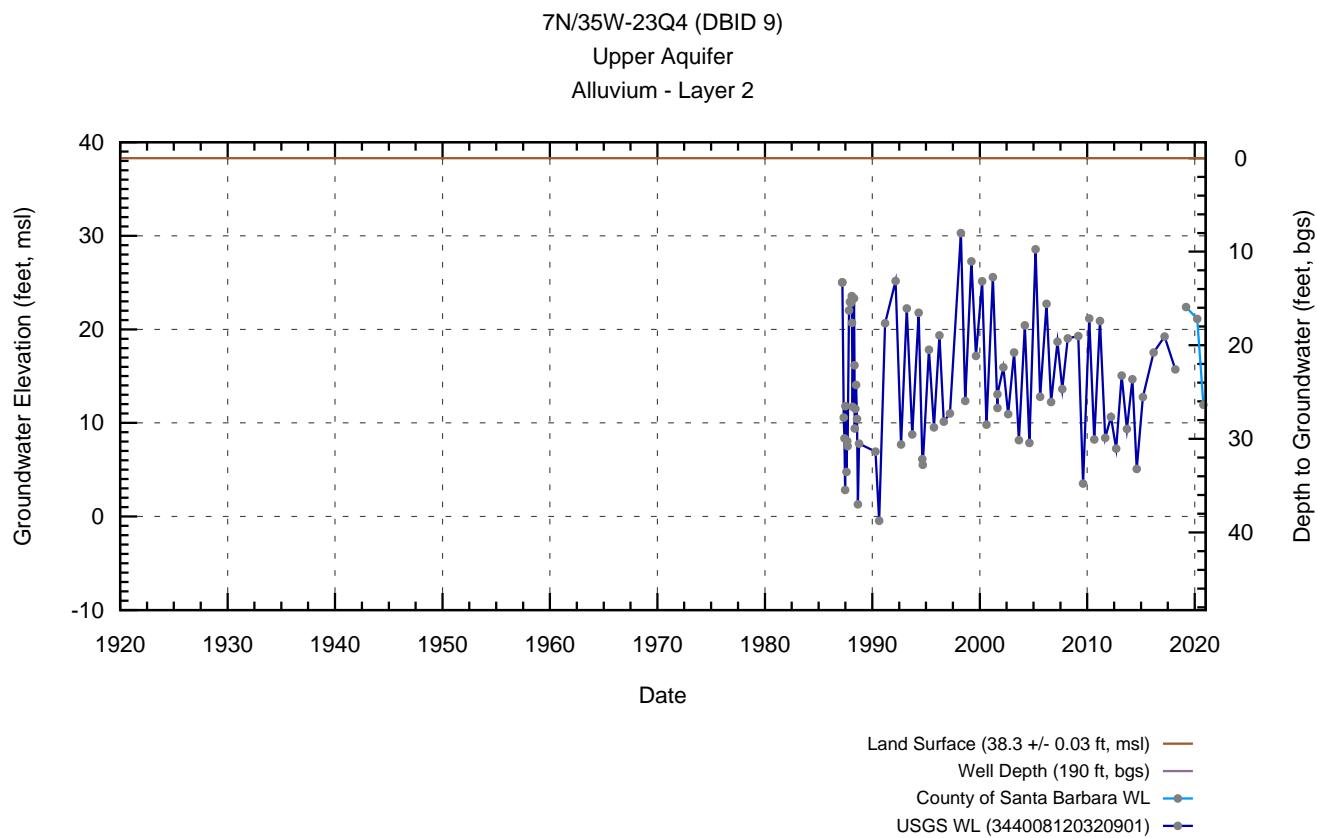
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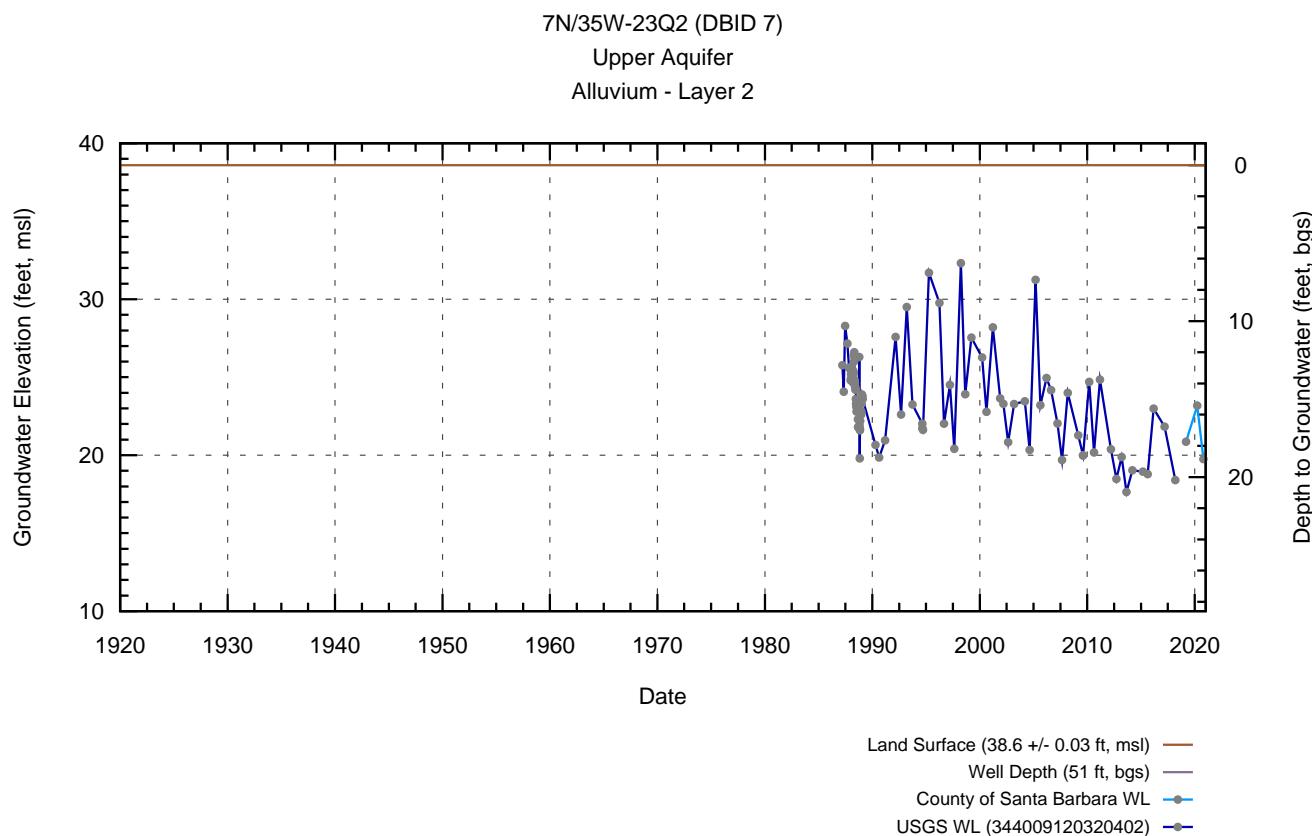
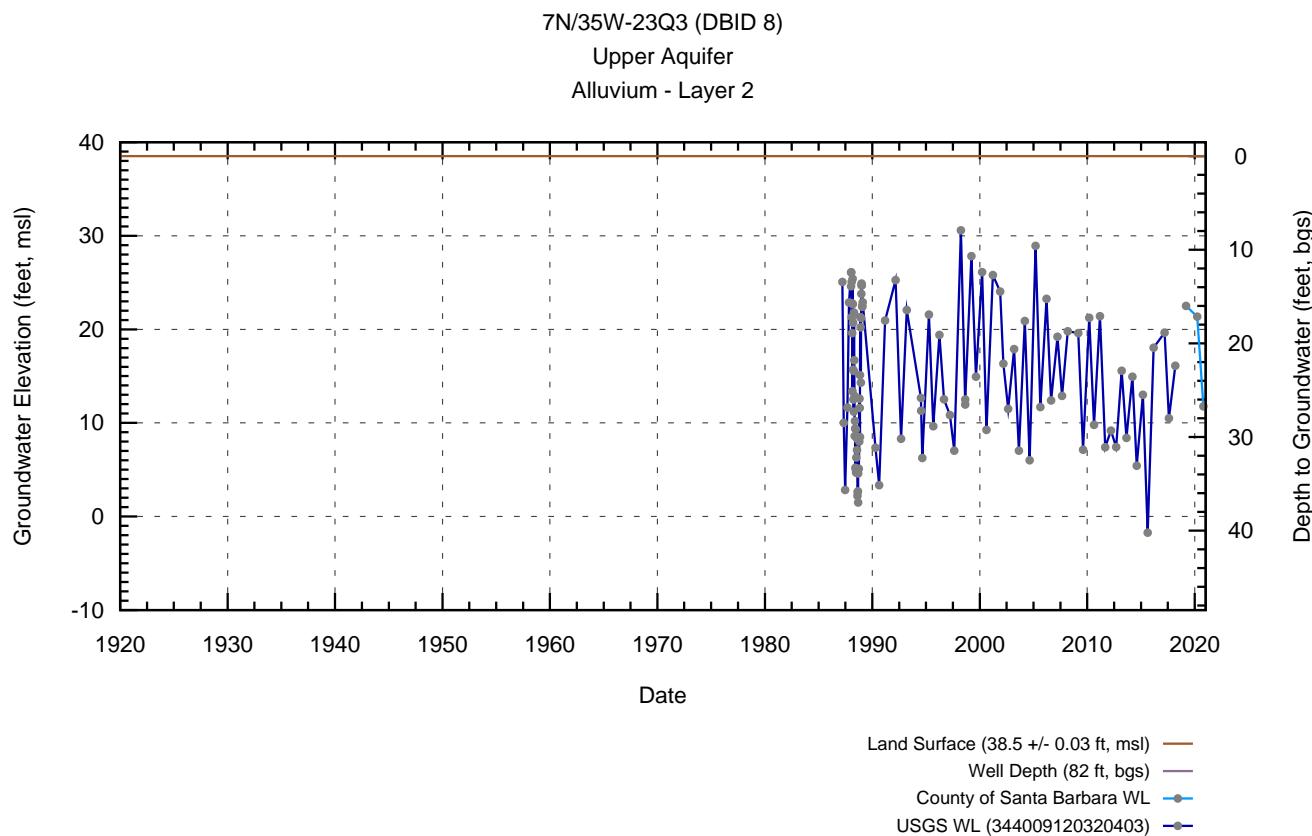
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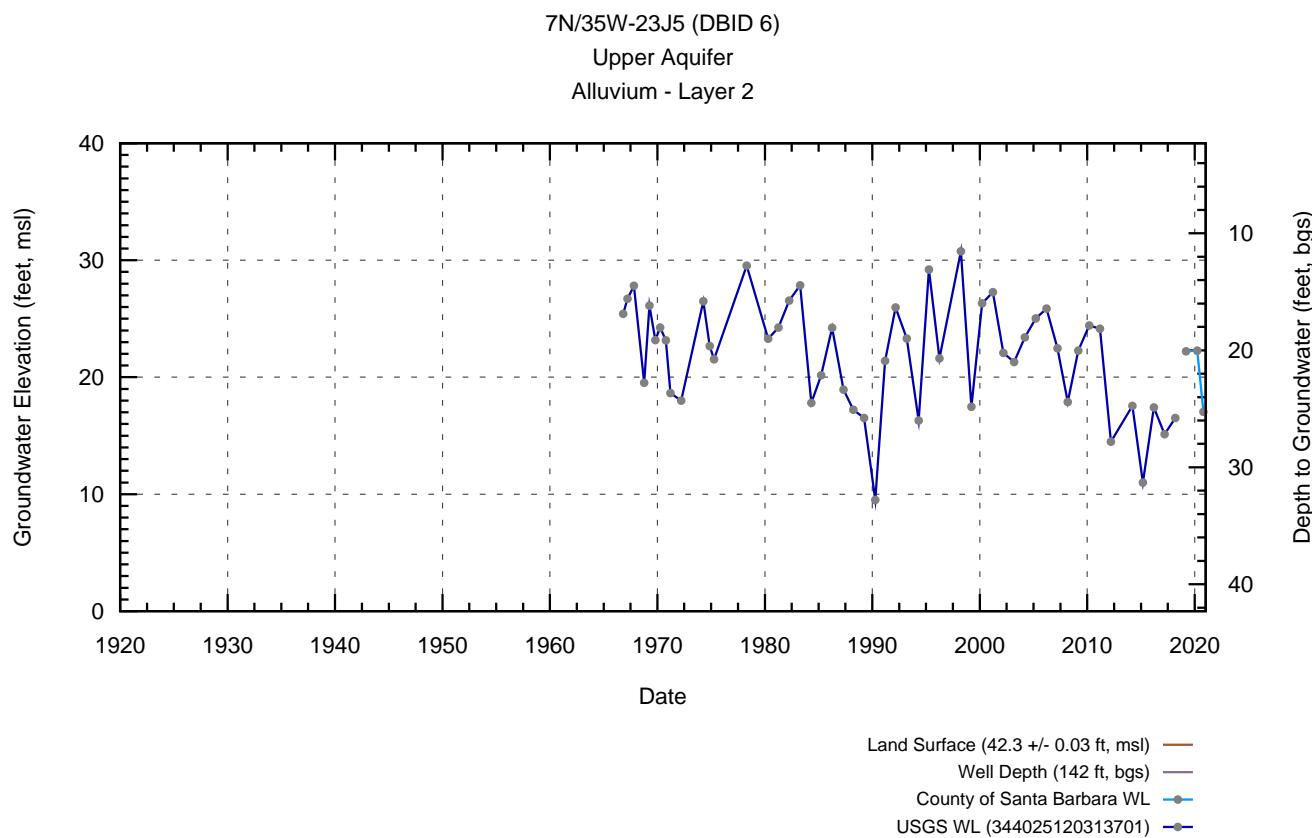
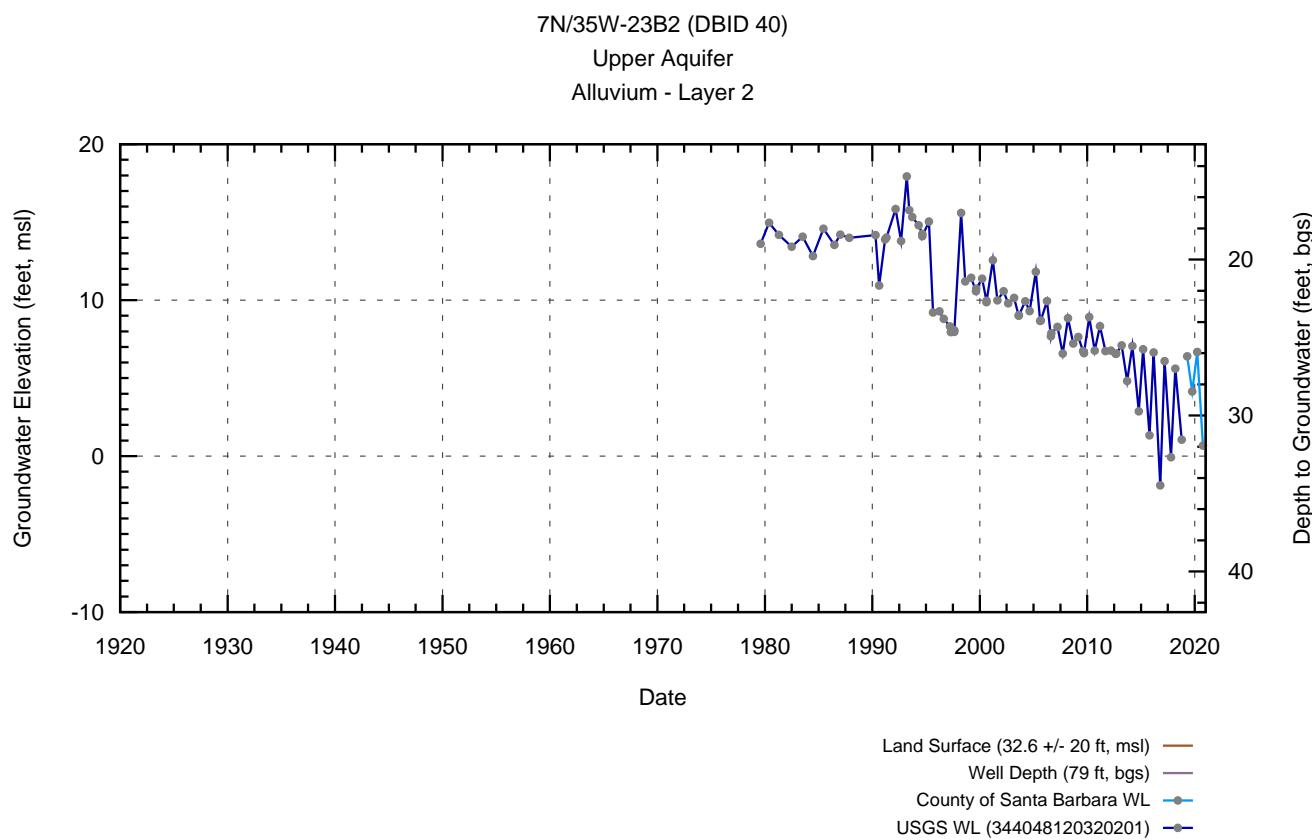
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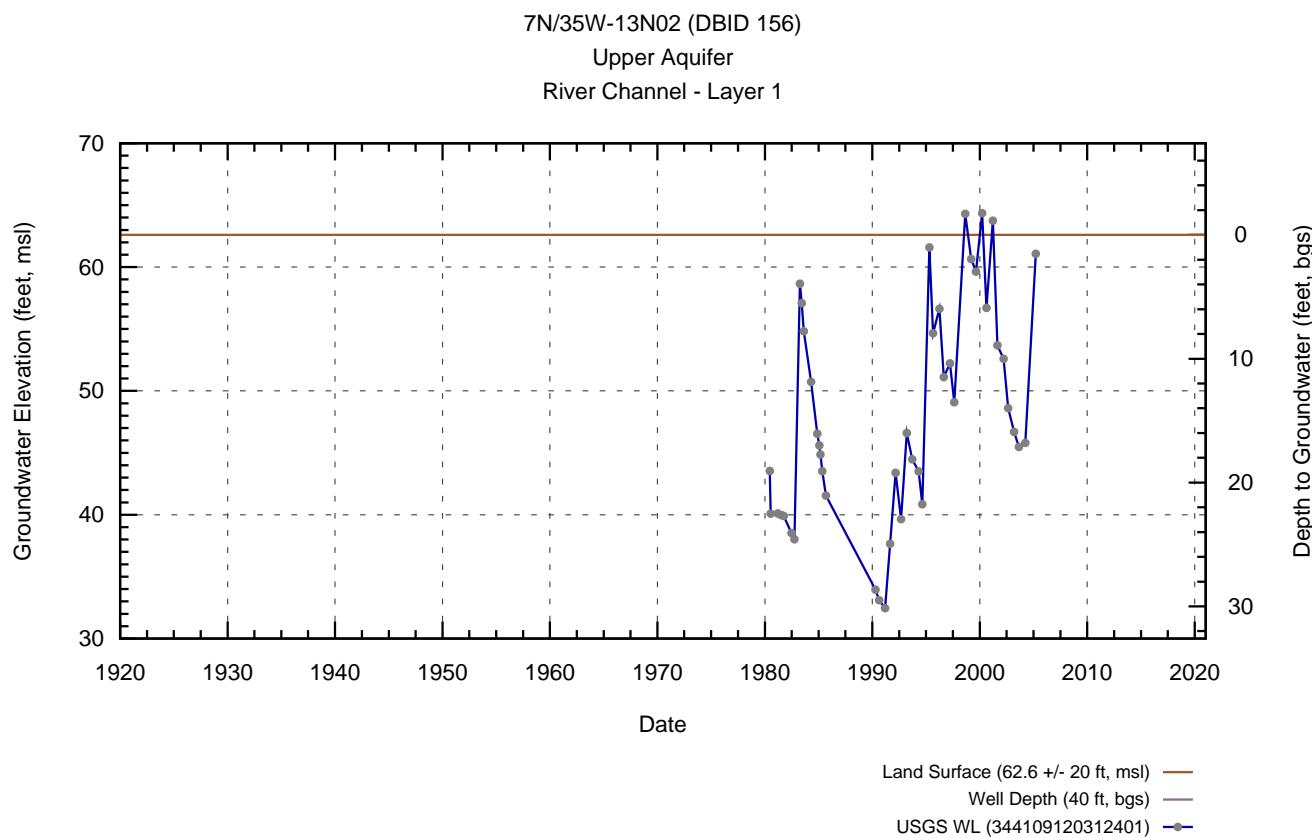
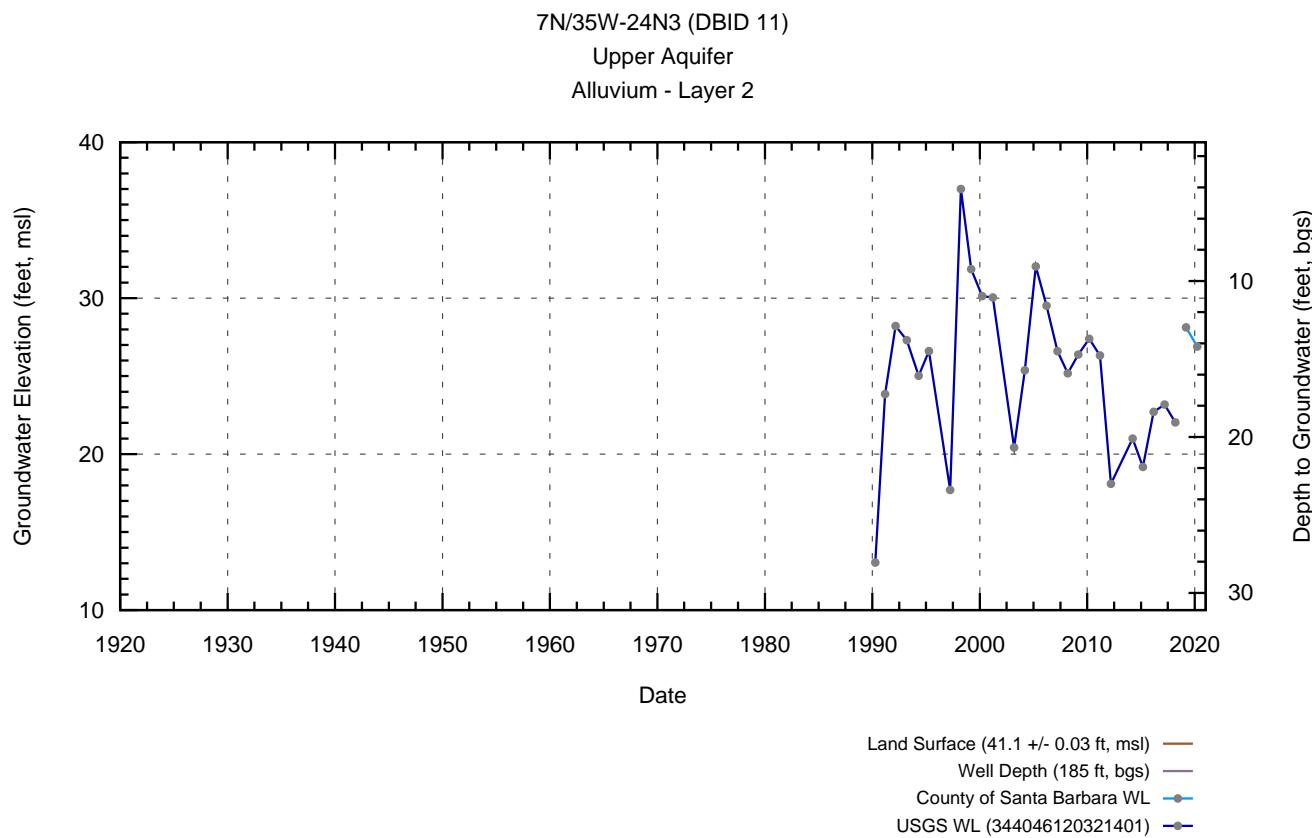
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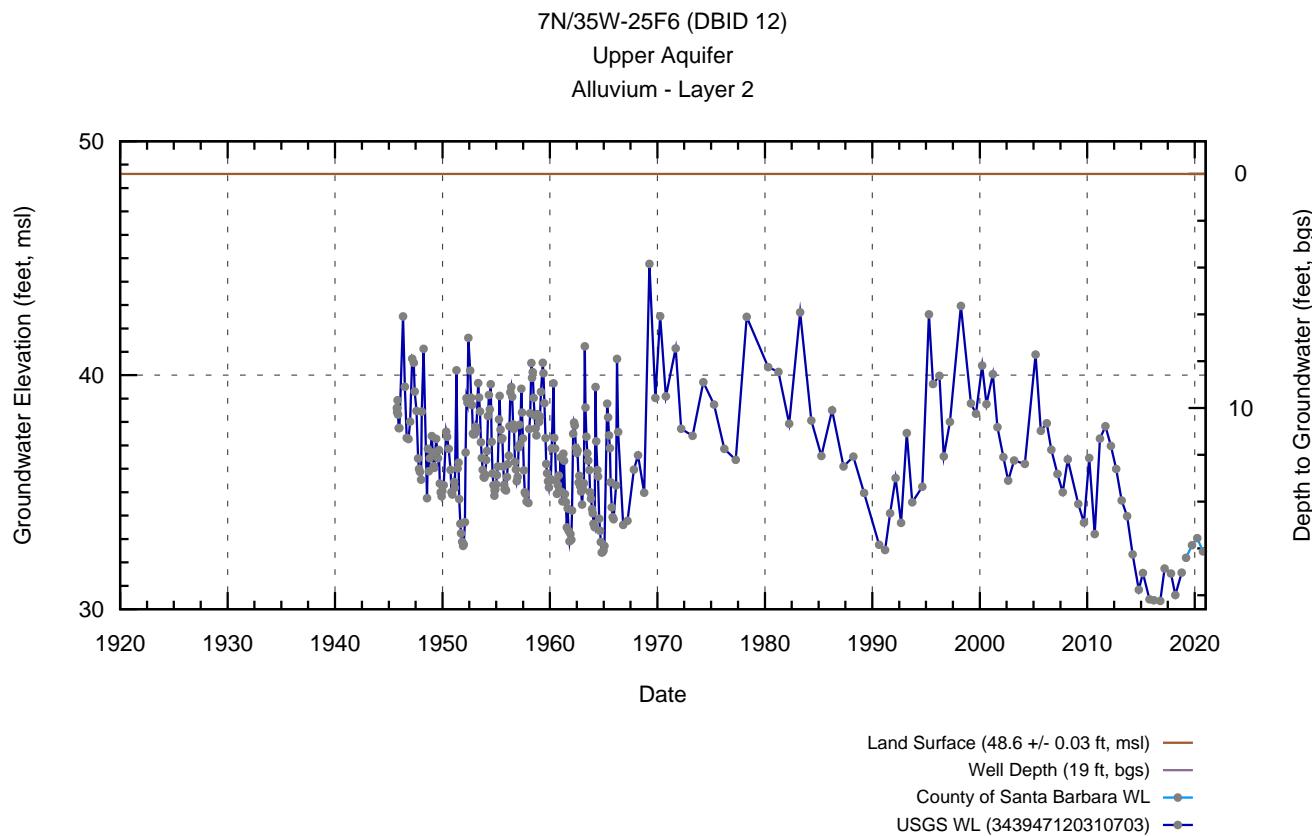
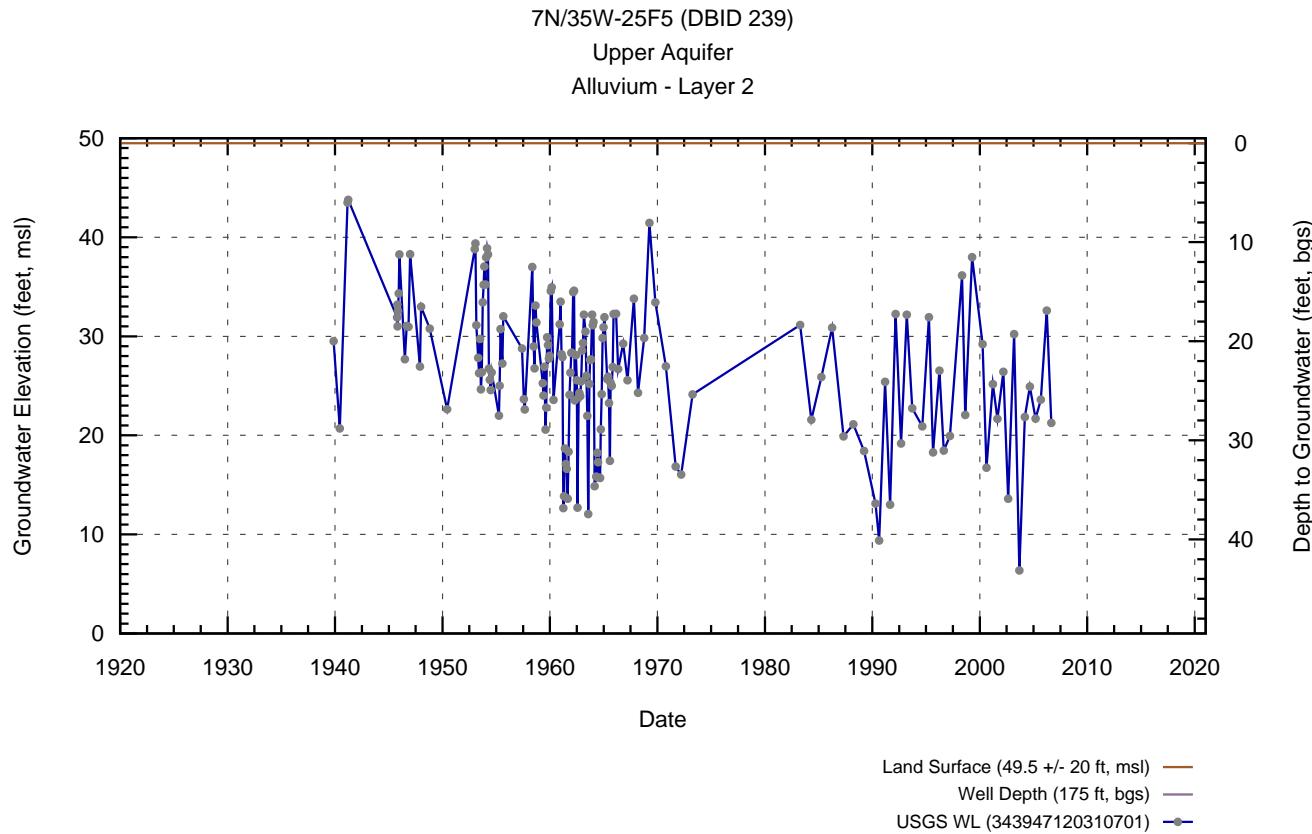
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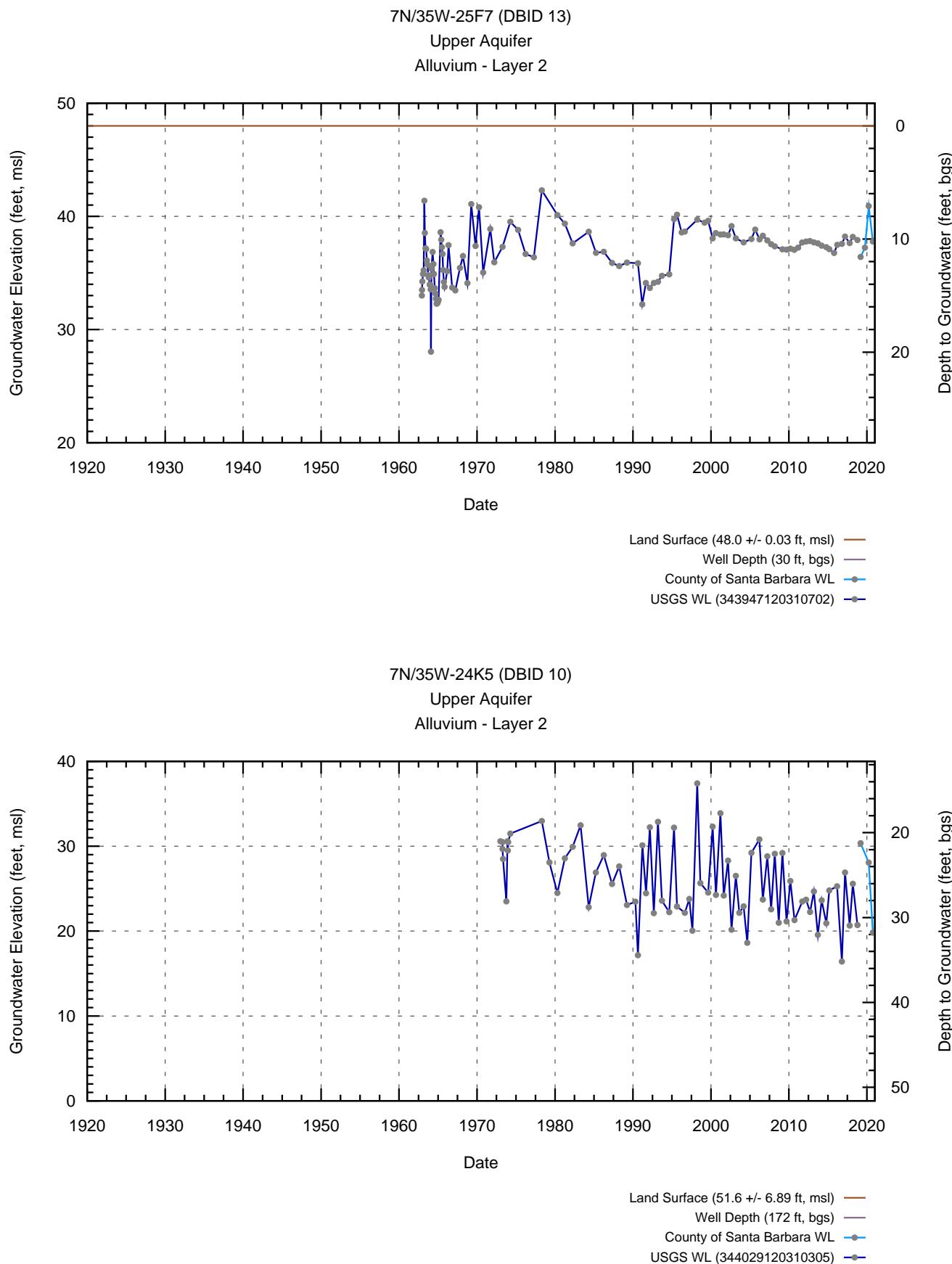
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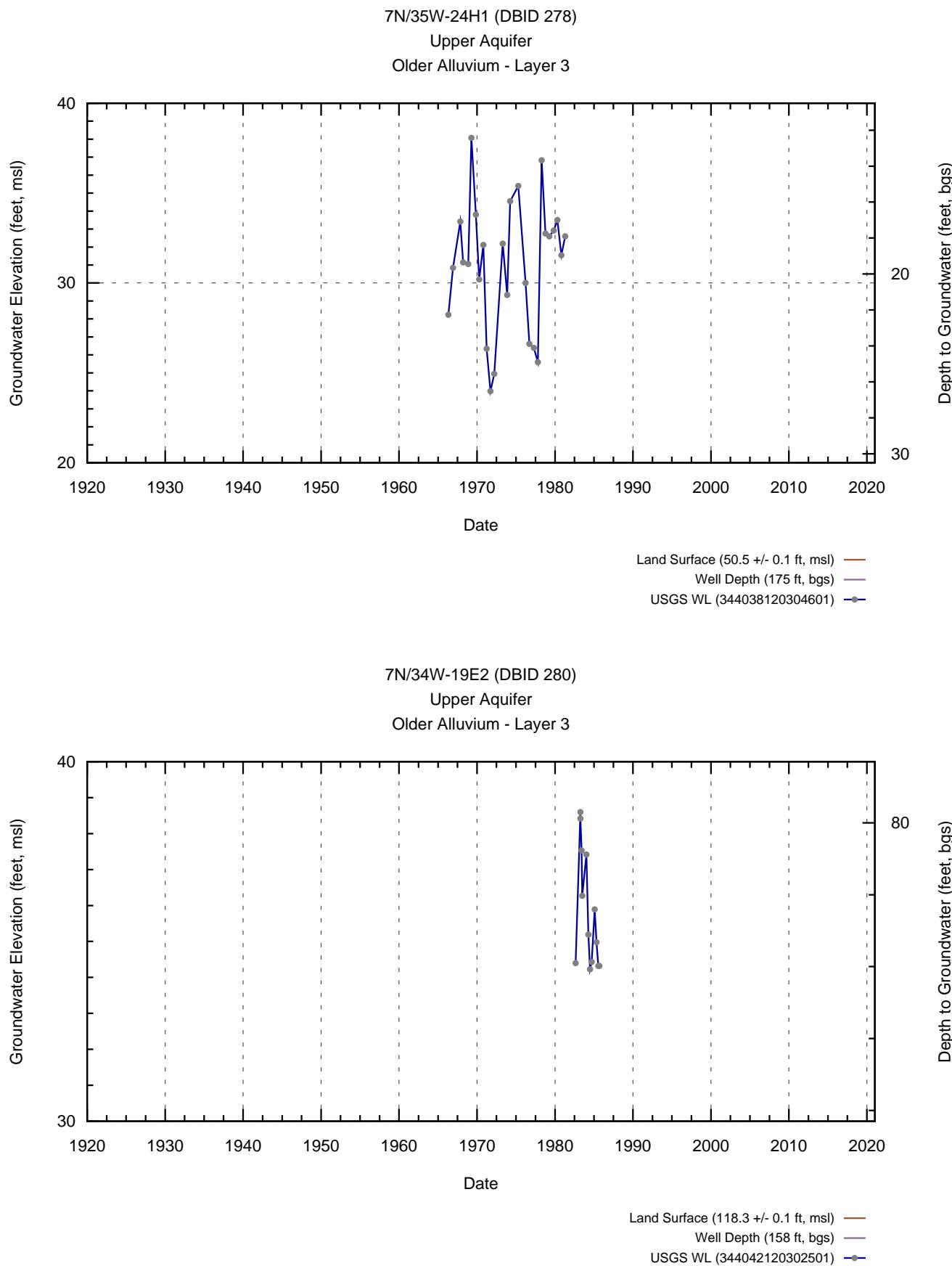
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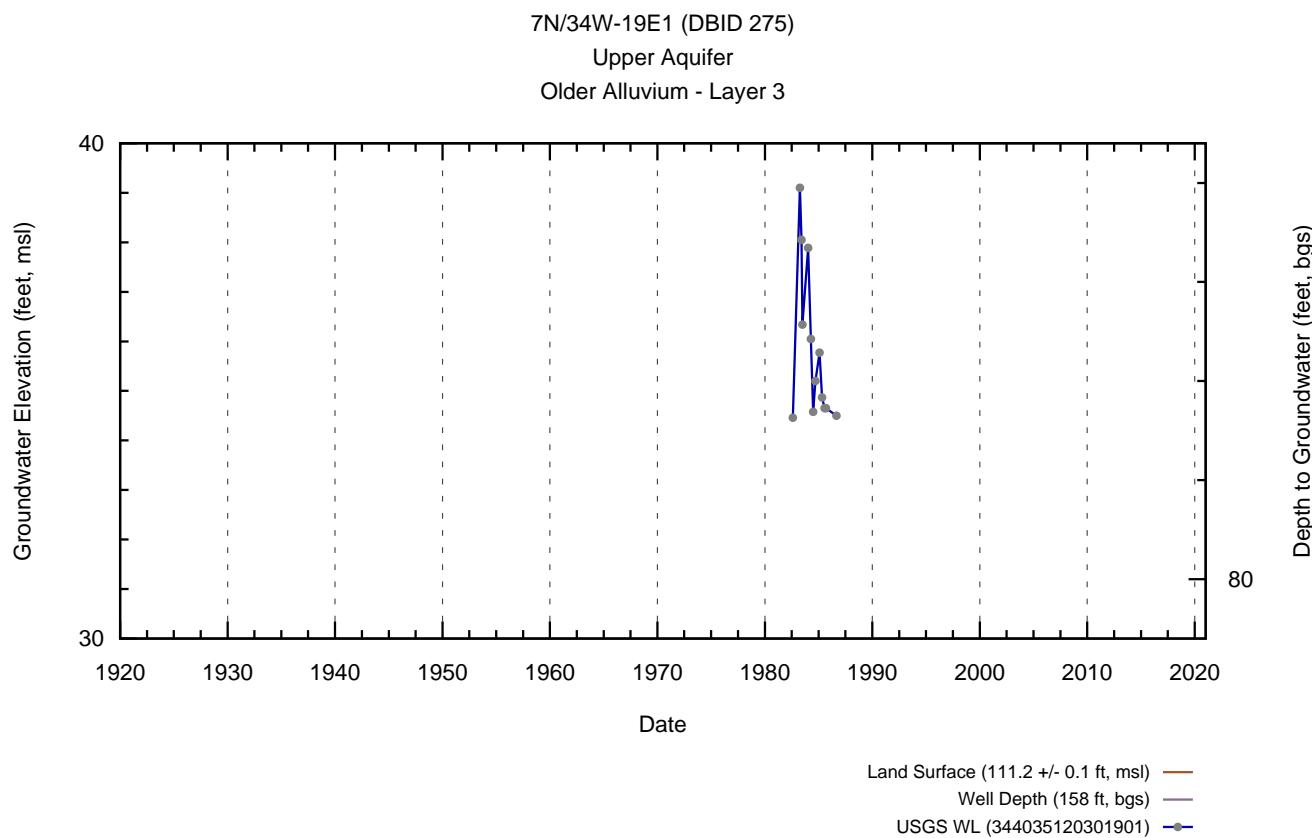
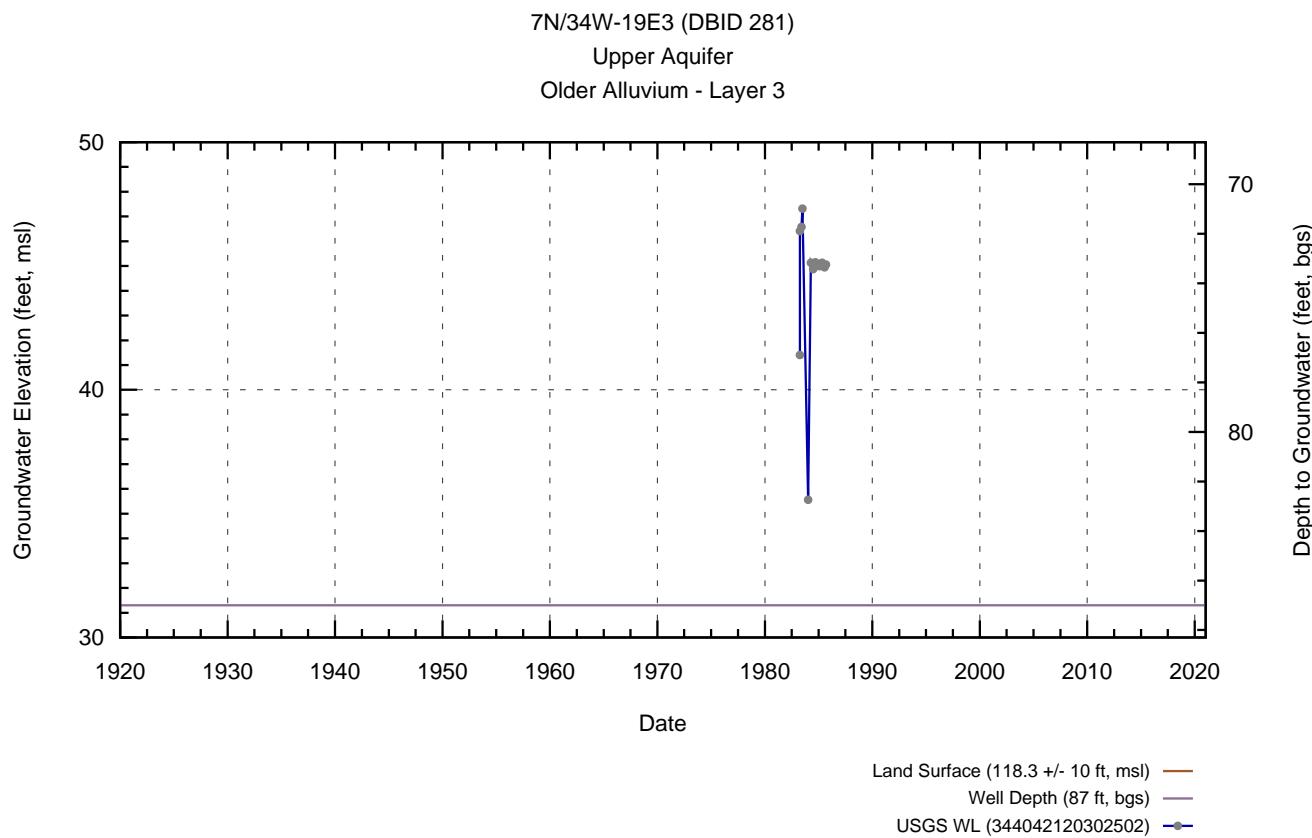
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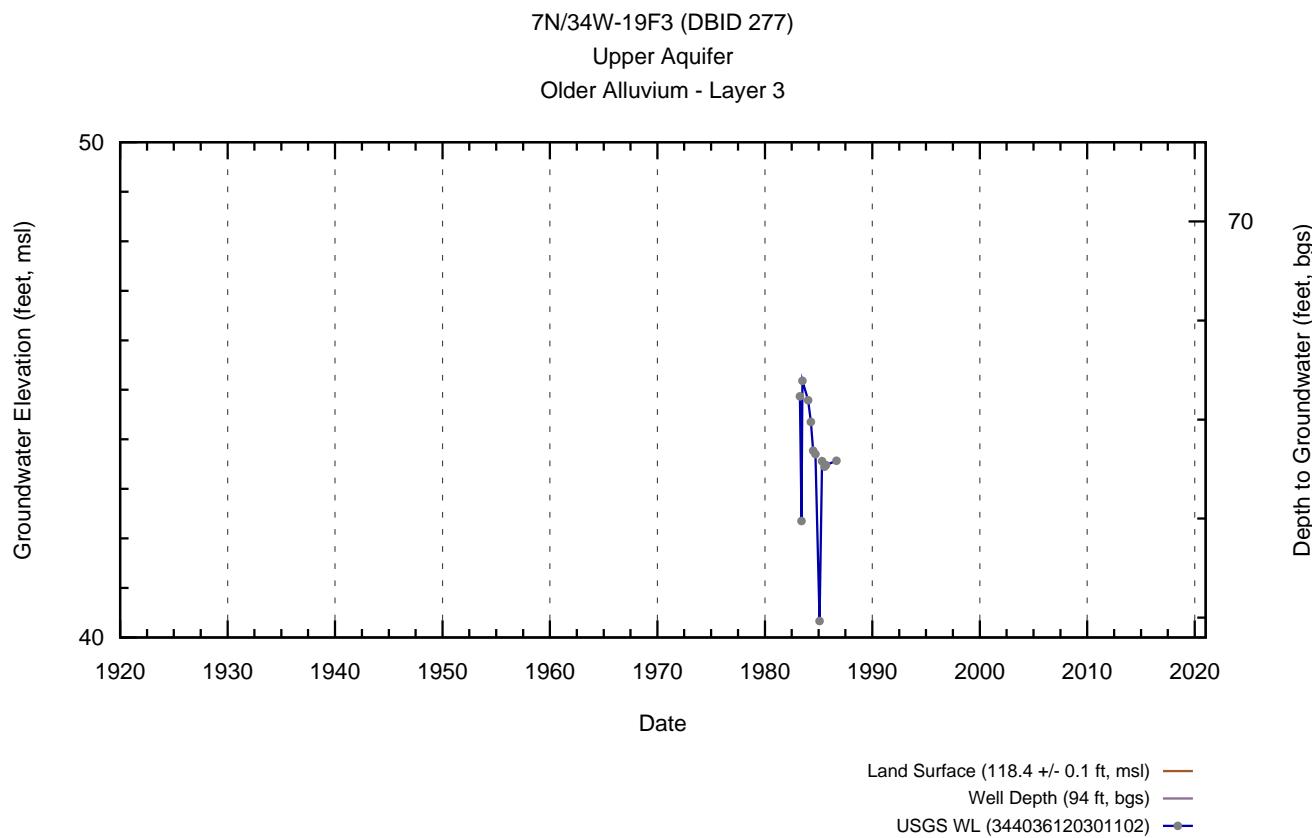
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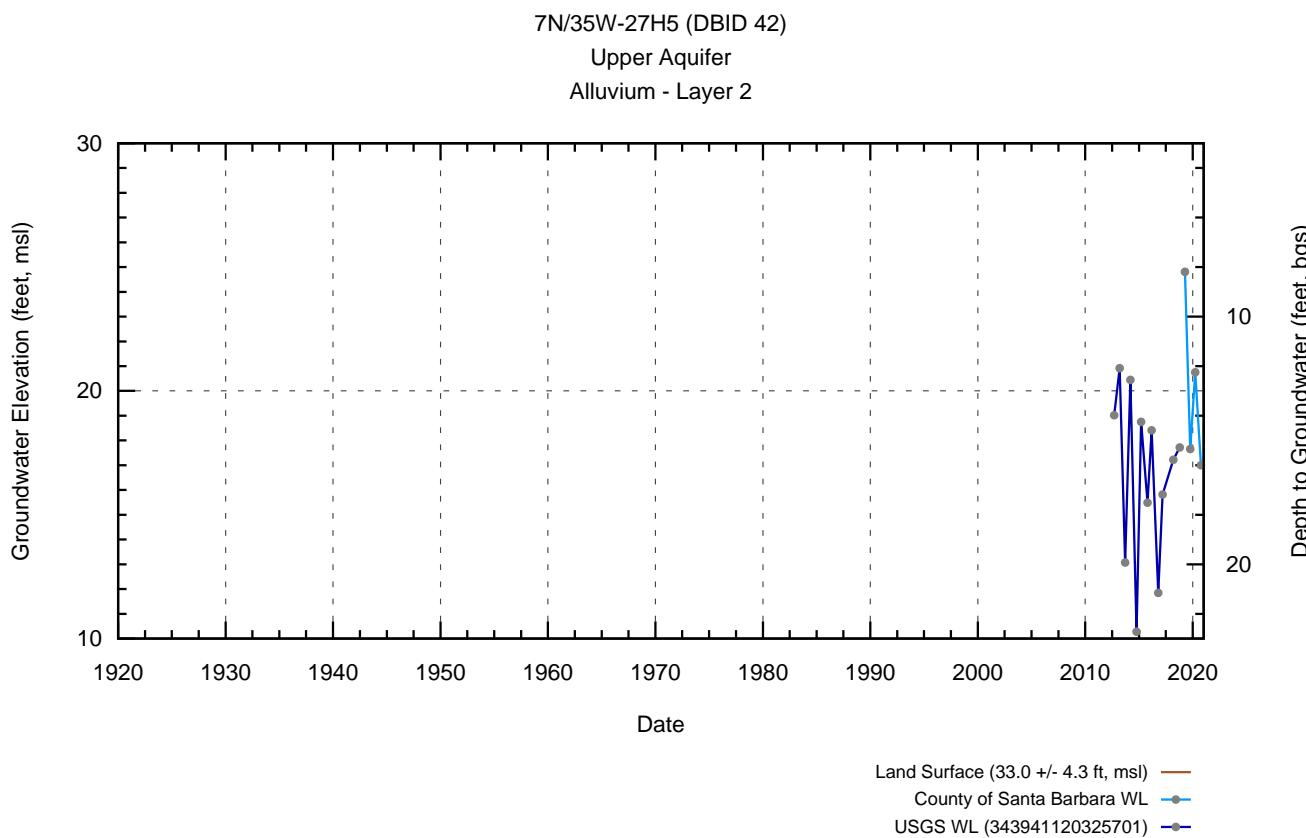
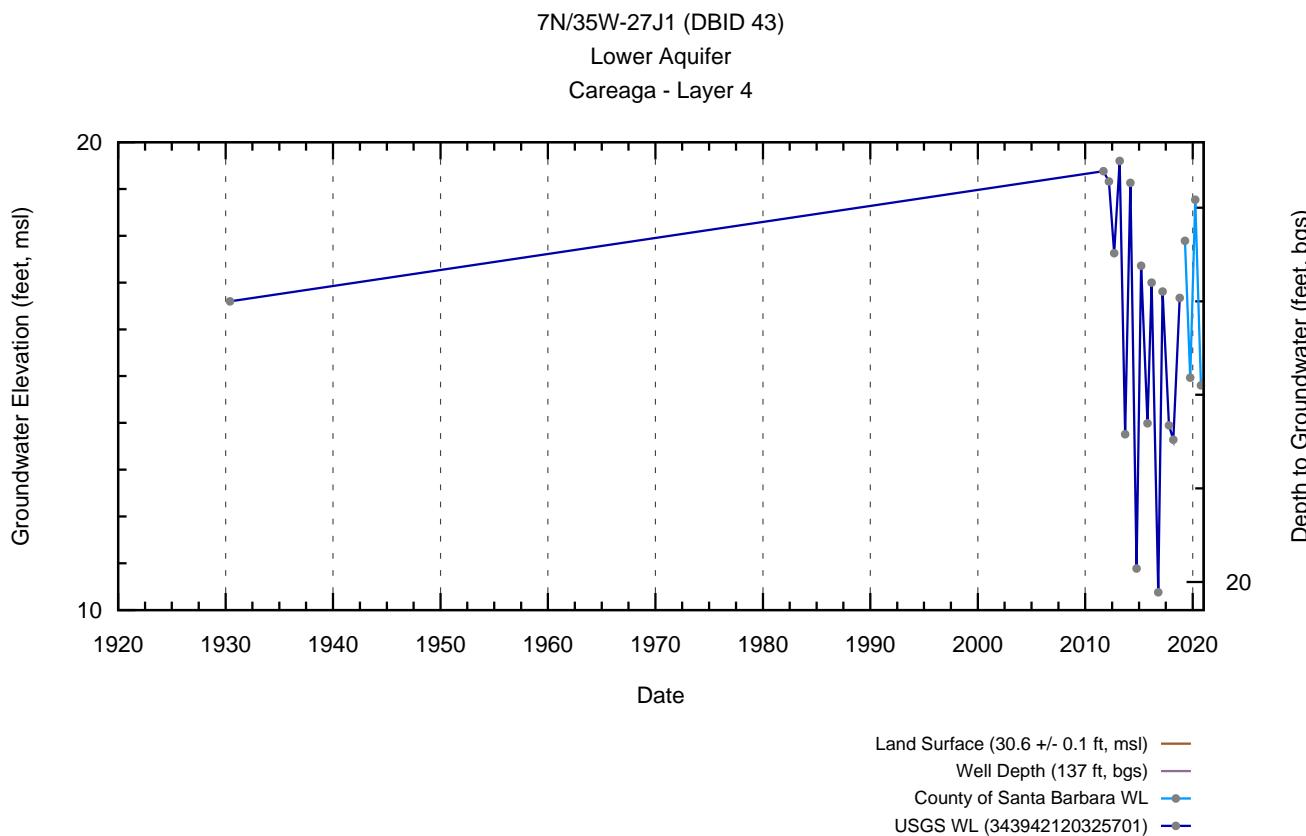
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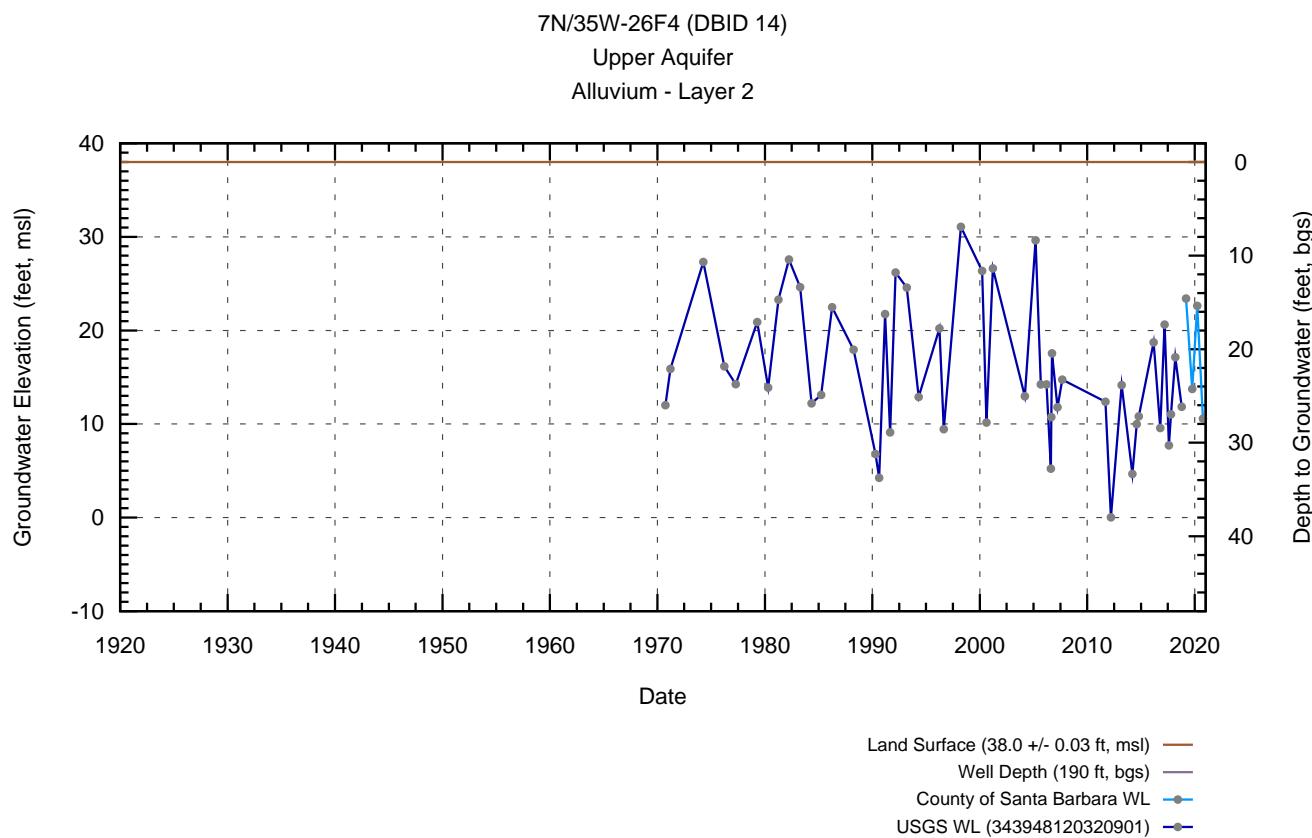
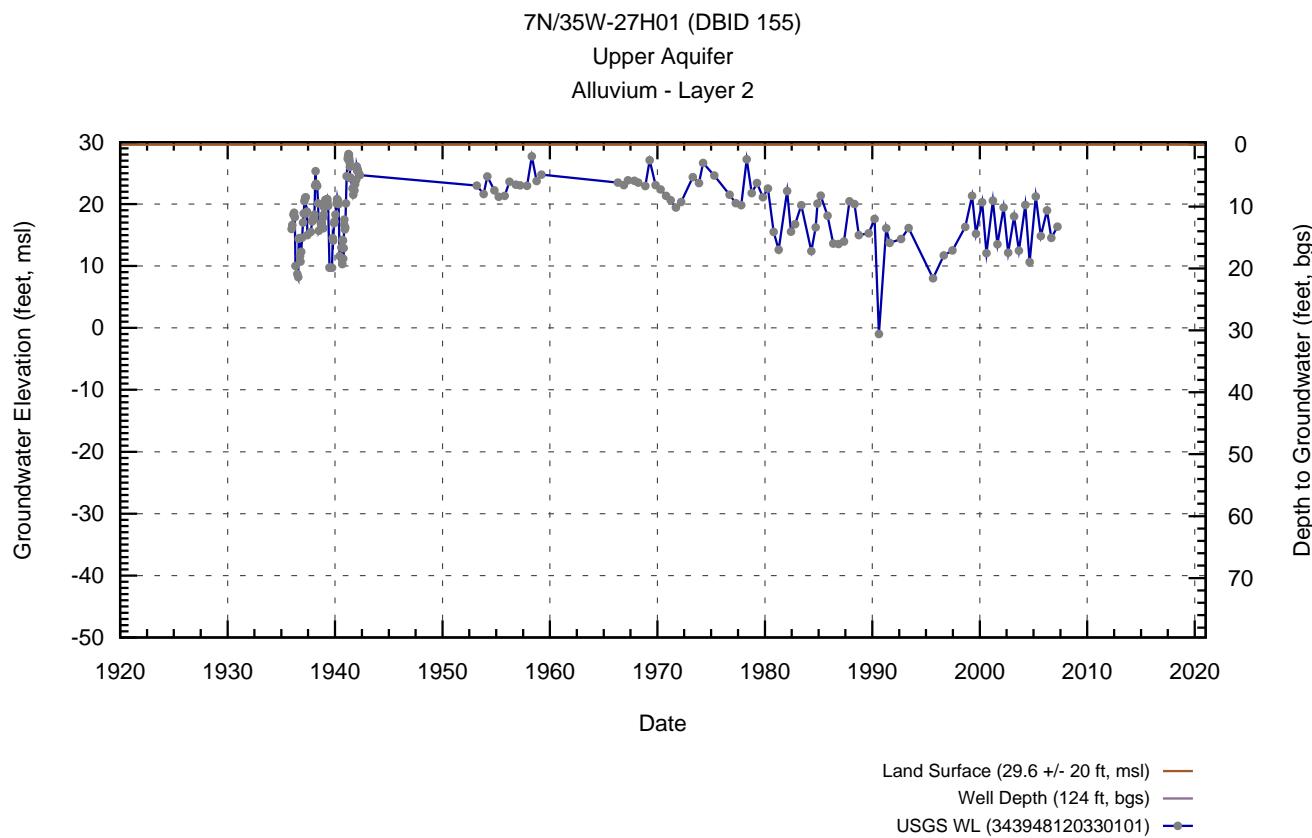
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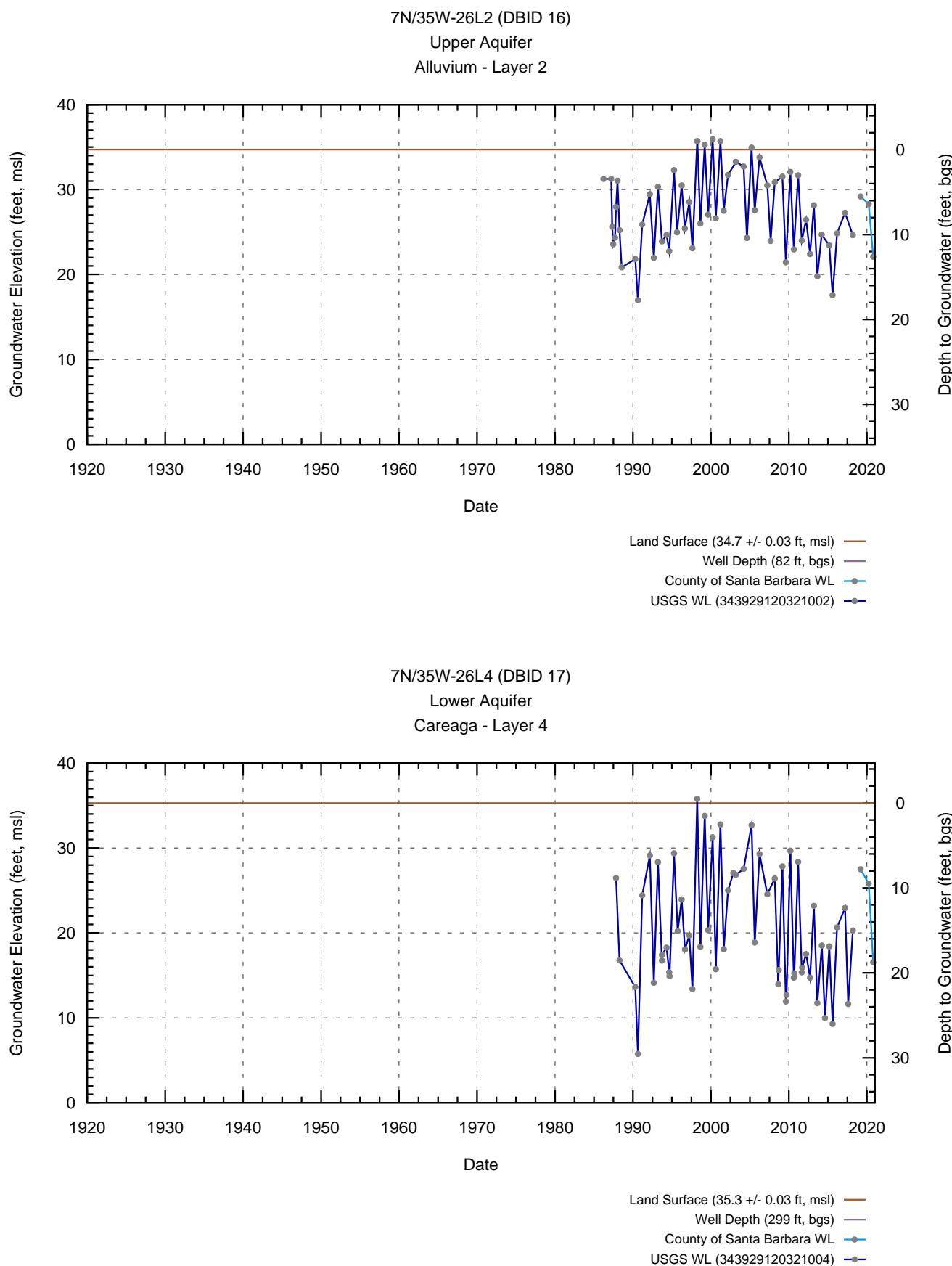
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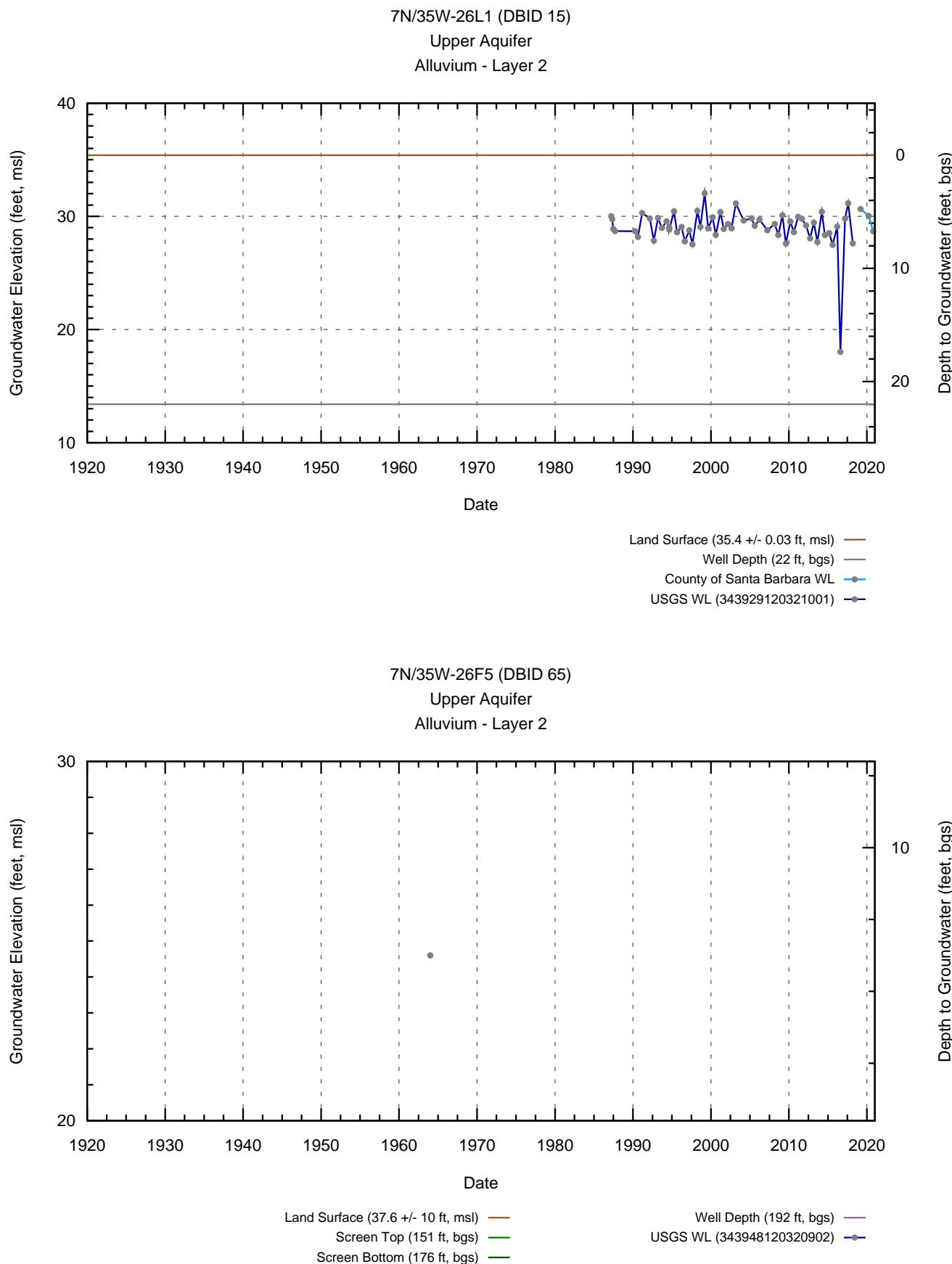
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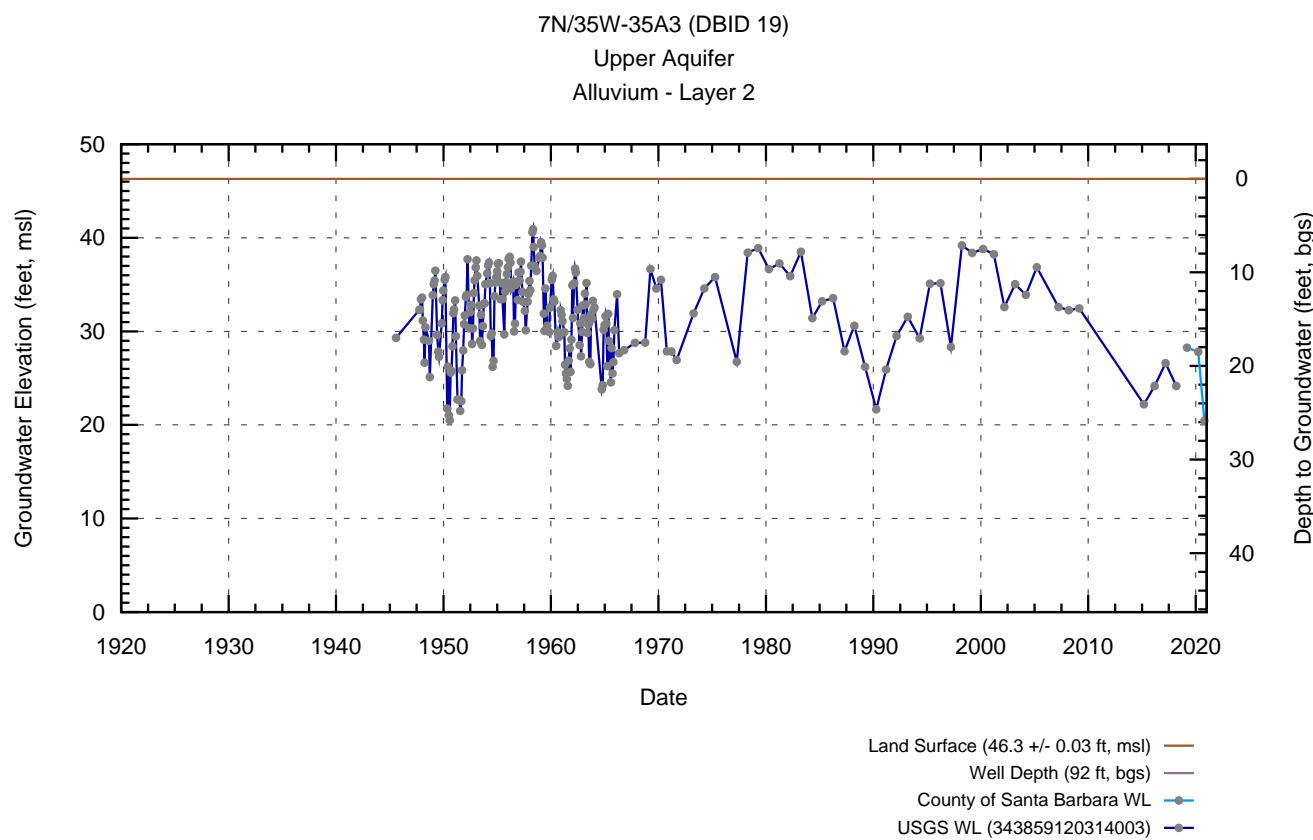
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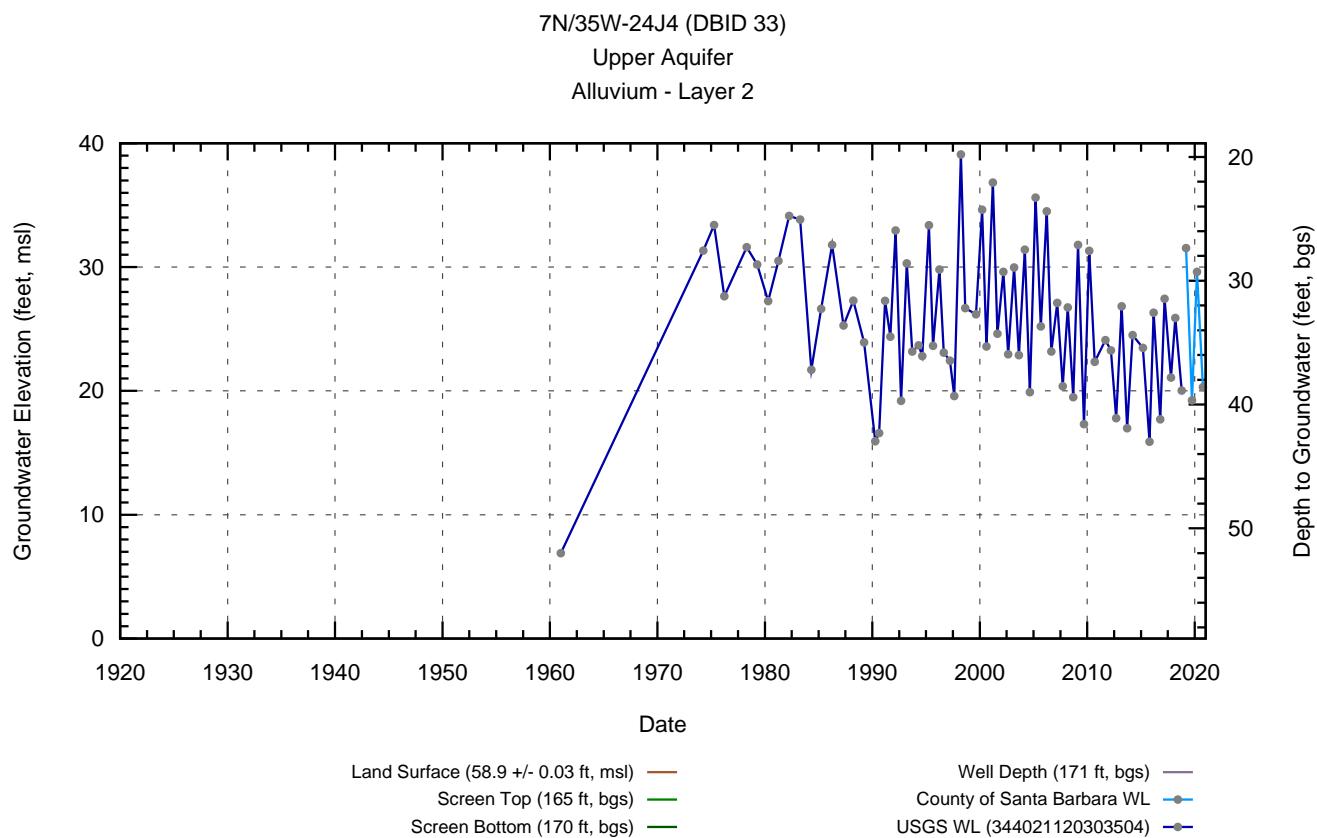
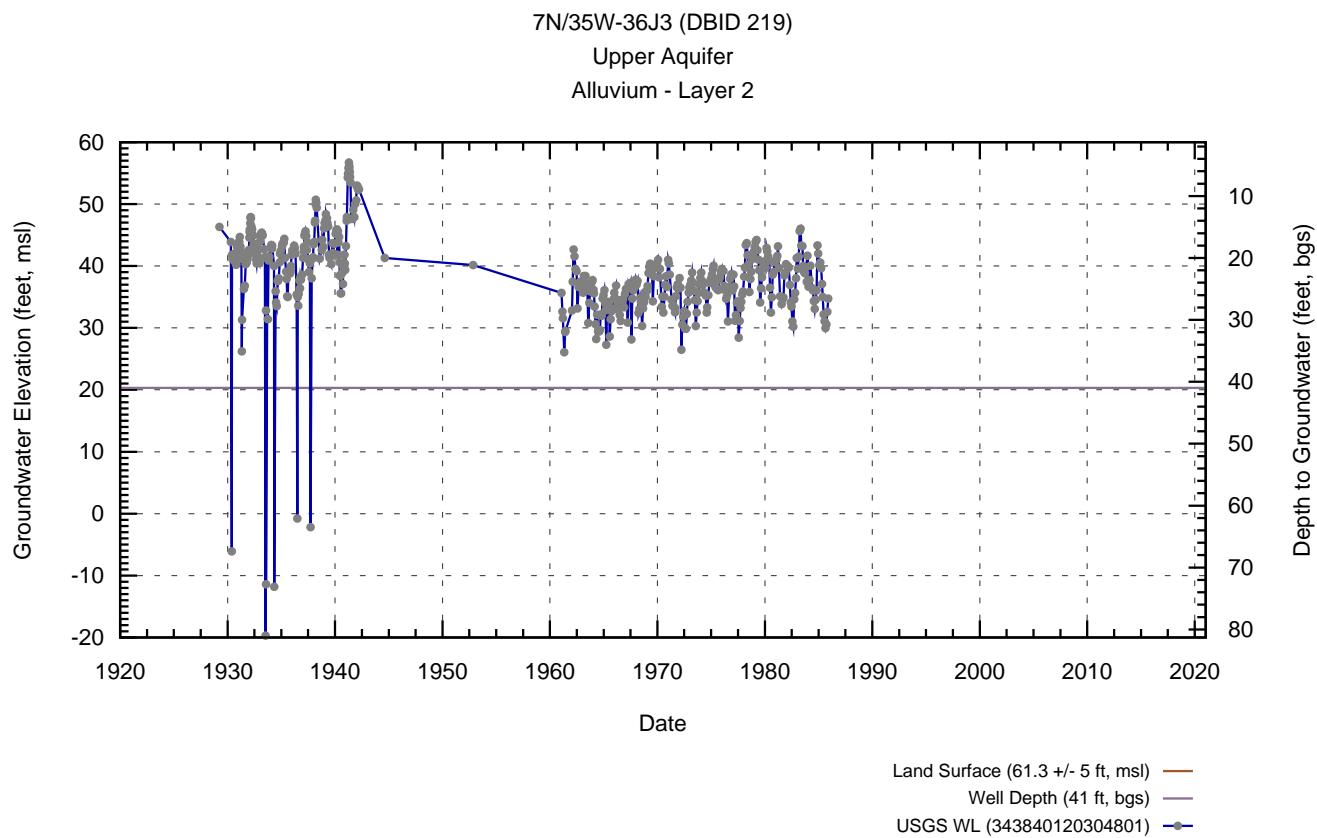
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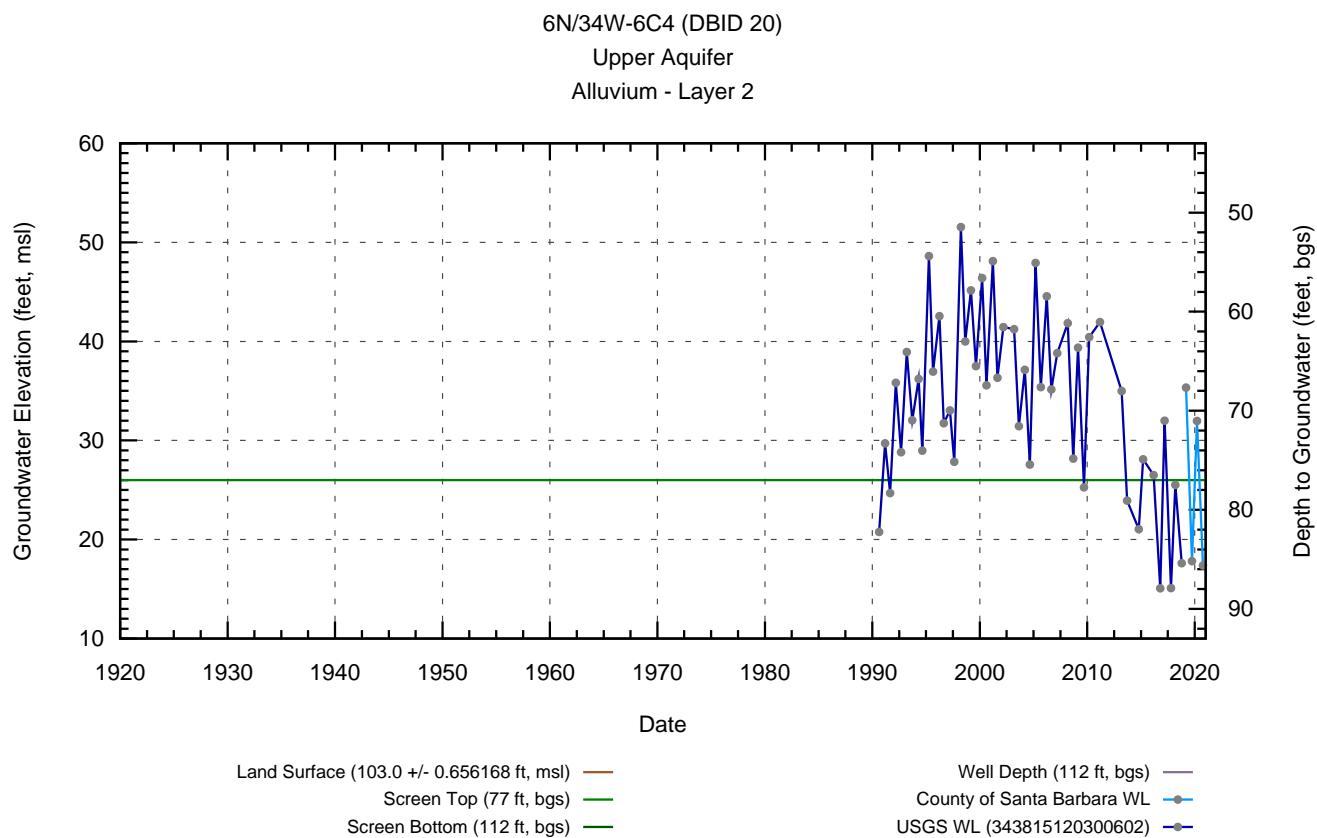
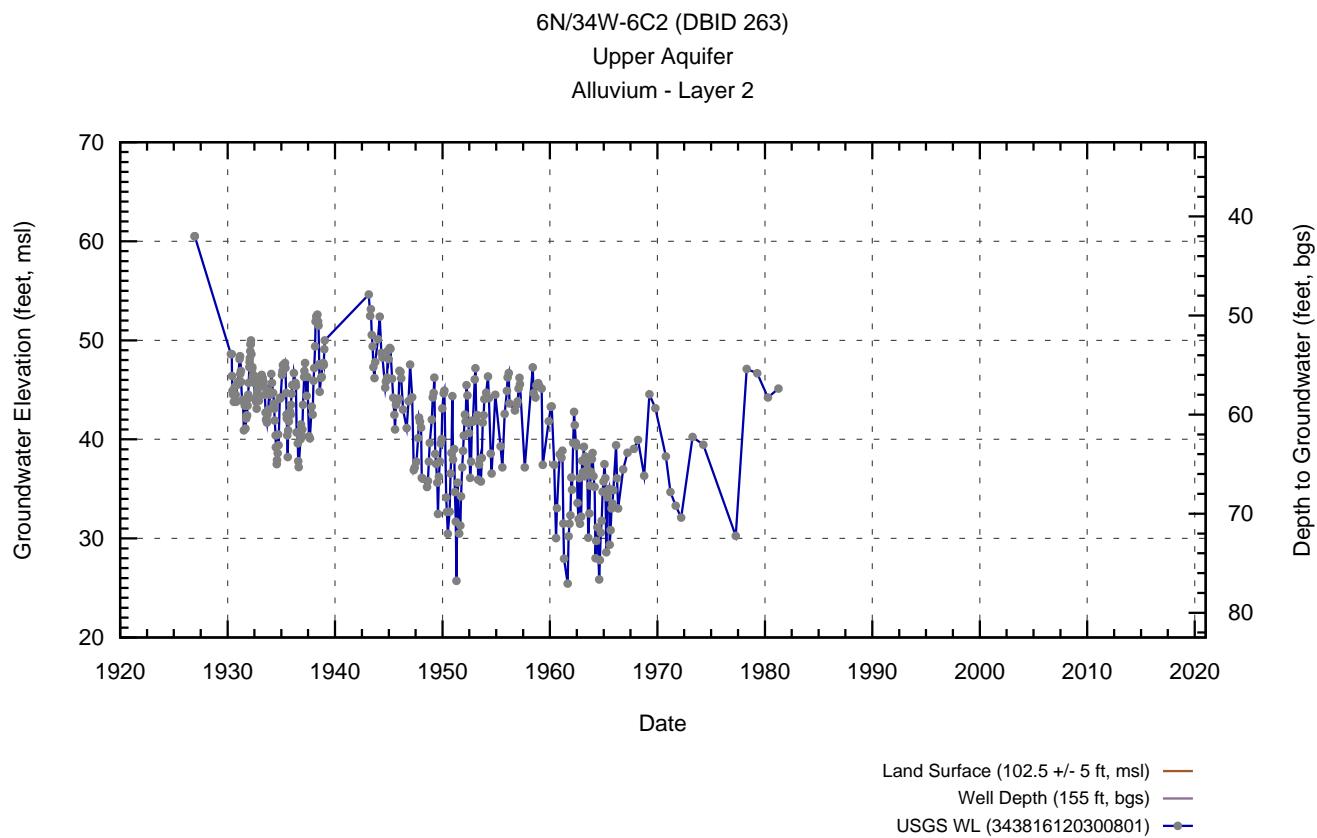
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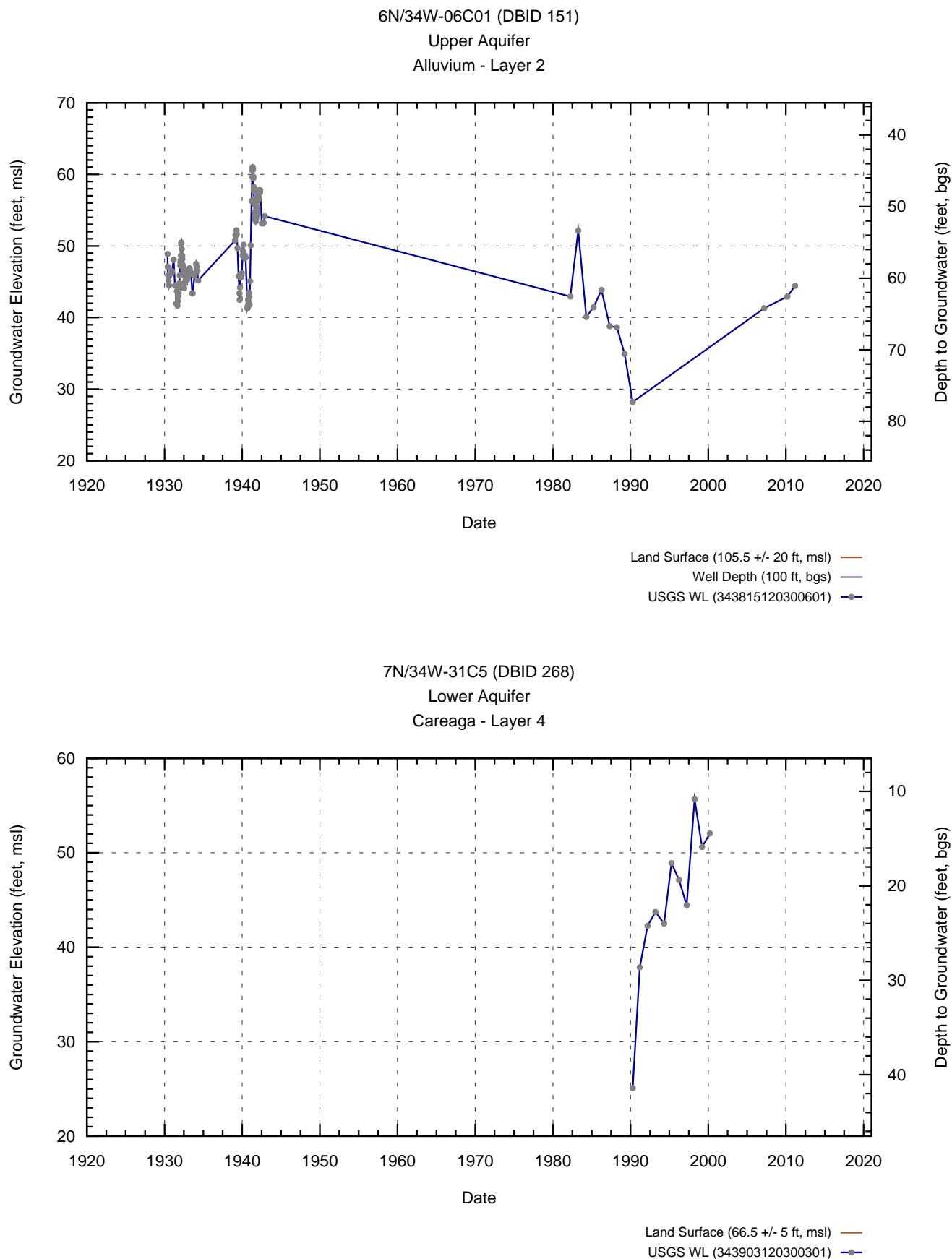
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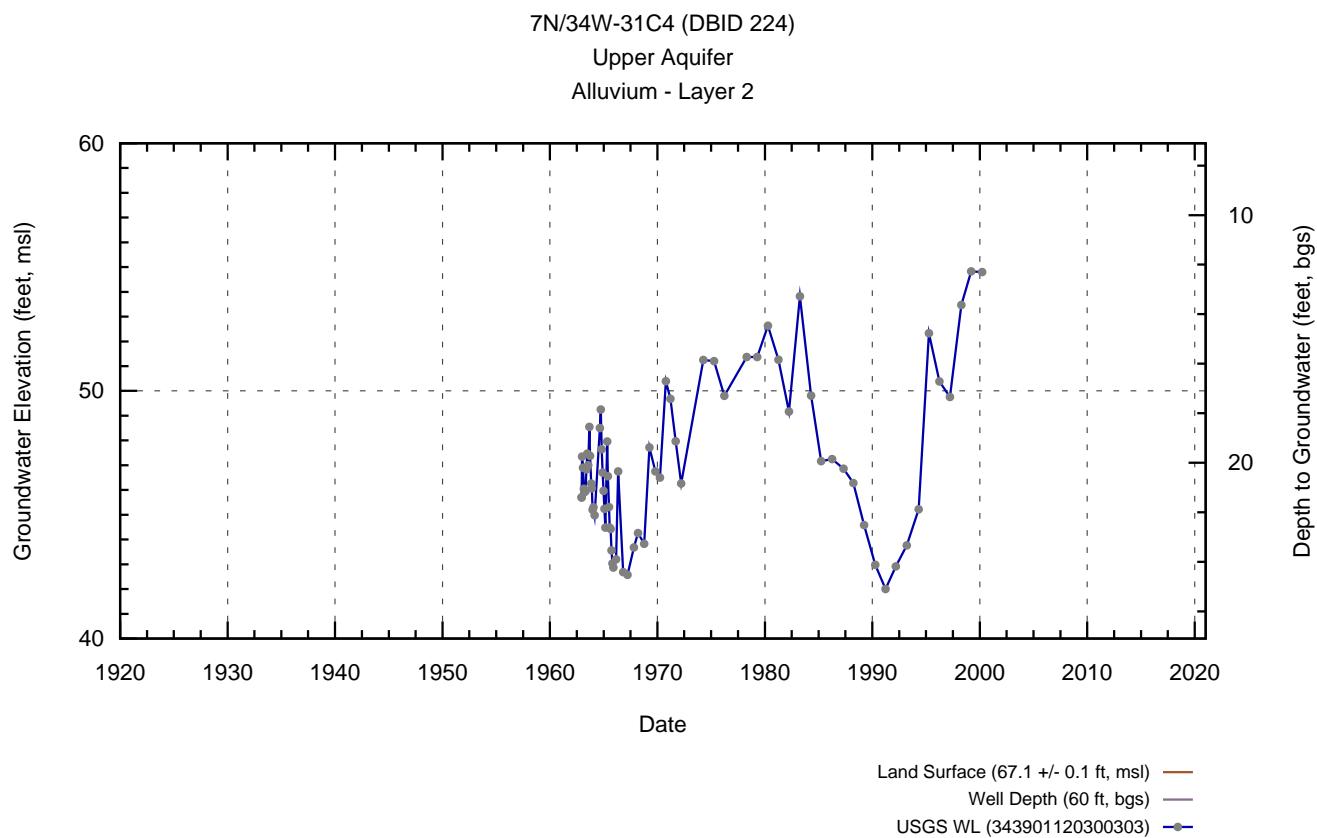
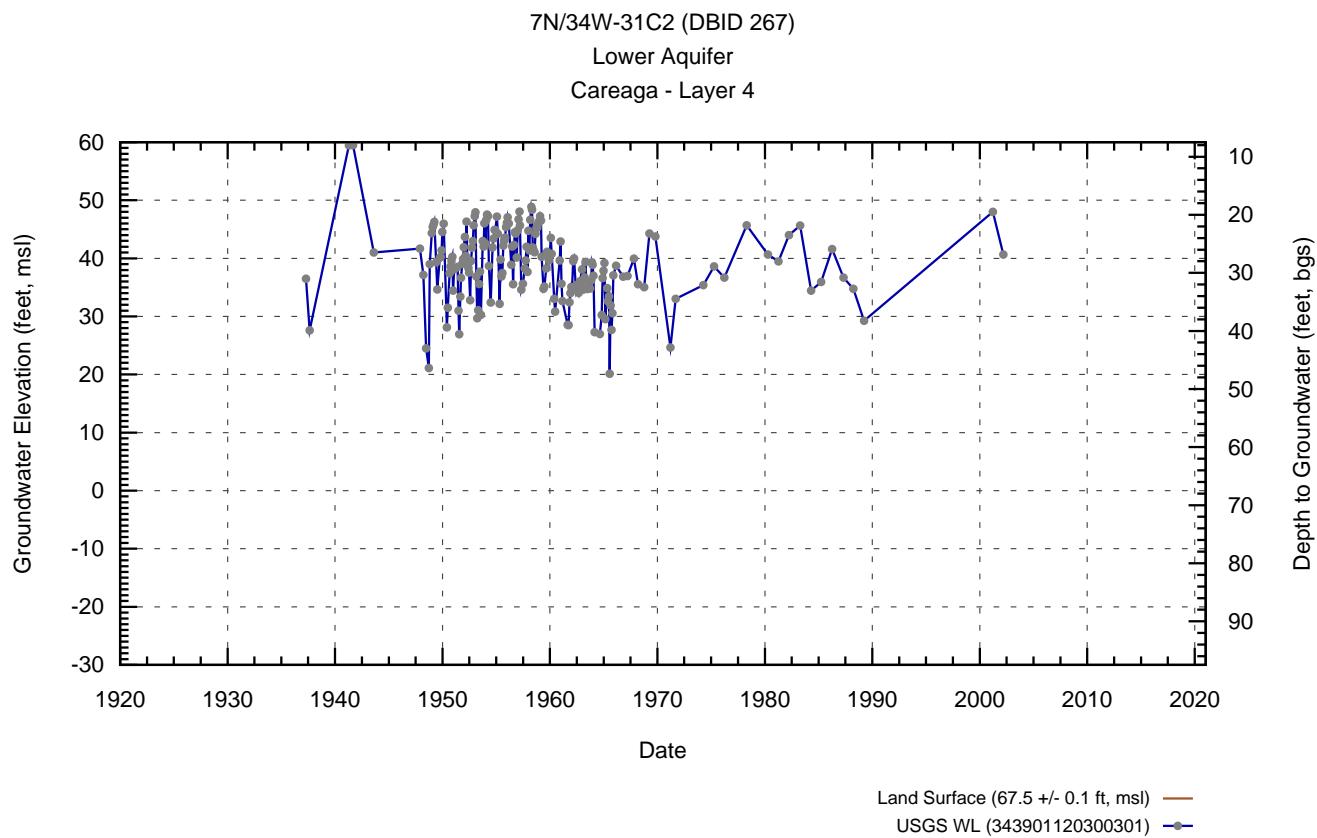
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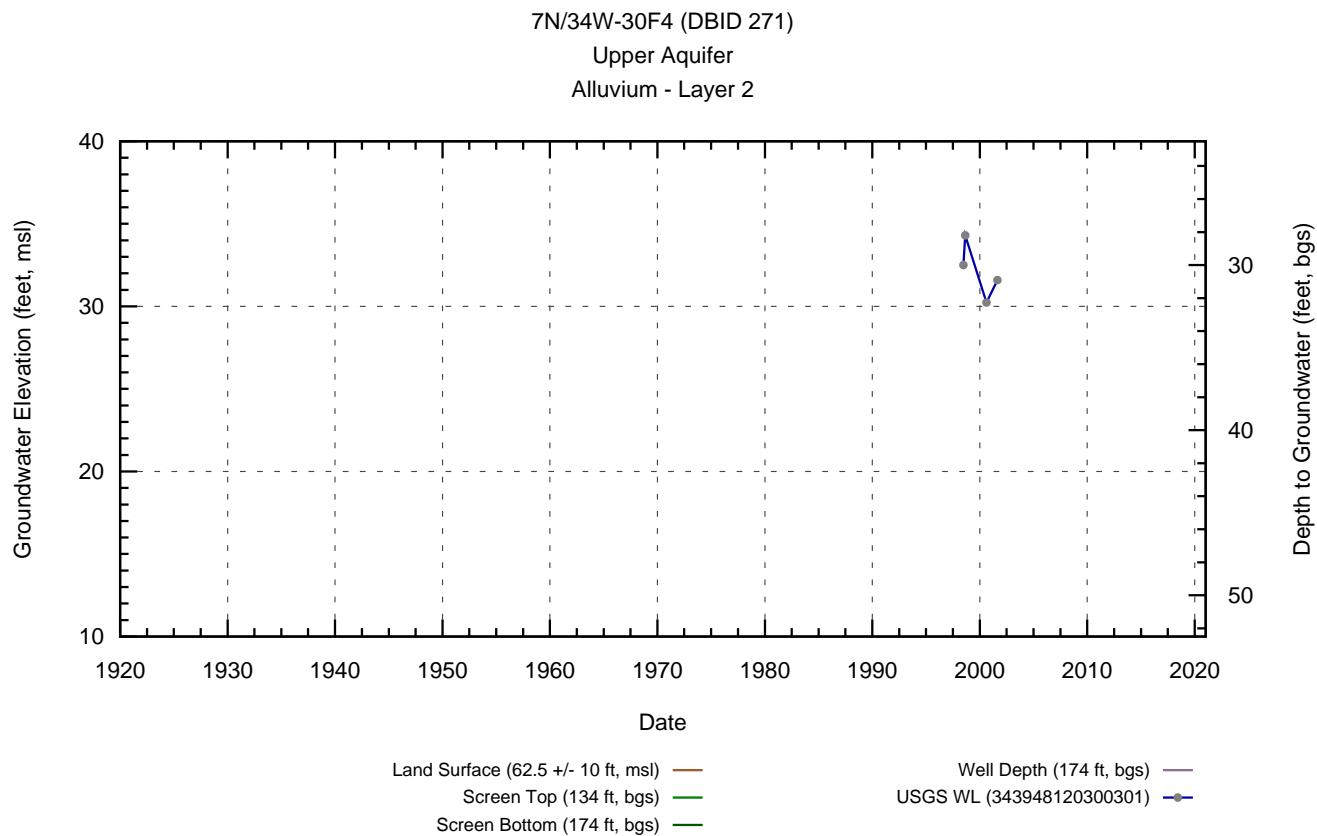
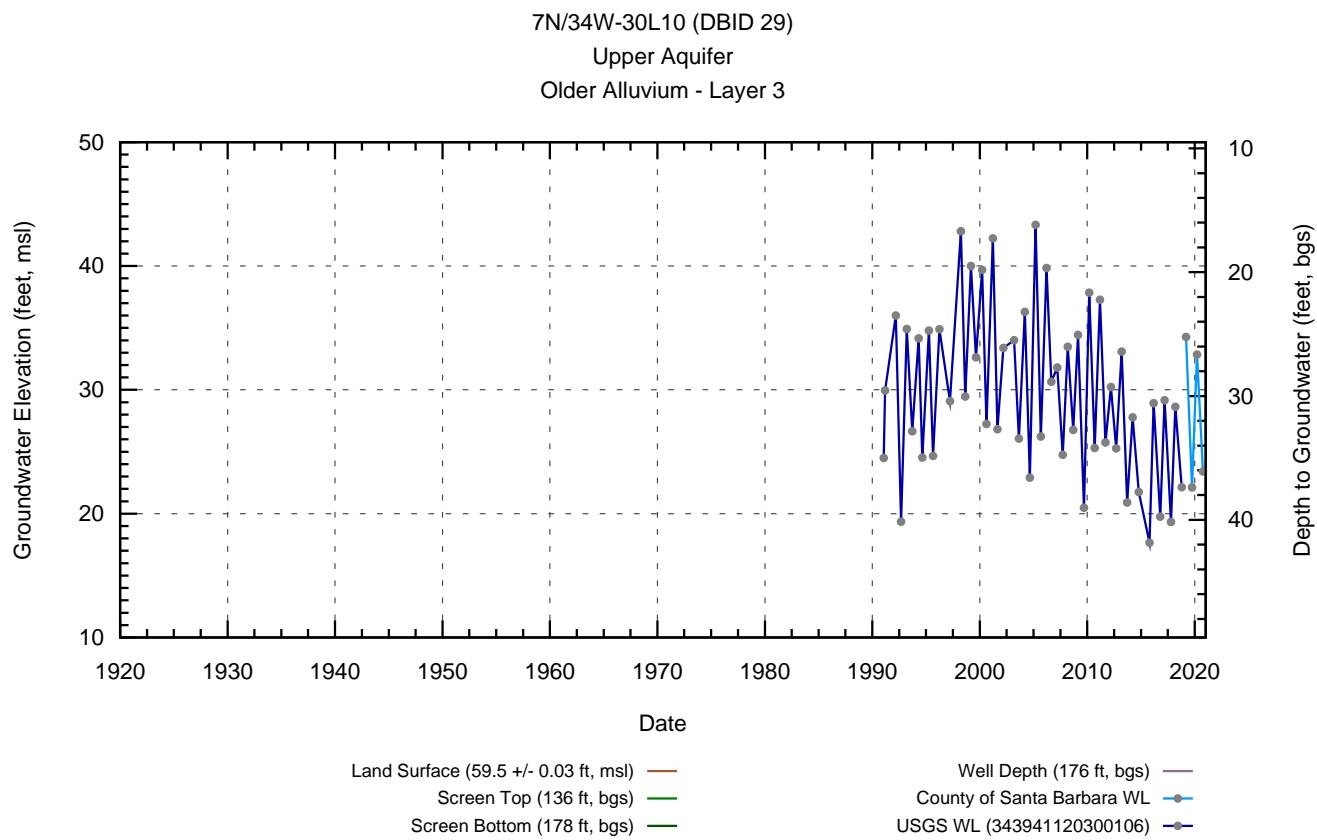
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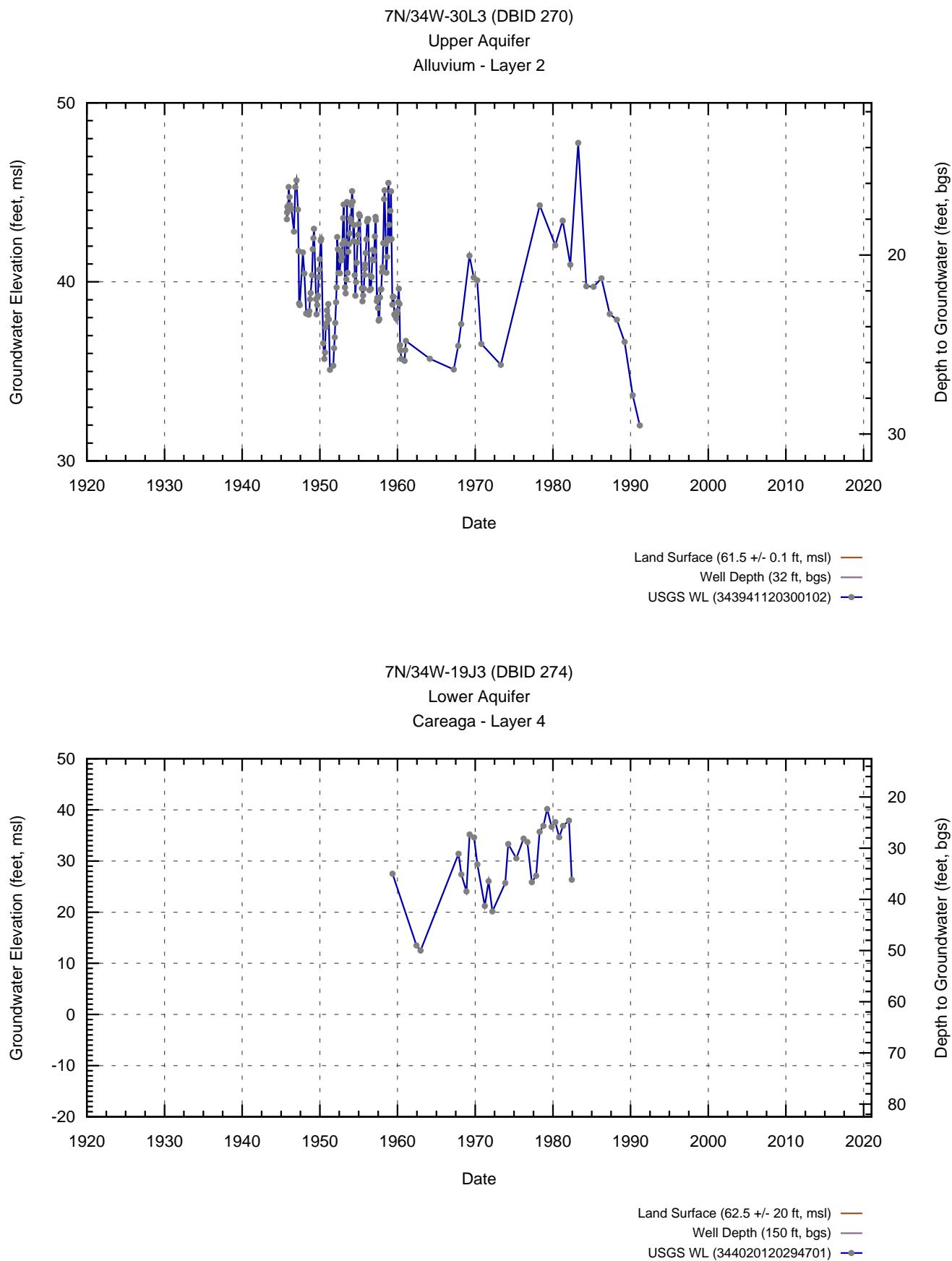
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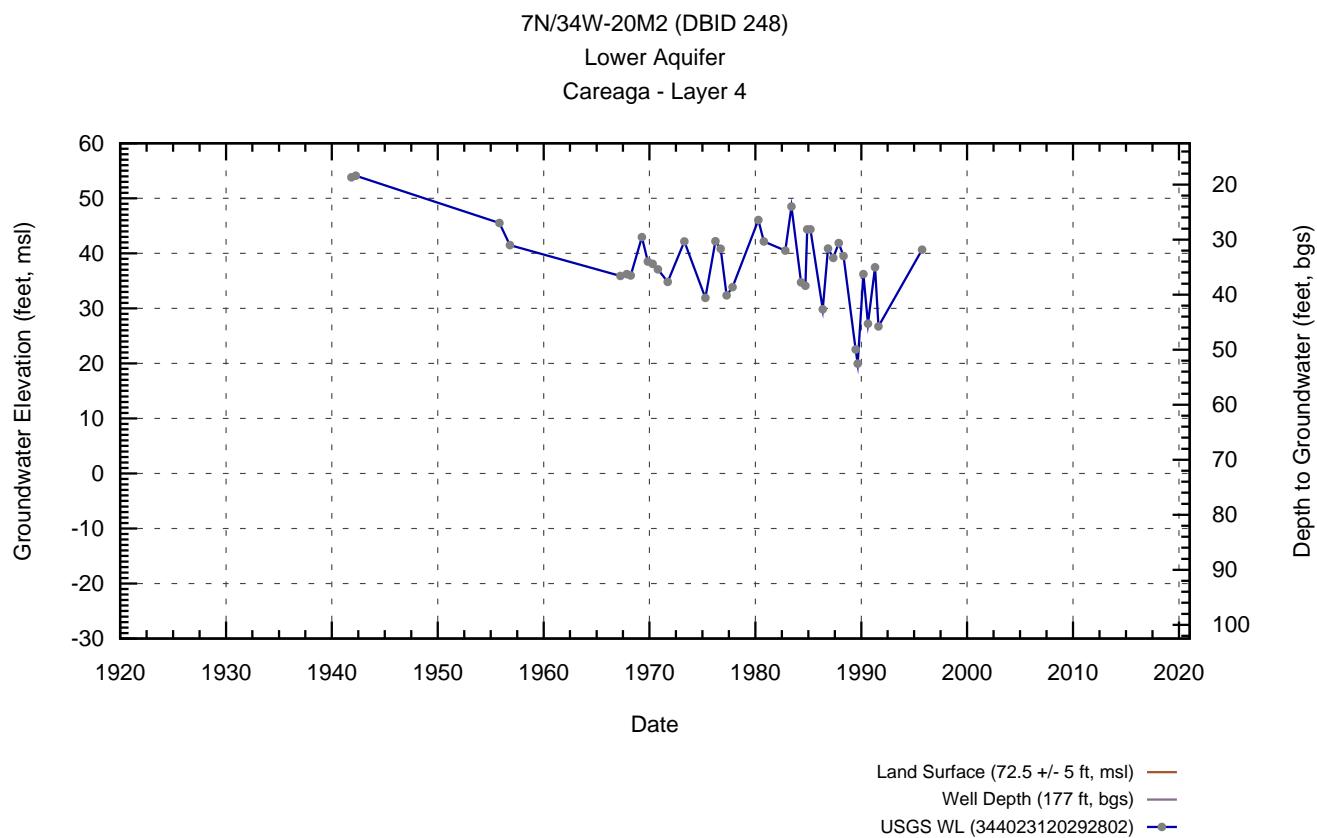
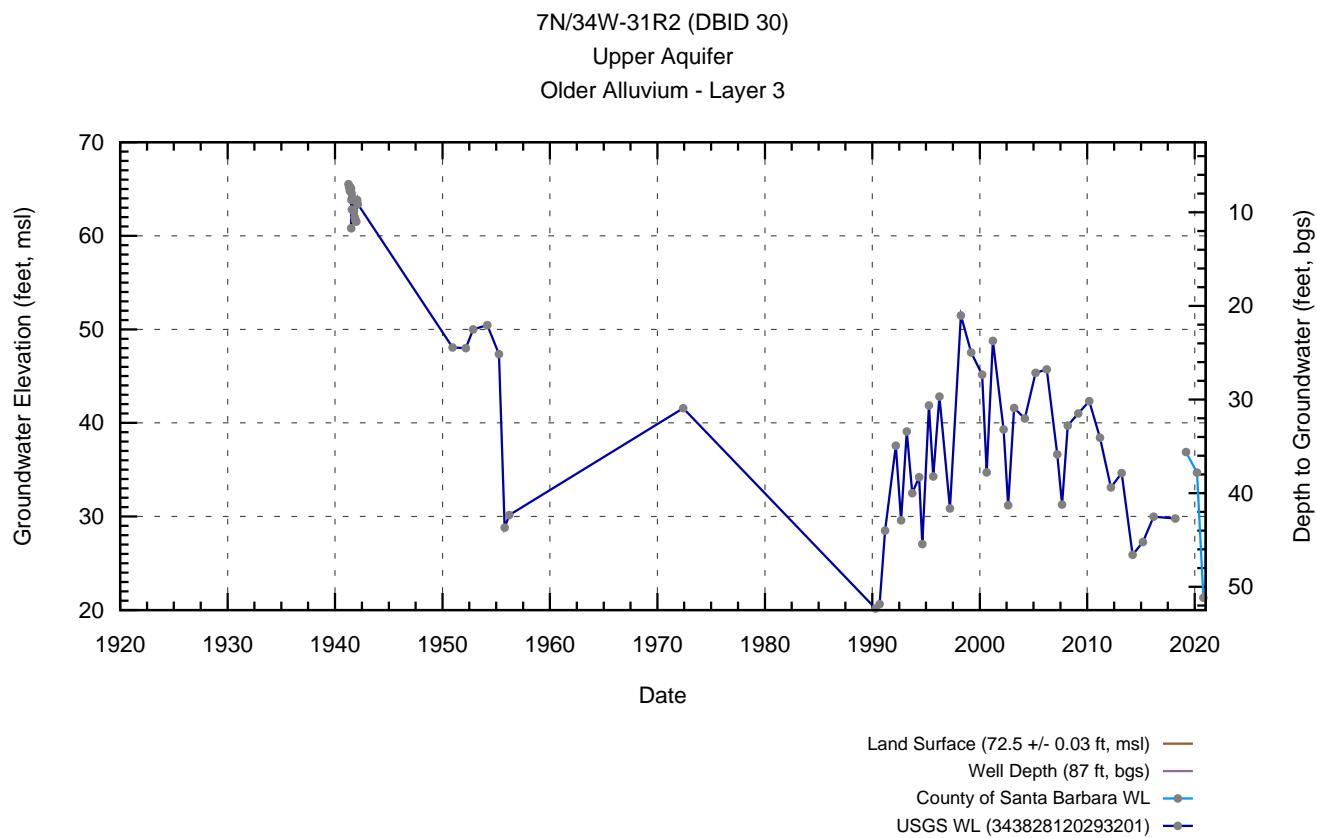
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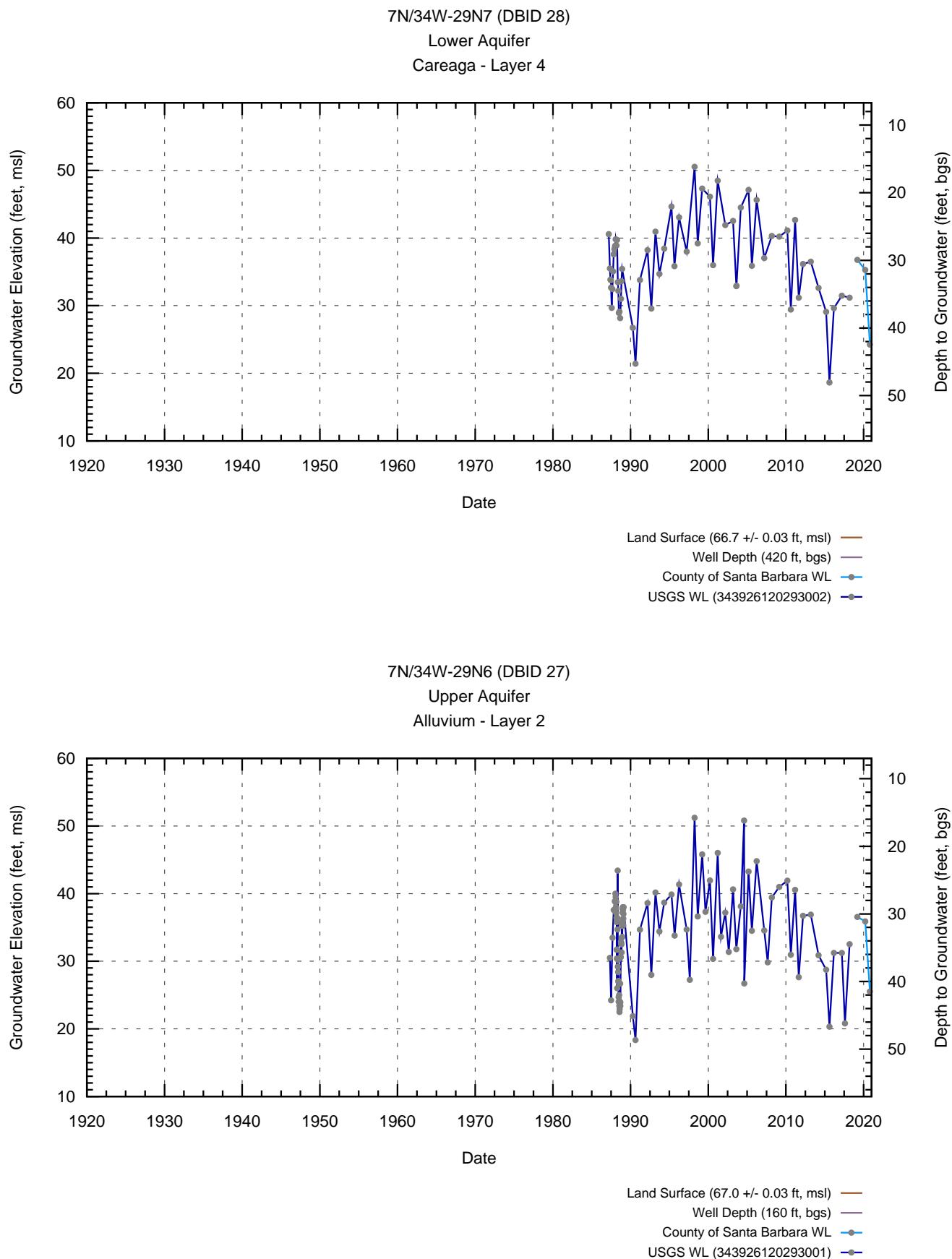
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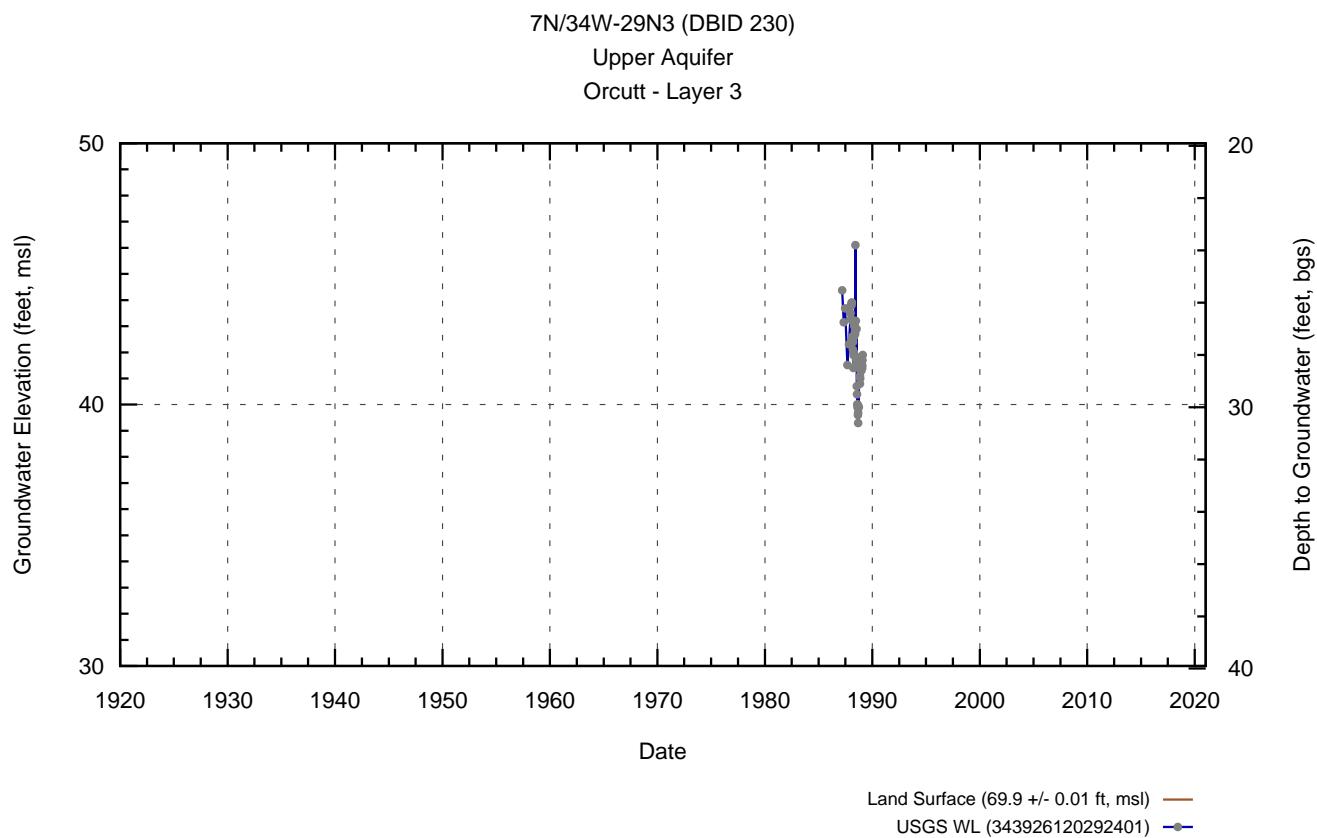
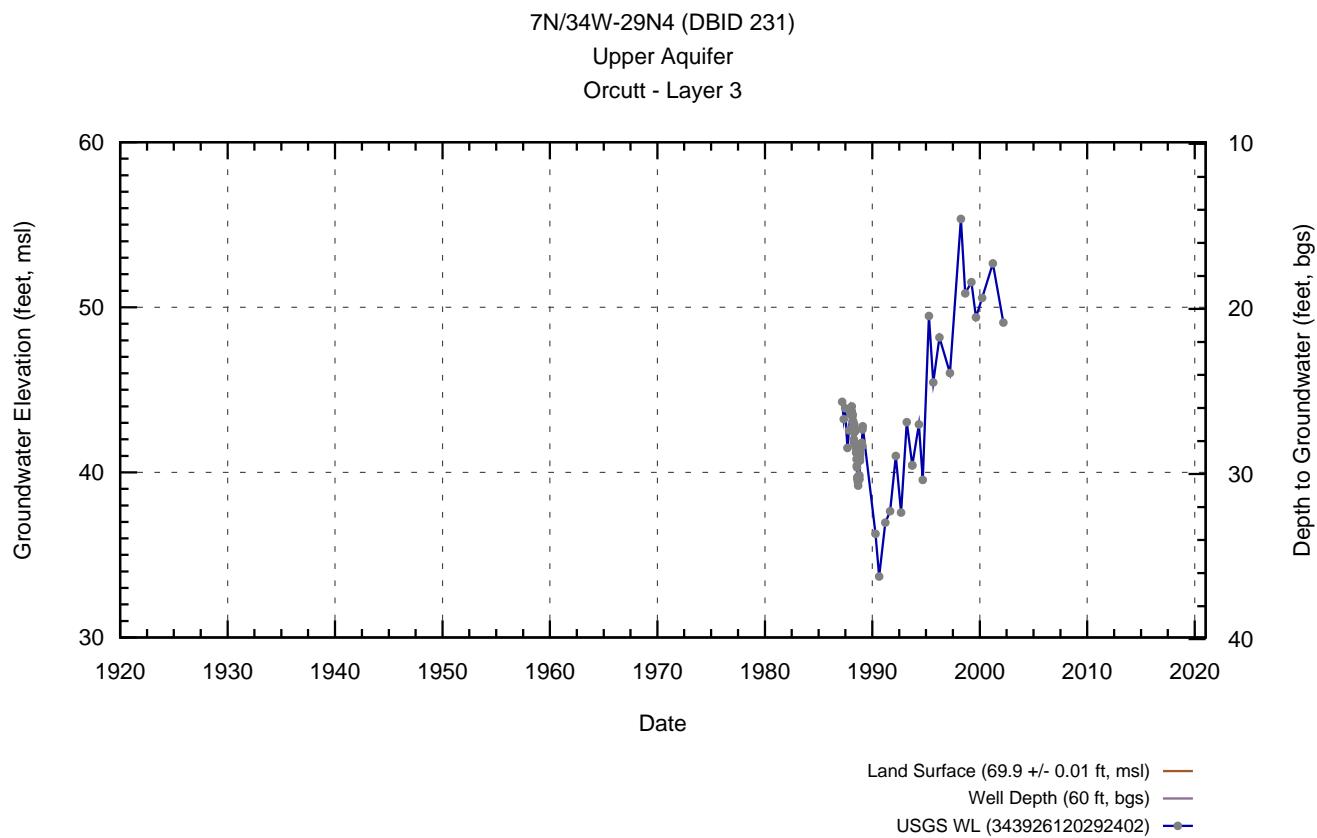
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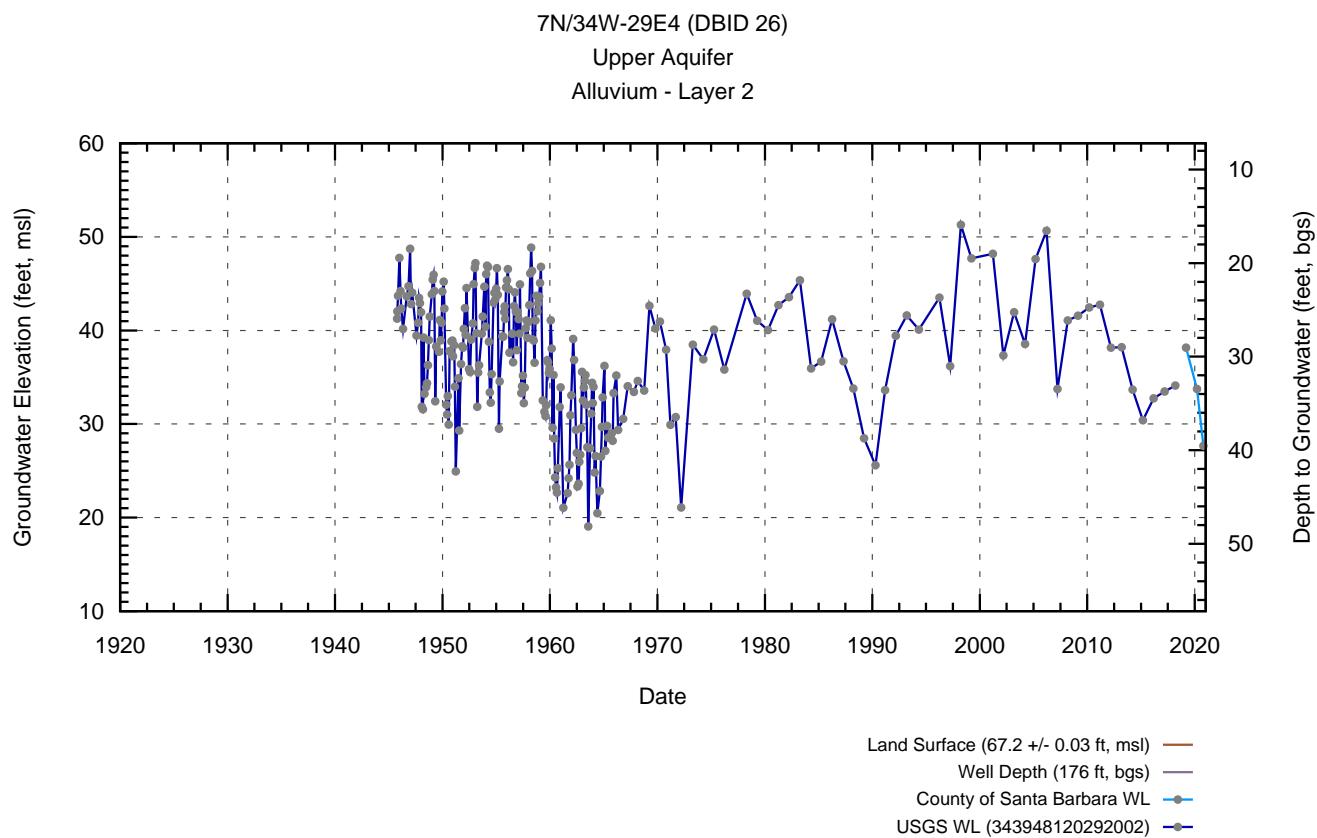
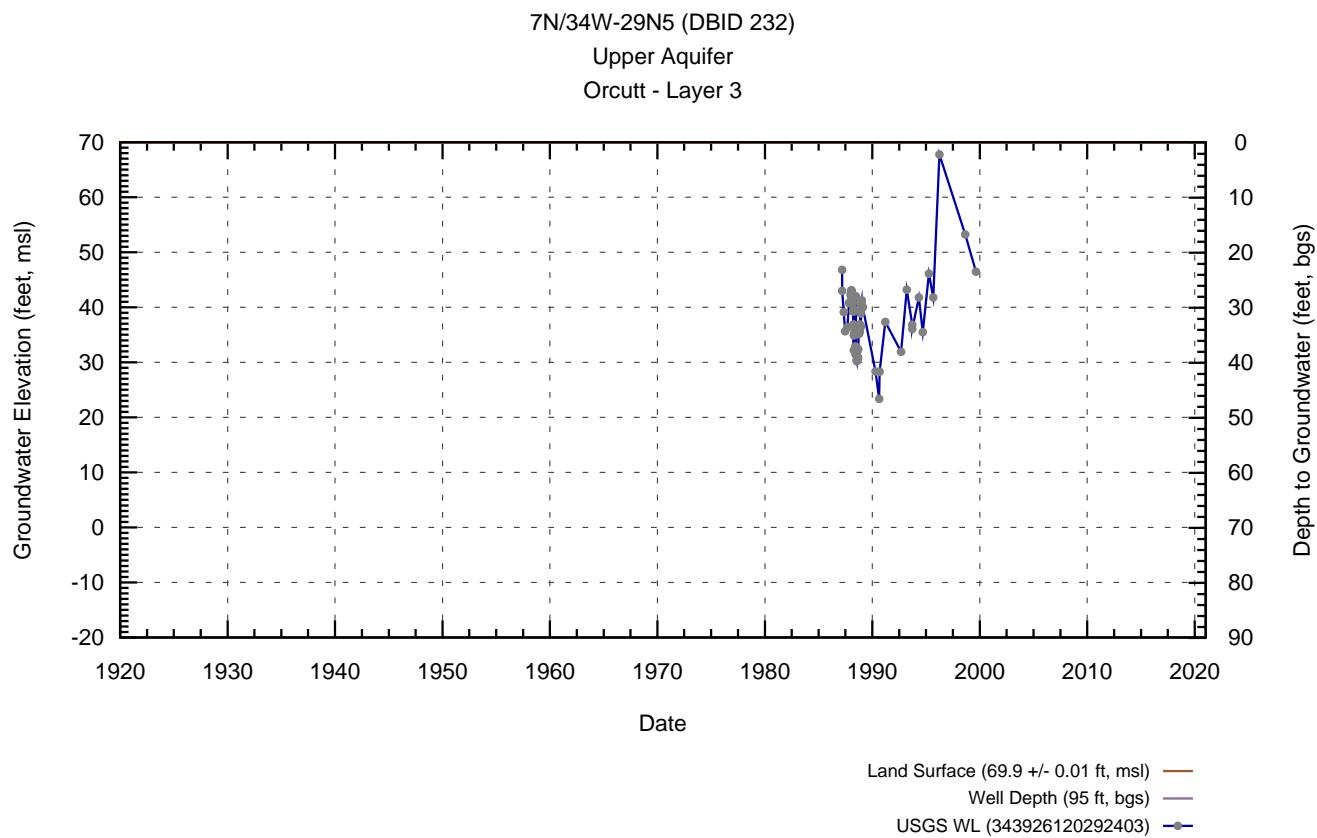
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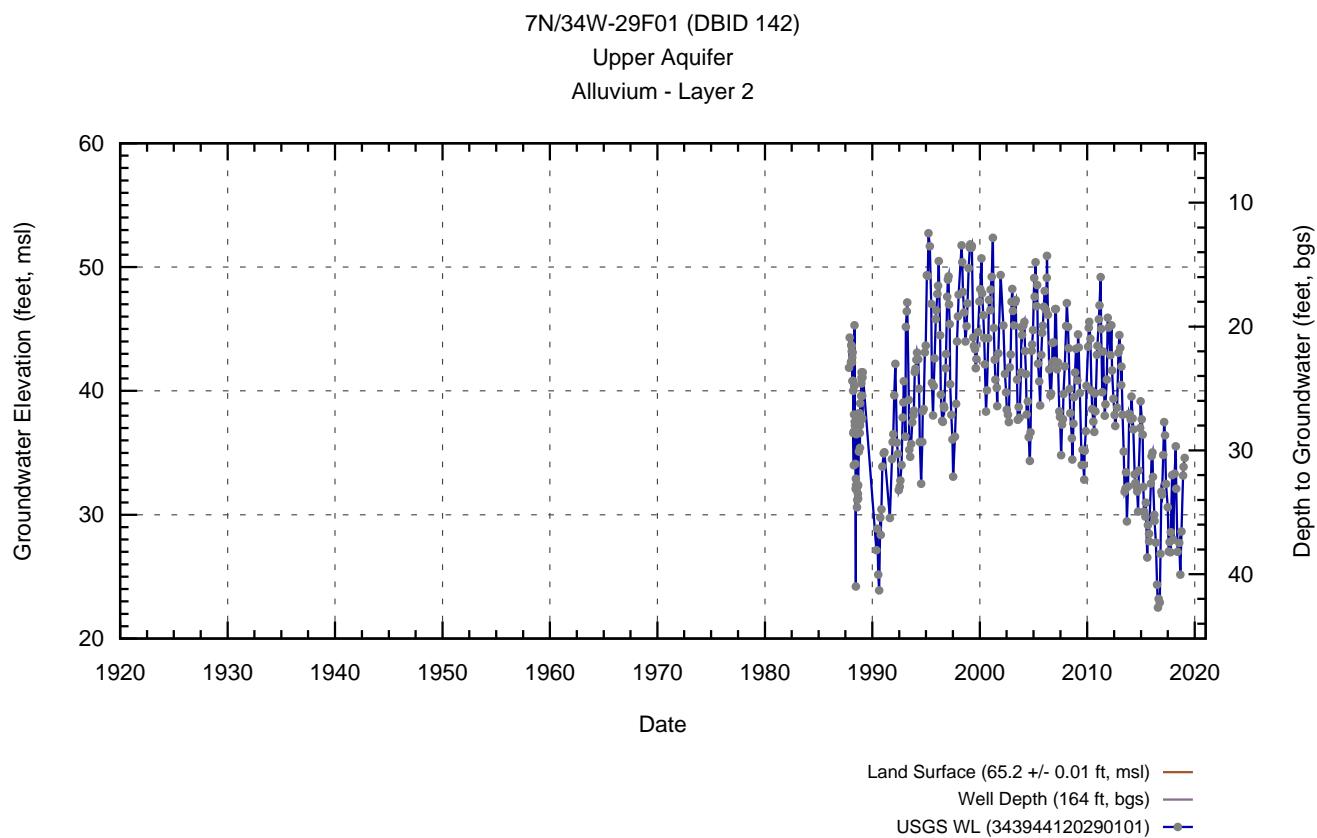
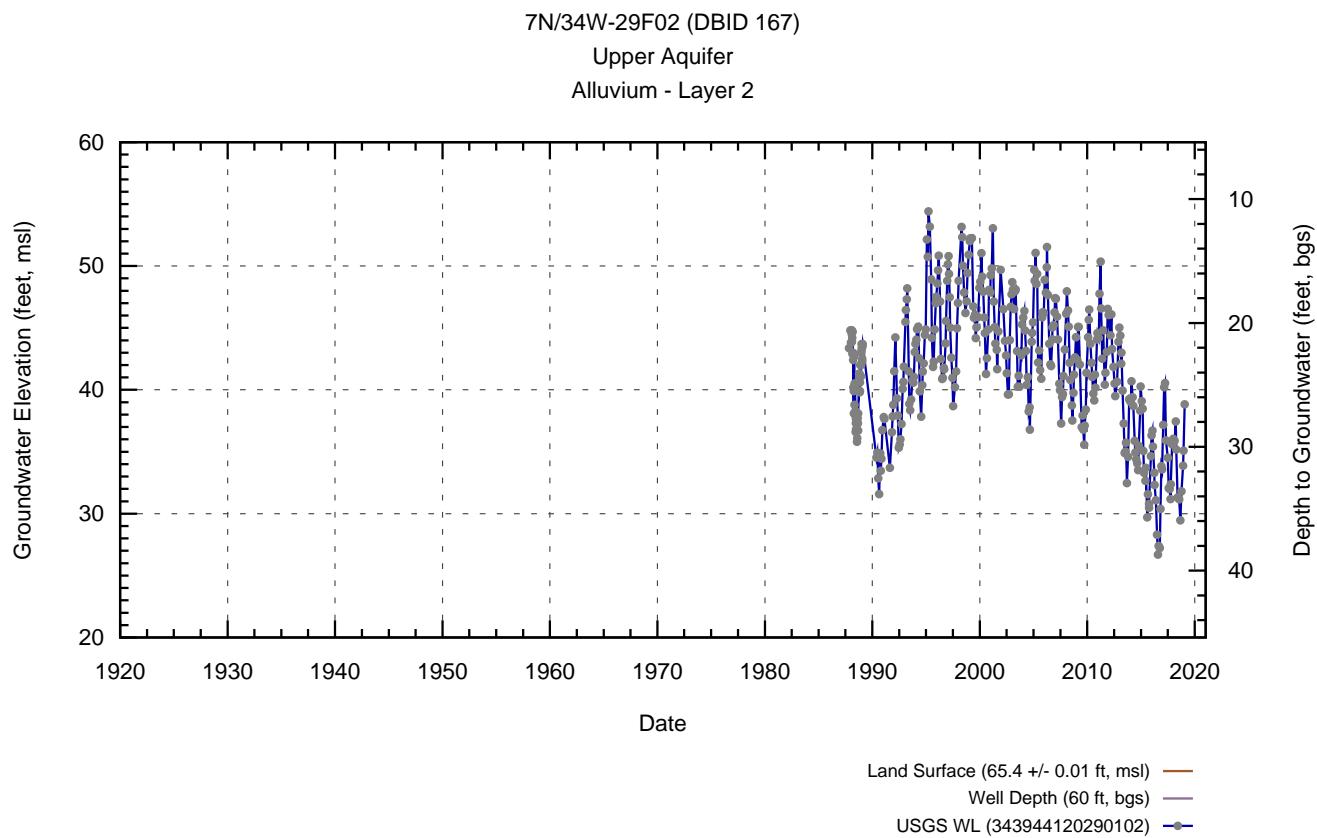
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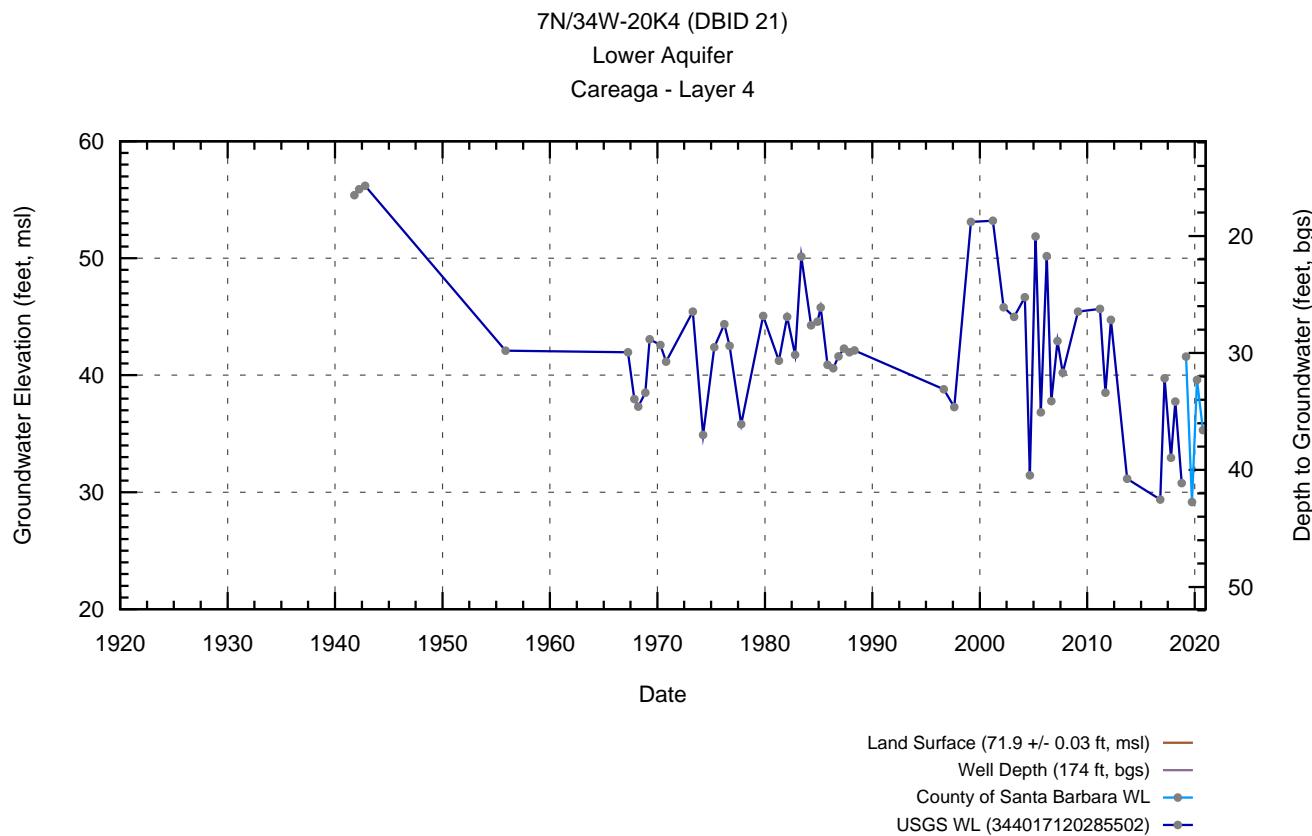
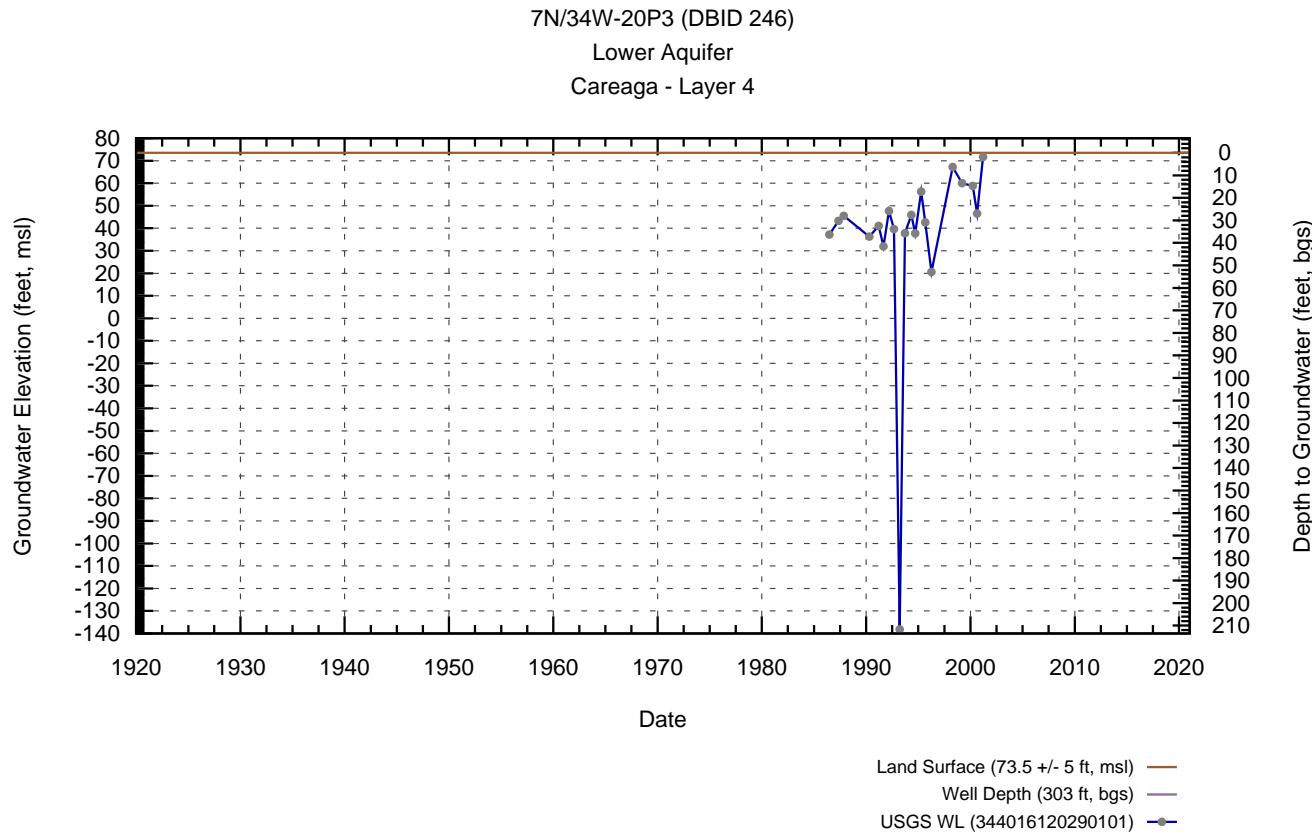
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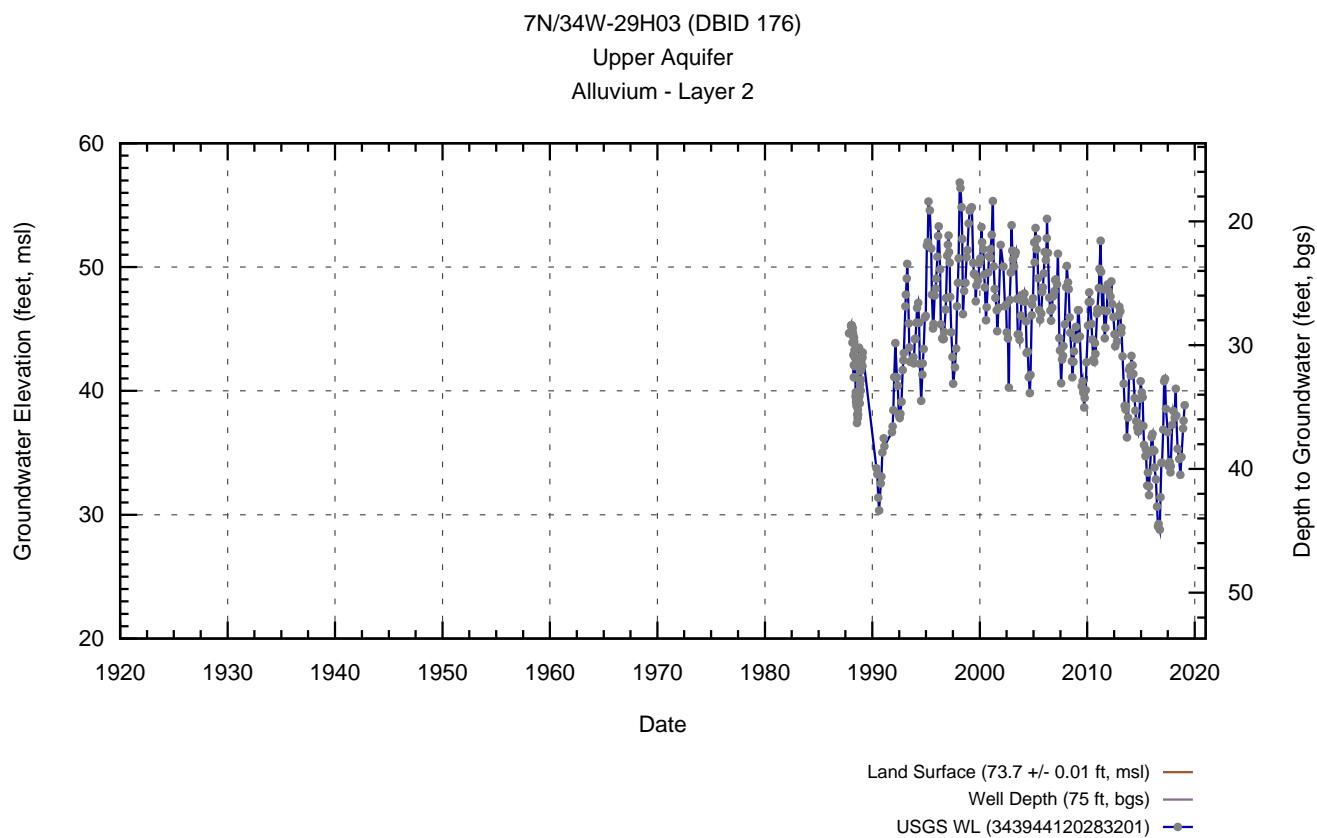
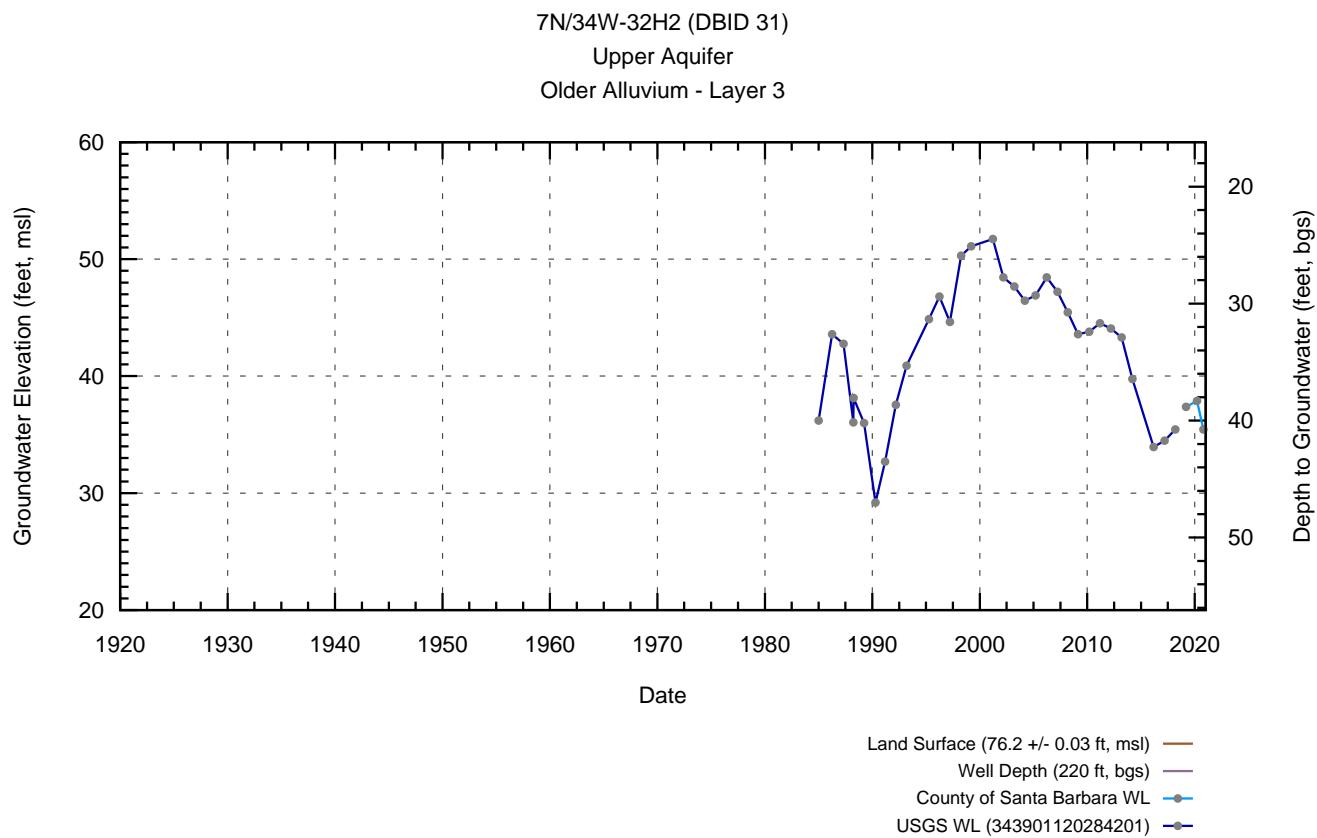
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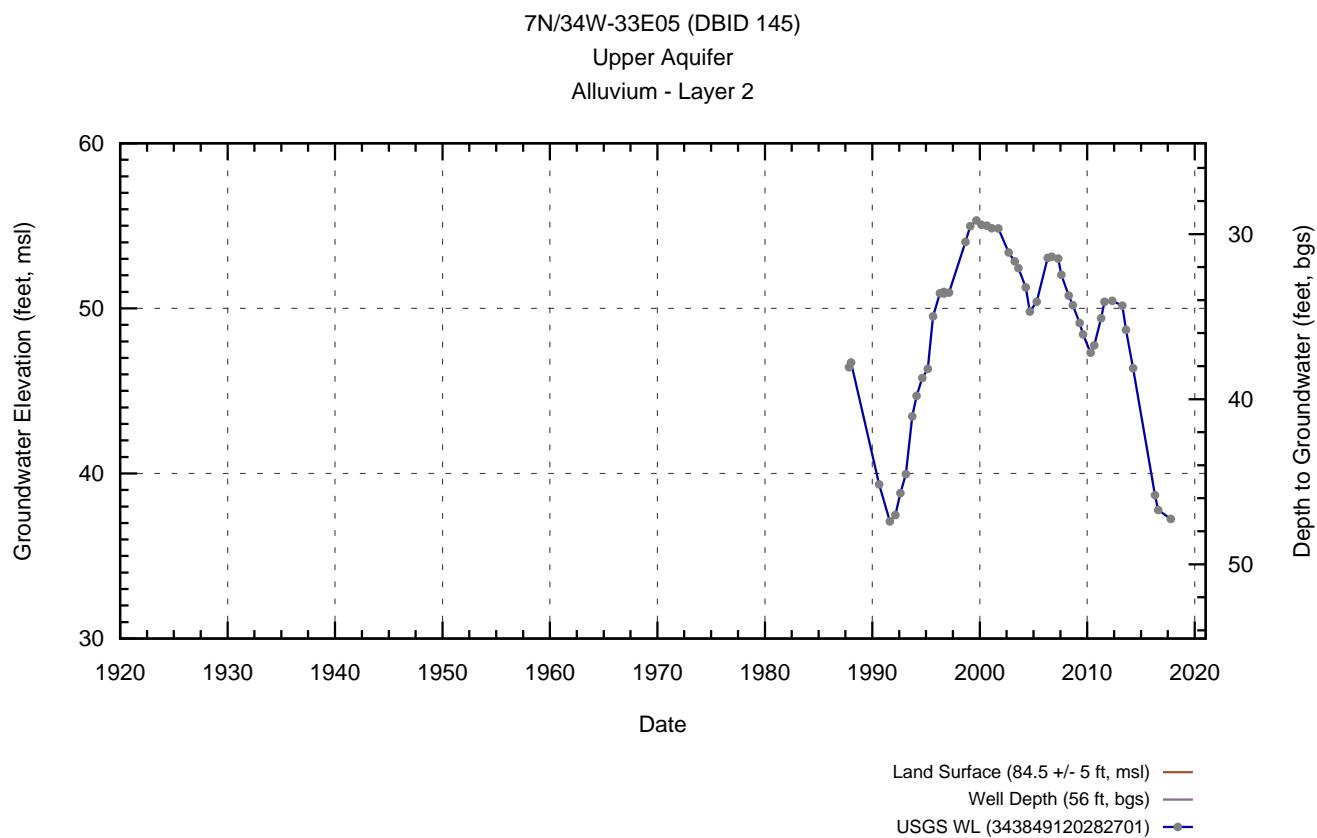
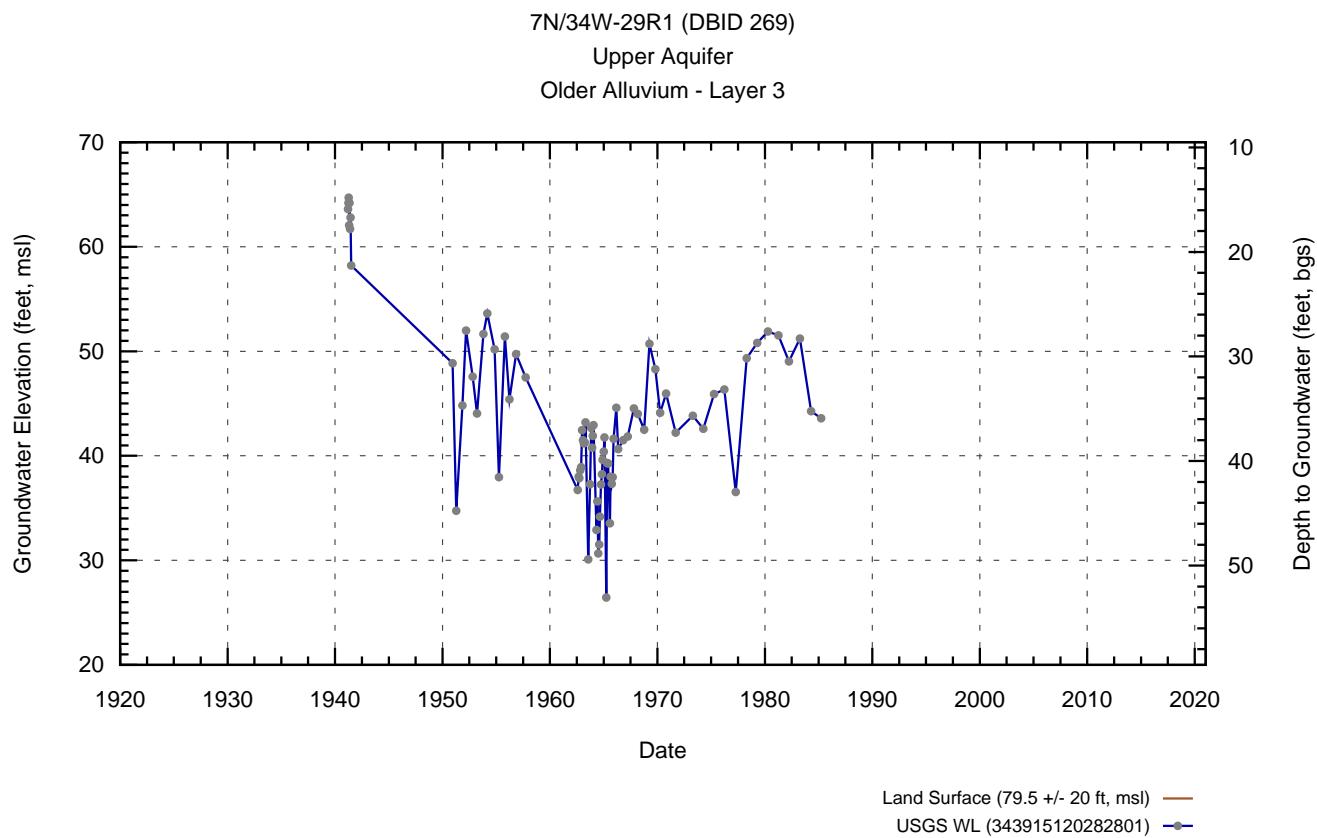
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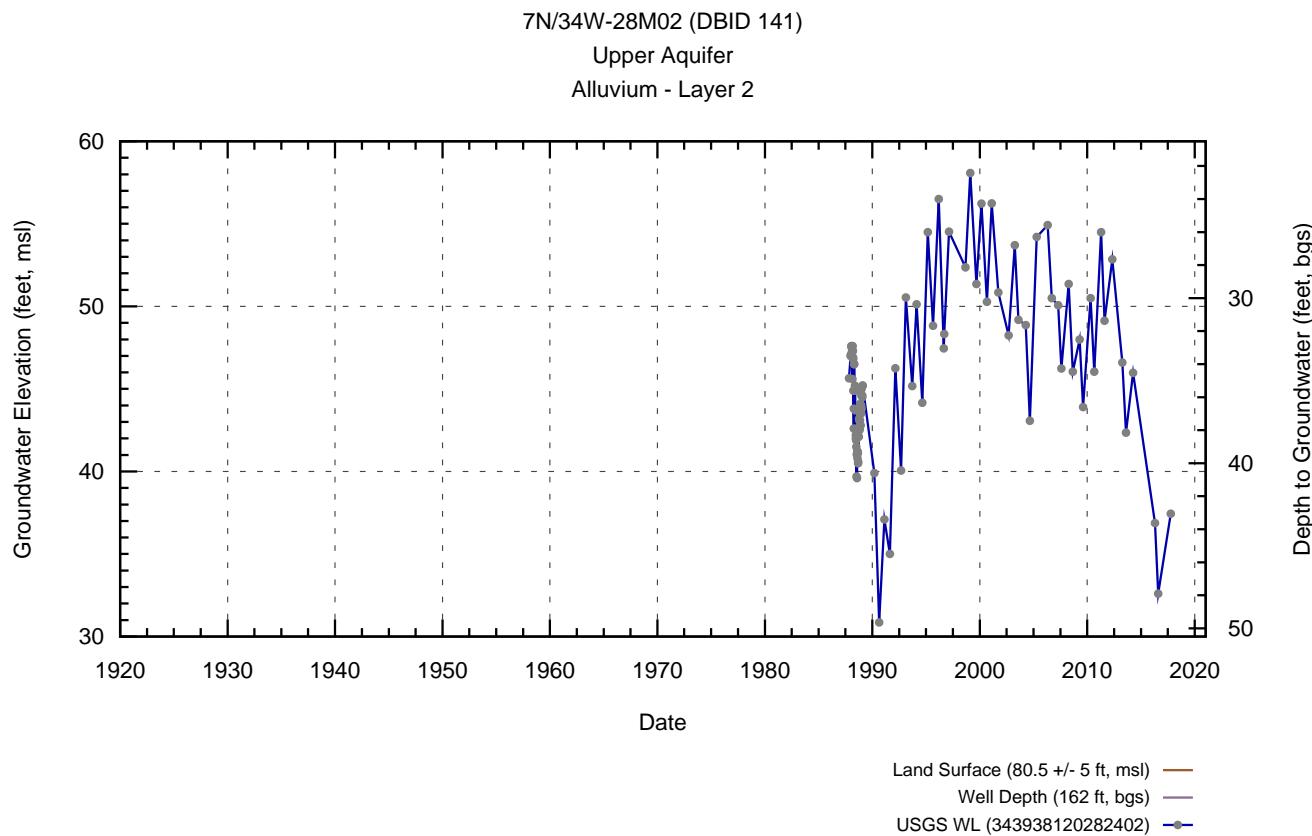
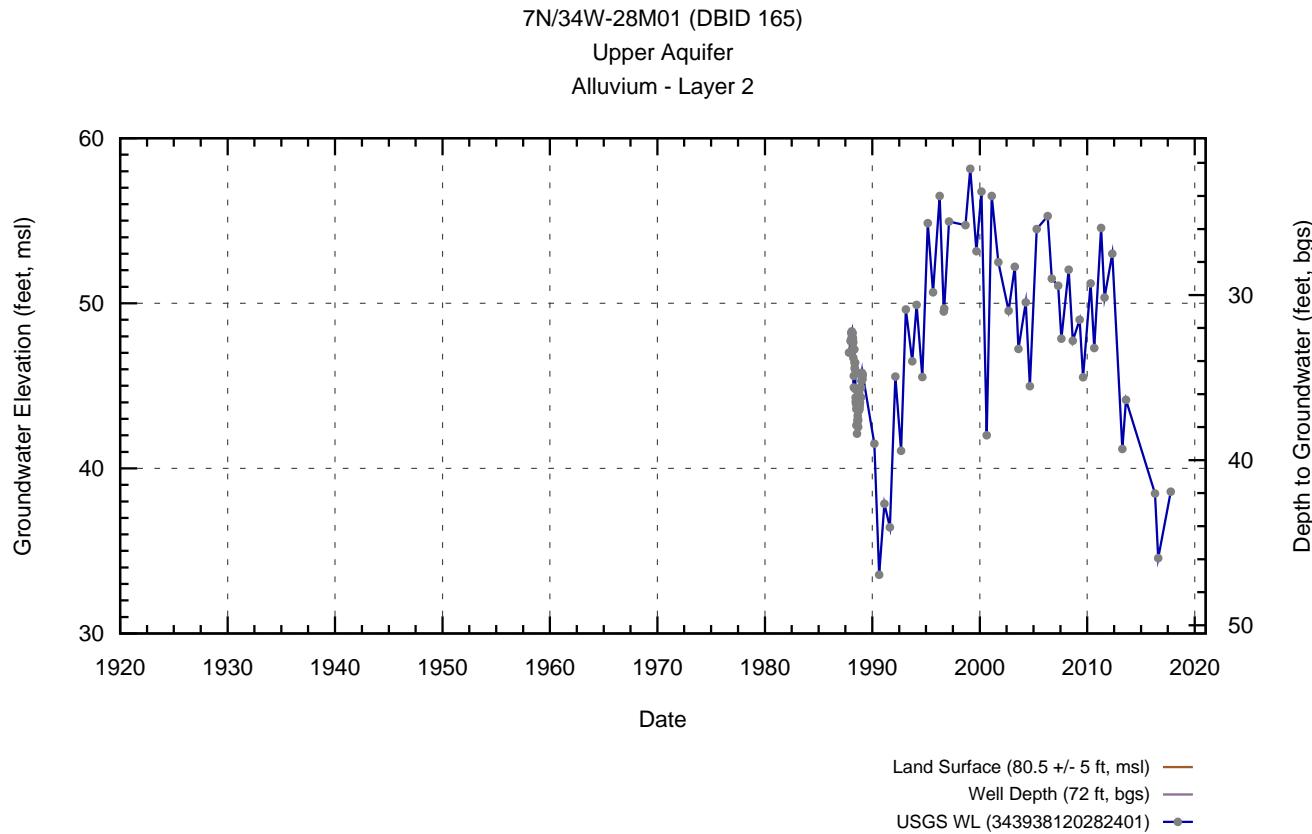
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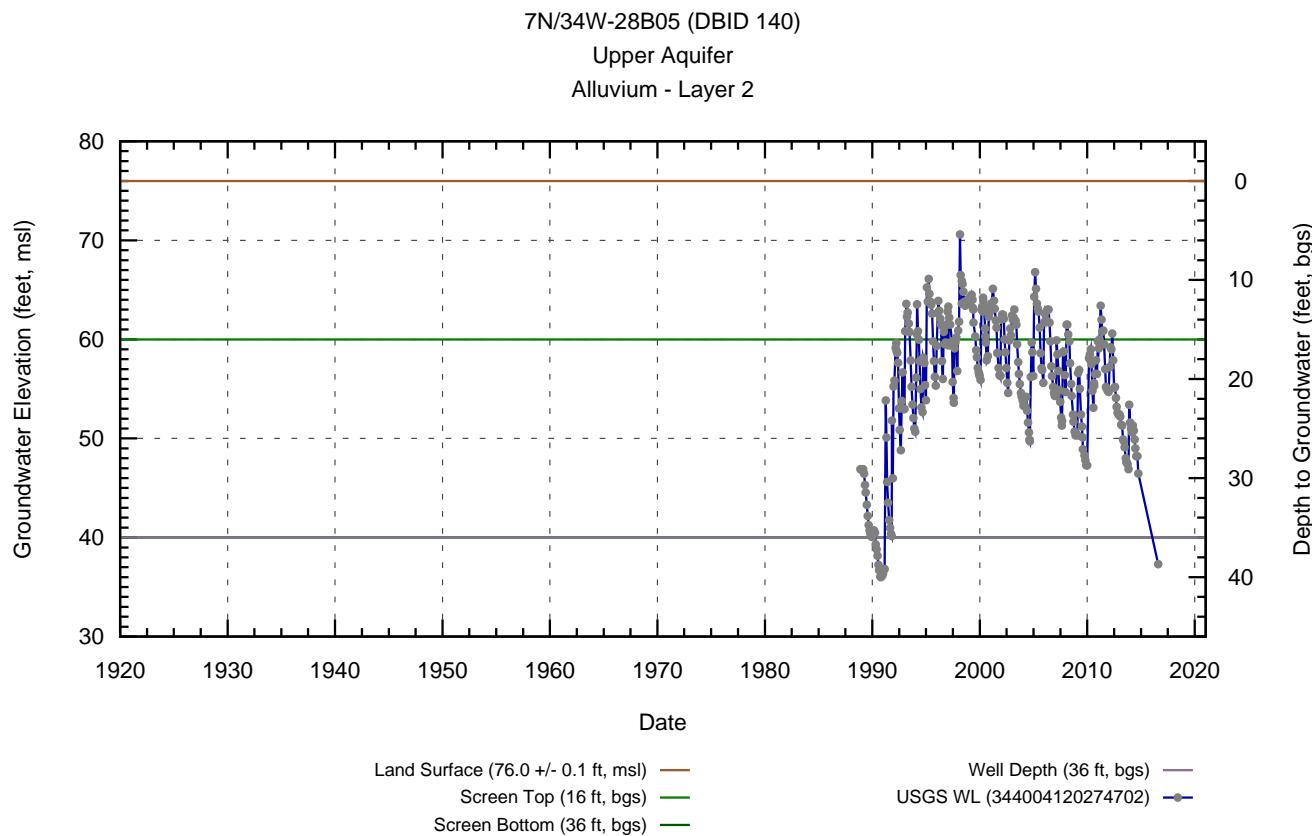
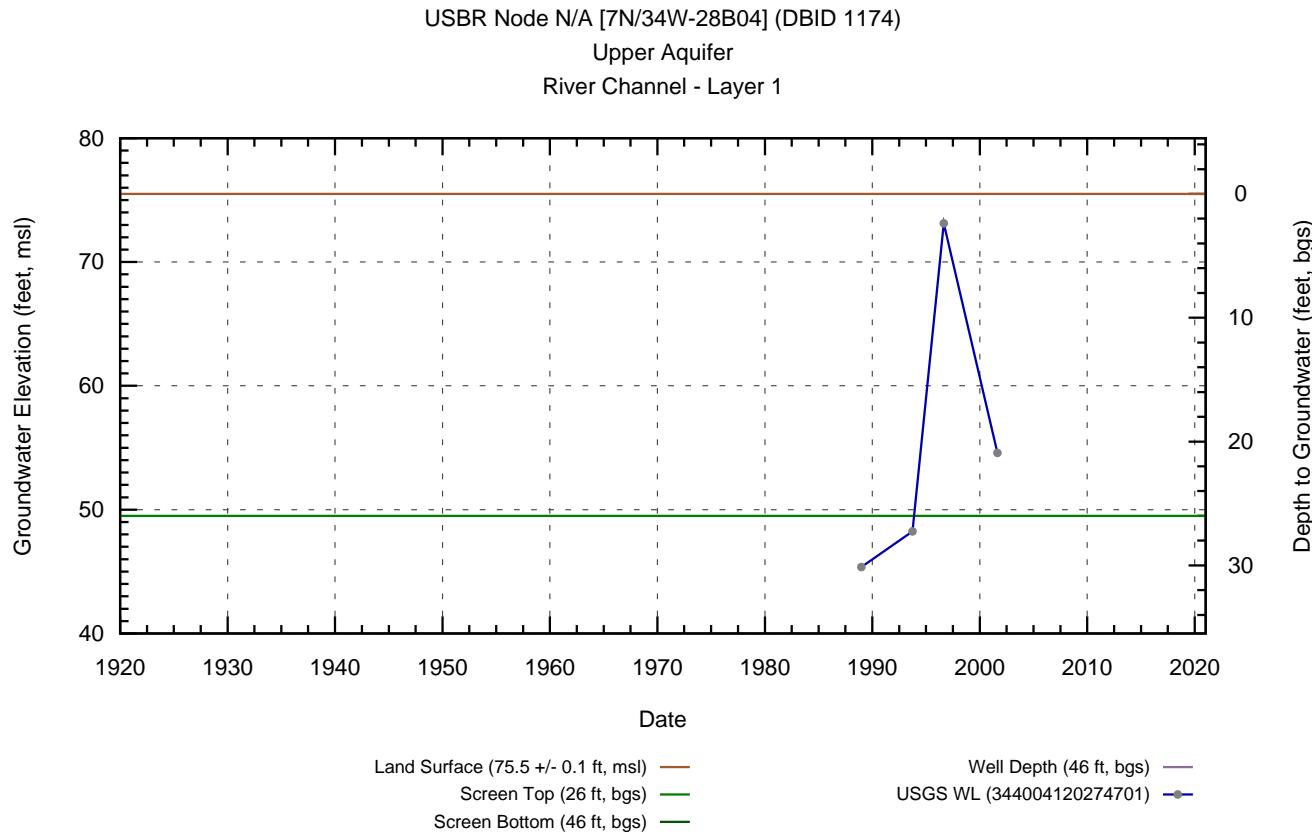
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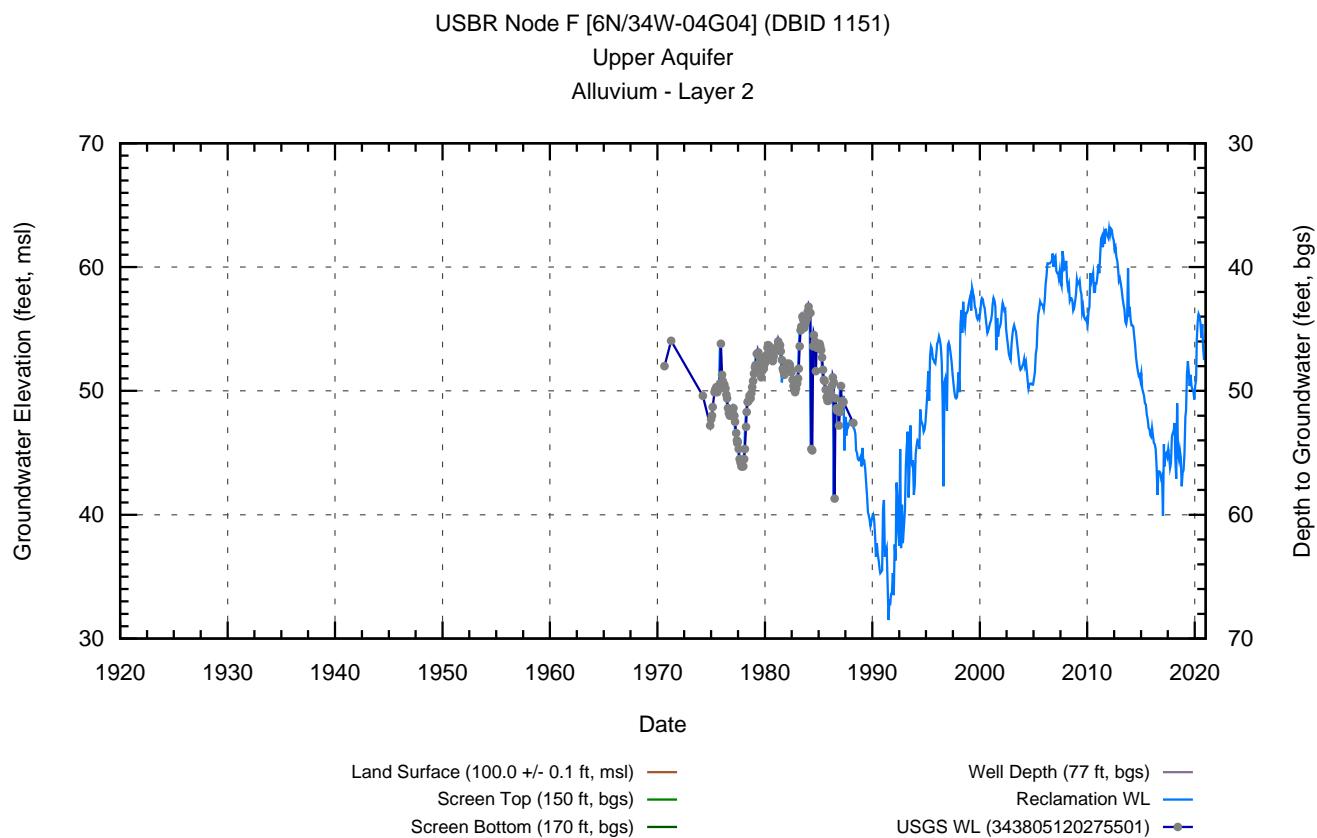
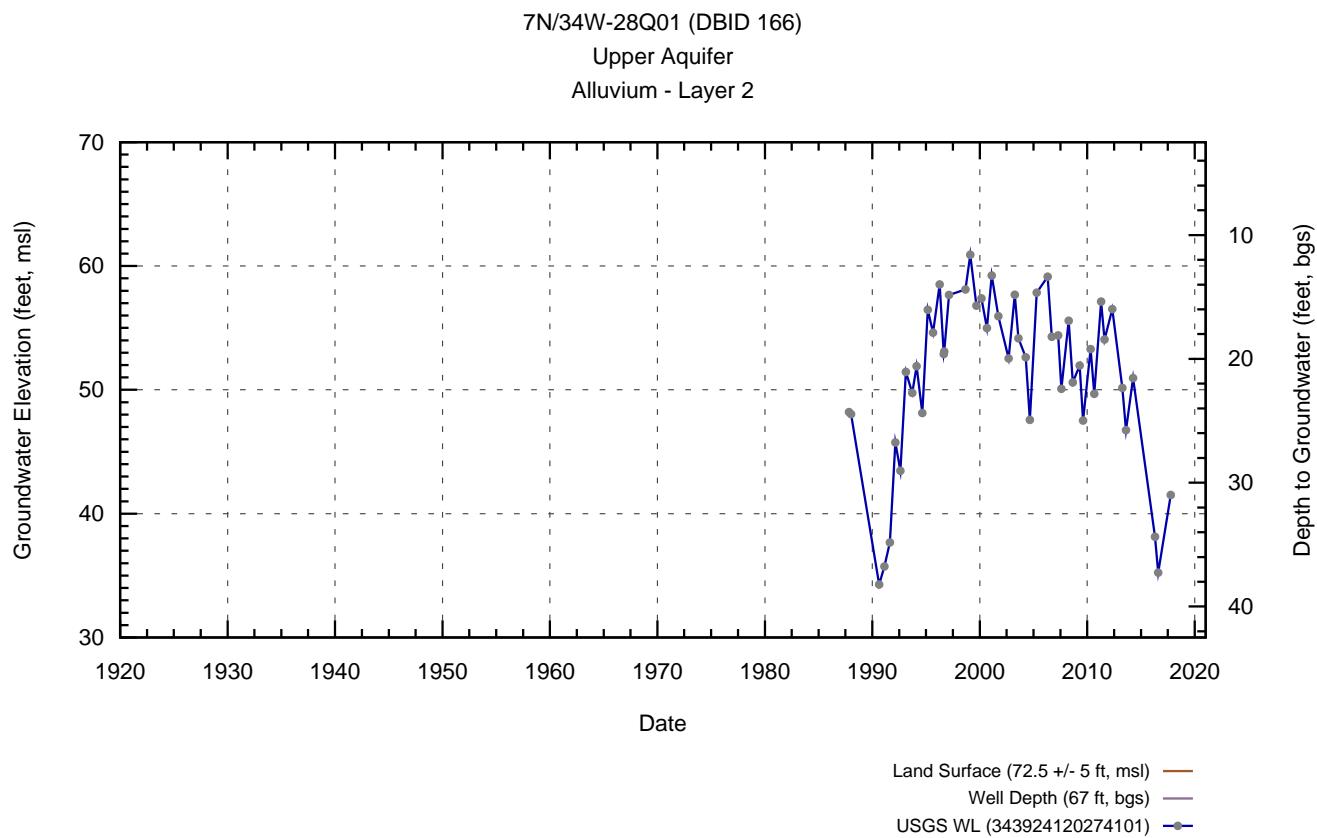
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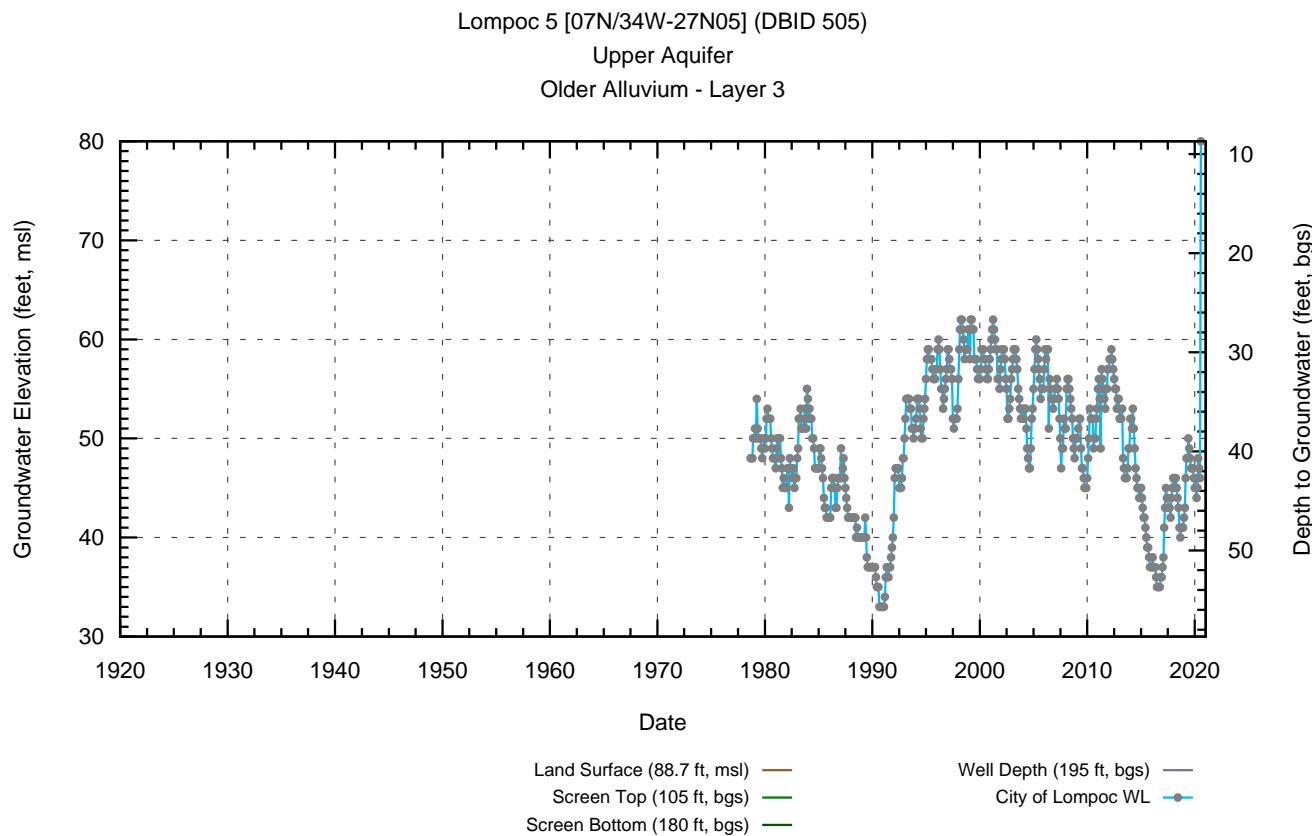
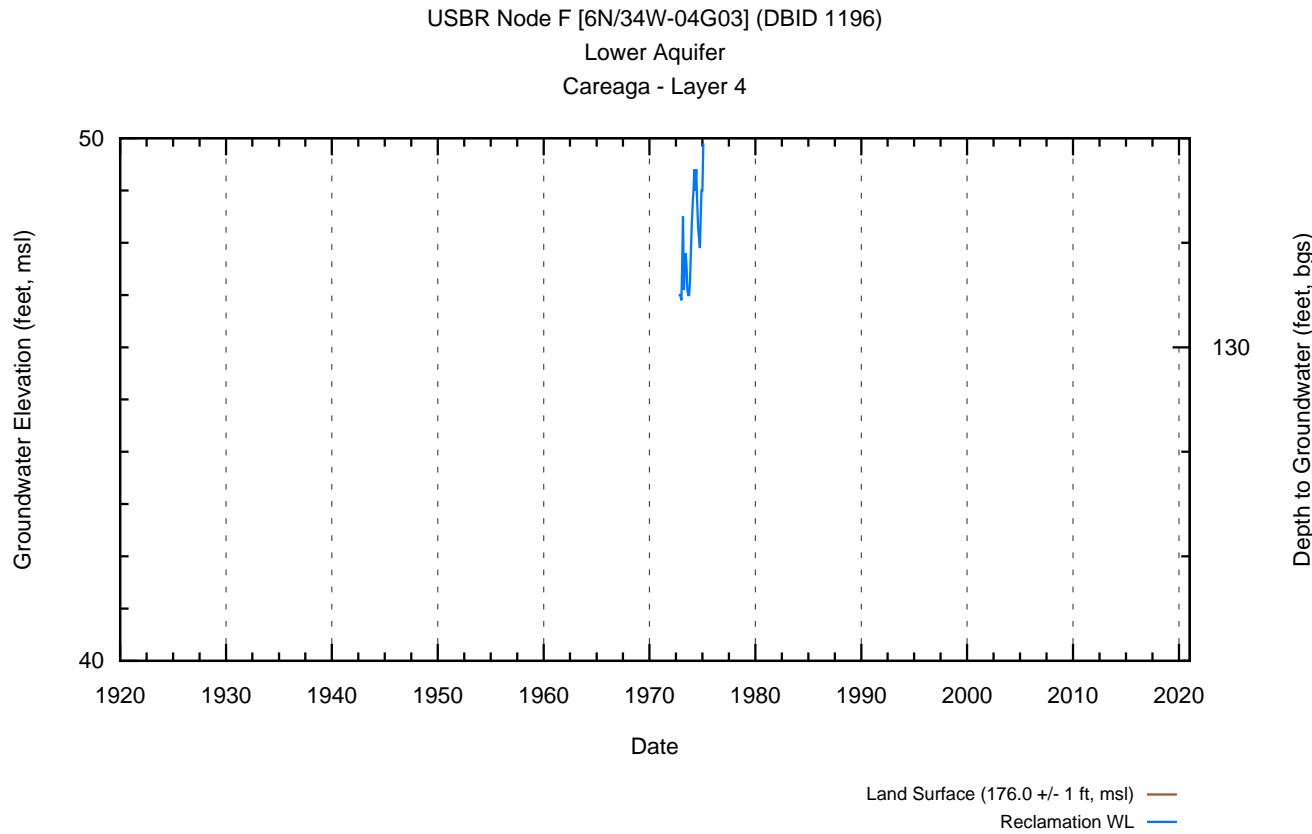
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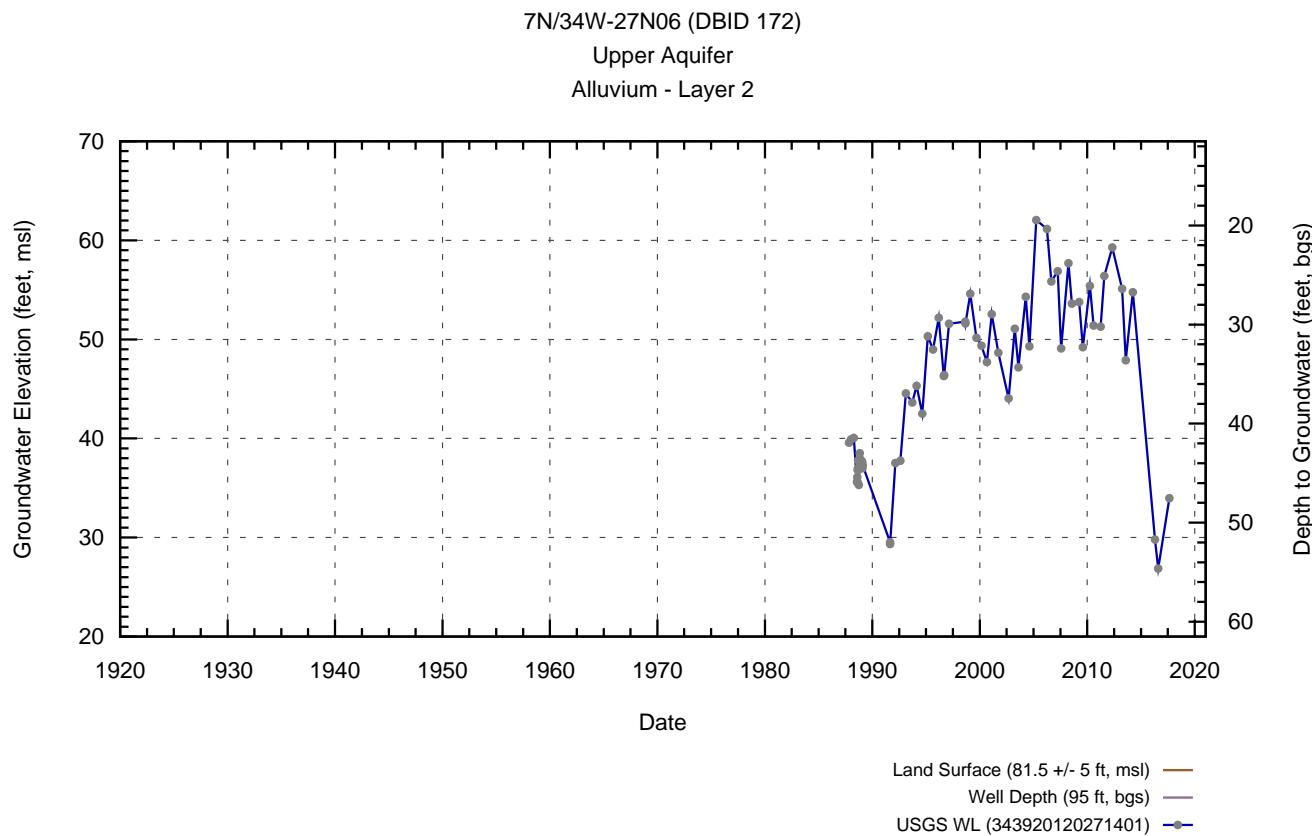
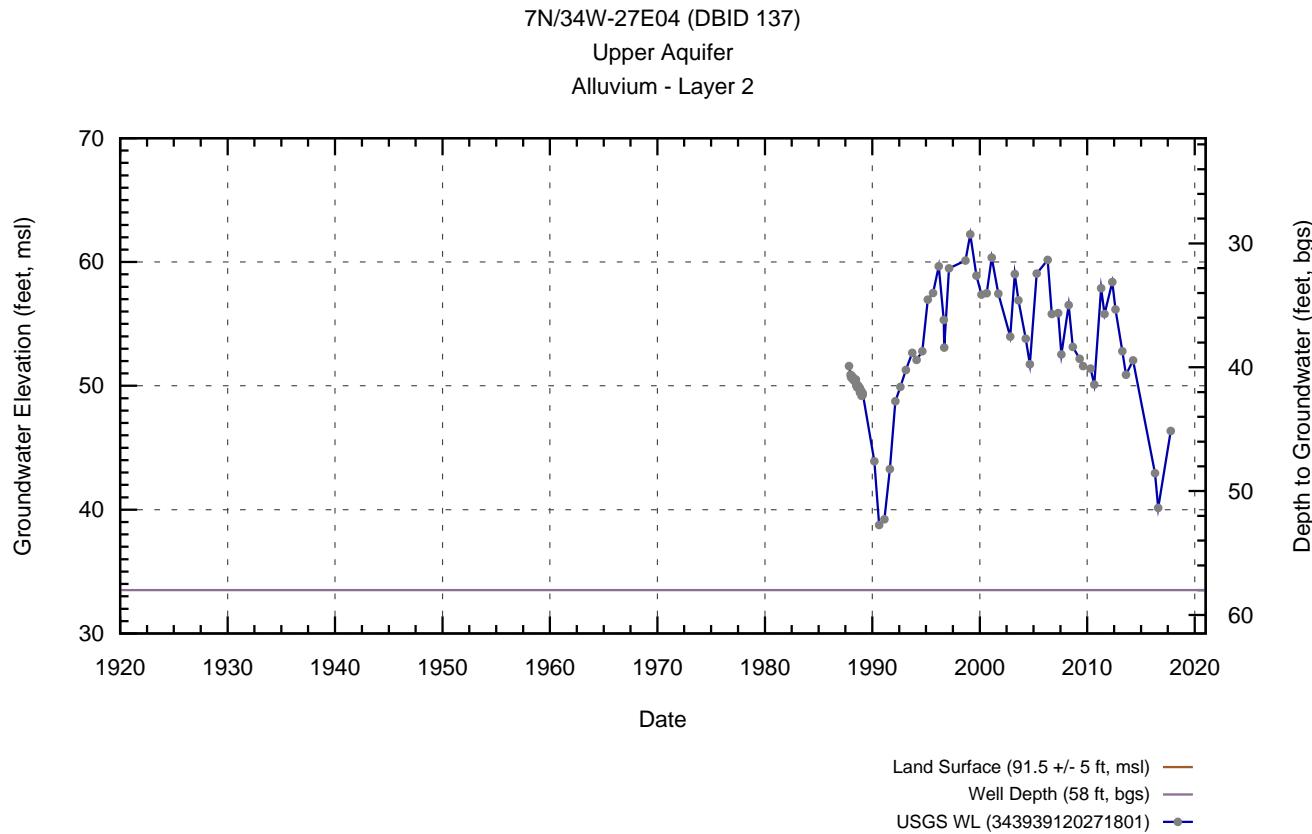
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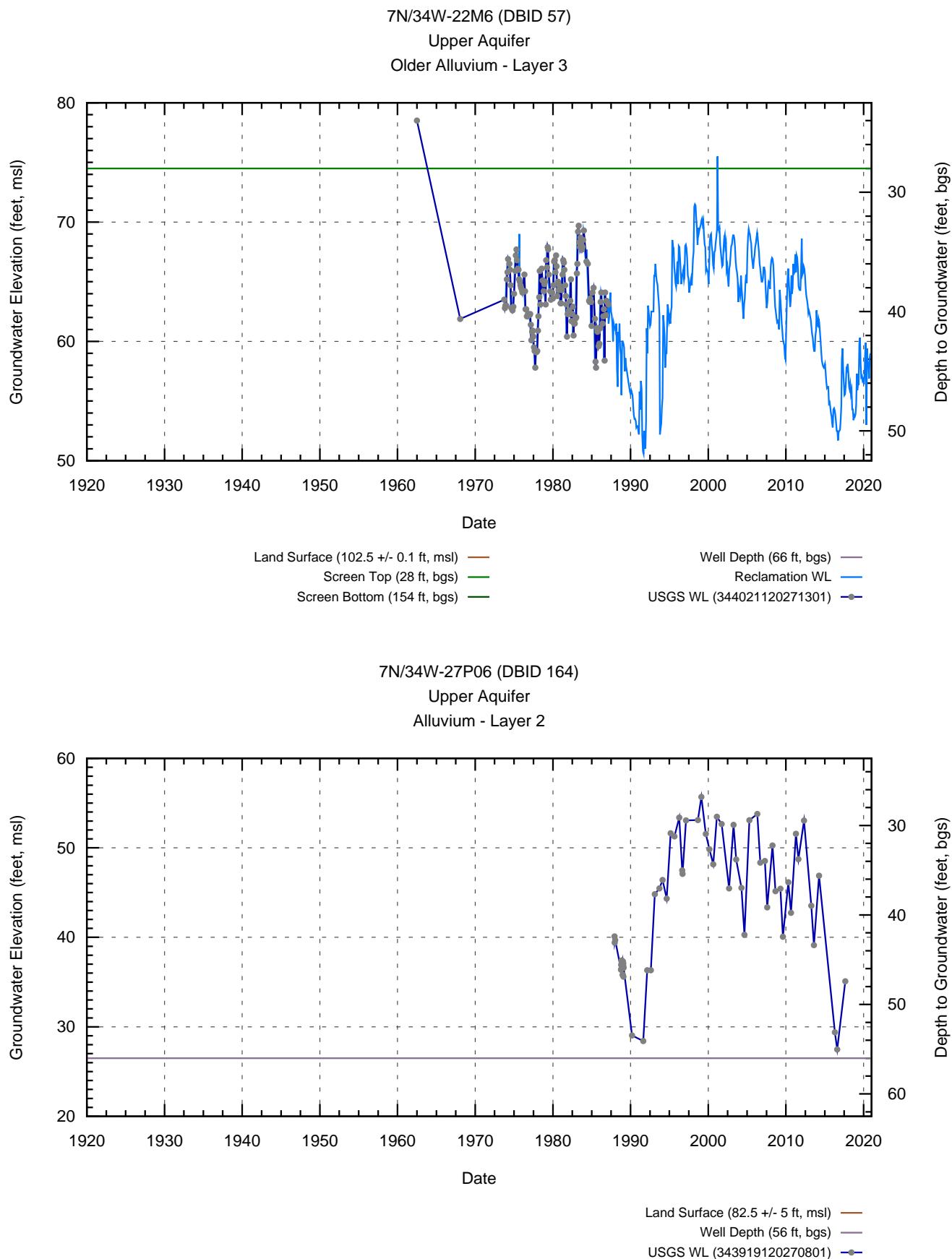
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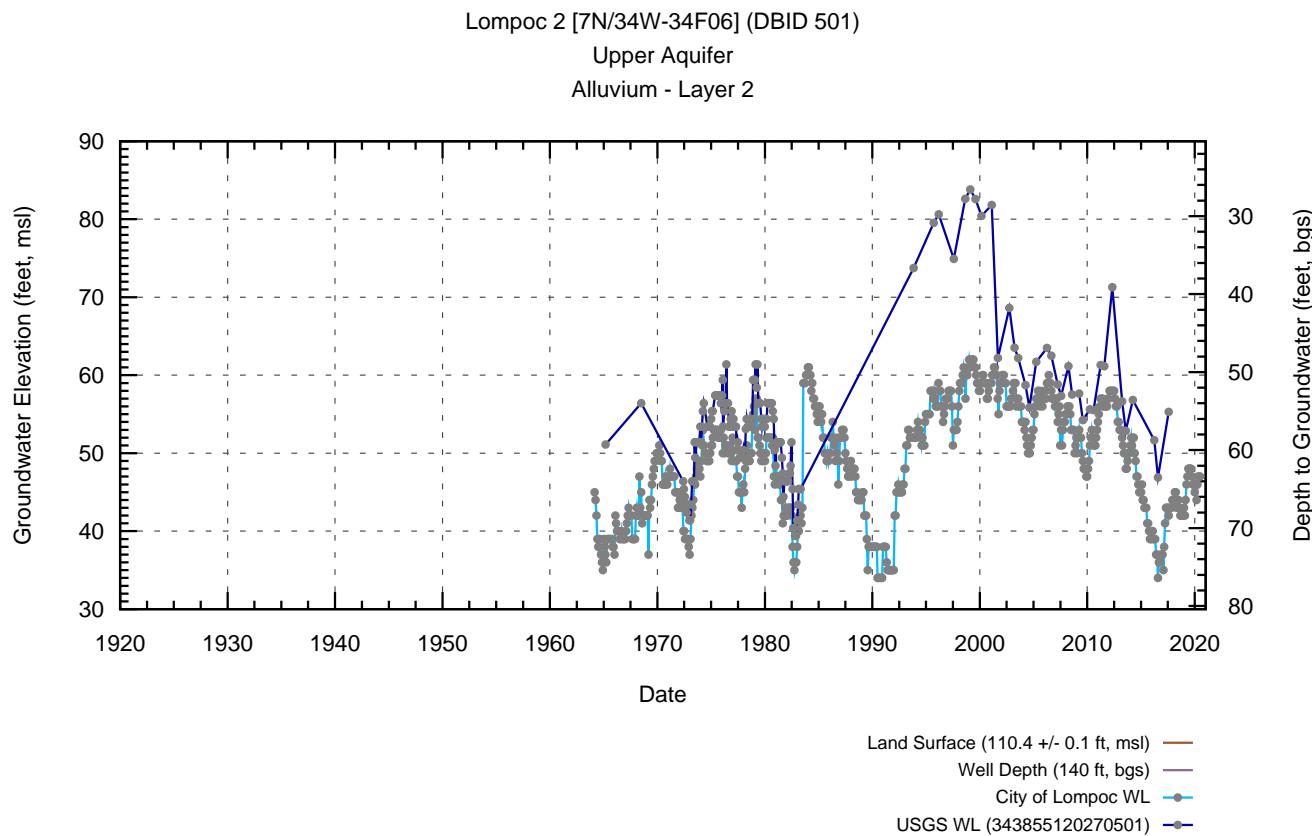
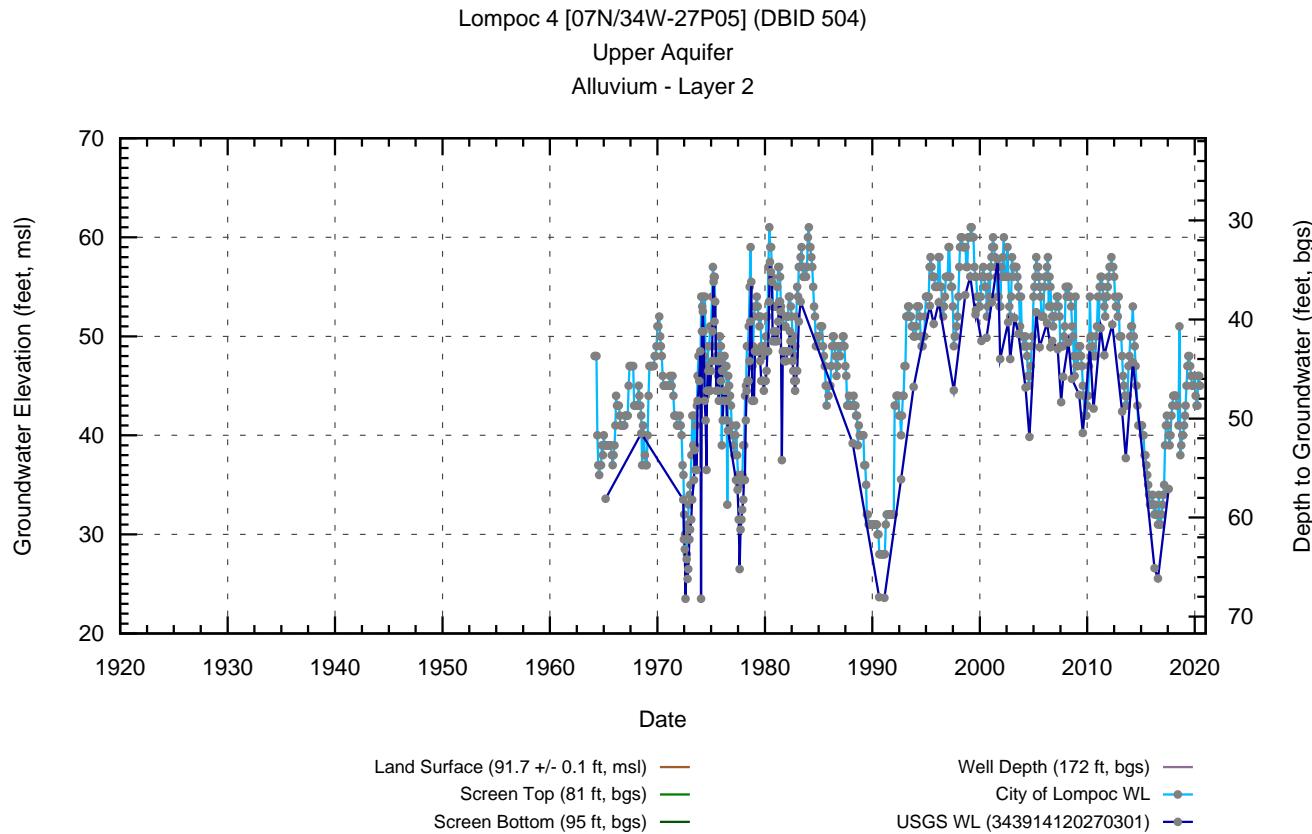
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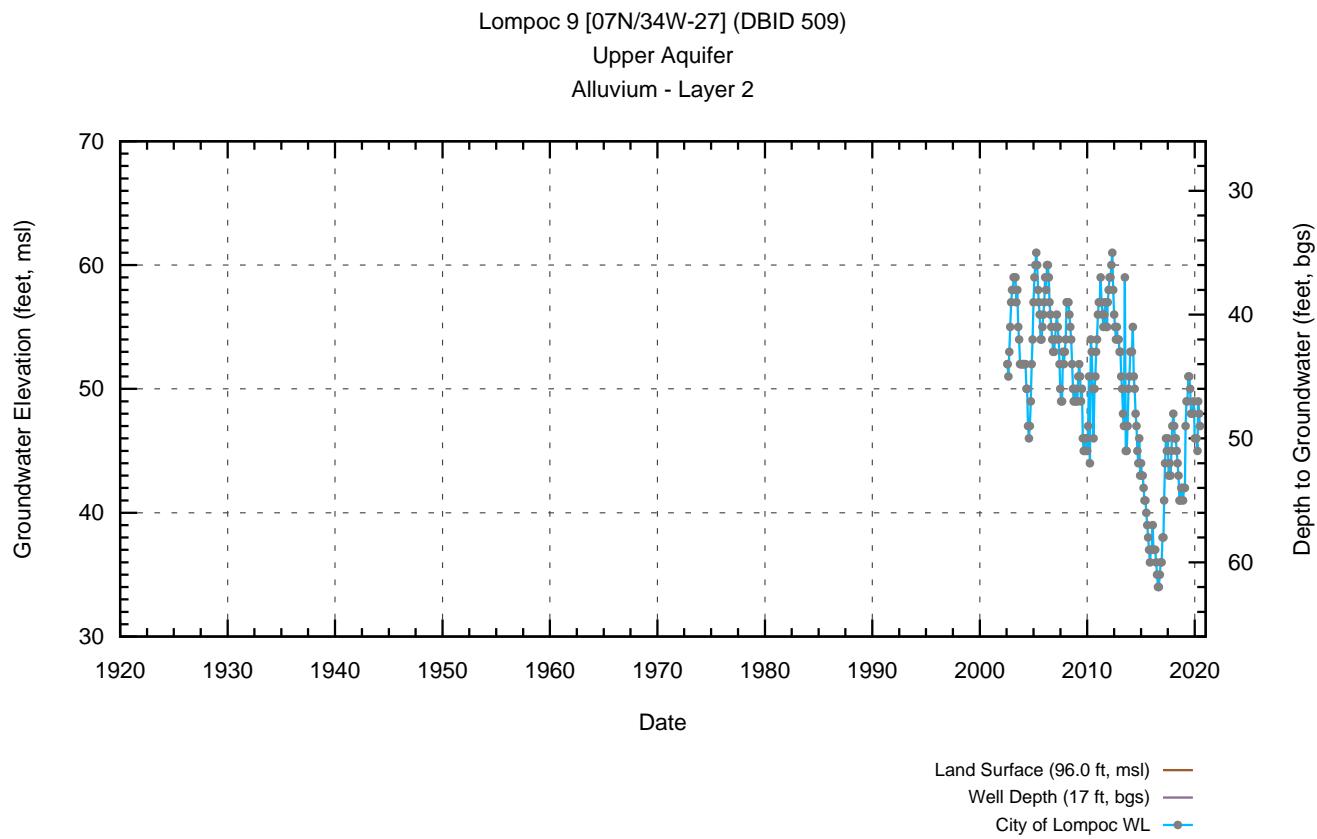
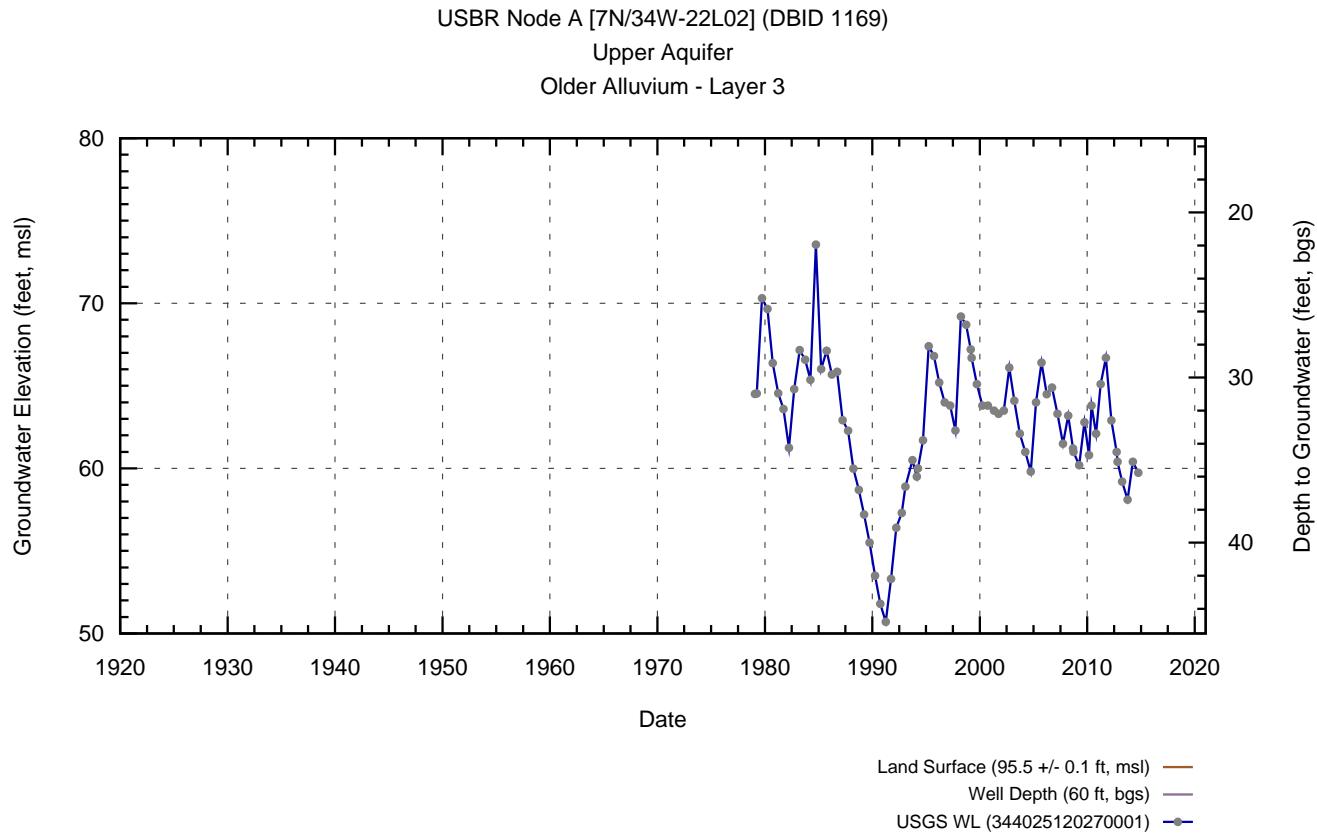
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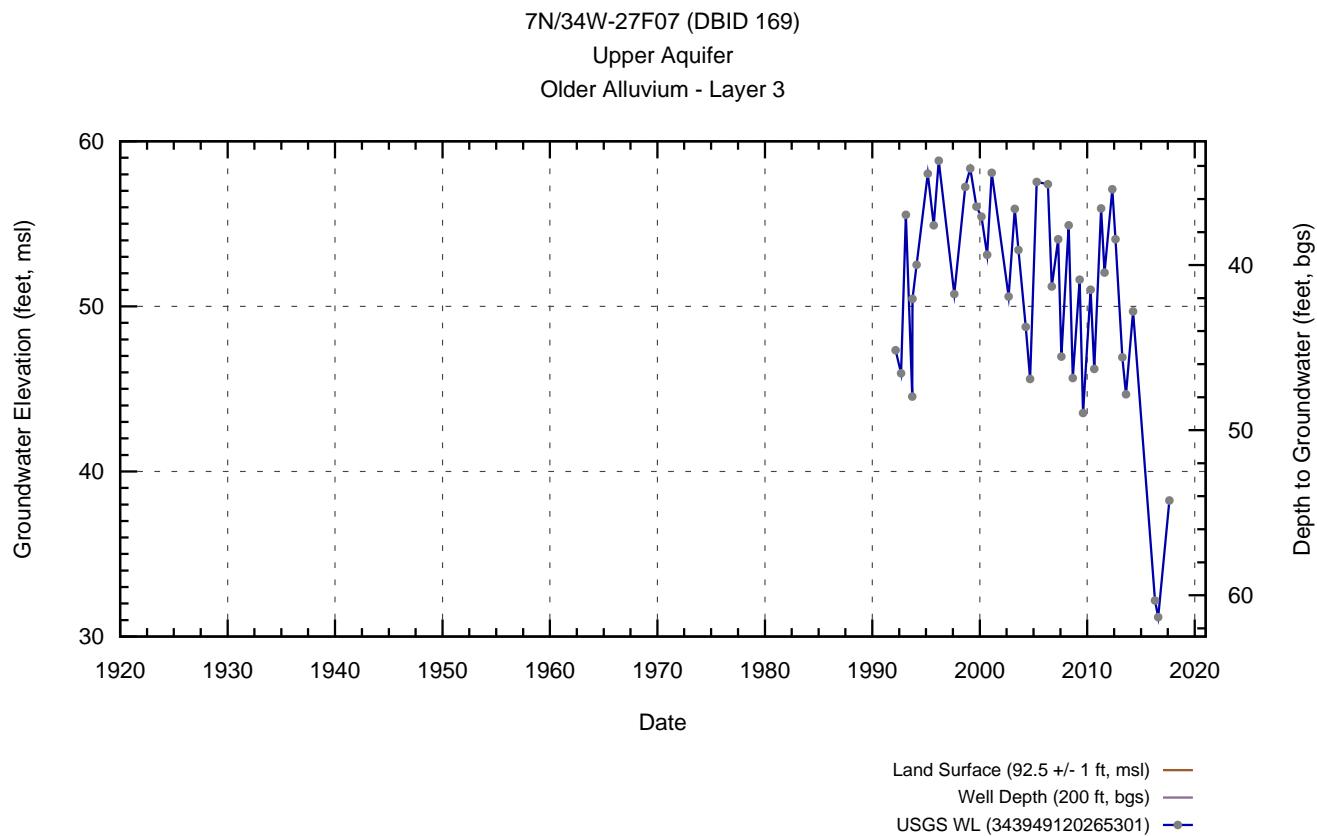
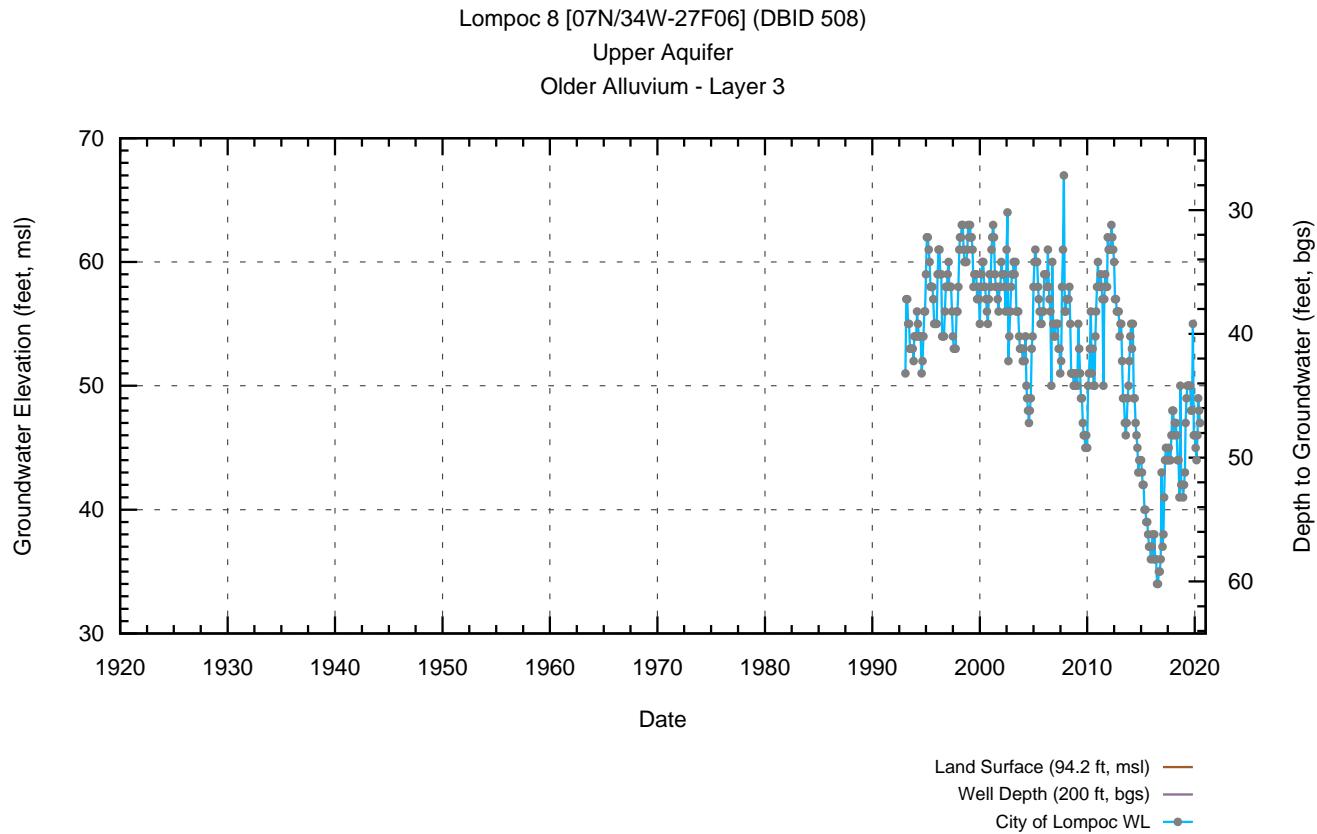
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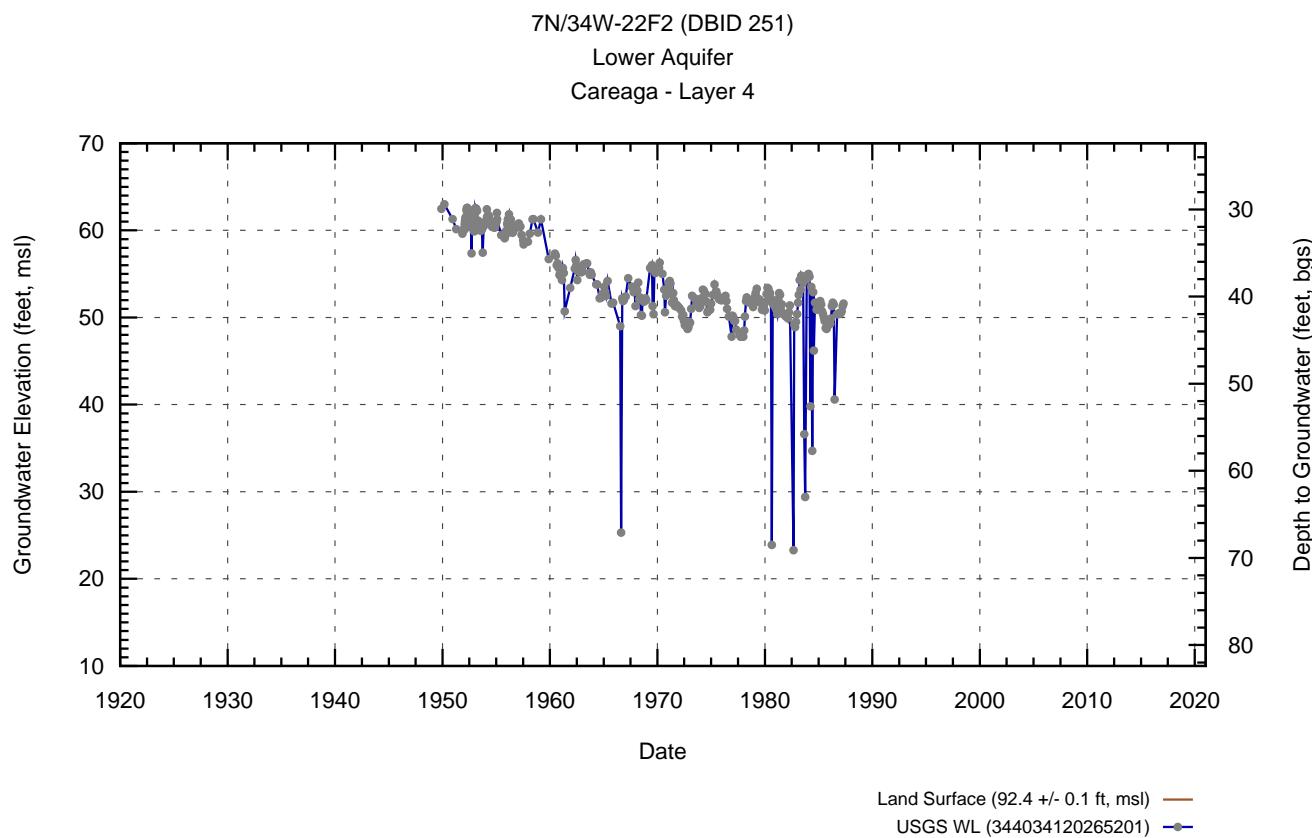
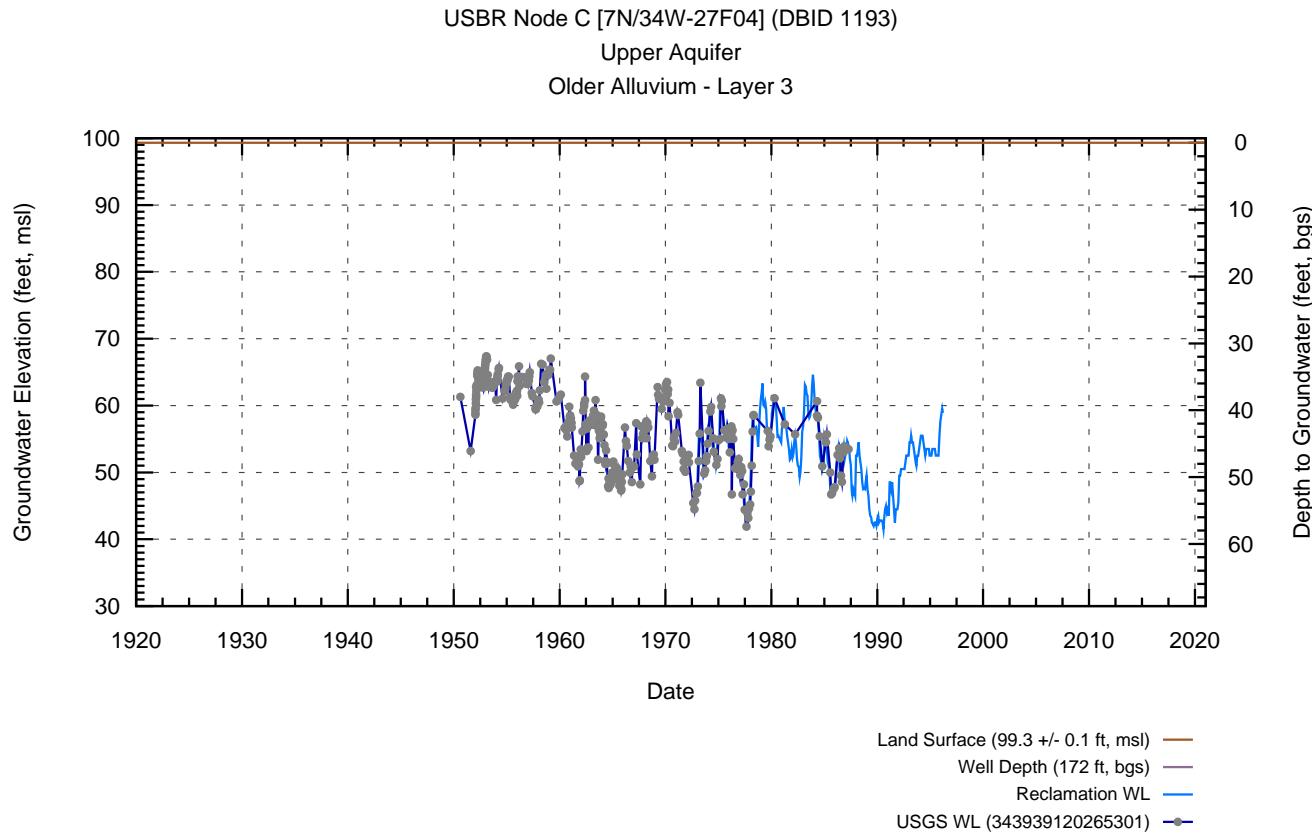
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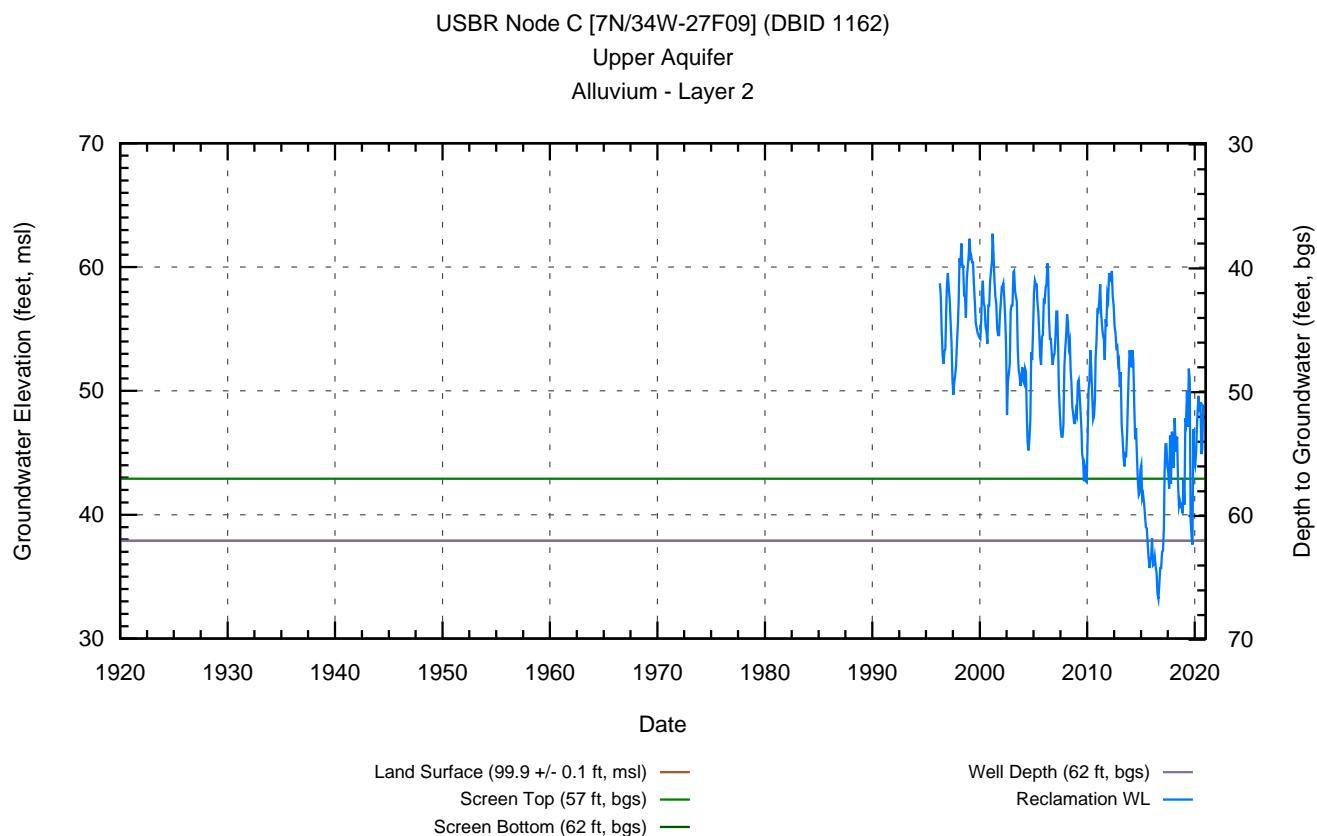
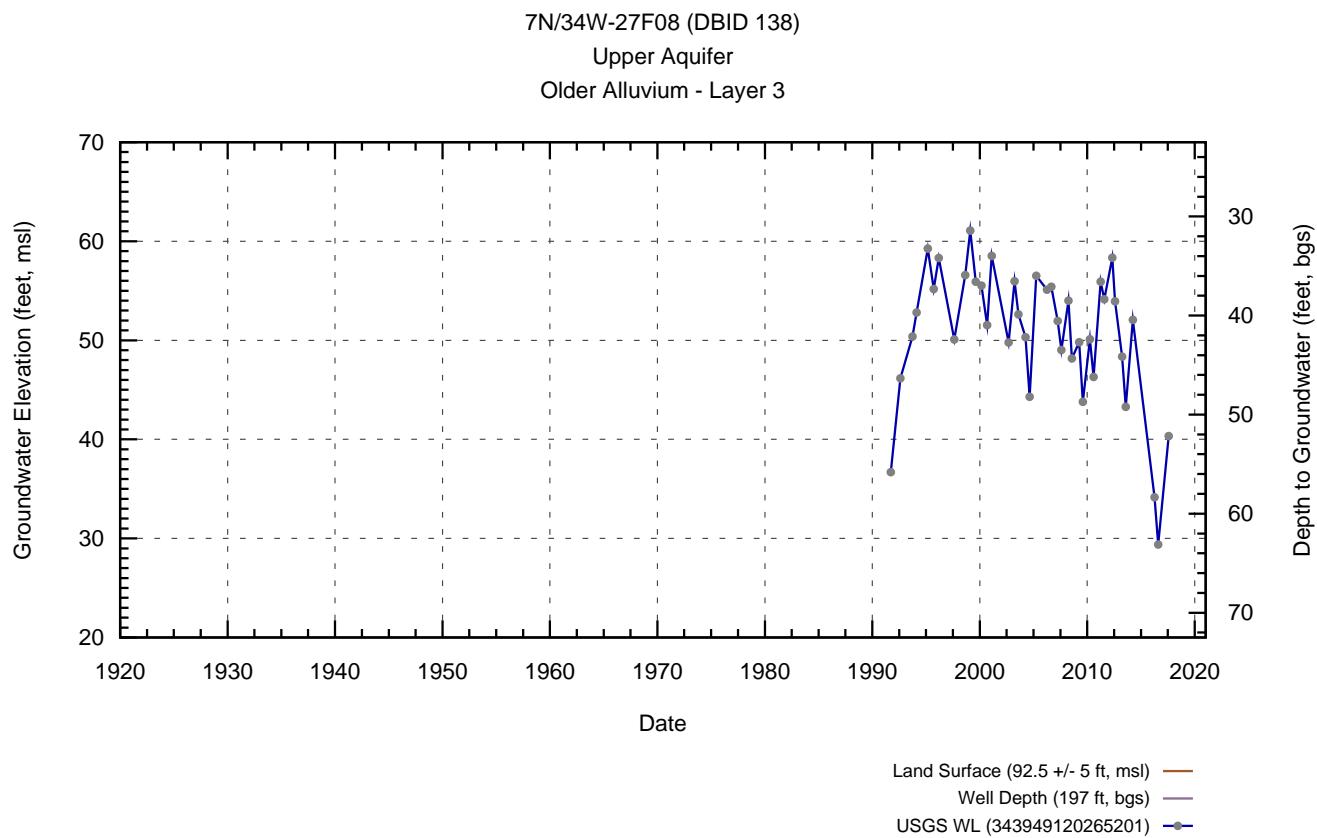
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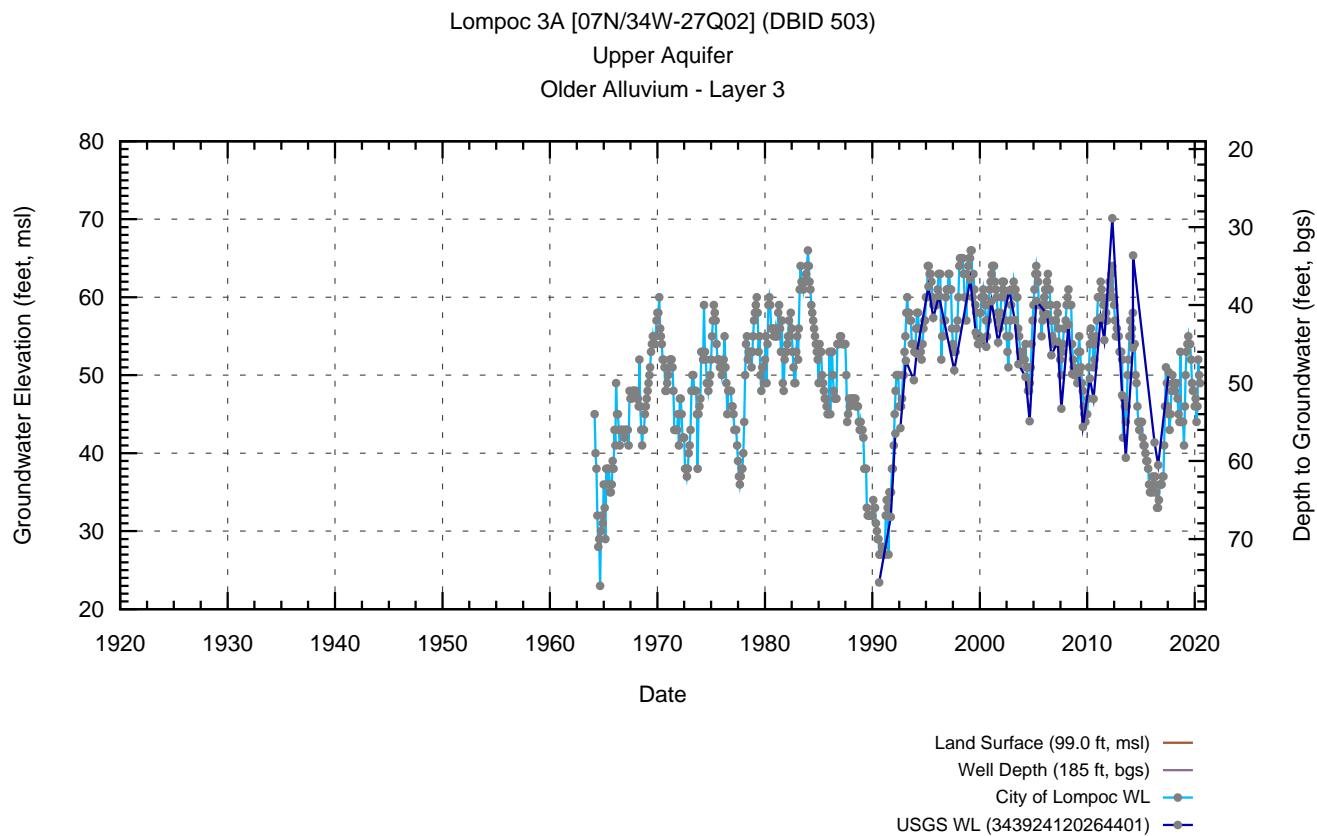
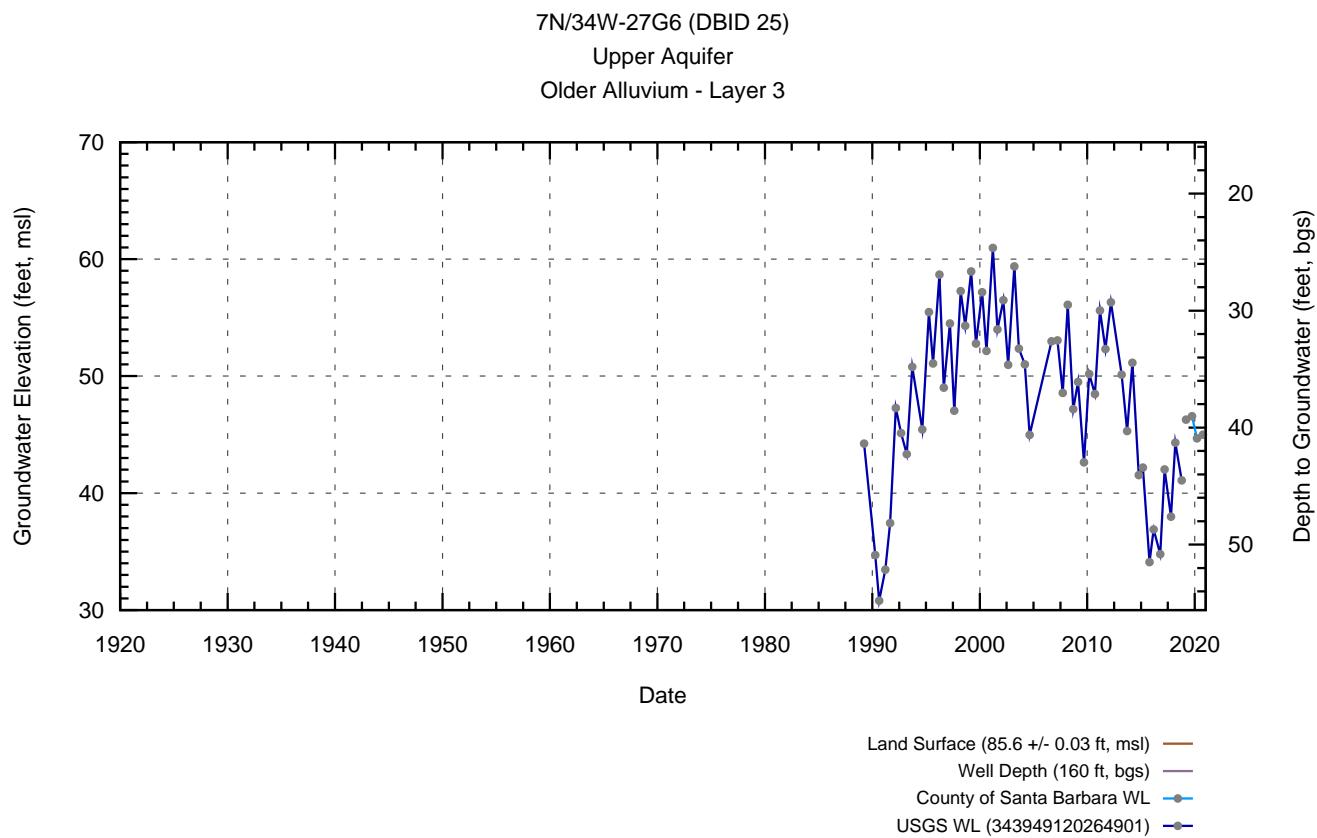
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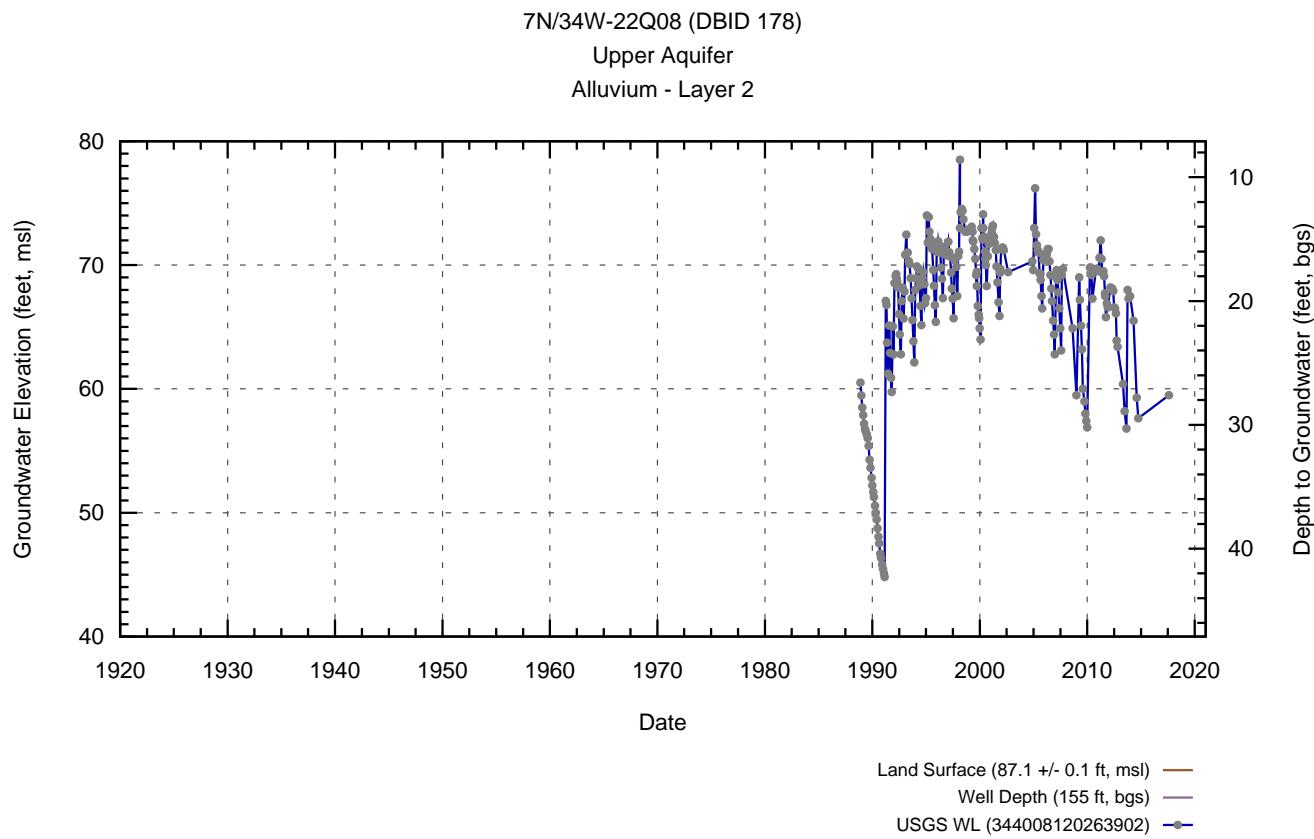
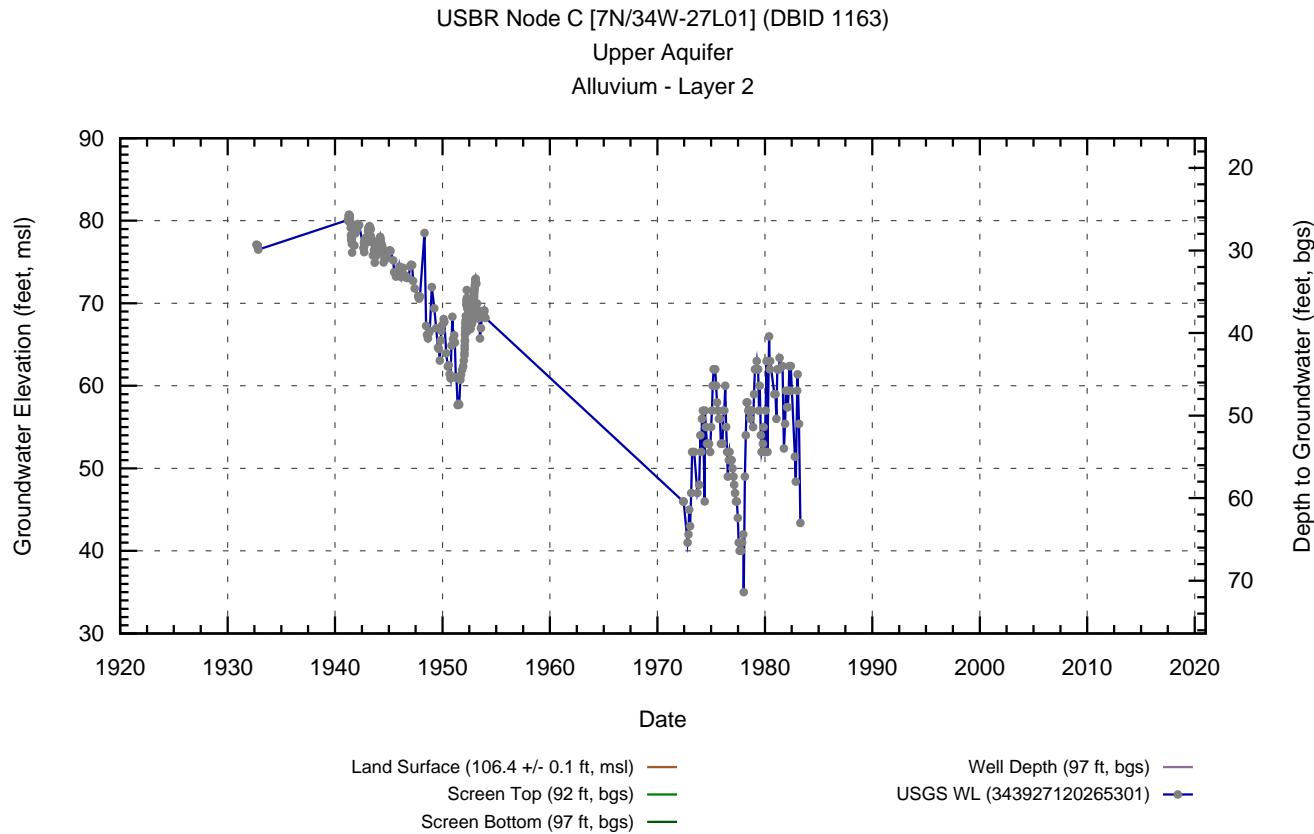
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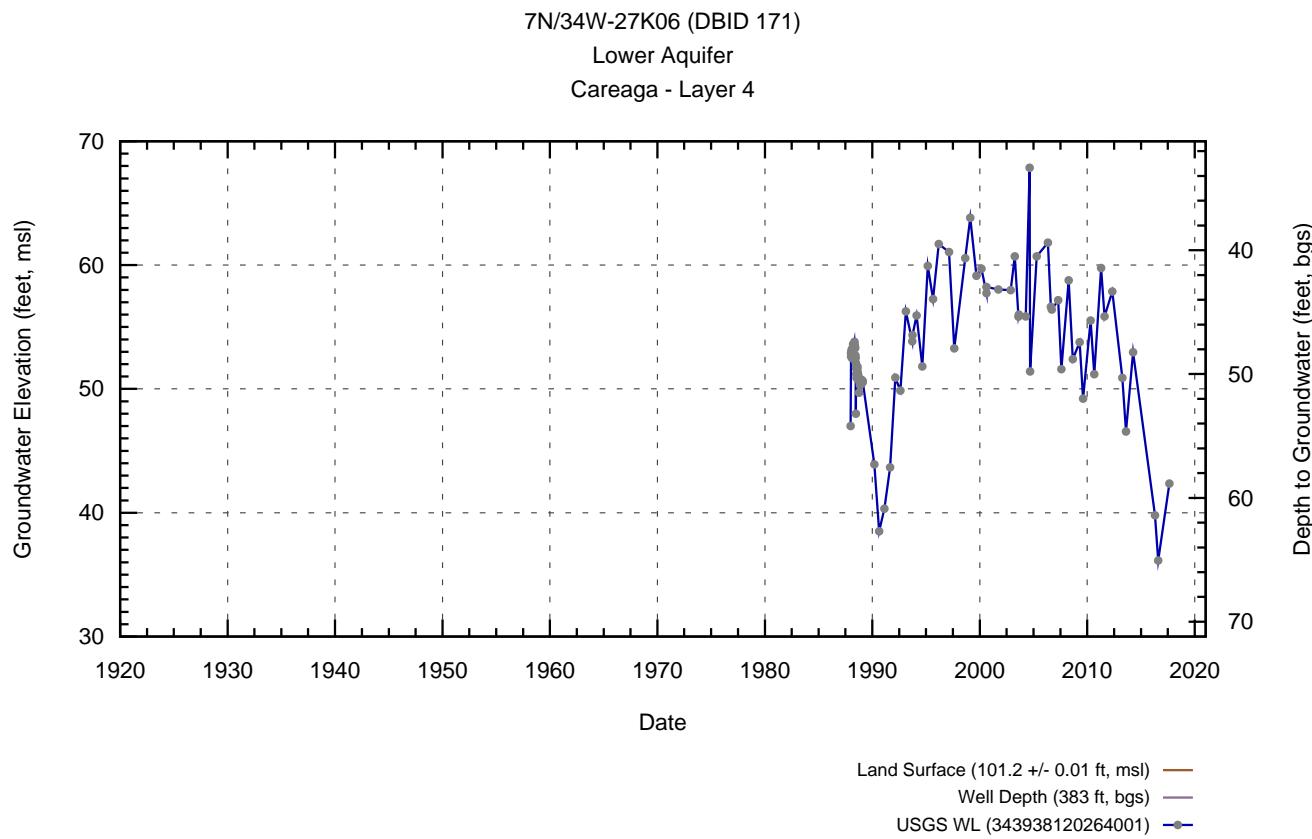
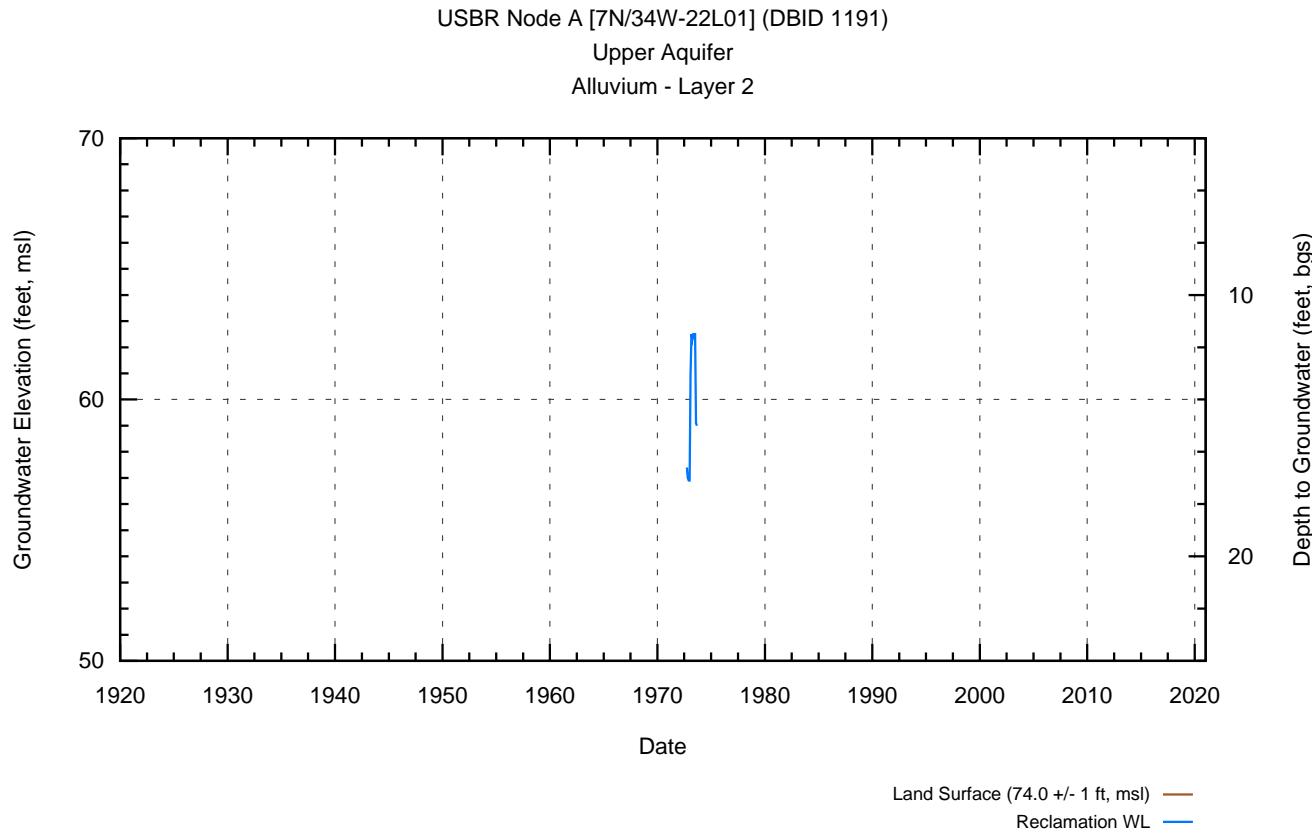
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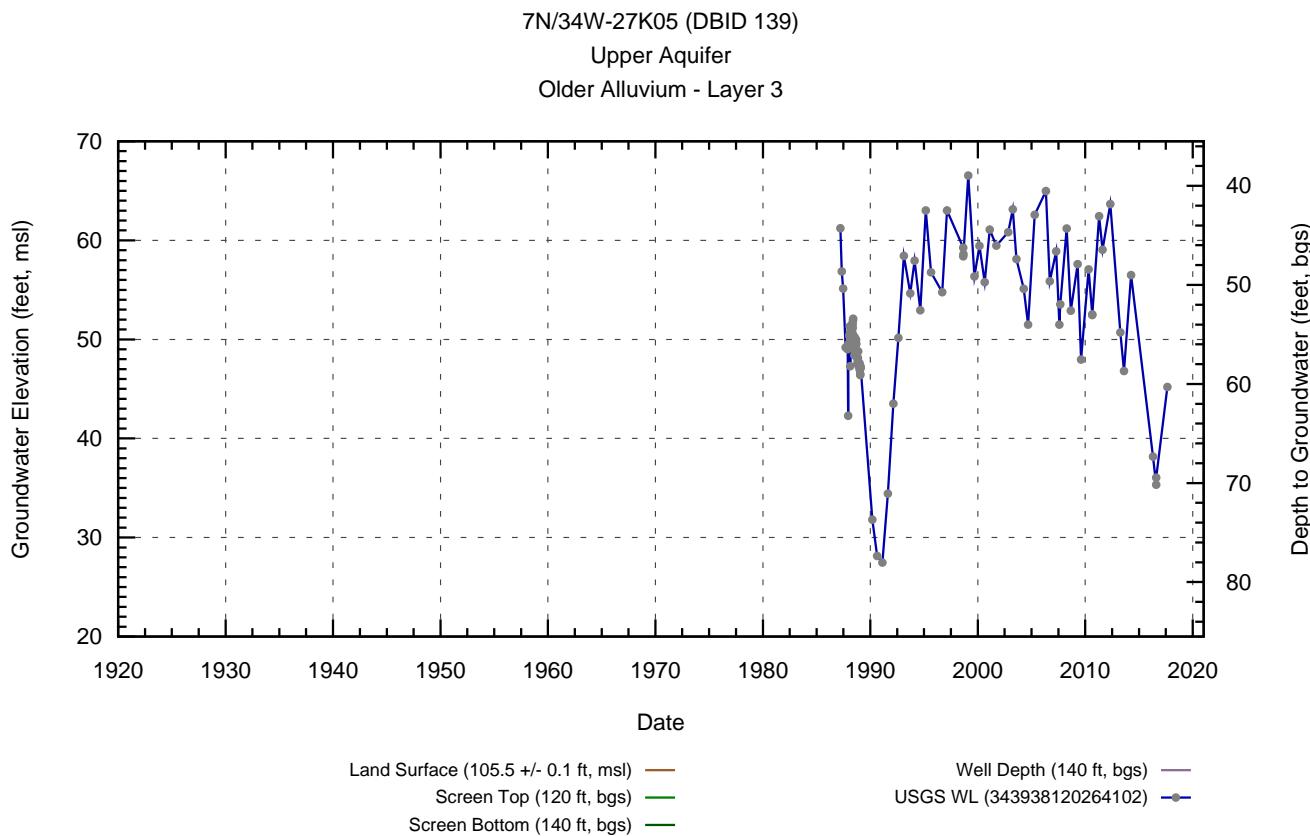
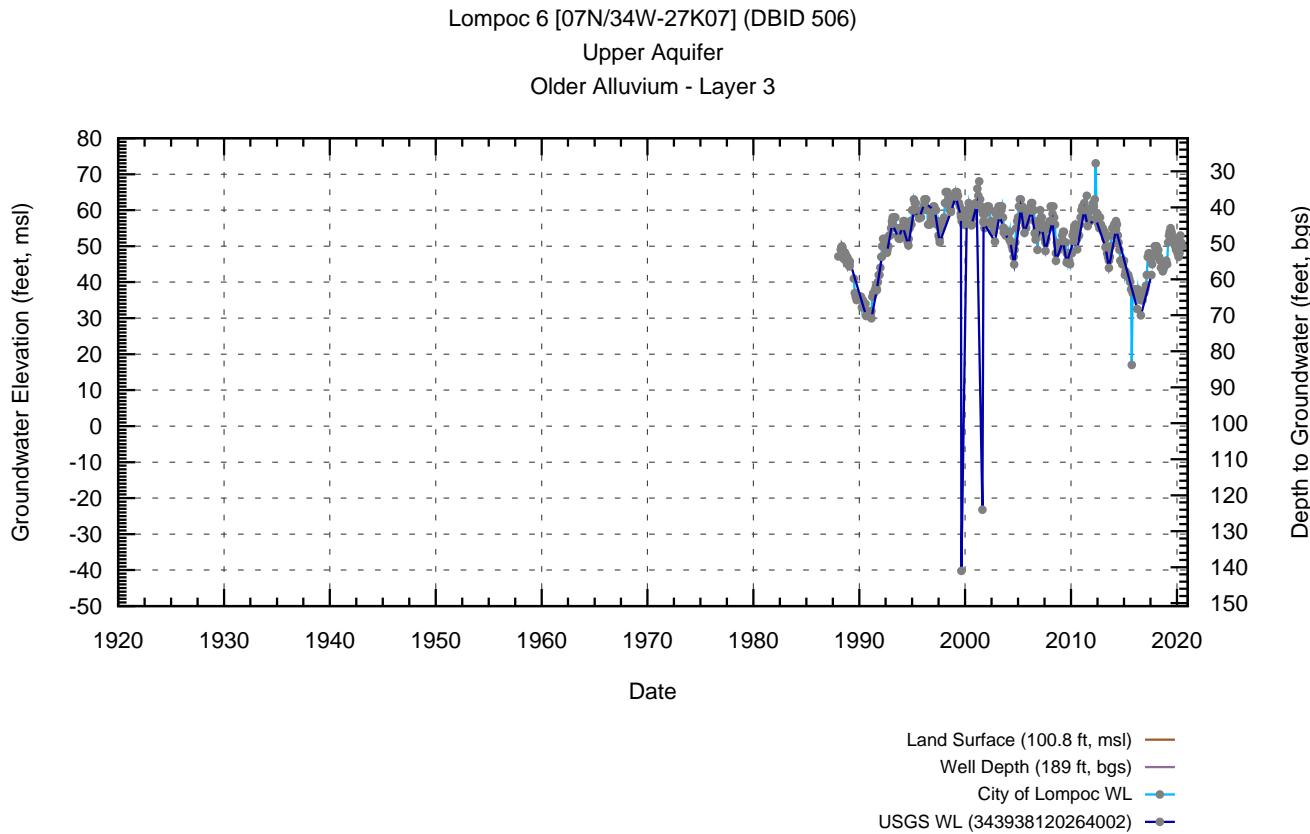
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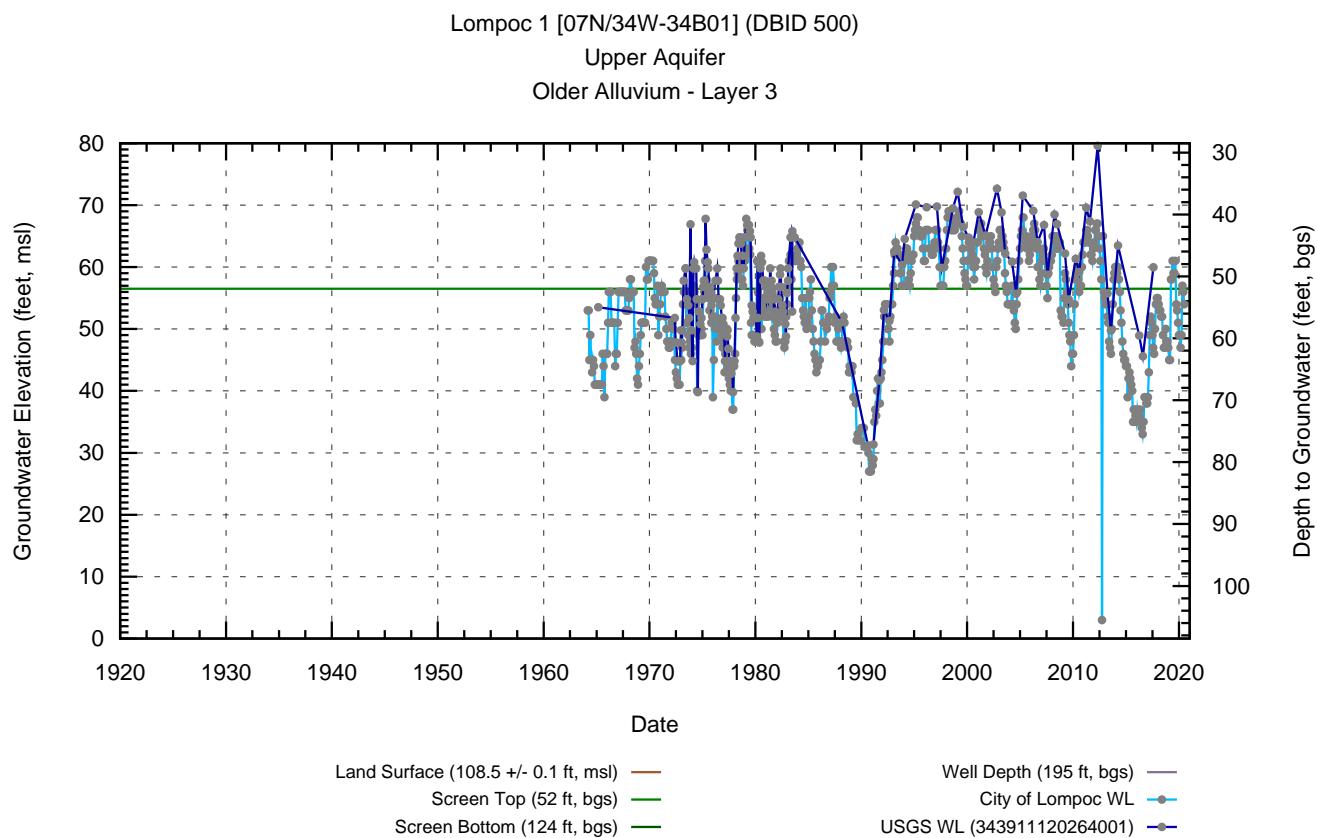
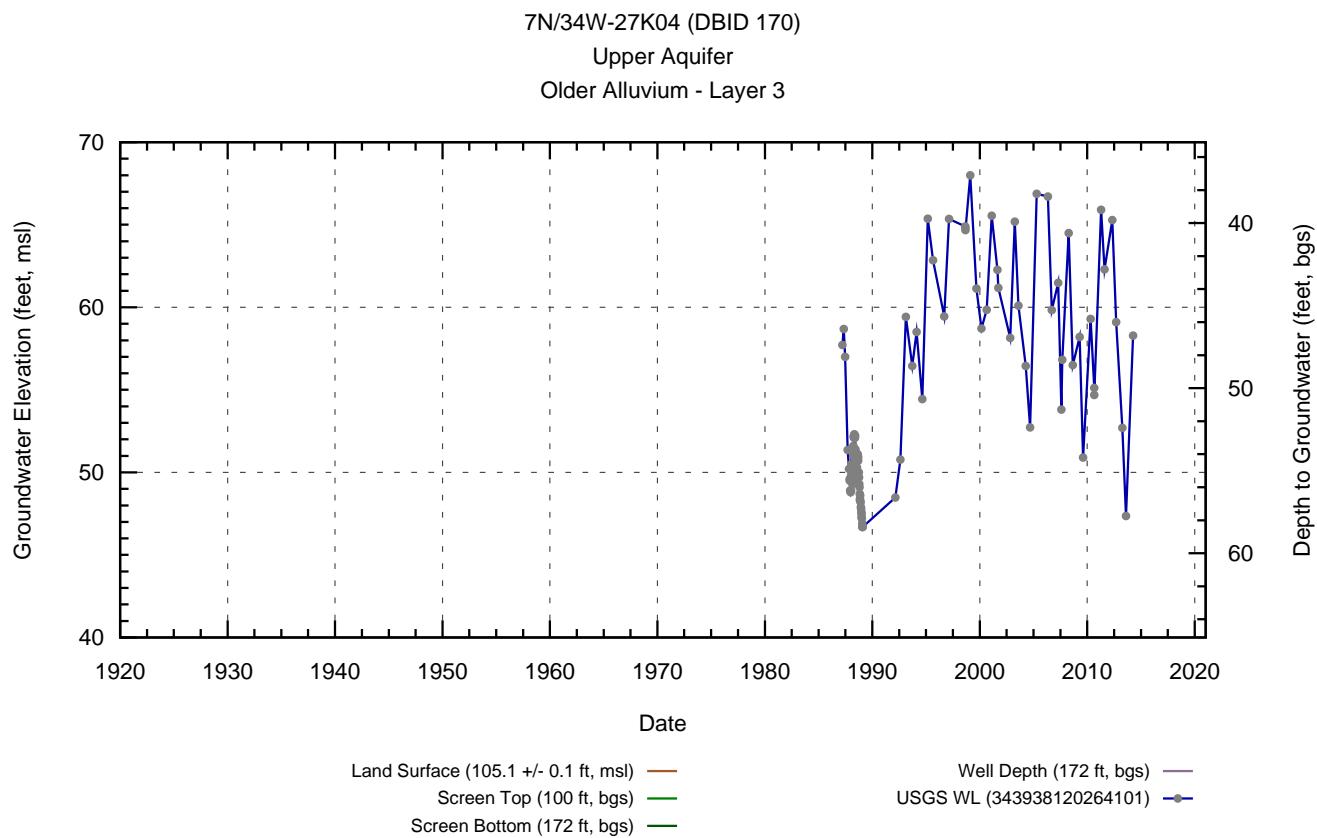
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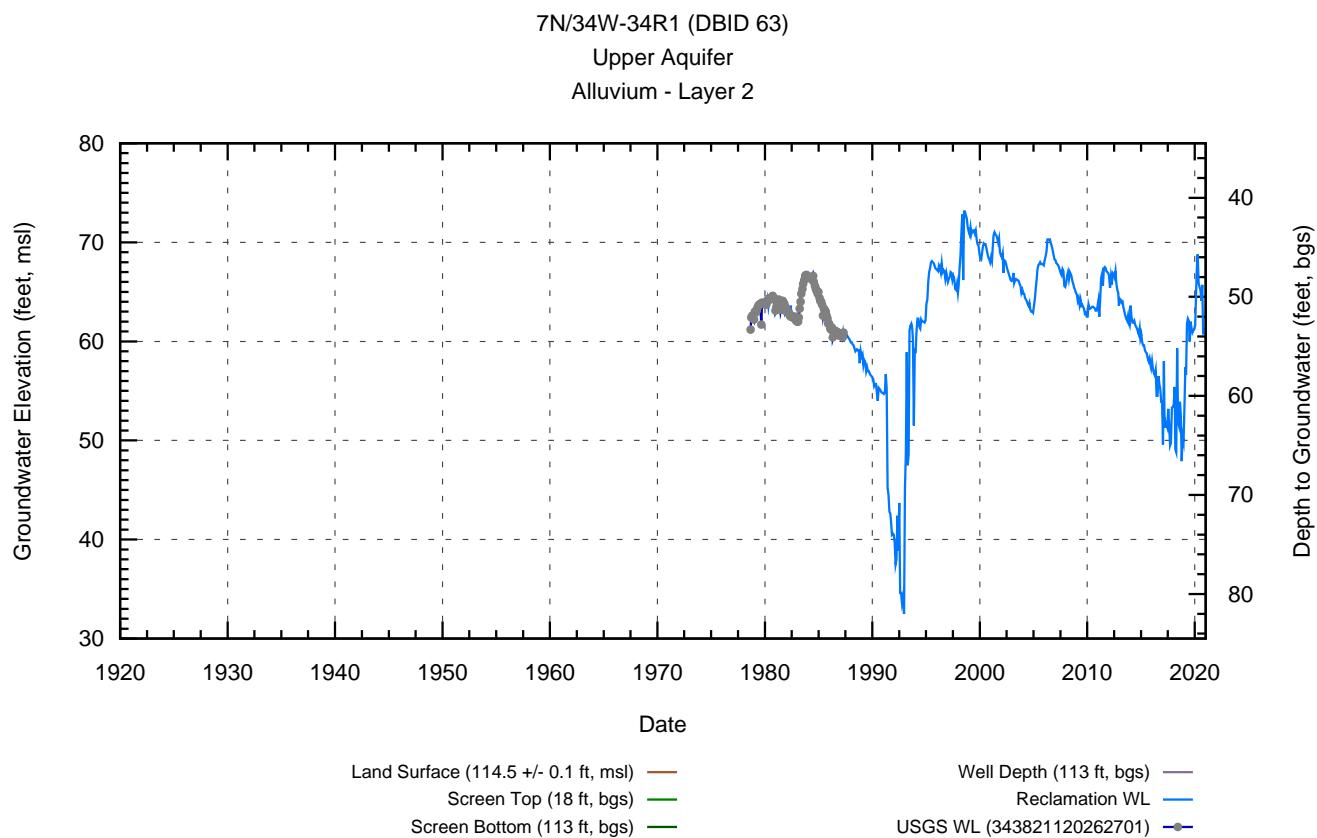
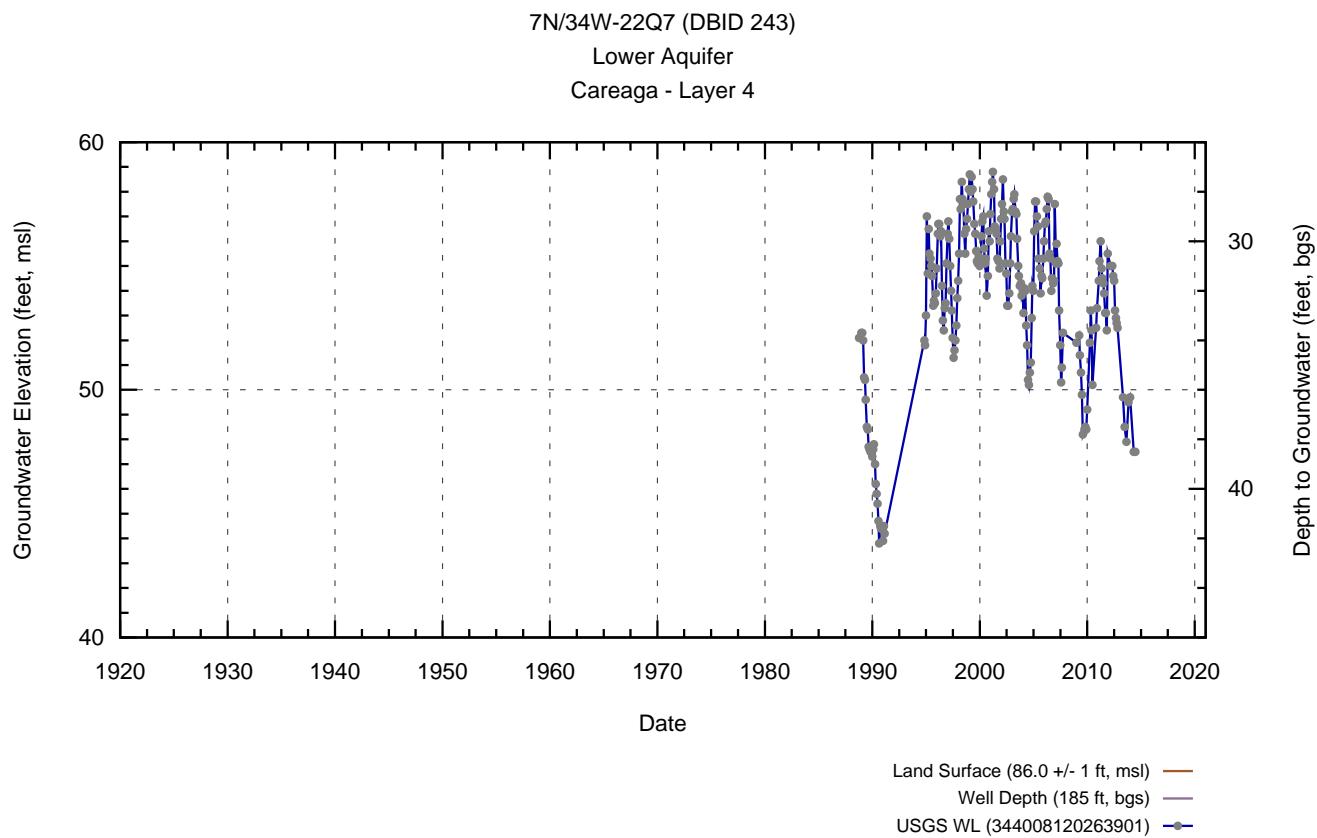
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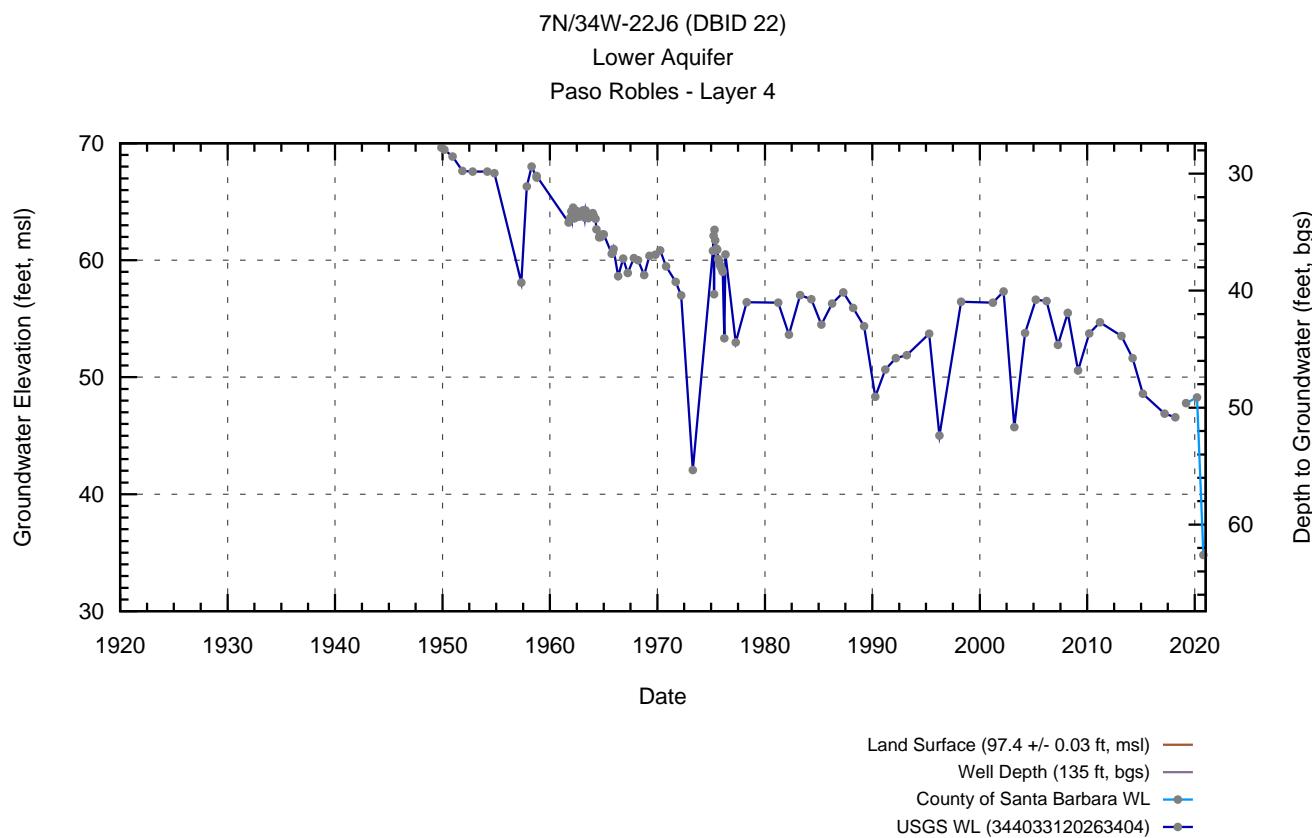
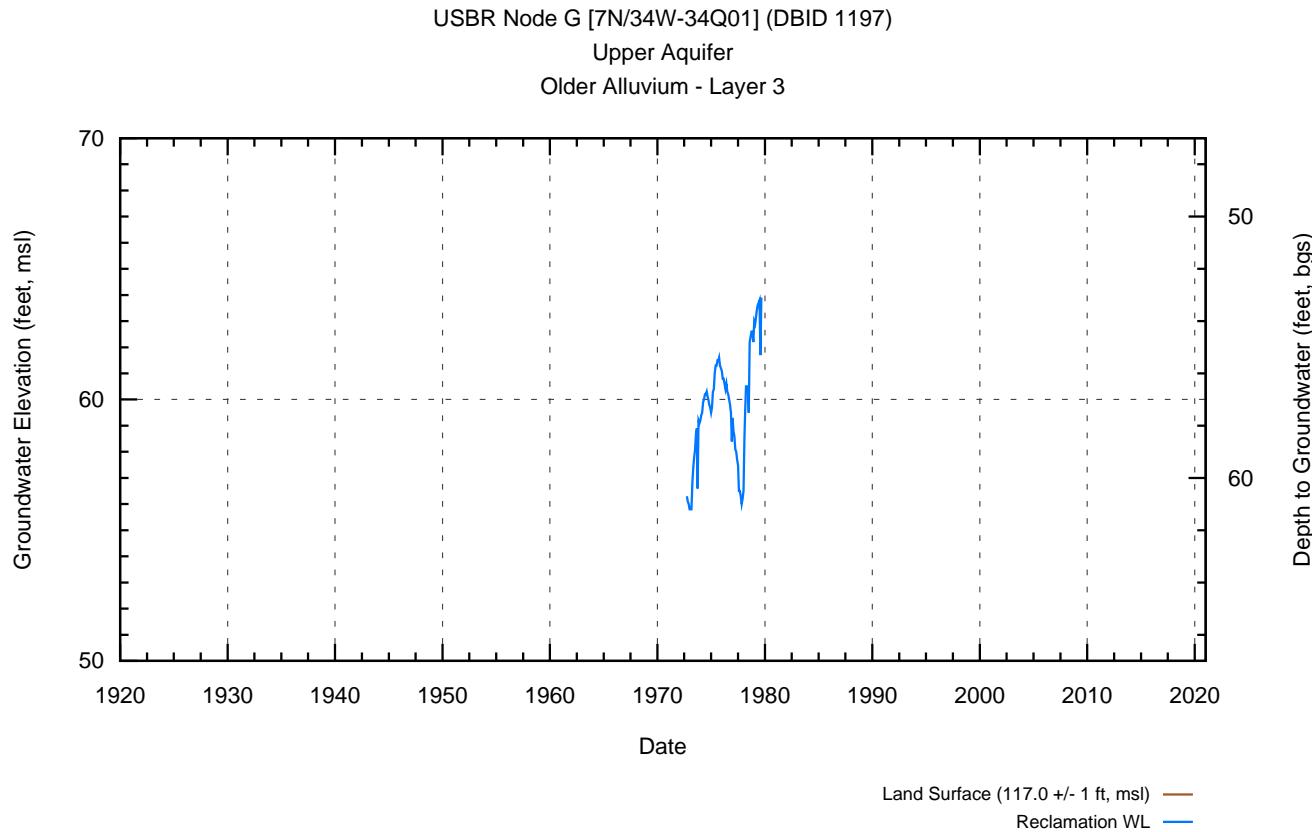
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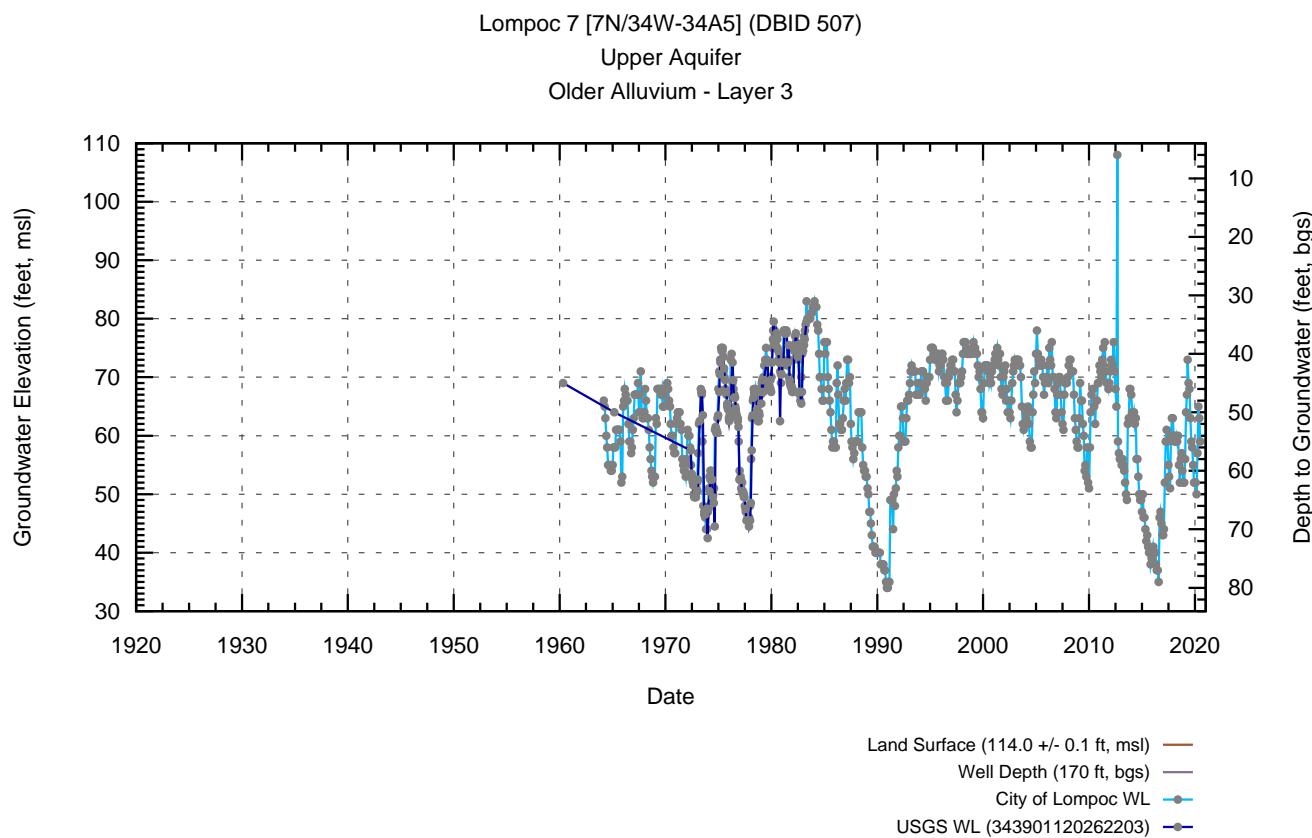
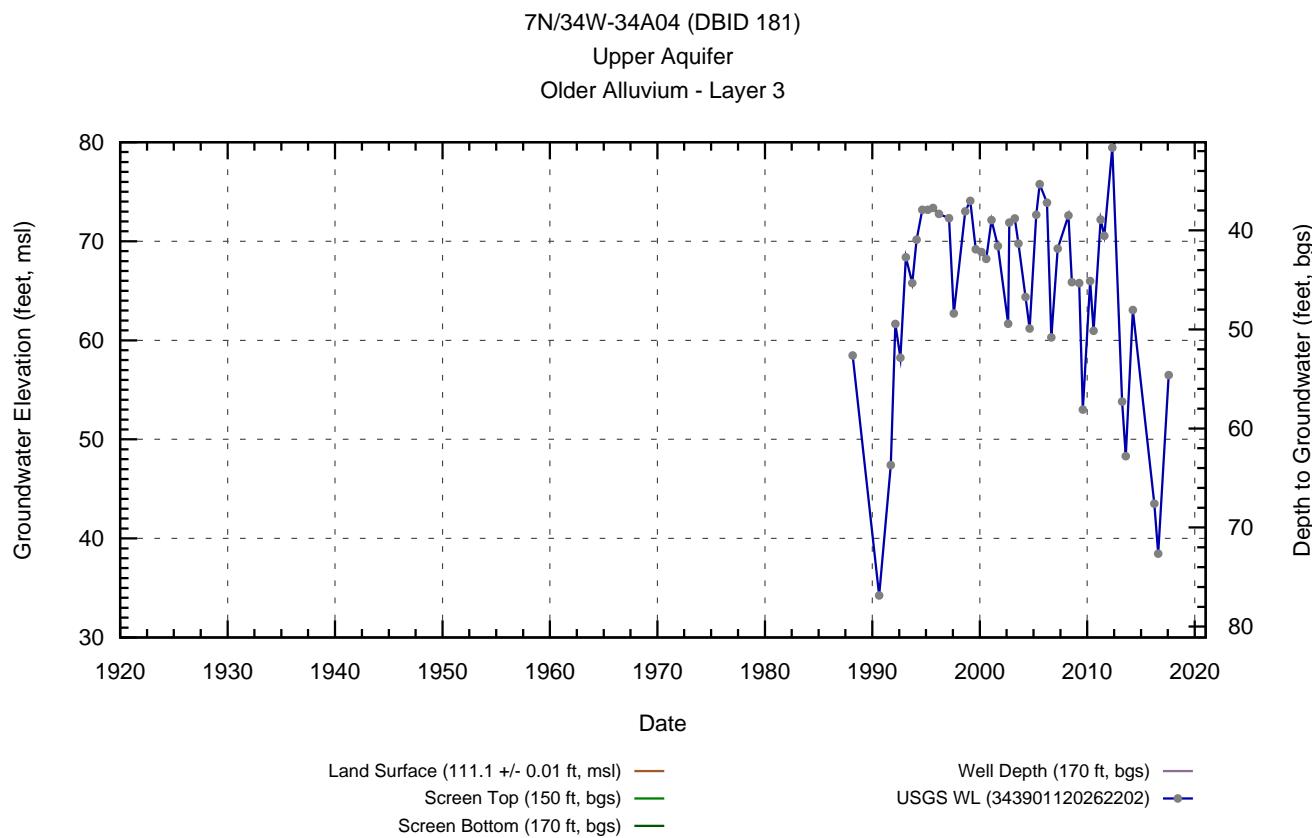
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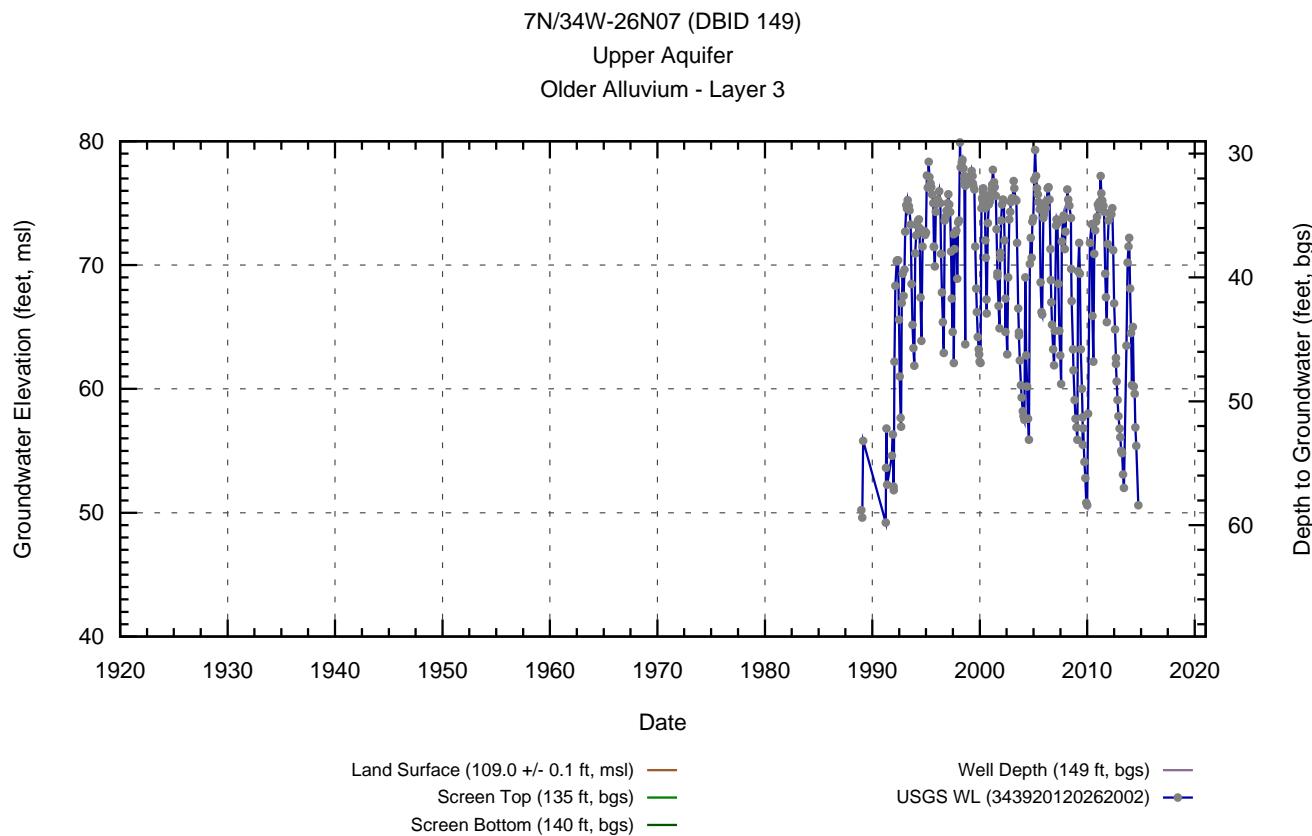
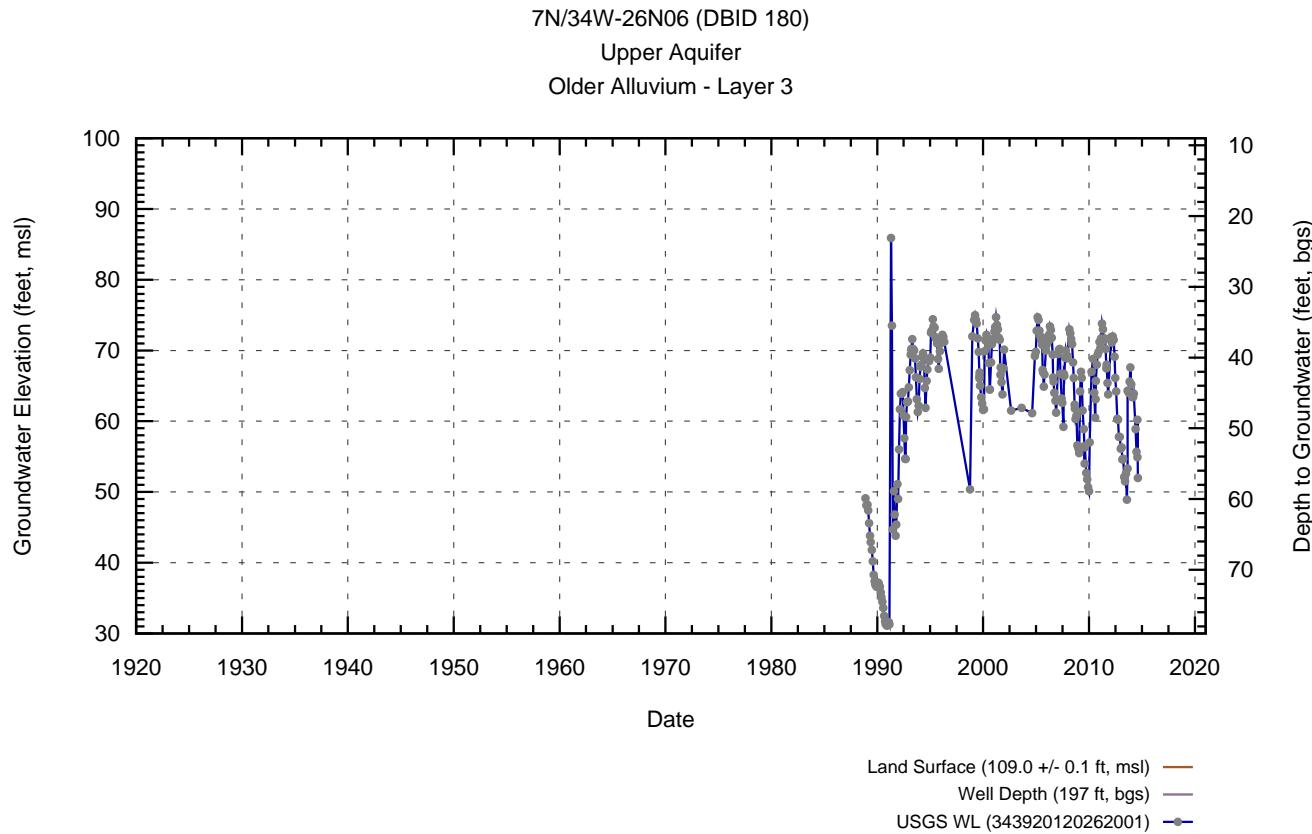
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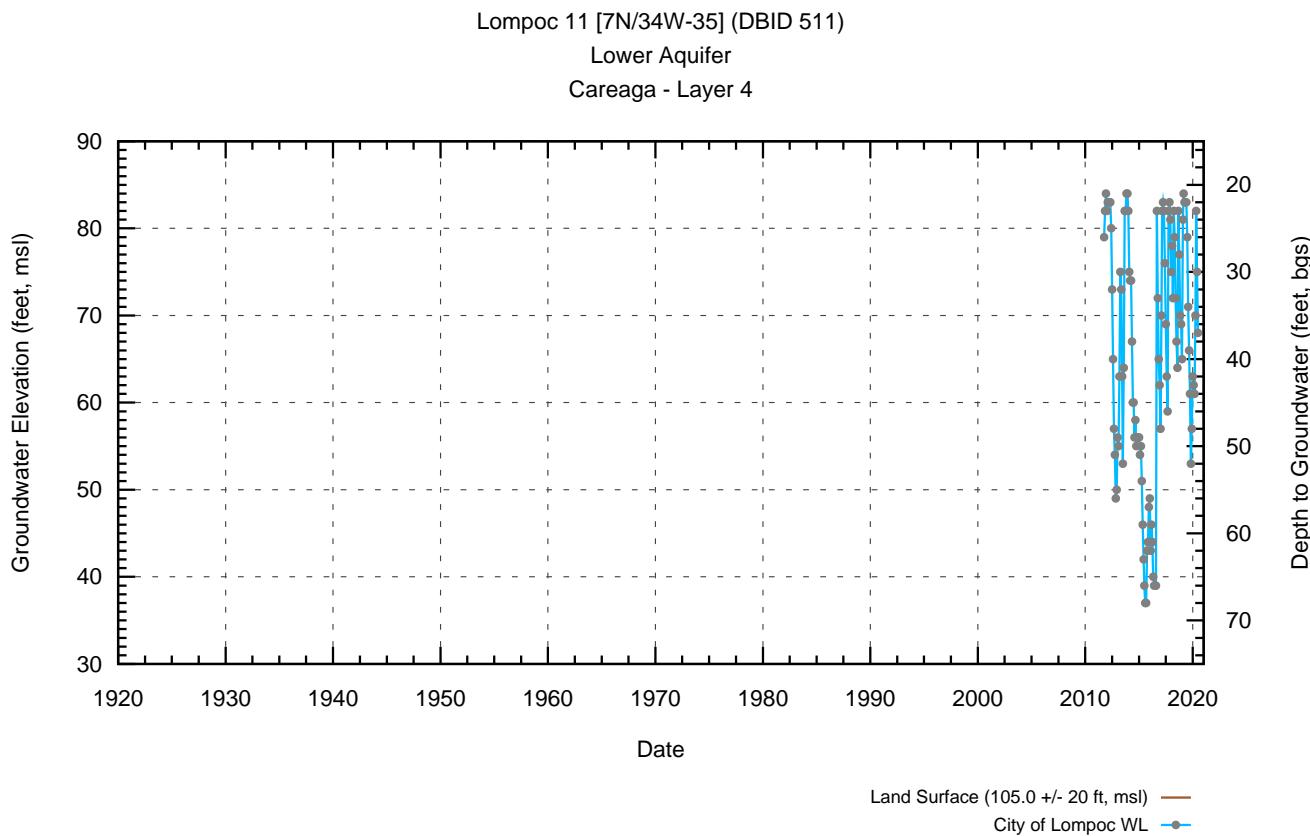
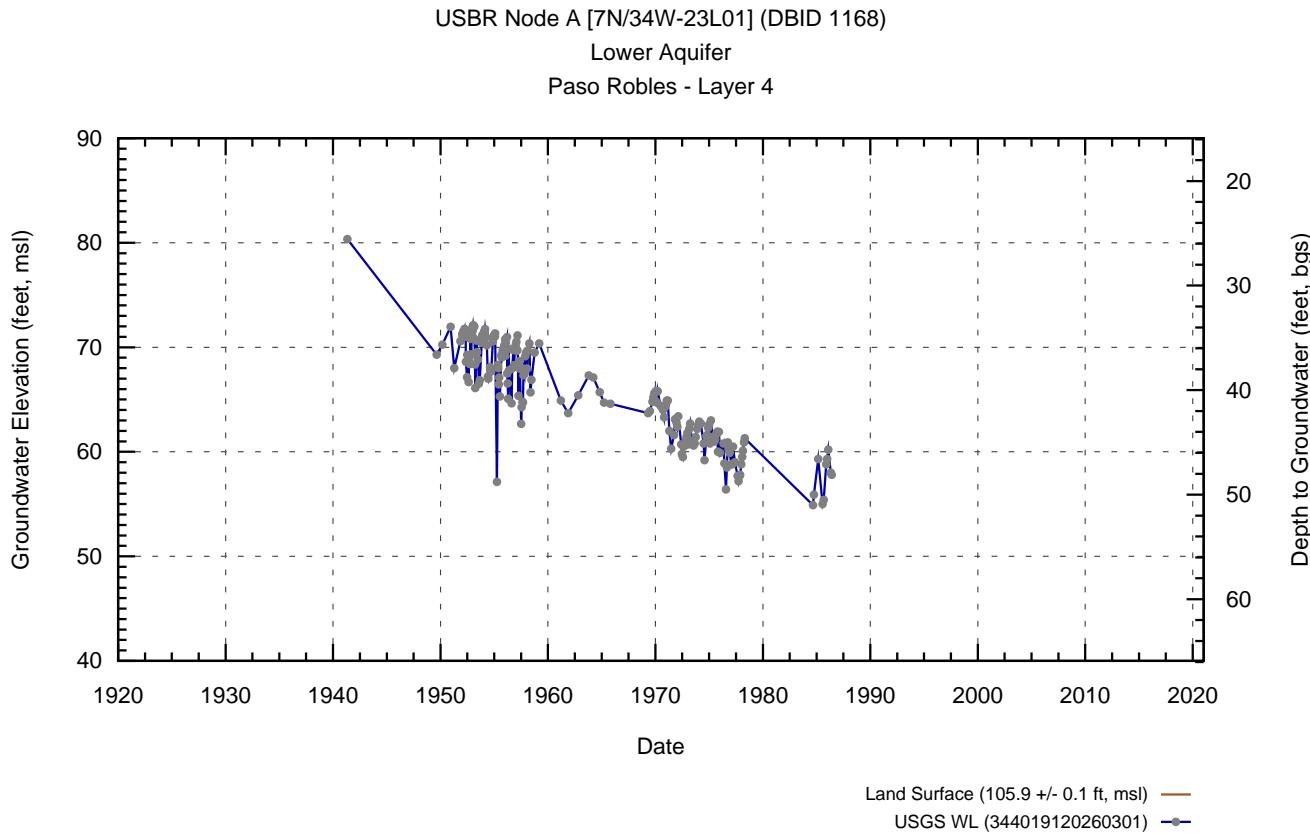
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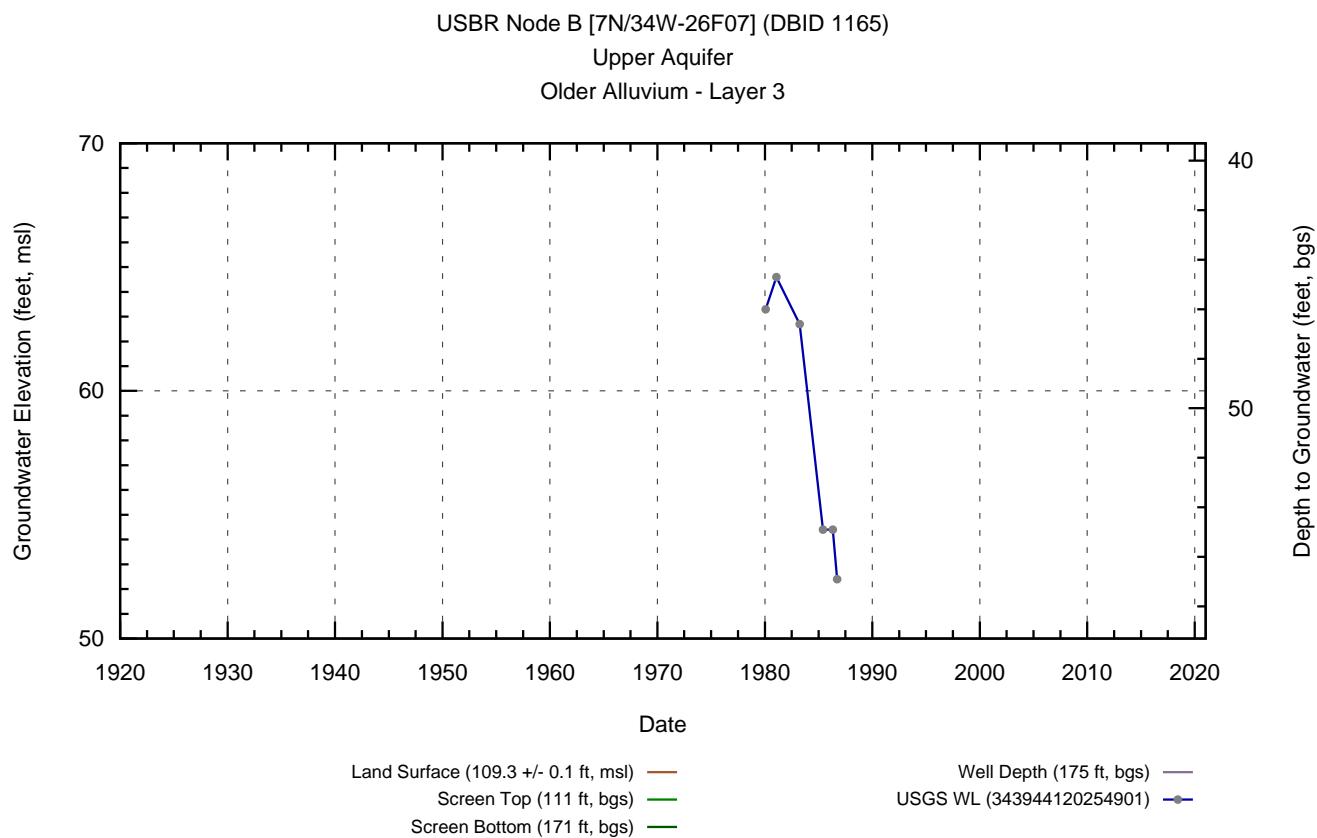
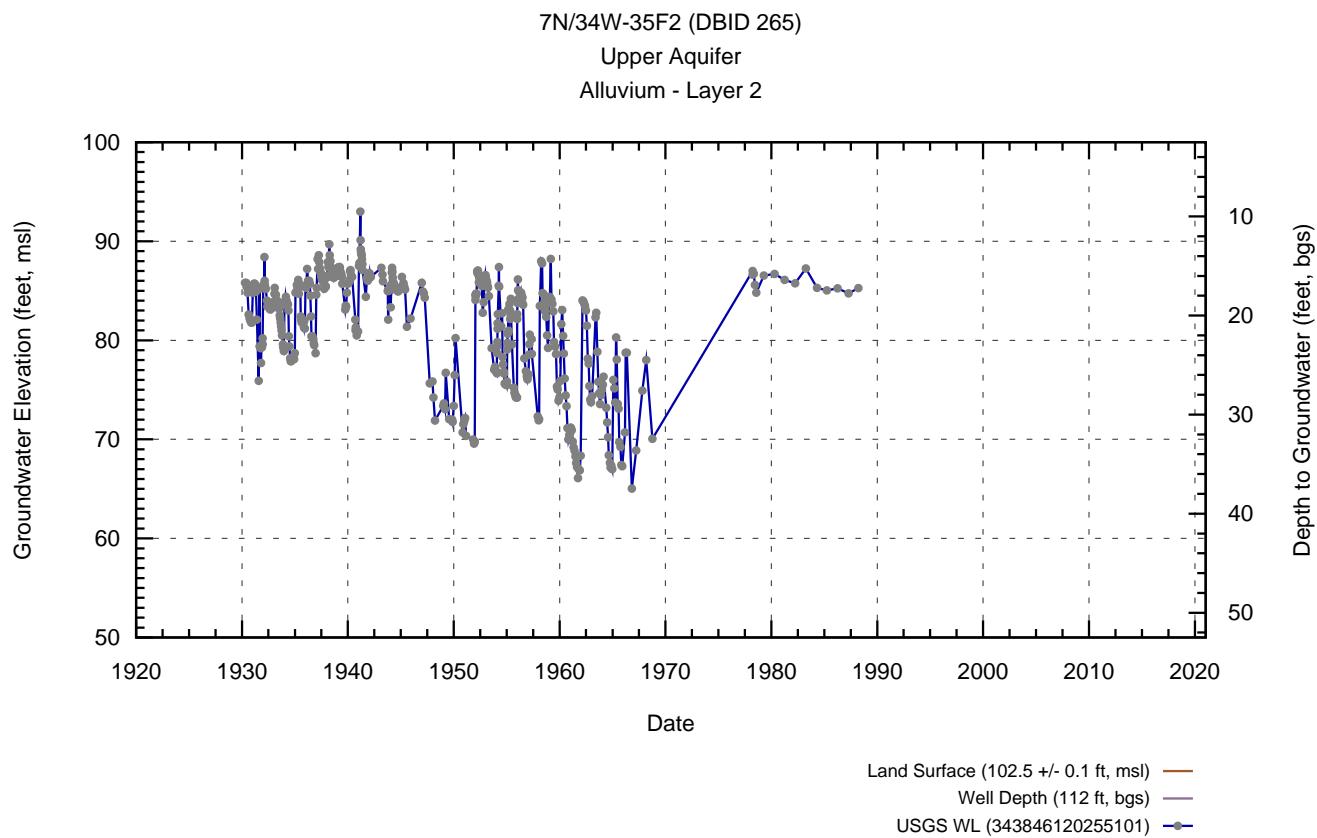
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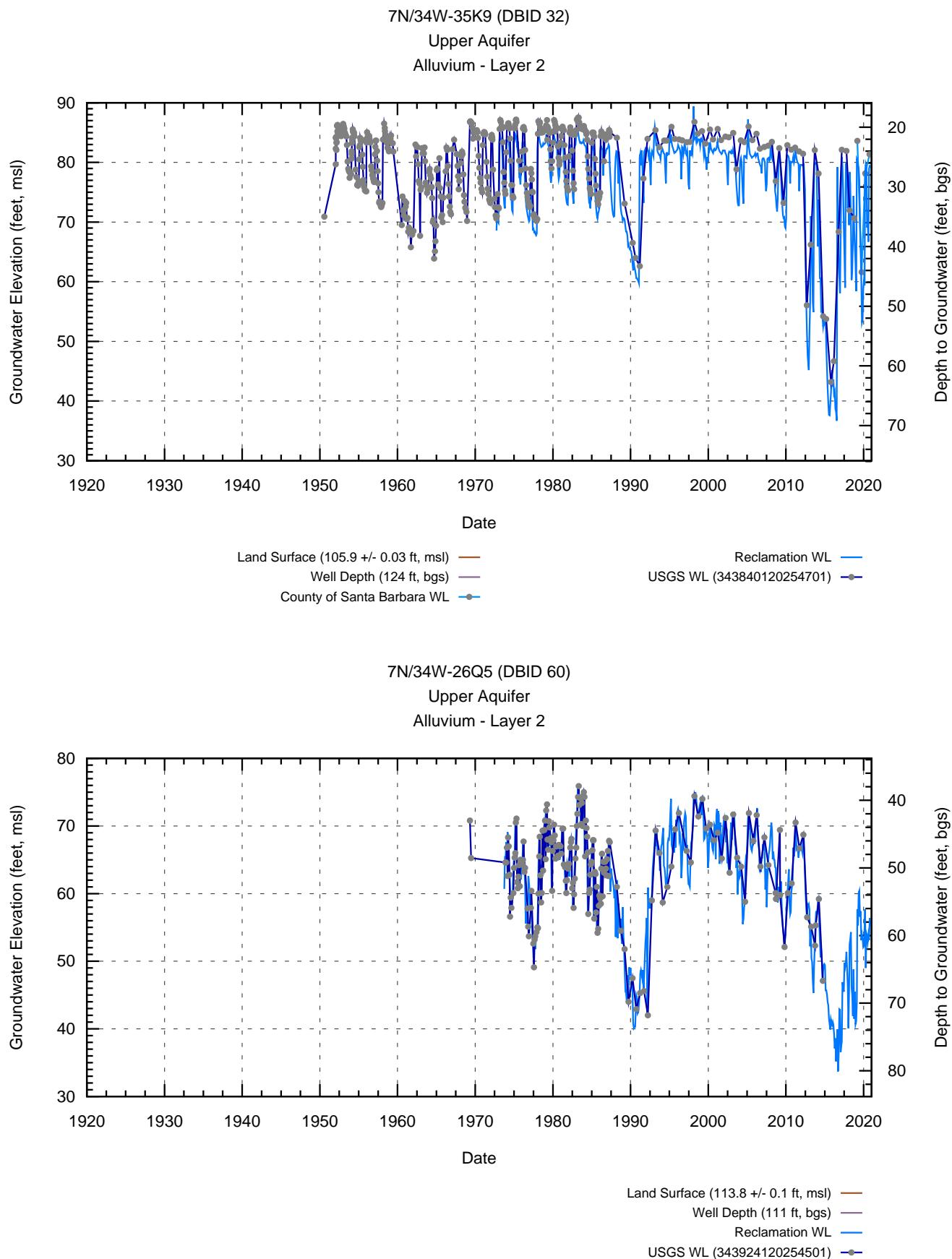
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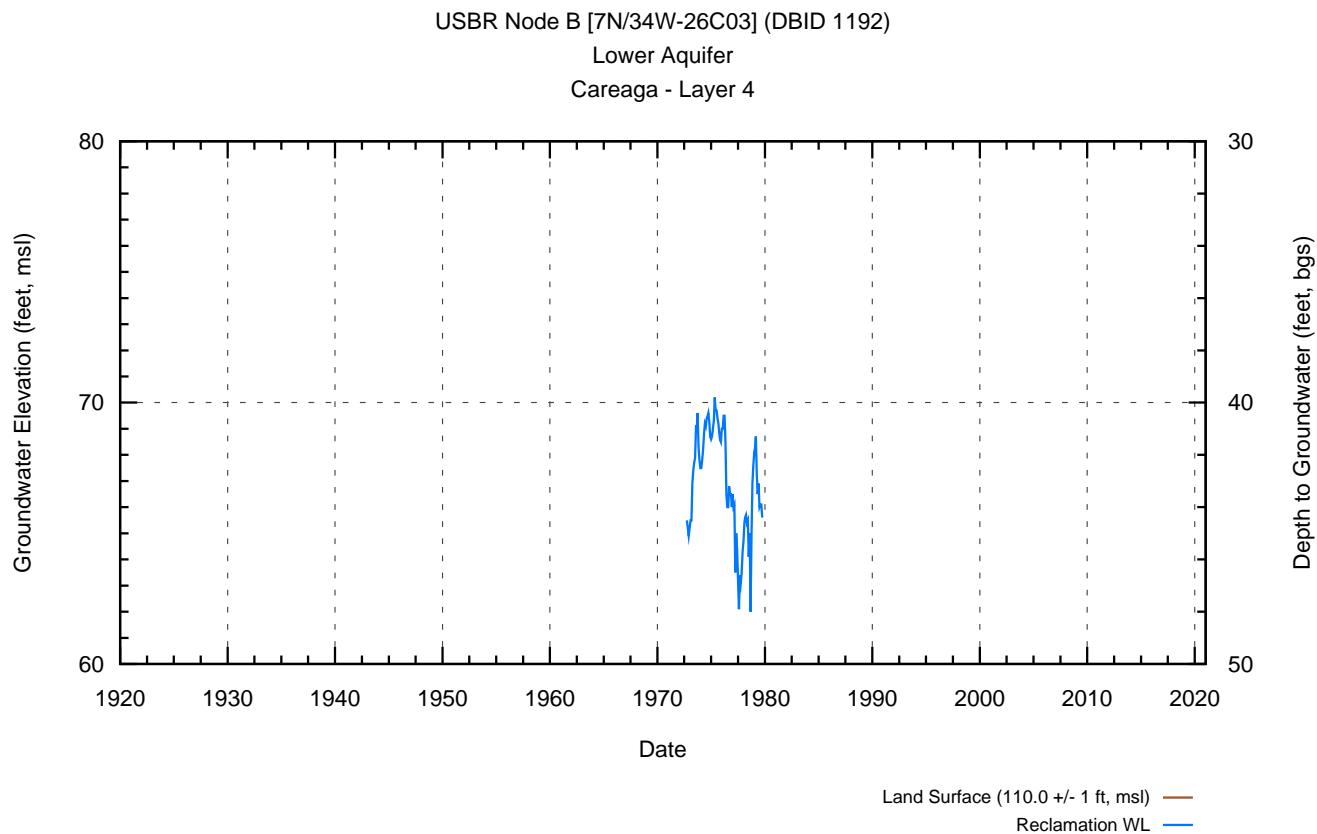
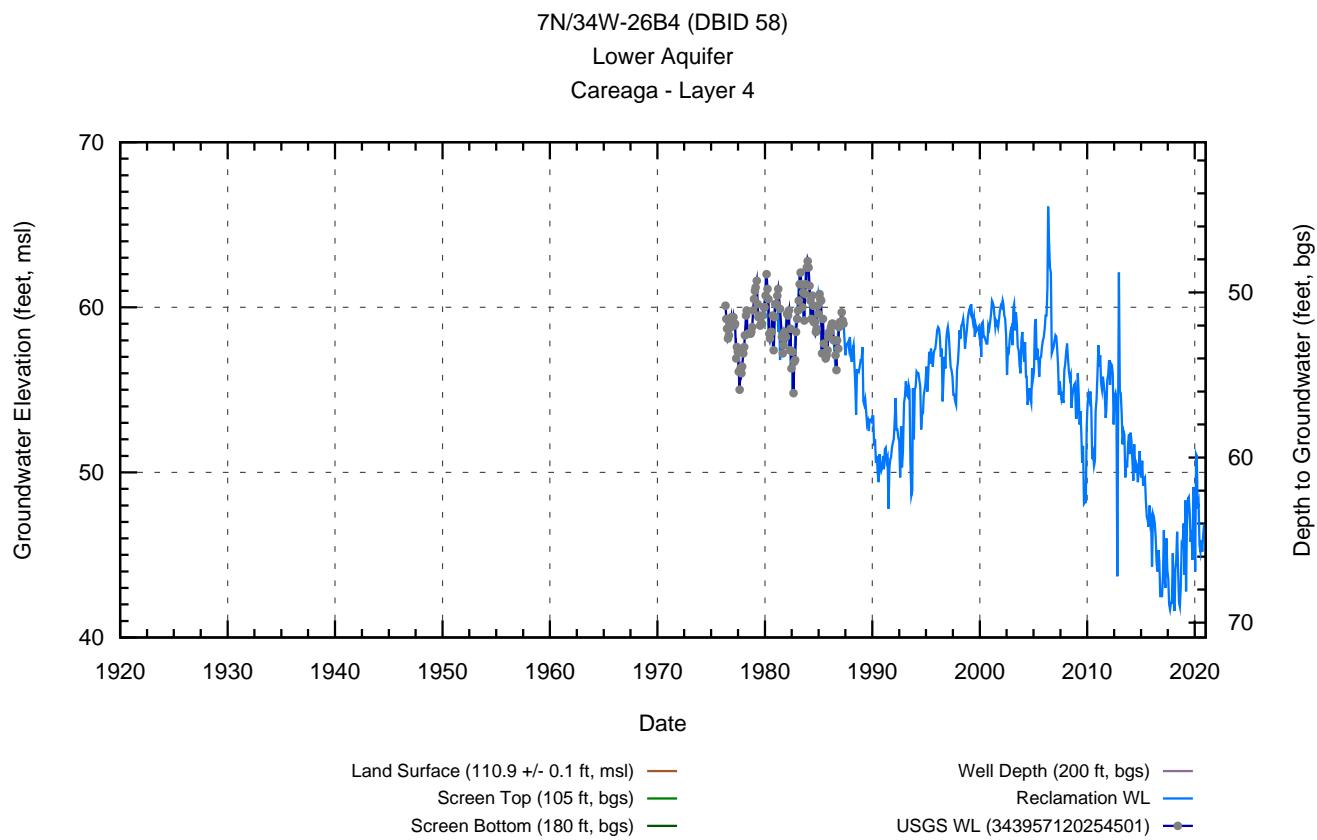
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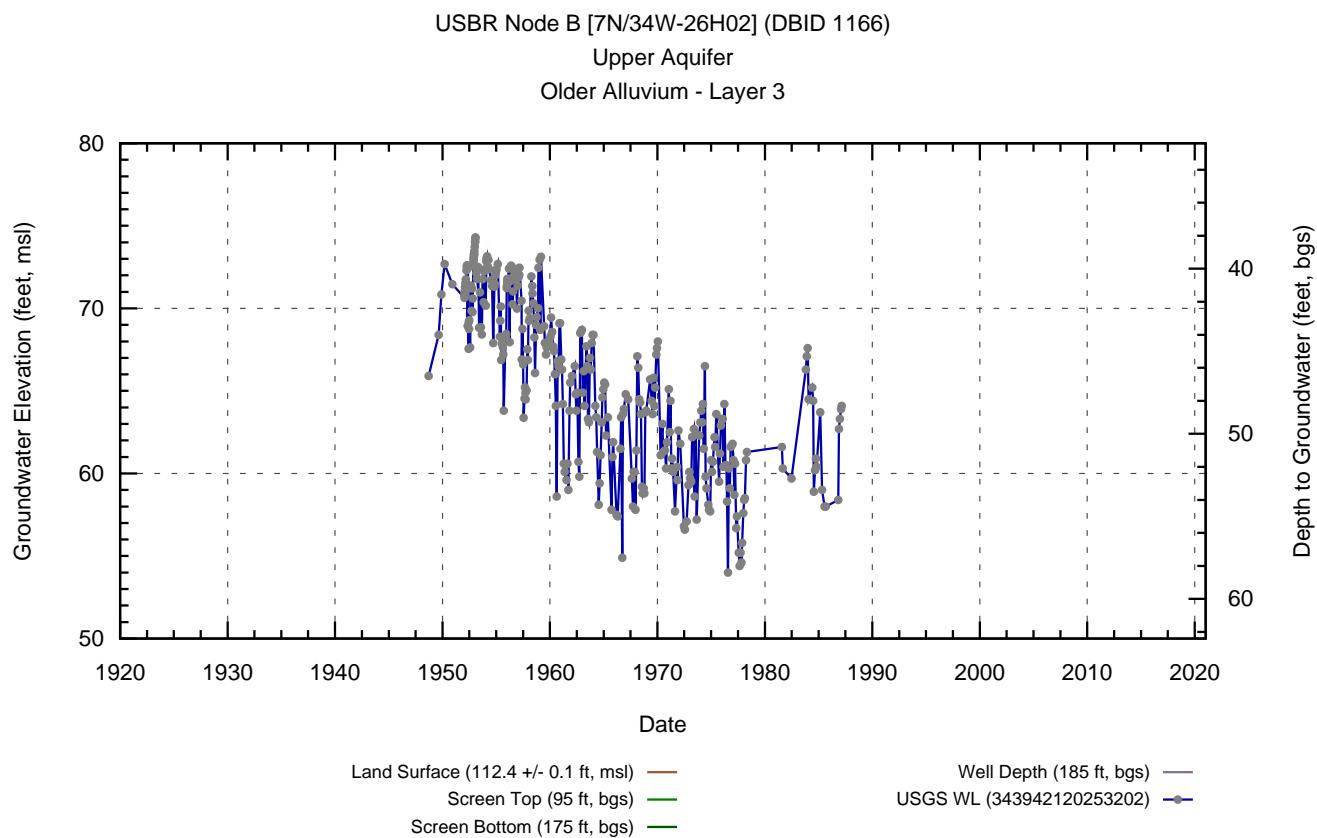
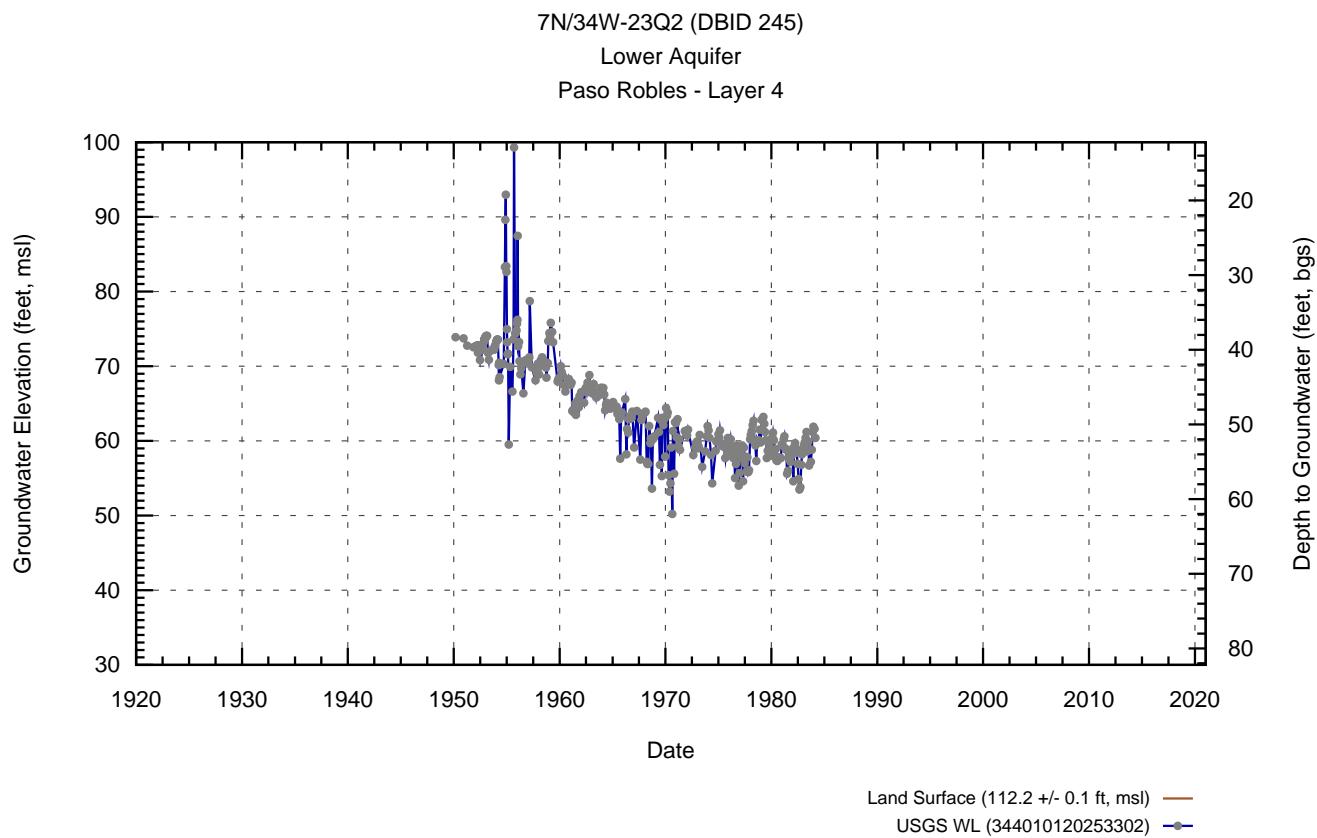
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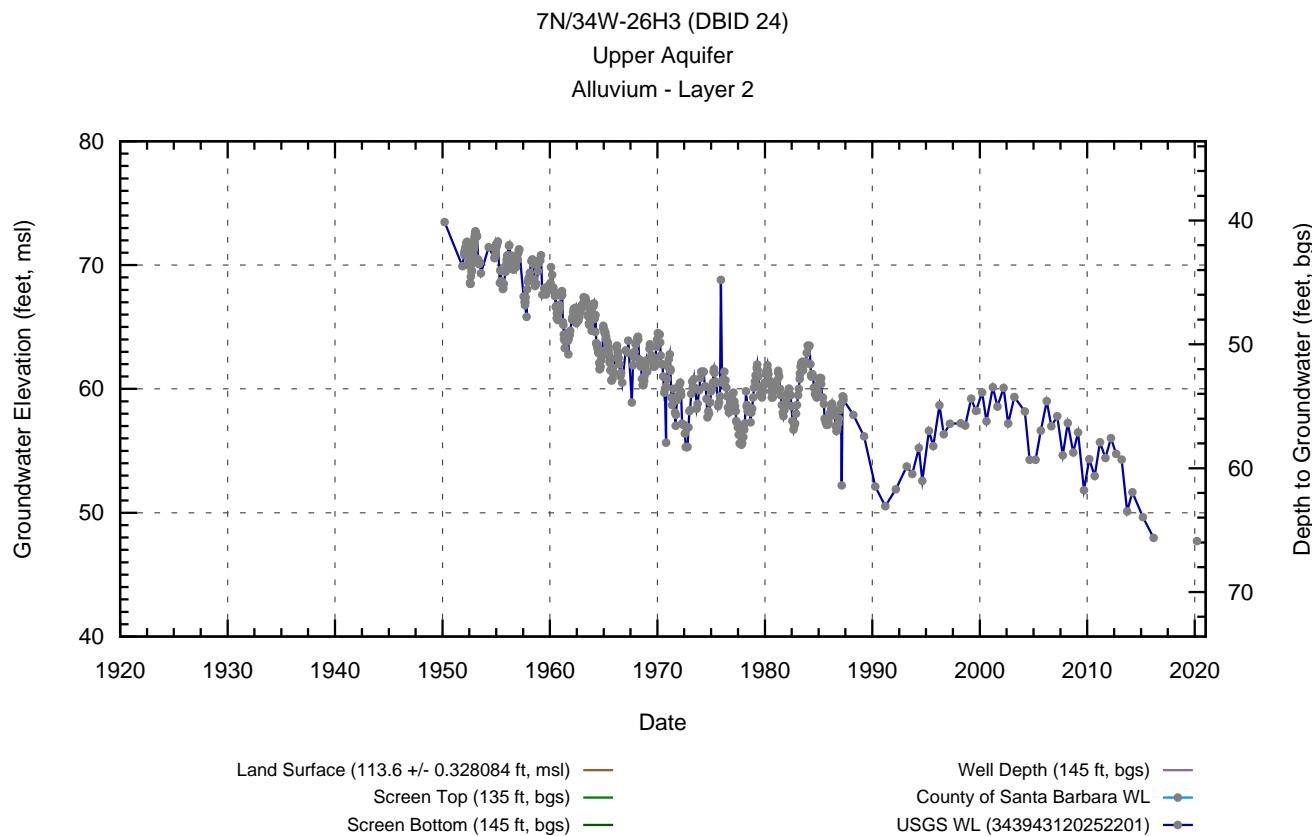
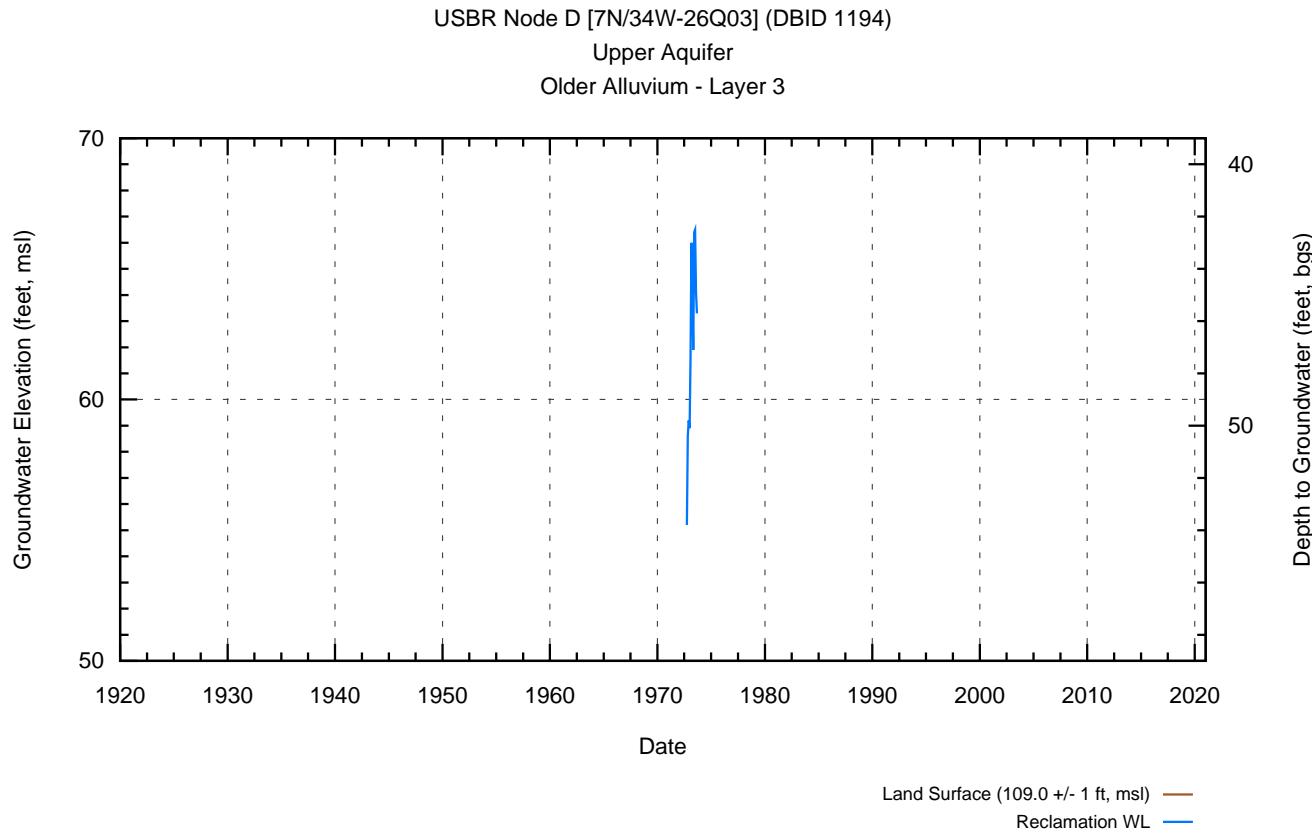
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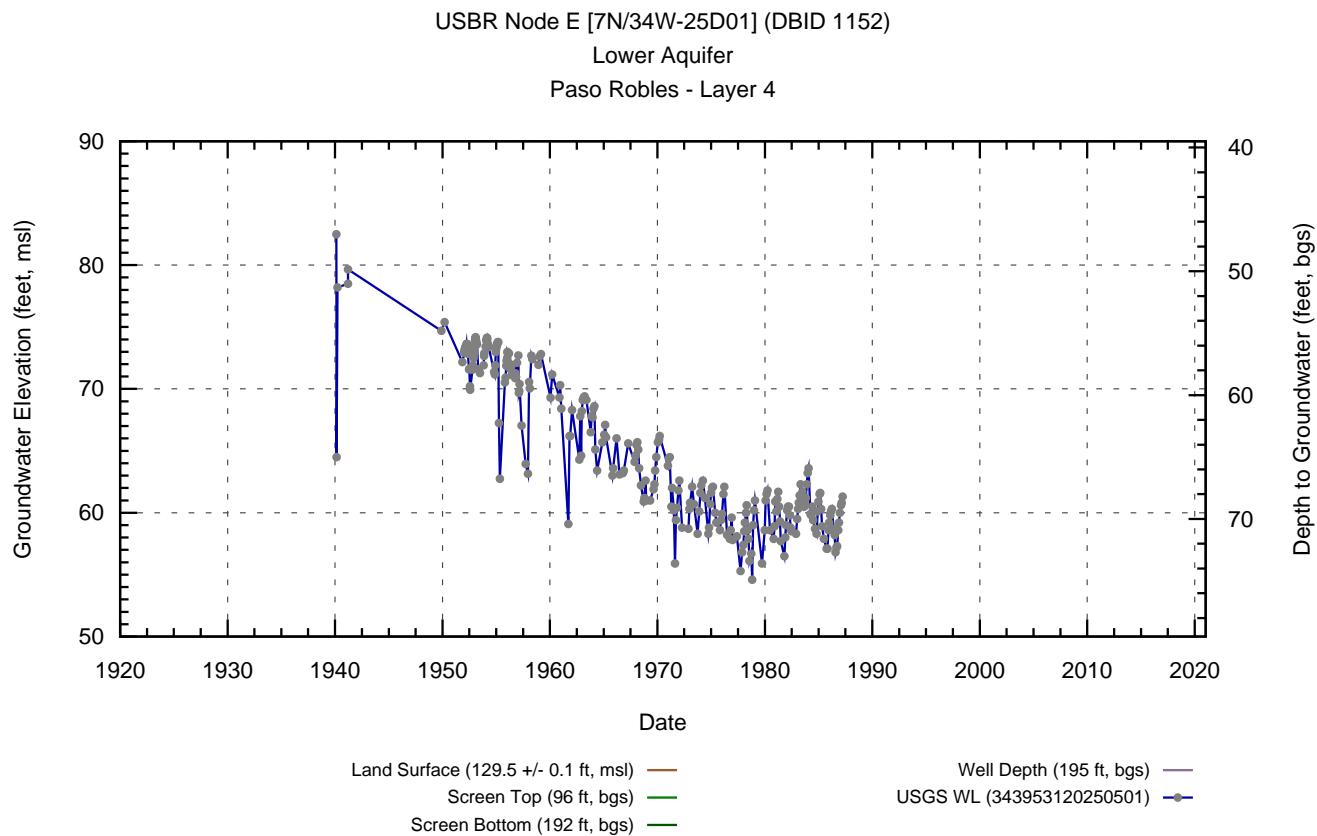
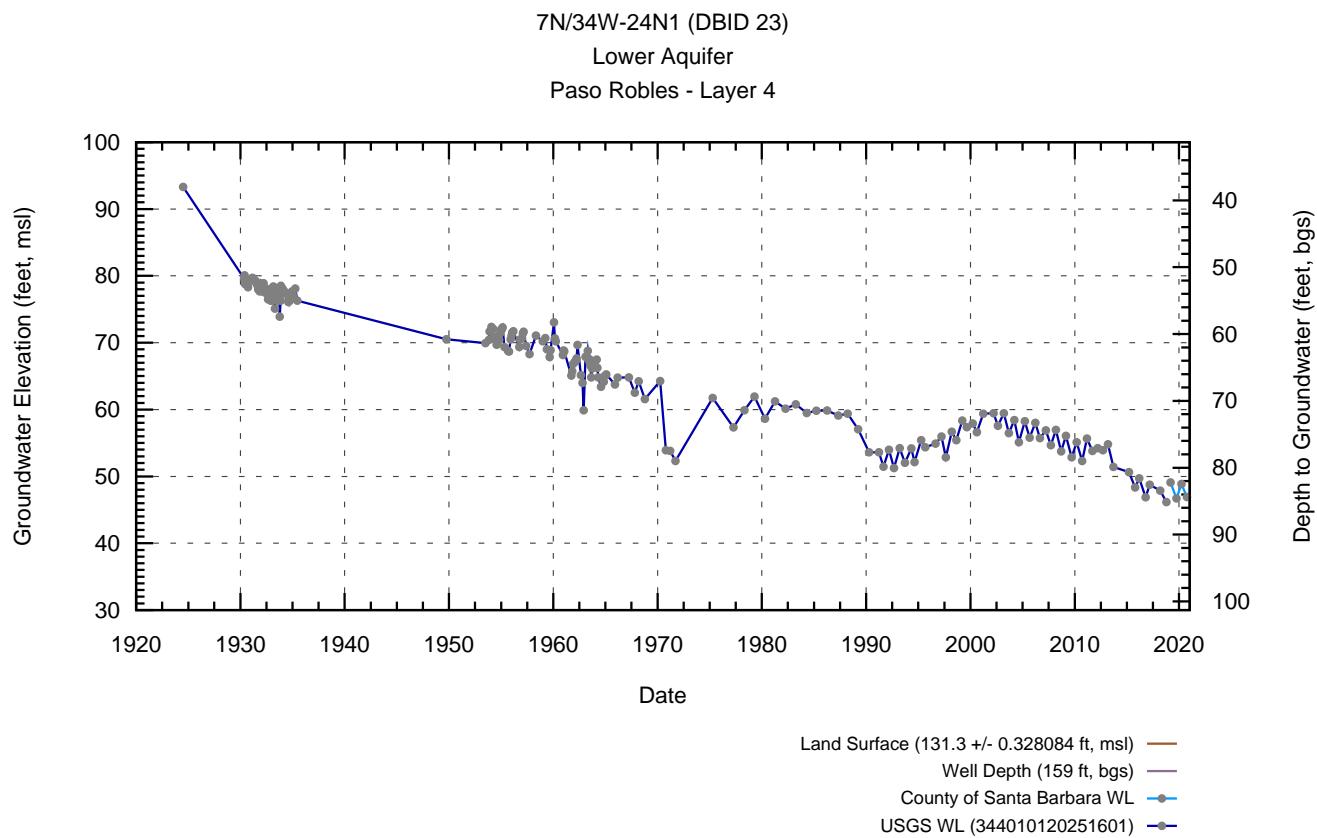
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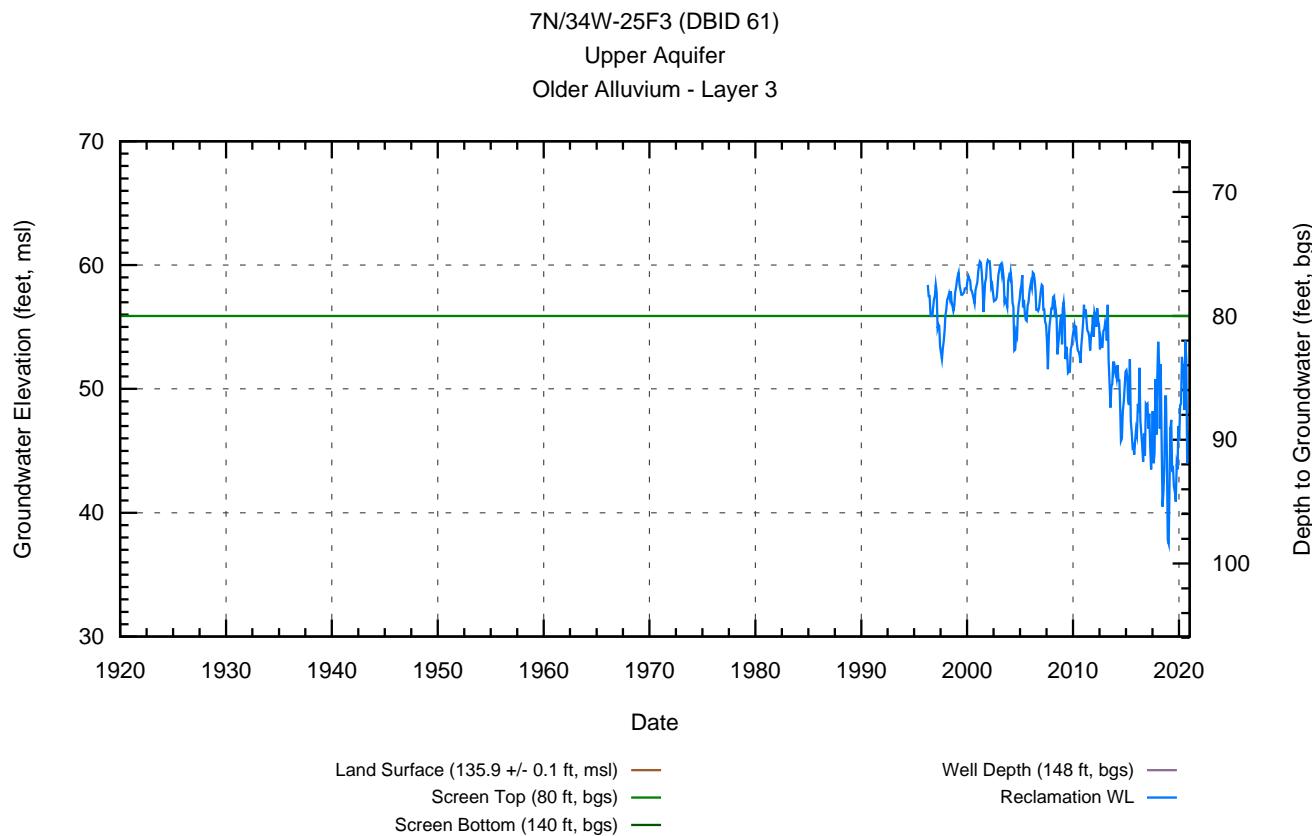
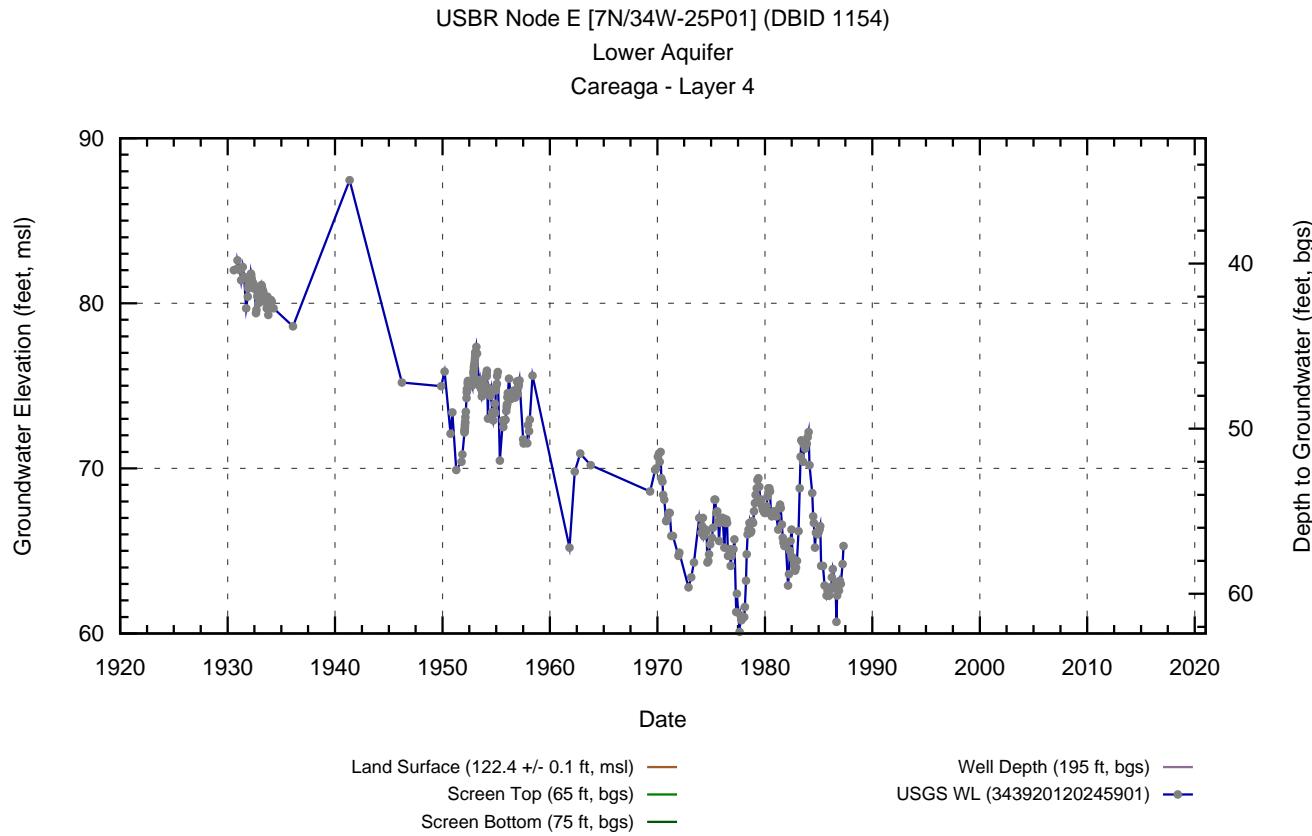
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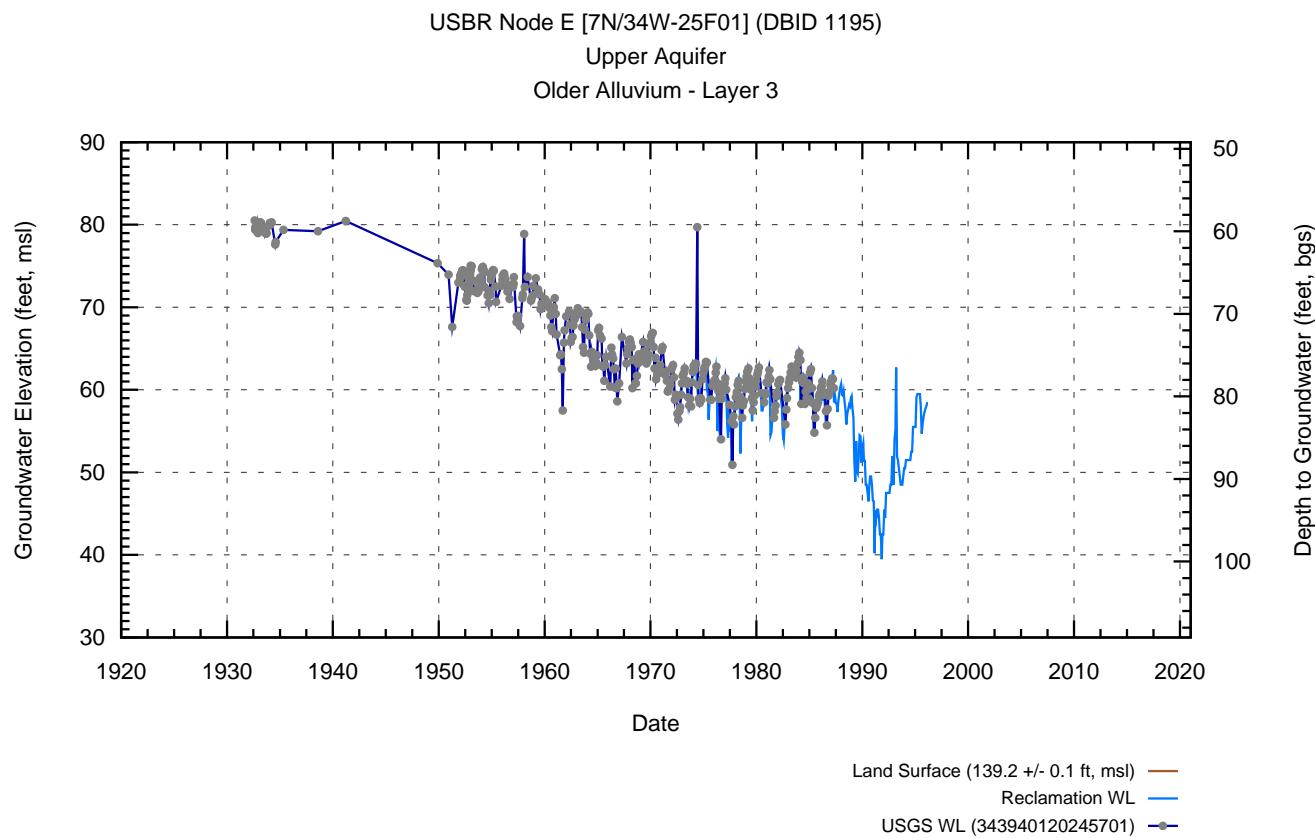
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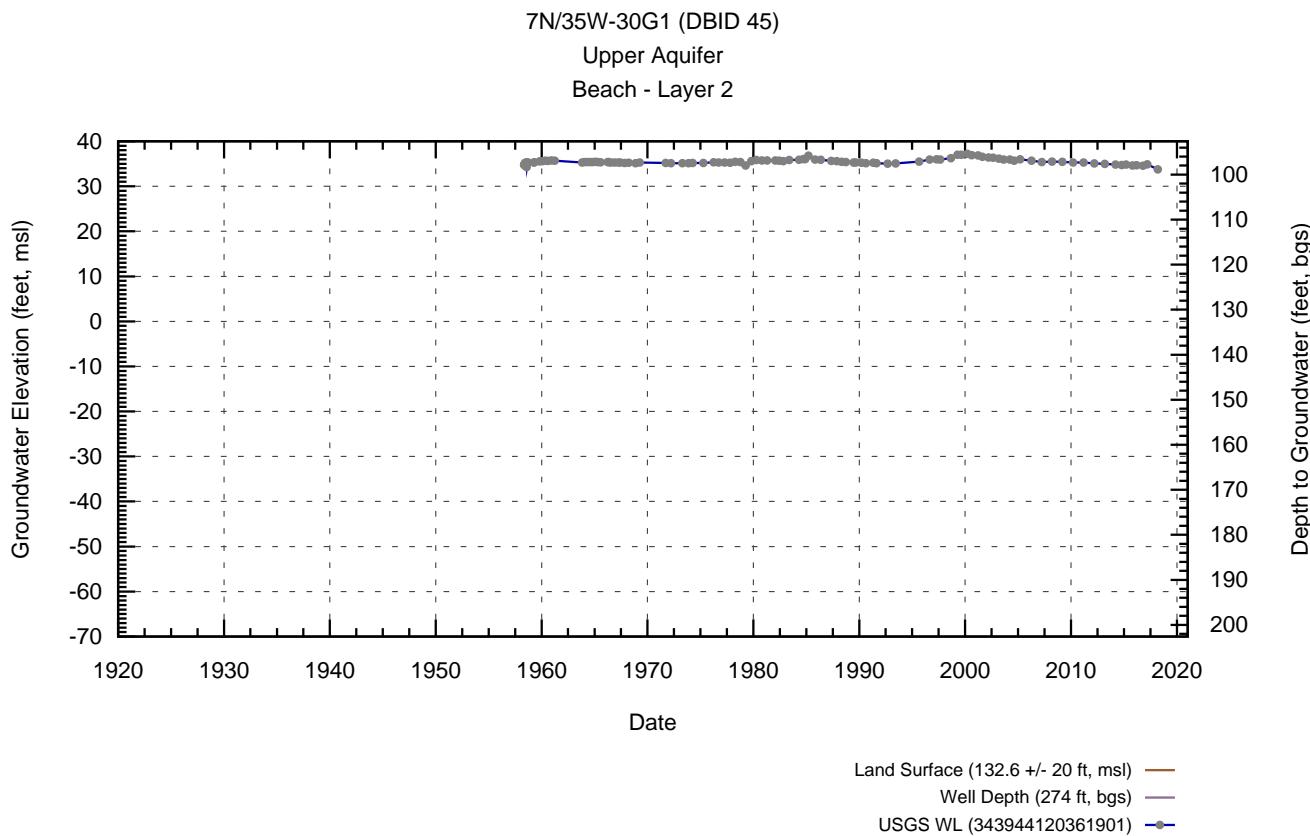
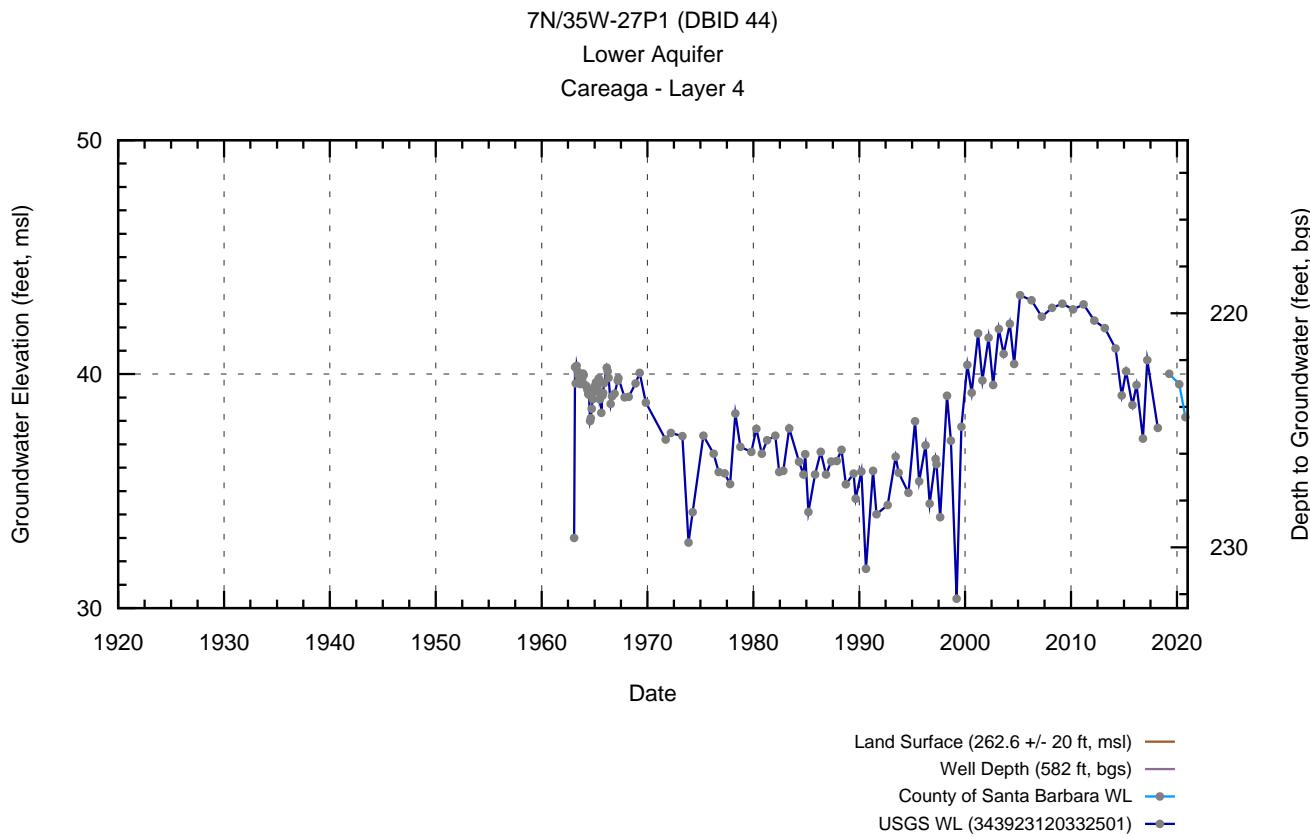
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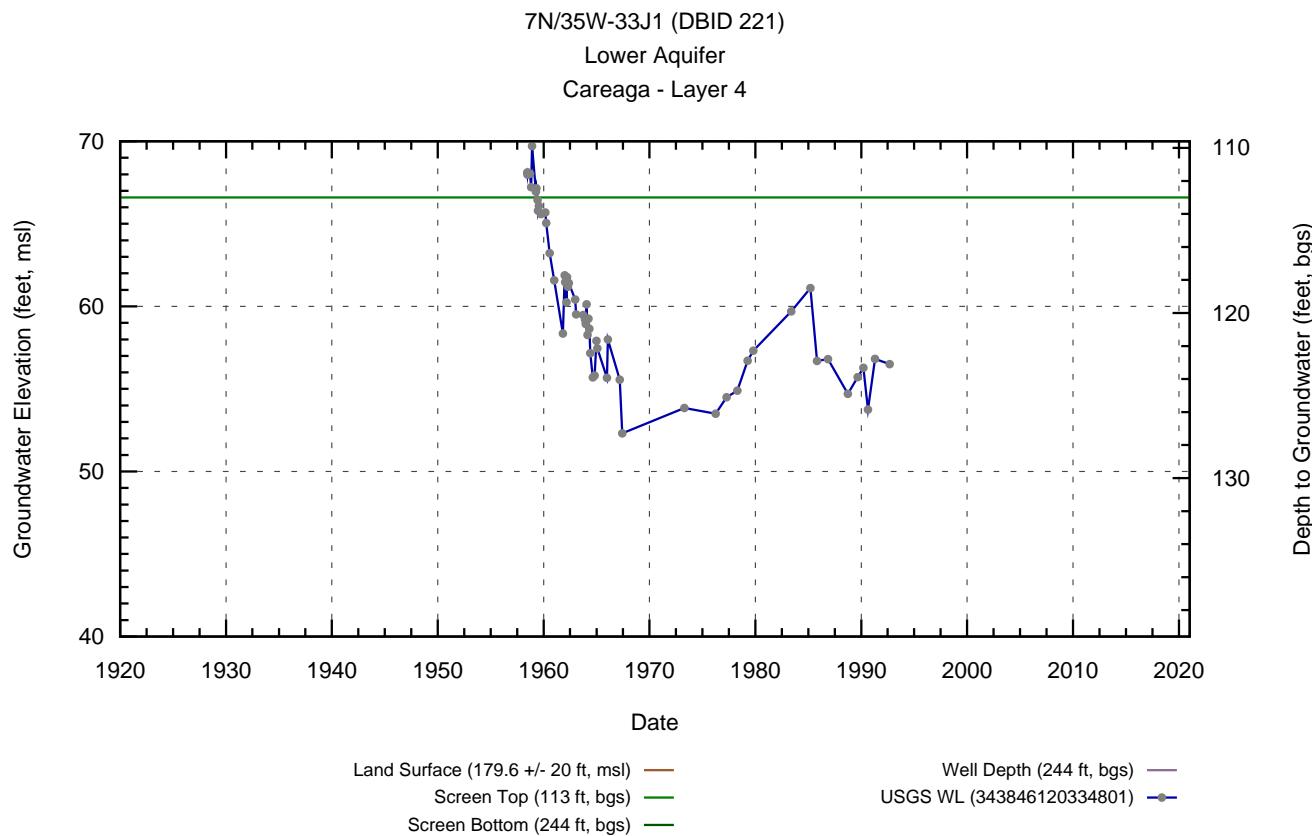
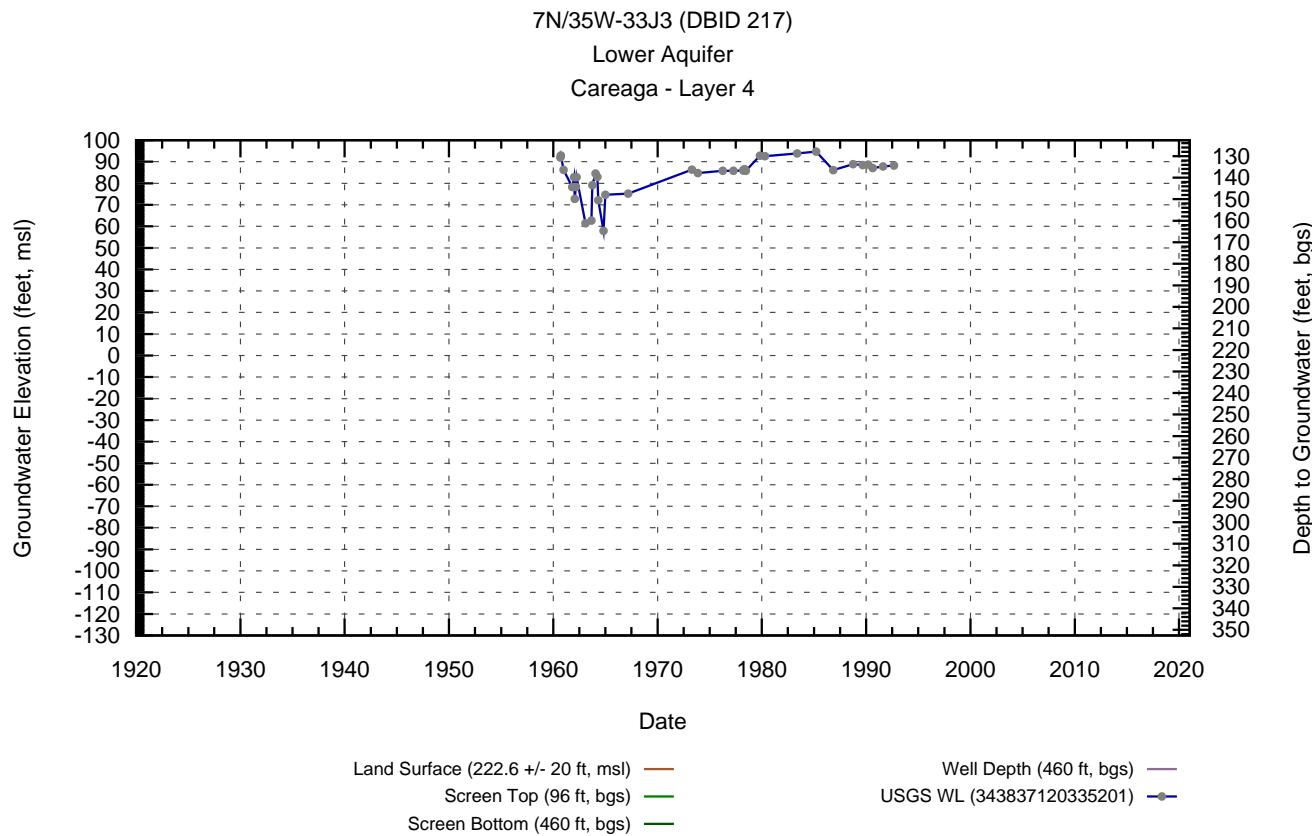
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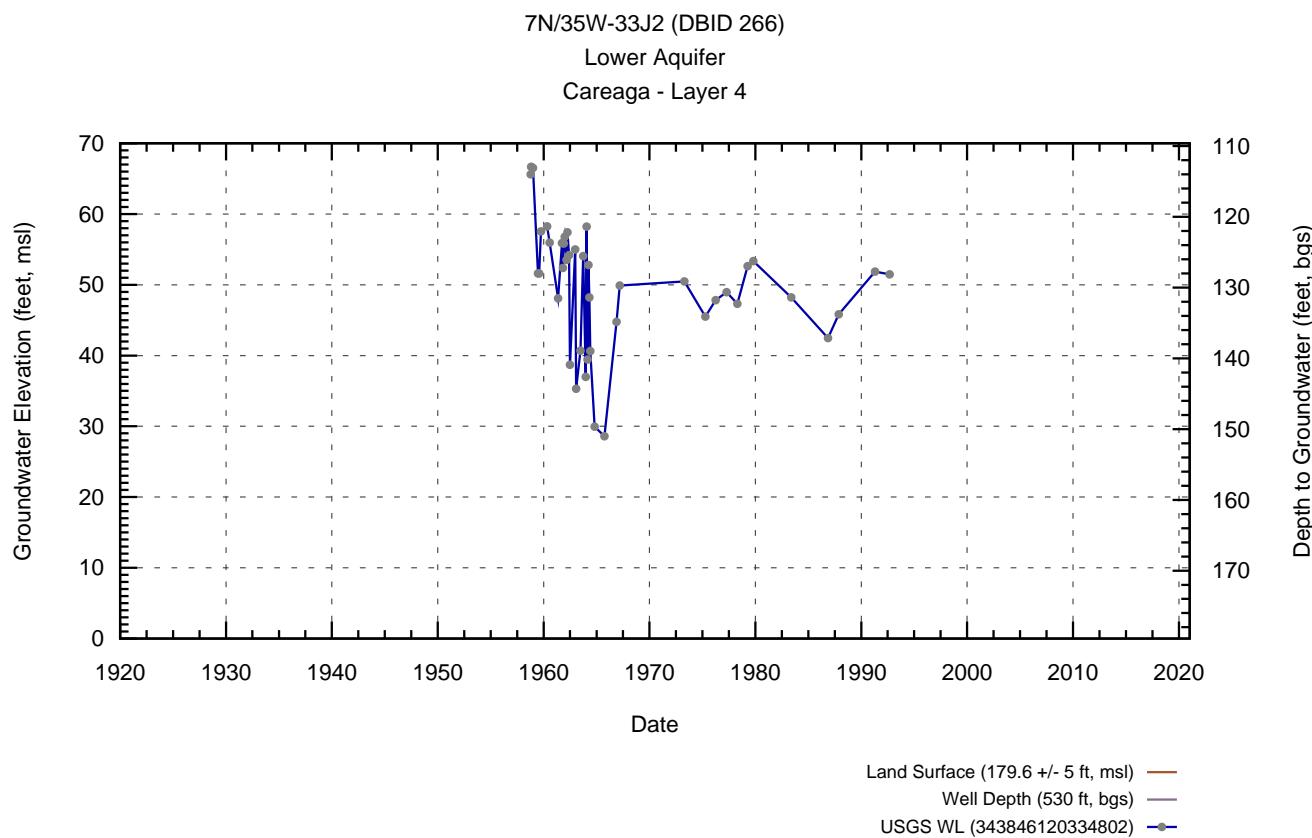
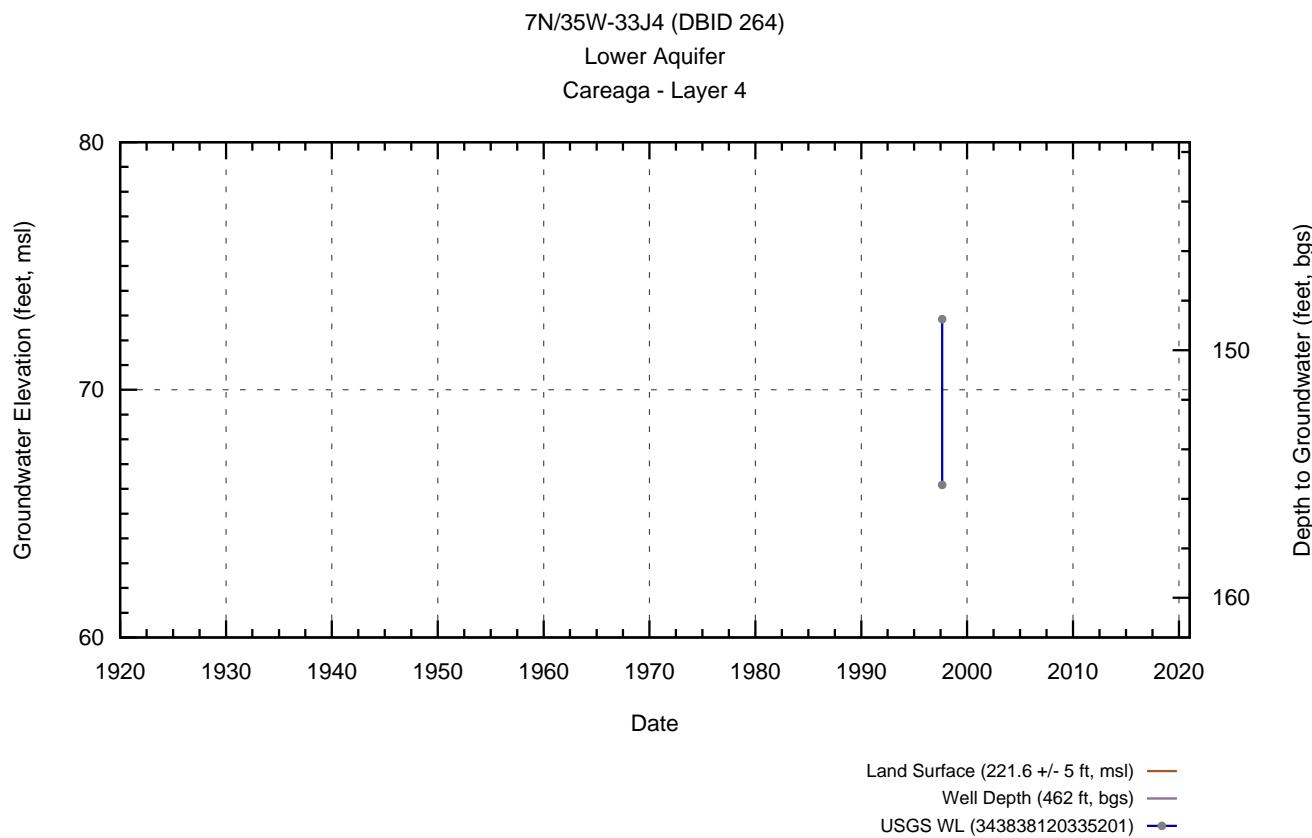
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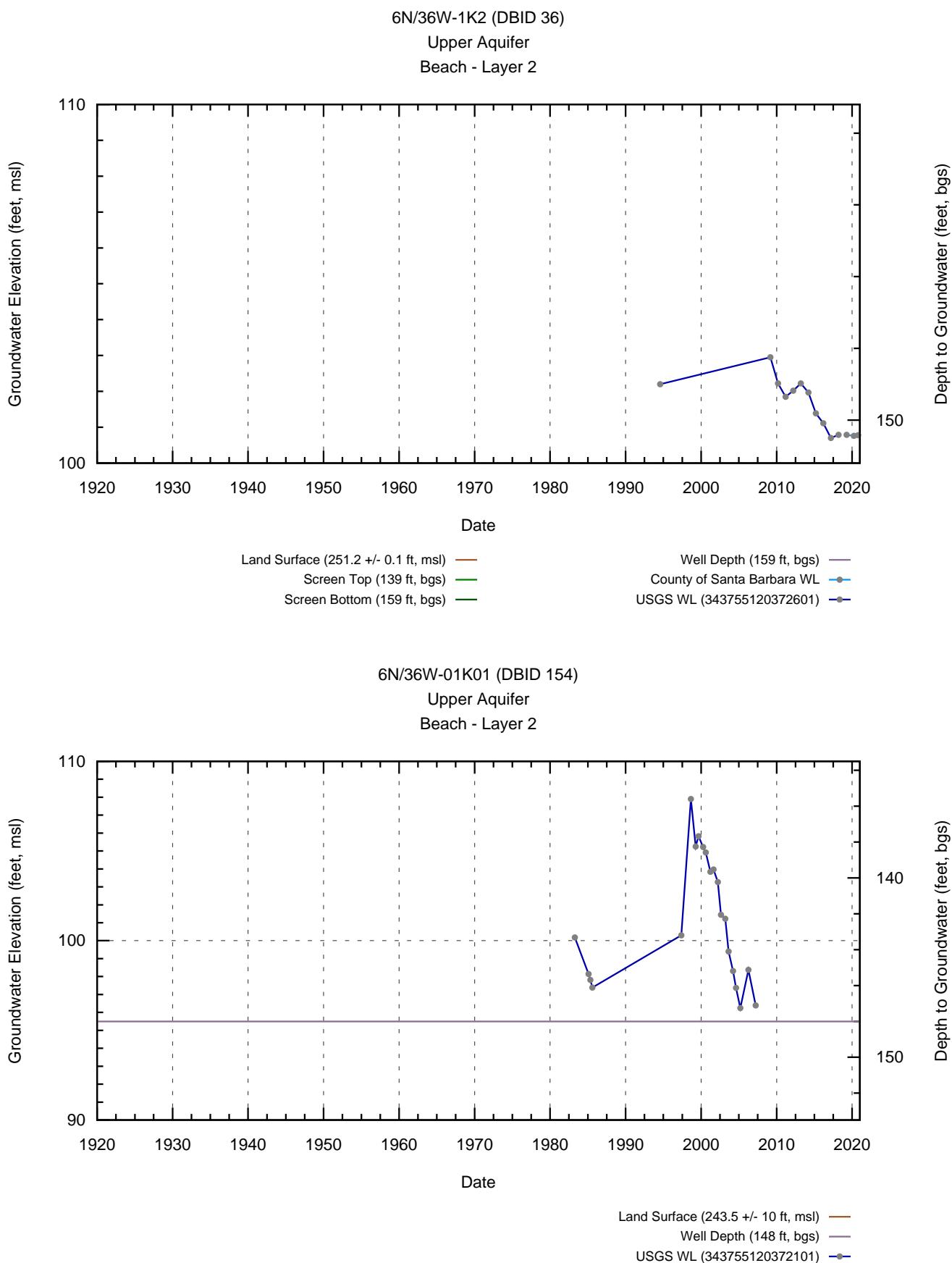
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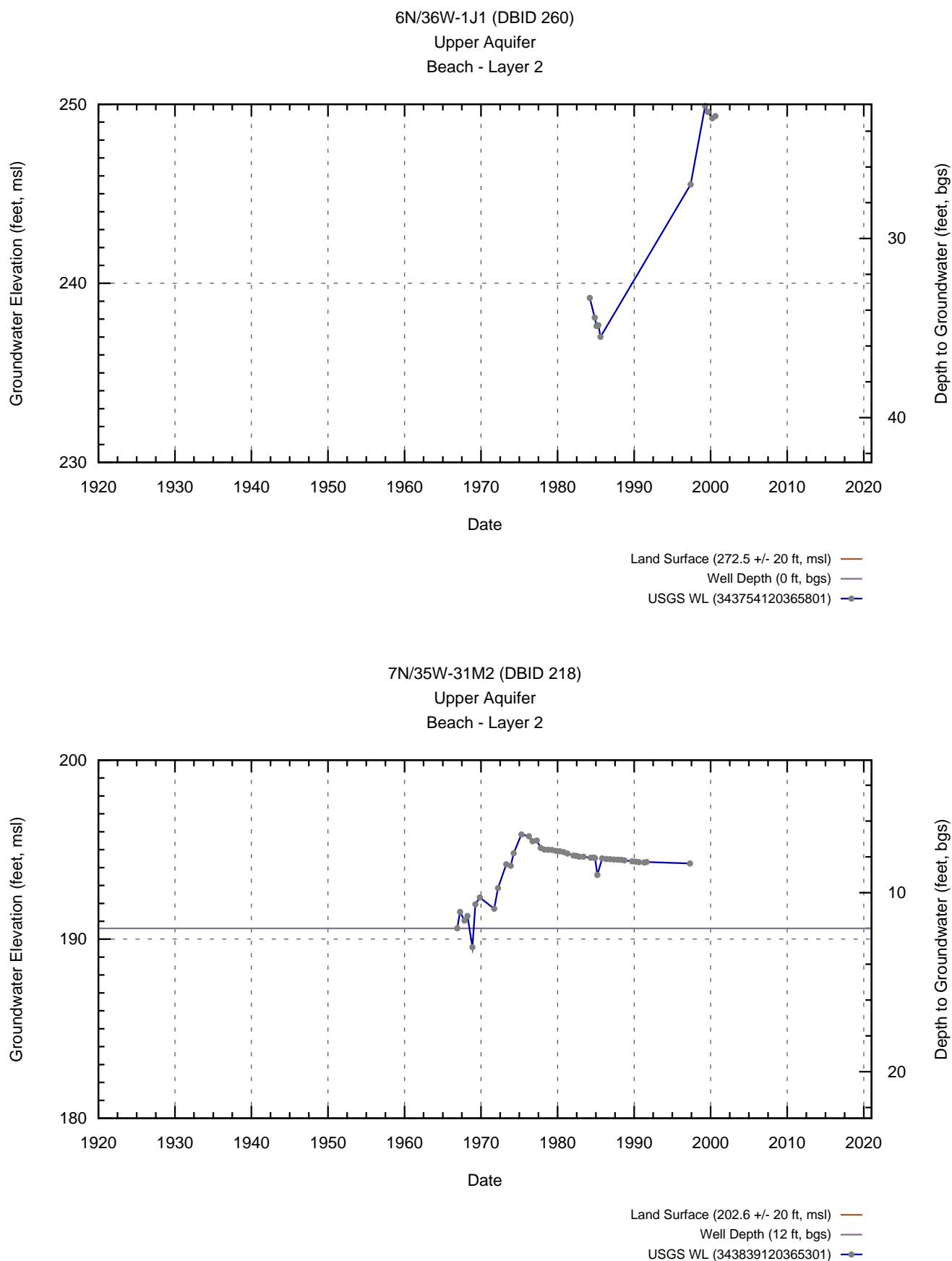
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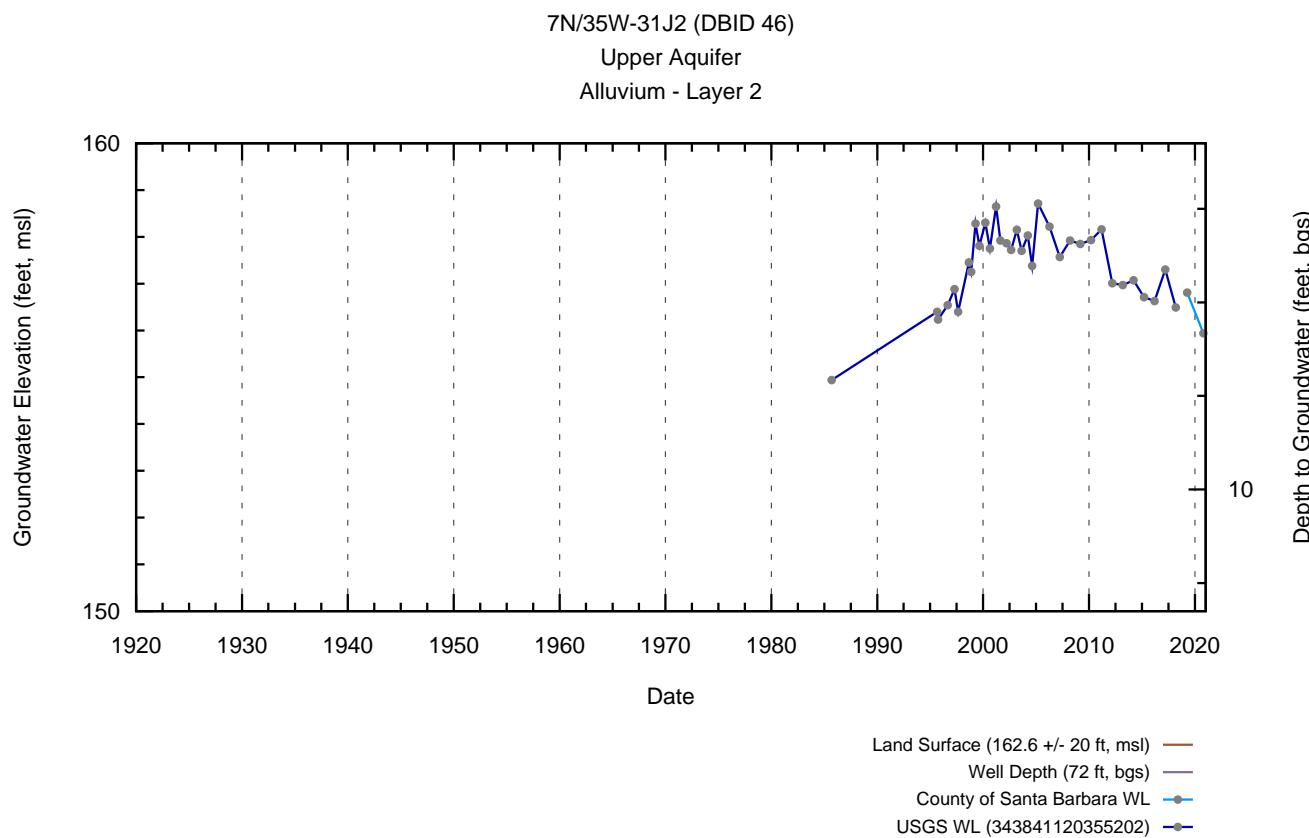
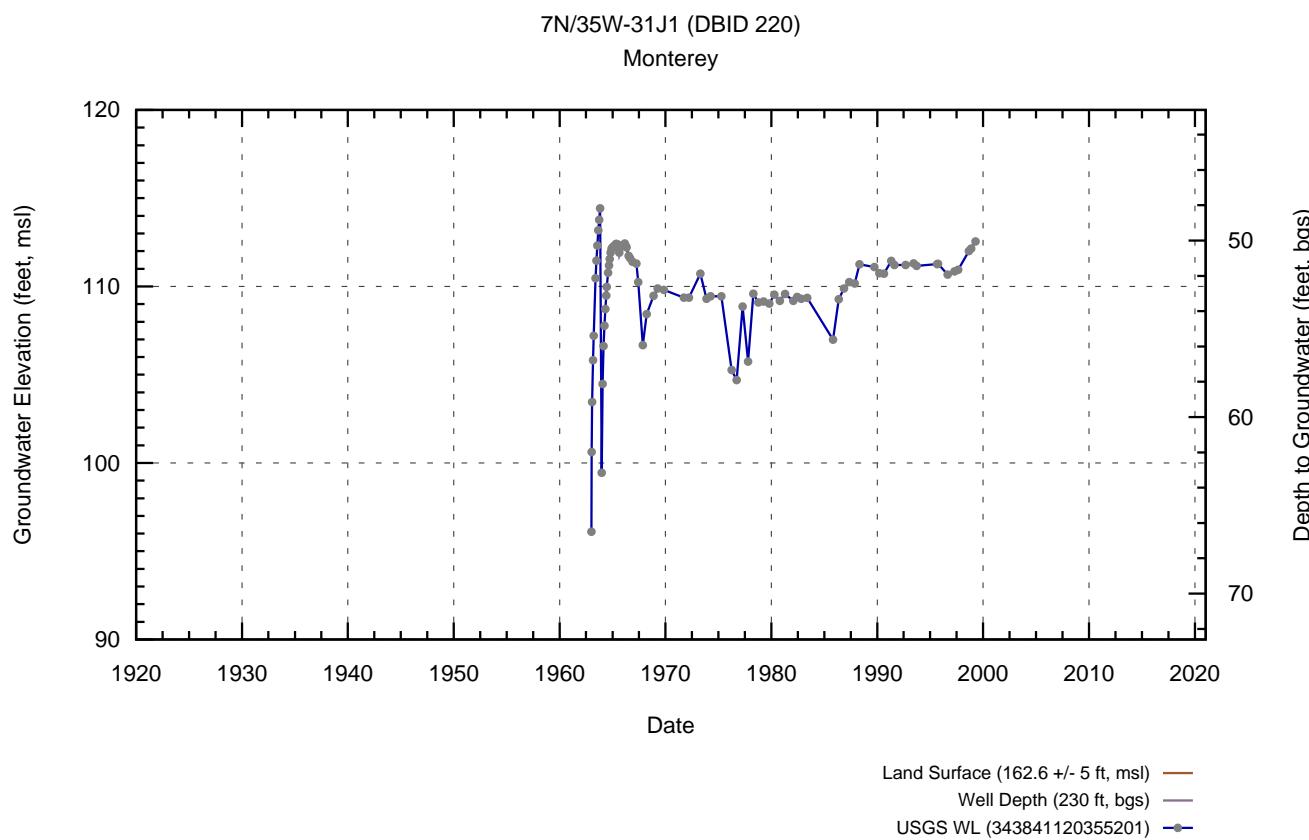
WMA: Lompoc Terrace : South of Lower Aquifer / Careaga



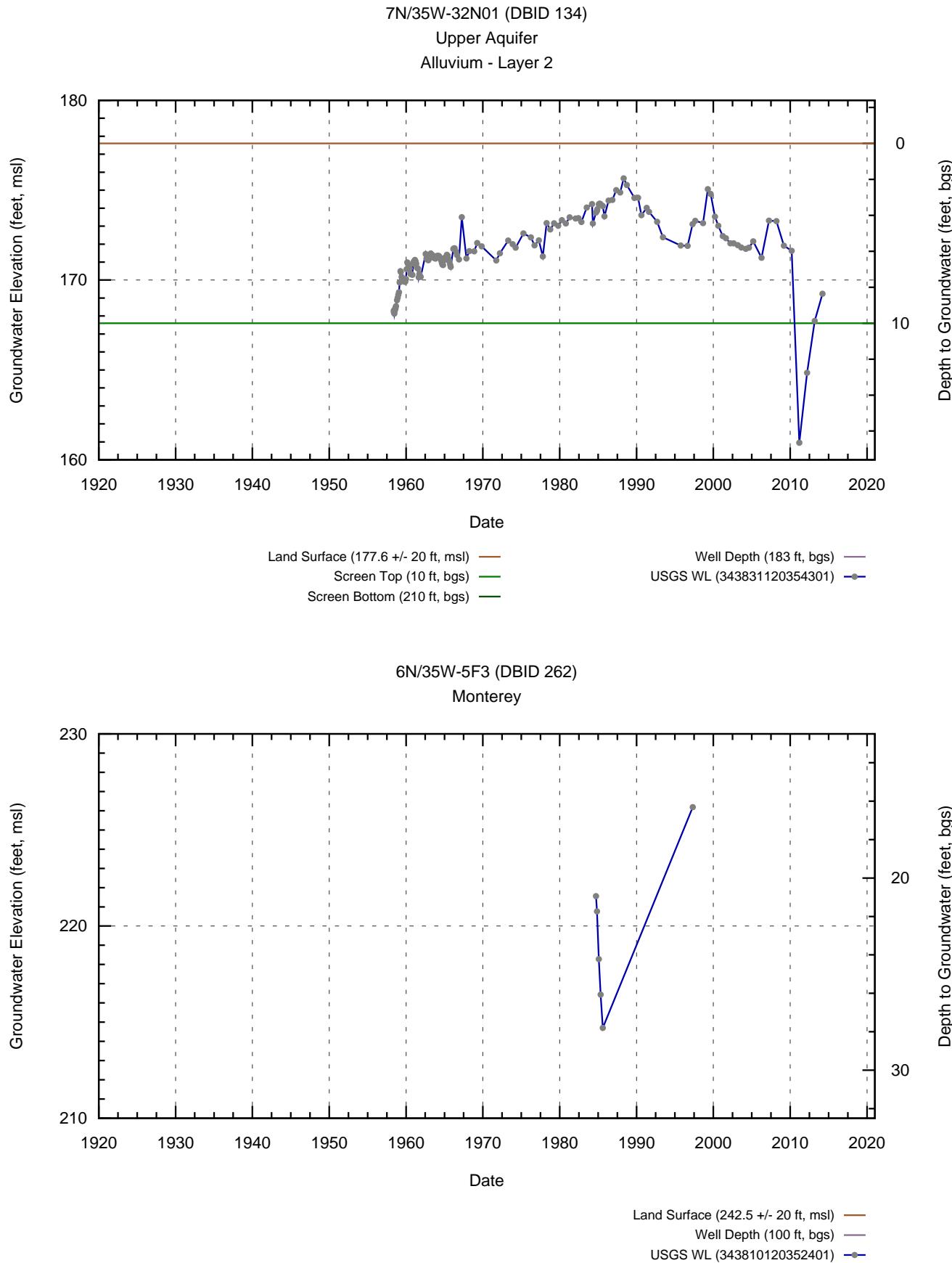
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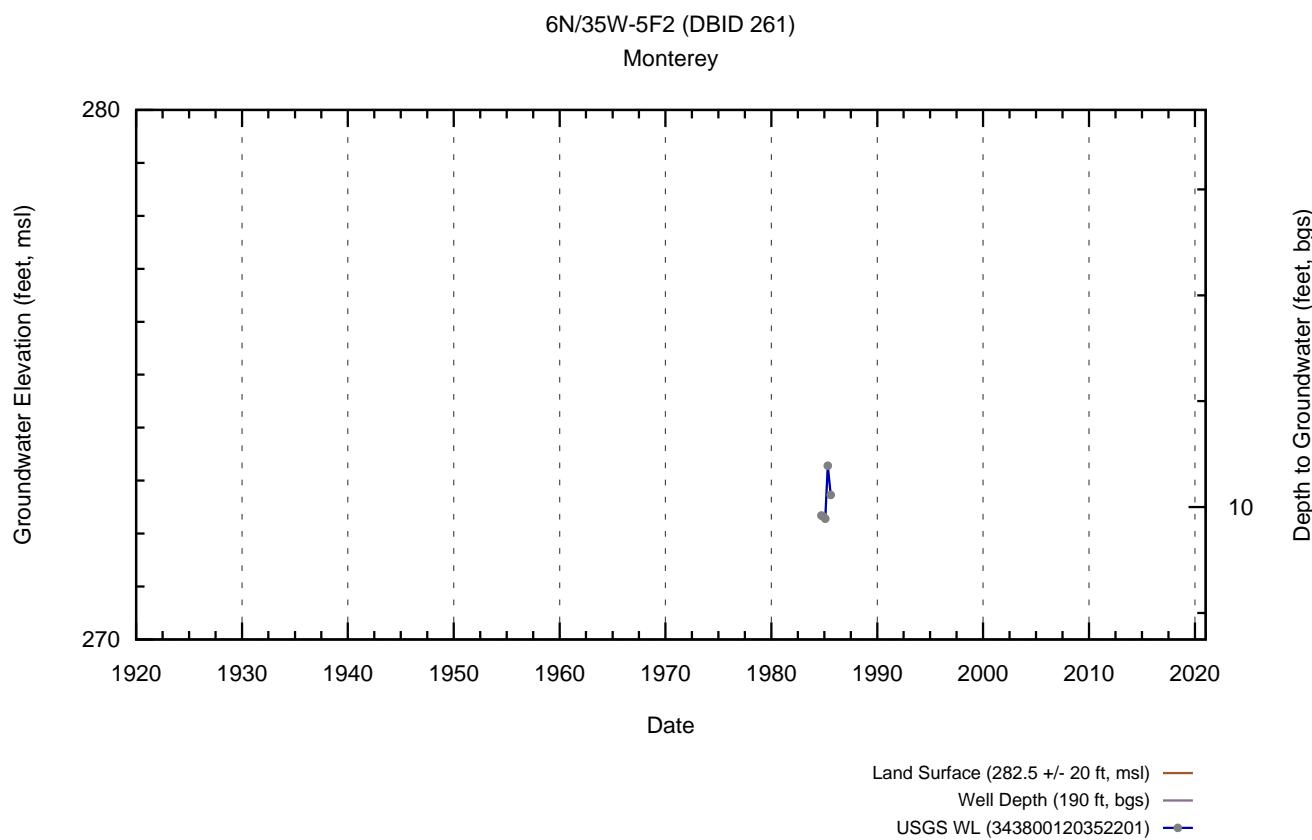
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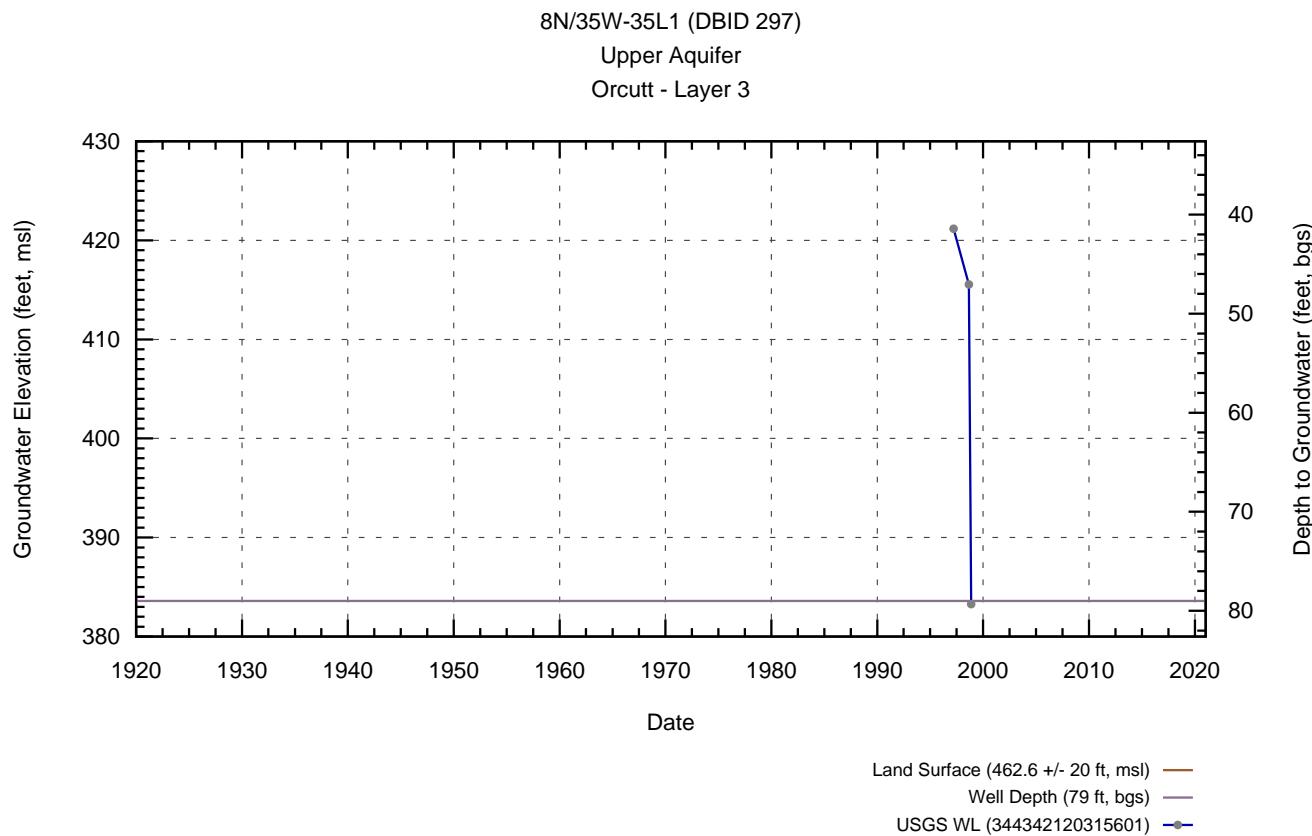
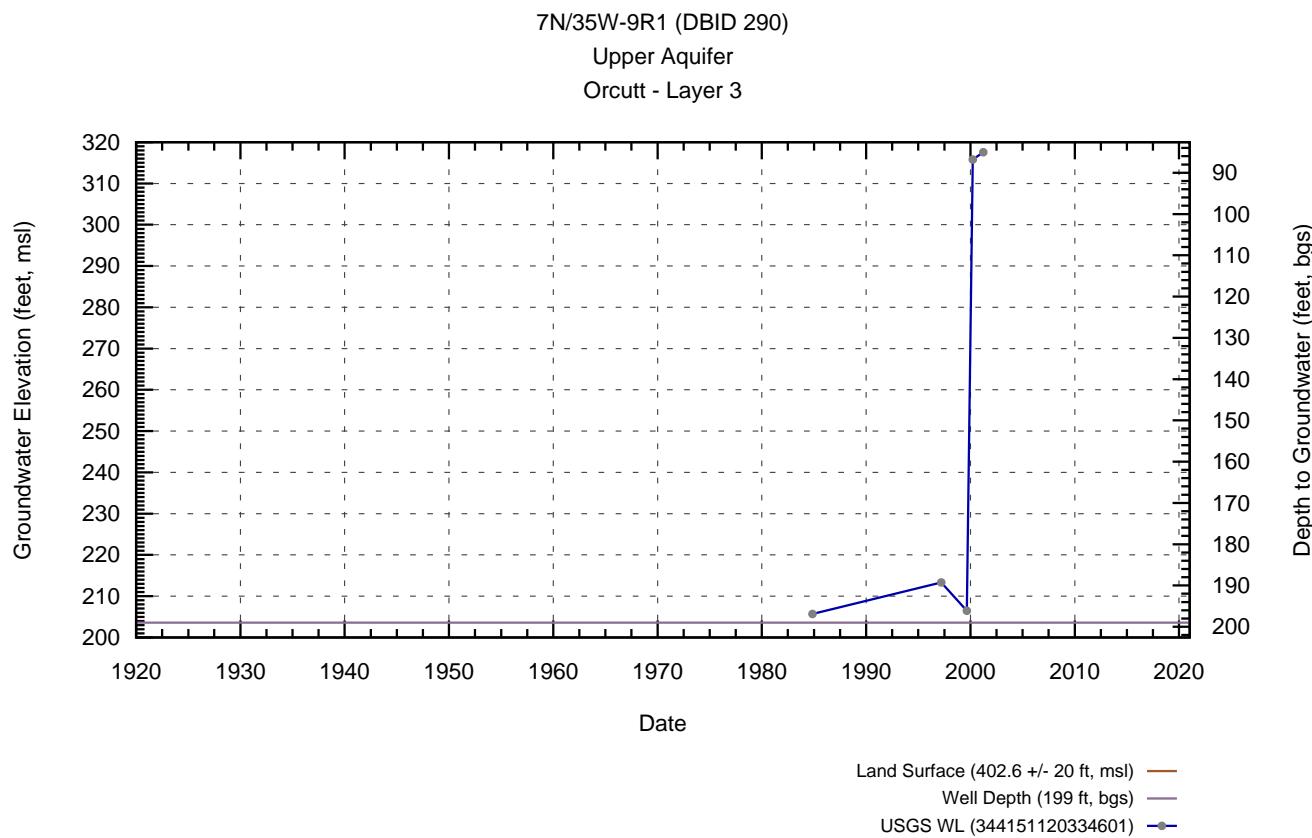
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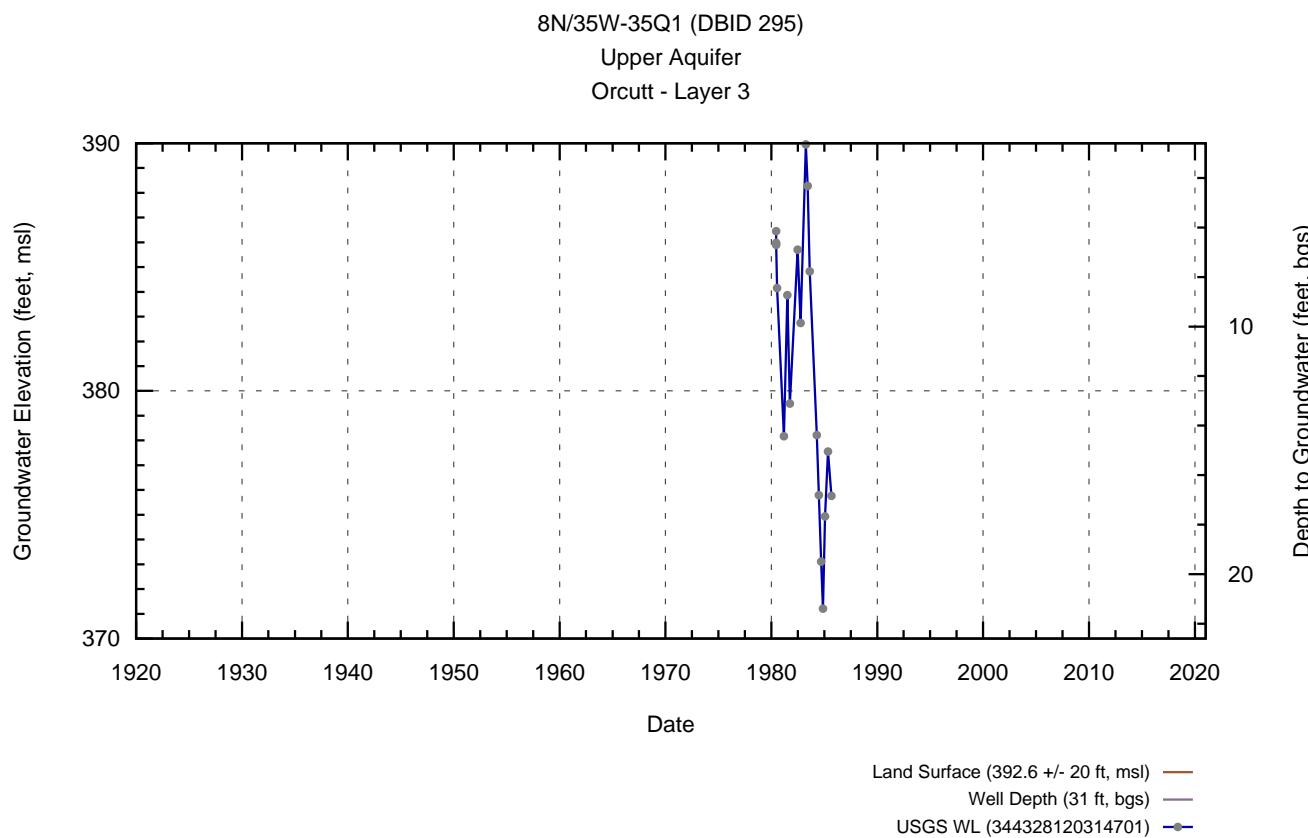
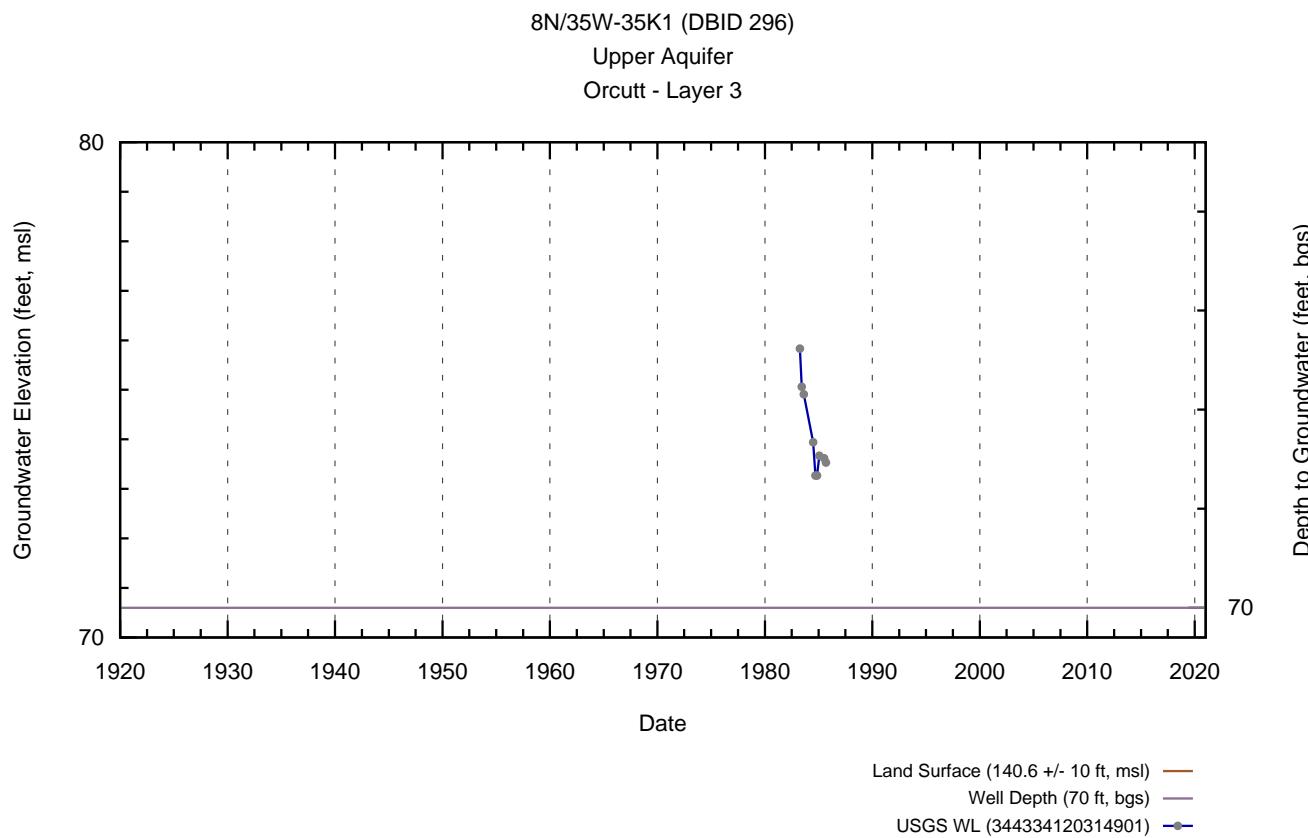
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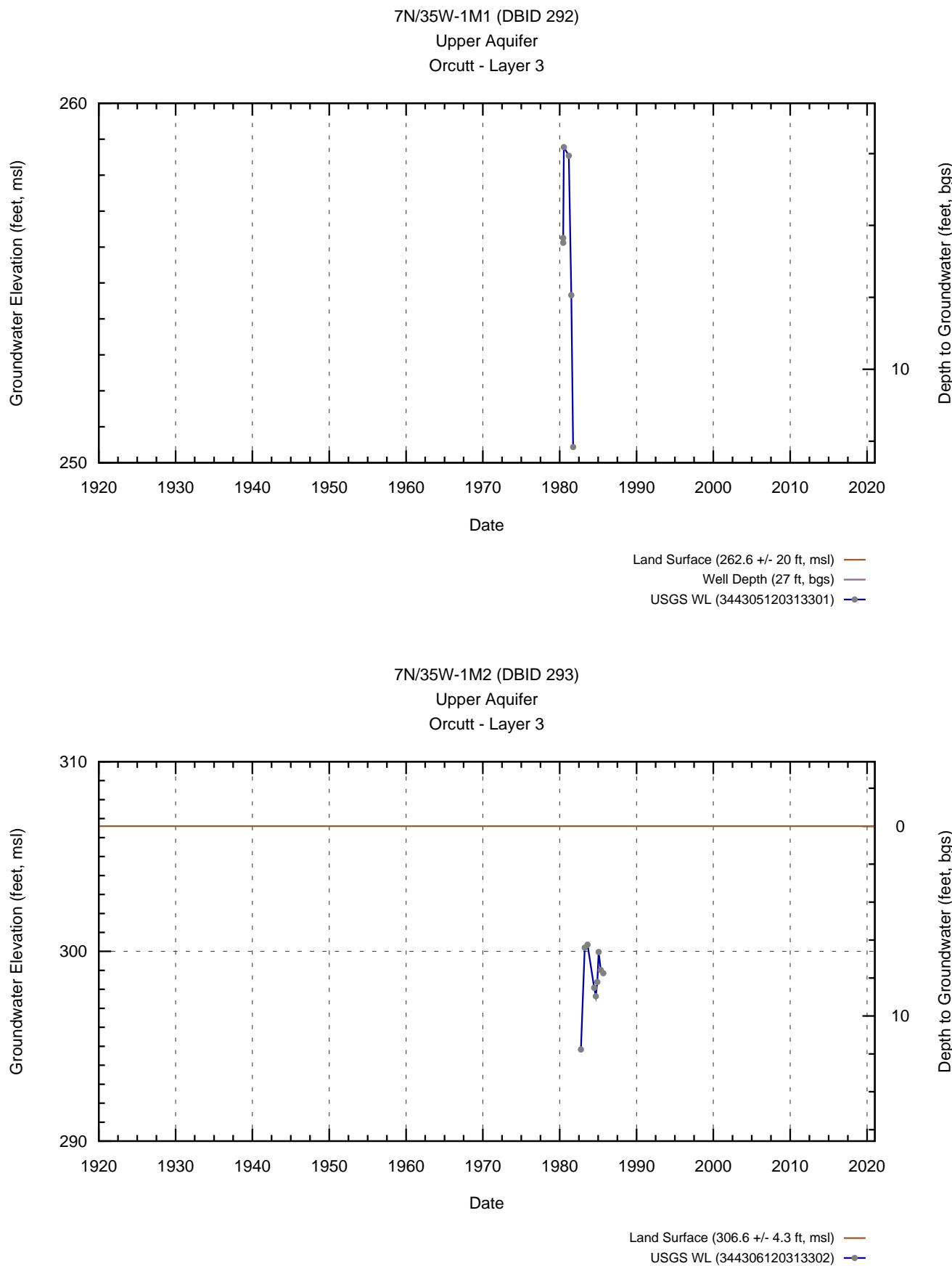
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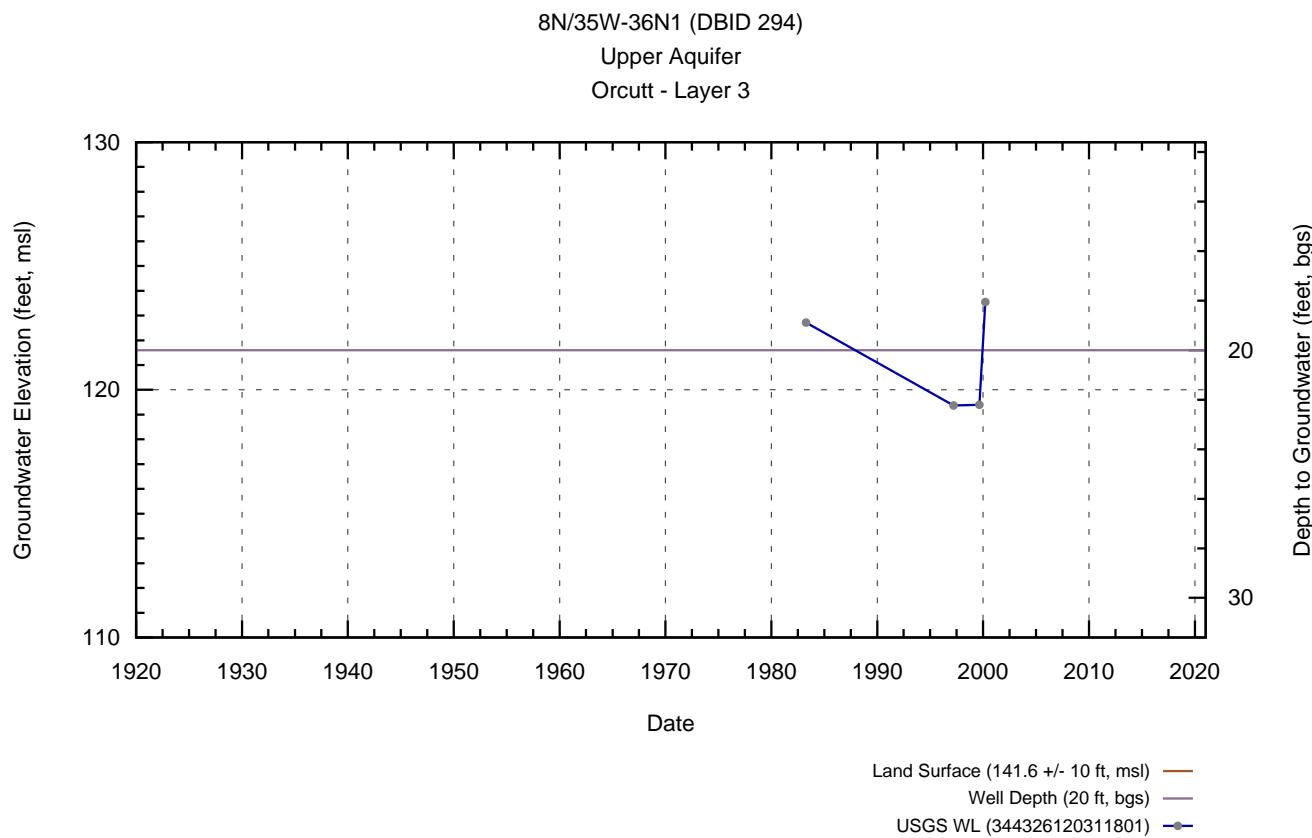
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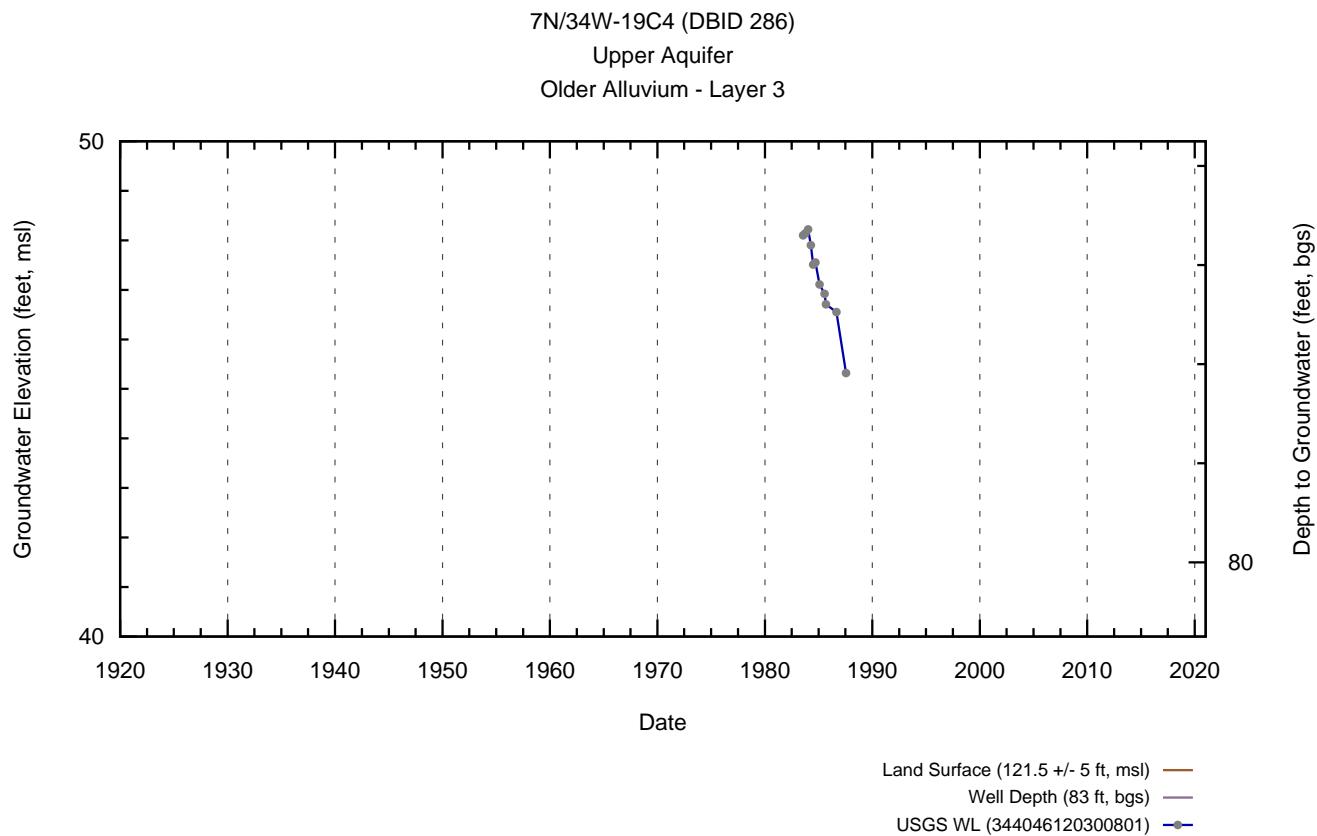
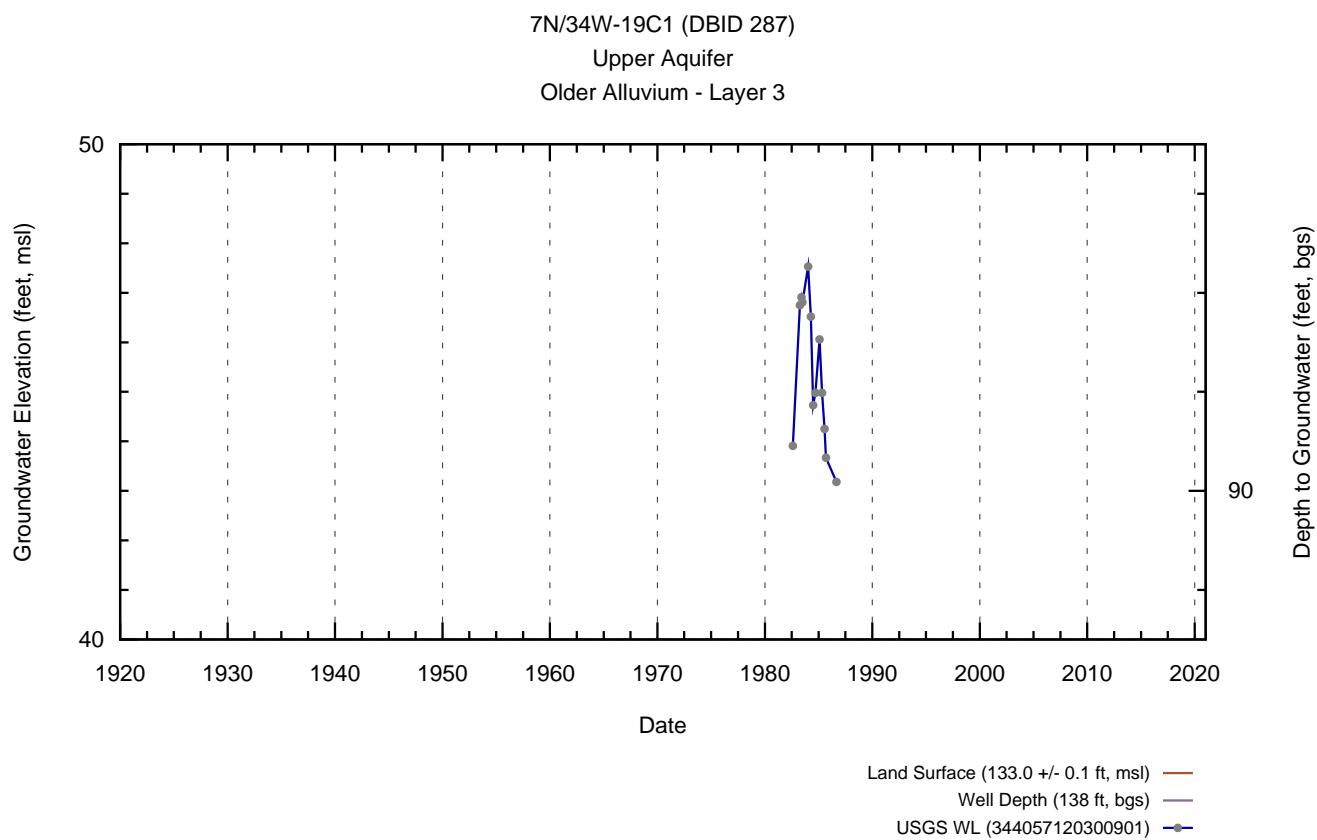
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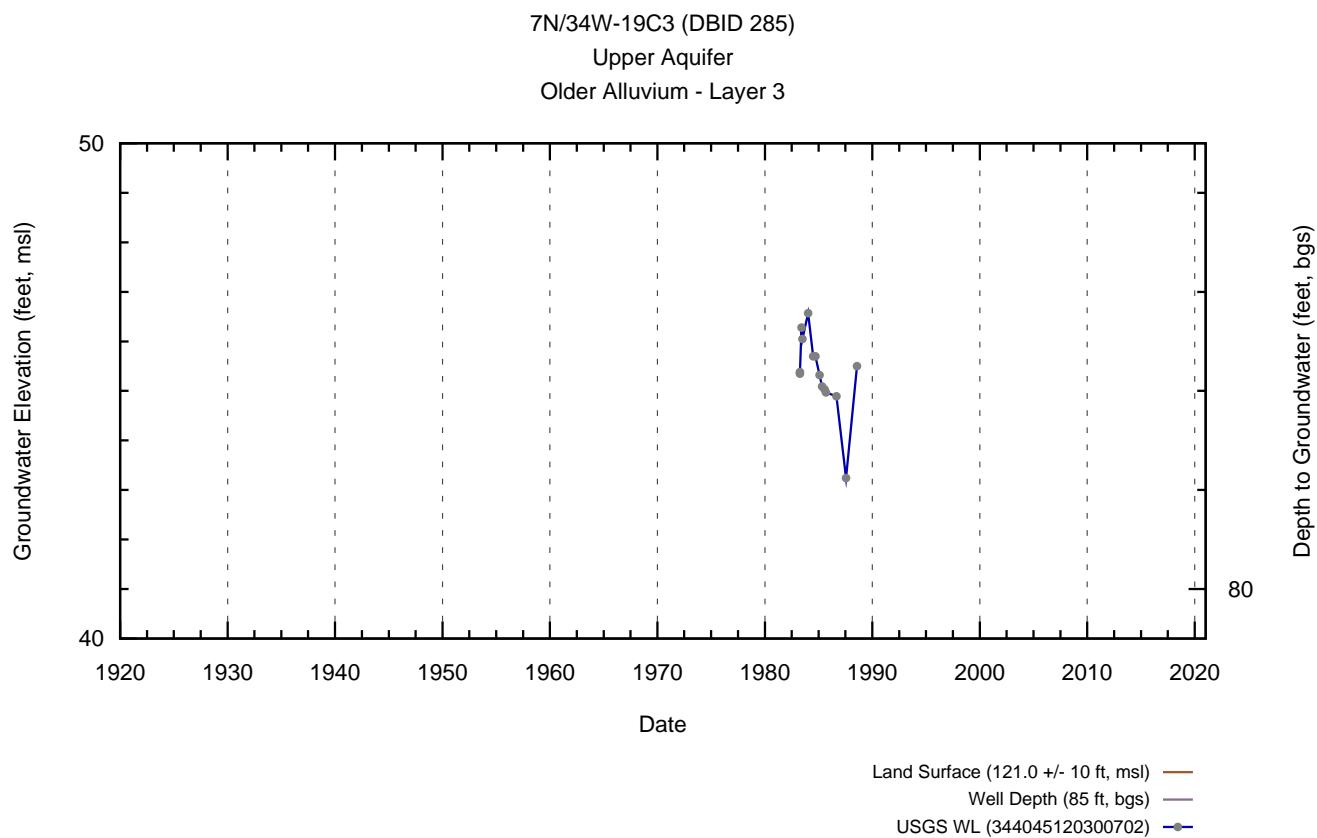
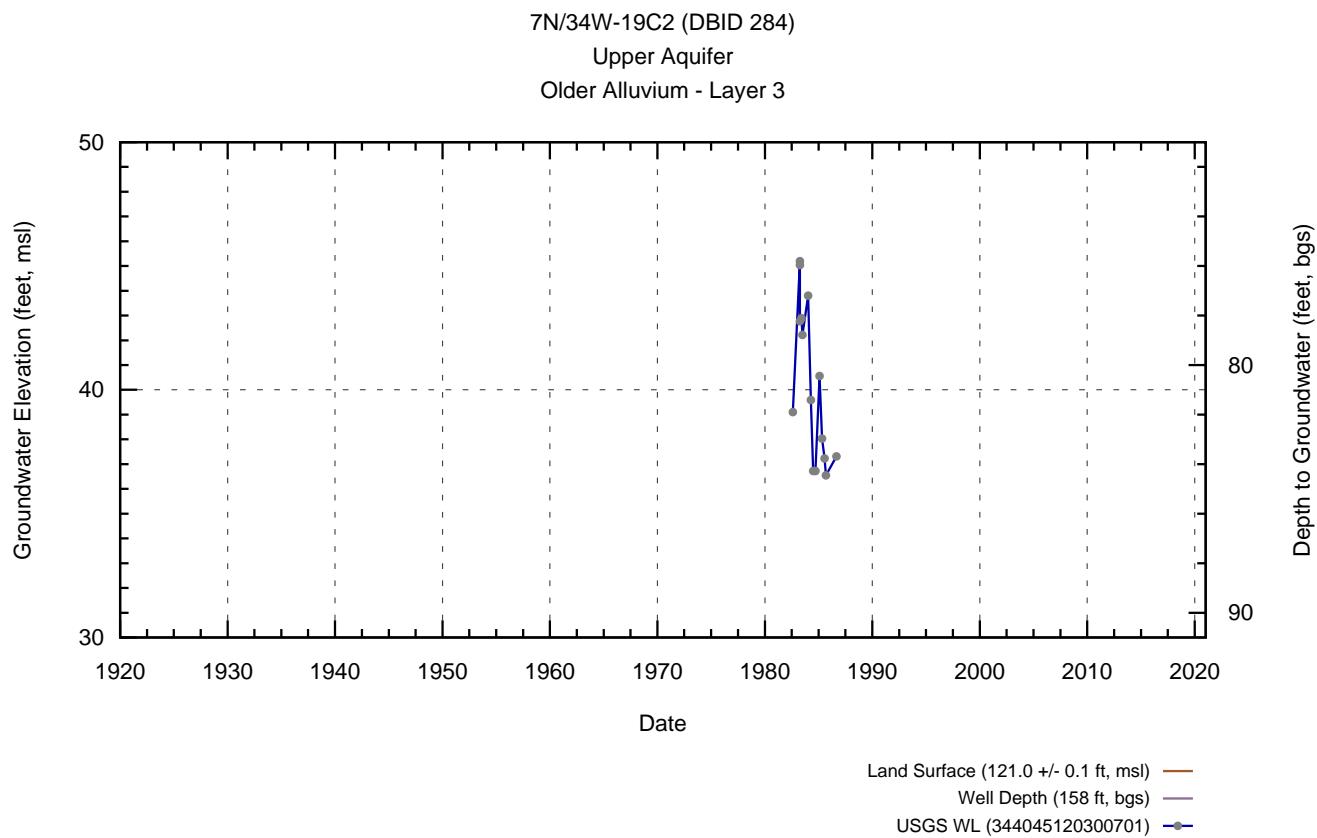
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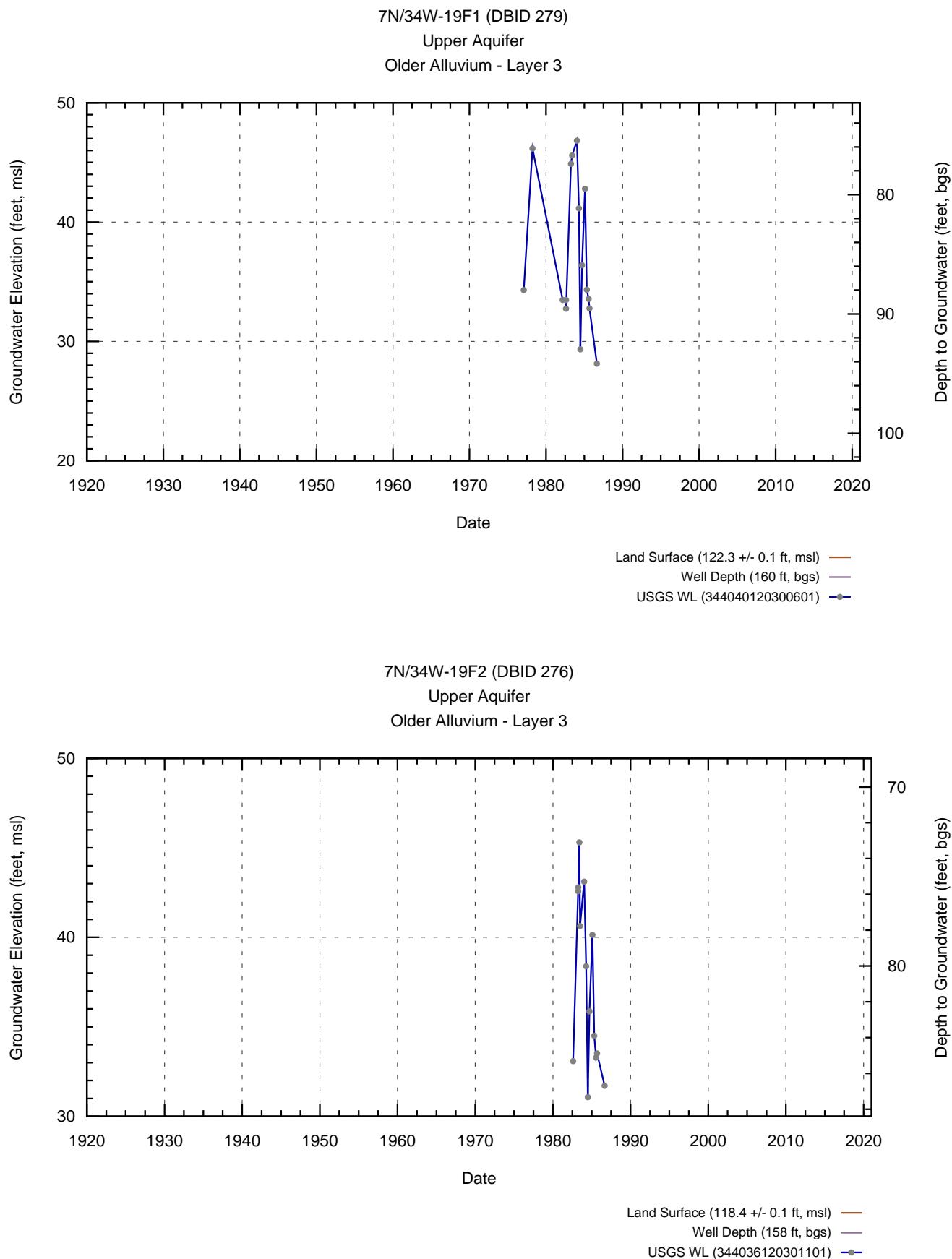
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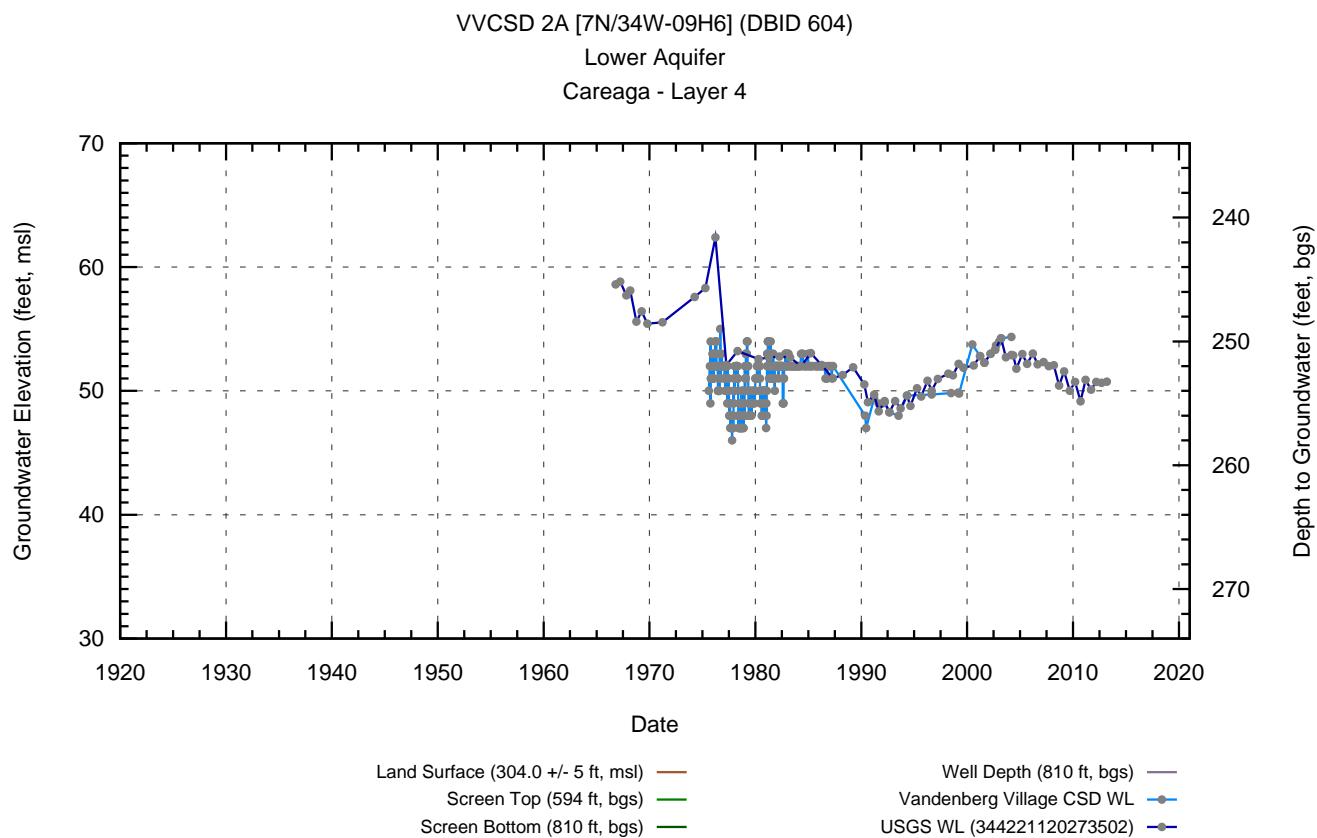
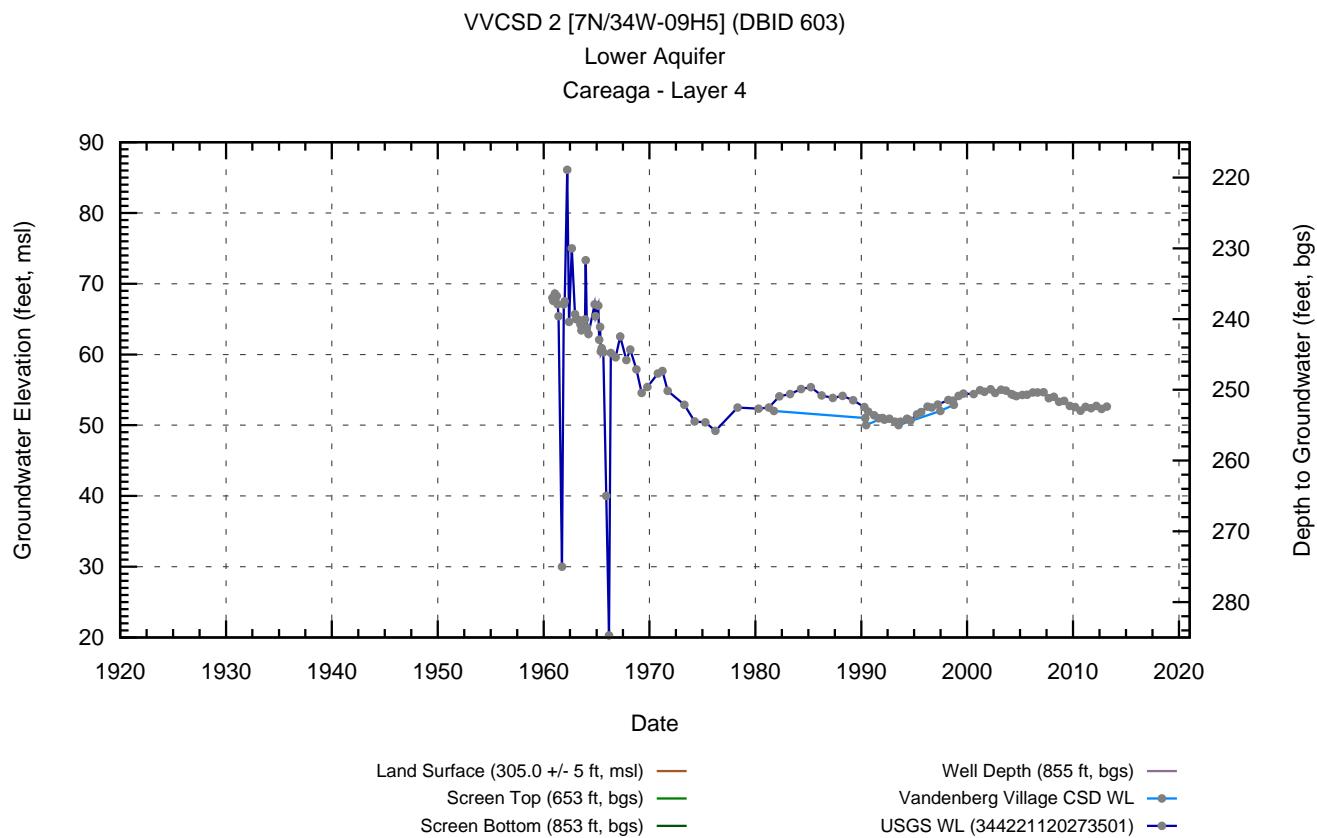
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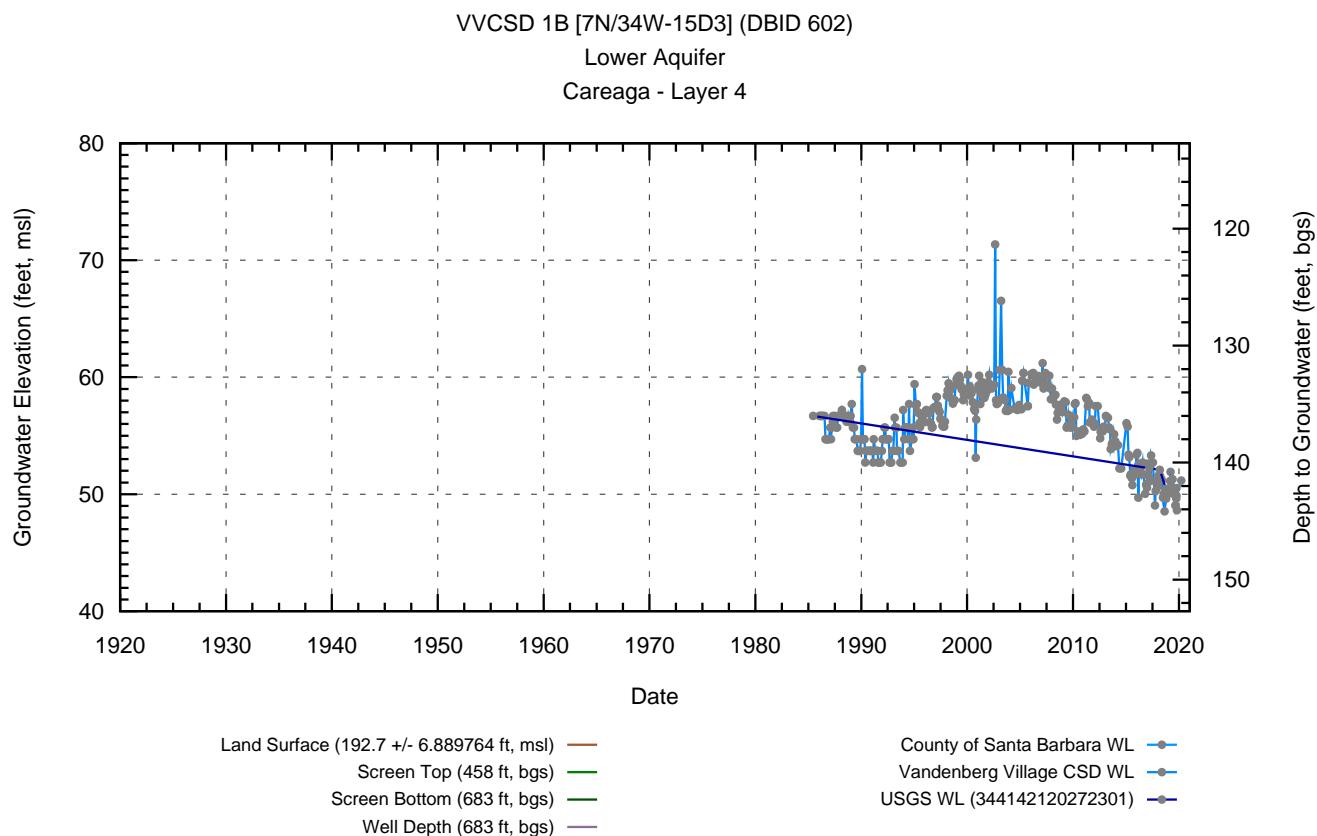
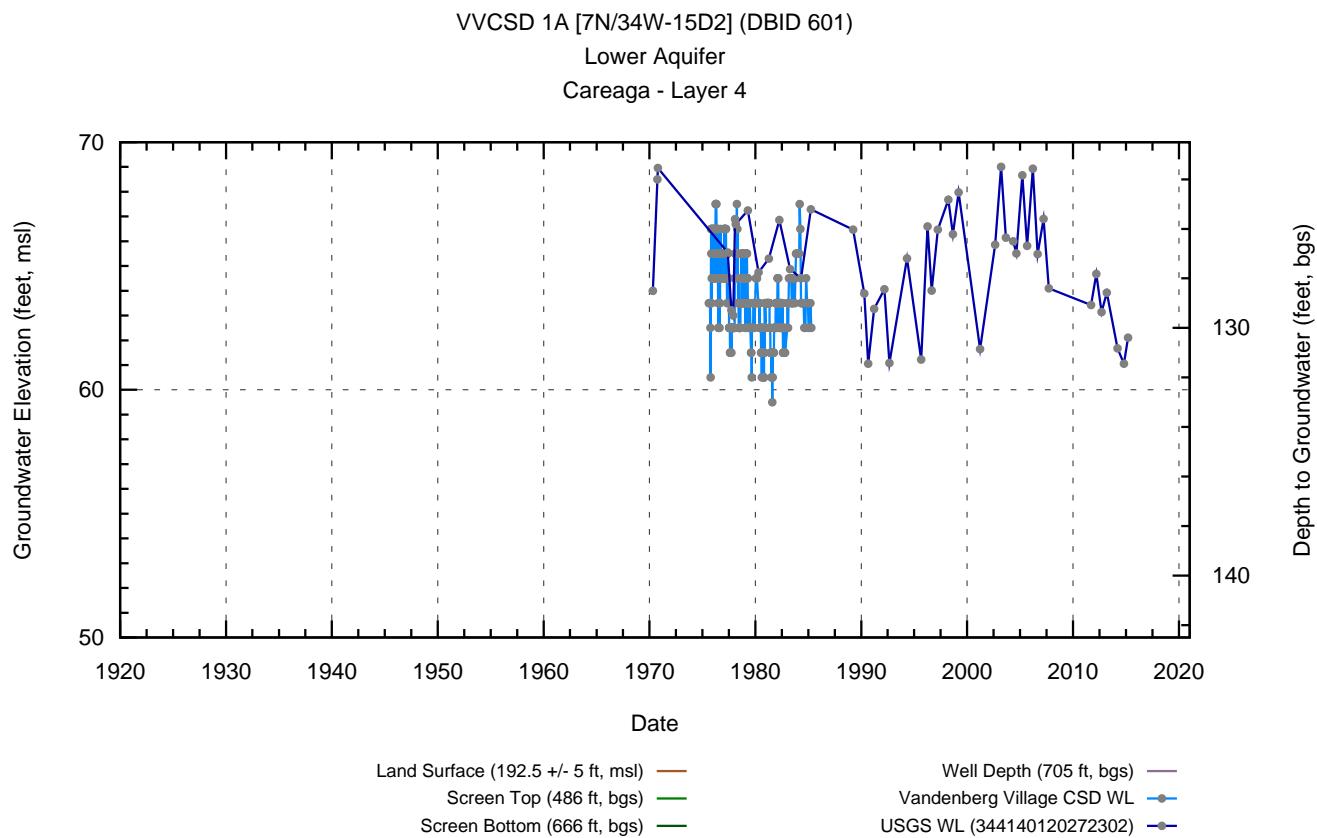
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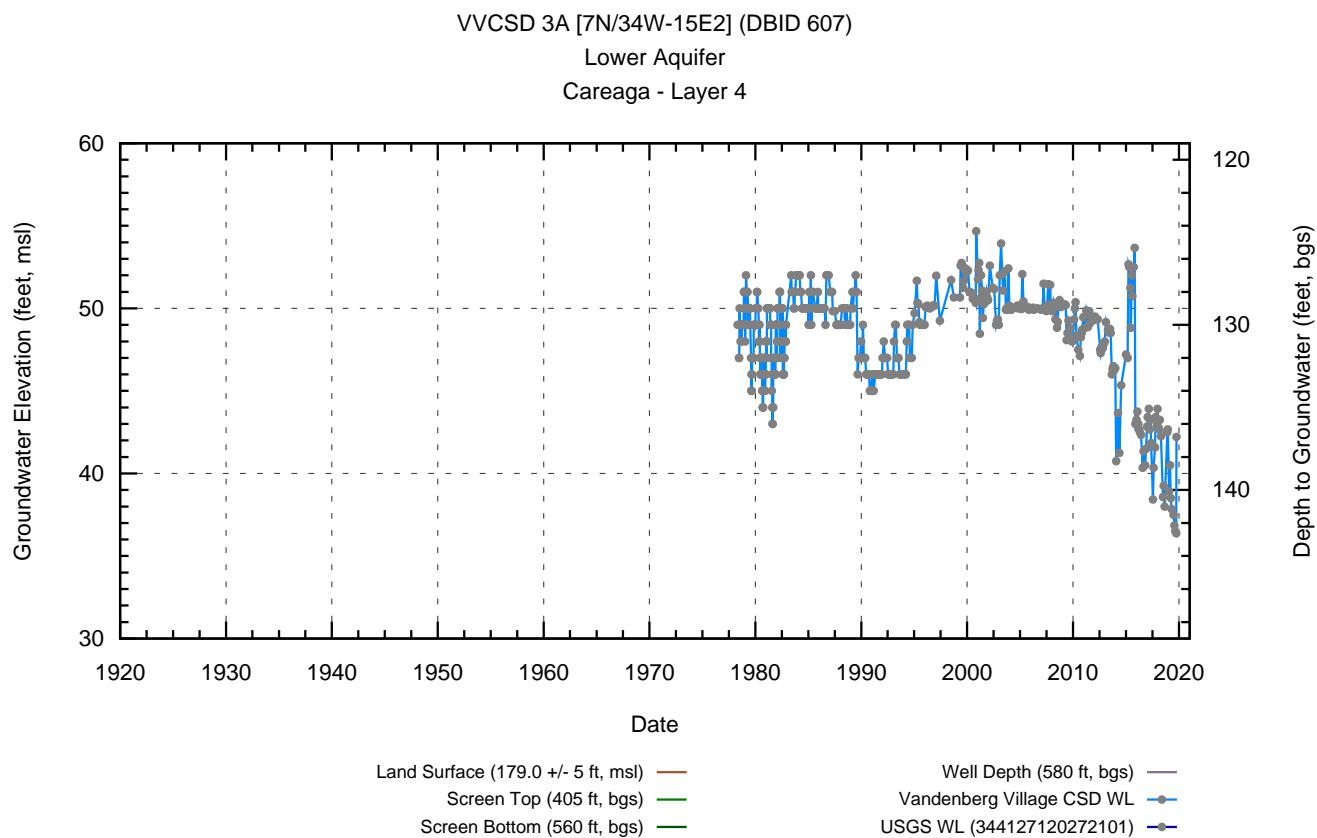
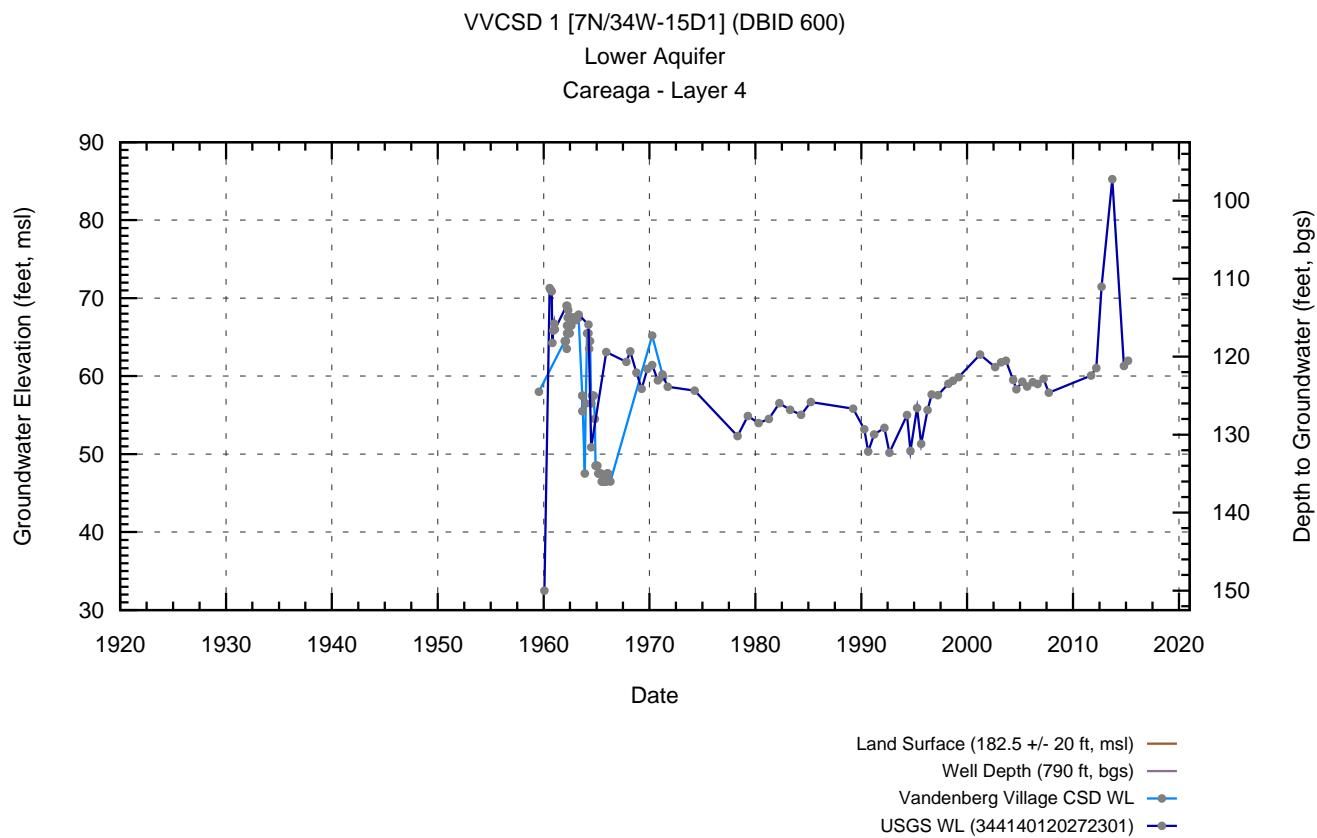
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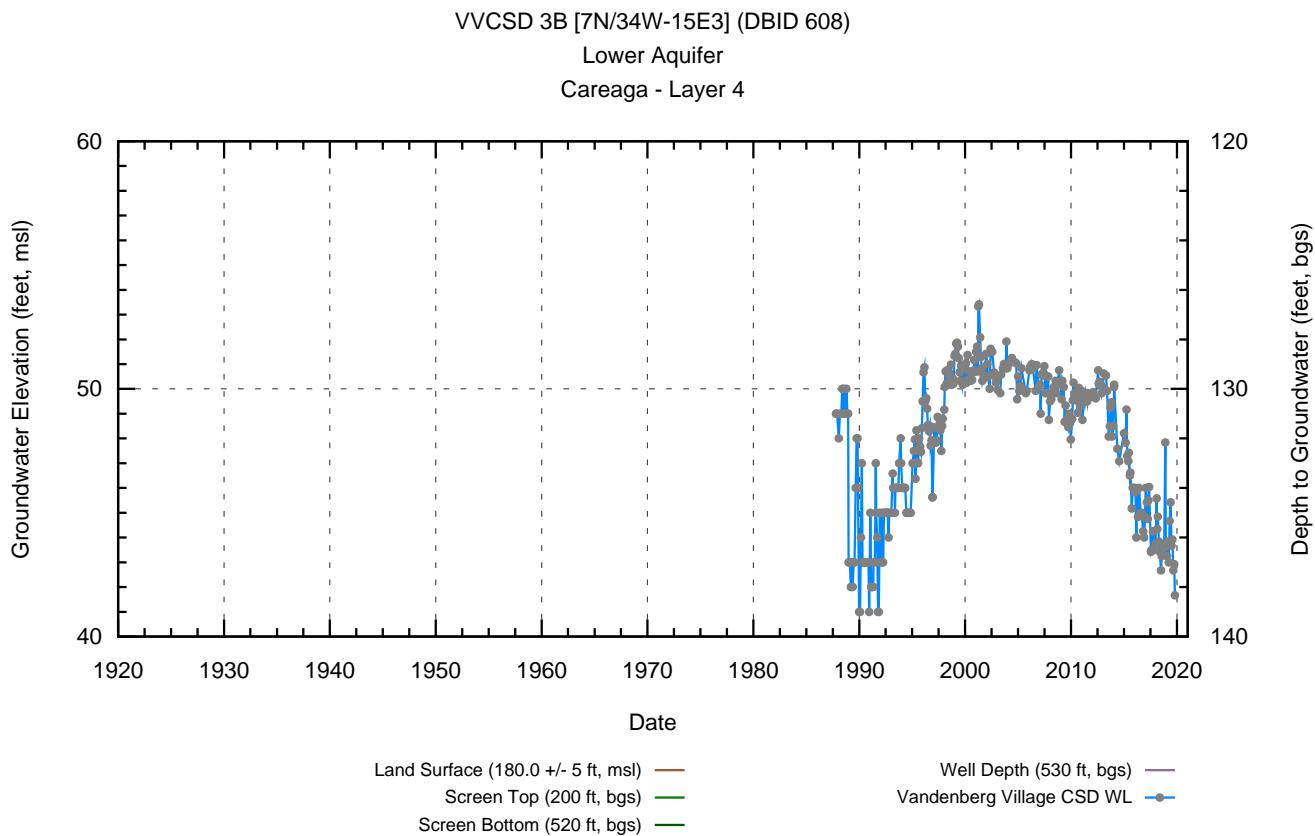
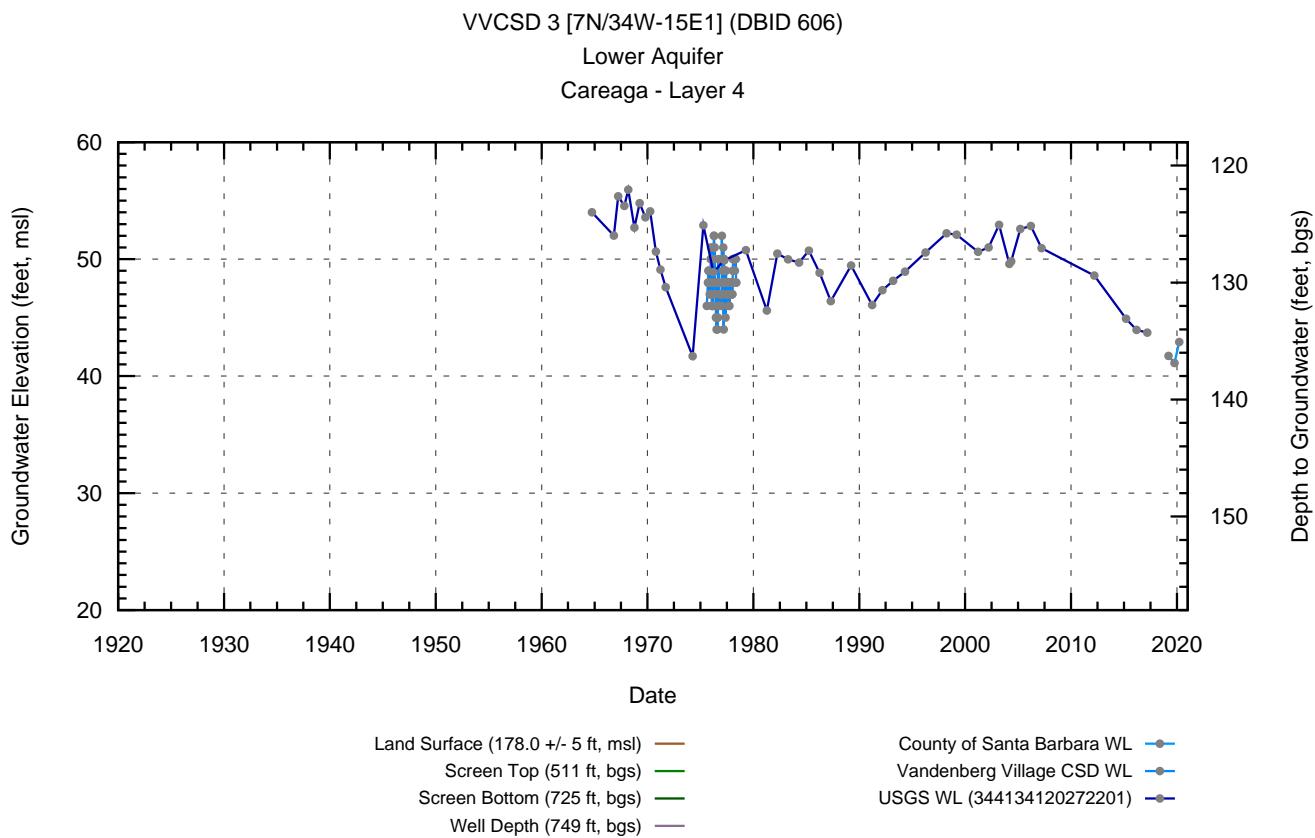
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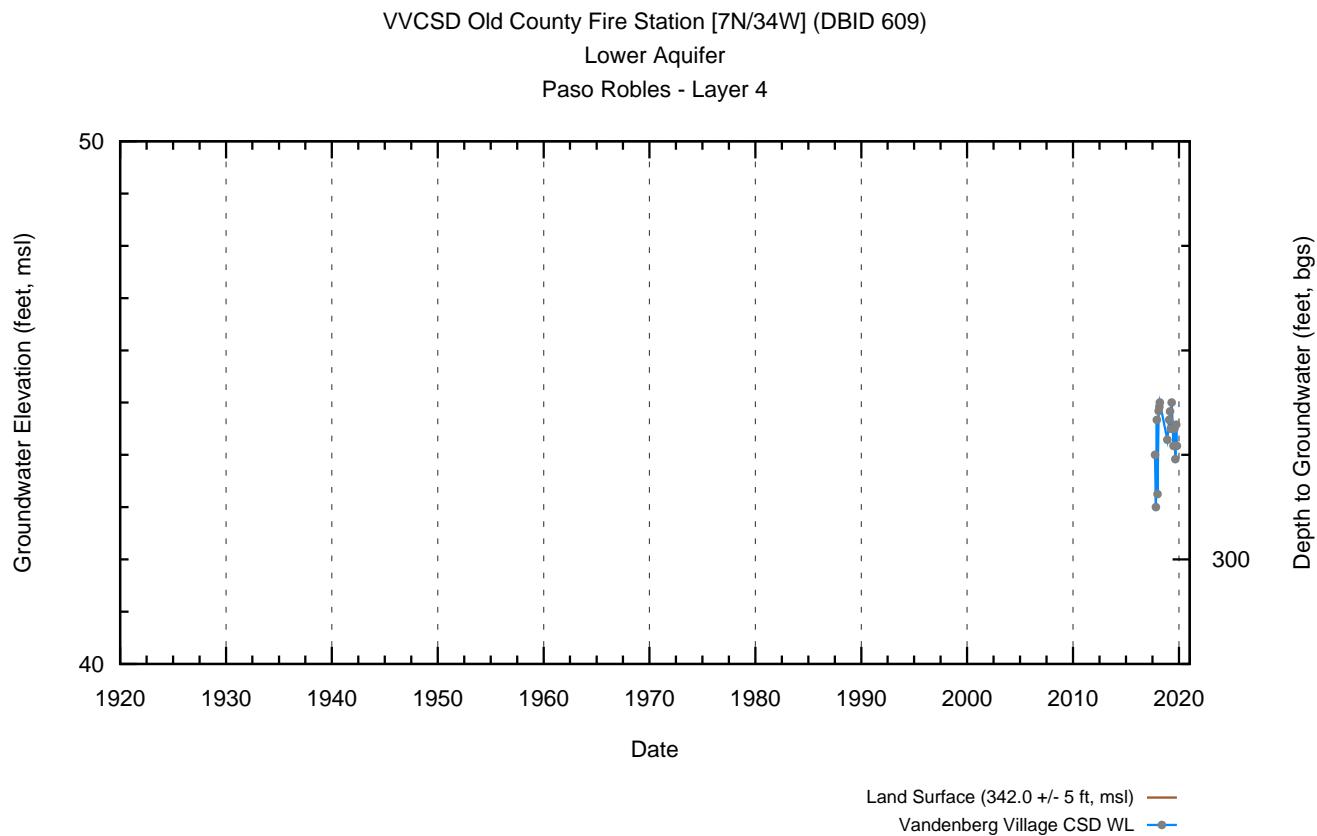
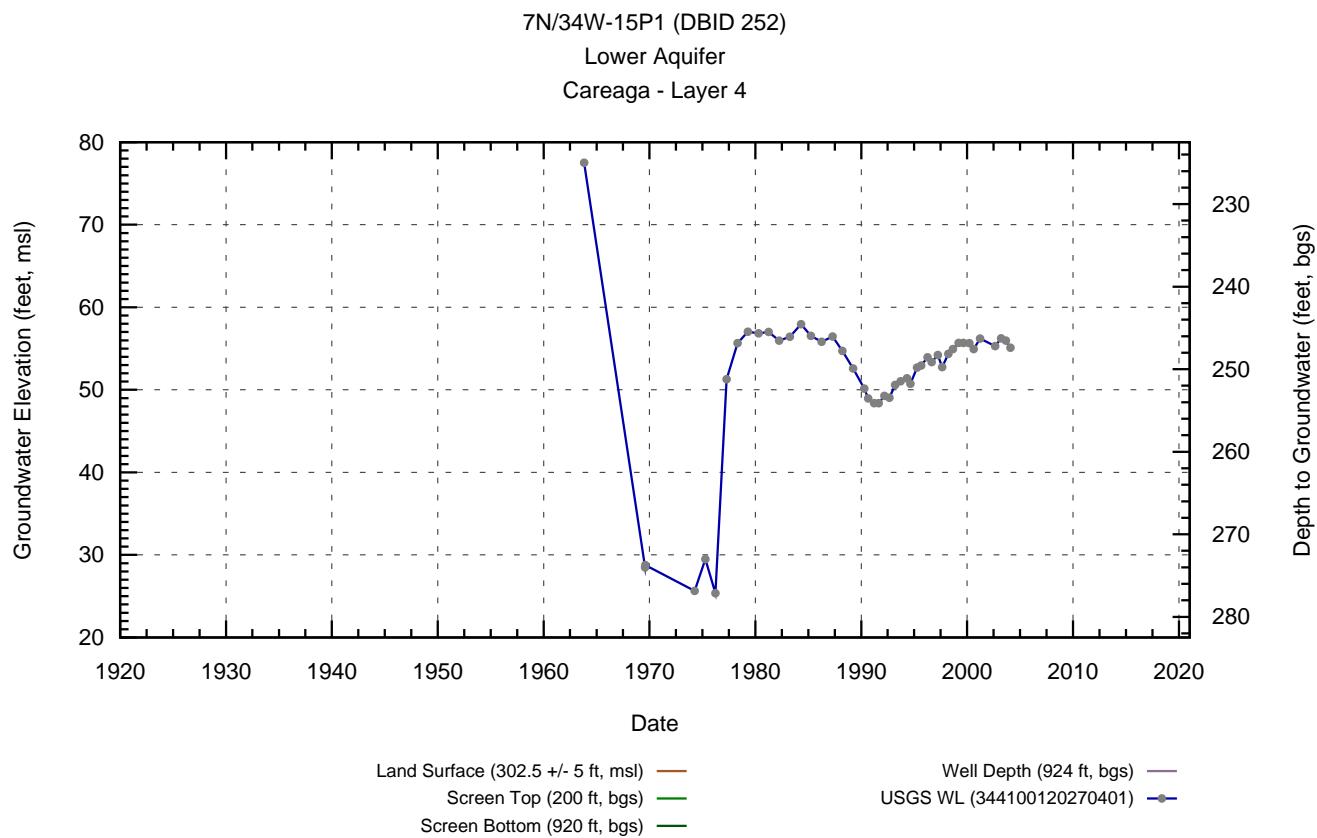
WMA: Lompoc Uplands



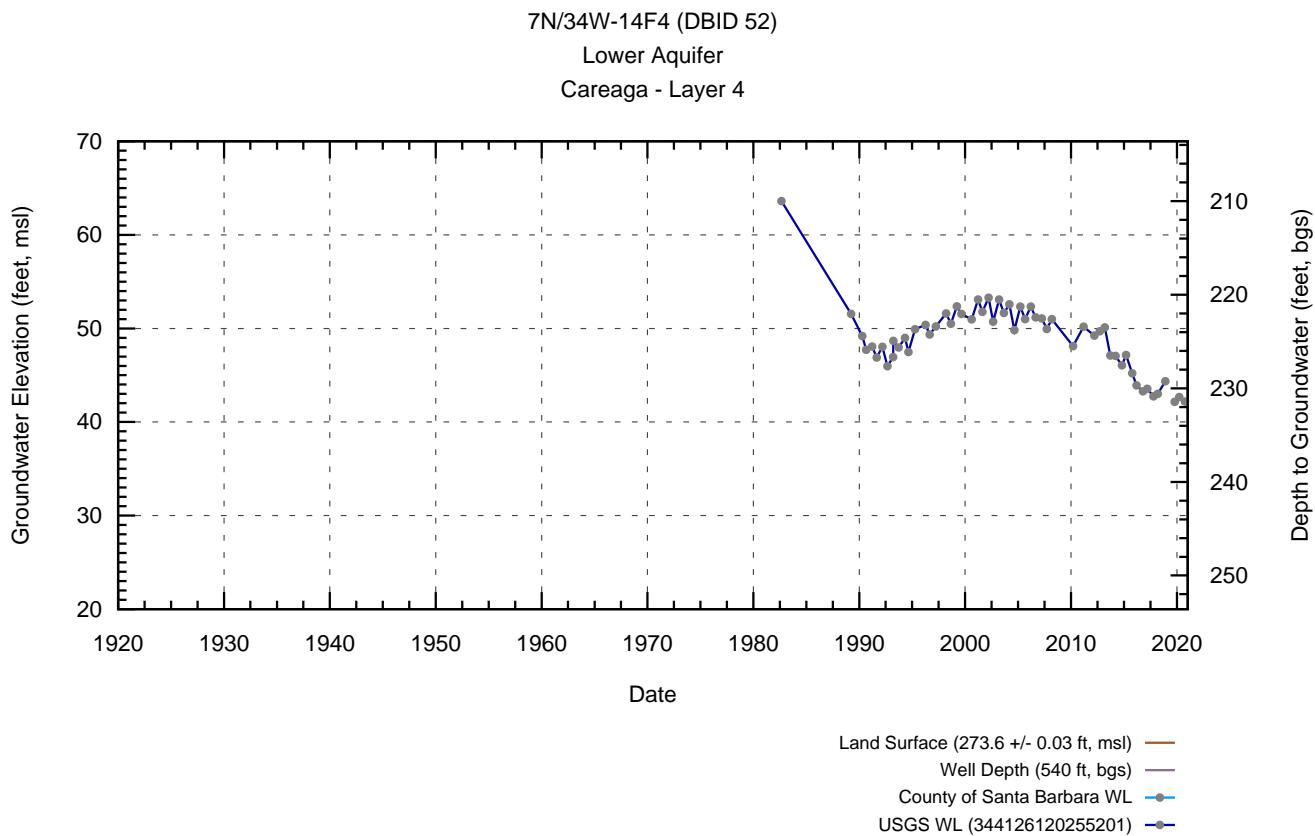
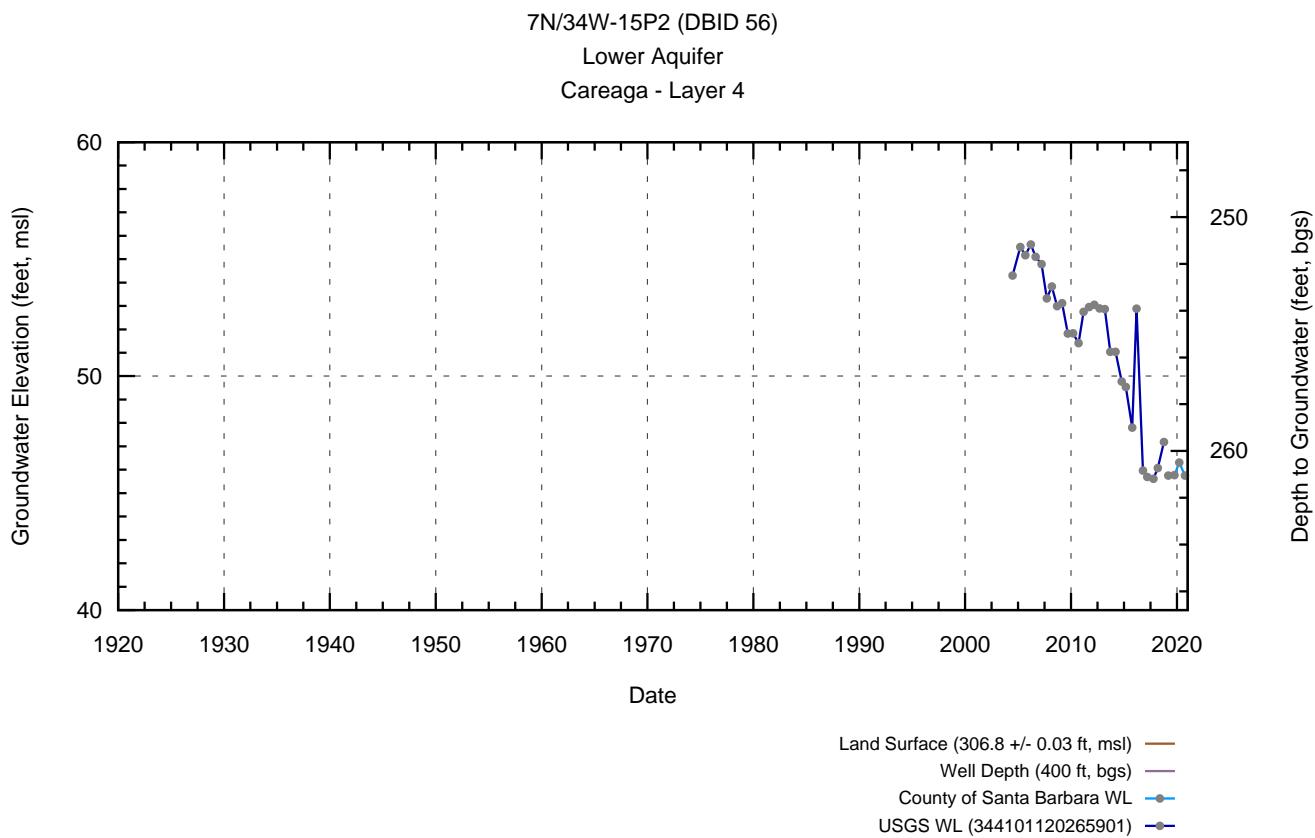
WMA: Lompoc Uplands



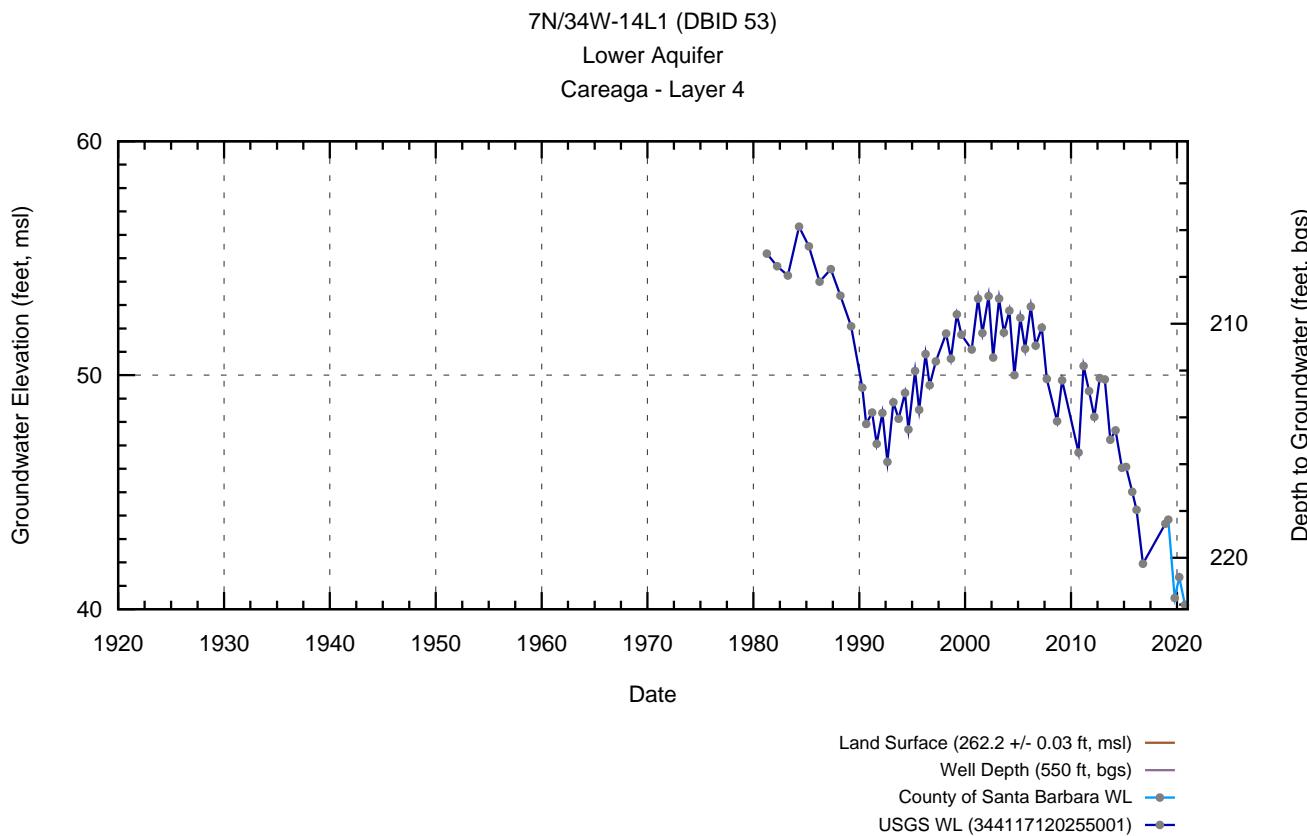
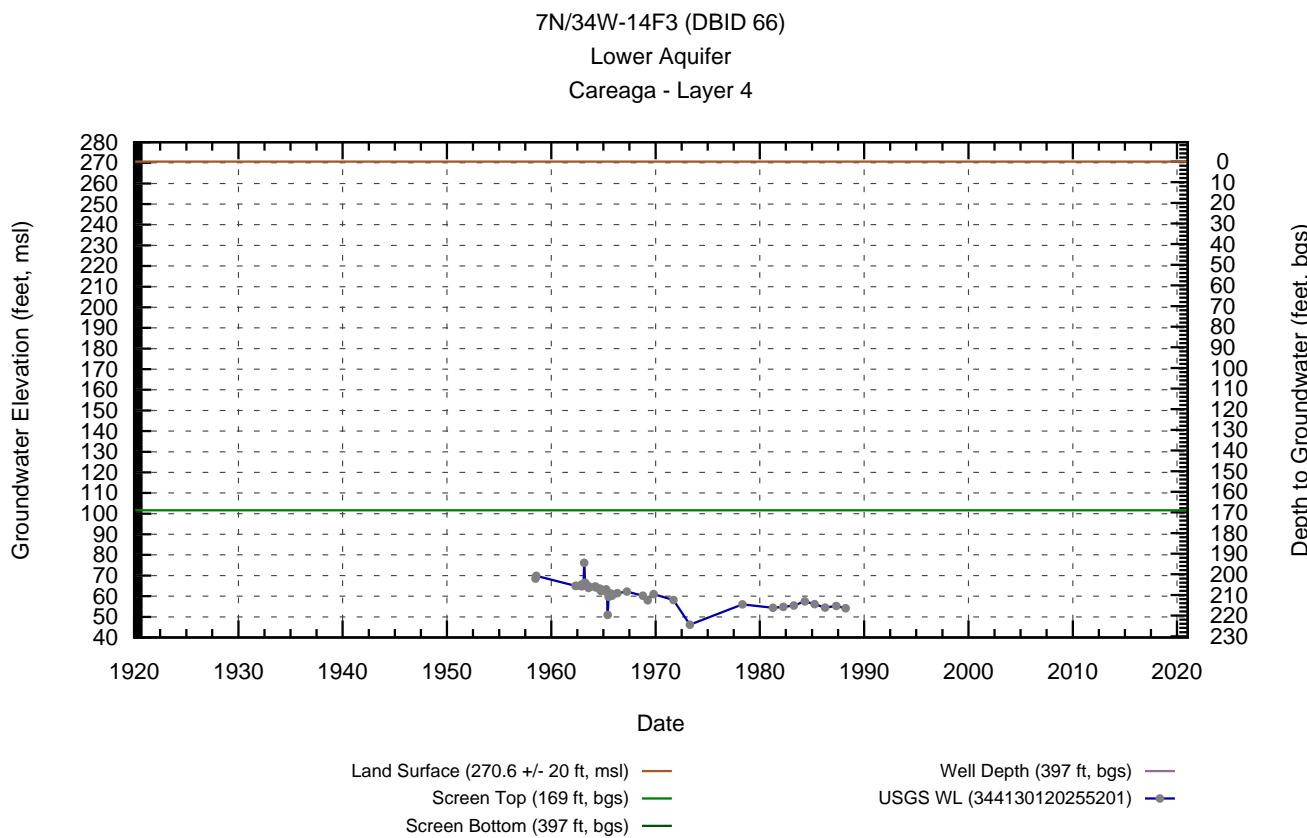
WMA: Lompoc Uplands



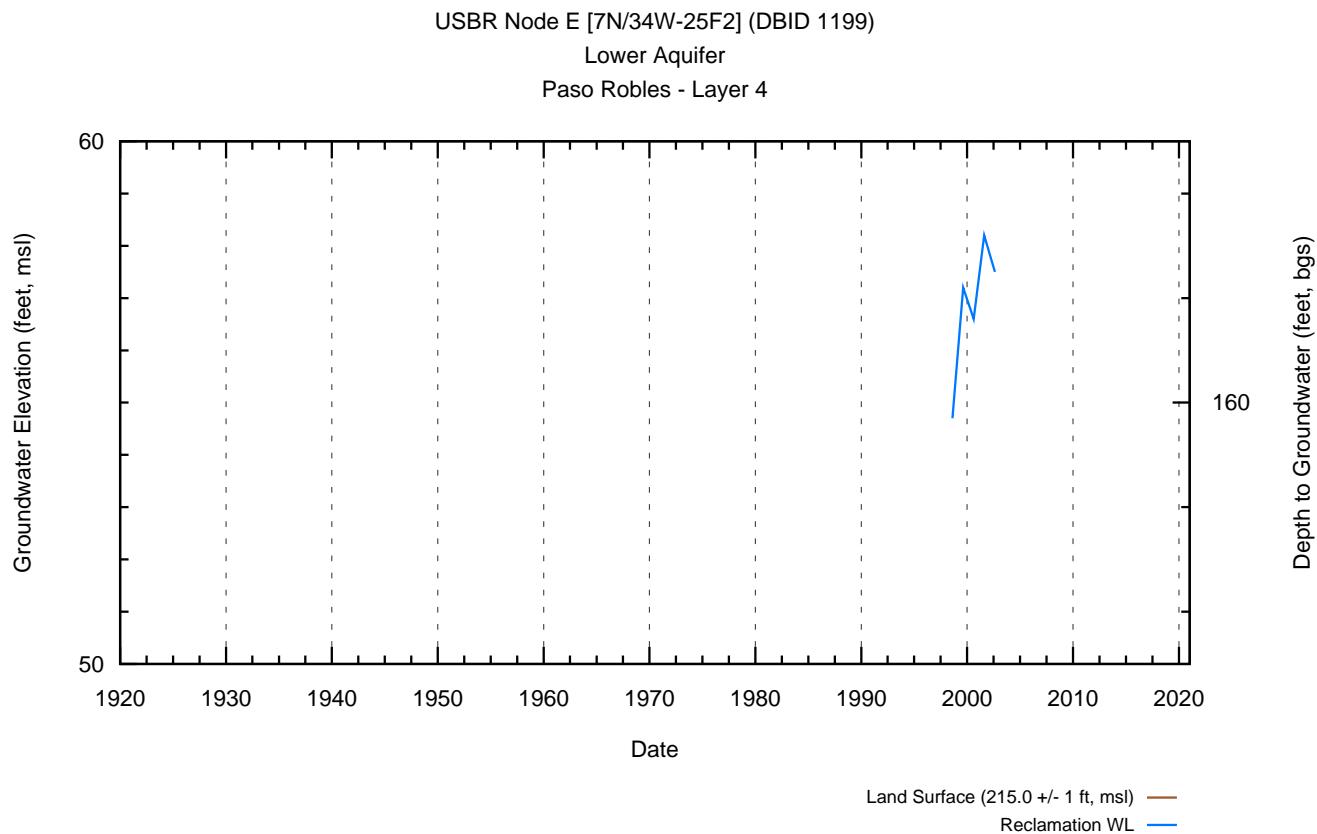
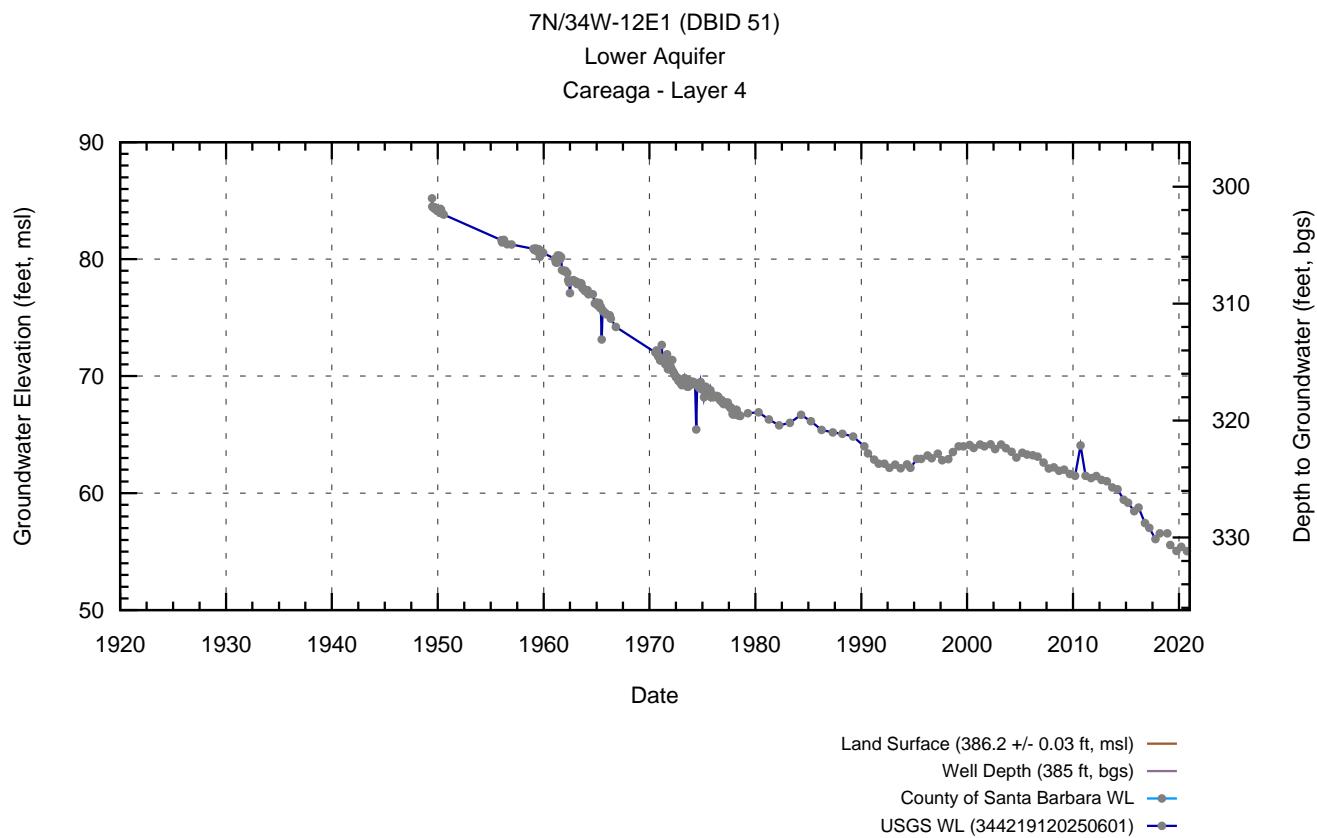
WMA: Lompoc Uplands



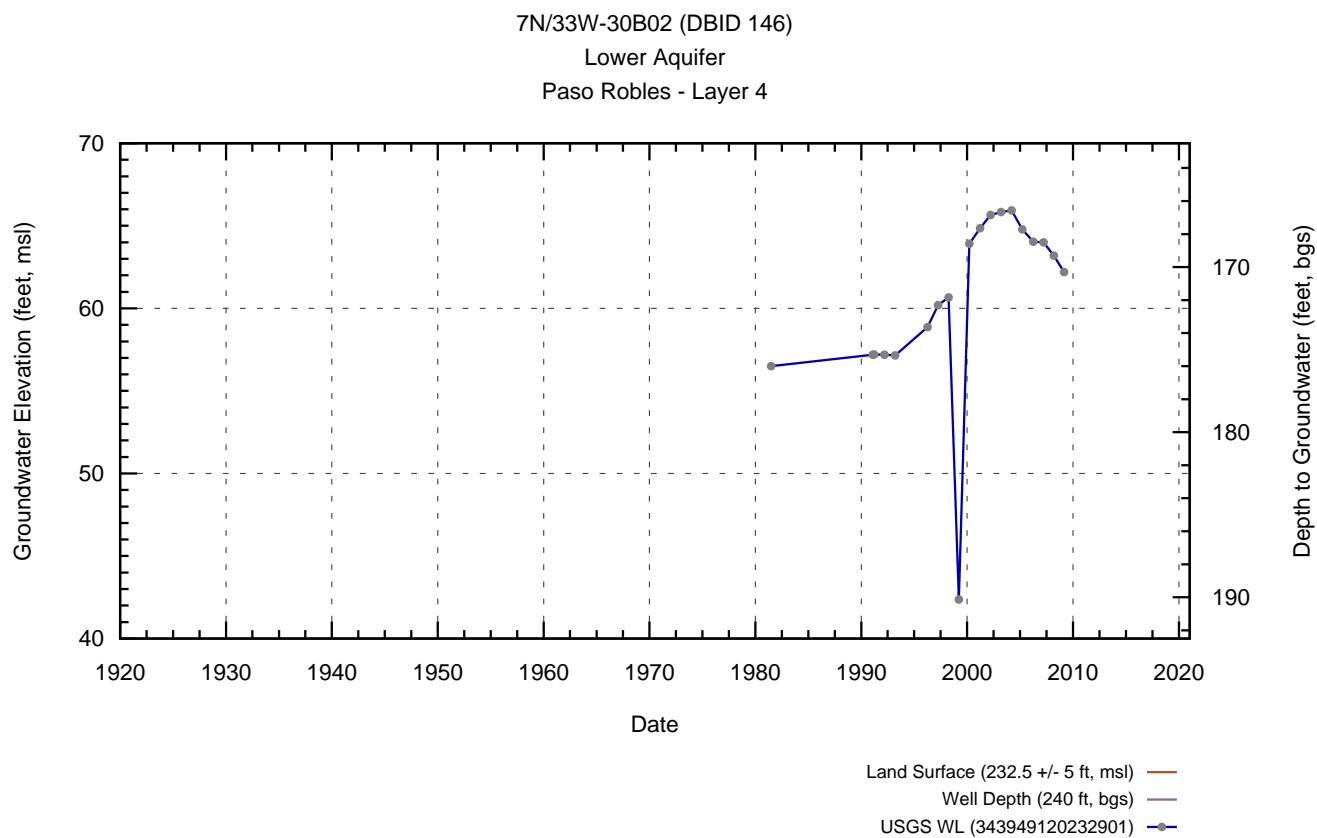
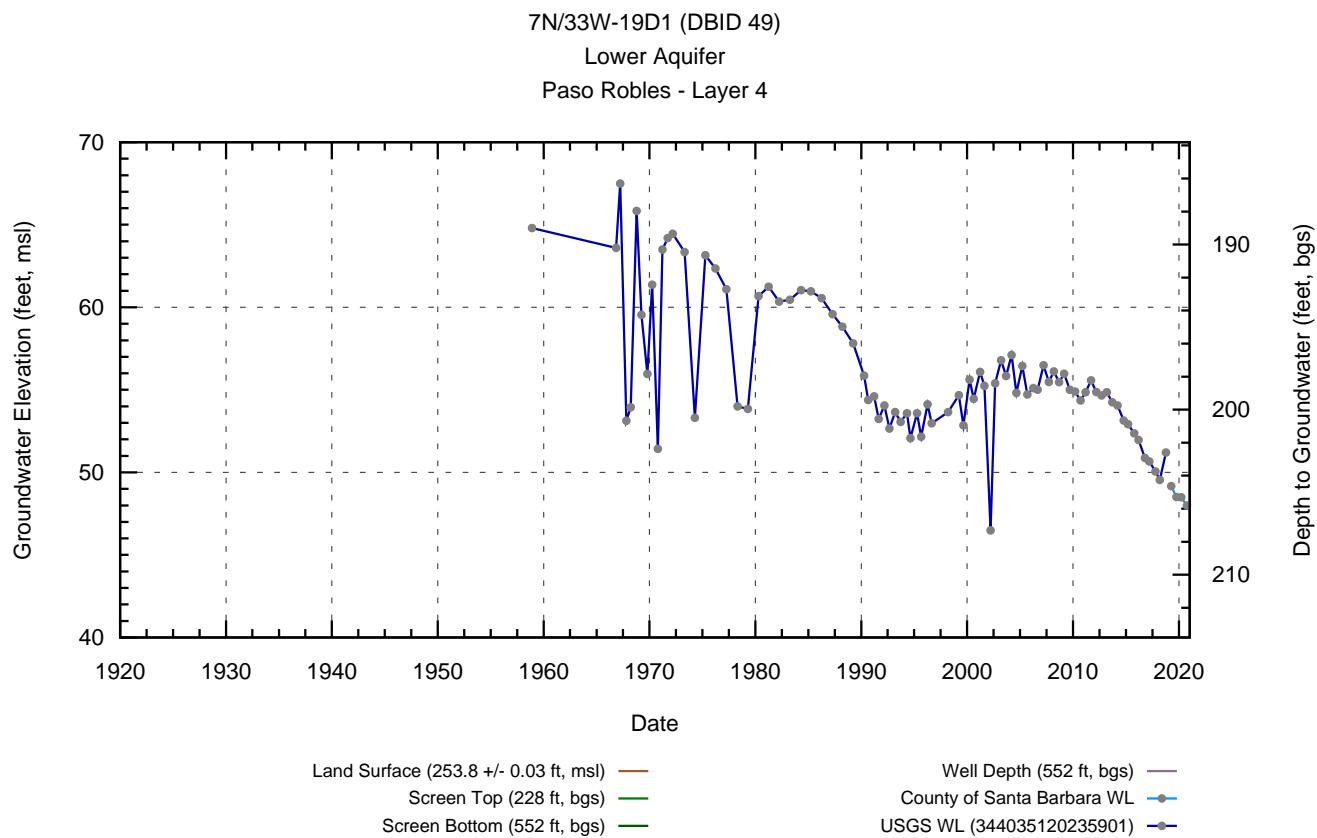
WMA: Lompoc Uplands



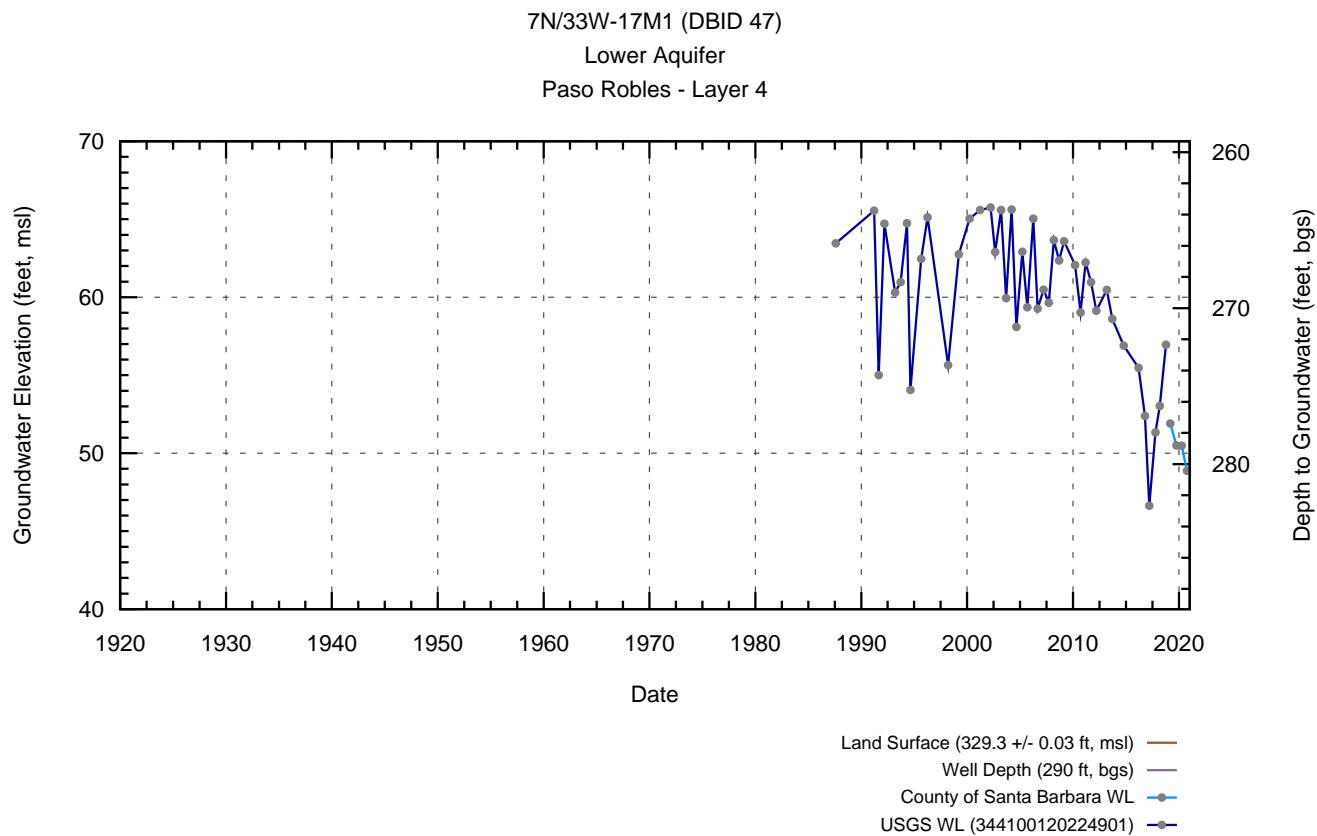
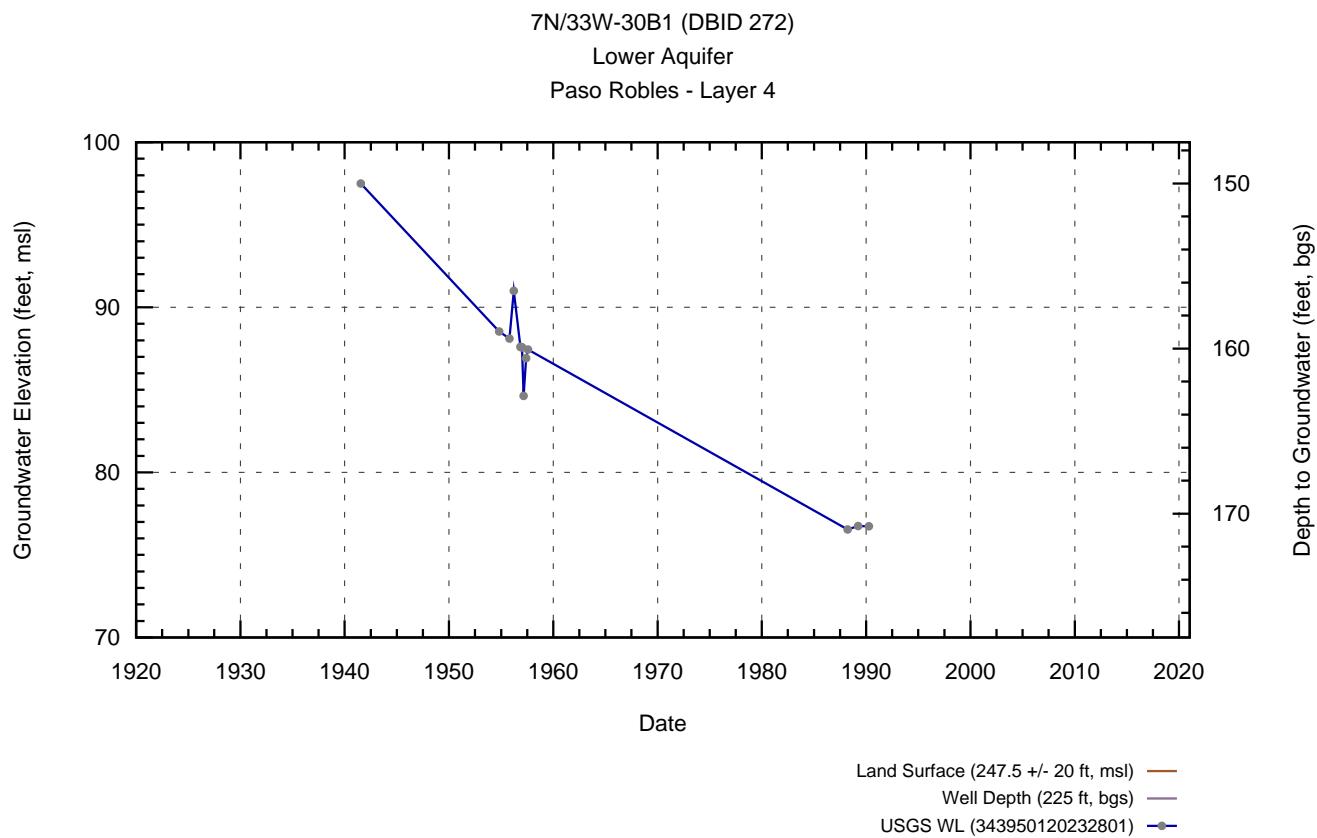
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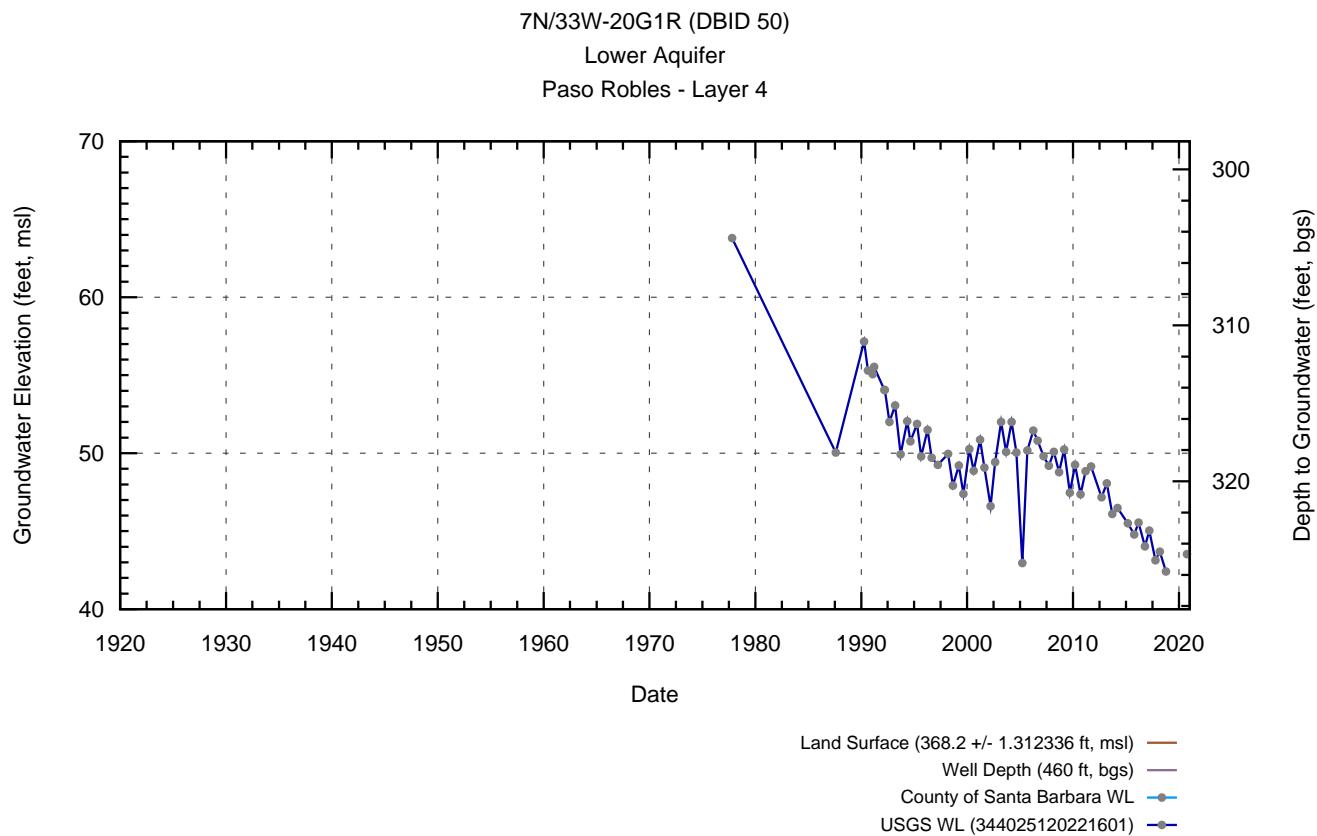
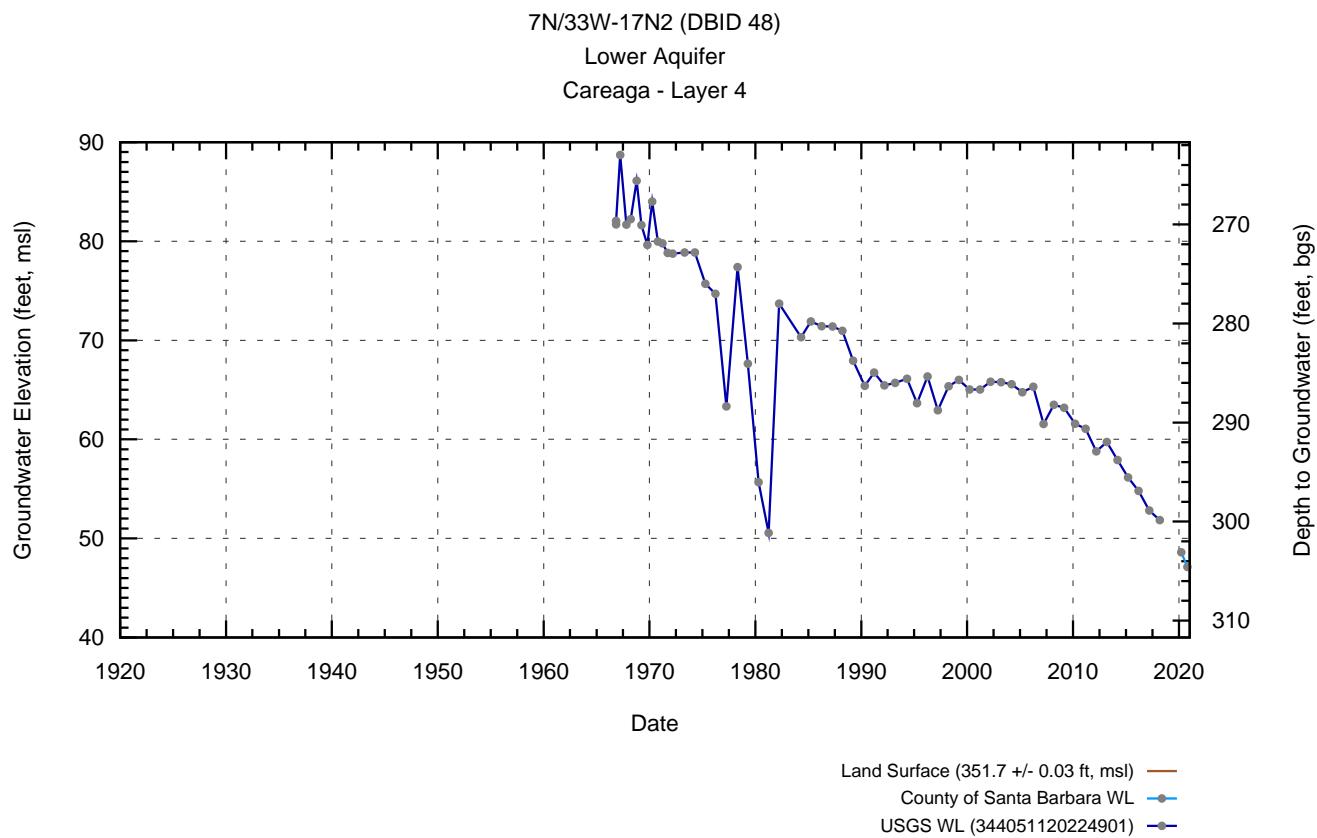
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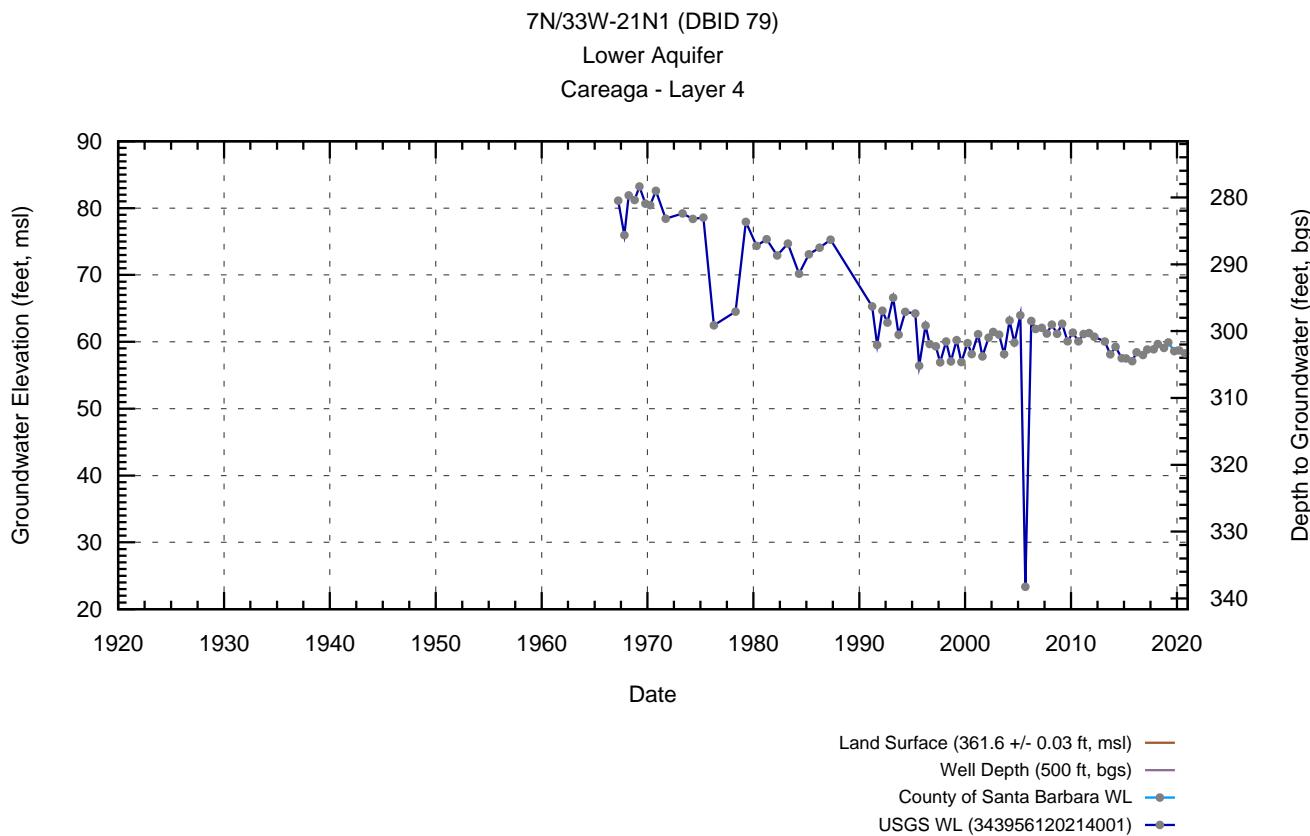
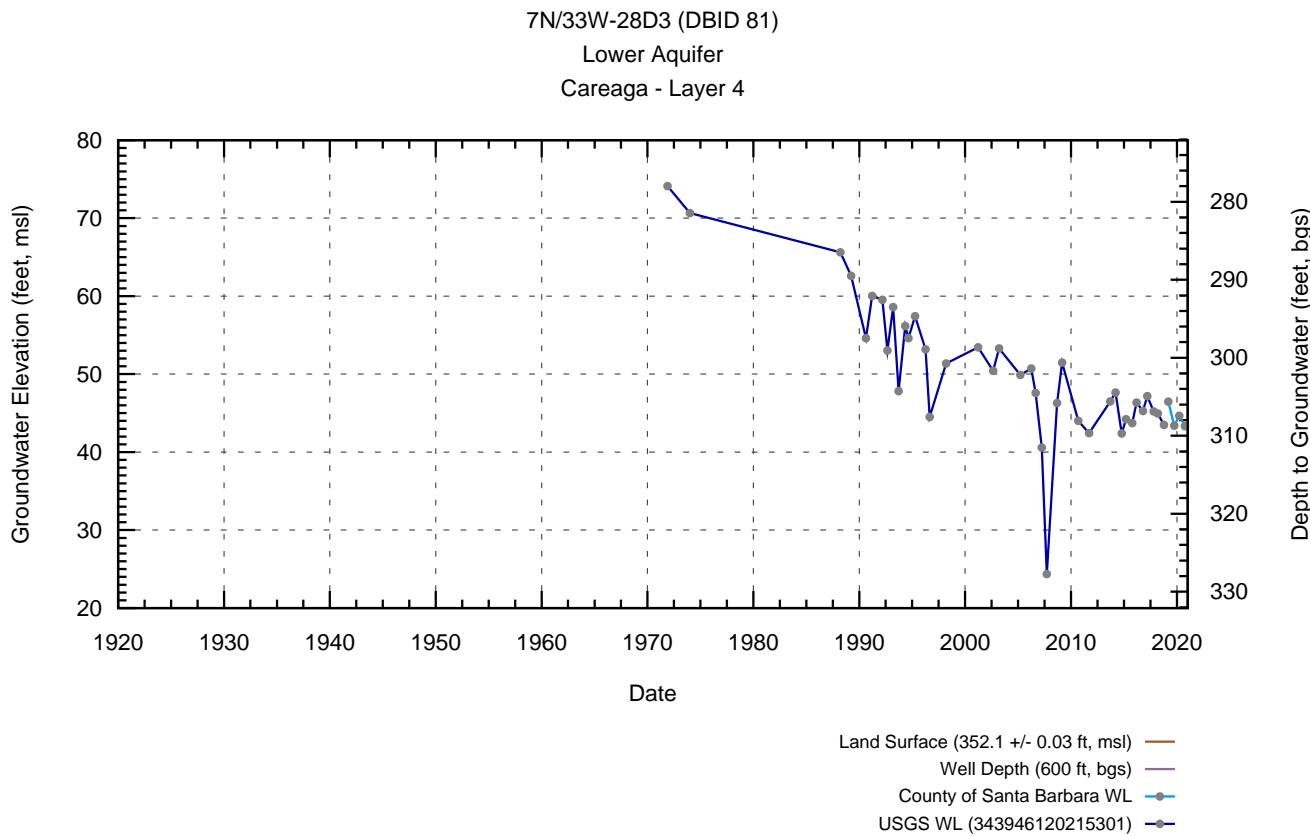
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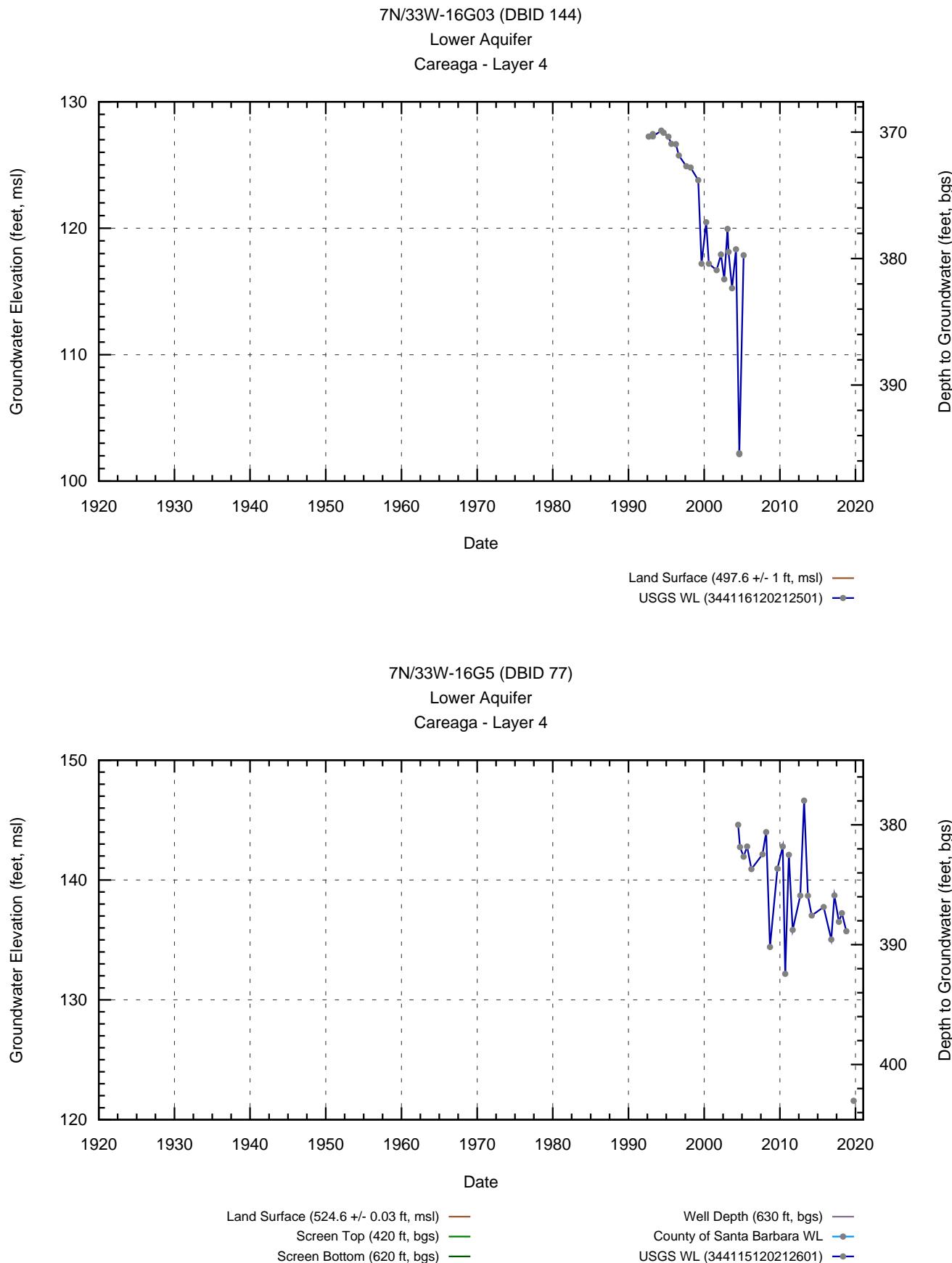
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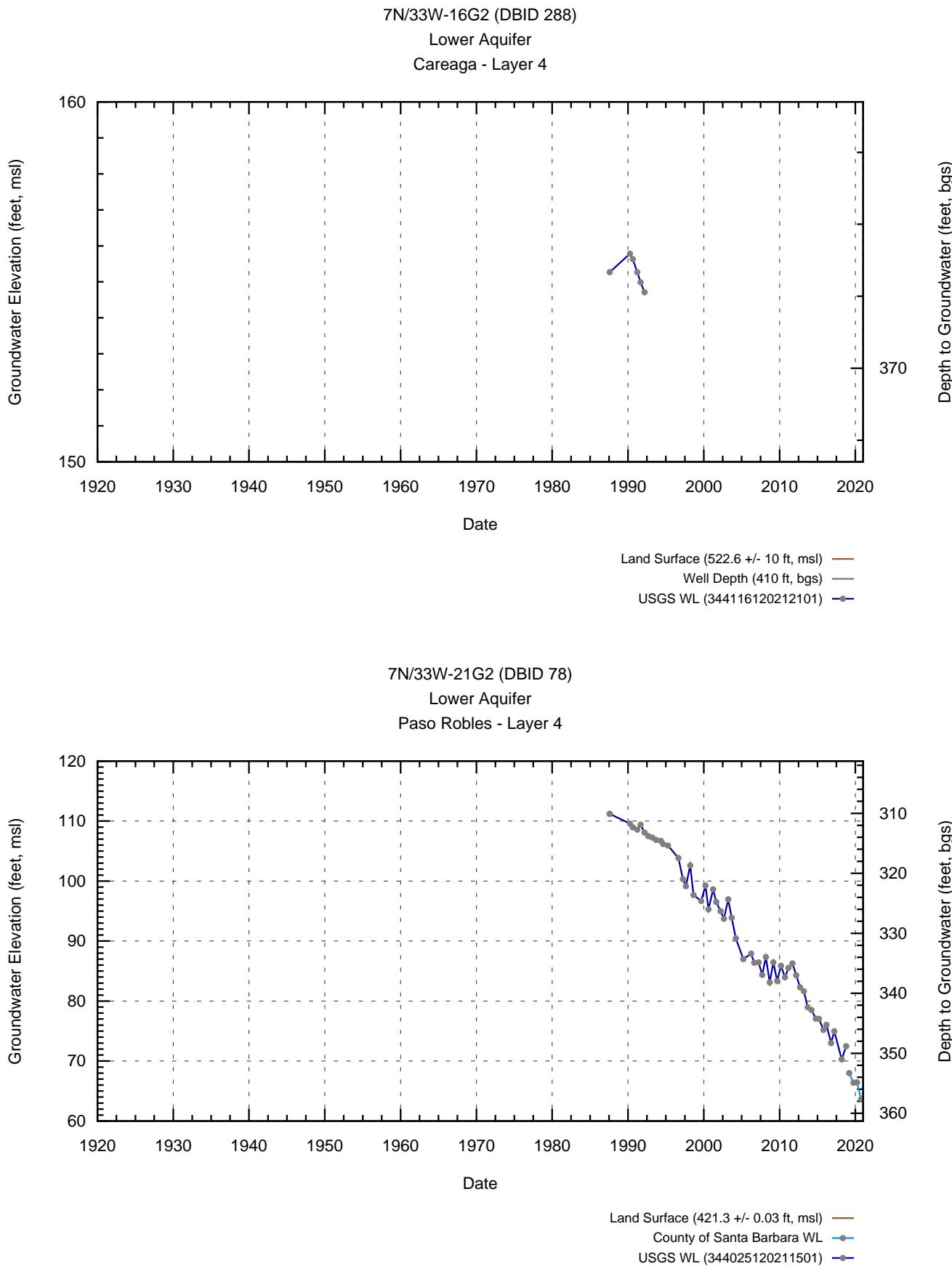
WMA: Santa Rita Uplands



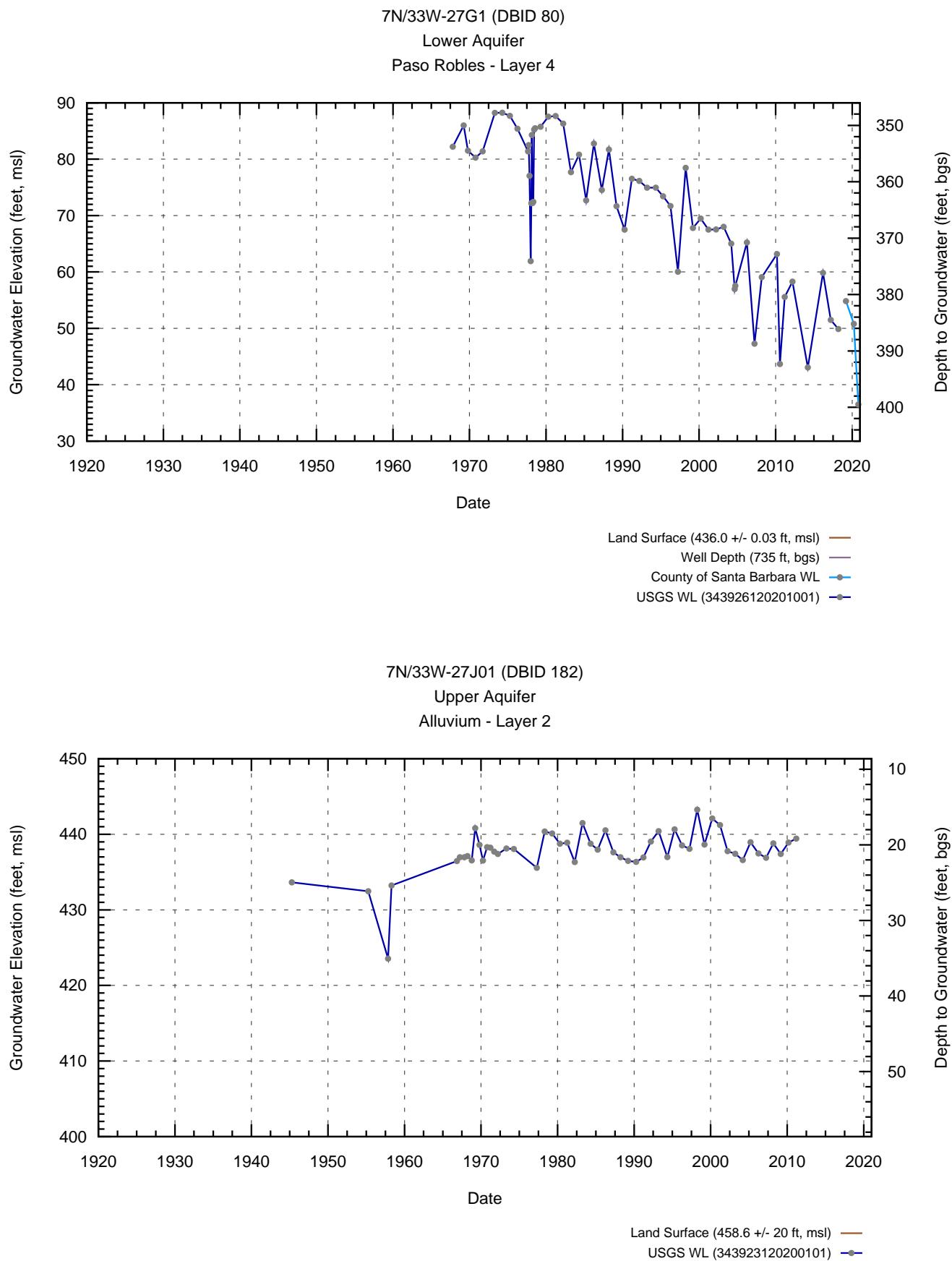
WMA: Santa Rita Uplands



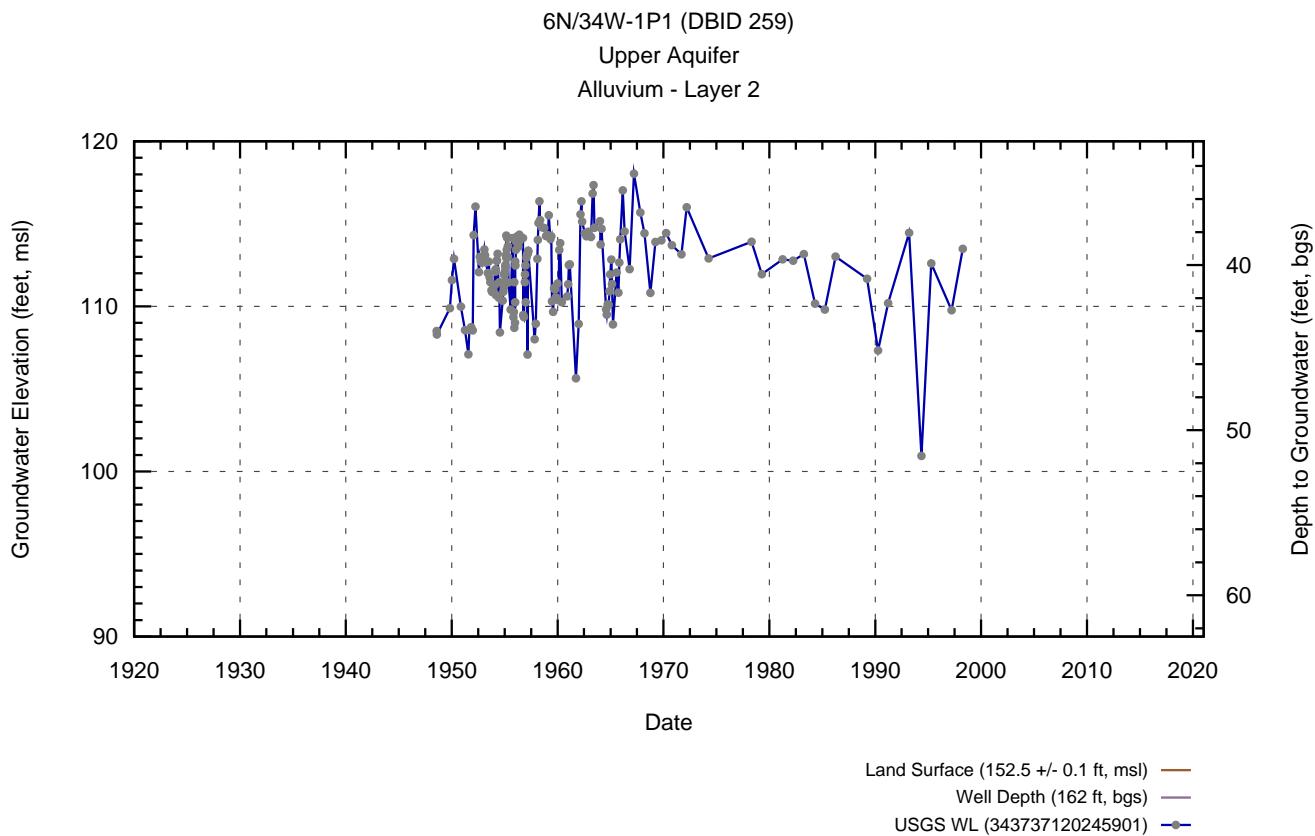
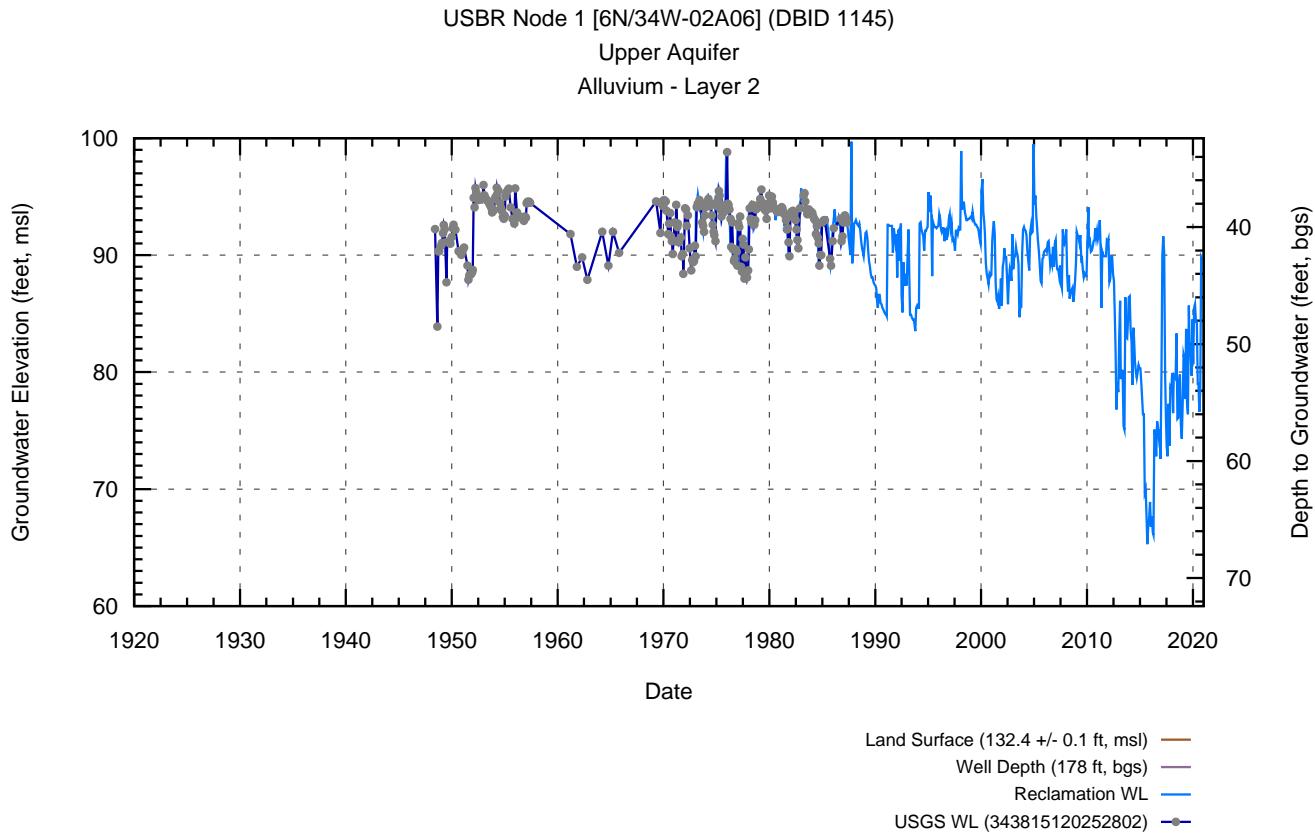
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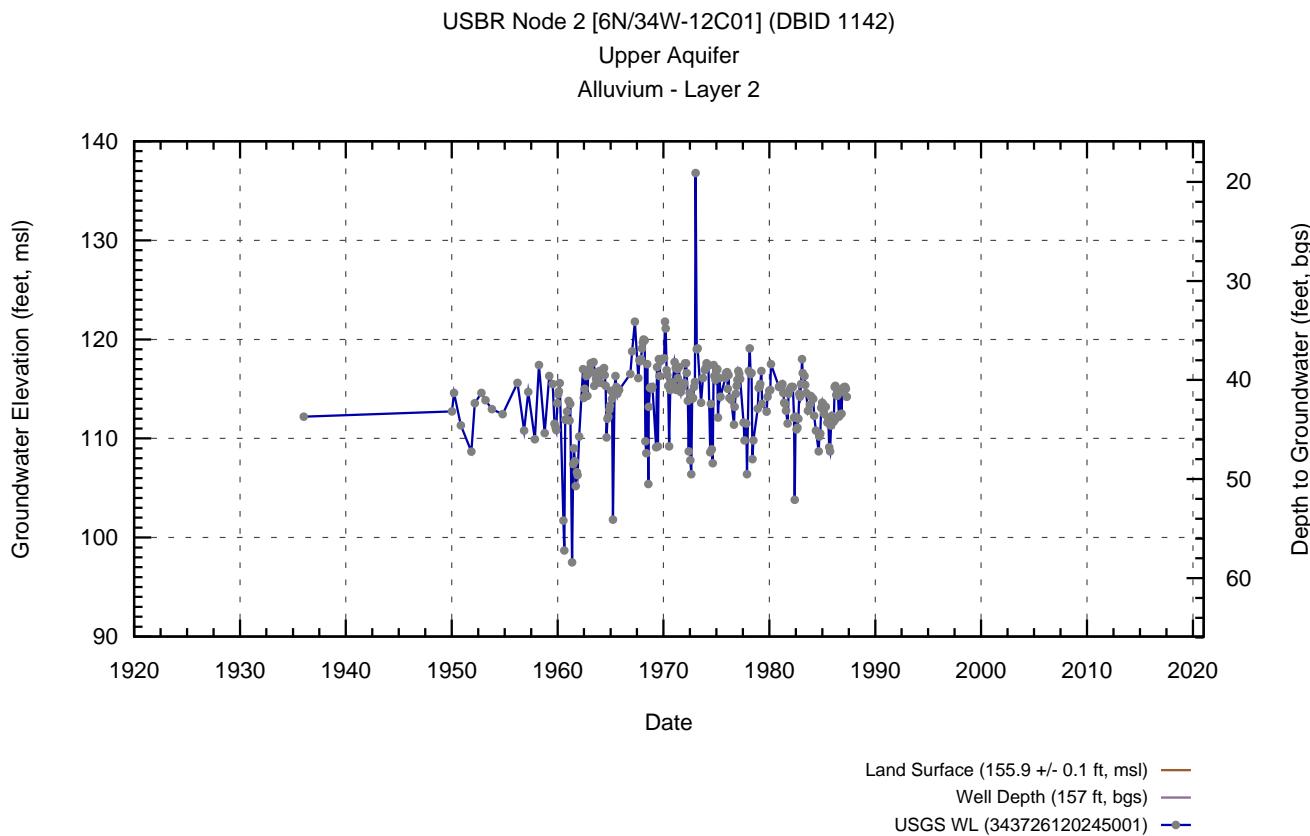
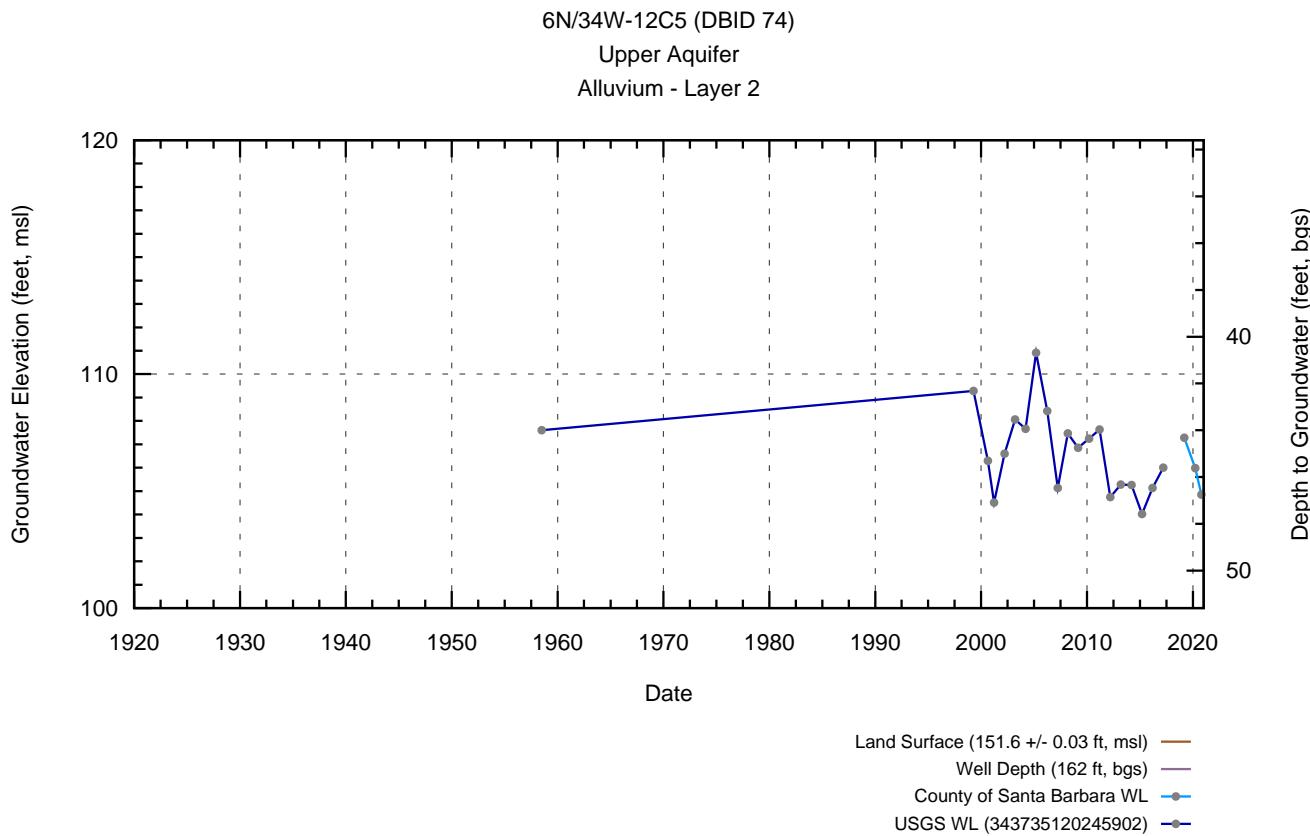
WMA: Santa Rita Uplands



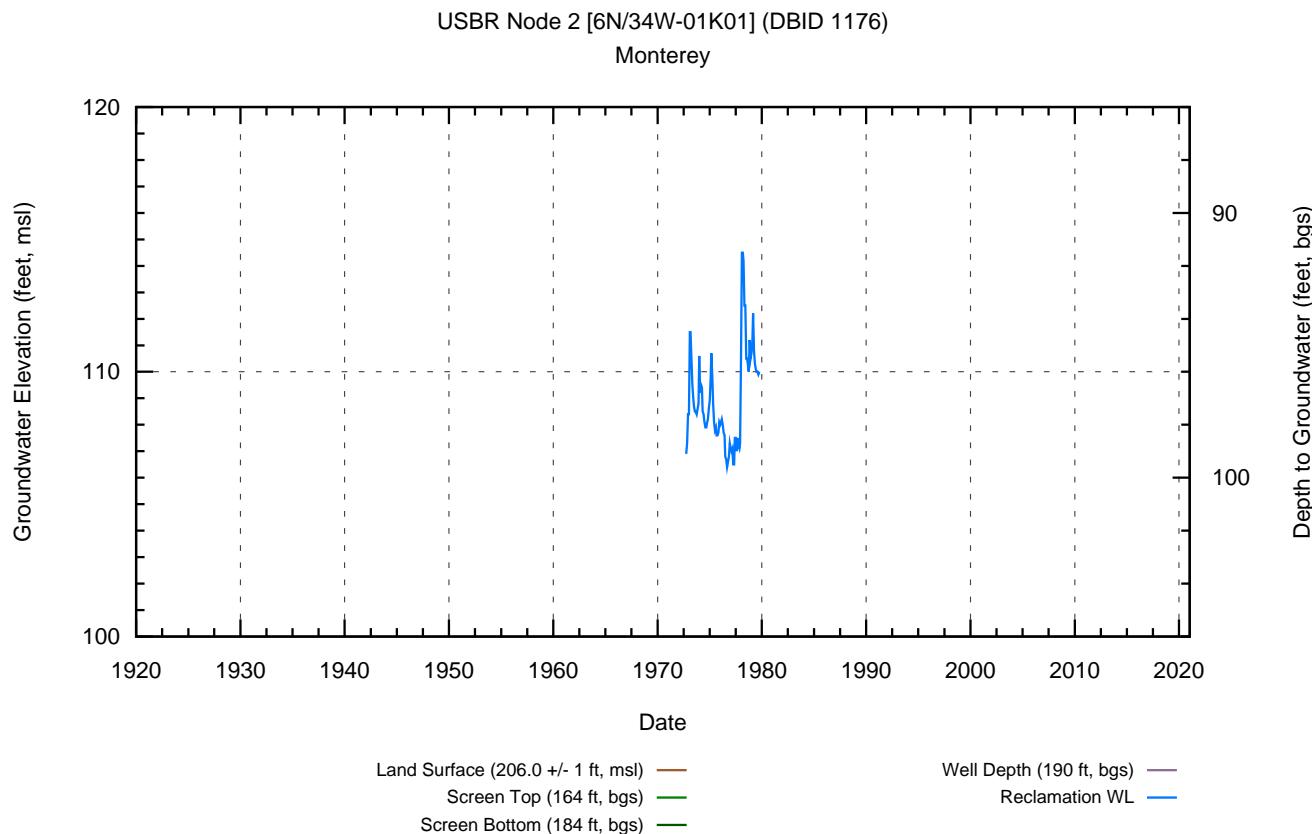
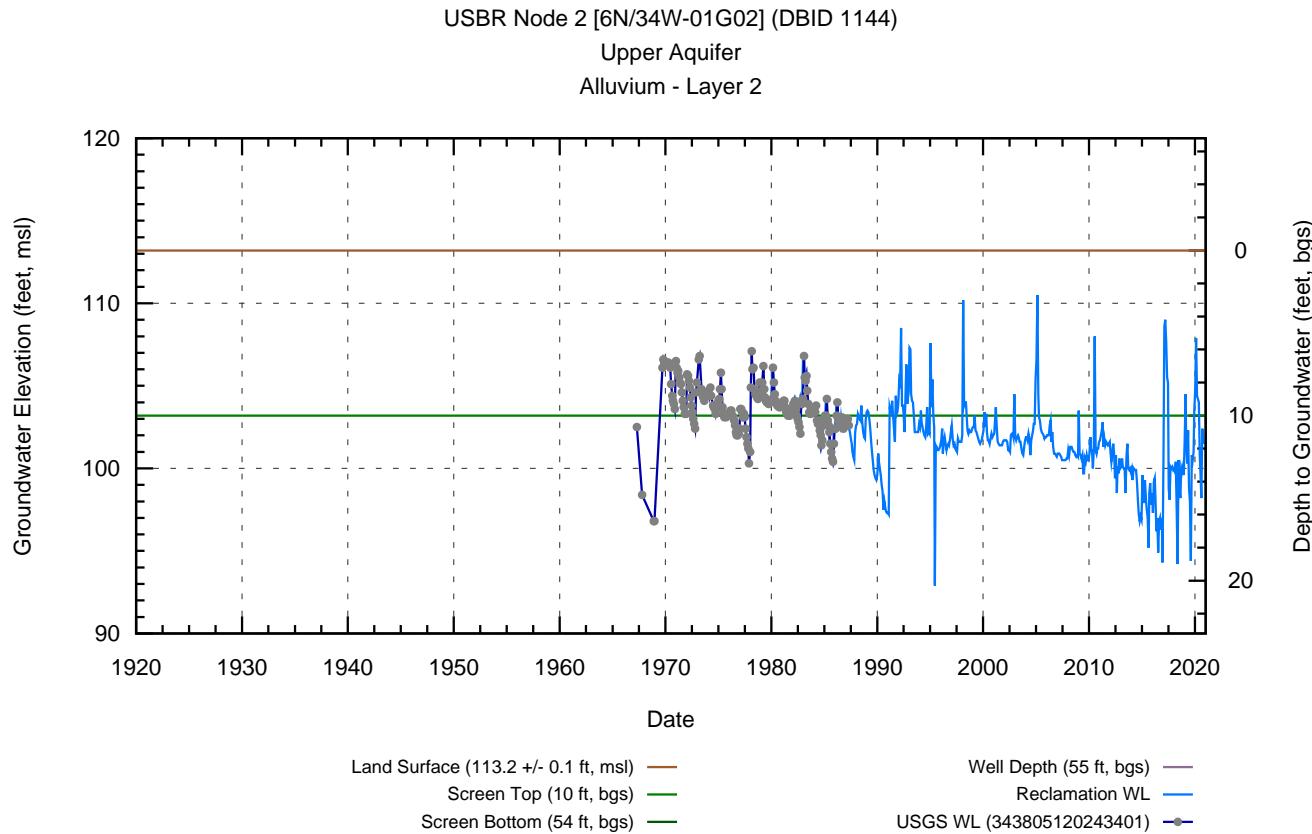
WMA: Santa Ynez River



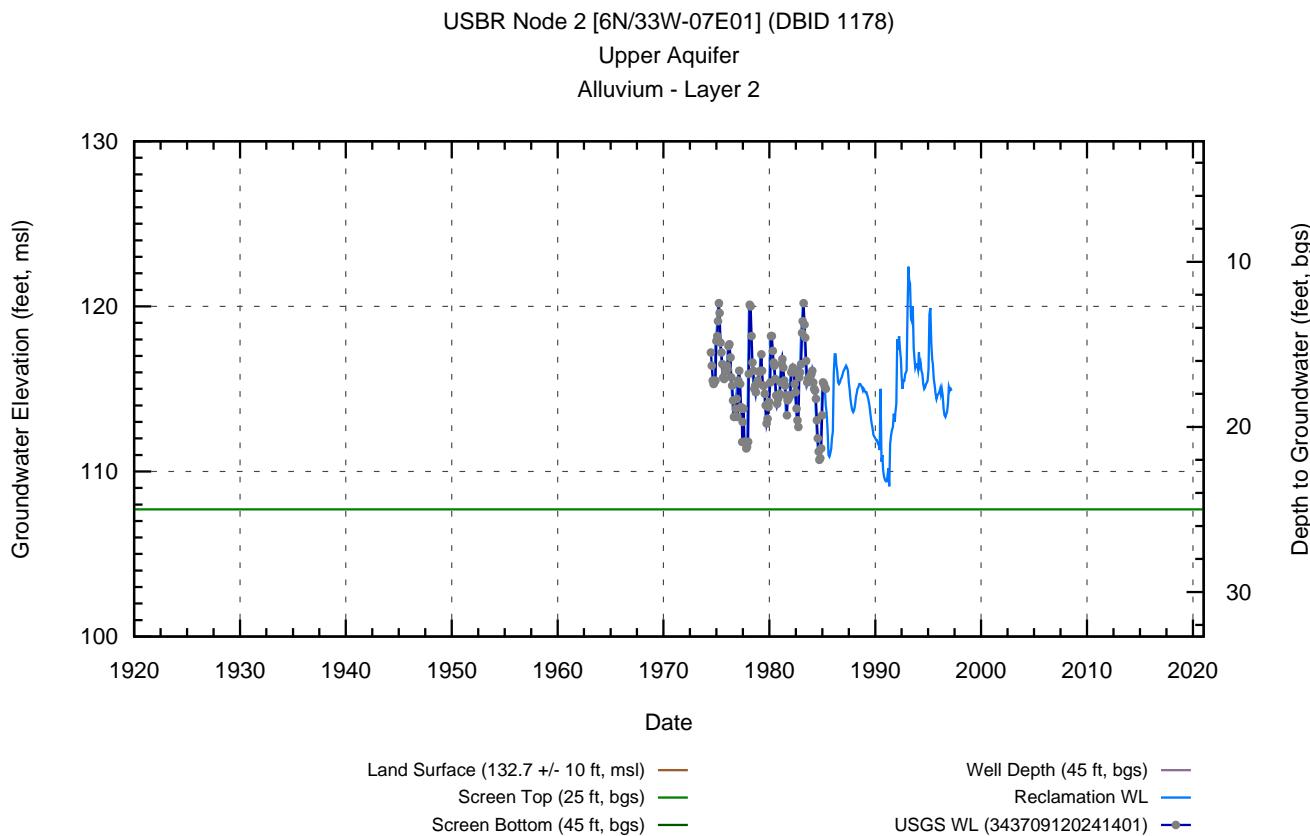
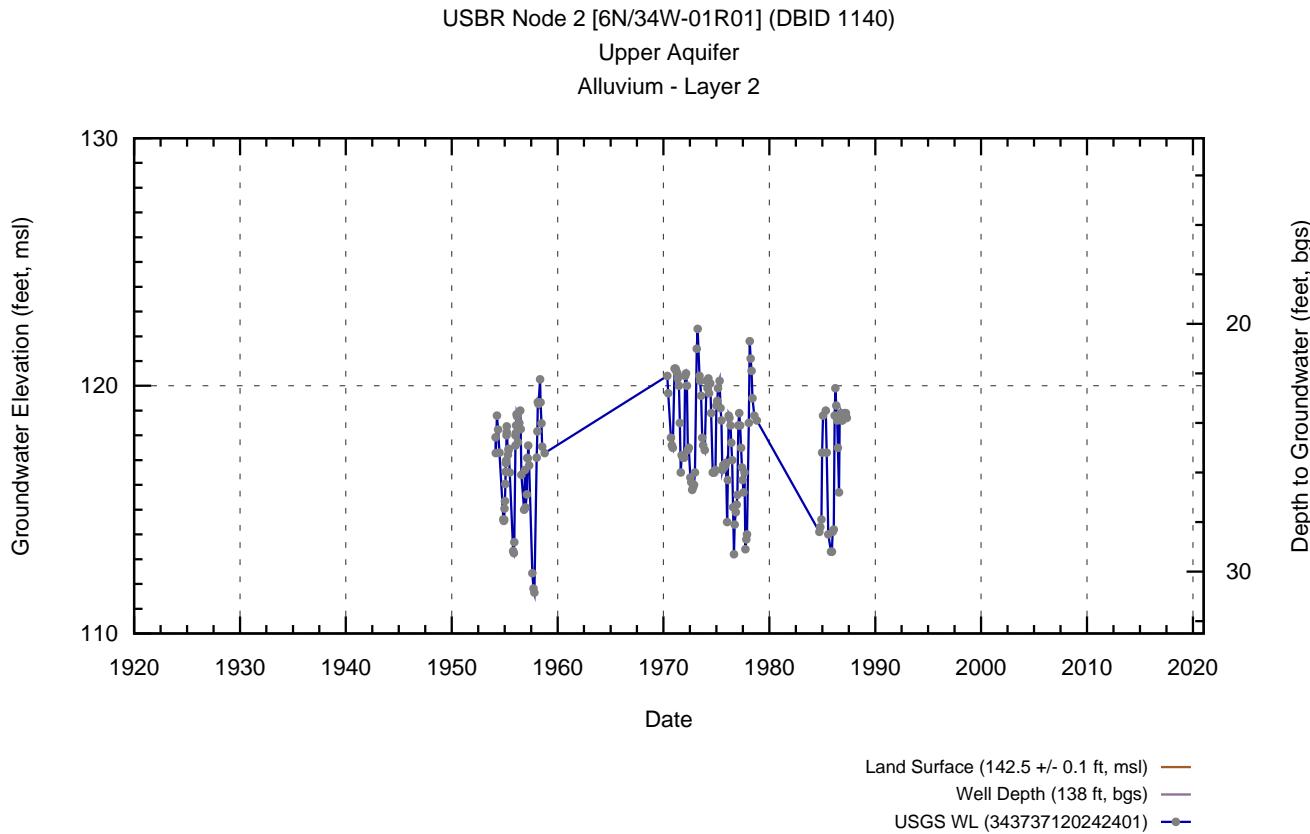
WMA: Santa Ynez River



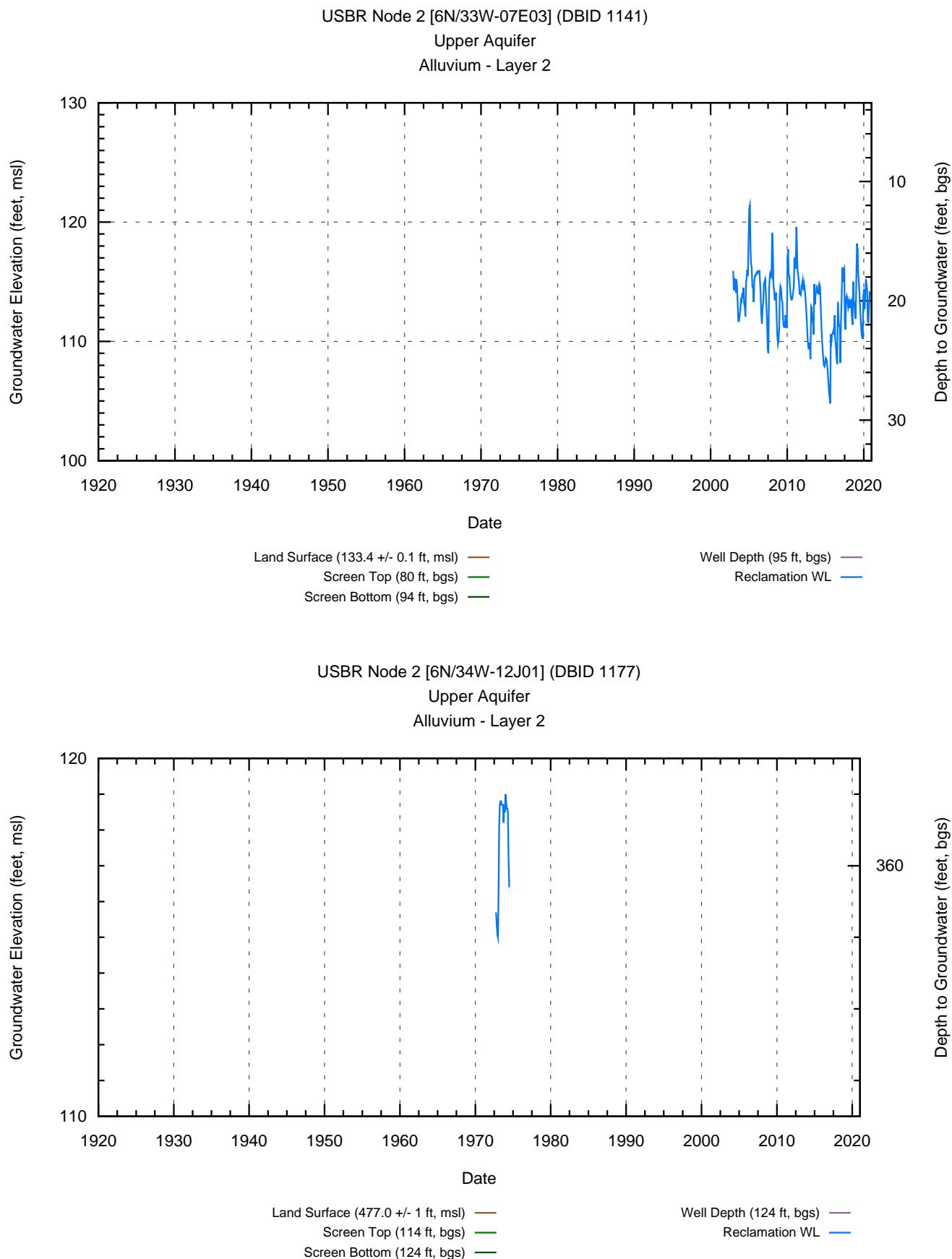
WMA: Santa Ynez River



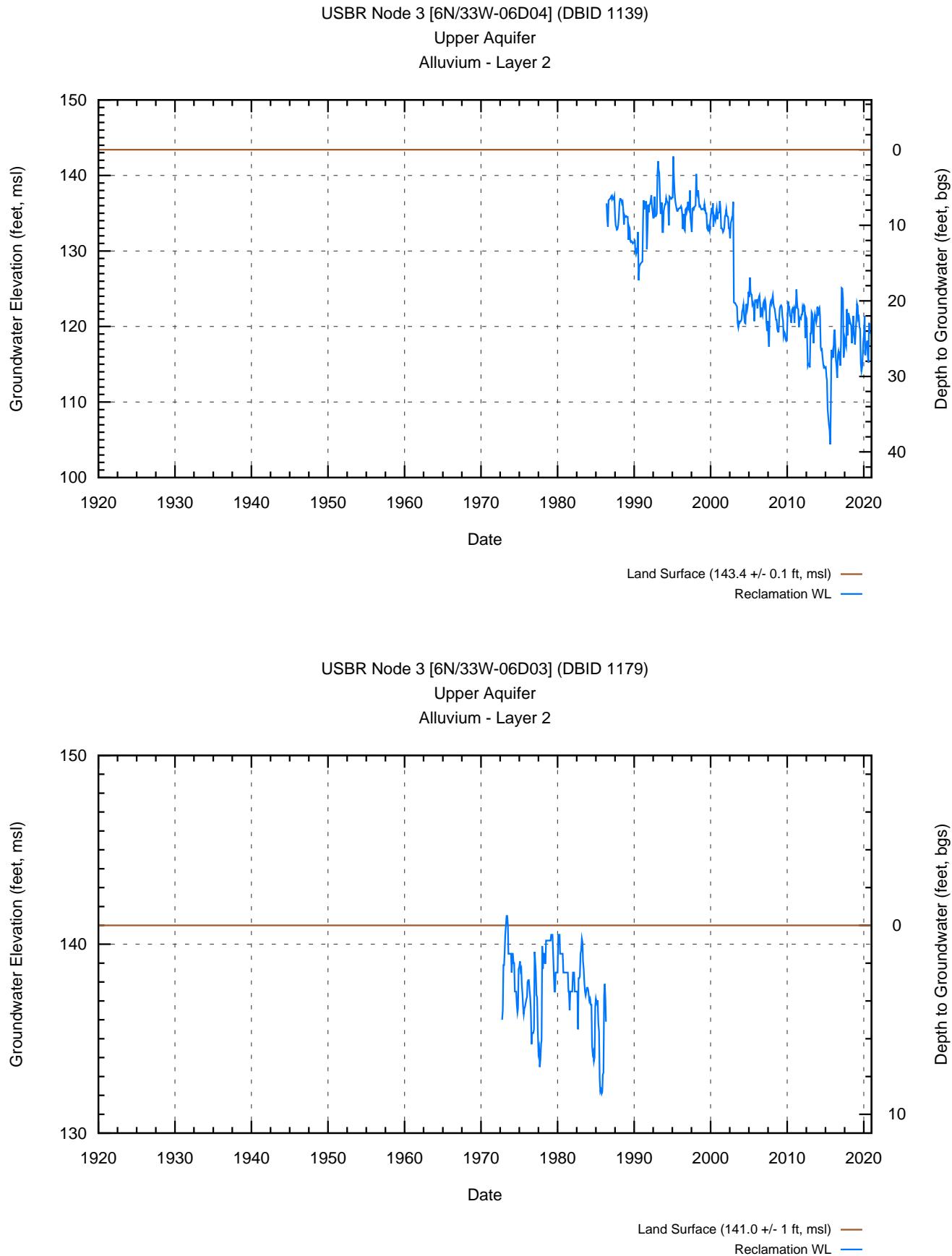
WMA: Santa Ynez River



WMA: Santa Ynez River



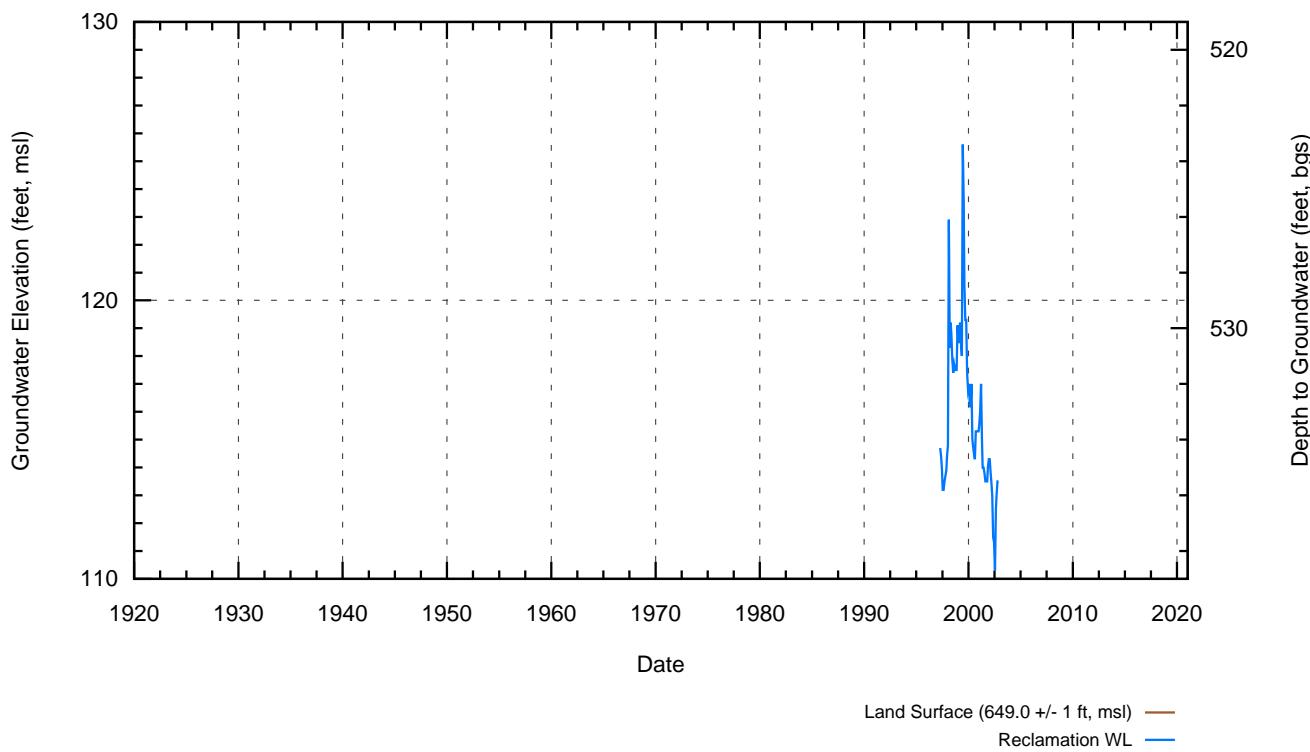
WMA: Santa Ynez River



WMA: Santa Ynez River

USBR Node 2 [6N/33W-07E02] (DBID 1198)

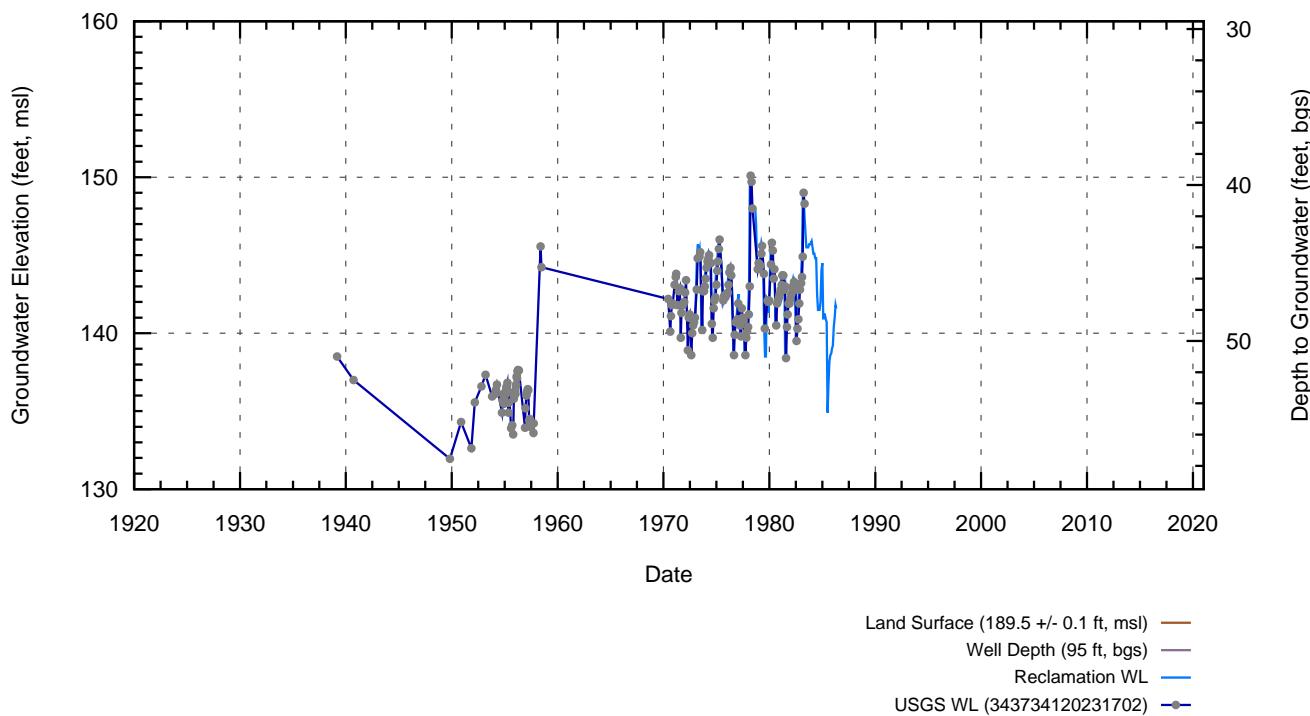
Monterey



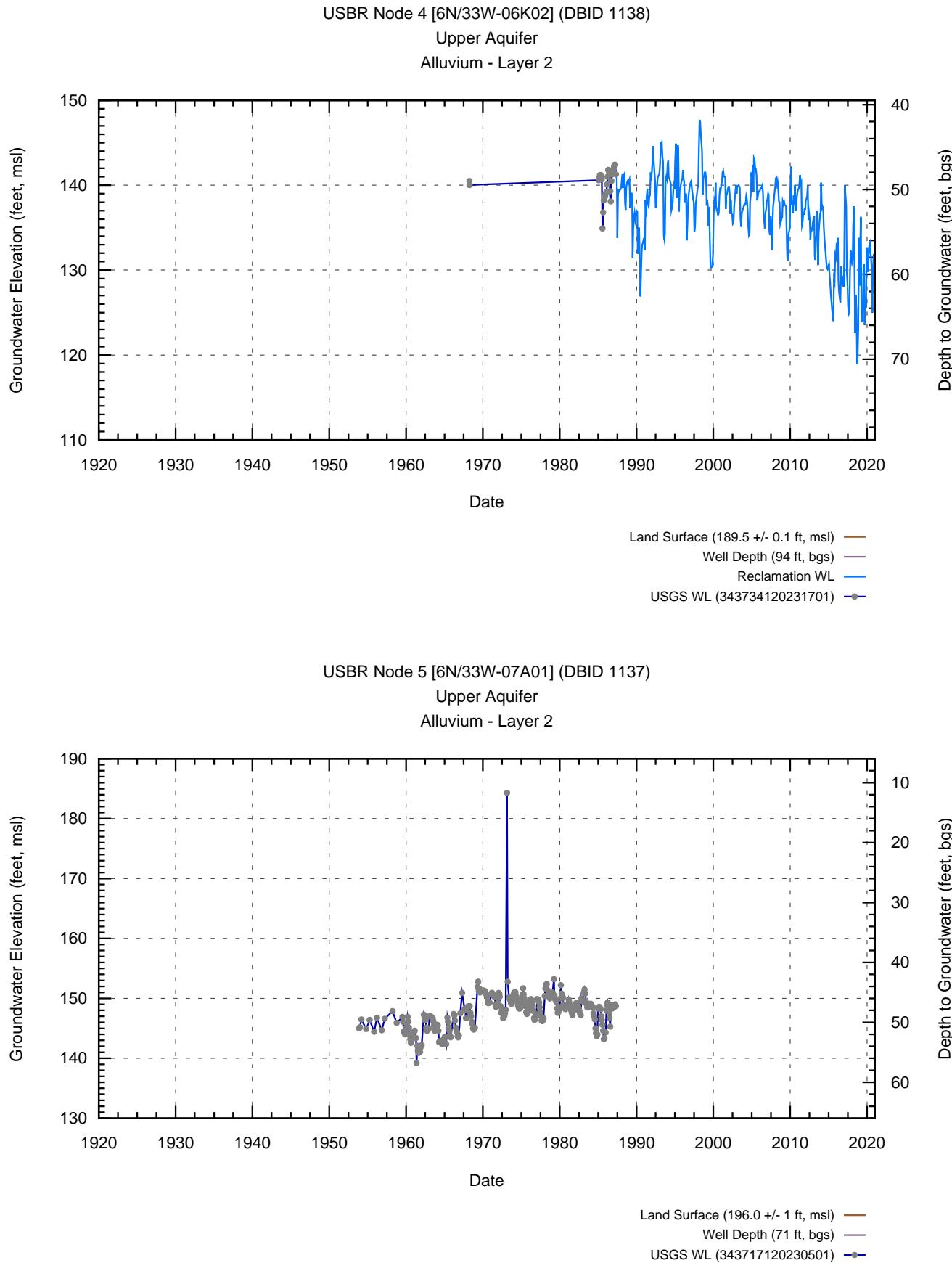
USBR Node 4 [6N/33W-06K01] (DBID 1180)

Upper Aquifer

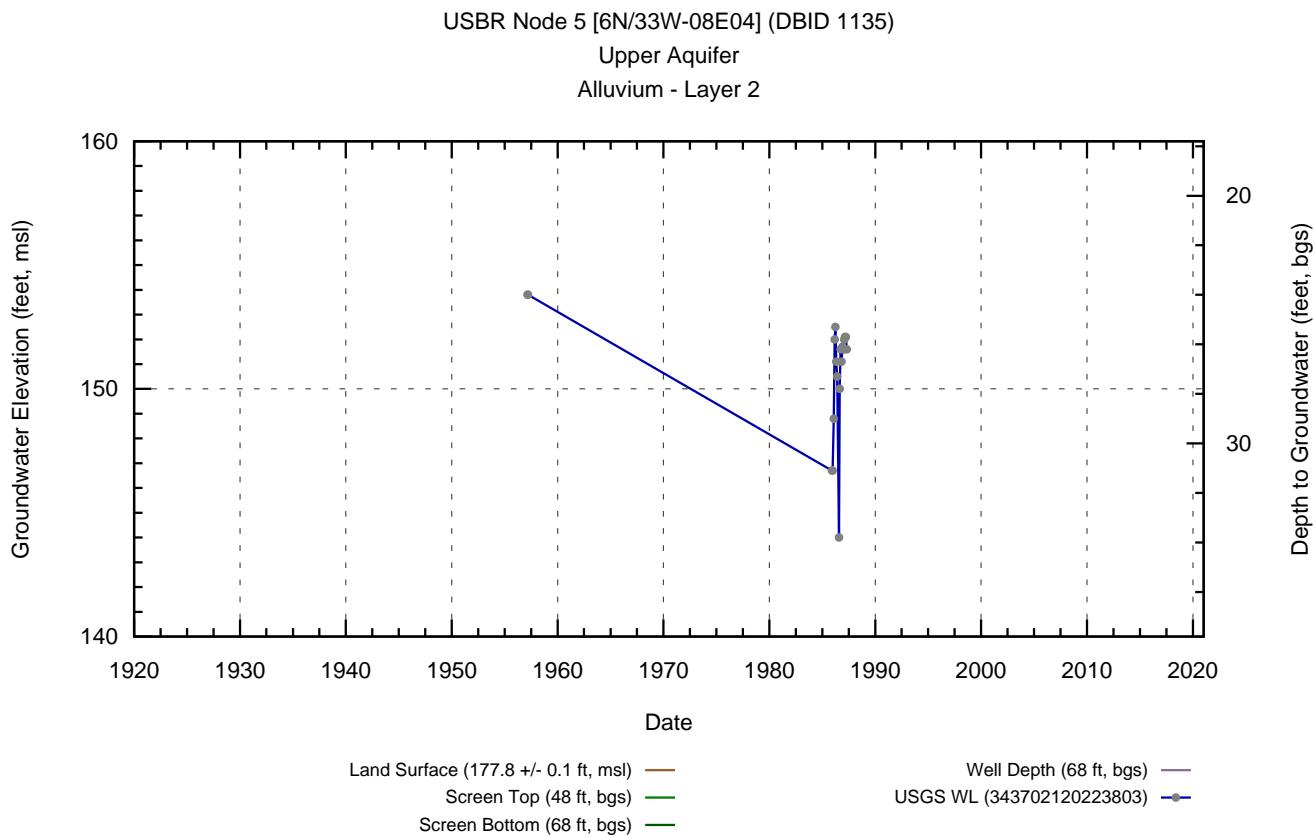
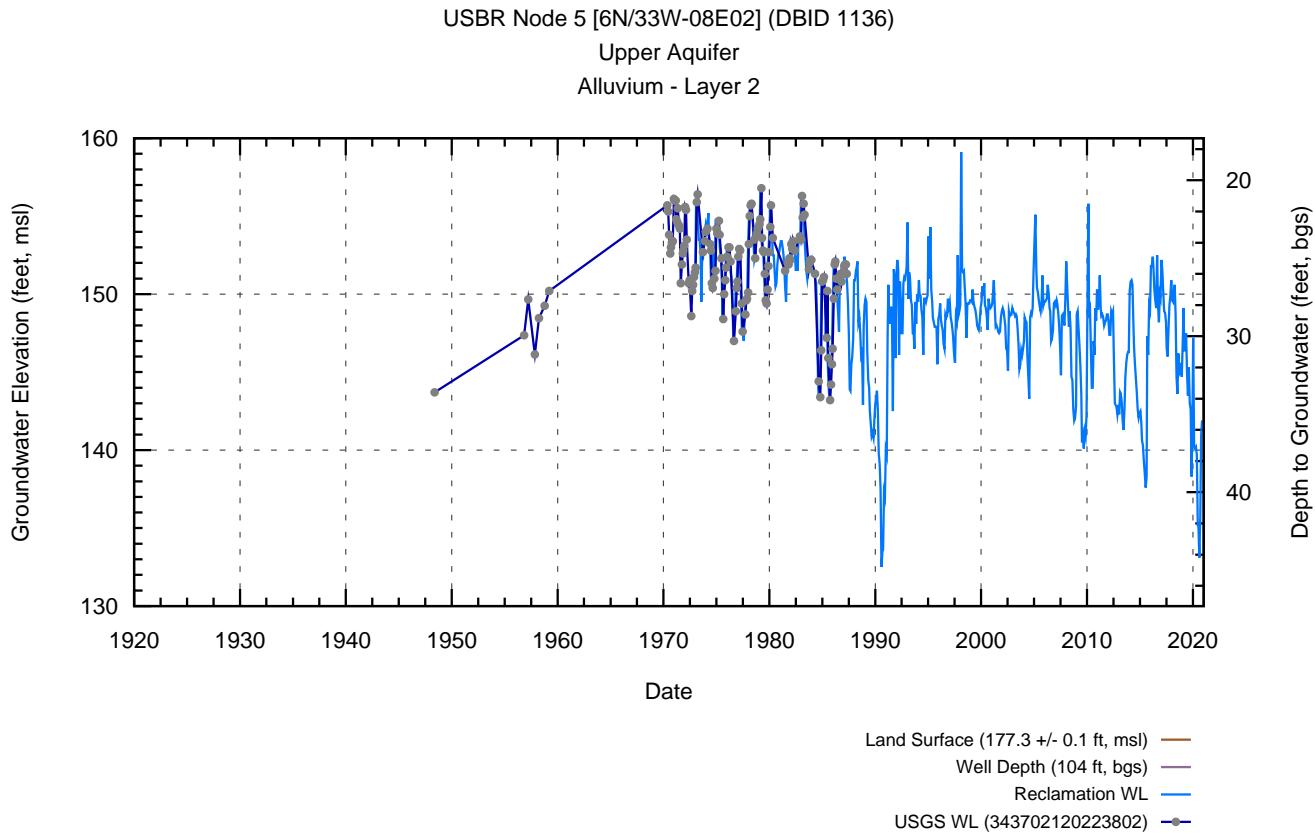
Older Alluvium - Layer 3



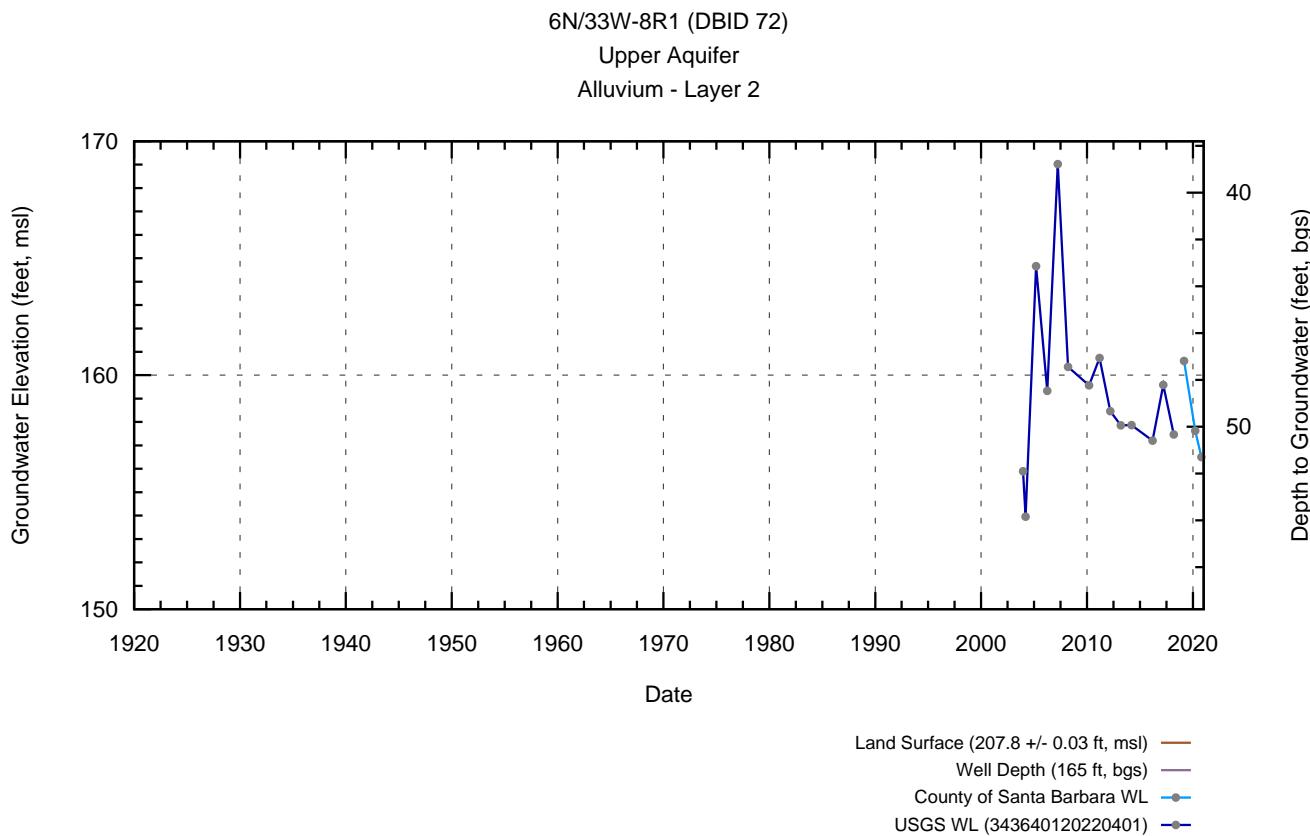
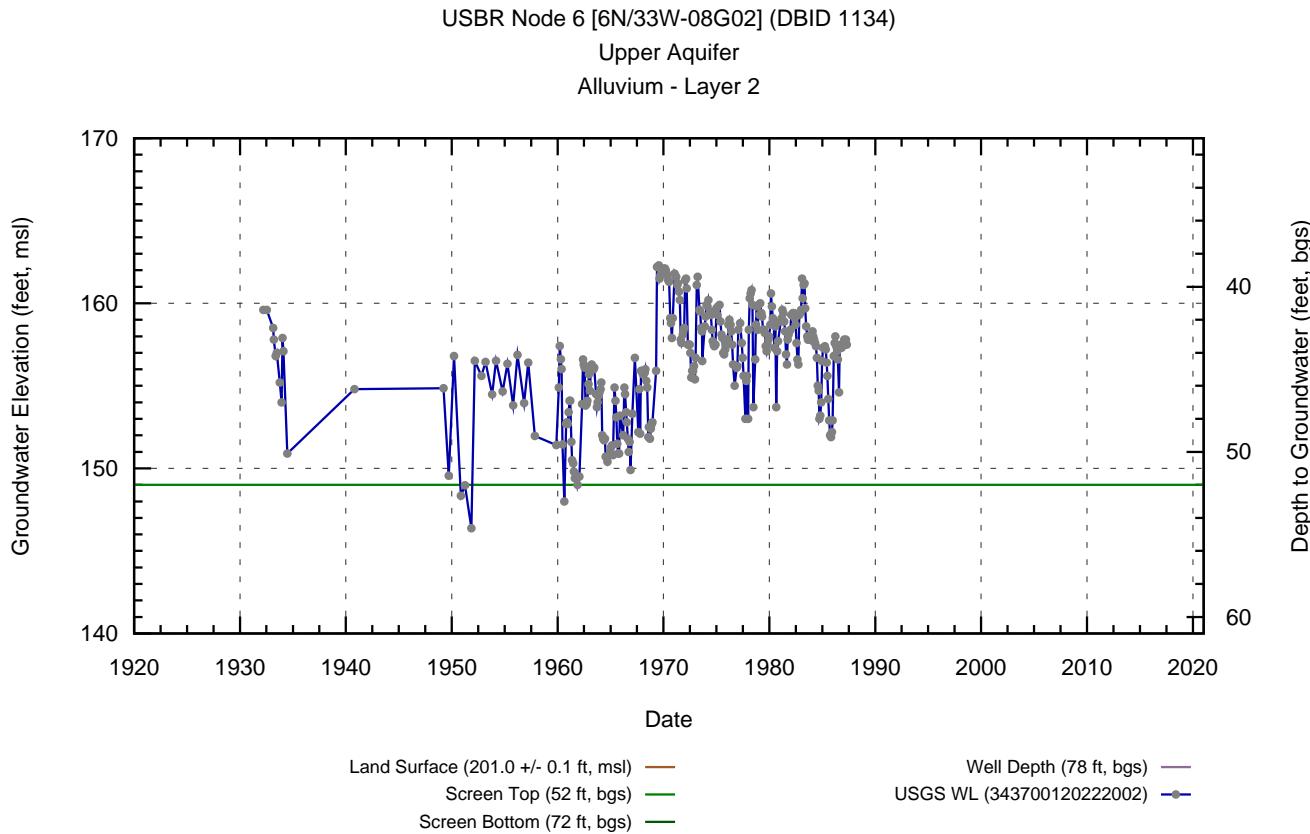
WMA: Santa Ynez River



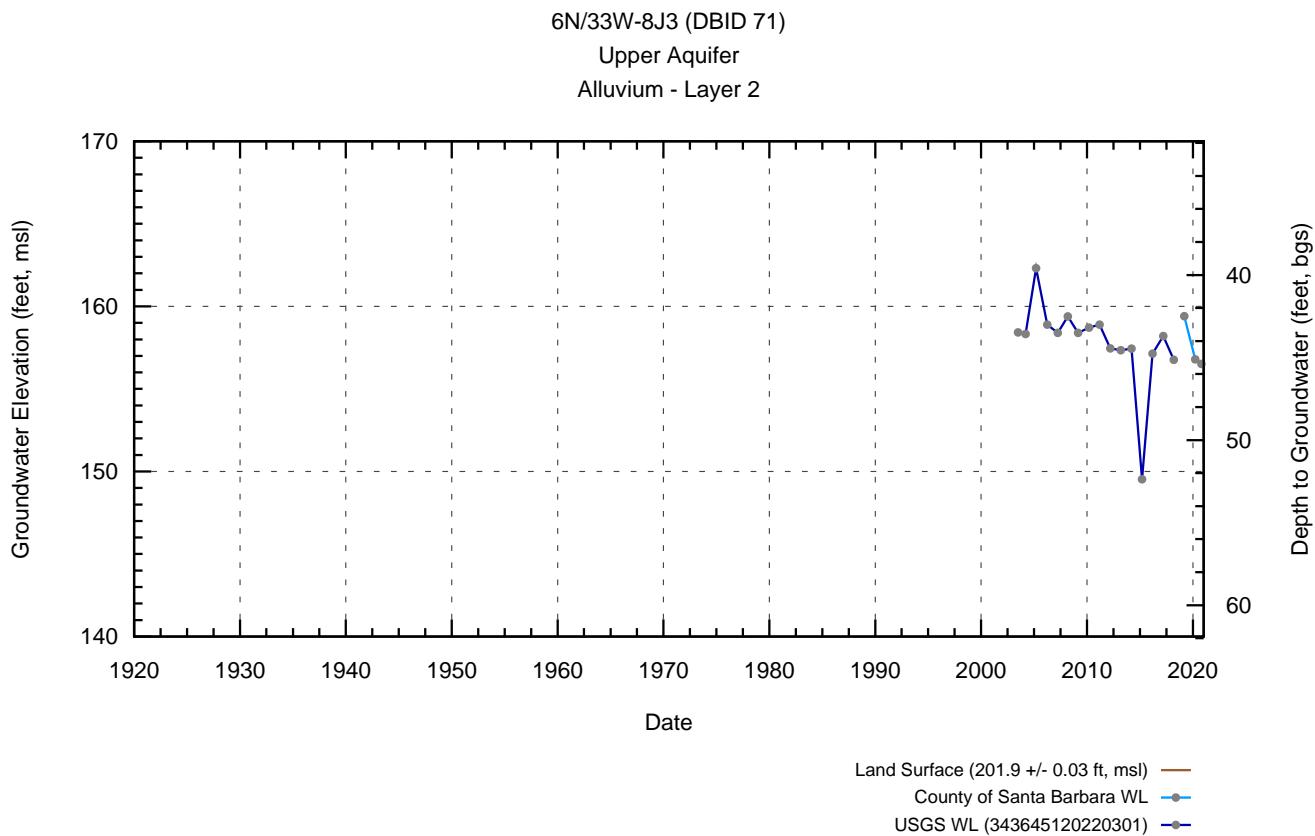
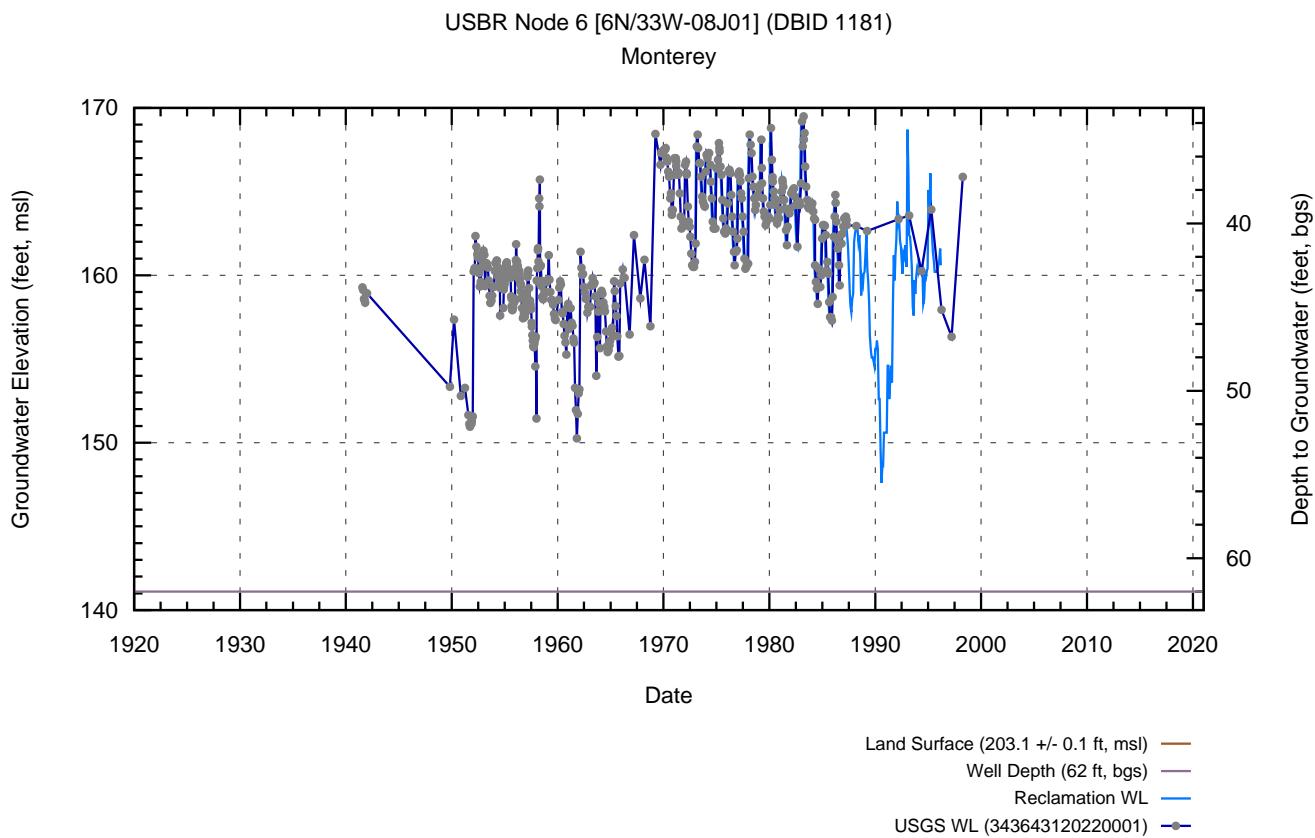
WMA: Santa Ynez River



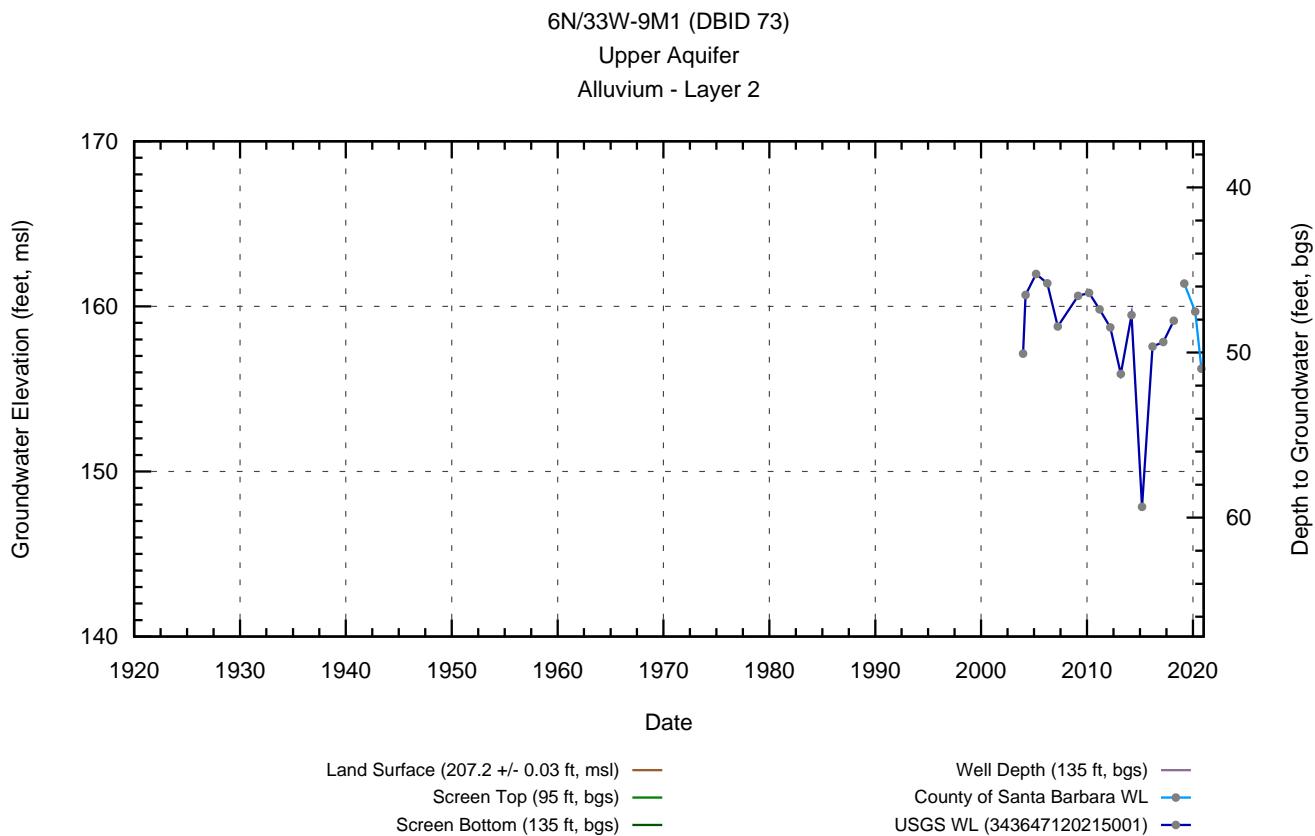
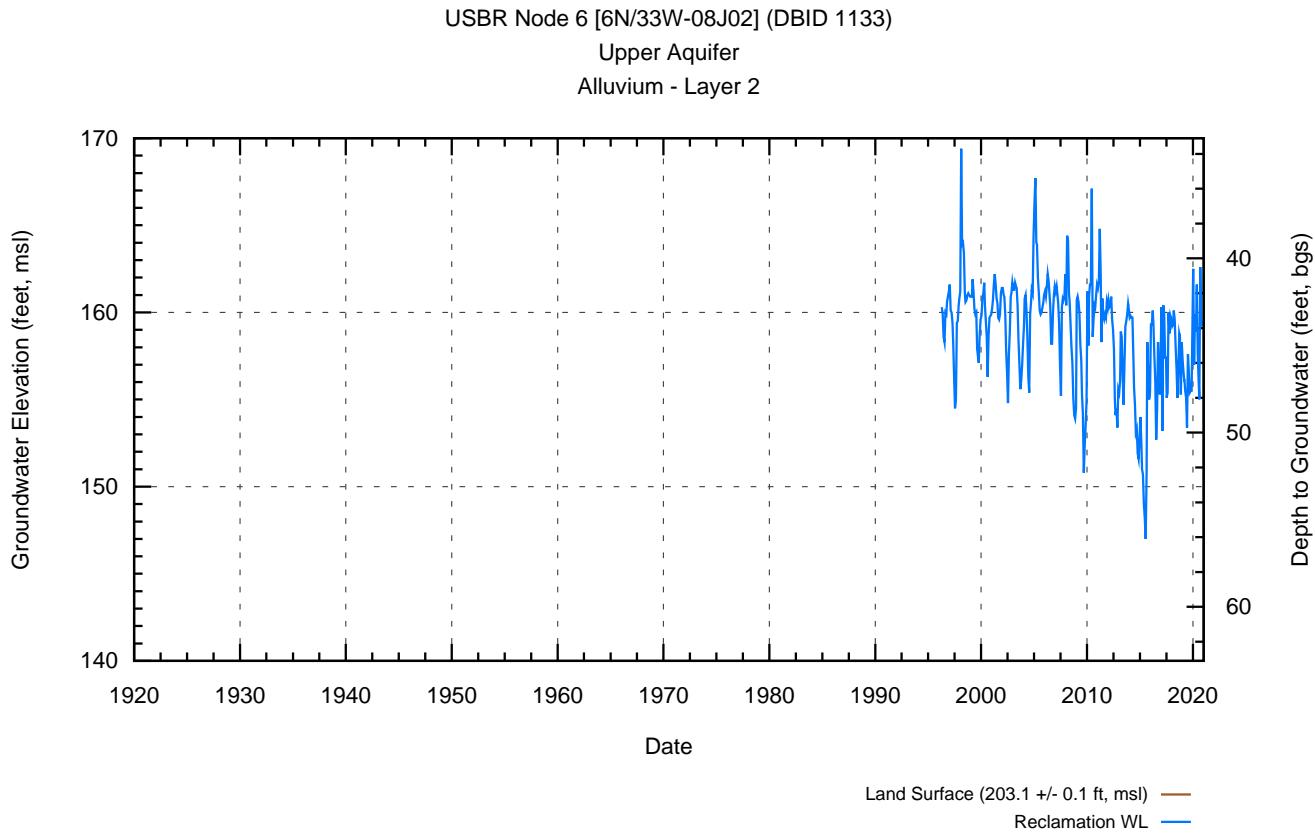
WMA: Santa Ynez River



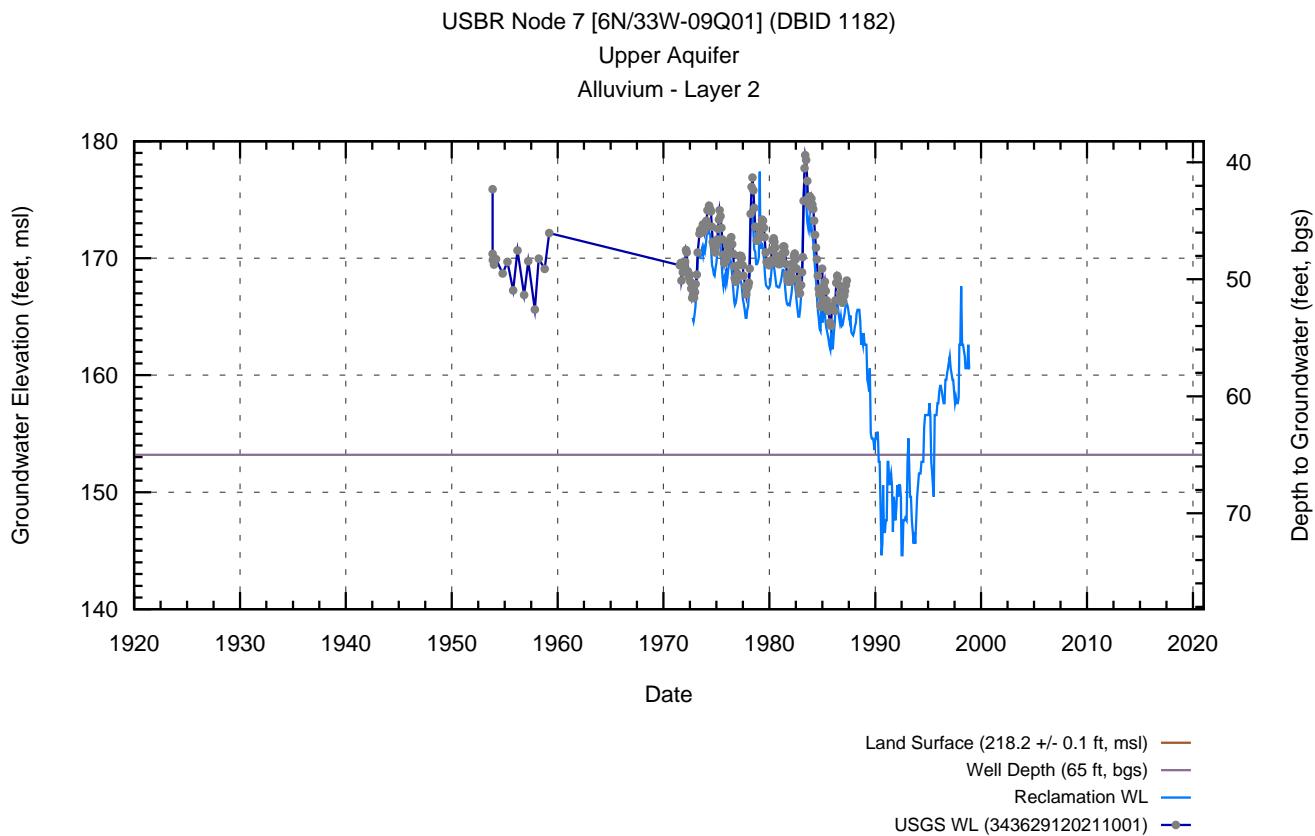
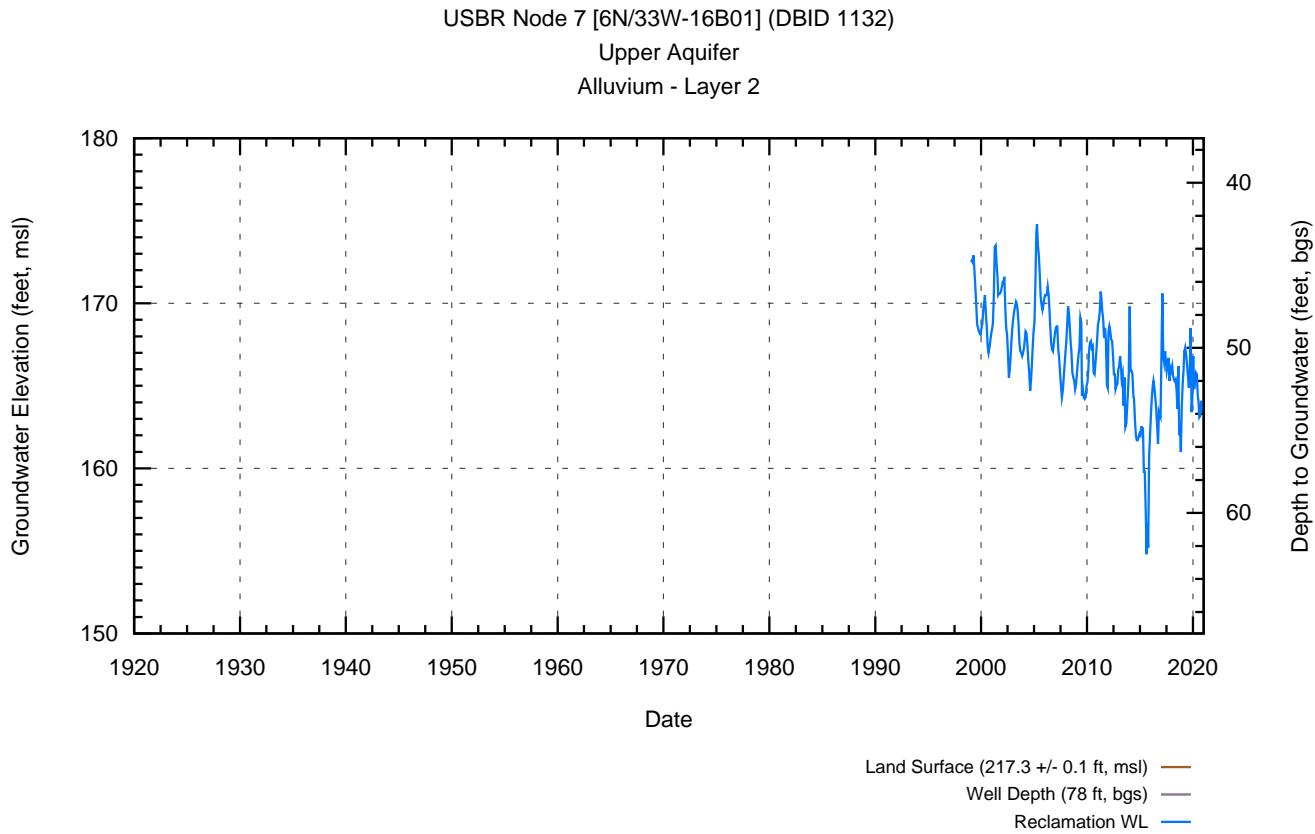
WMA: Santa Ynez River



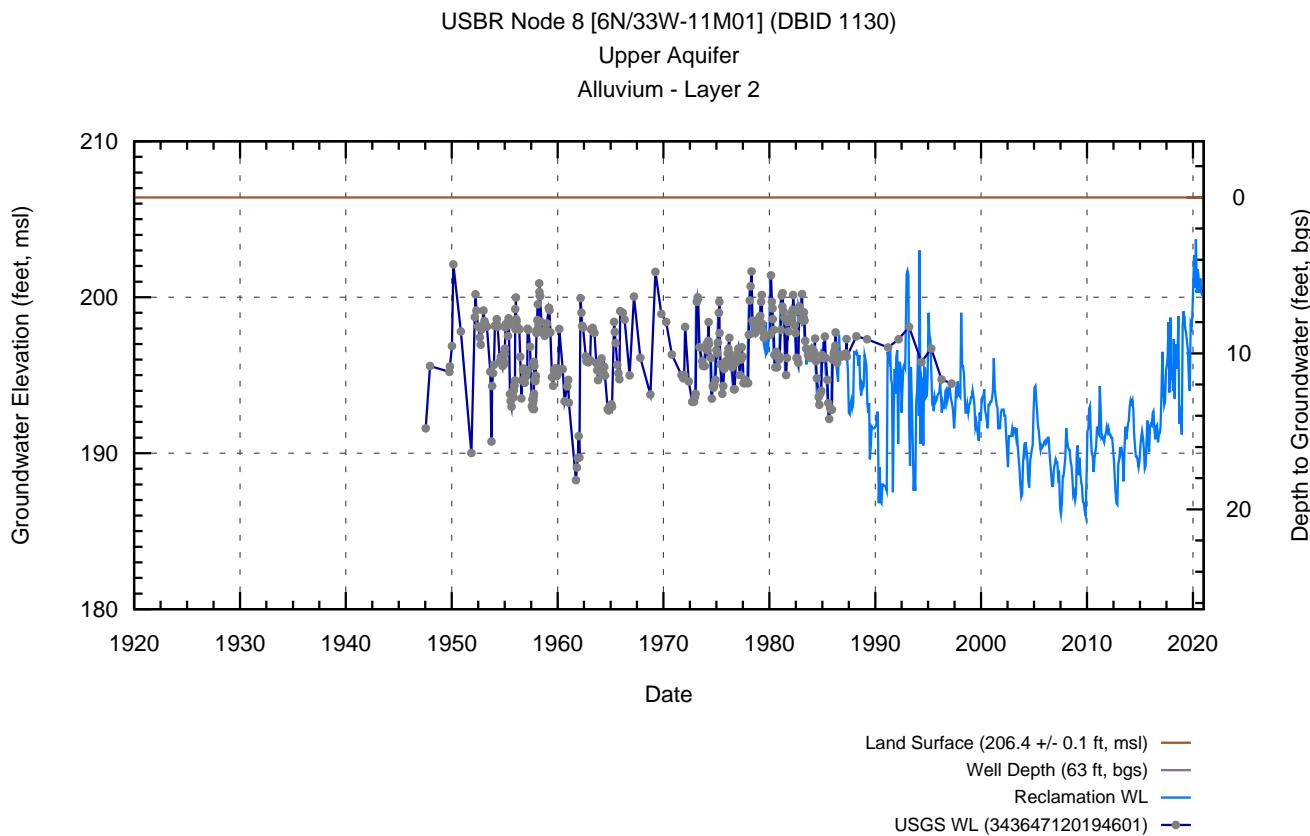
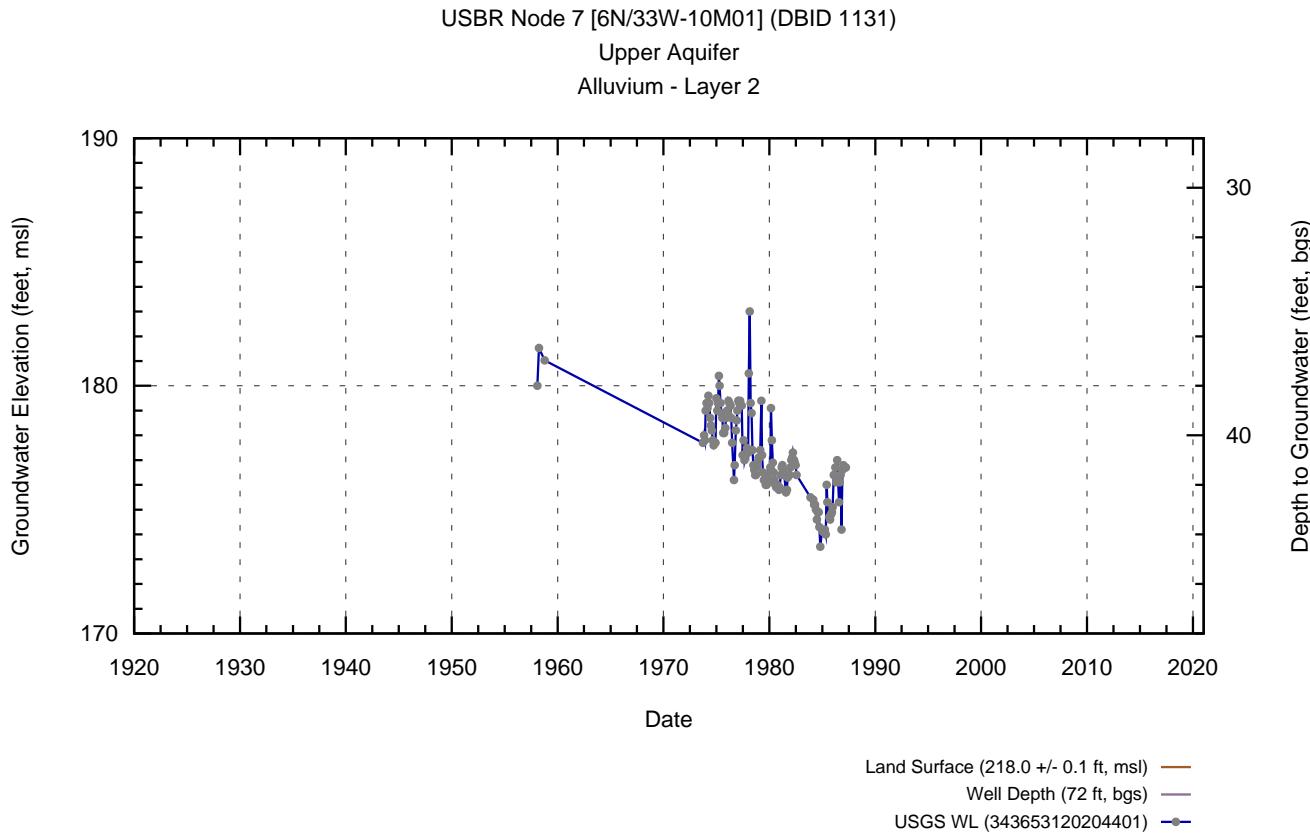
WMA: Santa Ynez River



WMA: Santa Ynez River



WMA: Santa Ynez River



WMA: Santa Ynez River

USBR Node 9 [6N/33W-12L01] (DBID 1129)

Upper Aquifer

Alluvium - Layer 2

