4-003.01 VENTURA RIVER VALLEY - UPPER VENTURA RIVER

Basin Boundaries

Summary

The Upper Ventura River groundwater subbasin is located in central-western Ventura County. The subbasin is bound on the north by impermeable rocks of the Santa Ynez Mountains. A subsurface bedrock ridge and groundwater divide separates the subbasin from the adjacent Ojai Valley groundwater basin to the east. The subbasin is bound on the southeast and the west by consolidated Tertiary sediments. The subbasin extends south in the Ventura River Valley to where it meets the Lower Ventura River subbasin at a narrow portion of the valley and at the approximate location of the Red Mountain fault. The area overlying the subbasin is drained by the Ventura River and the Coyote, Matilija, and San Antonio Creeks. Average annual precipitation ranges from 14 to 24 inches.The subbasin boundary is defined by eleven (11) segments detailed in the descriptions below.

Segment Descriptions

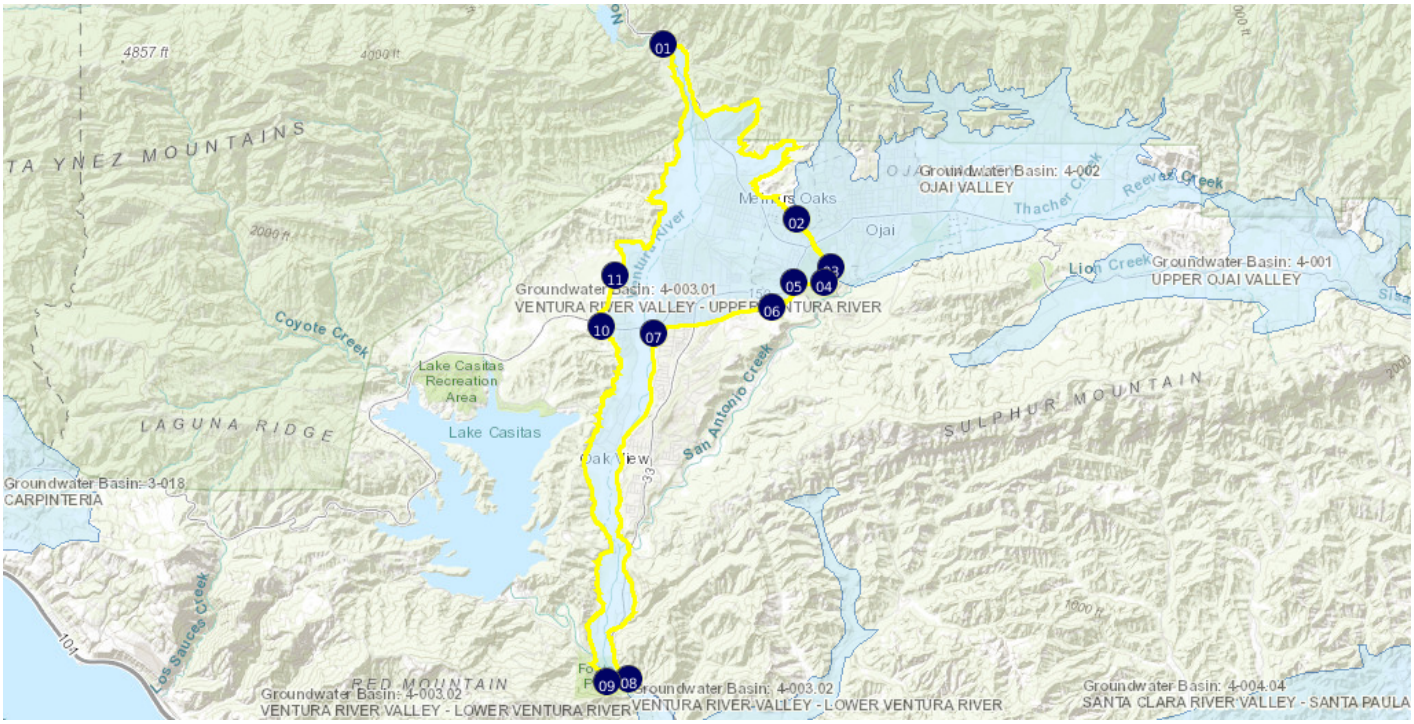
Segment Label	Segment Type	Description	Ref
1-2	E Alluvial	Begins at point (1) and generally follows the contact of Quaternary alluvium with various Tertiary sedimentary rocks to point (2).	{a}
2-3	I Groundwater Divide	Continues from point (2) and follows a subsurface bedrock ridge, a groundwater divide, and a surface divide to point (3).	{b}
3-4	E Alluvial	Continues from point (3) and follows the contact of Quaternary alluvium with Sespe Formation to point (4).	{a}
4-5	E Fault	Continues from point (4) and follows an unnamed fault to point (5).	{c}
5-6	E Alluvial	Continues from point (5) and follows the contact of active alluvium and colluvium with lower permeability older alluvium to point (6).	{b}
6-7	E Fault	Continues from point (6) and follows the Santa Ana Fault to point (7).	{a}
7-8	E Alluvial	Continues from point (7) and follows the contact of active alluvium with older alluvium and various Tertiary sedimentary rocks to point (8).	{d}
8-9	I Alluvial	Continues from point (8) and crosses the alluvium of the Ventura River valley at the Casitas Vista bridge to point (9).	{b}
9-10	E Alluvial	Continues from point (9) and generally follows the contact of Quaternary alluvium with various Tertiary sedimentary rocks to point (10).	{d}
10-11	E Alluvial	Continues from point (10) and crosses the older alluvium, excluding an area of thin alluvium and Sespe Formation in the west and including areas of thick alluvium in the east, to point (11).	{b}
11-1	E Alluvial	Continues from point (11) and generally follows the contact of Quaternary alluvium with various Tertiary sedimentary rocks and ends at point (1).	{d}

Significant Coordinates

Point	Latitude	Longitude
1	34.483285737	-119.296538818
2	34.44740611	-119.263274675
3	34.437432018	-119.254670854
4	34.434436555	-119.256415077
5	34.434229067	-119.263895252
6	34.429193615	-119.26953361
7	34.423808356	-119.299086585
8	34.352634947	-119.30500381
9	34.352287913	-119.310520285
10	34.425195196	-119.311964195
11	34.435726436	-119.308534536

Map

4-003.01 VENTURA RIVER VALLEY - UPPER VENTURA RIVER



https://sgma.water.ca.gov/webgis/?appid=160718113212&subbasinid=4-003.01

References

Ref	Citation	Pub Date	Glob ID
{a}	California Geological Survey (CGS), Geologic Map of the Matilija Quadrangle, 1:24,000, S.S. Tan and T.A. Jones.URL: http://www.conservation.ca.gov/cgs/rghm/rgm/Pages/preliminary_geologic_maps.aspx	2006	51
{b}	BBMRS	varies	45
{c}	Minor, S.A., and Brandt, T.R., 2015, Geologic map of the southern White Ledge Peak and Matilija quadrangles, Santa Barbara and Ventura Counties, California: U.S. Geological Survey Scientific Investigations Map 3321, 34 p., 1 sheet, 1:24,000, https://dx.doi.org/10.3133/sim3321.	5/26/2015	96
{d}	California Geological Survey (CGS), Geologic Compilation of Quaternary Surficial Deposits in Southern California, T.L. Bedrossian, P. Roffers, C.A. Hayhurst, J.T. Lancaster, and W.R. Short.URL: http://www.conservation.ca.gov/cgs/fwgp/Pages/sr217.aspx	2012	50

Footnotes

- I: Internal
- E: External