Oil and gas wells, California, 2021

All Wells Dataset, GIS Mapping, (2021). California Department of Conservation, California Geologic Energy Management Division (CalGEM)¹

Contact: cpace@berkeley.edu

File name: Oil_and_gas_wells_plss.shp

Spatial Reference

Geographic Coordinate System	NAD 1983	Projected Coordinate System	NAD 1983 (Teale) Albers (Meters)
WKID	4269	Projection	3310
Authority	EPSG	Authority	EPSG
Angular Unit	Degree (0.0174532925199433)	Linear Unit	Meters (1.0)
Prime Meridian	Greenwich (0.0)	False Easting	0.00
Datum	D North American 1983	False Northing	-4000000.0
Spheroid	GRS 1980	Central Meridian	-120.0
Semimajor Axis	6378137.0	Standard Parallel 1	34.0
Semiminor Axis	6356752.314140356	Standard Parallel 2	40.5
Inverse Flattening	298.257222101	Latitude of Origin	0.0

Description

This shapefile contains point data for 58,085 active oil and gas wells in California.

Methods

We accessed a Statewide dataset of oil and gas wells from the California Department of Conservation, California Geologic Energy Management Division (CalGEM). We selected oil and gas operations in California between 1898 and 2021 (n=241,254) and sub-selected active wells (n=58,085).

Attribute Table

Field Heading	Field Description
OBJECTID	ESRI generated field
Shape	Point – ESRI Generated Field
API	Parcel identifier
LeaseName	Name of company leasing wells
WellNumber	Well number
WellStatus	Well status (i.e. active)
WellType	DG; DH; GD; GS; INJ; Multi; OB; OG; PM; SC; SF; UNK; WD; WF; WS
WellTypeLa	Dry Gas; Dry Hole; Gas Disposal; Gas Storage; Injection; Multipurpose; Observation; oil and gas; Pressure Maintenance; Cyclic Steam; Steam Flood; unknown; water disposal; Water Source; Water Flood
OperatorCo	Operator code
OperatorNa	Operator name

FieldName	Field name	
Place	Place	
CountyName	County	
Latitude	Latitude in decimal degrees	
Longitude	Longitude in decimal degrees	
GISSource	Source of spatial data	
isConfiden	Y/N location is confidential	
isDirectional	Y/N well is directional	

Acknowledgements

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References

 All Wells Dataset, GIS Mapping, (2021). California Department of Conservation, California Geologic Energy Management Division (CalGEM), https://www.conservation.ca.gov/calgem/maps/Pages/GISMapping2.aspx, Accessed online January 6, 2022.