

Table CT6. Industrial Sector Energy Consumption Estimates, Selected Years, 1960-2019, California

Year	Coal Thousand Short Tons	Natural Gas a Billion Cubic Feet	Petroleum						Hydro-electric Power e,f Million kWh	Biomass		Geo-thermal f	Solar f,i Million kWh	Electricity Retail Sales	Net Energy f,j	Electrical System Energy Losses k	Total f,j		
			Distillate Fuel Oil	HGL b	Motor Gasoline c	Residual Fuel Oil	Other d	Total		Wood and Waste t,g	Losses and Co-products h								
			Thousand Barrels																
1960	1,313	451	10,127	4,231	2,851	10,750	38,766	66,725	(s)	--	--	--	NA	20,190	--	--			
1965	2,361	529	13,002	4,826	2,245	11,846	41,823	73,742	(s)	--	--	--	NA	28,904	--	--			
1970	2,215	711	8,510	9,147	1,942	12,121	47,012	78,732	(s)	--	--	--	NA	42,169	--	--			
1975	2,151	666	10,519	15,688	1,338	8,308	51,705	87,558	0	--	--	--	NA	46,053	--	--			
1980	2,665	486	15,576	12,887	1,698	12,554	66,101	108,816	0	--	--	--	NA	51,888	--	--			
1985	1,889	433	17,779	12,977	3,065	18,732	67,209	119,763	0	--	--	--	NA	52,972	--	--			
1990	2,874	588	17,076	12,304	3,163	1,838	67,262	101,642	0	--	--	--	3	55,892	--	--			
1995	2,485	698	11,664	8,489	2,849	1,467	56,088	80,556	0	--	--	--	5	57,367	--	--			
2000	1,992	841	18,686	5,948	1,971	108	58,589	85,302	0	--	--	--	10	64,311	--	--			
2001	1,937	719	21,700	6,367	4,533	333	65,566	98,500	0	--	--	--	12	63,041	--	--			
2002	1,973	785	14,644	9,188	4,821	194	65,196	94,043	0	--	--	--	15	48,448	--	--			
2003	1,976	821	10,749	6,665	5,009	53	60,653	83,129	0	--	--	--	17	49,909	--	--			
2004	1,914	876	14,218	4,799	5,720	14	60,641	85,393	0	--	--	--	21	48,812	--	--			
2005	1,956	822	13,230	1,752	5,375	11	61,985	82,354	0	--	--	--	32	50,242	--	--			
2006	1,870	792	13,861	3,000	5,503	102	61,277	83,743	0	--	--	--	57	50,991	--	--			
2007	1,818	798	11,461	1,913	4,448	11	62,633	80,464	0	--	--	--	78	50,538	--	--			
2008	1,688	788	12,718	4,048	3,930	396	53,724	74,816	0	--	--	--	126	51,031	--	--			
2009	1,330	772	10,312	5,733	3,742	6	45,387	65,180	0	--	--	--	165	47,835	--	--			
2010	1,419	771	12,203	5,812	5,773	10	44,227	68,025	0	--	--	--	233	49,301	--	--			
2011	1,536	753	13,377	R 6,298	5,677	7	49,471	R 74,830	0	--	--	--	337	49,936	--	--			
2012	1,323	789	12,976	R 6,064	6,020	5	45,869	70,935	0	--	--	--	551	46,952	--	--			
2013	1,383	829	12,919	R 6,006	6,256	6	50,154	R 75,341	0	--	--	--	655	54,397	--	--			
2014	1,399	834	13,895	R 6,333	4,539	5	R 47,939	R 72,712	0	--	--	--	841	52,898	--	--			
2015	1,334	823	13,978	R 6,161	5,962	46	47,086	R 73,233	0	--	--	--	1,046	52,562	--	--			
2016	1,389	817	13,140	R 5,988	5,952	57	R 49,422	R 74,560	0	--	--	--	1,388	50,979	--	--			
2017	1,464	803	13,559	R 5,734	6,026	19	R 49,764	R 75,102	0	--	--	--	1,760	48,627	--	--			
2018	1,438	807	12,205	R 5,515	6,125	10	R 50,335	R 74,191	0	--	--	--	R 1,899	R 49,588	--	--			
2019	1,323	808	11,661	5,675	6,103	11	49,007	72,456	0	--	--	--	2,213	47,808	--	--			

Trillion Btu																	
Year	Coal	Natural Gas a	Distillate Fuel Oil	HGL b	Motor Gasoline c	Residual Fuel Oil	Other d	Total	Hydro-electric Power e,f	Wood and Waste t,g	Losses and Co-products h	Geo-thermal f	Solar f,i	Electricity Retail Sales	Net Energy f,j	Electrical System Energy Losses k	Total f,j
1960	35.2	466.3	59.0	16.0	15.0	67.6	238.9	396.5	(s)	56.3	NA	NA	NA	68.9	1,023.2	170.4	1,193.6
1965	63.2	567.4	75.7	18.3	11.8	74.5	255.7	435.9	(s)	74.8	NA	NA	NA	98.6	1,240.0	235.4	1,475.4
1970	59.3	749.1	49.6	33.4	10.2	76.2	286.9	456.2	(s)	91.7	NA	NA	NA	143.9	1,500.3	348.1	1,848.3
1975	56.4	703.6	61.3	55.4	7.0	52.2	315.4	491.3	0.0	99.3	NA	NA	NA	157.1	1,507.8	376.9	1,884.7
1980	66.1	507.4	90.7	45.4	8.9	78.9	403.8	627.8	0.0	61.1	NA	NA	NA	177.0	1,439.4	425.3	1,864.7
1985	44.0	449.5	103.6	44.4	16.1	117.8	410.8	692.7	0.0	71.6	0.3	NA	NA	180.7	1,438.8	414.0	1,852.8
1990	64.7	606.7	99.5	42.4	18.6	11.6	410.2	680.3	0.0	65.3	0.2	0.6	(s)	190.7	1,508.7	417.5	1,926.1
1995	57.9	705.4	67.9	29.4	14.8	9.2	343.7	465.0	0.0	42.3	0.3	1.4	0.1	195.7	1,468.1	427.8	1,895.9
2000	47.4	803.8	108.7	20.3	10.3	0.7	364.7	504.7	0.0	41.1	0.3	1.3	0.1	219.4	1,618.2	476.1	2,094.3
2001	46.7	730.3	126.3	21.8	23.6	2.1	404.3	578.1	0.0	50.9	0.3	1.4	0.1	215.1	1,622.9	466.6	2,089.4
2002	47.1	800.0	85.2	31.5	25.1	1.2	401.3	544.3	0.0	34.9	0.4	1.4	0.2	165.3	1,593.6	359.5	1,953.1
2003	47.7	837.5	62.5	23.0	26.0	0.3	371.4	483.2	0.0	33.8	0.5	1.0	0.2	170.3	1,574.2	354.5	1,928.7
2004	46.2	893.4	82.7	16.5	29.7	0.1	374.8	503.8	0.0	34.0	0.5	1.1	0.2	166.5	1,645.7	351.9	1,997.6
2005	46.3	841.1	77.0	6.0	27.9	0.1	382.0	493.0	0.0	37.0	0.9	1.3	0.3	171.4	1,591.3	346.3	1,937.7
2006	45.1	809.8	80.4	10.3	28.5	0.6	377.2	497.1	0.0	30.6	2.3	1.3	0.6	174.0	1,560.6	347.8	1,908.4
2007	43.1	821.4	66.3	6.5	22.9	0.1	387.2	482.9	0.0	31.5	5.1	1.4	0.8	172.4	1,558.5	336.2	1,894.8
2008	39.4	809.4	73.5	13.6	20.1	2.5	332.2	441.9	0.0	28.3	5.3	1.4	1.2	174.1	1,501.1	345.2	1,846.3
2009	31.3	792.7	59.6	19.0	19.0	(s)	279.8	377.5	0.0	26.7	2.7	1.2	1.6	163.2	1,396.9	316.5	1,713.4
2010	33.2	787.4	70.5	22.3	29.3	0.1	270.5	392.6	0.0	29.9	R 3.3	1.2	2.3	168.2	R 1,418.2	321.4	R 1,739.6
2011	35.6	767.4	77.2	24.2	28.7	(s)	304.8	435.0	0.0	32.6	R 8.4	1.2	3.3	170.4	R 1,453.9	329.2	R 1,783.1
2012	30.7	805.5	74.8	23.3	30.5	(s)	282.9	411.5	0.0	31.7	R 8.1	1.2	5.2	160.2	R 1,454.0	291.6	R 1,745.6
2013	31.9	850.3	74.5	23.1	31.7	(s)	308.6	437.8	0.0	31.6	R 7.9	1.2	6.3	185.6	R 1,552.6	331.2	R 1,883.8
2014	32.6	857.8	80.1	24.3	23.0	(s)	295.3	422.7	0.0	28.5	R 10.0	1.2	8.0	180.5	R 1,541.3	318.1	R 1,859.4
2015	31.0	853.1	80.5	R 23.6	30.1	0.3	290.0	R 424.6	0.0	27.0	R 10.3	1.2	9.7	179.3	R 1,536.3	312.9	R 1,849.2
2016	32.1	845.8	75.6	23.0	30.1	0.4	311.7	440.8	0.0	28.8	R 10.3	1.2	12.8	173.9	R 1,545.8	R 305.5	R 1,851.2
2017	33.7	831.7	78.1	22.0	30.4	0.1	R 313.4	R 444.0	0.0	R 32.5	R 11.0	1.2	16.2	165.9	R 1,536.3	291.4	R 1,827.7
2018	33.3	R 834.5	70.3	R 21.2	31.0	0.1	R 317.5	R 439.9	0.0	R 32.4	R 11.2	1.2	17.3	R 169.2	R 1,539.0	R 312.2	R 1,851.2
2019	30.9	835.6	67.2	21.8	30.8	0.1	308.0	427.9	0.0	32.5	11.2	1.2	19.7	163.1	1,520.8	284.4	1,805.2

a Includes supplemental gaseous fuels that are commingled with natural gas.
 b Hydrocarbon gas liquids, include natural gas liquids and refinery olefins.
 c Beginning in 1993, includes fuel ethanol blended into motor gasoline. There is a discontinuity in this time series between 2014 and 2015 because of coverage. See Technical Notes, Section 4.
 d Includes asphalt and road oil, kerosene, lubricants, petroleum coke, and the "other petroleum products" category. See Technical Notes, Section 4.
 e Conventional hydroelectric power. For 1960 through 1989, includes pumped-storage hydroelectricity, which cannot be separately identified.
 f There is a discontinuity in this time series between 1988 and 1989 due to the expanded coverage of renewable energy sources beginning in 1989.
 g Wood, wood-derived fuels, and biomass waste. Prior to 2001, includes non-biomass waste.
 h Losses and co-products from the production of biodiesel and fuel ethanol.
 i Solar thermal and photovoltaic energy. Excludes a small amount of solar thermal energy consumed as heat that is included in the residential sector.
 j Beginning in 1980, adjusted for the double-counting of supplemental gaseous fuels, which are included in both natural gas and

the other fossil fuels from which they are mostly derived, but should be counted only once in net energy and total. For 1981 through 1992, includes fuel ethanol blended into motor gasoline that is not included in the motor gasoline column. Beginning in 2009, includes a small amount of wind energy consumed by industrial utility-scale facilities.
 k Incurred in the generation, transmission, and distribution of electricity plus plant use and unaccounted for electrical system energy losses. Pre-1990 estimates are not comparable to those for later years. See Section 6 of Technical Notes for an explanation of changes in methodology.
 kWh = Kilowatthours. -- = Not applicable. NA = Not available.
 Where shown, R = Revised data and (s) = Physical unit value less than 0.5 or Btu value less than 0.05.
 Notes: Totals may not equal sum of components due to independent rounding. The industrial sector includes industrial combined-heat-and-power (CHP) and industrial electricity-only plants. The continuity of these data series estimates may be affected by the changing data sources and estimation methodologies. See the Technical Notes for each type of energy.
 Web Page: All data are available at https://www.eia.gov/state/seds/seds-data-complete.php.
 Sources: Data sources, estimation procedures, and assumptions are described in the Technical Notes.