

**2023 AIR QUALITY  
SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT**

**2023**

Source/Receptor Area No. Location	AQStation ID	Carbon Monoxide <sup>a</sup>			Ozone <sup>b</sup>									Nitrogen Dioxide <sup>c</sup>				Sulfur Dioxide <sup>d</sup>				
		No. Days of Data	Max 1-Hour Conc., ppm	Max 8-Hour Conc., ppm	No. Days of Data	Max 1-Hour Conc., ppm	Max 8-Hour Conc., ppm	Fourth High Conc., ppm	Number of Days Standard Exceeded						No. Days of Data	Max 1-Hour Conc., ppb	98th Percentile 1-Hour Conc., ppb	Annual Average (AAM) Conc., ppb	No. Days of Data	Max 1-Hour Conc., ppb	99th Percentile 1-Hour Conc., ppb	
									> 0.12 ppm	> 0.070 ppm	> 0.075 ppm	> 0.08 ppm	> 0.09 ppm	> 0.070 ppm								Old Federal 1-Hour
<b>LOS ANGELES COUNTY</b>																						
1	Central LA	060371103	363	1.4	1.2	359	0.097	0.082	0.075	0	7	3	0	1	7	363	64.3	51.8	16.2	358	7.7	2.0
2	Northwest Coastal LA County	060370113	359	0.109	0.066	0.064	0	0	0	0	0	0	1	0	365	43.9	40.0	9.4				
4	South Coastal LA County 2*	060374004																				
4	South Coastal LA County 3	060374006																				
4	South Coastal LA County 4	060374009	359	0.089	0.065	0.063	0	0	0	0	0	0	0	0	365	56.2	46.7	11.0	362	23.2	7.7	
4	I-710 Near Road <sup>###</sup>	060374008	365	71.0	61.1	21.3									365	71.0	61.1	21.3				
6	West San Fernando Valley	060371201	342	2.3	1.7	338	0.104	0.096	0.087	0	28	18	5	10	30	359	48.1	42.8	9.8			
7	East San Fernando Valley	060374010	359	0.120	0.096	0.085	0	25	13	4	11	25	365	51.4	46.1	11.8						
8	West San Gabriel Valley	060372005	362	1.3	1.0	363	0.109	0.090	0.086	0	33	20	5	24	34	365	49.2	45.3	11.1			
9	East San Gabriel Valley 1*	060370002																				
9	East San Gabriel Valley 2	060370016	362	0.8	0.6	358	0.155	0.110	0.102	9	70	50	27	57	72	364	88.2	35.7	7.9			
10	Pomona/Walnut Valley	060371701	352	1.5	1.3	354	0.147	0.113	0.095	3	56	41	14	38	56	363	62.4	53.9	16.5			
11	South San Gabriel Valley	060371602	350	1.8	1.3	336	0.120	0.090	0.075	0	7	2	1	7	9	361	58.1	49.7	15.2			
12	South Central LA County	060371302	359	3.2	2.6	351	0.084	0.071	0.068	0	1	0	0	0	2	359	53.4	48.4	12.7			
13	Santa Clarita Valley	060376012	365	1.1	0.6	355	0.133	0.115	0.103	2	55	38	18	26	57	365	40.4	30.2	8.4			
<b>ORANGE COUNTY</b>																						
16	North Orange County	060595001	364	2.1	1.1	352	0.112	0.092	0.077	0	9	4	1	5	9	364	47.0	42.2	11.1			
17	Central Orange County	060590007	352	2.5	1.6	341	0.089	0.076	0.066	0	2	1	0	0	2	352	50.9	45.7	10.5			
17	I-5 Near Road <sup>###</sup>	060590008	330	2.4	1.9											356	58.1	50.1	19.6			
19	Saddleback Valley*	060592022																				
<b>RIVERSIDE COUNTY</b>																						
23	Metropolitan Riverside County 1	060658001	365	1.4	1.2	351	0.139	0.106	0.097	1	69	56	26	48	70	362	54.7	46.7	12.1	363	3.1	1.5
23	Metropolitan Riverside County 3	060658005	361	1.7	1.2	355	0.129	0.102	0.095	1	59	48	12	39	65	361	48.4	43.6	10.6			
25	Lake Elsinore Area	060659001	363	1.3	0.7	357	0.120	0.103	0.086	0	31	21	4	10	35	353	41.7	33.4	6.7			
26	Temecula Valley	060650016				350	0.088	0.082	0.069	0	3	1	0	0	3							
29	Banning/San Geronio Pass	060650012				354	0.140	0.106	0.095	2	51	38	13	28	53	362	49.8	44.4	7.5			
30	Coachella Valley 1**	060655001	359	0.9	0.8	355	0.116	0.093	0.085	0	38	13	4	10	39	362	35.4	29.3	5.5			
30	Coachella Valley 2**	060652002																				
30	Coachella Valley 3**	060652005																				
<b>SAN BERNARDINO COUNTY</b>																						
32	Northwest San Bernardino Valley	060711004	89	1.0	0.7	89	0.067	0.060	0.052	0	0	0	0	0	0							
33	CA-60 Near Road <sup>###</sup>	060710027														360	75.9	68.8	26.9			
33	I-10 Near Road <sup>###</sup>	060710026	363	1.1	0.9											363	77.1	64.1	24.6			
34	Central San Bernardino Valley 1	060712002	358	1.5	1.0	352	0.131	0.111	0.105	2	74	57	31	56	77	358	63.2	54.5	16.6	356	3.3	1.4
34	Central San Bernardino Valley 2	060719004	345	1.6	1.2	359	0.143	0.118	0.107	6	84	66	35	58	87	363	56.0	45.3	13.6			
35	East San Bernardino Valley	060714003				362	0.143	0.118	0.105	4	82	64	40	54	83							
37	Central San Bernardino Mountains	060710005				352	0.142	0.111	0.106	6	91	69	39	44	91							
38	East San Bernardino Mountains	060718001																				
<b>DISTRICT MAXIMUM<sup>e</sup></b>				3.2	2.6		0.155	0.118	0.107	9	91	69	40	58	91		88.2	68.8	26.9		23.2	7.7
<b>SOUTH COAST AIR BASIN<sup>f</sup></b>				3.2	2.6		0.155	0.118	0.107	14	115	94	60	76	115		88.2	68.8	26.9		23.2	7.7

\*Incomplete data due to site closure or modification in 2023. \*\*Salton Sea Air Basin -- Pollutant not monitored ppm - Parts Per Million in air, by volume ppb - Parts Per Billion in air, by volume AAM - Annual Arithmetic Mean

- a) The federal and state 8-hour CO standards (9 ppm and 9.0 ppm, respectively) along with the federal and state 1-hour CO standards (35 ppm and 20 ppm, respectively) were not exceeded.
  - b) The current (2015) O<sub>3</sub> federal standard became effective December 28, 2015.
  - c) The NO<sub>2</sub> federal 1-hour standard is 100 ppb and the annual standard is 0.0534 ppm (53.4 ppb). The state 1-hour and annual standards are 0.18 ppm and 0.030 ppm, respectively. The Max 1-Hour NO<sub>2</sub> at East San Gabriel Valley 2 is attributed recent construction near the site.
  - d) The federal SO<sub>2</sub> 1-hour standard is 75 ppb (0.075 ppm). The state standards are 1-hour average SO<sub>2</sub> > 0.25 ppm (250 ppb) and 24-hour average SO<sub>2</sub> > 0.04 ppm (40 ppb).
  - e) District Maximum is the maximum value calculated at any one station in the South Coast AQMD jurisdiction.
  - f) Statistics are calculated with a dataset that aggregates the highest concentration at any station in the South Coast Air Basin for each day and pollutant. Therefore, concentrations are the maximum value observed at any station in the South Coast Air Basin. Number of daily exceedances are the total number of days that the indicated concentration is exceeded at any station in the South Coast Air Basin.
- <sup>###</sup> Four near-road sites measuring one or more of the pollutants PM<sub>2.5</sub>, CO and/or NO<sub>2</sub> are operating near the following freeways: I-5, I-10, CA-60 and I-710.



**South Coast  
Air Quality Management District**  
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**2023 AIR QUALITY  
SOUTH COAST AIR QUALITY MANAGEMENT DISTRICT**

**2023**

Source/Receptor Area No. Location	AQS Station ID	Suspended Particulates PM10 <sup>e</sup>						Fine Particulates PM2.5 <sup>i</sup>					Lead <sup>k</sup>		PM10 Sulfate <sup>l</sup>	
		No. Days of Data	Max 24-Hour Conc., µg/m <sup>3</sup>	No. (%) Samples Exceeding Annual Average			No. Days of Data	Max 24-Hour Conc., µg/m <sup>3</sup>	98th Percentile 24-Hour Conc., µg/m <sup>3</sup>	No. (%) Samples Exceeding Annual Average		Max Monthly Average Conc., µg/m <sup>3</sup>	Max 3-Month Rolling Average Conc., µg/m <sup>3</sup>	No. Days of Data	Max 24-Hour Conc., µg/m <sup>3</sup>	
				Federal 24-Hour > 150 µg/m <sup>3</sup>	State 24-Hour > 50 µg/m <sup>3</sup>	Conc. <sup>h</sup> (AAM), µg/m <sup>3</sup>				Federal 24-Hour Standard > 35 µg/m <sup>3</sup>	Conc. <sup>j</sup> (AAM), µg/m <sup>3</sup>					
<b>LOS ANGELES COUNTY</b>																
1 Central LA	060371103	361	57	0 (0%)	2 (1%)	24.3	365	30.6	23.4	0 (0%)	10.25	0.007	0.007	61	6.5	
2 Northwest Coastal LA County	060370113															
4 South Coastal LA County 2*	060374004															
4 South Coastal LA County 3	060374006	360	148.0	0 (0%)	36 (10%)	33.4										
4 South Coastal LA County 4	060374009	358	80	0 (0%)	3 (1%)	21.2	30	26.5	26.5	0 (0%)	10.12					
4 I-710 Near Road <sup>##</sup>	060374008						346	58.3	26.3	1 (0%)	10.64					
6 West San Fernando Valley	060371201						120	21.9	19.2	0 (0%)	8.81					
7 East San Fernando Valley	060374010															
8 West San Gabriel Valley	060372005						120	22.2	17.2	0 (0%)	8.74					
9 East San Gabriel Valley 1*	060370002															
9 East San Gabriel Valley 2	060370016	352	126	0 (0%)	3 (1%)	22.4										
10 Pomona/Walnut Valley	060371701															
11 South San Gabriel Valley	060371602						116	33.2	23.8	0 (0%)	10.01	0.007	0.006			
12 South Central LA County	060371302						353	54.6	28.1	2 (1%)	11.12	0.012	0.008			
13 Santa Clarita Valley	060376012	54	41	0 (0%)	0 (0%)	18.1										
<b>ORANGE COUNTY</b>																
16 North Orange County	060595001															
17 Central Orange County	060590007	327	146	0 (0%)	7 (2%)	24.0	353	33.2	22	0 (0%)	9.07			54	7.7	
17 I-5 Near Road <sup>##</sup>	060590008															
19 Saddleback Valley*	060592022															
<b>RIVERSIDE COUNTY</b>																
23 Metropolitan Riverside County 1	060658001	361	166	1 (0%)	43 (12%)	32.7	363	48.7	23.5	1 (0%)	10.47	0.007	0.007	105	18.9	
23 Metropolitan Riverside County 3	060658005	358	172	1 (0%)	131 (37%)	42.7	364	53.9	29.2	3 (1%)	11.60					
25 Lake Elsinore Area	060659001	362	186	1 (0%)	5 (1%)	20.8										
26 Temecula Valley	060650016															
29 Banning/San Geronimo Pass	060650012	58	100	0 (0%)	2 (3%)	21.8										
30 Coachella Valley 1**	060655001	361	183	1 (0%)	17 (5%)	22.8	112	26.2	13.6	0 (0%)	5.86					
30 Coachella Valley 2**	060652002															
30 Coachella Valley 3**	060652005	360	306	5 (1%)	93 (26%)	44.0										
<b>SAN BERNARDINO COUNTY</b>																
32 Northwest San Bernardino Valley	060711004	90	32	0 (0%)	0 (0%)	18.1										
33 CA-60 Near Road <sup>##</sup>	060710027						363	50.9	26.2	1 (0%)	12.04					
33 I-10 Near Road <sup>##</sup>	060710026															
34 Central San Bernardino Valley 1	060712002	58	132	0 (0%)	9 (16%)	33.0	118	27.3	22.7	0 (0%)	10.49			59	26.8	
34 Central San Bernardino Valley 2	060719004	353	177	1 (0%)	12 (3%)	30.0	118	25.4	19.5	0 (0%)	10.16	0.010	0.008			
35 East San Bernardino Valley	060714003	58	49	0 (0%)	0 (0%)	21.3										
37 Central San Bernardino Mountains	060710005	57	29	0 (0%)	0 (0%)	15.5										
38 East San Bernardino Mountains	060718001						351	21.0	18	0 (0%)	5.97					
<b>DISTRICT MAXIMUM<sup>m</sup></b>			306	5	131	44.0		58.3	29.2	3	12.04	0.012	0.008		26.8	
<b>SOUTH COAST AIR BASIN<sup>n</sup></b>			186	1	158	42.7		58.3	29.2	4	12.04	0.012	0.008		26.8	

\*Incomplete data due to site closure or modification in 2023.

\*\* Salton Sea Air Basin

µg/m<sup>3</sup> – Micrograms per cubic meter of air

AAM – Annual Arithmetic Mean

-- Pollutant not monitored

- g) PM10 statistics listed above are based on combined Federal Reference Method (FRM) and Federal Equivalent Method (FEM) data. High PM10 (≥ 155 µg/m<sup>3</sup>) data recorded in the Coachella Valley and the Basin (due to high winds) are excluded because they likely meet the exclusion criteria specified in the U.S. EPA Exceptional Event Rule. Exceptional event demonstrations will be submitted to U.S. EPA for events that have regulatory significance.
- h) State annual average (AAM) PM10 standard is > 20 µg/m<sup>3</sup>. Federal annual PM10 standard (AAM > 50 µg/m<sup>3</sup>) was revoked in 2006.
- i) PM2.5 statistics listed above represent FRM data only with the exception of Central Orange County, Metropolitan Riverside County, South Central LA County, CA-60 Near Road, and East San Bernardino Mountains, where FEM or SPM PM2.5 measurements are used to supplement missing FRM measurements. PM2.5 concentrations above the 24-hour standard attributed to fireworks are excluded because they likely meet the exclusion criteria specified in the U.S. EPA Exceptional Event Rule. Exceptional event demonstrations will be submitted to U.S. EPA for events that have regulatory significance.
- j) Federal standards are annual average (AAM) >9.0 µg/m<sup>3</sup> and state standards are annual average (AAM) > 12.0 µg/m<sup>3</sup>.
- k) Lead is measured in Total Suspended Particulate (TSP) samples. Federal lead standard is 3-months rolling average > 0.15 µg/m<sup>3</sup>; state standard is monthly average > 1.5 µg/m<sup>3</sup>. Note 3-month averages include data from November and December 2022. Higher lead concentrations were recorded at near-source monitoring sites immediately downwind of stationary lead sources. Maximum monthly and 3-month rolling averages recorded at near-source sites were 0.033 µg/m<sup>3</sup> and 0.023 µg/m<sup>3</sup>, respectively. Lead standards were not exceeded at any site.
- l) State 24-hour sulfate standard is > 25 µg/m<sup>3</sup>. There is no federal standard for sulfate. The exceedance at Central San Bernardino Valley are attributed to fireworks on July 5th, 2023.
- m) District Maximum is the maximum value calculated at any one station in the South Coast AQMD jurisdiction.
- n) Statistics are calculated with a dataset that aggregates the highest concentration at any station in the South Coast Air Basin for each day and pollutant. Therefore, concentrations are the maximum value observed at any station in the South Coast Air Basin. Number of daily exceedances are the total number of days that the indicated concentration is exceeded at any station in the South Coast Air Basin. Statistics in concentration units are simply the maximum value at any station in the South Coast Air Basin.
- ## Four near-road sites measuring one or more of the pollutants PM2.5, CO and/or NO2 are operating near the following freeways: I-5, I-10, CA-60 and I-710.