

Quarterly Noise Report

Prepared For:
California Department of Transportation (Caltrans)
Division of Aeronautics

3rd Quarter 2021
July 1, 2021 – September 30, 2021



Airport Noise Office

November 30, 2021

NORMAN Y. MINETA
SAN JOSE
INTERNATIONAL
AIRPORT



SILICON VALLEY'S AIRPORT

Quarterly Noise Report
3rd Quarter 2021
(July 1, 2021 through September 30, 2021)

On May 24, 2012, the California Department of Transportation (Caltrans), Division of Aeronautics, confirmed via a correspondence letter that the County of Santa Clara verified Norman Y. Mineta San Jose International Airport (SJC) achieved a zero noise impact area pursuant to the California Code of Regulations, Title 21 (Public Works), Division 2.5 (Division of Aeronautics), Chapter 6 (Noise Standards), Article 1 (General), Section 5012 (Airport Noise Standard) as of its 2nd Quarter 2011 Quarterly Noise Report. The letter went on to state that having met the standard, SJC no longer requires a variance.

This Quarterly Noise Report for the 3rd Quarter of 2021 was prepared by the Airport Noise Office at Norman Y. Mineta San Jose International Airport (SJC), in accordance with the California Noise Standards (California Code of Regulations, Title 21, Section 5000 et seq.).

Robert Lockhart
Deputy Director of Aviation
Norman Y. Mineta San Jose International Airport

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Summary of Statistical Information for the California Department of Transportation (Caltrans) Division of Aeronautics

1. Size of Noise Impact Area as defined in the Noise Standards (California Code of Regulations, Title 21, Chapter 2.5, Subchapter 6):
0 Square Miles

2. Estimated number of dwelling units included in the Noise Impact Area as defined in the Noise Standards*:
0 Dwelling Units

3. Estimated number of people residing within the Noise Impact Area as defined in the Noise Standards*:
0 People

4. Identification of the aircraft type having the highest takeoff noise level operating at this airport together with the estimated number of operations by this aircraft type during the calendar quarter reporting period:
Boeing 737-900 (B739); 441 Departure Operations

5. Total number of aircraft operations during the calendar quarter: (Not Mandatory)
37,512

6. Number of Air Carrier operations during the calendar quarter: (Not Mandatory)
23,089

7. Percentage of Air Carrier operations by aircraft certificated under Federal Aviation Regulation (FAR) Part 36, Stage III: (Not Mandatory)
100%

8. Estimated number of operations by General Aviation aircraft during the calendar quarter: (Not Mandatory)
8,765

9. Estimated number of operations by Military aircraft during the calendar quarter: (Not Mandatory)
262

10. Estimated number of operations by Taxi/Commuter aircraft during the calendar quarter: (Not Mandatory)
5,396

Form DOA 617, Dated 10/89

* Calculations Based Upon 2010 Census Block Boundary Data.

Aircraft Noise Measurements and Modeling

Table 1 contains statistics of aircraft operations based upon the Federal Aviation Administration (FAA) Air Traffic Control Tower (ATCT) counts at Norman Y. Mineta San Jose International Airport (SJC).

Data contained within Tables 2-7 below was obtained from queries and reports run within Envirosuite Airport Noise and Operations Monitoring System (ANOMS). Table 2 contains the locations of the permanent Remote Monitoring Terminals (RMT) maintained by Envirosuite in the surrounding communities of SJC.

Tables 3-5 contains a summary of daily local aircraft measured noise levels (dB CNEL) for the three (3) months of the calendar quarter reporting period. Table 6 contains a summary of the monthly local aircraft measured noise levels (dB CNEL). Table 7 contains a summary of the annual local aircraft measured noise levels (dB CNEL).

The 65 dB CNEL noise contour for the period between October 1, 2020 through September 30, 2021 is included at the end of this report. The noise contour was prepared using the Federal Aviation Administration's (FAA) Aviation Environmental Design Tool (AEDT) software. The noise contour figure depicts the locations of the permanent RMTs that were utilized for validation.

The FAA AEDT software is a state-of-the-art software system that models aircraft performance in space and time to estimate fuel consumption, emissions, noise, and air quality consequences. The modeling methodology fulfills the requirements of the State of California, Title 21, California Noise Standards.

262

355

242

83

Table 1 – Total Aircraft Operations

Operations	3rd Quarter 2021	2nd Quarter 2021	1st Quarter 2021	4th Quarter 2020
Total	37,512	33,160	26,281	25,861
Air Carrier/Cargo	23,089	18,410	14,277	14,113
General Aviation	8,765	7,080	7,630	7,520
Military	262	355	242	83
Taxi/Commuter	5,396	5,146	4,132	4,145

Table 2 – Remote Monitoring Terminal (RMT) Locations

RMT #	Location	Latitude	Longitude
101	Oak Street, San Jose, CA	37.321292	-121.881981
102	Center for Performing Arts, San Jose, CA	37.329572	-121.892365
104	Bellarmino Prep School, San Jose, CA	37.340997	-121.917993
105	Rosemary Garden, San Jose, CA	37.362400	-121.914750
106	St. John/Autumn, San Jose, CA	37.334240	-121.899946
107	Fire Station 6, Santa Clara, CA	37.395160	-121.949916
108	MacGregor Lane, Santa Clara, CA	37.386895	-121.946527
109	Lake Santa Clara, Santa Clara, CA	37.392133	-121.967717
110	Chestnut Street, Santa Clara, CA	37.390153	-121.959598
111	Fuller Street Park, Santa Clara, CA	37.397987	-121.965516
112	Mountain View/Alviso, Santa Clara, CA	37.409690	-121.979440
114	Fairway Glen Park, Santa Clara, CA	37.405623	-121.961404
115	3rd/Reed, San Jose, CA	37.328608	-121.882987

Table 3 – Daily Community Noise Equivalent Level (CNEL) Values – July 2021

Day	Remote Monitoring Terminal (RMT)												
	101	102	104	105	106	107	108	109	110	111	112	114	115
1	62.3	65.3	55.8	55.7	65.2	60.3	62.2	59.8	*	61.1	57.5	56.6	58.5
2	62.4	64.8	50.1	49.6	64.8	59.8	63.8	61.2	*	62.2	57.9	57.7	52.5
3	61.0	64.0	55.0	54.7	64.2	56.0	59.2	56.7	56.9	58.0	54.3	53.7	57.2
4	67.1	65.8	55.8	55.0	64.6	56.7	60.3	57.4	61.4	70.3	55.0	54.2	60.1
5	61.4	64.2	54.3	55.2	64.2	56.0	59.8	57.8	61.0	59.4	55.8	54.8	56.4
6	60.6	63.8	50.6	50.5	63.9	58.6	62.7	59.3	65.6	60.5	54.7	57.8	52.0
7	60.8	64.1	52.6	55.4	64.0	59.0	62.7	59.8	63.8	60.6	55.5	57.0	52.5
8	60.0	63.1	46.9	47.9	63.1	58.3	62.2	59.0	62.2	60.3	55.0	56.9	49.5
9	60.6	63.7	50.2	52.2	63.6	58.8	63.5	59.7	63.4	61.2	55.8	56.2	53.0
10	60.3	63.1	48.7	48.2	62.7	57.6	61.8	58.0	61.6	59.0	53.3	54.0	51.8
11	61.2	64.0	50.5	51.9	64.1	59.1	63.6	60.5	63.7	61.6	55.8	57.0	52.9
12	61.8	64.8	51.6	49.9	65.2	60.1	63.3	60.3	63.4	61.5	57.0	57.9	53.6
13	61.7	64.5	48.4	50.6	63.5	59.0	62.4	59.5	62.6	60.8	56.2	56.6	54.3
14	62.2	66.1	55.9	56.3	65.0	56.7	60.3	58.6	62.0	60.1	57.3	54.9	60.5
15	62.2	65.6	55.0	55.4	65.4	58.0	61.0	59.6	62.5	60.7	57.1	56.0	57.8
16	62.5	66.2	55.9	56.3	65.1	58.2	61.7	59.7	62.9	61.0	57.5	56.2	59.4
17	61.8	64.5	55.2	55.6	64.3	55.0	58.5	56.2	58.7	58.3	53.2	52.6	58.9
18	60.4	63.2	49.7	49.2	63.0	59.3	63.1	61.1	63.5	63.3	57.1	57.4	52.4
19	61.5	64.5	50.5	55.8	64.3	59.1	63.4	60.6	63.6	61.7	57.0	57.6	54.6
20	61.3	64.2	48.4	53.0	64.2	59.1	62.6	59.6	64.9	60.9	55.9	57.4	52.8
21	60.6	63.8	50.8	52.0	63.4	59.4	63.2	60.4	63.4	61.3	56.2	57.8	51.7
22	60.8	64.1	50.8	51.3	66.2	61.6	63.9	61.0	64.8	62.3	57.7	58.4	51.9
23	61.8	66.5	57.9	55.2	65.8	57.3	61.2	59.2	62.2	60.5	56.5	55.3	58.6
24	59.6	63.5	45.8	51.7	62.1	58.2	63.2	60.4	63.0	61.7	57.3	56.9	51.5
25	60.4	63.4	44.7	52.0	63.5	58.9	63.1	60.3	63.4	62.8	56.3	57.7	54.1
26	61.0	64.2	51.4	53.4	64.5	60.9	64.3	61.3	64.5	62.6	57.7	58.6	57.0
27	60.5	63.4	48.3	48.6	62.7	60.6	62.5	59.7	63.6	60.6	56.1	56.7	51.6
28	60.7	63.9	49.6	51.9	63.5	58.4	62.1	59.6	62.4	60.8	55.8	56.8	55.7
29	61.4	64.6	48.8	51.1	64.1	59.2	63.0	60.0	63.1	61.0	56.1	57.2	52.1
30	60.9	63.5	48.9	52.8	63.1	62.7	64.2	61.4	64.8	62.7	57.9	58.5	53.1
31	60.2	63.3	50.9	55.6	66.4	59.0	63.0	60.6	63.3	62.3	57.0	57.5	54.1
Average	61.6	64.4	52.5	53.4	64.3	59.0	62.5	59.8	63.1	62.1	56.4	56.8	55.7
# of Days	31	31	31	31	31	31	31	31	29	31	31	31	31

Note: * indicates days with missing NMT data

Table 4 – Daily Community Noise Equivalent Level (CNEL) Values – August 2021

Day	Remote Monitoring Terminal (RMT)												
	101	102	104	105	106	107	108	109	110	111	112	114	115
1	61.8	64.1	50.0	53.0	65.4	59.4	63.2	60.5	63.2	61.3	56.7	57.7	55.0
2	61.5	64.6	53.4	55.1	63.9	61.1	62.9	60.5	63.1	61.2	56.9	57.9	53.3
3	61.0	64.0	50.2	58.5	63.3	57.4	61.9	57.6	61.1	59.2	52.7	54.7	53.1
4	61.2	65.3	48.9	50.8	64.1	58.6	62.5	59.8	62.7	60.6	55.4	57.2	52.2
5	61.5	65.2	50.9	51.5	64.9	59.9	63.8	60.9	64.0	61.9	56.8	58.0	53.0
6	62.7	64.8	51.5	51.1	64.2	60.2	63.8	61.1	63.9	61.9	56.9	57.6	51.8
7	59.7	62.5	45.2	48.7	62.8	58.7	63.0	59.7	63.0	61.3	56.1	57.1	52.5
8	61.0	63.6	50.5	52.6	63.2	59.8	63.7	60.9	63.9	62.3	57.7	58.4	52.4
9	61.6	65.4	56.5	57.9	68.3	57.5	61.1	58.4	62.2	60.1	56.2	54.8	59.0
10	62.2	64.5	50.4	54.5	64.0	58.9	62.7	60.0	63.2	60.7	56.5	56.9	53.3
11	60.8	64.1	48.7	54.8	64.5	58.9	62.4	59.8	65.6	61.1	56.4	57.0	54.7
12	60.8	64.2	51.9	53.6	64.0	60.0	63.5	60.5	77.0	61.5	56.9	57.8	51.3
13	62.5	65.4	51.1	52.4	63.9	60.6	63.3	60.7	75.2	61.9	56.9	58.2	53.7
14	60.0	64.2	46.3	51.3	62.2	59.4	63.0	60.4	70.0	62.2	57.2	57.8	53.7
15	61.4	64.1	50.9	51.9	64.0	59.1	63.3	59.7	72.4	61.2	56.1	57.2	54.8
16	61.3	64.4	54.5	56.9	64.1	59.9	63.4	60.3	71.7	61.5	56.4	57.9	52.9
17	58.9	62.7	51.1	55.6	61.7	58.9	62.5	60.8	71.2	62.7	59.2	57.5	55.4
18	62.6	66.4	56.6	58.0	66.0	57.3	60.5	59.0	62.4	60.2	56.9	55.2	61.5
19	62.1	65.7	56.2	57.0	64.9	61.6	62.0	60.0	63.4	61.6	57.9	57.4	59.5
20	63.5	66.5	55.5	57.4	65.5	59.8	61.8	60.8	63.0	61.8	57.8	56.5	60.0
21	61.9	65.1	56.3	56.5	64.7	55.0	56.6	55.9	60.0	57.7	54.6	51.2	60.3
22	61.7	64.8	55.9	56.8	65.0	58.2	61.6	59.0	62.4	60.3	56.6	56.1	57.9
23	61.7	64.9	49.4	55.2	64.1	60.7	64.0	61.6	64.4	62.5	58.0	58.7	55.6
24	61.1	64.6	47.3	54.5	63.7	59.4	62.9	60.2	63.1	61.0	57.2	57.7	53.6
25	61.1	65.2	54.4	55.0	63.7	58.8	62.7	59.7	62.7	60.4	56.0	56.6	54.2
26	61.1	65.1	51.9	55.4	64.0	59.9	63.2	60.5	63.9	61.3	56.7	57.6	51.3
27	61.6	64.3	58.3	56.3	63.6	59.1	62.9	59.9	63.4	60.8	56.7	56.5	54.5
28	61.0	62.6	62.2	54.9	62.2	57.7	61.8	58.6	62.3	60.3	55.8	55.3	50.9
29	60.9	63.7	50.6	52.0	63.7	58.8	62.6	59.6	63.1	61.1	56.3	56.6	52.7
30	60.8	63.7	49.1	54.4	63.7	58.3	62.2	58.9	62.6	60.4	54.9	55.7	53.3
31	60.9	65.5	56.5	57.9	64.1	56.1	59.3	58.0	62.2	59.6	56.9	53.8	61.3
Average	61.4	64.7	54.1	55.2	64.3	59.2	62.6	59.9	67.9	61.1	56.7	57.0	56.1
# of Days	31	31	31	31	31	31	31	31	31	31	31	31	31

Note: * indicates days with missing NMT data

Table 5 – Daily Community Noise Equivalent Level (CNEL) Values – September 2021

Day	Remote Monitoring Terminal (RMT)												
	101	102	104	105	106	107	108	109	110	111	112	114	115
1	61.8	66.0	56.5	58.1	64.6	59.3	59.8	58.6	62.4	60.4	57.7	54.9	60.9
2	62.7	66.7	57.4	57.1	65.6	58.5	61.5	59.4	63.8	60.7	57.8	56.5	60.1
3	63.0	64.2	49.6	51.7	64.7	63.1	64.4	62.3	65.2	63.3	59.2	59.1	54.4
4	59.7	64.0	44.7	51.1	63.3	59.4	62.7	60.6	63.4	61.6	56.8	57.3	52.1
5	60.0	63.3	56.6	51.2	62.9	58.0	62.0	58.6	62.1	59.4	54.4	55.6	52.3
6	60.1	63.0	58.1	53.4	63.4	57.7	62.1	58.5	62.0	59.4	54.4	55.2	50.6
7	61.1	64.3	54.8	51.2	63.2	58.0	61.8	58.0	61.3	59.6	53.5	55.0	51.4
8	60.3	64.3	55.7	65.9	63.4	57.2	61.1	57.8	60.9	58.4	53.9	55.3	50.8
9	61.1	65.2	51.1	61.3	63.9	59.6	63.4	60.4	63.9	61.2	56.4	57.6	57.5
10	62.3	65.1	51.2	60.9	64.2	60.3	63.7	61.1	64.0	61.9	57.7	58.4	55.8
11	60.4	65.9	52.6	52.5	62.4	57.6	60.8	58.2	61.3	59.2	54.4	55.8	54.7
12	61.2	64.3	52.8	51.6	67.7	58.7	62.3	59.1	62.1	59.8	55.1	56.7	54.0
13	60.8	64.4	51.6	64.1	63.7	59.7	62.9	59.8	62.9	61.6	55.8	57.3	51.9
14	60.6	63.5	49.0	63.6	66.1	58.3	61.9	58.7	61.9	59.4	55.0	56.5	52.2
15	60.5	64.7	49.6	66.1	63.4	59.1	62.3	60.2	63.0	61.6	56.2	57.2	53.2
16	62.4	66.7	56.5	63.1	65.7	60.4	61.2	58.7	62.9	60.8	57.6	55.9	60.1
17	63.3	66.3	56.5	57.1	65.5	57.8	60.9	59.0	62.5	60.5	57.5	56.1	59.6
18	61.8	64.7	56.4	55.9	65.1	57.2	59.2	56.0	59.4	57.0	53.3	53.5	59.5
19	62.6	65.4	53.3	54.5	65.1	62.1	63.5	61.0	63.4	61.5	57.1	58.3	55.5
20	61.0	64.5	53.8	60.2	63.3	62.2	62.0	59.5	62.3	60.3	56.3	57.0	52.2
21	59.8	63.6	55.4	52.9	62.2	57.0	60.5	57.5	60.4	59.2	54.8	54.8	51.2
22	60.4	64.2	57.7	52.9	63.5	58.4	61.7	59.0	62.0	59.7	55.3	56.2	51.8
23	61.1	65.0	52.7	53.6	63.8	59.7	63.1	60.3	63.6	61.3	57.2	57.3	54.3
24	62.2	65.6	56.3	54.2	64.8	61.6	63.4	60.6	63.7	61.6	57.3	57.6	52.9
25	62.3	65.5	55.4	55.6	65.7	58.4	60.9	59.0	61.7	59.8	55.6	56.0	58.2
26	63.0	66.1	53.4	52.4	66.2	61.2	64.6	62.1	64.8	62.8	58.3	59.2	55.9
27	62.3	65.9	51.7	64.3	65.3	59.4	61.2	62.3	62.9	62.1	58.7	57.3	53.4
28	61.6	65.2	53.2	61.6	65.0	56.9	59.8	59.9	60.0	59.1	56.6	55.9	52.9
29	61.0	65.3	50.6	60.8	63.9	56.8	60.2	61.0	61.1	60.3	57.4	55.8	51.3
30	60.7	65.0	52.0	60.6	65.9	57.3	60.7	61.6	62.3	61.1	58.3	55.3	51.8
Average	61.5	65.0	54.5	60.0	64.6	59.4	62.1	59.9	62.6	60.7	56.6	56.7	55.7
# of Days	30	30	30	30	30	30	30	30	30	30	30	30	30

Note: * indicates days with missing NMT data

Table 6 – Monthly Community Noise Equivalent Level (CNEL) Values

Month, Year	Remote Monitoring Terminal (RMT)												
	101	102	104	105	106	107	108	109	110	111	112	114	115
October, 2020	57.0	60.0	50.8	51.8	59.5	55.3	58.5	55.4	70.1	56.1	52.0	52.9	51.0
# of Days	31	31	31	31	31	31	31	31	31	31	28	31	31
November, 2020	58.9	61.9	56.4	56.2	61.4	56.1	59.8	55.7	66.1	57.4	53.7	54.3	53.1
# of Days	30	30	4	20	30	6	30	3	30	30	20	30	30
December, 2020	58.6	61.2	54.0	57.0	61.1	56.8	59.8	56.5	71.2	57.5	54.7	54.4	53.8
# of Days	31	31	31	31	31	31	29	31	31	31	21	31	31
4th Quarter 2020	58.2	61.1	54.3	55.5	60.8	56.1	59.4	55.9	69.6	57.0	53.6	53.9	52.8
# of Days	92	92	66	82	92	68	90	65	92	92	69	92	92
January, 2021	58.6	61.5	55.0	56.1	61.5	55.5	58.5	56.5	70.0	57.5	54.1	53.6	54.5
# of Days	31	31	31	31	31	31	18	31	31	31	31	31	31
February, 2021	58.8	61.2	55.0	55.3	61.7	57.2	59.3	56.5	59.3	56.9	53.6	53.9	52.7
# of Days	28	28	27	27	28	27	27	27	27	27	27	27	28
March, 2021	59.7	62.5	54.3	57.8	62.4	57.5	60.6	58.1	61.0	58.9	56.0	55.1	54.7
# of Days	31	31	31	31	31	31	30	31	31	31	31	31	31
1st Quarter 2021	59.1	61.8	54.8	56.5	61.9	56.8	59.6	57.1	66.1	57.9	54.7	54.3	54.0
# of Days	90	90	89	89	90	89	75	89	89	89	89	89	90
April, 2021	60.5	63.5	56.1	54.0	63.5	58.2	61.3	58.5	61.0	59.2	55.0	55.7	54.8
# of Days	30	30	30	30	30	30	30	30	30	30	30	30	30
May, 2021	60.8	63.3	52.5	53.8	63.3	58.4	61.9	59.4	61.9	60.2	55.8	56.4	55.0
# of Days	31	31	31	31	31	31	31	31	31	31	31	31	31
June, 2021	61.8	64.4	53.1	53.8	64.3	59.0	62.4	59.7	69.2	60.8	56.3	57.1	55.7
# of Days	30	30	30	30	30	30	30	30	20	30	30	30	30
2nd Quarter 2021	61.1	63.7	54.2	53.9	63.7	58.5	61.9	59.2	65.7	60.1	55.7	56.4	55.2
# of Days	91	91	91	91	91	91	91	91	81	91	91	91	91
July, 2021	61.6	64.4	52.5	53.4	64.3	59.0	62.5	59.8	63.1	62.1	56.4	56.8	55.7
# of Days	31	31	31	31	31	31	31	31	29	31	31	31	31
August, 2021	61.4	64.7	54.1	55.2	64.3	59.2	62.6	59.9	67.9	61.1	56.7	57.0	56.1
# of Days	31	31	31	31	31	31	31	31	31	31	31	31	31
September, 2021	61.5	65.0	54.5	60.0	64.6	59.4	62.1	59.9	62.6	60.7	56.6	56.7	55.7
# of Days	30	30	30	30	30	30	30	30	30	30	30	30	30
3rd Quarter 2021	61.5	64.7	53.8	57.1	64.4	59.2	62.4	59.9	65.2	61.3	56.6	56.8	55.8
# of Days	92	92	92	92	92	92	92	92	90	92	92	92	92
Annual	60.2	63.4	54.3	55.9	62.9	57.8	61.1	58.3	67.1	59.4	55.3	55.5	54.6
# of Days	365	365	338	354	365	340	348	337	352	364	341	364	365
Online Percentage	100%	100%	93%	97%	100%	93%	95%	92%	96%	100%	93%	100%	100%

Table 7 – Annual Community Noise Equivalent Level (CNEL) Values

RMT #	Remote Monitoring Terminal (RMT)			
	3rd Quarter 2021	1st Quarter 2021	4th Quarter 2020	3rd Quarter 2020
101	60.2	59.1	58.2	57.7
102	63.4	61.8	61.1	61.3
104	54.3	54.8	54.3	50.3
105	55.9	56.5	55.5	51.7
106	62.9	61.9	60.8	59.7
107	57.8	56.8	56.1	55.6
108	61.1	59.6	59.4	59.0
109	58.3	57.1	55.9	56.2
110	67.1	66.1	69.6	62.5
111	59.4	57.9	57.0	56.9
112	55.3	54.7	53.6	59.5
114	55.5	54.3	53.9	53.6
115	54.6	54.0	52.8	52.4