

March 19, 2021

Ms. Cheryl A. Tubbs
Lilburn Corporation
1905 Business Center Drive
San Bernardino, CA 92408

SUBJECT: PERRIS TRUCK YARD MEMORANDUM (REVISED)

Dear Ms. Cheryl A. Tubbs:

Urban Crossroads, Inc. is pleased to submit this revised Memorandum for the Perris Truck Yard ("Project"), which is located north of Markham Street and east of Perris Boulevard. This Memorandum has been prepared in response to the October 23, 2020 comments prepared by Cadence on the September 16, 2020 *Perris Truck Yard Noise Impact Analysis* ("NIA") prepared by Urban Crossroads, Inc.

NEAREST NOISE SENSITIVE RECEIVER LOCATION

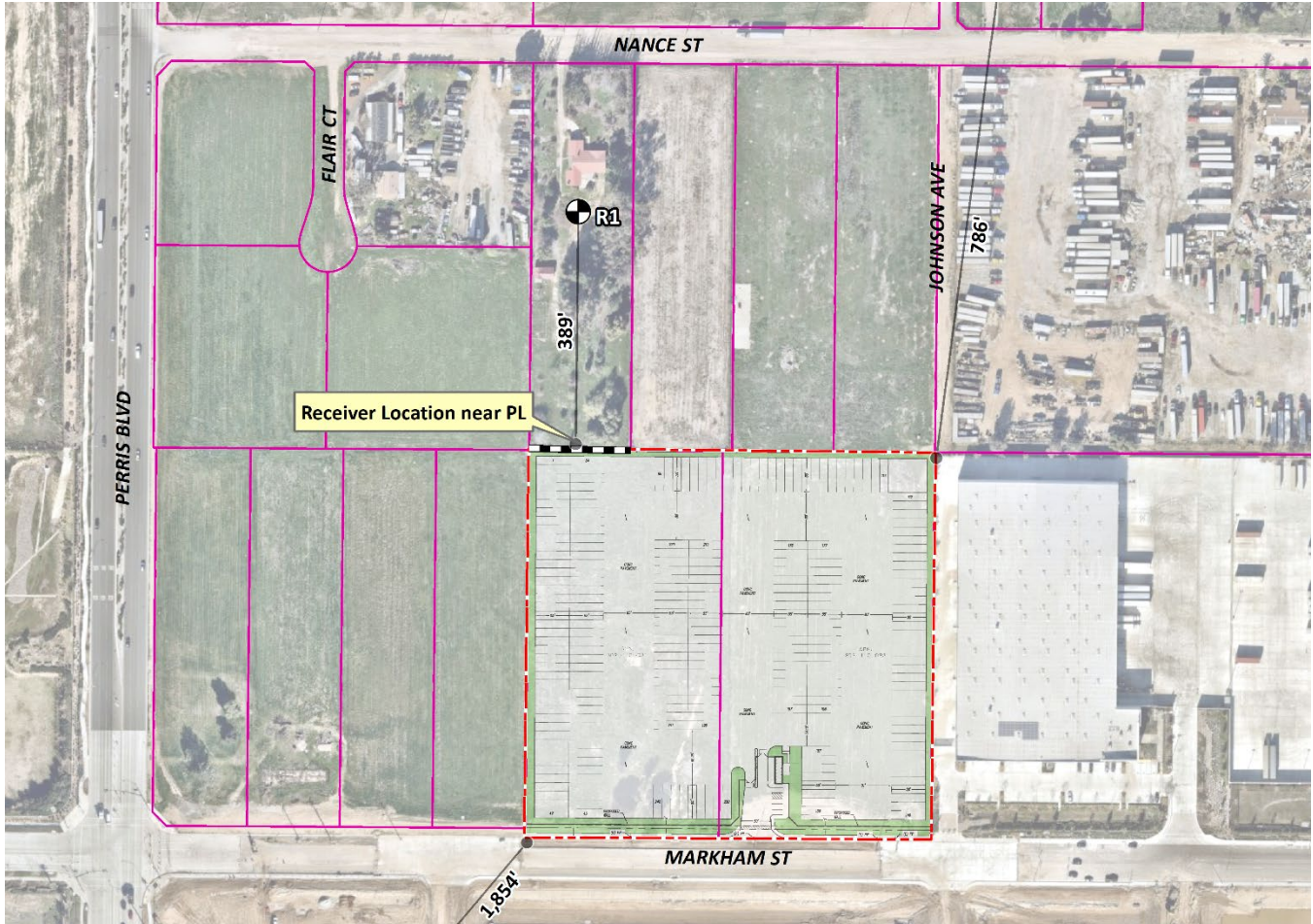
The NIA describes the Project related operational noise levels at the nearest noise sensitive residential structures or areas of frequent human use adjacent the Project site boundary. The nearest residential structure is located 389 feet north of the Project Site boundary at 75 East Nance Street is in the Perris Valley Commerce Center Specific Plan and is zoned Business Professional Office as shown on Exhibit A. It appears that the residence is a legal non-conforming use.

The October 23, 2020 comments prepared by Cadence suggest that the City's noise standards apply to the property line of the affected residential receiver: not the residential building or the immediate area around the residential building. This requirement effectively places the noise sensitive receiver at the project boundary of the Perris Truck Yard. However, it is unlikely that humans will be frequently occupying the areas abutting their property lines. With this change, the Project will be required to implement noise mitigation measures to reduce the potential operational noise level impacts at a theoretical receiver located at the property line to reduce the noise levels for an existing legal non-conforming use. In addition, a Specific Plan Amendment is to change the land use designation of the Project Site which is currently designated as Business/Professional Office (BPO) to Light Industrial (LI) allowing for activities including fabrication or storage of goods and services for sale such as equipment rental, storage, heavy manufacturing, outdoor dismantling and salvage yards, outdoor storage and activities, recycling facilities, transportation, trucking yards, stations and terminals, vehicle storage and towing yards subject to the approval of a Conditional Use Permit.

OPERATIONAL NOISE LEVELS

Using the reference operational noise level measurements outlined in the NIA, it is possible to estimate the exterior operational noise levels at the nearest residential structure located 389 feet north of the Project Site boundary at 75 East Nance Street and near the property line as shown on Exhibit A. Based on the CadnaA noise prediction model results, Table 1 presents the operational exterior noise levels without perimeter wall.

EXHIBIT A: RECEIVER LOCATION



LEGEND:

- Site Boundary
- Parcel Boundaries
- R1

 Receiver Locations
- Distance from receiver to Project site boundary (in feet)
- Potential 10-Foot High Noise Barrier

Table 1 shows that Project operational noise levels at receiver location R1 and at the property line will range from 59.9 to 69.8 dBA L_{max} . Table 2 presents the operational exterior noise levels with a 10-foot-high wall. As shown on Table 2, with a 10-foot-high at the property line, the Project operational noise levels at receiver location R1 and at the property line will range from 58.6 to 59.8 dBA L_{max} . Table 2 shows that the potential 10-foot-high property line wall will provide a noise level reduction of ranging from 1.3 dBA L_{max} at receiver location R1 to 10 dBA L_{max} at the property line. The CadnaA operational noise prediction model inputs and calculations are included in Appendix A.

TABLE 1: PROJECT OPERATIONAL NOISE LEVELS (WITHOUT WALL)

Receiver Location ¹	Project Operational Noise Levels (dBA L _{max}) ²		Noise Level Standards (dBA L _{max}) ³		Noise Level Standards Exceeded? ⁴	
	Daytime	Nighttime	Daytime	Nighttime	Daytime	Nighttime
R1	59.9	59.9	80.0	60.0	No	No
PL	69.8	69.8	80.0	60.0	No	Yes

¹ See Exhibit A for the receiver locations. "PL" represents a receiver located near the property line behind the potential wall.

² Estimated Project operational noise levels (Appendix A).

³ Exterior noise level standards per the City of Perris Municipal Code, sections 7.34.040.

⁴ Do the estimated Project operational noise source activities exceed the noise level standards?

"Daytime" = 7:00 a.m. to 10:00 p.m.; "Nighttime" = 10:00 p.m. to 7:00 a.m.

TABLE 2: PROJECT OPERATIONAL NOISE LEVELS (WITH 10-FOOT-HIGH WALL)

Receiver Location ¹	Project Operational Noise Levels (dBA L _{max}) ²		Noise Level Standards (dBA L _{max}) ³		Noise Level Standards Exceeded? ⁴	
	Daytime	Nighttime	Daytime	Nighttime	Daytime	Nighttime
R1	58.6	58.6	80.0	60.0	No	No
PL	59.8	59.8	80.0	60.0	No	No

¹ See Exhibit A for the receiver locations. "PL" represents a receiver located near the property line behind the potential wall.

² Estimated Project operational noise levels (Appendix A).

³ Exterior noise level standards per the City of Perris Municipal Code, sections 7.34.040.

⁴ Do the estimated Project operational noise source activities exceed the noise level standards?

"Daytime" = 7:00 a.m. to 10:00 p.m.; "Nighttime" = 10:00 p.m. to 7:00 a.m.

As shown on Tables 1 and 2, the Project operational noise levels satisfy the City of Perris daytime noise standards at receiver location R1 without or with the potential 10-foot-high wall. As shown on Table 2, the operational noise levels satisfy the nighttime noise standards both at R1 and at the property line. The operational noise analysis shows that the Project-related noise levels will satisfy the City of Perris daytime and nighttime noise standards at the property line with the potential 10-foot-high wall.

CONSTRUCTION NOISE LEVELS

Using the RCNM reference noise level measurements outlined in the NIA, it is possible to estimate the exterior construction noise levels at the nearest residential structure located 389 feet north of the Project Site boundary at 75 East Nance Street and near the property line as shown on Exhibit A. Based on the CadnaA noise prediction model results, Table 3 presents the construction exterior noise levels without perimeter wall. Table 3 shows that Project construction noise levels at receiver location R1 and at the property line will range from 72.1 to 83.4 dBA L_{max}. Table 4 presents the construction exterior noise levels with a 10-foot-high wall. As shown on Table 4, with a 10-foot-high at the property line, the Project construction noise levels at receiver location R1 and at the property line will range from 64.7 to 68.3 dBA L_{max}. Table 4 shows that the potential 10-foot-high property line wall will provide a noise level

reduction of ranging from 7.4 dBA L_{max} at receiver location R1 to 15.1 dBA L_{max} at the property line. The CadnaA construction noise prediction model inputs and calculations are included in Appendix B.

TABLE 3: PROJECT CONSTRUCTION NOISE LEVELS (WITHOUT WALL)

Receiver Location ¹	Project Operational Noise Levels (dBA L_{max}) ²	Noise Level Standards (dBA L_{max}) ³	Noise Level Standards Exceeded? ⁴
R1	72.1	80.0	No
PL	83.4	80.0	Yes

¹ See Exhibit A for the receiver locations. "PL" represents a receiver located near the property line behind the potential wall.

² Estimated Project operational noise levels (Appendix B).

³ Exterior noise level standards per the City of Perris Municipal Code, sections 7.34.060.

⁴ Do the estimated Project operational noise source activities exceed the noise level standards?

"Daytime" = 7:00 a.m. to 10:00 p.m.; "Nighttime" = 10:00 p.m. to 7:00 a.m.

TABLE 4: PROJECT CONSTRUCTION NOISE LEVELS (WITH 10-FOOT-HIGH WALL)

Receiver Location ¹	Project Operational Noise Levels (dBA L_{max}) ²	Noise Level Standards (dBA L_{max}) ³	Noise Level Standards Exceeded? ⁴
R1	64.7	80.0	No
PL	68.3	80.0	No

¹ See Exhibit A for the receiver locations. "PL" represents a receiver located near the property line behind the potential wall.

² Estimated Project operational noise levels (Appendix B).

³ Exterior noise level standards per the City of Perris Municipal Code, sections 7.34.060.

⁴ Do the estimated Project operational noise source activities exceed the noise level standards?

"Daytime" = 7:00 a.m. to 10:00 p.m.; "Nighttime" = 10:00 p.m. to 7:00 a.m.

CONCLUSIONS

The NIA reasonably considers the potential operational noise source levels associated with the Perris Truck Yard use at the nearest noise sensitive (legal non-conforming) receiver locations. In addition, this memo describes the noise level reduction from the construction of a potential 10-foot-high wall at the property line. If you have any questions, please contact me directly at (949) 584-3148.

Respectfully submitted,

URBAN CROSSROADS, INC.



Bill Lawson, P.E., INCE
 Principal



APPENDIX A:

CADNAA OPERATIONAL NOISE LEVEL CALCULATIONS

This page intentionally left blank

12915 - Perris Truck Yard

CadnaA Noise Prediction Model: 12915-10 Lmax_10wall.cna

Date: 19.03.21

Analyst: S. Shami

Calculation Configuration

Configuration	
Parameter	Value
General	
Country	(user defined)
Max. Error (dB)	0.00
Max. Search Radius (#(Unit,LEN))	2000.01
Min. Dist Src to Rcvr	0.00
Partition	
Raster Factor	0.50
Max. Length of Section (#(Unit,LEN))	999.99
Min. Length of Section (#(Unit,LEN))	1.01
Min. Length of Section (%)	0.00
Proj. Line Sources	On
Proj. Area Sources	On
Ref. Time	
Reference Time Day (min)	960.00
Reference Time Night (min)	480.00
Daytime Penalty (dB)	0.00
Recr. Time Penalty (dB)	5.00
Night-time Penalty (dB)	10.00
DTM	
Standard Height (m)	0.00
Model of Terrain	Triangulation
Reflection	
max. Order of Reflection	2
Search Radius Src	100.00
Search Radius Rcvr	100.00
Max. Distance Source - Rcvr	1000.00 1000.00
Min. Distance Rcvr - Reflector	1.00 1.00
Min. Distance Source - Reflector	0.10
Industrial (ISO 9613)	
Lateral Diffraction	some Obj
Obst. within Area Src do not shield	On
Screening	
	Incl. Ground Att. over Barrier
	Dz with limit (20/25)
Barrier Coefficients C1,2,3	3.0 20.0 0.0
Temperature (#(Unit,TEMP))	10
rel. Humidity (%)	70
Ground Absorption G	0.50
Wind Speed for Dir. (#(Unit,SPEED))	3.0
Roads (RLS-90)	
Strictly acc. to RLS-90	
Railways (FTA/FRA)	
Aircraft (???)	
Strictly acc. to AzB	

Receiver Noise Levels

Name	M.	ID	Level Lr		Limit. Value		Land Use			Height (ft)	Coordinates			
			Day (dBA)	Night (dBA)	Day (dBA)	Night (dBA)	Type	Auto	Noise Type		X (ft)	Y (ft)	Z (ft)	
RECEIVERS		R1	58.5	58.5	80.0	60.0				5.00	a	6266055.29	2256019.59	5.00
RECEIVERS		R2	59.7	59.7	80.0	60.0				5.00	a	6266043.21	2255638.13	5.00

Point Source(s)

Name	M.	ID	Result. PWL			Lw / Li			Operating Time			KO	Height (ft)	Coordinates			
			Day (dBA)	Evening (dBA)	Night (dBA)	Type	Value (dBA)	norm. (dBA)	Day (min)	Special (min)	Night (min)			dB	X (ft)	Y (ft)	Z (ft)
POINTSOURCE		TRASH01	102.8	102.8	102.8	Lw	102.8		150.00	0.00	90.00	0.0	5.00	a	6266401.15	2255142.31	5.00
POINTSOURCE		AC01	89.4	89.4	89.4	Lw	89.4		585.00	0.00	252.00	0.0	5.00	g	6266618.08	2255603.42	5.00

Line Source(s)

Name	M.	ID	Result. PWL			Result. PWL'			Lw / Li			Operating Time			Moving Pt. Src			Height (ft)		
			Day (dBA)	Evening (dBA)	Night (dBA)	Day (dBA)	Evening (dBA)	Night (dBA)	Type	Value (dBA)	norm. (dBA)	Day (min)	Special (min)	Night (min)	dB	Number	Speed (mph)			
LINESOURCE		DWY01	90.0	74.6	80.8	73.8	58.4	64.6	PWL-Pt	91.4						172.0	5.0	21.0	6.2	8
LINESOURCE		DWY02	88.2	72.8	79.0	73.8	58.4	64.6	PWL-Pt	91.4						172.0	5.0	21.0	6.2	8

Name	Height		Coordinates			
	Begin	End	x	y	z	Ground
	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)
LINESOURCE	8.00	a	6266363.39	2255134.93	8.00	0.00
			6266363.37	2254997.48	8.00	0.00
LINESOURCE	8.00	a	6266342.55	2255088.05	8.00	0.00
			6266342.99	2254997.59	8.00	0.00

Area Source(s)

Name	M.	ID	Result. PWL			Result. PWL*			Lw / Li		Operating Time			Height (ft)	
			Day	Evening	Night	Day	Evening	Night	Type	Value	norm.	Day	Special		Night
			(dBA)	(dBA)	(dBA)	(dBA)	(dBA)	(dBA)		dB(A)		(min)	(min)		(min)
AREASOURCE		TERMINAL01	118.5	118.5	118.5	73.3	73.3	73.3	Lw	118.5					8

Name	Height		Coordinates			
	Begin	End	x	y	z	Ground
	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)
AREASOURCE	8.00	a	6266427.19	2255147.95	8.00	0.00
			6266311.30	2255149.68	8.00	0.00
			6266311.74	2255029.46	8.00	0.00
			6265992.29	2255030.76	8.00	0.00
			6265995.33	2255618.87	8.00	0.00
			6266631.18	2255615.40	8.00	0.00
			6266627.71	2255027.72	8.00	0.00
			6266426.75	2255028.59	8.00	0.00

Barrier(s)

Name	M.	ID	Absorption		Z-Ext.	Cantilever		Height		Coordinates					
			left	right		horz.	vert.	Begin	End	x	y	z	Ground		
						(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)
BARRIERS		BARRIERS00001						10.00	a			6265982.97	2255631.87	10.00	0.00
												6266148.38	2255628.53	10.00	0.00

APPENDIX B:

CADNAA CONSTRUCTION NOISE LEVEL CALCULATIONS

This page intentionally left blank

12915 - Perris Truck Yard

CadnaA Noise Prediction Model: 12915-10 Lmax_10wall - Construction.cna

Date: 19.03.21

Analyst: S. Shami

Calculation Configuration

Configuration	
Parameter	Value
General	
Country	(user defined)
Max. Error (dB)	0.00
Max. Search Radius (#(Unit,LEN))	2000.01
Min. Dist Src to Rcvr	0.00
Partition	
Raster Factor	0.50
Max. Length of Section (#(Unit,LEN))	999.99
Min. Length of Section (#(Unit,LEN))	1.01
Min. Length of Section (%)	0.00
Proj. Line Sources	On
Proj. Area Sources	On
Ref. Time	
Reference Time Day (min)	960.00
Reference Time Night (min)	480.00
Daytime Penalty (dB)	0.00
Recr. Time Penalty (dB)	5.00
Night-time Penalty (dB)	10.00
DTM	
Standard Height (m)	0.00
Model of Terrain	Triangulation
Reflection	
max. Order of Reflection	2
Search Radius Src	100.00
Search Radius Rcvr	100.00
Max. Distance Source - Rcvr	1000.00 1000.00
Min. Distance Rcvr - Reflector	1.00 1.00
Min. Distance Source - Reflector	0.10
Industrial (ISO 9613)	
Lateral Diffraction	some Obj
Obst. within Area Src do not shield	On
Screening	
	Incl. Ground Att. over Barrier
	Dz with limit (20/25)
Barrier Coefficients C1,2,3	3.0 20.0 0.0
Temperature (#(Unit,TEMP))	10
rel. Humidity (%)	70
Ground Absorption G	0.50
Wind Speed for Dir. (#(Unit,SPEED))	3.0
Roads (RLS-90)	
Strictly acc. to RLS-90	
Railways (FTA/FRA)	
Aircraft (???)	
Strictly acc. to AzB	

Receiver Noise Levels

Name	M.	ID	Level Lr		Limit. Value		Land Use			Height (ft)	Coordinates			
			Day (dBA)	Night (dBA)	Day (dBA)	Night (dBA)	Type	Auto	Noise Type		X (ft)	Y (ft)	Z (ft)	
RECEIVERS	R1		64.7	64.7	80.0	60.0				5.00	a	6266055.29	2256019.59	5.00
RECEIVERS	R2		68.3	68.3	80.0	60.0				5.00	a	6266043.21	2255638.13	5.00

Area Source(s)

Name	M.	ID	Result. PWL			Result. PWL"			Lw / Li			Operating Time			Height (ft)
			Day (dBA)	Evening (dBA)	Night (dBA)	Day (dBA)	Evening (dBA)	Night (dBA)	Type	Value	norm.	Day (min)	Special (min)	Night (min)	
SITEBOUNDARY		SITEBOUNDARY00001	130.9	130.9	130.9	85.0	85.0	85.0	Lw"	85					0

Name	Height		Coordinates			
	Begin (ft)	End (ft)	x (ft)	y (ft)	z (ft)	Ground (ft)
SITEBOUNDARY	0.00	a	6265982.97	2255631.87	0.00	0.00
			6266644.43	2255624.92	0.00	0.00
			6266637.49	2254996.05	0.00	0.00
			6265975.68	2254999.52	0.00	0.00

Barrier(s)

Name	M.	ID	Absorption		Z-Ext.	Cantilever		Height		Coordinates			
			left	right		horz.	vert.	Begin	End	x	y	z	Ground
					(ft)	(ft)	(ft)	(ft)		(ft)	(ft)	(ft)	(ft)
BARRIERS		BARRIERS00001						10.00	a	6265982.97	2255631.87	10.00	0.00
										6266148.79	2255630.71	10.00	0.00