Appendix N Noise Information

N1: Existing and Future Noise Levels

N2: Comparison of Recommended Soundwall Locations

N3: Alternative 1 Reasonableness Analysis Summary and Recommended Soundwall Locations

N4: Alternative 2 Reasonableness Analysis Summary and Recommended Soundwall Locations

N5: Alternative 3 Reasonableness Analysis Summary and Recommended Soundwall Locations

N1: Existing and Future Noise Levels

Table G-1 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 1

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1.88 W	--	SFR	4	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	0	0
R 1.89 W		SFR	3	69 MOD	68	68	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 1.90 W	--	SFR	4	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.91 W*		SFR	3	63 MOD	62	62	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.92 W		SFR	5	68 M,LT5,CAL	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.93 W		SFR	4	67 MOD	66	67	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.94 W*		SFR	2	58 M,ST9A,CAL	57	57	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.95 W	S649 Shoulder	SFR	5	67 MOD	68	67	1	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 1.96 W*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.97 W		SFR	4	64 M,ST9	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.98 W		SFR	4	64 MOD	65	64	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.99 W		SFR	2	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.100 W*		SFR	2	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.101 W		REC	3	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.102 W		REC	2	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.103 W		REC	1	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and t interior noise criteria has been used for this receiver because there is no outdoor us
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-2 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 2

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 2.1 W	S699 R/W	MFR	3	65 MOD	62	62	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2 W		MFR	3	63 MOD	60	62	-3	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2A W		MFR	1	65 MOD	62	62	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.3 W		MFR	6	68 M,LT6,CAL	65	64	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4 W		MFR	3	62 MOD	59	58	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4A W		MFR	2	65 MOD	62	61	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.5 W	S705 Shoulder	MFR	3	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.6 W		MFR	6	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.7 W		MFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	0	*0*	63	1	*0*
R 2.8 W		MFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	63	1	*0*
R 2.8A W		MFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	57	2	*0*	56	3	*0*
R 2.9 W		MFR	4	62 M,ST11	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	3	*0*	60	4	*0*
R 2.10 W	--	MFR	6	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.11 W		MFR	8	57 MOD	58	57	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.12 W	--	SFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.13 W	S708, S710, & S718 Shoulder & R/W	SFR	2	57 M,ST12,CAL	58	62	1	4	B (67)	NONE	62	0	*0*	61	1	*0*	61	1	*0*	60	2	*0*	60	2	*0*
R 2.14 W,K3		SFR	2	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	69	1	*0*	69	1	*0*
R 2.15 W,K3		REC	2	68 MOD	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	68	2	*0*	67	3	*0*
R 2.16 W,K3		REC	0	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	*0*	62	3	*0*
R 2.17 W,K3		SFR	1	66 MOD	66	68	0	2	B (67)	A/E	68	0	*0*	67	1	*0*	66 T	2	*0*	65	3	*0*	64	4	*0*
R 2.18 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	67	1	*0*	66	2	*0*	64 T	4	*0*	**63 R**	**5**	*3*	61	7	*3*
R 2.19 W,K3		SFR	4	67 M,LT7,CAL	67	68	0	1	B (67)	A/E	67	1	*0*	66	2	*0*	64 T	4	*0*	**62 R**	**6**	*4*	61	7	*4*
R 2.20 W,K3,C		SFR	4	67 MOD	67	68	0	1	B (67)	A/E	67	1	*0*	66	2	*0*	64 T	4	*0*	**61 R**	**7**	*4*	61	7	*4*
R 2.21 W*		SFR	2	61 MOD	62	62	1	0	B (67)	NONE	62	0	*0*	62	0	*0*	61	1	*0*	60	2	*0*	59	3	*0*
R 2.21A W*		--	--	60 M,ST12A	61	62	1	1	--	--	62	0	--	61	1	--	61	1	--	60	2	--	59	3	--
R 2.22 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	67	1	*0*	66	2	*0*	64	4	*0*	**62 T,R**	**6**	*3*	61	7	*3*
R 2.23 W*		SFR	2	61 MOD	62	62	1	0	B (67)	NONE	62	0	*0*	62	0	*0*	61	1	*0*	60	2	*0*	59	3	*0*
R 2.24 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	67	1	*0*	66	2	*0*	64	4	*0*	**62 T,R**	**6**	*3*	61	7	*3*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-2 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 2.25 W,K3	S718 Shoulder	SFR	2	66 MOD	67	69	1	2	B (67)	A/E	66	3	*0*	66	3	*0*	65	4	*0*	64 T	5	*2*	**63 R,5**	**6**	*2*
R 2.26 W*		SFR	2	60 MOD	61	60	1	-1	B (67)	NONE	60	0	*0*	60	0	*0*	60	0	*0*	59	1	*0*	58	2	*0*
R 2.27 W,K3		SFR	2	66 MOD	67	66	1	-1	B (67)	A/E	64	2	*0*	63	3	*0*	63	3	*0*	62 T	4	*0*	**61 R**	**5**	*2*
R 2.28 W,K4	--	SFR	3	58 M,ST13,CAL	59	55	1	-4	B (67)	NONE	53	2	*0*	53	2	*0*	52	3	*0*	52	3	*0*	51	4	*0*
R 2.29 W,K4		SFR	3	58 MOD	59	53	1	-6	B (67)	NONE	52	1	*0*	52	1	*0*	52	1	*0*	52	1	*0*	51	2	*0*
R 2.30 W,K4		SFR	1	56 MOD	57	53	1	-4	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.31 W	--	SFR	3	59 MOD	61	56	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.32 W		SFR	3	60 MOD	62	57	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33 W		SFR	3	62 MOD	64	55	2	-9	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33A W		--	--	63 MOD	65	58	2	-7	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.34 W,C	S733 Shoulder	SFR	1	66 MOD	68	66	2	-2	B (67)	A/E	63	3	*0*	62	4	*0*	62 T	4	*0*	**61 R**	**5**	*1*	60	6	*1*
R 2.35 W	--	SFR	3	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65 T	1	*0*	63	3	*0*
R 2.36 W*		SFR	2	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	*0*	61	3	*0*
R 2.37 W		SFR	2	64 M,LT8	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	*0*	65	2	*0*
R 2.38 W*		SFR	2	64 MOD	66	66	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66 T	0	*0*	66	0	*0*
R 2.39 W		SFR	2	64 MOD	66	66	2	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	65	1	*0*	64	2	*0*
R 2.40 W	S747 R/W	SFR	2	67 MOD	69	71	2	2	B (67)	A/E	--	--	--	--	--	--	67	4	*0*	66 T	5	*2*	**66 R**	**5**	*2*
R 2.41 W,C,P		SCH	1	63 M,ST15	69	71	6	2	B (67)	A/E	--	--	--	--	--	--	66	5	*1*	65 T	6	*1*	**64 R,5**	**7**	*1*
R 2.42 W,P		SCH	1	58 MOD	64	65	6	1	B (67)	NONE	63	2	*0*	63	2	*0*	62	3	*0*	61	4	*0*	**60 R**	**5**	*1*
R 2.43	--	MOT	1	51 MOD	53	53	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.44		MOT	1	55 MOD	57	58	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
P - Design Year No Build and Build noise levels do not account for the privacy screen that was present at the time of measurement
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
K4 - A calibration factor of -3 dB is applied for this receptor and adjacent receptors with similar geographic features.

Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-2 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.45 W	S746 R/W	SFR	1	59 MOD	61	66	2	5	B (67)	A/E	61	5	0	61	5	1	**60 T,R**	**6**	1	60	6	1	59	7	1
R 2.45A W		SFR	1	57 MOD	59	61	2	2	B (67)	NONE	59	2	0	58	3	0	58	3	0	58	3	0	58	3	0
R 2.46 W,C		SCH	1	68 M,ST16	70	74	2	4	B (67)	A/E	69	5	1	68 T	6	1	**67 R,5**	**7**	1	67	7	1	67	7	1
R 2.47 W	--	SFR	2	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 2.48 W		SFR	1	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 2.49 W		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.50 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	59	1	0
R 2.51 W		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.52 W		SFR	4	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.53 W		SFR	4	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 2.54 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	58	2	0
R 2.55 W		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.56 W		SFR	3	65 M,LT9,CAL	65	67	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.57 W*	S766 R/W	SFR	2	58 MOD	58	59	0	1	B (67)	NONE	59	0	0	59	0	0	59 T	0	0	58	1	0	58	1	0
R 2.58 W		SFR	2	65 MOD	65	68	0	3	B (67)	A/E	68	0	0	67 T	1	0	67	1	0	67	1	0	67	1	0
R 2.59 W		SFR	2	61 MOD	61	67	0	6	B (67)	A/E	65	2	0	65 T	2	0	64	3	0	64	3	0	64	3	0
R 2.60 W	--	MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61 W		MFR	2	60 M,ST17	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61A W		--	--	66 M,ST17A	64	65	-2	1	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.62 W		MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.63 W	S765 R/W	SFR	1	62 MOD	61	66	-1	5	B (67)	A/E	65	1	0	65	1	0	64	2	0	63 T	3	0	63	3	0
R 2.64 W		SFR	2	64 MOD	63	68	-1	5	B (67)	A/E	67	1	0	67	1	0	66	2	0	65 T	3	0	64	4	0
R 2.65 W		SFR	1	67 M,LT10,CAL	66	69	-1	3	B (67)	A/E	69	0	0	68	1	0	68 T	1	0	67	2	0	67	2	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-2 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.66 W	--	SFR	3	66 MOD	65	66	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.67 W*	--	SFR	1	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.68 W	--	SFR	2	55 MOD	54	54	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.69 W	--	SFR	3	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.70 W*	--	SFR	1	58 MOD	57	58	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.71 W	--	SFR	3	64 MOD	63	64	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.72 W*	--	SFR	2	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.73 W*	--	SFR	2	54 MOD	53	53	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.74 W	--	SFR	3	64 MOD	63	63	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.75 W	--	SFR	3	64 MOD	63	61	-1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.76 W	--	SFR	4	64 MOD	63	58	-1	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.77 W	--	MFR	2	60 MOD	61	58	1	-3	B (67)	NONE	57	1	0	57	1	0	57	1	0	56	2	0	56	2	0
R 2.78 W	--	MFR	4	61 M,ST19	62	59	1	-3	B (67)	NONE	57	2	0	56	3	0	56	3	0	56	3	0	56	3	0
R 2.79 W	--	MFR	4	65 MOD	66	60	1	-6	B (67)	NONE	58	2	0	58	2	0	58	2	0	57	3	0	57	3	0
R 2.80 W	S788, & S792 Shoulder	SFR	3	64 MOD	65	62	1	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.81 W	S788, & S792 Shoulder	SFR	3	68 MOD	69	66	1	-3	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	62	4	0	62	4	0
R 2.82 W	S788, & S792 Shoulder	SFR	2	67 MOD	68	67	1	-1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	64	3	0	64	3	0
R 2.83 W	S788, & S792 Shoulder	SFR	3	66 MOD	66	65	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	0	63	2	0
R 2.84 W	S788, & S792 Shoulder	SFR	4	66 M,LT11,CAL	66	65	0	-1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	64	1	0	64	1	0
R 2.85 W	S788, & S792 Shoulder	SFR	4	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	65	1	0	65	1	0
R 2.86 W	--	SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	0	62	3	0
R 2.87 W	--	SFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	62	2	0
R 2.88 W	--	SFR	4	62 MOD	62	61	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.89 W	--	SFR	3	63 MOD	63	57	0	-6	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.90 W	--	SFR	3	62 MOD	62	58	0	-4	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.91 W	--	SFR	2	63 MOD	63	62	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.92 W	--	SFR	1	61 MOD	61	60	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-3 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 3

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR
R 3.1 W	--	MFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.2 W	--	MFR	5	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.3 W	S828 Shoulder	MFR	7	65 M,ST22	65	64	0	-1	B (67)	NONE	--	--	--	--	--	--	64	0	0	63	1	0	63	1	0
R 3.4 W		MFR	2	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	65	1	0	65	1	0	64	2	0
R 3.5 W*		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	62	3	0	62	3	0	62	3	0
R 3.6 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	64	3	0	63	4	0	**62** R	**5**	2
R 3.7 W		SFR	4	65 MOD	65	67	0	2	B (67)	A/E	--	--	--	--	--	--	64	3	0	64	3	0	63	4	0
R 3.8 W		SFR	4	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	66	3	0	65	4	0	65	4	0
R 3.9 W		SFR	2	68 M,LT13,CAL	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	67	2	0	66	3	0	65	4	0
R 3.10 W		SFR	2	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	67	2	0	66	3	0	65	4	0
R 3.11 W*		SFR	5	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	63	2	0	62	3	0	61	4	0
R 3.12 W		SFR	1	69 MOD	69	70	0	1	B (67)	A/E	--	--	--	--	--	--	67	3	0	66	4	0	**65** R	**5**	1
R 3.13 W*		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	65 T	3	0	64	4	0	**63** R	**5**	2
R 3.14 W		SFR	2	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	4	0	66	4	0
R 3.15 W*		SFR	4	62 MOD	62	63	0	1	B (67)	NONE	61	2	0	60	3	0	59	4	0	58	5	3	58	5	3
R 3.16 W,C		SFR	1	70 MOD	70	71	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	4	0	**66** R	**5**	1
R 3.17 W		SFR	2	69 MOD	69	70	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	3	0	66	4	0
R 3.17A W		--	--	68 M,ST23	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	4	--	64	5	--
R 3.18 W		SFR	1	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	3	0	65	4	0
R 3.19 W*		SFR	2	60 MOD	60	61	0	1	B (67)	NONE	60	1	0	59	2	0	58	3	0	58	3	0	57	4	0
R 3.19A W*		SFR	1	63 MOD	63	64	0	1	B (67)	NONE	61	3	0	61	3	0	60	4	0	59	5	1	59	5	1
R 3.20 W		SFR	2	65 MOD	65	67	0	2	B (67)	A/E	64	3	0	63	4	0	**61** T,R	**6**	2	61 D	6	2	61 D	6	2
R 3.21 W*		SFR	2	60 MOD	60	61	0	1	B (67)	NONE	59	2	0	59	2	0	58	3	0	58	3	0	57	4	0
R 3.22 W*	--	MFR	8	55 MOD	56	55	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.22A W	--	MFR	2	54 M,ST20	55	55	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.23 W*	--	MFR	9	51 MOD	52	52	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
D - Sound level is forced to this value due to inaccurate sound levels obtained from the model because of double diffraction issues between the existing wall and design soundwall.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-3 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 3.23A	S807 Shoulder & S811 R/W	REC	--	62 MOD	63	64	1	1	B (67)	NONE	61	3	--	60	4	--	60	4	--	59	5	--	58	6	--
R 3.23B C		REC	7	65 MOD	66	68	1	2	B (67)	A/E	65	3	*0*	64	4	*0*	**62 T,R**	**6**	*7*	62	6	*7*	61	7	*7*
R 3.24 K1,W		SFR	2	64 MOD	65	67	1	2	B (67)	A/E	--	--	--	--	--	--	64	3	*0*	**62 T,R**	**5**	*2*	61	6	*2*
R 3.25 K1,W*		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	60	2	*0*	59	3	*0*	58	4	*0*
R 3.26 K1,W	--	SFR	3	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	62	4	*0*	62	4	*0*	62	4	*0*
R 3.27 K1,W*		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	62	4	*0*	62	4	*0*	62	4	*0*
R 3.28 K1,W		SFR	3	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	63	4	*0*	63	4	*0*	63	4	*0*
R 3.28A K1,W		--	--	64 M,CAL	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	65	1	--	64	2	--	63	3	--
R 3.29 K1,W*		SFR	2	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	61	1	*0*	59	3	*0*	58	4	*0*
R 3.30 K,1W	S819 R/W	SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	1	*0*	58	3	*0*
R 3.31 K1,W		SFR	2	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 3.32 K1,W	--	SFR	4	64 M,LT12	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	2	*0*	63	3	*0*
R 3.33 K1,W		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	62	3	*0*
R 3.34 K1,W*		SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 3.35 K1,W		SFR	1	66 M,ST21	65	66	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	*0*	64	2	*0*
R 3.36 K1,W*		SFR	3	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	1	*0*	58	2	*0*
R 3.37 K1,W*		SFR	2	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	1	*0*	60	2	*0*
R 3.38 K1,W		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	2	*0*	63	3	*0*
R 3.39 K1,W*		SFR	3	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	0	*0*	57	2	*0*
R 3.40 K1,W		SFR	5	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 3.41 K1,W*		SFR	3	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	56	3	*0*
R 3.42 K1,W		SFR	3	62 MOD	63	68	1	5	B (67)	A/E	--	--	--	--	--	--	64	4	*1*	64	4	*0*	64	4	*0*
R 3.43 W	--	MFR	8	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.44 W*		MFR	7	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.45 W		MFR	10	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.46 W		MFR	8	56 MOD	56	57	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K1 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-3 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.47 W	S841 Shoulder	SFR	2	62 MOD	63	67	1	4	B (67)	A/E	63	4	0	63	4	0	**61** T,R	**6**	2	61	6	2	60	7	2
R 3.48 C		SFR	1	69 MOD	70	76	1	6	B (67)	A/E	69	7	1	67	9	1	**65** T,R	**11**	1	65	11	1	64	12	1
R 3.49 W		SFR	2	60 MOD	61	64	1	3	B (67)	NONE	62	2	0	62	2	0	61	3	0	61	3	0	60	4	0
R 3.50 W		SFR	1	70 M,LT14	71	75	1	4	B (67)	A/E	70	5	1	68	7	1	67 T	8	1	67	8	1	**67** R,5	**8**	1
R 3.51 W*		SFR	2	62 MOD	63	65	1	2	B (67)	NONE	62	3	0	62	3	0	60	5	1	59	6	2	59	6	2
R 3.52 W		REC	1	68 MOD	69	70	1	1	B (67)	A/E	67	3	0	66	4	0	66 T	4	0	66	4	0	**65** R	**5**	1
R 3.53 W	--	MFR	6	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 3.53A W*		REC	5	54 MOD	56	57	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	55	2	0	55	2	0
R 3.54 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 3.54A W		MFR	3	62 M,ST24	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	0	63	2	0
R 3.55 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 3.55A W		MFR	4	63 MOD	65	65	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	65	0	0	64	1	0
R 3.56 W,C	S857 Shoulder	MFR	7	67 MOD	69	70	2	1	B (67)	A/E	67	3	0	66	4	0	**65** T,R	**5**	7	65	5	7	65	5	7
R 3.57 W	--	SFR	2	61 MOD	62	65	1	3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.58 W		SFR	3	60 MOD	61	63	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.59 W		SFR	4	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60 W		SFR	2	61 M,ST25A,CAL	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60A W		SFR	--	63 M,ST25	62	63	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.61 W*		SFR	7	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.62 W*		SFR	4	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.63 W,C	S868 R/W	SFR	1	65 MOD	66	66	1	0	B (67)	A/E	64	2	0	64	2	0	63 T	3	0	62	4	0	**60** R	**6**	1
R 3.64 W	--	SFR	3	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	63	0	0	62	1	0	61	2	0
R 3.65 W		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	61	1	0	61	1	0	59	3	0
R 3.66 W		MFR	5	60 M,ST26	58	59	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66A W		MFR	8	56 MOD	54	54	-2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66B W		MFR	4	56 MOD	54	54	-2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-3 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 3.67 W	--	MH	4	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	59	1	*0*	59	1	*0*	58	2	*0*
R 3.68 W*		REC	1	52 MOD	54	55	2	1	B (67)	NONE	--	--	--	--	--	--	55	0	*0*	55	0	*0*	54	1	*0*
R 3.69 W		MH	4	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	63	2	*0*	63	2	*0*	61	4	*0*
R 3.70 W		MH	4	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	66 T	1	*0*	65	2	*0*	64	3	*0*
R 3.71 W*		MH	7	65 MOD	67	68	2	1	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66 T	2	*0*	65	3	*0*
R 3.72 W		MH	2	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 3.72A W		MH	2	63 M,ST27	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 3.73 W		MH	5	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 3.74 W*		MH	11	64 MOD	66	66	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 3.74A W		MH	2	65 MOD	67	68	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 3.75 W		MH	4	65 MOD	67	68	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	2	*0*
R 3.76 W*	S896 R/W	MH	2	63 MOD	65	67	2	2	B (67)	A/E	66	1	*0*	66	1	*0*	66	1	*0*	66 T	1	*0*	66	1	*0*
R 3.77 W		MH	3	62 MOD	64	67	2	3	B (67)	A/E	67	0	*0*	67 T	0	*0*	66	1	*0*	66	1	*0*	66	1	*0*
R 3.78 W*	S902 Shoulder	SFR	2	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	64	0	*0*	63	1	*0*	62	2	*0*	61	3	*0*
R 3.79 W		REC	1	62 MOD	62	64	0	2	B (67)	NONE	--	--	--	63	1	*0*	62	2	*0*	59	5	*1*	58	6	*1*
R 3.80 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	62	2	*0*	61	3	*0*	60	4	*0*	60	4	*0*
R 3.81 W		SFR	2	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	67	1	*0*	66	2	*0*	65	3	*0*	65	3	*0*
R 3.81A W		SFR	3	66 M,LT15,CAL	66	66	0	0	B (67)	A/E	--	--	--	65	1	*0*	65	1	*0*	64	2	*0*	63	3	*0*
R 3.82 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	64	1	*0*	64	1	*0*	63	2	*0*	63	2	*0*
R 3.83 W	S910 & S916 Shoulder	SFR	5	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	64	0	*0*	63	1	*0*	62	2	*0*	62	2	*0*
R 3.84 W		SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	63	2	*0*	63	2	*0*	62	3	*0*	62	3	*0*
R 3.85 W		SFR	2	66 MOD	66	66	0	0	B (67)	A/E	63	3	*0*	62 T	4	*0*	62	4	*0*	**61 R**	**5**	*2*	61	5	*2*
R 3.86 W		SFR	3	66 MOD	66	66	0	0	B (67)	A/E	64	2	*0*	62 T	4	*0*	61	5	*3*	**61 R,5**	**5**	*3*	60	6	*3*
R 3.86A W,C		SFR	2	65 MOD	65	66	0	1	B (67)	A/E	63	3	*0*	62	4	*0*	61 T	5	*2*	**60 R,5**	**6**	*2*	59	7	*2*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-3 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.87 W,C	S909 & S911 Shoulder	REC	3	65 MOD	65	67	0	2	B (67)	A/E	63	4	0	62 T	5	3	61	6	3	**61 R,5**	**6**	3	61	6	3
R 3.88 W		REC	1	66 MOD	66	68	0	2	B (67)	A/E	64 T	4	0	63	5	1	63	5	1	**63 R,5**	**5**	1	62	6	1
R 3.89 W		REC	2	65 M,ST28	65	67	0	2	B (67)	A/E	64	3	0	63 T	4	0	63	4	0	**62 R**	**5**	2	62	5	2
R 3.90 W*	S141 Shoulder	SFR	1	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	62	2	0	63	1	0	60	4	0	60	4	0
R 3.91 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	63	1	0	64	0	0	62	2	0	61	3	0
R 3.92 W		SFR	4	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	64	1	0	64	1	0	63	2	0	62	3	0
R 3.93 W		SFR	4	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	65	1	0	66	0	0	64	2	0	63	3	0
R 3.93A W		SFR	3	67 M,LT16,CAL	66	66	-1	0	B (67)	A/E	--	--	--	65	1	0	66	0	0	64	2	0	63	3	0
R 3.94 W,*	S141 Shoulder	SFR	1	65 MOD	64	63	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	62	1	0
R 3.95 W		SFR	3	68 MOD	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	3	0	64	4	0
R 3.96 W		SFR	5	69 MOD	68	68	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 3.97 W,*		SFR	1	64 MOD	63	63	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	62	1	0
R 3.98 W		SFR	12	66 MOD	65	66	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	0	0	64	2	0
R 3.99 K2,W,C	S935 R/W	SFR	1	66 MOD	64	66	-2	2	B (67)	A/E	64	2	0	63 T	3	0	62	4	0	**61 R**	**5**	1	61	5	1
R 3.99A K2,W		SFR	2	65 M,ST29,CAL	63	64	-2	1	B (67)	NONE	63	1	0	61	3	0	60	4	0	60	4	0	59	5	2
R 3.100 K2,W		SFR	2	64 MOD	62	64	-2	2	B (67)	NONE	62	2	0	60	4	2	60	4	2	59	5	2	58	6	2
R 3.100A K2,W		SFR	1	64 MOD	62	63	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.101 K2,W		SFR	2	62 MOD	60	61	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K2 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 1 W,C	S995 R/W	SFR	2	69 MOD	70	71	1	1	B (67)	A/E	--	--	--	--	--	--	69	2	*0*	67 T	4	*0*	**66 R**	**5**	***2***
R 4. 2 W	--	SFR	3	69 MOD	70	70	1	0	B (67)	A/E	--	--	--	--	--	--	68	2	*0*	67	3	*0*	66	4	*0*
R 4. 3 W		SCH	3	68 MOD	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	68	2	*0*	67	3	*0*	66	4	*0*
R 4. 4 W,*		SFR	2	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	65	1	*0*	64	2	*0*	63	3	*0*
R 4. 5 W,*		SFR	1	66 MOD	67	67	1	0	B (67)	A/E	--	--	--	--	--	--	67	0	*0*	65	2	*0*	64	3	*0*
R 4. 6 W	--	SFR	2	68 M,LT19,CAL	69	69	1	0	B (67)	A/E	--	--	--	--	--	--	68	1	*0*	67	2	*0*	66	3	*0*
R 4. 7 W		SFR	2	67 MOD	68	68	1	0	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66	2	*0*	65	3	*0*
R 4. 8 W,*	S1009 R/W/ Shoulder	SFR	2	65 MOD	66	66	1	0	B (67)	A/E	66	0	*0*	65	1	*0*	64	2	*0*	64	2	*0*	63	3	*0*
R 4. 9 *		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	64	1	*0*	64	1	*0*	63	2	*0*	63	2	*0*	63	2	*0*
R 4. 10		REC	3	73 MOD	74	74	1	0	B (67)	A/E	70	4	*0*	69	5	*3*	**68 R,T**	**6**	***3***	66	8	*3*	65	9	*3*
R 4. 11 C		REC	2	73 MOD	74	74	1	0	B (67)	A/E	67 T	7	*2*	66	8	*2*	**65 R,5**	**9**	***2***	63	11	*2*	62	12	*2*
R 4. 12		REC	1	70 MOD	71	68	1	-3	B (67)	A/E	64	4	*0*	63 T	5	*1*	**62 R,5**	**6**	***1***	62	6	*1*	61	7	*1*
R 4. 13 W		SFR	5	62 MOD	63	62	1	-1	B (67)	NONE	58 T	4	*0*	58	4	*0*	**57 R**	**5**	***5***	57	5	*5*	56	6	*5*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 14A W	S182 Shoulder	SFR	1	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	65	2	0	65	2	0	64	3	0
R 4. 14 W		SFR	3	67 MOD	68	68	1	0	B (67)	A/E	--	--	--	--	--	--	67	1	0	66	2	0	65	3	0
R 4. 15 W		SFR	3	64 M,LT17,CAL	65	68	1	3	B (67)	A/E	--	--	--	--	--	--	67	1	0	66	2	0	65	3	0
R 4. 16 W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	63	2	0	62	3	0	61	4	0
R 4. 17 W		SFR	4	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	65	2	0	64	3	0
R 4. 18 W		SFR	4	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	64	1	0	63	2	0	62	3	0
R 4. 19 W		SFR	1	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	63	1	0	62	2	0	62	2	0
R 4. 20 W,*		SFR	2	61 MOD	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	62	1	0	61	2	0	61	2	0
R 4. 21 W		SFR	1	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	0	62	2	0	62	2	0
R 4. 22 W		--	--	61 M,ST30	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	63	0	0	62	1	0	62	1	0
R 4. 23 W	S972 & S978 Shoulder	SFR	2	61 MOD	63	62	2	-1	B (67)	NONE	--	--	--	--	--	--	59	3	0	59	3	0	58	4	0
R 4. 24		SCH	3	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	62 T	4	0	**61 R**	**5**	**3**	60	6	3
R 4. 25A C		REC	2	69 MOD	69	70	0	1	B (67)	A/E	65	5	2	64	6	2	**63 R,T**	**7**	**2**	62	8	2	61	9	2
R 4. 25B		REC	2	65 MOD	65	68	0	3	B (67)	A/E	64	4	0	63	5	2	**62 R,T**	**6**	**2**	61	7	2	60	8	2
R 4. 25		REC	2	67 M,ST31	67	67	0	0	B (67)	A/E	63	4	0	63	4	0	**62 R,T**	**5**	**2**	61	6	2	60	7	2
R 4. 26		REC	2	65 MOD	65	63	0	-2	B (67)	NONE	62	1	0	61	2	0	61	2	0	61	2	0	60	3	0
R 4. 27 W	--	MFR	1	69 MOD	70	71	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	70	1	0
R 4. 28 W		MFR	3	64 M,ST32A	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 4. 29 W		MFR	1	68 M,ST32	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 4. 29A W		MFR	1	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	1	0
R 4. 30 W		MFR	1	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	2	0
R 4. 31 W		MFR	7	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	2	0
R 4. 31A W		MFR	1	66 MOD	67	67	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	63	4	0
R 4. 32 C	S998 R/W	SFR	2	71 M,LT18,CAL	72	72	1	0	B (67)	A/E	70	2	0	69	3	0	68 T	4	0	68	4	0	**67 R**	**5**	**2**
R 4. 33A	S1006 R/W	MOT	--	75 MOD	78	79	3	1	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 33A Int		MOT	6	50 MOD	53	54	3	1	E (52)	A/E	46	8	6	**45 R**	**9**	**6**	43	11	6	42	12	6	41	13	6
R 4. 33 C		MOT	1	73 M,ST33	76	77	3	1	B (67)	A/E	70	7	1	**69 R,T**	**8**	**1**	68	9	1	67	10	1	66	11	1

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 34	--	SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 34A		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 35 W	--	SFR	3	64 M,ST36	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	2	0	63	3	0
R 4. 36 W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 4. 37 W,*	--	SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	64	1	0
R 4. 38 W		SFR	2	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	66	2	0
R 4. 39 W		SFR	3	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 40 W,*		SFR	2	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 4. 41 W		SFR	7	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 42 W		SFR	7	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 42A W,*		SFR	1	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	1	0	58	3	0
R 4. 43 W		SFR	5	67 M,LT21,CAL	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 44 W		SFR	4	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	66	2	0
R 4. 45 W,*		SFR	2	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	2	0	58	3	0
R 4. 46 W		SFR	8	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 46A W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 4. 47A W,*		SFR	2	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 4. 47 W		SFR	4	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 48 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63 T	1	0	61	3	0
R 4. 49 W	--	SFR	2	65 MOD	67	68	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 50 W	--	SFR	2	65 M,ST38	67	68	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	0	0	66	2	0
R 4. 50A W	--	SFR	2	63	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	2	0	63	3	0
R 4. 51 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	61	3	0
R 4. 52 W	--	SFR	2	64 MOD	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	64	4	0
R 4. 53 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	61	3	0
R 4. 54 W	--	SFR	2	66 MOD	68	69	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 55 W,*	--	SFR	2	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	63	3	0
R 4. 56 W	--	SFR	2	66 MOD	68	68	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 57 W,*	--	SFR	4	60 MOD	62	63	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	61	2	0
R 4. 58 W	--	SFR	2	66 MOD	68	68	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	66	2	0
R 4. 59 W,*	S1079 & S1083 R/W	SFR	3	61 MOD	64	66	3	2	B (67)	A/E	66	0	0	66	0	0	66	0	0	65	1	0	64	2	0
R 4. 60 W,C	S1079 & S1083 R/W	SFR	1	64 MOD	67	73	3	6	B (67)	A/E	70	3	0	69	4	0	69 T	4	0	**68 R**	**5**	**1**	66	7	1
R 4. 60A W,*	S1079 & S1083 R/W	SFR	1	62 MOD	65	67	3	2	B (67)	A/E	66	1	0	66	1	0	65	2	0	64	3	0	63	4	0
R 4. 61 W	S1079 & S1083 R/W	SFR	2	65 M,ST38A	68	72	3	4	B (67)	A/E	69	3	0	68	4	0	**67 R,T**	**5**	**2**	65	7	2	65	7	2
R 4. 62 W	S1079 & S1083 R/W	SFR	2	62 MOD	65	69	3	4	B (67)	A/E	66	3	0	65	4	0	**64 R,T**	**5**	**2**	63	6	2	62	7	2
R 4. 62A W	R/W	SFR	1	59 MOD	62	64	3	2	B (67)	NONE	63	1	0	62	2	0	62	2	0	61	3	0	61	3	0
R 4. 62B W	R/W	SFR	2	58 MOD	61	63	3	2	B (67)	NONE	62	1	0	62	1	0	61	2	0	61	2	0	60	3	0
R 4. 63 W	R/W	SFR	2	57 MOD	60	62	3	2	B (67)	NONE	62	0	0	61	1	0	61	1	0	60	2	0	60	2	0

Notes:

1 - $L_{eq(h)}$ are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR
R 4. 64A	--	SFR	3	59 MOD	59	57	0	-2	B (67)	NONE	56	1	0	56	1	0	55	2	0	55	2	0	55	2	0
R 4. 64B		--	--	66 MOD	66	62	0	-4	B (67)	NONE	59	3	--	59	3	--	59	3	--	58	4	--	58	4	--
R 4. 64C	S1016 & S1020 Shoulder S1024 R/W	SCH	1	71 MOD	71	69	0	-2	B (67)	A/E	67	2	0	65	4	0	64	5	1	**63 R,T**	**6**	**1**	62	7	1
R 4. 64D		SCH	1	68 MOD	68	67	0	-1	B (67)	A/E	65	2	0	64	3	0	63	4	0	62 T	5	1	**62 R,5**	**5**	**1**
R 4. 64 W		REC	3	72 MOD	72	72	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	69 T	3	0	**67 R**	**5**	**3**
R 4. 65 W,C		REC	3	69 M,ST35	69	73	0	4	B (67)	A/E	--	--	--	--	--	--	--	--	--	69 T	4	0	**68 R**	**5**	**3**
R 4. 66 W,C	S1026 & S1028 R/W	SFR	1	71 MOD	71	72	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	68	4	0	**67 R**	**5**	**1**
R 4. 67 W	--	SFR	3	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 68 W		SFR	5	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	2	0	67	3	0
R 4. 69 W		SFR	5	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 70 W		SFR	7	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 71 W,*		SFR	3	59 MOD	61	62	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	2	0	59	3	0
R 4. 72 W		SFR	10	68 M,LT20,CAL	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 73 W		SFR	8	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 74 W		SFR	8	69 MOD	69	70	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 75 W,*		SFR	2	60 MOD	62	63	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	60	3	0
R 4. 76 W,*		--	--	60 M,ST35A	62	63	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	60	3	0
R 4. 77 W,*		SFR	1	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	62	3	0
R 4. 78 W		SFR	3	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 79 W,*	--	MH	2	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 4. 80 W		MH	6	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 80A W		MH	7	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 81 W		MH	5	67 M,ST37	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	66	2	0
R 4. 82 W,*		MH	3	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 83 W		MH	3	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 83A W,*	R/W	MH	2	66 MOD	66	67	0	1	B (67)	A/E	66	1	0	66	1	0	66	1	0	64	3	0	63	4	0
R 4. 83B W,*		MH	2	64 MOD	64	65	0	1	B (67)	NONE	64	1	0	64	1	0	64	1	0	63	2	0	62	3	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 84 W	--	MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 85 W		MH	7	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 86 W,*		MH	5	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 87 W		MH	12	60 M,LT20B,CAL	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88 W,*		MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88A W		MH	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 89 W		MH	4	62 MOD	64	63	2	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 90 W		MH	6	59 MOD	61	60	2	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 91 W		MH	9	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 92 W	--	MH	7	61 M,ST37A	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 93 W		MH	3	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-4 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 94 W	--	SFR	4	61 MOD	62	62	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 95 W		SFR	5	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 96 W,*		SFR	2	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 97 W		SFR	7	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 98 W		SFR	4	62 M,ST37A	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 99 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 100 W,*		SFR	2	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 101 W		SFR	9	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 102 W		SFR	4	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 103 W		SFR	6	63 M,LT20A,CAL	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 104 W		SFR	7	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 105 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 106 W		SFR	7	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 107 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 108 W		SFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 109 W		SFR	3	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 110 W		SFR	1	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-5 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 5

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 1 W	--	SFR	5	62 MOD	61	62	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 2 W		SFR	5	62 MOD	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 3 W		SFR	4	62 M,ST39,CAL	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 4 W		SFR	4	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 5 W	--	SFR	3	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 6 W,*		SFR	1	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 7 W,*		SFR	2	55 MOD	56	57	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 8 W		SFR	3	61 M,ST40	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 9 W		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 10 W		SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-5 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 11 W,K7	--	SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 12 W,K7,*		SFR	4	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 13 W,K7		SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 14 W,K7,*		SFR	4	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 15 W,K7		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 16 W,K7,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 17 W,K7		SFR	2	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 18 W,K7,*		SFR	4	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 19 W,K7		SFR	2	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 20 W,K7,*		SFR	4	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 21 W,K7		SFR	2	65 MOD	64	64	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 22 W,K7,*		SFR	4	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 23 W,K7		REC	4	68 M,ST41	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 24 W,K7		SFR	12	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 25 W,K7		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 18 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K7 - A calibration factor of +1.8 dB is applied for these receivers.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-5 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 26 W,K7	--	SFR	2	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 27 W,K7,*		SFR	4	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 28 W,K7		SFR	2	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 29 W,K7,*		SFR	4	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 30 W,K7		SFR	2	69 MOD	69	68	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 31 W,K7,*		SFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 32 W,K7		SFR	4	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 33 W,K7		SFR	2	68 M,ST41A	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 34 W,K7,*		SFR	4	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 35 W,K7		SFR	8	69 MOD	68	68	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 36 W,K7,*		SFR	4	60 MOD	59	59	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 37 W,K7		SFR	4	68 M,LT22,CAL	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 37A W,K7,*		SFR	4	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 38 W,K7		REC	2	68 MOD	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 18 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K7 - A calibration factor of +1.8 dB is applied for these receivers.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-5 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 39 W,K8	S1162	REC	1	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	64	2	0	62 T	4	0	62	4	0	64 7	2	0
R 5. 40 W,K8,C	Shoulder	REC	1	66 M,ST42	67	68	1	1	B (67)	A/E	--	--	--	66	2	0	**63** R,T	**5**	1	63	5	1	64 7	4	0
R 5. 41 W	--	MFR	3	64 MOD	63	63	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 42 W		MFR	4	63 MOD	62	63	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - These noise levels are not reliable due to issues with procedures used in TNM to calculate noise levels when two parallel walls intervene between source and receiver.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

W - Reciever protected by existing private property wall or soundwall.

C - Critical design receiver.

* - Non first row residences.

K8 - An adjustment factor of -1 dB is applied for these receivers to account for the transmission loss from an intervening tarp-covered fence.

Table G-6 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 6

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 1 W,*	S431 Shoulder	MFR	2	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	59	2	0	58	3	0
R 6. 2 W		MFR	2	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	65	1	0	64	2	0	63	3	0
R 6. 3 W		MFR	2	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	68	1	0	68	1	0	67	2	0
R 6. 4 W		MFR	2	64 M,LT24	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	1	0
R 6. 5 W		MFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 6 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 7 W,*		MFR	2	60 MOD	60	60	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	59	1	0
R 6. 8 W		MFR	4	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 9 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 10 W		MFR	4	68 MOD	68	67	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 11 W		MFR	4	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 12 W	S445 Shoulder	MFR	3	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	1	0
R 6. 13 W		MFR	4	64 M,ST43	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 14 W		MFR	3	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	0	0
R 6. 15 W		MFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	0
R 6. 16 W,*		MFR	6	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	0
R 6. 17 W		MFR	6	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	0
R 6. 18 W		REL	1	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	0	0
R 6. 19 W	--	LIB	--	65 MOD	65	65	0	0	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 19 W,Int		LIB	1	45 MOD	45	45	0	0	E (52)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-6 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 20 W	--	SFR	4	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	59	0	0	58	1	0	56	3	0
R 6. 21 W,*		SFR	1	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	58	0	0	57	1	0	57	1	0
R 6. 22 W		SFR	5	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	59	2	0	59	2	0
R 6. 23 W		SFR	4	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	63	1	0	62	2	0	62	2	0
R 6. 24 W	--	SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	66	1	0	65	2	0
R 6. 25 W,*		SFR	13	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	59	2	0	59	2	0
R 6. 26 W	S434 Shoulder	SFR	3	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	2	0
R 6. 27 W		SFR	2	67 M,LT23	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 28 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 6. 29 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 30 W,*	--	SFR	1	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	60	1	0
R 6. 31 W		SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 32 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	0
R 6. 33 W		SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 34 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	2	0
R 6. 34A W		SFR	2	66 MOD	66	67	0	1	B (67)	A/E	67	0	0	66 T	1	0	65	2	0	64	3	0	64	3	0
R 6. 35	S1226 R/W	SFR	1	64 MOD	68	70	4	2	B (67)	A/E	69	1	0	67 T	3	0	66	4	0	66	4	0	66	4	0
R 6. 35A		SFR	1	64 MOD	68	70	4	2	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	**65 R**	**5**	***1***
R 6. 36		SFR	1	65 MOD	69	70	4	1	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	**65 R**	**5**	***1***
R 6. 36A C		SFR	2	66 MOD	70	71	4	1	B (67)	A/E	70	1	0	68 T	3	0	67	4	0	67	4	0	**66 R**	**5**	***2***
R 6. 37	--	SFR	2	63 M,ST44	67	68	4	1	B (67)	A/E	68	0	0	67	1	0	67 T	1	0	67	1	0	66	2	0

Notes:

1 - $L_{eq(h)}$ are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - Existing soundwall is at a height of 16 feet.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

C - Critical design receiver.

Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.

W - Reciever protected by existing private property wall or soundwall.

* - Non first row residences.

Table G-6 – Predicted Future Noise Levels and Barrier Analysis – Alternative 1 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 1 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 38 W	--	SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 39 W		SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 40 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 41 W		SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 42 W		SFR	5	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 43 W		SFR	4	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 44 W,*		SFR	2	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 45 W	S464	SFR	1	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 46 W	R/W	SFR	1	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 47 W	--	SFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 48 W,*		SFR	2	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 49 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 50 W		SFR	3	64 M,LT25	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 51 W		SFR	4	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 52 W		SFR	3	68 MOD,F	64	64	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 53 W,*		SFR	2	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 54 W		SFR	4	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 55 W		SFR	3	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 56 W		SFR	3	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 57 W		SFR	3	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 58 W		SFR	3	63 M,ST45,F	59	59	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 59 W		SFR	3	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 60 W,*		SFR	5	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 61 W		SFR	2	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
F - At these receivers, the existing noise measurements were conducted before the construction of a soundwall that is part of the WCC project but is included in all future alternatives; therefore, there is a 4 dB reduction in future traffic noise levels.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-7 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 1

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1.88 W	--	SFR	4	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	0	0
R 1.89 W		SFR	3	69 MOD	68	68	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 1.90 W	--	SFR	4	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.91 W*		SFR	3	63 MOD	62	62	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.92 W		SFR	5	68 M,LT5,CAL	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.93 W		SFR	4	67 MOD	66	67	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.94 W*		SFR	2	58 M,ST9A,CAL	57	57	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.95 W	S649 Shoulder	SFR	5	67 MOD	68	67	1	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 1.96 W*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.97 W		SFR	4	64 M,ST9	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.98 W		SFR	4	64 MOD	65	64	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.99 W		SFR	2	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.100 W*		SFR	2	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.101 W		REC	3	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.102 W		REC	2	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.103 W		REC	1	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-8 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 2

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.1 W	S699 R/W	MFR	3	65 MOD	62	62	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2 W		MFR	3	63 MOD	60	62	-3	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2A W		MFR	1	65 MOD	62	63	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.3 W		MFR	6	68 M,LT6,CAL	65	64	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4 W		MFR	3	62 MOD	59	58	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4A W		MFR	2	65 MOD	62	61	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.5 W	S705 Shoulder	MFR	3	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.6 W		MFR	6	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.7 W		MFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	0	*0*	63	1	*0*
R 2.8 W		MFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.8A W		MFR	2	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	57	3	*0*	56	4	*0*
R 2.9 W		MFR	4	62 M,ST11	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	3	*0*	60	4	*0*
R 2.10 W	--	MFR	6	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.11 W		MFR	8	57 MOD	58	58	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.12 W	--	SFR	3	62 MOD	63	65	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.13 W	S708, S710, & S718 Shoulder & R/W	SFR	2	57 M,ST12,CAL	58	63	1	5	B (67)	NONE	62	1	*0*	62	1	*0*	62	1	*0*	61	2	*0*	60	3	*0*
R 2.14 W,K3		SFR	2	67 MOD	68	71	1	3	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	69	2	*0*	68	3	*0*
R 2.15 W,K3		REC	2	68 MOD	69	71	1	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	69	2	*0*	68	3	*0*
R 2.16 W,K3		REC	0	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	*0*	63	2	*0*
R 2.17 W,K3		SFR	1	66 MOD	66	68	0	2	B (67)	A/E	68	0	*0*	67	1	*0*	67 T	1	*0*	65	3	*0*	64	4	*0*
R 2.18 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	66	2	*0*	64 T	4	*0*	**63 R**	**5**	*3*	62	6	*3*
R 2.19 W,K3		SFR	4	67 M,LT7,CAL	67	68	0	1	B (67)	A/E	68	0	*0*	66	2	*0*	64 T	4	*0*	**62 R**	**6**	*4*	61	7	*4*
R 2.20 W,K3		SFR	4	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64 T	4	*4*	**62 R**	**6**	*4*	61	7	*4*
R 2.21 W*		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	63	0	*0*	63	0	*0*	60	3	*0*	60	3	*0*	59	4	*0*
R 2.21A W*		--	--	60 M,ST12A	61	62	1	1	--	--	63	-1	*0*	63	-1	*0*	60	2	*0*	60	2	*0*	59	3	*0*
R 2.22 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64	4	*0*	**62 T,R**	**6**	*3*	61	7	*3*
R 2.23 W*		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	63	0	*0*	63	0	*0*	62	1	*0*	60	3	*0*	59	4	*0*
R 2.24 W,K3,C		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64	4	*0*	62 T	6	*3*	**62 R,5**	**6**	*3*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-8 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.25 W,K3	S718 Shoulder	SFR	2	66 MOD	67	69	1	2	B (67)	A/E	67	2	0	67	2	0	66	3	0	65 T	4	0	**64** R	**5**	2
R 2.26 W*		SFR	2	60 MOD	61	62	1	1	B (67)	NONE	62	0	0	62	0	0	61	1	0	59	3	0	59	3	0
R 2.27 W,K3		SFR	2	66 MOD	67	67	1	0	B (67)	A/E	65	2	0	64	3	0	64	3	0	63 T	4	0	**62** R	**5**	2
R 2.28 W,K4		SFR	3	58 M,ST13,CAL	59	58	1	-1	B (67)	NONE	54	4	0	54	4	0	**53** R	**5**	3	53	5	3	52	6	3
R 2.29 W,K4		SFR	3	58 MOD	59	56	1	-3	B (67)	NONE	53	3	0	53	3	0	53	3	0	52	4	0	52	4	0
R 2.30 W,K4		SFR	1	56 MOD	57	54	1	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.31 W	--	SFR	3	59 MOD	61	56	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.32 W		SFR	3	60 MOD	62	57	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33 W		SFR	3	62 MOD	64	59	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33A W		--	--	63 MOD	65	62	2	-3	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.34 W,C	S733 Shoulder	SFR	1	66 MOD	68	68	2	0	B (67)	A/E	64	4	0	63	5	1	**63** T,R	**5**	1	62	6	1	61	7	1
R 2.35 W	--	SFR	3	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65 T	1	0	64	2	0
R 2.36 W*		SFR	2	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	0	62	3	0
R 2.37 W		SFR	2	64 M,LT8	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	67	1	0	66	2	0
R 2.38 W*		SFR	2	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67 T	0	0	66	1	0
R 2.39 W		SFR	2	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	0	65	2	0
R 2.40 W	S745 R/W	SFR	2	67 MOD	69	72	2	3	B (67)	A/E	--	--	--	--	--	--	68	4	0	**67** T,R	**5**	2	66	6	2
R 2.41 W,C,P		SCH	1	63 M,ST15	69	72	6	3	B (67)	A/E	--	--	--	--	--	--	67	5	1	**66** T,R	**6**	1	65	7	1
R 2.42 W,P		SCH	1	58 MOD	64	66	6	2	B (67)	A/E	63	3	0	63	3	0	62	4	0	**61** T,R	**5**	1	61	5	1
R 2.43	--	MOT	1	51 MOD	53	53	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.44		MOT	1	55 MOD	57	58	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
P - Design Year No Build and Build noise levels do not account for the privacy screen that was present at the time of measurement
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
K4 - A calibration factor of -3 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-8 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.45 W	S746 R/W	SFR	1	59 MOD	61	65	2	4	B (67)	NONE	62	3	*0*	61	4	*0*	61	4	*0*	60	5	*1*	60	5	*1*
R 2.45A W		SFR	1	57 MOD	59	61	2	2	B (67)	NONE	60	1	*0*	59	2	*0*	59	2	*0*	59	2	*0*	59	2	*0*
R 2.46 W,C		SCH	1	68 M,ST16	70	75	2	5	B (67)	A/E	69	6	*1*	68	7	*1*	**68** T,R	**7**	*1*	68	7	*1*	67	8	*1*
R 2.47 W	--	SFR	2	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	*0*
R 2.48 W		SFR	1	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	*0*
R 2.49 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 2.50 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	60	0	*0*
R 2.51 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 2.52 W		SFR	4	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 2.53 W		SFR	4	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 2.54 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	58	2	*0*
R 2.55 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	*0*
R 2.56 W		SFR	3	65 M,LT9,CAL	65	67	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	*0*
R 2.57 W*	S766 R/W	SFR	2	58 MOD	58	60	0	2	B (67)	NONE	59	1	*0*	59	1	*0*	59 T	1	*0*	59	1	*0*	59	1	*0*
R 2.58 W		SFR	2	65 MOD	65	69	0	4	B (67)	A/E	68	1	*0*	68 T	1	*0*	68	1	*0*	68	1	*0*	68	1	*0*
R 2.59 W		SFR	2	61 MOD	61	67	0	6	B (67)	A/E	65	2	*0*	65 T	2	*0*	64	3	*0*	64	3	*0*	64	3	*0*
R 2.60 W	--	MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61 W		MFR	2	60 M,ST17	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61A W		--	--	66 M,ST17A	64	66	-2	2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.62 W		MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.63 W	S765 R/W	SFR	1	62 MOD	61	67	-1	6	B (67)	A/E	66	1	*0*	65	2	*0*	65	2	*0*	64 T	3	*0*	63	4	*0*
R 2.64 W		SFR	2	64 MOD	63	69	-1	6	B (67)	A/E	68	1	*0*	67	2	*0*	66	3	*0*	65 T	4	*0*	65	4	*0*
R 2.65 W		SFR	1	67 M,LT10,CAL	66	70	-1	4	B (67)	A/E	69	1	*0*	69	1	*0*	68 T	2	*0*	68	2	*0*	68	2	*0*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-8 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.66 W	--	SFR	3	66 MOD	65	66	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.67 W*	--	SFR	1	60 MOD	59	61	-1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.68 W	--	SFR	2	55 MOD	54	54	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.69 W	--	SFR	3	65 MOD	64	66	-1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.70 W*	--	SFR	1	58 MOD	57	58	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.71 W	--	SFR	3	64 MOD	63	64	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.72 W*	--	SFR	2	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.73 W*	--	SFR	2	54 MOD	53	54	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 2.74 W	--	SFR	3	64 MOD	63	63	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.75 W	--	SFR	3	64 MOD	63	61	-1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.76 W	--	SFR	4	64 MOD	63	58	-1	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.77 W	--	MFR	2	60 MOD	61	61	1	0	B (67)	NONE	59	2	*0*	58	3	*0*	58	3	*0*	58	3	*0*	58	3	*0*
R 2.78 W	--	MFR	4	61 M,ST19	62	61	1	-1	B (67)	NONE	58	3	*0*	58	3	*0*	57	4	*0*	57	4	*0*	57	4	*0*
R 2.79 W	--	MFR	4	65 MOD	66	62	1	-4	B (67)	NONE	59	3	*0*	59	3	*0*	58	4	*0*	58	4	*0*	58	4	*0*
R 2.80 W	S786, S788, & S792 Shoulder	SFR	3	64 MOD	65	64	1	-1	B (67)	NONE	61	3	*0*	61	3	*0*	61	3	*0*	60	4	*0*	60	4	*0*
R 2.81 W,C	S786, S788, & S792 Shoulder	SFR	3	68 MOD	69	67	1	-2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	63	4	*0*	**62** R	**5**	*3*
R 2.82 W	S786, S788, & S792 Shoulder	SFR	2	67 MOD	68	68	1	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	65	3	*0*	64	4	*0*
R 2.83 W	S786, S788, & S792 Shoulder	SFR	3	66 MOD	66	65	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 2.84 W	S786, S788, & S792 Shoulder	SFR	4	66 M,LT11,CAL	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	65	1	*0*	64	2	*0*
R 2.85 W	S786, S788, & S792 Shoulder	SFR	4	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	*0*	65	2	*0*
R 2.86 W	--	SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 2.87 W	--	SFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.88 W	--	SFR	4	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.89 W	--	SFR	3	63 MOD	63	60	0	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.90 W	--	SFR	3	62 MOD	62	59	0	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.91 W	--	SFR	2	63 MOD	63	62	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.92 W	--	SFR	1	61 MOD	61	61	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-9 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 3

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.1 W	--	MFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.2 W	--	MFR	5	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.3 W	--	MFR	7	65 M,ST22	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	65	0	*0*	64	1	*0*	63 T	2	*0*
R 3.4 W	--	MFR	2	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66 T	2	*0*	65	3	*0*
R 3.5 W*	--	SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	66	0	*0*	65	1	*0*	63 T	3	*0*
R 3.6 W	--	SFR	2	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	68	1	*0*	66 T	3	*0*	66	3	*0*
R 3.7 W	--	SFR	4	65 MOD	65	69	0	4	B (67)	A/E	--	--	--	--	--	--	67	2	*0*	67 T	2	*0*	65	4	*0*
R 3.8 W	--	SFR	4	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69	1	*0*	68 T	2	*0*	67	3	*0*
R 3.9 W	--	SFR	2	68 M,LT13,CAL	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	1	*0*	68	2	*0*	67	3	*0*
R 3.10 W	--	SFR	2	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	1	*0*	68	2	*0*	67	3	*0*
R 3.11 W*	--	SFR	5	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	65	0	*0*	64	1	*0*	64	1	*0*
R 3.12 W	--	SFR	1	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	2	*0*	68	3	*0*	67	4	*0*
R 3.13 W*	S834 Shoulder	SFR	3	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	66 T	3	*0*	65	4	*0*	**64 R**	**5**	*2*
R 3.14 W	S834 Shoulder	SFR	2	68 MOD	68	71	0	3	B (67)	A/E	--	--	--	--	--	--	68	3	*0*	67	4	*0*	**66 R**	**5**	*2*
R 3.15 W*	S834 Shoulder	SFR	4	62 MOD	62	64	0	2	B (67)	NONE	62	2	*0*	61	3	*0*	60	4	*0*	59	5	*3*	59	5	*3*
R 3.16 W,C	S834 Shoulder	SFR	1	70 MOD	70	72	0	2	B (67)	A/E	--	--	--	--	--	--	69	3	*0*	68	4	*0*	**67 R**	**5**	*1*
R 3.17 W	S834 Shoulder	SFR	2	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	69	2	*0*	68	3	*0*	67	4	*0*
R 3.17A W	S834 Shoulder	--	--	68 M,ST23	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	67	3	--	66	4	--	65	5	--
R 3.18 W	S834 Shoulder	SFR	1	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	68	2	*0*	67	3	*0*	66	4	*0*
R 3.19 W*	S834 Shoulder	SFR	2	60 MOD	60	62	0	2	B (67)	NONE	60	2	*0*	60	2	*0*	59	3	*0*	59	3	*0*	58	4	*0*
R 3.19A W*	S834 Shoulder	SFR	1	63 MOD	63	65	0	2	B (67)	NONE	62	3	*0*	62	3	*0*	61	4	*0*	60	5	*1*	60	5	*1*
R 3.20 W	S834 Shoulder	SFR	2	65 MOD	65	67	0	2	B (67)	A/E	64	3	*0*	63	4	*0*	63 T	4	*0*	63	4	*0*	**62 R**	**5**	*2*
R 3.21 W*	S834 Shoulder	SFR	2	60 MOD	60	62	0	2	B (67)	NONE	60	2	*0*	60	2	*0*	59	3	*0*	59	3	*0*	58	4	*0*
R 3.22 W*	--	MFR	8	55 MOD	56	56	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.22A W	--	MFR	2	54 M,ST20	55	56	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.23 W*	--	MFR	9	51 MOD	52	52	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-9 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.23A	S807 Shoulder & S811 R/W	REC	--	62 MOD	63	64	1	1	B (67)	NONE	61	3	--	61	3	--	60	4	--	59	5	--	59	5	--
R 3.23B C		REC	7	65 MOD	66	69	1	3	B (67)	A/E	65	4	*0*	65	4	*0*	**63** T,R	**6**	*7*	62	7	*7*	62	7	*7*
R 3.24 K1,W		SFR	2	64 MOD	65	67	1	2	B (67)	A/E	--	--	--	--	--	--	65 T	2	*0*	63	4	*0*	**62** R	**5**	*2*
R 3.25 K1,W*		SFR	2	59 MOD	60	63	1	3	B (67)	NONE	--	--	--	--	--	--	60	3	*0*	59	4	*0*	59	4	*0*
R 3.26 K1,W	S827 Shoulder	SFR	3	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	63	3	*0*	63	3	*0*	63	3	*0*
R 3.27 K1,W*		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	62	4	*0*	62	4	*0*	62	4	*0*
R 3.28 K1,W		SFR	3	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	63	3	*0*	63	3	*0*	63	3	*0*
R 3.28A K1,W		--	--	64 M,CAL	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	64	1	--	63	2	--	62	3	--
R 3.29 K1,W*		SFR	2	60 MOD	61	60	1	-1	B (67)	NONE	--	--	--	--	--	--	59	1	*0*	58	2	*0*	57	3	*0*
R 3.30 K,1W	S827 Shoulder	SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	3	*0*	58	3	*0*
R 3.31 K1,W		SFR	2	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	0	*0*	62	1	*0*
R 3.32 K1,W		SFR	4	64 M,LT12	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.33 K1,W		SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 3.34 K1,W*		SFR	2	63 MOD	64	62	1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	1	*0*	61	1	*0*
R 3.35 K1,W		SFR	1	66 M,ST21	65	65	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.36 K1,W*		SFR	3	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	57	2	*0*
R 3.37 K1,W*		SFR	2	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	0	*0*	60	1	*0*
R 3.38 K1,W		SFR	2	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.39 K1,W*		SFR	3	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	56	3	*0*
R 3.40 K1,W		SFR	5	62 MOD	63	65	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.41 K1,W*		SFR	3	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	56	3	*0*
R 3.42 K1,W		SFR	3	62 MOD	63	68	1	5	B (67)	A/E	--	--	--	--	--	--	64	4	*0*	65	3	*0*	64	4	*0*
R 3.43 W	--	MFR	8	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.44 W*		MFR	7	59 MOD	59	61	0	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.45 W		MFR	10	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.46 W		MFR	8	56 MOD	56	57	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K1 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-9 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.47 W	S841 Shoulder	SFR	2	62 MOD	63	68	1	5	B (67)	A/E	64	4	0	63	5	1	**62 T,R**	**6**	2	62	6	2	61	7	2
R 3.48 C		SFR	1	69 MOD	70	76	1	6	B (67)	A/E	69	7	1	68	8	1	**66 T,R**	**10**	1	66	10	1	65	11	1
R 3.49 W		SFR	2	60 MOD	61	63	1	2	B (67)	NONE	61	2	0	61	2	0	60	3	0	59	4	0	59	4	0
R 3.50 W		SFR	1	70 M,LT14	71	76	1	5	B (67)	A/E	70	6	1	69	7	1	68 T	8	1	**67 R,5**	**9**	1	66	10	1
R 3.51 W*		SFR	2	62 MOD	63	65	1	2	B (67)	NONE	63	2	0	62	3	0	61	4	0	60	5	2	59	6	2
R 3.52 W		REC	1	68 MOD	69	71	1	2	B (67)	A/E	68	3	0	67	4	0	67 T	4	0	**66 R**	**5**	1	66	5	1
R 3.53 W	--	MFR	6	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	2	0	64	3	0
R 3.53A W*		REC	5	54 MOD	56	58	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	55	3	0	55	3	0
R 3.54 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	65	1	0
R 3.54A W		MFR	3	62 M,ST24	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 3.55 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	0	0	65	1	0
R 3.55A W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 3.56 W,C	S857 Shoulder	MFR	7	67 MOD	69	71	2	2	B (67)	A/E	68	3	0	67	4	0	**66 T,R**	**5**	7	65	6	7	65	6	7
R 3.57 W	--	SFR	2	61 MOD	62	65	1	3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.58 W		SFR	3	60 MOD	61	63	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.59 W		SFR	4	61 MOD	62	64	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60 W		SFR	2	61 M,ST25A,CAL	62	64	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60A W		SFR	--	63 M,ST25	62	64	-1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.61 W*		SFR	7	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.62 W*		SFR	4	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.63 W,C	S868 R/W	SFR	1	65 MOD	66	67	1	1	B (67)	A/E	65	2	0	64	3	0	63	4	0	63 T	4	0	**60 R**	**7**	1
R 3.64 W	--	SFR	3	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	63	0	0	63	0	0	62	1	0
R 3.65 W		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	62	0	0	62	0	0	60	2	0
R 3.66 W		MFR	5	60 M,ST26	58	60	-2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66A W		MFR	8	56 MOD	54	55	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66B W		MFR	4	56 MOD	54	55	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-9 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.67 W	--	MH	4	58 MOD	60	61	2	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	60	1	0	59	2	0
R 3.68 W*		REC	1	52 MOD	54	56	2	2	B (67)	NONE	--	--	--	--	--	--	55	1	0	55	1	0	54	2	0
R 3.69 W		MH	4	62 MOD	64	66	2	2	B (67)	A/E	--	--	--	--	--	--	64	2	0	64	2	0	62	4	0
R 3.70 W		MH	4	64 MOD	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	67 T	1	0	66	2	0	65	3	0
R 3.71 W*		MH	7	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	68	1	0	67 T	2	0	66	3	0
R 3.72 W		MH	2	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.72A W		MH	2	63 M,ST27	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.73 W		MH	5	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.74 W*		MH	11	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.74A W		MH	2	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	68	1	0
R 3.75 W		MH	4	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	2	0
R 3.76 W*	S896 R/W	MH	2	63 MOD	65	67	2	2	B (67)	A/E	67	0	0	67	0	0	67	0	0	67 T	0	0	67	0	0
R 3.77 W		MH	3	62 MOD	64	68	2	4	B (67)	A/E	68	0	0	68 T	0	0	67	1	0	67	1	0	67	1	0
R 3.78 W*	S902 Shoulder	SFR	2	63 MOD	63	65	0	2	B (67)	NONE	--	--	--	65	0	0	64	1	0	63	2	0	63	2	0
R 3.79 W		REC	1	62 MOD	62	65	0	3	B (67)	NONE	--	--	--	65	0	0	63	2	0	61	4	0	60	5	1
R 3.80 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	63	1	0	62	2	0	61	3	0	60	4	0
R 3.81 W		SFR	2	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	67	1	0	66	2	0	66	2	0	65	3	0
R 3.81A W		SFR	3	66 M,LT15,CAL	66	66	0	0	B (67)	A/E	--	--	--	66	0	0	65	1	0	64	2	0	64	2	0
R 3.82 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	65	0	0	64	1	0	63	2	0	63	2	0
R 3.83 W		SFR	5	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	64	1	0	63	2	0	63	2	0	62	3	0
R 3.84 W	S910 & S916 Shoulder	SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	64	1	0	63	2	0	62	3	0	62	3	0
R 3.85 W		SFR	2	66 MOD	66	67	0	1	B (67)	A/E	64	3	0	63 T	4	0	**62 R**	**5**	2	62	5	2	61	6	2
R 3.86 W,C		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	65	2	0	63 T	4	0	**62 R**	**5**	3	61	6	3	60	7	3
R 3.86A W		SFR	2	65 MOD	65	67	0	2	B (67)	A/E	64	3	0	62	5	2	**62 T,R**	**5**	2	60	7	2	60	7	2

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-9 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.87 W	S907 Shoulder	REC	3	65 MOD	65	67	0	2	B (67)	A/E	63	4	*0*	62 T	5	*3*	**62 R,5**	**5**	*3*	61	6	*3*	61	6	*3*
R 3.88 W,C		REC	1	66 MOD	66	68	0	2	B (67)	A/E	63 T	5	*1*	63	5	*1*	**63 R,5**	**5**	*1*	62	6	*1*	62	6	*1*
R 3.89 W		REC	2	65 M, ST28	65	67	0	2	B (67)	A/E	63	4	*0*	63 T	4	*0*	**62 R**	**5**	*2*	62	5	*2*	62	5	*2*
R 3.90 W*	S141 Shoulder	SFR	1	64 MOD	64	63	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.91 W		SFR	3	64 MOD	64	63	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.92 W		SFR	4	65 MOD	64	63	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.93 W		SFR	4	67 MOD	66	64	-1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.93A W		SFR	3	67 M,LT16,Cal	66	65	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.94 W,*	S141 Shoulder	SFR	1	65 MOD	64	64	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	63	1	*0*
R 3.95 W		SFR	3	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	3	*0*	63	4	*0*
R 3.96 W		SFR	5	69 MOD	68	69	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	3	*0*	65	4	*0*
R 3.97 W,*		SFR	1	64 MOD	63	64	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	*0*	61	3	*0*
R 3.98 W		SFR	12	66 MOD	65	67	-1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	*0*	65	2	*0*
R 3.99 K2,W,C	S935 R/W	SFR	1	66 MOD	64	66	-2	2	B (67)	A/E	64	2	*0*	63 T	3	*0*	62	4	*0*	62	4	*0*	**61 R**	**5**	*1*
R 3.99A K2,W		SFR	2	65 M,ST29,Cal	63	64	-2	1	B (67)	NONE	63	1	*0*	62	2	*0*	61	3	*0*	60	4	*0*	60	4	*0*
R 3.100 K2,W		SFR	2	64 MOD	62	64	-2	2	B (67)	NONE	62	2	*0*	61	3	*0*	59	5	*2*	59	5	*2*	58	6	*2*
R 3.100A K2,W		SFR	1	64 MOD	62	63	-2	1	B (67)	NONE	61	2	*0*	60	3	*0*	59	4	*0*	57	6	*1*	57	6	*1*
R 3.101 K2,W		SFR	2	62 MOD	60	61	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K2 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 1 W,C	S995 R/W	SFR	2	69 MOD	70	72	1	2	B (67)	A/E	--	--	--	--	--	--	70	2	*0*	68 T	4	*0*	**67 R**	**5**	***2***
R 4. 2 W	--	SFR	3	69 MOD	70	71	1	1	B (67)	A/E	--	--	--	--	--	--	69	2	*0*	68	3	*0*	67	4	*0*
R 4. 3 W		SCH	3	68 MOD	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	69	1	*0*	68	2	*0*	67	3	*0*
R 4. 4 W,*		SFR	2	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	66	0	*0*	64	2	*0*	63	3	*0*
R 4. 5 W,*		SFR	1	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66	2	*0*	65	3	*0*
R 4. 6 W	--	SFR	2	68 M,LT19,CAL	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	69	1	*0*	68	2	*0*	67	3	*0*
R 4. 7 W	S1005 & S1009 R/W	SFR	2	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	68	1	*0*	67	2	*0*	66	3	*0*
R 4. 8 W,*		SFR	2	65 MOD	66	67	1	1	B (67)	A/E	66	1	*0*	66	1	*0*	65	2	*0*	64	3	*0*	64	3	*0*
R 4. 9 *		SFR	2	63 MOD	64	66	1	2	B (67)	A/E	65	1	*0*	65	1	*0*	64	2	*0*	63	3	*0*	63	3	*0*
R 4. 10		REC	3	73 MOD	74	75	1	1	B (67)	A/E	71	4	*0*	69	6	*3*	**68 R,T**	**7**	***3***	67	8	*3*	66	9	*3*
R 4. 11 C		REC	2	73 MOD	74	75	1	1	B (67)	A/E	67 T	8	*2*	66	9	*2*	**65 R,5**	**10**	***2***	64	11	*2*	63	12	*2*
R 4. 12		REC	1	70 MOD	71	68	1	-3	B (67)	A/E	64	4	*0*	64 T	4	*0*	**63 R**	**5**	***1***	62	6	*1*	62	6	*1*
R 4. 13 W		SFR	5	62 MOD	63	62	1	-1	B (67)	NONE	58 T	4	*0*	58	4	*0*	**57 R**	**5**	***5***	57	5	*5*	57	5	*5*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 14A W	S182 Shoulder	SFR	1	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	65	2	0	65	2	0
R 4. 14 W		SFR	3	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	67	2	0	66	3	0	65	4	0
R 4. 15 W		SFR	3	64 M,LT17,CAL	65	68	1	3	B (67)	A/E	--	--	--	--	--	--	67	1	0	66	2	0	65	3	0
R 4. 16 W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	64	1	0	63	2	0	62	3	0
R 4. 17 W		SFR	4	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	65	2	0	65	2	0
R 4. 18 W		SFR	4	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	64	1	0	64	1	0	63	2	0
R 4. 19 W		SFR	1	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	63	1	0	63	1	0	62	2	0
R 4. 20 W,*		SFR	2	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	0	62	2	0	61	3	0
R 4. 21 W		SFR	1	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	0	63	1	0	62	2	0
R 4. 22 W	S972 & S978 Shoulder	--	--	61 M,ST30	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	0	62	2	0	62	2	0
R 4. 23 W		SFR	2	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	-- T	--	--	60	4	0	60	4	0	**59 R,5**	**5**	***2***
R 4. 24		SCH	3	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	-- T	--	--	62	4	0	62	4	0	**61 R**	**5**	***3***
R 4. 25A C		REC	2	69 MOD	69	71	0	2	B (67)	A/E	66	5	2	65	6	2	**63 R,T**	**8**	***2***	63	8	2	62	9	2
R 4. 25B		REC	2	65 MOD	65	69	0	4	B (67)	A/E	64	5	2	64	5	2	**62 R,T**	**7**	***2***	61	8	2	61	8	2
R 4. 25		REC	2	67 M,ST31	67	68	0	1	B (67)	A/E	64	4	0	62	6	2	**62 R,T**	**6**	***2***	61	7	2	61	7	2
R 4. 26		REC	2	65 MOD	65	65	0	0	B (67)	NONE	62	3	0	62	3	0	62	3	0	61	4	0	60	5	2
R 4. 27 W	--	MFR	1	69 MOD	70	72	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	71	1	0
R 4. 28 W		MFR	3	64 M,ST32A	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 4. 29 W		MFR	1	68 M,ST32	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	68	1	0
R 4. 29A W		MFR	1	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 4. 30 W		MFR	1	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 4. 31 W		MFR	7	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	0
R 4. 31A W		MFR	1	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	64	4	0
R 4. 32 C	S998 R/W	SFR	2	71 M,LT18,CAL	72	73	1	1	B (67)	A/E	71	2	0	70	3	0	69 T	4	0	**68 R**	**5**	***2***	66	7	2
R 4. 33A	S1006 R/W	MOT	--	75 MOD	78	80	3	2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 33A Int		MOT	6	50 MOD	53	55	3	2	E (52)	A/E	47	8	6	**46 R,5**	**9**	***6***	45	10	6	44	11	6	43	12	6
R 4. 33 C		MOT	1	73 M,ST33	76	78	3	2	B (67)	A/E	71	7	1	**70 R,T**	**8**	***1***	68	10	1	67	11	1	66	12	1

Notes:

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* - Non first row residences.

Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 34	--	SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 34A		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 35 W	--	SFR	3	64 M,ST36	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 36 W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 4. 37 W,*	--	SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	65	1	0
R 4. 38 W		SFR	2	66 MOD	67	69	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 39 W		SFR	3	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 40 W,*		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 41 W		SFR	7	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 42 W		SFR	7	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 42A W,*		SFR	1	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	1	0	58	3	0
R 4. 43 W		SFR	5	67 M,LT21,CAL	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 44 W		SFR	4	66 MOD	67	69	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 45 W,*		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	2	0	58	4	0
R 4. 46 W		SFR	8	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 46A W,*		SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 47A W,*		SFR	2	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	0	0	65	2	0
R 4. 47 W		SFR	4	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0

Notes:

1 - $L_{eq(h)}$ are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 48 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63 T	1	0	61	3	0
R 4. 49 W	--	SFR	2	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 50 W	--	SFR	2	65 M,ST38	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 50A W	--	SFR	2	63	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	63	3	0
R 4. 51 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	61	3	0
R 4. 52 W	--	SFR	2	64 MOD	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 53 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	62	2	0
R 4. 54 W	--	SFR	2	66 MOD	68	70	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	2	0	66	4	0
R 4. 55 W,*	--	SFR	2	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	63	3	0
R 4. 56 W	--	SFR	2	66 MOD	68	69	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	65	4	0
R 4. 57 W,*	--	SFR	4	60 MOD	62	63	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	0	0	61	2	0
R 4. 58 W	--	SFR	2	66 MOD	68	68	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	66	2	0
R 4. 59 W,*	S1083 R/W	SFR	3	61 MOD	64	67	3	3	B (67)	A/E	67	0	0	66	1	0	66 T	1	0	66	1	0	65	2	0
R 4. 60 W	S1083 R/W	SFR	1	64 MOD	67	74	3	7	B (67)	A/E	70	4	0	70 T	4	0	**69 R**	**5**	***1***	68	6	1	67	7	1
R 4. 60A W,*	S1083 R/W	SFR	1	62 MOD	65	67	3	2	B (67)	A/E	67	0	0	66 T	1	0	66 T	1	0	64	3	0	63	4	0
R 4. 61 W	S1083 R/W	SFR	2	65 M,ST38A	68	72	3	4	B (67)	A/E	70	2	0	69	3	0	68 T	4	0	**67 R**	**5**	***2***	66	6	2
R 4. 62 W,C	S1083 R/W	SFR	2	62 MOD	65	70	3	5	B (67)	A/E	67	3	0	65	5	2	**64 R,T**	**6**	***2***	63	7	2	62	8	2
R 4. 62A W	R/W	SFR	1	59 MOD	62	65	3	3	B (67)	NONE	64	1	0	63	2	0	62	3	0	62	3	0	61	4	0
R 4. 62B W	R/W	SFR	2	58 MOD	61	64	3	3	B (67)	NONE	63	1	0	62	2	0	62	2	0	61	3	0	61	3	0
R 4. 63 W	R/W	SFR	2	57 MOD	60	62	3	2	B (67)	NONE	61	1	0	61	1	0	60	2	0	60	2	0	59	3	0

Notes:

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2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 64A	Shoulder	SFR	3	59 MOD	59	58	0	-1	B (67)	NONE	57	1	0	56	2	0	56	2	0	56	2	0	56	2	0
R 4. 64B		--	--	66 MOD	66	63	0	-3	B (67)	NONE	59	4	--	59	4	--	58	5	--	58	5	--	58	5	--
R 4. 64C	S1016 & S1020 Shoulder	SCH	1	71 MOD	71	70	0	-1	B (67)	A/E	67	3	0	66	4	0	65	5	1	**64 R,T**	**6**	**1**	63	7	1
R 4. 64D		SCH	1	68 MOD	68	68	0	0	B (67)	A/E	66	2	0	65	3	0	64	4	0	**63 R,T**	**5**	**1**	62	6	1
R 4. 64 W	S1022 & S1024 R/W	REC	3	72 MOD	72	73	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	69 T	4	0	**68 R**	**5**	**3**
R 4. 65 W,C		REC	3	69 M,ST35	69	74	0	5	B (67)	A/E	--	--	--	--	--	--	--	--	--	70 T	4	0	**69 R**	**5**	**3**
R 4. 66 W,C	S1026 & S1028 R/W	SFR	1	71 MOD	71	72	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	68	4	0	**67 R**	**5**	**1**
R 4. 67 W	--	SFR	3	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 68 W		SFR	5	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 69 W		SFR	5	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 70 W		SFR	7	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 71 W,*		SFR	3	59 MOD	61	63	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	2	0	59	4	0
R 4. 72 W		SFR	10	68 M,LT20,CAL	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	2	0	67	3	0
R 4. 73 W		SFR	8	67 MOD	67	70	0	3	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 74 W		SFR	8	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	2	0	68	3	0
R 4. 75 W,*		SFR	2	60 MOD	62	64	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	60	4	0
R 4. 76 W,*		--	--	60 M,ST35A	62	64	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	61	3	0
R 4. 77 W,*		SFR	1	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	65	0	0	63	2	0
R 4. 78 W		SFR	3	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 79 W,*	--	MH	2	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 80 W		MH	6	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 80A W		MH	7	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 81 W		MH	5	67 M,ST37	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 82 W,*		MH	3	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 83 W		MH	3	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 83A W,*	R/W	MH	2	66 MOD	66	67	0	1	B (67)	A/E	67	0	0	66	1	0	66	1	0	65	2	0	63	4	0
R 4. 83B W,*		MH	2	64 MOD	64	66	0	2	B (67)	A/E	65	1	0	65	1	0	65	1	0	64	2	0	62	4	0

Notes:

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Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR	Leq(h)	I.L	NBR
R 4. 84 W	--	MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 85 W		MH	7	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 86 W,*		MH	5	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 87 W		MH	12	60 M,LT20B,CAL	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88 W,*		MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88A W		MH	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 89 W		MH	4	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 90 W		MH	6	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 91 W		MH	9	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 92 W	--	MH	7	61 M,ST37A	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 93 W		MH	3	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-10 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 94 W	--	SFR	4	61 MOD	62	62	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 95 W		SFR	5	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 96 W,*		SFR	2	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 97 W		SFR	4	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 98 W		SFR	7	62 M,ST37A	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 99 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 100 W,*		SFR	2	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 101 W		SFR	9	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 102 W		SFR	4	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 103 W		SFR	6	63 M,LT20A,CAL	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 104 W		SFR	7	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 105 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 106 W		SFR	7	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 107 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 108 W		SFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 109 W		SFR	3	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 110 W		SFR	1	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 -
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-11 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 5

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 1 W	--	SFR	5	62 MOD	61	62	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 2 W		SFR	5	62 MOD	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 3 W		SFR	4	62 M,ST39,CAL	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 4 W		SFR	4	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 5 W	--	SFR	3	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 6 W,*		SFR	1	58 MOD	59	61	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 7 W,*		SFR	2	55 MOD	56	58	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 8 W		SFR	3	61 M,ST40	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 9 W		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 10 W		SFR	3	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-11 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 11 W,K7	--	SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 12 W,K7,*		SFR	4	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 13 W,K7		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 14 W,K7,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 15 W,K7		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 16 W,K7,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 17 W,K7		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 18 W,K7,*		SFR	4	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 19 W,K7	S1116 Shoulder	SFR	2	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	66 7	0	*0*
R 5. 20 W,K7,*		SFR	4	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	60 7	0	*0*
R 5. 21 W,K7		SFR	2	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	-- T	--	--	--	--	--	--	--	--	65 7	0	*0*
R 5. 22 W,K7,*		SFR	4	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	-- T	--	--	--	--	--	--	--	--	59 7	0	*0*
R 5. 23 W,K7	--	REC	4	68 M,ST41	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 24 W,K7		SFR	12	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 25 W,K7		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 18 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K7 - A calibration factor of +1.8 dB is applied for these receivers.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-11 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 26 W,K7	S1142	SFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	65 7	0	0
R 5. 27 W,K7,*		SFR	4	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	59 7	0	0
R 5. 28 W,K7		SFR	2	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	66 7	0	0
R 5. 29 W,K7,*		SFR	4	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	58 7	0	0
R 5. 30 W,K7		SFR	2	69 MOD	69	68	0	-1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	68 7	0	0
R 5. 31 W,K7,*		SFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	59 7	0	0
R 5. 32 W,K7		SFR	4	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	-- T	--	--	--	--	--	--	--	--	68 7	0	0
R 5. 33 W,K7		SFR	2	68 M,ST41A	68	68	0	0	B (67)	A/E	--	--	--	-- T	--	--	--	--	--	--	--	--	68 7	0	0
R 5. 34 W,K7,*		SFR	4	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	-- T	--	--	--	--	--	--	--	--	60 7	0	0
R 5. 35 W,K7		SFR	8	68 MOD	68	67	0	-1	B (67)	A/E	--	--	--	-- T	--	--	--	--	--	--	--	--	67 7	0	0
R 5. 36 W,K7,*		SFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	-- T	--	--	--	--	--	--	--	--	59 7	0	0
R 5. 37 W,K7		SFR	4	68 M,LT22,CAL	68	67	0	-1	B (67)	A/E	--	--	--	-- T	--	--	--	--	--	--	--	--	67 7	0	0
R 5. 37A W,K7,*		SFR	4	60 MOD	60	59	0	-1	B (67)	NONE	--	--	--	-- T	--	--	--	--	--	--	--	--	59 7	0	0
R 5. 38 W,K7		REC	2	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	-- T	--	--	--	--	--	--	--	--	68 7	0	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 18 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K7 - A calibration factor of +1.8 dB is applied for these receivers.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-11 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA1,6						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 39 W,K8	S1162 Shoulder	REC	1	65 MOD	66	67	1	1	B (67)	A/E	67	0	--	64	3	*0*	**62 R,T**	**5**	*1*	65	2	*0*	64 7	3	*0*
R 5. 40 W,K8,C		REC	1	66 M,ST42	67	68	1	1	B (67)	A/E	68	0	--	67	1	*0*	64 T	4	*0*	66	2	*0*	65 7	3	*0*
R 5. 41 W	--	MFR	3	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 42 W		MFR	4	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - These noise levels are not reliable due to issues with procedures used in TNM to calculate noise levels when two parallel walls intervene between source and receiver.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

W - Reciever protected by existing private property wall or soundwall.

C - Critical design receiver.

* - Non first row residences.

K8 - An adjustment factor of -1 dB is applied for these receivers to account for the transmission loss from an intervening tarp-covered fence.

Table G-12 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 6

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 1 W,*	S431 Shoulder	MFR	2	60 MOD	60	60	0	0	B (67)	NONE	--	--	--	--	--	--	60	0	0	59	1	0	58	2	0
R 6. 2 W		MFR	2	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	65	1	0	64	2	0	63	3	0
R 6. 3 W		MFR	2	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	68	1	0	68	1	0	67	2	0
R 6. 4 W		MFR	2	64 M,LT24	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	1	0
R 6. 5 W		MFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 6 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 7 W,*		MFR	2	60 MOD	60	60	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	59	1	0
R 6. 8 W		MFR	4	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 9 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	0	0
R 6. 10 W		MFR	4	68 MOD	68	67	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 11 W		MFR	4	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 12 W	S445 Shoulder	MFR	3	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	1	0
R 6. 13 W		MFR	4	64 M,ST43	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 14 W		MFR	3	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	0	0
R 6. 15 W		MFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	0
R 6. 16 W,*		MFR	6	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	0
R 6. 17 W		MFR	6	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	0
R 6. 18 W		REL	1	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	0	0
R 6. 19 W	--	LIB	--	65 MOD	65	65	0	0	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 19 W,Int		LIB	1	45 MOD	45	45	0	0	E (52)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-12 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 20 W	--	SFR	4	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 21 W,*		SFR	1	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 22 W		SFR	5	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 23 W		SFR	4	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 24 W	--	SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	66	1	0	65	2	0
R 6. 25 W,*		SFR	13	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	60	1	0	59	2	0
R 6. 26 W	S434 Shoulder	SFR	3	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	2	0
R 6. 27 W		SFR	2	67 M,LT23	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	0	0
R 6. 28 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 6. 29 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 30 W,*	--	SFR	1	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	60	1	0
R 6. 31 W		SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 32 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	0
R 6. 33 W		SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 34 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	2	0
R 6. 34A W		SFR	2	66 MOD	66	67	0	1	B (67)	A/E	67	0	0	65 T	2	0	65	2	0	64	3	0	64	3	0
R 6. 35	S1226 R/W	SFR	1	64 MOD	68	70	4	2	B (67)	A/E	69	1	0	67 T	3	0	67	3	0	66	4	0	66	4	0
R 6. 35A		SFR	1	64 MOD	68	70	4	2	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	**65 R**	**5**	***1***
R 6. 36		SFR	1	65 MOD	69	70	4	1	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	66	4	0
R 6. 36A C		SFR	2	66 MOD	70	71	4	1	B (67)	A/E	70	1	0	68 T	3	0	67	4	0	67	4	0	**66 R**	**5**	***2***
R 6. 37	--	SFR	2	63 M,ST44	67	68	4	1	B (67)	A/E	68	0	0	67	1	0	67 T	1	0	67	1	0	66	2	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - Existing soundwall is at a height of 16 feet.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

C - Critical design receiver.

Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.

W - Reciever protected by existing private property wall or soundwall.

* - Non first row residences.

Table G-12 – Predicted Future Noise Levels and Barrier Analysis – Alternative 2 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 2 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 38 W	--	SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 39 W		SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 40 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 41 W		SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 42 W		SFR	5	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 43 W		SFR	4	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 44 W,*		SFR	2	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 45 W	S464 R/W	SFR	1	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 46 W		SFR	1	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 47 W	--	SFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 48 W,*		SFR	2	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 49 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 50 W		SFR	3	64 M,LT25	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 51 W		SFR	4	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 52 W		SFR	3	68 MOD,F	64	64	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 53 W,*		SFR	2	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 54 W		SFR	4	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 55 W		SFR	3	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 56 W		SFR	3	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 57 W		SFR	3	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 58 W		SFR	3	63 M,ST45,F	59	59	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 59 W		SFR	3	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 60 W,*		SFR	5	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 61 W		SFR	2	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
F - At these receivers, the existing noise measurements were conducted before the construction of a soundwall that is part of the WCC project but is included in all future alternatives; therefore, there is a 4 dB reduction in future traffic noise levels.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 1 W	--	SFR	2	63 MOD	62		-1		B (67)	NONE	There are no project-related changes in this area that would affect traffic noise levels.														
R 1. 2 W		SFR	2	64 MOD	63		-1		B (67)	NONE															
R 1. 3 W		SFR	3	66 MOD	65		-1		B (67)	NONE															
R 1. 4 W		SFR	4	69 MOD	68		-1		B (67)	NONE															
R 1. 5 W		SFR	3	69 MOD	68		-1		B (67)	NONE															
R 1. 6 W		SFR	2	68 MOD	67		-1		B (67)	NONE															
R 1. 7 W		SFR	--	68 M,ST1,CAL	67		-1		B (67)	NONE															
R 1. 8 W		SFR	2	69 MOD	68		-1		B (67)	NONE															

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 9 W	--	REC	2	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 9A W	--	REC	2	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 10 W	--	REC	--	56 MOD	58	59	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 11 W	--	SFR	3	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 12 W	--	SFR	6	59 M,LT1,CAL	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 13 W	--	SFR	3	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 14 W	--	SFR	2	56 M,ST1A	59	60	3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 15 W	--	SFR	3	55 MOD	58	59	3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 16 W	--	SFR	5	60 M,LT1A,CAL	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 17 W,*	--	SFR	6	57 MOD	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 18 W	--	SFR	6	61 MOD	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 19 W,*	--	SFR	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 20 W,*	--	SFR	--	57 MOD	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 21 W	--	SFR	6	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 22 W	--	SFR	4	61 MOD	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 23 W,*	--	SFR	3	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 24 W	--	SFR	3	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 25 W	--	SFR	1	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 26 W	--	SFR	1	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 27 W		SFR	2	55 MOD	57	57	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 28 W,*		SFR	2	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 29 W		SFR	3	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 30 W		SFR	3	59 M,LT1B,CAL	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 31 W		SFR	4	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 32 W,*		SFR	3	57 MOD	57	57	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 33 W		SFR	5	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 34 W,*		SFR	--	56 M,ST1B	56	56	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 35 W,*		SFR	3	57 MOD	57	57	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 36 W		SFR	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 37 W		SFR	3	57 MOD	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 38 W		SFR	--	57 M,ST2	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 39 W		SFR	3	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 40 W,*		SFR	1	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 41 W,K5	--	SFR	2	61 MOD	63	61	2	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 42 W,K5		SFR	5	60 MOD	62	61	2	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 43 W,K5		SFR	4	59 M,ST2A	61	60	2	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 44 W,K5		SFR	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 45 W,K5		SFR	4	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 46 W,K5,*		SFR	2	57 MOD	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 47 W		SFR	3	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 48 W		SFR	5	59 MOD	61	62	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 49 W		SFR	3	61 M,LT2,CAL	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 50 W		SFR	3	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 51 W		SFR	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 52 W,*		SFR	2	56 MOD	58	59	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 53 W		SFR	3	57 MOD	59	59	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K5 - A calibration factor of -2 dB is applied for this receptor and adjacent receptors with similar geographic features. This factor is based on the simultaneous measurement results of ST2A and LT2.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 54	S583 Shoulder & R/W	REC	5	65 MOD	63	63	-2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	1	0	62	1	0
R 1. 55		REC	4	68 M,ST5	66	67	-2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 1. 56 W		REC	4	66 MOD	64	67	-2	3	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	0	0	66	1	0
R 1. 57 K6		SFR	2	57 MOD	56	56	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	55	1	0	55	1	0
R 1. 58 W,K6		SFR	3	61 MOD	60	59	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	0	57	2	0
R 1. 59 W,K6		SFR	4	60 MOD	59	59	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	0	0	58	1	0
R 1. 60 W,K6		SFR	5	60 MOD	59	59	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	0	0	59	0	0
R 1. 61 W,K6		SFR	4	60 MOD	59	59	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	59	0	0	59	0	0
R 1. 62 W,K6		SFR	4	62 M,LT4,CAL	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	0	0	60	1	0
R 1. 63 W	--	SFR	6	60 MOD	59	59	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 64 W		SFR	5	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 65 W		SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 66 W		SFR	3	60 M,ST6	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 67 W		SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

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2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
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6 - Traffic noise from the freeway only; other local noise sources are not included.
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T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K6 - A calibration factor of -4 dB is applied for this receptor and adjacent receptors with similar geographic features.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1. 68	--	SFR	4	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 69 W		SFR	6	61 M,ST3	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 70 W	S502 Shoulder and R/W	SFR	4	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	0	*0*	64	0	*0*
R 1. 71 W		SFR	4	65 M,LT3,CAL	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	0	*0*	66	1	*0*
R 1. 72 W		SFR	4	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	0	*0*	65	1	*0*
R 1. 73 W		SFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	0	*0*	64	0	*0*
R 1. 73A W		SFR	2	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	0	*0*	63	0	*0*
R 1. 74 W,*	--	MFR	1	61 M,ST4	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1. 74A W		MFR	2	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

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* - Non first row residences.

Table G-13 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 1 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 1.75 C	S614A Shoulder	MOT	1	72 M,ST10	72	72	0	0	B (67)	A/E	66	6	*1*	65	7	*1*	**63** T,R	**9**	*1*	62	10	*1*	61	11	*1*
R 1.75 C	S614B Private Property	MOT	1	72 M,ST10	72	72	0	0	B (67)	A/E	**64** T,R	**8**	*1*	62	10	*1*	60	12	*1*	58	14	*1*	58	14	*1*
R 1.76	--	MOT	1	59 M,ST7	64	65	5	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.77 W	--	MFR	3	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.78 W		MFR	3	62 MOD	61	62	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.79 W		MFR	2	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.80 W		MFR	3	68 MOD	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	*0*	65	3	*0*
R 1.81 W		MFR	3	70 M,ST8	69	69	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	*0*	67	2	*0*
R 1.82 W		MFR	2	68 MOD	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	*0*	66	2	*0*
R 1.83 W		MFR	2	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	0	*0*	65	2	*0*
R 1.84 W		MFR	3	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	*0*	66	1	*0*
R 1.85 W	S629 R/W	MFR	3	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	*0*
R 1.86 W		MFR	2	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 1.87 W		MFR	2	66 MOD	65	65	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	65	0	*0*
R 1.88 W		SFR	4	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 1.89 W		SFR	3	69 MOD	68	67	-1	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	*0*
R 1.90 W	S639 R/W	SFR	4	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.91 W*		SFR	3	63 MOD	62	62	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.92 W		SFR	5	68 M,LT5,CAL	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.93 W		SFR	4	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.94 W*		SFR	2	58 M,ST9A,CAL	57	58	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 1.95 W	S649 Shoulder	SFR	5	67 MOD	68	67	1	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	*0*	65	2	*0*
R 1.96 W*		SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.97 W		SFR	4	64 M,ST9	65	64	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.98 W		SFR	4	64 MOD	65	64	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.99 W		SFR	2	63 MOD	64	63	1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.100 W*		SFR	2	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.101 W		REC	3	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.102 W		REC	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 1.103 W		REC	1	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and t
interior noise criteria has been used for this receiver because there is no outdoor us
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-14 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 2

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.1 W	S699 R/W	MFR	3	65 MOD	62	63	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2 W		MFR	3	63 MOD	60	63	-3	3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.2A W		MFR	1	65 MOD	62	63	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.3 W		MFR	6	68 M,LT6,CAL	65	65	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4 W		MFR	3	62 MOD	59	58	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.4A W		MFR	2	65 MOD	62	61	-3	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.5 W	S705 Shoulder	MFR	3	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	63	1	*0*
R 2.6 W		MFR	6	67 MOD	64	64	-3	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.7 W		MFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	0	*0*	63	1	*0*
R 2.8 W		MFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.8A W		MFR	1	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	57	3	*0*	56	4	*0*
R 2.9 W		MFR	4	62 M,ST11	63	65	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	4	*0*	60	5	*4*
R 2.10 W	--	MFR	6	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.11 W		MFR	8	57 MOD	58	58	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.12 W	--	SFR	3	62 MOD	63	64	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.13 W	S708, S710, & S718 Shoulder & R/W	SFR	2	57 M,ST12,CAL	58	62	1	4	B (67)	NONE	62	0	*0*	62	0	*0*	61	1	*0*	61	1	*0*	60	2	*0*
R 2.14 W,K3		SFR	2	67 MOD	68	71	1	3	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	68	3	*0*	68	3	*0*
R 2.15 W,K3		REC	2	68 MOD	69	71	1	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	69	2	*0*	68	3	*0*
R 2.16 W,K3		REC	--	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	2	*0*	63	2	*0*
R 2.17 W,K3		SFR	1	66 MOD	66	68	0	2	B (67)	A/E	68	0	*0*	67	1	*0*	67 T	1	*0*	65	3	*0*	64	4	*0*
R 2.18 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64 T	4	*0*	**63 R**	**5**	*3*	62	6	*3*
R 2.19 W,K3		SFR	4	67 M,LT7,CAL	67	68	0	1	B (67)	A/E	68	0	*0*	66	2	*0*	64 T	4	*0*	**62 R**	**6**	*4*	62	6	*4*
R 2.20 W,K3		SFR	4	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64 T	4	*4*	**62 R**	**6**	*4*	61	7	*4*
R 2.21 W*		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	63	0	*0*	63	0	*0*	62	1	*0*	60	3	*0*	59	4	*0*
R 2.21A W*		--	--	60 M,ST12A	61	62	1	1	--	--	63	-1	--	63	-1	--	62	0	--	60	2	--	59	3	--
R 2.22 W,K3		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64	4	*0*	**63 T,R**	**5**	*3*	61	7	*3*
R 2.23 W*		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	63	0	*0*	63	0	*0*	60	3	*0*	60	3	*0*	59	4	*0*
R 2.24 W,K3,C		SFR	3	67 MOD	67	68	0	1	B (67)	A/E	68	0	*0*	67	1	*0*	64	4	*0*	**62 T,R**	**6**	*3*	61	7	*3*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-14 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.25 W,K3	S718 Shoulder	SFR	2	66 MOD	67	69	1	2	B (67)	A/E	67	2	0	67	2	0	66	3	0	64 T	5	2	**64 R,5**	**5**	2
R 2.26 W*		SFR	2	60 MOD	61	62	1	1	B (67)	NONE	62	0	0	62	0	0	61	1	0	59	3	0	58	4	0
R 2.27 W,K3		SFR	2	66 MOD	67	67	1	0	B (67)	A/E	65	2	0	64	3	0	64	3	0	63 T	4	0	**62 R**	**5**	2
R 2.28 W,K4	--	SFR	3	58 M,ST13,CAL	59	56	1	-3	B (67)	NONE	54	2	0	54	2	0	53	3	0	53	3	0	52	4	0
R 2.29 W,K4		SFR	3	58 MOD	59	54	1	-5	B (67)	NONE	53	1	0	53	1	0	53	1	0	52	2	0	52	2	0
R 2.30 W,K4		SFR	1	56 MOD	57	54	1	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.31 W	--	SFR	3	59 MOD	61	56	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.32 W		SFR	3	60 MOD	62	57	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33 W		SFR	3	62 MOD	64	59	2	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.33A W		--	--	63 MOD	65	60	2	-5	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.34 W,C	S733 Shoulder	SFR	1	66 MOD	68	67	2	-1	B (67)	A/E	64	3	0	63	4	0	**62 T,R**	**5**	1	62	5	1	61	6	1
R 2.35 W	--	SFR	3	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65 T	1	0	64	2	0
R 2.36 W*		SFR	2	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	62	2	0
R 2.37 W		SFR	2	64 M,LT8	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	0	66	1	0
R 2.38 W*		SFR	2	64 MOD	66	66	2	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	66 T	0	0	66	0	0
R 2.39 W		SFR	2	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	0	65	2	0
R 2.40 W	S745 R/W	SFR	2	67 MOD	69	71	2	2	B (67)	A/E	--	--	--	--	--	--	68	3	0	67 T	4	0	**66 R**	**5**	2
R 2.41 W,C,P		SCH	1	63 M,ST15	69	71	6	2	B (67)	A/E	--	--	--	--	--	--	67	4	0	65 T	6	1	**65 R,5**	**6**	1
R 2.42 W,P		SCH	1	58 MOD	64	65	6	1	B (67)	NONE	63	2	0	63	2	0	62	3	0	61	4	0	61	4	0
R 2.43	--	MOT	1	51 MOD	53	53	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.44		MOT	1	55 MOD	57	58	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
P - Design Year No Build and Build levels do not account for the temporary privacy screen that was present at the time of measurement
K3 - A calibration factor of +1.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
K4 - A calibration factor of -3 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-14 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.45 W	S746 R/W	SFR	1	59 MOD	61	66	2	5	B (67)	A/E	62	4	0	61	5	1	**61 T,R**	**5**	1	60	6	1	60	6	1
R 2.45A W		SFR	1	57 MOD	59	61	2	2	B (67)	NONE	59	2	0	59 T	2	0	59	2	0	59	2	0	59	2	0
R 2.46 W,C		SCH	1	68 M,ST16	70	75	2	5	B (67)	A/E	69	6	1	69 T	6	1	**68 R,5**	**7**	1	68	7	1	67	8	1
R 2.47 W	--	SFR	2	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.48 W		SFR	1	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 2.49 W		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 2.50 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	60	0	0
R 2.51 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 2.52 W		SFR	4	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 2.53 W		SFR	4	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 2.54 W*		SFR	1	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	59	1	0
R 2.55 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	1	0
R 2.56 W		SFR	3	65 M,LT9,CAL	65	67	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 2.57 W*	S766 R/W	SFR	2	58 MOD	58	59	0	1	B (67)	A/E	59	0	0	59	0	0	59 T	0	0	59	0	0	58	1	0
R 2.58 W		SFR	2	65 MOD	65	69	0	4	B (67)	A/E	69	0	0	68 T	1	0	68	1	0	68	1	0	68	1	0
R 2.59 W		SFR	2	61 MOD	61	67	0	6	B (67)	A/E	65	2	0	65 T	2	0	64	3	0	64	3	0	64	3	0
R 2.60 W	--	MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61 W		MFR	1	60 M,ST17	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.61A W		--	--	66 M,ST17A	64	67	-2	3	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.62 W		MFR	1	60 MOD	57	58	-3	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.63 W	S765 R/W	SFR	1	62 MOD	61	67	-1	6	B (67)	A/E	66	1	0	65	2	0	65	2	0	64 T	3	0	63	4	0
R 2.64 W		SFR	2	64 MOD	63	69	-1	6	B (67)	A/E	67	2	0	67	2	0	66	3	0	65 T	4	0	65	4	0
R 2.65 W		SFR	1	67 M,LT10,CAL	66	69	-1	3	B (67)	A/E	69	0	0	68	1	0	68 T	1	0	68	1	0	68	1	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
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C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-14 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 2 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 2.66 W	--	SFR	3	66 MOD	65	66	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.67 W*	--	SFR	1	60 MOD	59	61	-1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.68 W	--	SFR	2	55 MOD	54	54	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.69 W	--	SFR	3	65 MOD	64	66	-1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.70 W*	--	SFR	1	58 MOD	57	58	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.71 W	--	SFR	3	64 MOD	63	64	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.72 W*	--	SFR	2	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.73 W*	--	SFR	2	54 MOD	53	54	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 2.74 W	--	SFR	3	64 MOD	63	63	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.75 W	--	SFR	3	64 MOD	63	61	-1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.76 W	--	SFR	4	64 MOD	63	58	-1	-5	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.77 W	--	MFR	2	60 MOD	61	61	1	0	B (67)	NONE	59	2	*0*	58	3	*0*	58	3	*0*	58	3	*0*	58	3	*0*
R 2.78 W	--	MFR	4	61 M,ST19	62	61	1	-1	B (67)	NONE	58	3	*0*	57	4	*0*	57	4	*0*	57	4	*0*	57	4	*0*
R 2.79 W	--	MFR	4	65 MOD	66	62	1	-4	B (67)	NONE	59	3	*0*	59	3	*0*	58	4	*0*	58	4	*0*	58	4	*0*
R 2.80 W	S786, S788, & S792 Shoulder	SFR	3	64 MOD	65	64	1	-1	B (67)	NONE	61	3	*0*	61	3	*0*	61	3	*0*	60	4	*0*	60	4	*0*
R 2.81 W,C	S786, S788, & S792 Shoulder	SFR	3	68 MOD	69	67	1	-2	B (67)	A/E	--	--	--	--	--	--	-- [T]	--	--	63	4	*0*	**62** [R]	**5**	*3*
R 2.82 W	S786, S788, & S792 Shoulder	SFR	2	67 MOD	68	68	1	0	B (67)	A/E	--	--	--	--	--	--	-- [T]	--	--	65	3	*0*	64	4	*0*
R 2.83 W	S786, S788, & S792 Shoulder	SFR	3	66 MOD	66	65	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 2.84 W	S786, S788, & S792 Shoulder	SFR	4	66 M,LT11,CAL	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	-- [T]	--	--	65	1	*0*	64	2	*0*
R 2.85 W	S786, S788, & S792 Shoulder	SFR	4	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	-- [T]	--	--	66	1	*0*	65	2	*0*
R 2.86 W	--	SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 2.87 W	--	SFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 2.88 W	--	SFR	4	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.89 W	--	SFR	3	63 MOD	63	60	0	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.90 W	--	SFR	3	62 MOD	62	59	0	-3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.91 W	--	SFR	2	63 MOD	63	62	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.92 W	--	SFR	1	61 MOD	61	61	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-15 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 3

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.1 W	--	MFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.2 W	--	MFR	5	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.3 W	--	MFR	7	65 M,ST22	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	65	0	0	64	1	0	63 T	2	0
R 3.4 W	--	MFR	2	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	67	1	0	66 T	2	0	65	3	0
R 3.5 W*	--	SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	66	0	0	65	1	0	63 T	3	0
R 3.6 W	--	SFR	2	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	68	1	0	66 T	3	0	66	3	0
R 3.7 W	--	SFR	4	65 MOD	65	69	0	4	B (67)	A/E	--	--	--	--	--	--	67	2	0	67 T	2	0	65	4	0
R 3.8 W	--	SFR	4	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69	1	0	68 T	2	0	67	3	0
R 3.9 W	--	SFR	2	68 M,LT13,CAL	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	1	0	68	2	0	67	3	0
R 3.10 W	--	SFR	2	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	1	0	68	2	0	67	3	0
R 3.11 W*	--	SFR	5	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	65	0	0	64	1	0	64	1	0
R 3.12 W	--	SFR	1	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	69 T	2	0	68	3	0	67	4	0
R 3.13 W*	S834 Shoulder	SFR	3	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	66 T	3	0	65	4	0	**64 R**	**5**	2
R 3.14 W	S834 Shoulder	SFR	2	68 MOD	68	71	0	3	B (67)	A/E	--	--	--	--	--	--	68	3	0	67	4	0	**66 R**	**5**	2
R 3.15 W*	S834 Shoulder	SFR	4	62 MOD	62	64	0	2	B (67)	NONE	62	2	0	61	3	0	60	4	0	59	5	3	59	5	3
R 3.16 W,C	S834 Shoulder	SFR	1	70 MOD	70	72	0	2	B (67)	A/E	--	--	--	--	--	--	69	3	0	68	4	0	**67 R**	**5**	1
R 3.17 W	S834 Shoulder	SFR	2	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	69	2	0	68	3	0	67	4	0
R 3.17A W	S834 Shoulder	--	--	68 M,ST23	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	67	3	--	66	4	--	65	5	--
R 3.18 W	S834 Shoulder	SFR	1	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	68	2	0	67	3	0	66	4	0
R 3.19 W*	S834 Shoulder	SFR	2	60 MOD	60	62	0	2	B (67)	NONE	60	2	0	60	2	0	59	3	0	59	3	0	58	4	0
R 3.19A W*	S834 Shoulder	SFR	1	63 MOD	63	65	0	2	B (67)	NONE	62	3	0	62	3	0	61	4	0	60	5	1	60	5	1
R 3.20 W	S834 Shoulder	SFR	2	65 MOD	65	67	0	2	B (67)	A/E	64	3	0	63	4	0	63 T	4	0	63	4	0	**62 R**	**5**	2
R 3.21 W*	S834 Shoulder	SFR	2	60 MOD	60	62	0	2	B (67)	NONE	60	2	0	60	2	0	59	3	0	59	3	0	58	4	0
R 3.22 W*	--	MFR	8	55 MOD	56	56	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.22A W	--	MFR	2	54 M,ST20	55	56	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.23 W*	--	MFR	9	51 MOD	52	52	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-15 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.23A	S807 Shoulder & S811 R/W	REC	--	62 MOD	63	64	1	1	B (67)	NONE	61	3	--	61	3	--	60	4	--	59	5	--	59	5	--
R 3.23B C		REC	7	65 MOD	66	69	1	3	B (67)	A/E	65	4	*0*	65	4	*0*	**63** T,R	**6**	*7*	62	7	*7*	62	7	*7*
R 3.24 K1,W		SFR	2	64 MOD	65	67	1	2	B (67)	A/E	--	--	--	--	--	--	65 T	2	*0*	63	4	*0*	**62** R	**5**	*2*
R 3.25 K1,W*		SFR	2	59 MOD	60	63	1	3	B (67)	NONE	--	--	--	--	--	--	60	3	*0*	59	4	*0*	59	4	*0*
R 3.26 K1,W	S827 Shoulder	SFR	3	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	63	3	*0*	63	3	*0*	63	3	*0*
R 3.27 K1,W*		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	62	4	*0*	62	4	*0*	62	4	*0*
R 3.28 K1,W		SFR	3	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	63	3	*0*	63	3	*0*	63	3	*0*
R 3.28A K1,W		--	--	64 M,CAL	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	64	1	--	63	2	--	62	3	--
R 3.29 K1,W*		SFR	2	60 MOD	61	60	1	-1	B (67)	NONE	--	--	--	--	--	--	59	1	*0*	58	2	*0*	57	3	*0*
R 3.30 K,1W	S827 Shoulder	SFR	3	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	3	*0*	58	3	*0*
R 3.31 K1,W		SFR	2	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	0	*0*	62	1	*0*
R 3.32 K1,W		SFR	4	64 M,LT12	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.33 K1,W		SFR	2	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	*0*	62	2	*0*
R 3.34 K1,W*		SFR	2	63 MOD	64	62	1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	1	*0*	61	1	*0*
R 3.35 K1,W		SFR	1	66 M,ST21	65	65	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.36 K1,W*		SFR	3	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	57	2	*0*
R 3.37 K1,W*		SFR	2	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	0	*0*	60	1	*0*
R 3.38 K1,W		SFR	2	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.39 K1,W*		SFR	3	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	56	3	*0*
R 3.40 K1,W		SFR	5	62 MOD	63	65	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 3.41 K1,W*		SFR	3	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	58	1	*0*	56	3	*0*
R 3.42 K1,W		SFR	3	62 MOD	63	68	1	5	B (67)	A/E	--	--	--	--	--	--	64	4	*0*	65	3	*0*	64	4	*0*
R 3.43 W	--	MFR	8	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.44 W*		MFR	7	59 MOD	59	61	0	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.45 W		MFR	10	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.46 W		MFR	8	56 MOD	56	57	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K1 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-15 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.47 W	S841 Shoulder	SFR	2	62 MOD	63	68	1	5	B (67)	A/E	64	4	0	63	5	1	**62 T,R**	**6**	2	62	6	2	61	7	2
R 3.48 C		SFR	1	69 MOD	70	76	1	6	B (67)	A/E	69	7	1	68	8	1	**66 T,R**	**10**	1	66	10	1	65	11	1
R 3.49 W		SFR	2	60 MOD	61	63	1	2	B (67)	NONE	61	2	0	61	2	0	60	3	0	59	4	0	59	4	0
R 3.50 W		SFR	1	70 M,LT14	71	76	1	5	B (67)	A/E	70	6	1	69	7	1	68 T	8	1	**67 R,5**	**9**	1	66	10	1
R 3.51 W*		SFR	2	62 MOD	63	65	1	2	B (67)	NONE	63	2	0	62	3	0	61	4	0	60	5	2	59	6	2
R 3.52 W		REC	1	68 MOD	69	71	1	2	B (67)	A/E	68	3	0	67	4	0	67 T	4	0	**66 R**	**5**	1	66	5	1
R 3.53 W	--	MFR	6	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	2	0	64	3	0
R 3.53A W*		REC	5	54 MOD	56	58	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	55	3	0	55	3	0
R 3.54 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	65	1	0
R 3.54A W		MFR	3	62 M,ST24	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 3.55 W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	0	0	65	1	0
R 3.55A W		MFR	4	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 3.56 W,C	S857 Shoulder	MFR	7	67 MOD	69	71	2	2	B (67)	A/E	68	3	0	67	4	0	**66 T,R**	**5**	7	65	6	7	65	6	7
R 3.57 W	--	SFR	2	61 MOD	62	65	1	3	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.58 W		SFR	3	60 MOD	61	63	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.59 W		SFR	4	61 MOD	62	64	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60 W		SFR	2	61 M,ST25A,CAL	62	64	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.60A W		SFR	--	63 M,ST25	62	64	-1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.61 W*		SFR	7	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.62 W*		SFR	4	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.63 W,C	S868 R/W	SFR	1	65 MOD	66	67	1	1	B (67)	A/E	65	2	0	64	3	0	63	4	0	63 T	4	0	**60 R**	**7**	1
R 3.64 W	--	SFR	3	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	63	0	0	63	0	0	62	1	0
R 3.65 W		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	62	0	0	62	0	0	60	2	0
R 3.66 W		MFR	5	60 M,ST26	58	60	-2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66A W		MFR	8	56 MOD	54	55	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.66B W		MFR	4	56 MOD	54	55	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-15 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.67 W	--	MH	4	58 MOD	60	61	2	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	60	1	0	59	2	0
R 3.68 W*		REC	1	52 MOD	54	56	2	2	B (67)	NONE	--	--	--	--	--	--	55	1	0	55	1	0	54	2	0
R 3.69 W		MH	4	62 MOD	64	66	2	2	B (67)	A/E	--	--	--	--	--	--	64	2	0	64	2	0	62	4	0
R 3.70 W		MH	4	64 MOD	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	67 T	1	0	66	2	0	65	3	0
R 3.71 W*		MH	7	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	68	1	0	67 T	2	0	66	3	0
R 3.72 W		MH	2	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.72A W		MH	2	63 M,ST27	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.73 W		MH	5	63 MOD	65	67	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.74 W*		MH	11	64 MOD	66	67	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 3.74A W		MH	2	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	68	1	0
R 3.75 W		MH	4	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	2	0
R 3.76 W*	S896 R/W	MH	2	63 MOD	65	67	2	2	B (67)	A/E	67	0	0	67	0	0	67	0	0	67 T	0	0	67	0	0
R 3.77 W		MH	3	62 MOD	64	68	2	4	B (67)	A/E	68	0	0	68 T	0	0	67	1	0	67	1	0	67	1	0
R 3.78 W*	S902 Shoulder	SFR	2	63 MOD	63	65	0	2	B (67)	NONE	--	--	--	65	0	0	64	1	0	63	2	0	63	2	0
R 3.79 W		REC	1	62 MOD	62	65	0	3	B (67)	NONE	--	--	--	65	0	0	63	2	0	61	4	0	60	5	1
R 3.80 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	63	1	0	62	2	0	61	3	0	60	4	0
R 3.81 W		SFR	2	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	67	1	0	66	2	0	66	2	0	65	3	0
R 3.81A W		SFR	3	66 M,LT15,CAL	66	66	0	0	B (67)	A/E	--	--	--	66	0	0	65	1	0	64	2	0	64	2	0
R 3.82 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	65	0	0	64	1	0	63	2	0	63	2	0
R 3.83 W		SFR	5	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	64	1	0	63	2	0	63	2	0	62	3	0
R 3.84 W	S910 & S916 Shoulder	SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	64	1	0	63	2	0	62	3	0	62	3	0
R 3.85 W		SFR	2	66 MOD	66	67	0	1	B (67)	A/E	64	3	0	63 T	4	0	**62 R**	**5**	2	62	5	2	61	6	2
R 3.86 W,C		SFR	3	66 MOD	66	67	0	1	B (67)	A/E	65	2	0	63 T	4	0	**62 R**	**5**	3	61	6	3	60	7	3
R 3.86A W		SFR	2	65 MOD	65	67	0	2	B (67)	A/E	64	3	0	62	5	2	**62 T,R**	**5**	2	60	7	2	60	7	2

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-15 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 3 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefited Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 3.87 W	S907 Shoulder	REC	3	65 MOD	65	67	0	2	B (67)	A/E	64	3	0	62 T	5	3	**62 R,5**	**5**	3	61	6	3	61	6	3
R 3.88 W,C		REC	1	66 MOD	66	68	0	2	B (67)	A/E	63 T	5	1	63	5	1	**62 R,5**	**6**	1	62	6	1	62	6	1
R 3.89 W		REC	2	65 M,ST28	65	67	0	2	B (67)	A/E	63	4	0	63 T	4	0	**62 R**	**5**	2	62	5	2	62	5	2
R 3.90 W*	S141 Shoulder	SFR	1	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.91 W		SFR	3	64 MOD	64	63	0	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.92 W		SFR	4	65 MOD	64	63	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.93 W		SFR	4	67 MOD	66	64	-1	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.93A W		SFR	3	67 M,LT16,CAL	66	65	-1	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 3.94 W,*	S141 Shoulder	SFR	1	65 MOD	64	64	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	62	2	0
R 3.95 W		SFR	3	68 MOD	67	67	-1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	64	3	0	63	4	0
R 3.96 W		SFR	5	69 MOD	68	69	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	3	0	65	4	0
R 3.97 W,*		SFR	1	64 MOD	63	64	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	61	3	0
R 3.98 W		SFR	12	66 MOD	65	67	-1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	1	0	65	2	0
R 3.99 K2,W,C	S935 R/W	SFR	1	66 MOD	64	66	-2	2	B (67)	A/E	64	2	0	63 T	3	0	62	4	0	62	4	0	**61 R**	**5**	1
R 3.99A K2,W		SFR	2	65 M,ST29,CAL	63	64	-2	1	B (67)	NONE	63	1	0	62	2	0	61	3	0	60	4	0	60	4	0
R 3.100 K2,W		SFR	2	64 MOD	62	63	-2	1	B (67)	NONE	62	1	0	60	3	0	59	4	0	59	4	0	58	5	2
R 3.100A K2,W		SFR	1	64 MOD	62	63	-2	1	B (67)	NONE	61	2	0	59	4	0	58	5	1	57	6	1	57	6	1
R 3.101 K2,W		SFR	2	62 MOD	60	61	-2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - $L_{eq(h)}$ are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T- Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K2 - A calibration factor of -2.5 dB is applied for this receptor and adjacent receptors with similar geographic features.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 4. 1 W,C	S995 R/W	SFR	2	69 MOD	70	72	1	2	B (67)	A/E	--	--	--	--	--	--	69	3	*0*	67 T	5	*2*	**66 R**	**6**	***2***
R 4. 2 W	--	SFR	3	69 MOD	70	71	1	1	B (67)	A/E	--	--	--	--	--	--	69	2	*0*	68	3	*0*	67	4	*0*
R 4. 3 W		SCH	3	68 MOD	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	69	1	*0*	67	3	*0*	66	4	*0*
R 4. 4 W,*		SFR	2	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	66	0	*0*	64	2	*0*	63	3	*0*
R 4. 5 W,*		SFR	1	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66	2	*0*	65	3	*0*
R 4. 6 W	--	SFR	2	68 M,LT19,CAL	69	70	1	1	B (67)	A/E	--	--	--	--	--	--	69	1	*0*	68	2	*0*	67	3	*0*
R 4. 7 W	S1005 & S1009 R/W	SFR	2	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	68	1	*0*	67	2	*0*	66	3	*0*
R 4. 8 W,*		SFR	2	65 MOD	66	67	1	1	B (67)	A/E	66	1	*0*	66	1	*0*	65	2	*0*	64	3	*0*	64	3	*0*
R 4. 9 *		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	65	0	*0*	64	1	*0*	64	1	*0*	63	2	*0*	63	2	*0*
R 4. 10		REC	3	73 MOD	74	75	1	1	B (67)	A/E	71	4	*0*	69	6	*3*	**68 R,T**	**7**	***3***	67	8	*3*	66	9	*3*
R 4. 11 C		REC	2	73 MOD	74	75	1	1	B (67)	A/E	67 T	8	*2*	**66 R,5**	**9**	***2***	65	10	*2*	64	11	*2*	63	12	*2*
R 4. 12		REC	1	70 MOD	71	68	1	-3	B (67)	A/E	64	4	*0*	**63 R,T**	**5**	***1***	63	5	*1*	62	6	*1*	62	6	*1*
R 4. 13 W		SFR	5	62 MOD	63	62	1	-1	B (67)	NONE	58 T	4	*0*	**57 R**	**5**	***5***	57	5	*5*	57	5	*5*	56	6	*5*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L	*NBR*	Leq(h)	I.L	*NBR*	Leq(h)	I.L	*NBR*	Leq(h)	I.L	*NBR*	Leq(h)	I.L	*NBR*
R 4. 14A W	S182 Shoulder	SFR	1	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	66	1	*0*	65	2	*0*	65	2	*0*
R 4. 14 W		SFR	3	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	67	2	*0*	66	3	*0*	65	4	*0*
R 4. 15 W		SFR	3	64 M,LT17,CAL	65	68	1	3	B (67)	A/E	--	--	--	--	--	--	67	1	*0*	66	2	*0*	65	3	*0*
R 4. 16 W,*		SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	63	3	*0*	63	3	*0*	62	4	*0*
R 4. 17 W		SFR	4	65 MOD	66	67	1	1	B (67)	A/E	--	--	--	--	--	--	66	1	*0*	65	2	*0*	64	3	*0*
R 4. 18 W		SFR	4	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	64	1	*0*	64	1	*0*	63	2	*0*
R 4. 19 W		SFR	1	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	63	1	*0*	63	1	*0*	62	2	*0*
R 4. 20 W,*		SFR	2	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	*0*	62	2	*0*	61	3	*0*
R 4. 21 W		SFR	1	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	*0*	63	1	*0*	62	2	*0*
R 4. 22 W		--	--	61 M,ST30	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	63	1	*0*	62	2	*0*	62	2	*0*
R 4. 23 W	S972 & S978 Shoulder	SFR	2	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	-- T	--	--	60	4	*0*	60	4	*0*	**59 R**	**5**	***2***
R 4. 24		SCH	3	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	-- T	--	--	62	4	*0*	61	5	*3*	**61 R**	**5**	***3***
R 4. 25A C		REC	2	69 MOD	69	70	0	1	B (67)	A/E	65	5	*2*	65	5	*2*	**63 R,T**	**7**	***2***	62	8	*2*	62	8	*2*
R 4. 25B		REC	2	65 MOD	65	68	0	3	B (67)	A/E	64	4	*0*	64	4	*0*	**62 R,T**	**6**	***2***	61	7	*2*	61	7	*2*
R 4. 25		REC	2	67 M,ST31	67	67	0	0	B (67)	A/E	64	3	*0*	62	5	*2*	**62 R,T**	**5**	***2***	61	6	*2*	61	6	*2*
R 4. 26		REC	2	65 MOD	65	64	0	-1	B (67)	NONE	62	2	*0*	62	2	*0*	62	2	*0*	61	3	*0*	61	3	*0*
R 4. 27 W	--	MFR	1	69 MOD	70	71	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	71	0	*0*
R 4. 28 W		MFR	3	64 M,ST32A	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	*0*
R 4. 29 W		MFR	1	68 M,ST32	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	69	0	*0*
R 4. 29A W		MFR	1	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	*0*
R 4. 30 W		MFR	1	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	*0*
R 4. 31 W		MFR	7	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	62	1	*0*
R 4. 31A W		MFR	1	66 MOD	67	68	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	-- T	--	--	64	4	*0*
R 4. 32 C	S998 R/W	SFR	2	71 M,LT18,CAL	72	73	1	1	B (67)	A/E	71	2	*0*	70	3	*0*	69 T	4	*0*	**68 R**	**5**	***2***	66	7	*2*
R 4. 33A	S1006 R/W	MOT	--	75 MOD	78	80	3	2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 33A Int		MOT	6	50 MOD	53	55	3	2	E (52)	A/E	47	8	*6*	**46 R,5**	**9**	***6***	45	10	*6*	44	11	*6*	42	13	*6*
R 4. 33 C		MOT	1	73 M,ST33	76	78	3	2	B (67)	A/E	72	6	*1*	**70 R,T**	**8**	***1***	69	9	*1*	68	10	*1*	66	12	*1*

Notes:

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2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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* - Non first row residences.

Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 34	--	SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 34A		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 35 W	--	SFR	3	64 M,ST36	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 36 W,*		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	0	63	2	0
R 4. 37 W,*	--	SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 38 W		SFR	2	66 MOD	67	69	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 39 W		SFR	3	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 40 W,*		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 41 W		SFR	7	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 42 W		SFR	7	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 42A W,*		SFR	1	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	2	0	58	4	0
R 4. 43 W		SFR	5	67 M,LT21,CAL	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 44 W		SFR	4	66 MOD	67	69	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 45 W,*		SFR	2	59 MOD	60	62	1	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	60	2	0	58	4	0
R 4. 46 W		SFR	8	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 46A W,*		SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	64	2	0
R 4. 47A W,*		SFR	2	65 MOD	66	68	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	65	3	0
R 4. 47 W		SFR	4	67 MOD	68	70	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0

Notes:

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Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 48 W,*	--	SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63 T	1	0	61	3	0
R 4. 49 W		SFR	2	65 MOD	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 50 W		SFR	2	65 M,ST38	67	69	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 50A W		SFR	2	63	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	63	3	0
R 4. 51 W,*		SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	62	2	0
R 4. 52 W		SFR	2	64 MOD	66	68	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 53 W,*		SFR	5	61 MOD	63	64	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	62	2	0
R 4. 54 W		SFR	2	66 MOD	68	70	2	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	2	0	66	4	0
R 4. 55 W,*		SFR	2	63 MOD	65	66	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	1	0	63	3	0
R 4. 56 W		SFR	2	66 MOD	68	69	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	65	4	0
R 4. 57 W,*		SFR	4	60 MOD	62	64	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	63	1	0	61	3	0
R 4. 58 W		SFR	2	66 MOD	68	69	2	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 59 W,*	S1083 R/W	SFR	3	61 MOD	64	67	3	3	B (67)	A/E	67	0	0	66	1	0	66 T	1	0	65	2	0	65	2	0
R 4. 60 W		SFR	1	64 MOD	67	74	3	7	B (67)	A/E	70	4	0	70 T	4	0	70	4	0	69 R	**5**	**1**	67	7	1
R 4. 60A W,*		SFR	1	62 MOD	65	67	3	2	B (67)	A/E	67	0	0	67 T	0	0	66 T	1	0	65	2	0	63	4	0
R 4. 61 W		SFR	2	65 M,ST38A	68	72	3	4	B (67)	A/E	70	2	0	70	2	0	68 T	4	0	67 R	**5**	**2**	67	5	2
R 4. 62 W,C		SFR	2	62 MOD	65	70	3	5	B (67)	A/E	67	3	0	65	5	2	64 R,T	**6**	**2**	63	7	2	62	8	2
R 4. 62A W	R/W	SFR	1	59 MOD	62	65	3	3	B (67)	NONE	64	1	0	63	2	0	62 T	3	0	62	3	0	61	4	0
R 4. 62B W		SFR	2	58 MOD	61	64	3	3	B (67)	NONE	63	1	0	62	2	0	62	2	0	61	3	0	61	3	0
R 4. 63 W		SFR	2	57 MOD	60	62	3	2	B (67)	NONE	61	1	0	61	1	0	60	2	0	60	2	0	59	3	0

Notes:

1 - $L_{eq(h)}$ are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
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Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
											8 feet			10 feet			12 feet			14 feet			16 feet		
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 64A	--	SFR	3	59 MOD	59	58	0	-1	B (67)	NONE	57	1	0	56	2	0	56	2	0	56	2	0	56	2	0
R 4. 64B		--	--	66 MOD	66	62	0	-4	B (67)	NONE	59	3	--	59	3	--	58	4	--	58	4	--	58	4	--
R 4. 64C	S1016 & S1020 Shoulder S1022 & S1024 R/W	SCH	1	71 MOD	71	70	0	-1	B (67)	A/E	67	3	0	66	4	0	65	5	1	64 R,T	**6**	**1**	63	7	1
R 4. 64D		SCH	1	68 MOD	68	68	0	0	B (67)	A/E	66	2	0	65	3	0	64	4	0	63 R,T	**5**	**1**	62	6	1
R 4. 64 W		REC	3	72 MOD	72	73	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	69 T	4	0	68 R	**5**	**3**
R 4. 65 W,C		REC	3	69 M,ST35	69	74	0	5	B (67)	A/E	--	--	--	--	--	--	--	--	--	69 T	5	3	68 R,5	**6**	**3**
R 4. 66 W,C	S1026 & S1028 R/W	SFR	1	71 MOD	71	73	0	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	69	4	0	**68 R**	**5**	**1**
R 4. 67 W	--	SFR	3	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 68 W		SFR	5	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 69 W		SFR	5	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 70 W		SFR	7	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 71 W,*		SFR	3	59 MOD	61	63	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	61	2	0	59	4	0
R 4. 72 W		SFR	10	68 M,LT20,CAL	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 73 W		SFR	8	67 MOD	67	70	0	3	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	67	3	0
R 4. 74 W		SFR	8	69 MOD	69	71	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	2	0	68	3	0
R 4. 75 W,*		SFR	2	60 MOD	62	64	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	60	4	0
R 4. 76 W,*		--	--	60 M,ST35A	62	64	2	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	62	2	0	61	3	0
R 4. 77 W,*		SFR	1	62 MOD	64	65	2	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	65	0	0	63	2	0
R 4. 78 W		SFR	3	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 79 W,*	--	MH	2	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	66	2	0	65	3	0
R 4. 80 W		MH	6	68 MOD	68	70	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	69	1	0	68	2	0
R 4. 80A W		MH	7	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	2	0	66	3	0
R 4. 81 W		MH	5	67 M,ST37	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	67	2	0
R 4. 82 W,*		MH	3	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	67	1	0	65	3	0
R 4. 83 W		MH	3	67 MOD	67	69	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	68	1	0	66	3	0
R 4. 83A W,*	R/W	MH	2	66 MOD	66	67	0	1	B (67)	A/E	68	-1	0	67	0	0	66	1	0	65	2	0	63	4	0
R 4. 83B W,*		MH	2	64 MOD	64	66	0	2	B (67)	A/E	66	0	0	65	1	0	65	1	0	64	2	0	62	4	0

Notes:

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Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 84 W	--	MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 85 W		MH	7	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 86 W,*		MH	5	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 87 W		MH	12	60 M,LT20B,CAL	62	61	2	-1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88 W,*		MH	7	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 88A W		MH	3	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 89 W		MH	4	62 MOD	64	64	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 90 W		MH	6	59 MOD	61	61	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 91 W		MH	9	58 MOD	60	60	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 92 W	--	MH	7	61 M,ST37A	63	63	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 93 W		MH	3	60 MOD	62	62	2	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

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Table G-16 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 4 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 4. 94 W	--	SFR	4	61 MOD	62	62	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 95 W		SFR	5	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 96 W,*		SFR	2	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 97 W		SFR	4	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 98 W		SFR	7	62 M,ST37A	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 99 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 100 W,*		SFR	2	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 101 W		SFR	9	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 102 W		SFR	4	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 103 W		SFR	6	63 M,LT20A,CAL	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 104 W		SFR	7	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 105 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 106 W		SFR	7	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 107 W,*		SFR	2	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 108 W		SFR	6	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 109 W		SFR	3	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 4. 110 W		SFR	1	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-17 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 5

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 1 W	--	SFR	5	62 MOD	61	62	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 2 W		SFR	5	62 MOD	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 3 W		SFR	4	62 M,ST39,CAL	61	61	-1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 4 W		SFR	4	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 5 W	--	SFR	3	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 6 W,*		SFR	1	58 MOD	59	60	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 7 W,*		SFR	2	55 MOD	56	57	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 8 W		SFR	3	61 M,ST40	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 9 W		SFR	2	61 MOD	62	63	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 10 W		SFR	3	60 MOD	61	62	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-17 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 11 W,K7	--	SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 12 W,K7,*		SFR	4	59 MOD	60	61	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 13 W,K7		SFR	2	63 MOD	64	65	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 14 W,K7,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 15 W,K7		SFR	2	63 MOD	64	66	1	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 16 W,K7,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 17 W,K7		SFR	2	64 MOD	65	66	1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 18 W,K7,*		SFR	4	57 MOD	58	59	1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 19 W,K7	S1116 Shoulder	SFR	2	67 MOD	66	66	-1	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	66 7	0	*0*
R 5. 20 W,K7,*		SFR	4	60 MOD	59	60	-1	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	60 7	0	*0*
R 5. 21 W,K7		SFR	2	65 MOD	64	65	-1	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	65 7	0	*0*
R 5. 22 W,K7,*		SFR	4	59 MOD	58	59	-1	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	59 7	0	*0*
R 5. 23 W,K7	--	REC	4	68 M,ST41	67	68	-1	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 24 W,K7		SFR	12	61 MOD	60	61	-1	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 25 W,K7		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
K7 - A calibration factor of +1.8 dB is applied for these receivers.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-17 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	10 feet			12 feet			14 feet			16 feet			18 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 5. 26 W,K7	S1132 Shoulder	SFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	65 7	0	0
R 5. 27 W,K7,*		SFR	4	58 MOD	58	59	0	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	59 7	0	0
R 5. 28 W,K7		SFR	2	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	66 7	0	0
R 5. 29 W,K7,*		SFR	4	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	58 7	0	0
R 5. 30 W,K7		SFR	2	69 MOD	69	68	0	-1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	68 7	0	0
R 5. 31 W,K7,*		SFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	59 7	0	0
R 5. 32 W,K7		SFR	4	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	68 7	0	0
R 5. 33 W,K7		SFR	2	68 M,ST41A	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	--	--	--	68 7	0	0
R 5. 34 W,K7,*		SFR	4	59 MOD	59	60	0	1	B (67)	NONE	--	--	--	--	--	--	-- T	--	--	--	--	--	60 7	0	0
R 5. 35 W,K7	--	SFR	8	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 36 W,K7,*		SFR	4	59 MOD	59	59	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 37 W,K7		SFR	4	68 M,LT22,CAL	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 37A W,K7,*		SFR	4	60 MOD	60	60	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 5. 38 W,K7		REC	2	67 MOD	67	68	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

C - Critical design receiver.

K7 - A calibration factor of +1.8 dB is applied for these receivers.

W - Reciever protected by existing private property wall or soundwall.

* - Non first row residences.

Table G-17 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 5 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 5. 39 W,K8	S1162	REC	1	65 MOD	66	67	1	1	B (67)	A/E	66	1	--	64	3	*0*	**61** R,T	**6**	*1*	61	6	*1*	64 7	3	*0*
R 5. 40 W,K8,C	Shoulder	REC	1	66 M,ST42	67	68	1	1	B (67)	A/E	67	1	--	66	2	*0*	**63** R,T	**5**	*1*	63	5	*1*	64 7	4	*0*
R 5. 41 W	--	MFR	3	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 5. 42 W		MFR	4	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - These noise levels are not reliable due to issues with procedures used in TNM to calculate noise levels when two parallel walls intervene between source and receiver.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

W - Reciever protected by existing private property wall or soundwall.

C - Critical design receiver.

* - Non first row residences.

K8 - An adjustment factor of -1 dB is applied for these receivers to account for the transmission loss from an intervening tarp-covered fence.

Table G-18 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 6

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 1 W,*	S431 Shoulder	MFR	2	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	59	2	0	58	3	0
R 6. 2 W		MFR	2	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	65	1	0	64	2	0	63	3	0
R 6. 3 W		MFR	2	68 MOD	68	69	0	1	B (67)	A/E	--	--	--	--	--	--	68	1	0	68	1	0	67	2	0
R 6. 4 W		MFR	2	64 M,LT24	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	63	1	0
R 6. 5 W		MFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 6 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 7 W,*		MFR	2	60 MOD	60	60	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	59	1	0
R 6. 8 W		MFR	4	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 9 W		MFR	2	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 10 W		MFR	4	68 MOD	68	67	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 11 W		MFR	4	66 MOD	66	66	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 12 W	S445 Shoulder	MFR	3	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 13 W		MFR	4	64 M,ST43	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 14 W		MFR	3	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 15 W		MFR	4	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 16 W,*		MFR	6	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 17 W		MFR	6	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 18 W		REL	1	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 19 W	--	LIB	--	65 MOD	65	65	0	0	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 19 W,Int		LIB	1	45 MOD	45	45	0	0	E (52)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-18 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 20 W	--	SFR	4	58 MOD	58	60	0	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 21 W,*		SFR	1	58 MOD	58	58	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 22 W		SFR	5	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 23 W		SFR	4	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 24 W	--	SFR	3	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	66	1	0	65	2	0	65	2	0
R 6. 25 W,*		SFR	13	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	60	1	0	59	2	0	59	2	0
R 6. 26 W	S434 Shoulder	SFR	3	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	2	0
R 6. 27 W		SFR	2	67 M,LT23	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 28 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	67	0	0
R 6. 29 W		SFR	2	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	66	1	0
R 6. 30 W,*	--	SFR	1	60 MOD	60	61	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	60	1	0
R 6. 31 W		SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	65	1	0
R 6. 32 W		SFR	3	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	0	0
R 6. 33 W		SFR	3	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	64	1	0
R 6. 34 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	61	2	0
R 6. 34A W		SFR	2	66 MOD	66	67	0	1	B (67)	A/E	67	0	0	65 T	2	0	65	2	0	64	3	0	64	3	0
R 6. 35	S1226 R/W	SFR	1	64 MOD	68	70	4	2	B (67)	A/E	69	1	0	67 T	3	0	67	3	0	66	4	0	66	4	0
R 6. 35A		SFR	1	64 MOD	68	70	4	2	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	**65 R**	**5**	***1***
R 6. 36		SFR	1	65 MOD	69	70	4	1	B (67)	A/E	70	0	0	68 T	2	0	67	3	0	66	4	0	66	4	0
R 6. 36A C		SFR	2	66 MOD	70	71	4	1	B (67)	A/E	70	1	0	68 T	3	0	67	4	0	67	4	0	**66 R**	**5**	***2***
R 6. 37 W	--	SFR	2	63 M,ST44	67	68	4	1	B (67)	A/E	68	0	0	67	1	0	67 T	1	0	67	1	0	66	2	0

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - Existing soundwall is at a height of 16 feet.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

C - Critical design receiver.

Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.

W - Reciever protected by existing private property wall or soundwall.

* - Non first row residences.

Table G-18 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 38 W		SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 39 W		SFR	2	68 MOD	68	68	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 40 W,*		SFR	2	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 41 W	--	SFR	3	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 42 W		SFR	5	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 43 W		SFR	4	65 MOD	65	66	0	1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 44 W,*		SFR	2	63 MOD	63	64	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 45 W	S464	SFR	1	67 MOD	67	67	0	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 46 W	R/W	SFR	1	67 MOD	67	66	0	-1	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- 7	--	--
R 6. 47 W		SFR	2	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 48 W,*		SFR	2	64 MOD	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 49 W		SFR	3	65 MOD	65	65	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 50 W		SFR	3	64 M,LT25	64	64	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 51 W		SFR	4	63 MOD	63	63	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 52 W		SFR	3	68 MOD,F	64	64	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 53 W,*		SFR	2	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 54 W	--	SFR	4	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 55 W		SFR	3	67 MOD,F	63	63	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 56 W		SFR	3	66 MOD,F	62	62	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 57 W		SFR	3	64 MOD,F	60	61	-4	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 58 W		SFR	3	63 M,ST45,F	59	59	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 59 W		SFR	3	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 60 W,*		SFR	5	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 61 W		SFR	2	65 MOD,F	61	61	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
F - At these receivers, the existing noise measurements were conducted before the construction of a soundwall that is part of the WCC project but is included in all future alternatives; therefore, there is a 4 dB reduction in future traffic noise levels.
C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table G-18 – Predicted Future Noise Levels and Barrier Analysis – Alternative 3 – Segment 6 (Cont'd)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR	Leq(h)	I.L.	NBR
R 6. 62 W	--	SFR	5	62 MOD,F	58	58	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 63 W		SFR	3	63 MOD,F	59	59	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 64 W		SFR	3	64 MOD,F	60	60	-4	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 65 W		SFR	3	61 MOD	62	62	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 66 W,*		SFR	4	58 MOD	59	59	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 67 W		SFR	3	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 68 W		SFR	4	62 MOD	63	63	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 69 W		SFR	3	63 MOD	64	64	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 70 W		SFR	3	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 71 W		SFR	4	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 72 W		SFR	3	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 6. 73 W	--	SFR	5	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 74 W		SFR	5	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 75 W		SFR	5	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 76 W,*		SFR	2	59 MOD	60	60	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 77 W		SFR	6	65 M,LT26,CAL	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 78 W,*		SFR	1	60 MOD	61	61	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 79 W		SFR	7	65 MOD	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 80 W		SFR	7	65 M,ST46	66	66	1	0	B (67)	A/E	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--
R 6. 81 W		SFR	6	64 MOD	65	65	1	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	-- [7]	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.
2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.
3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.
4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.
5 - Barrier height needed to meet requirements at adjacent receptor(s).
6 - Traffic noise from the freeway only; other local noise sources are not included.
7 - Existing soundwall is at a height of 16 feet.
R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.
T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.
F - At these receivers, the existing noise measurements were conducted before the construction of a soundwall that is part of the WCC project but is included in all future alternatives; therefore, there is a 4 dB reduction in future traffic noise levels.

C - Critical design receiver.
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.
W - Reciever protected by existing private property wall or soundwall.
* - Non first row residences.

Table 12. Future No Build and Build Noise Levels – Alternative 3

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 2.77A W,C	S776 / Shoulder	REC	1	74 MOD	75	77	1	2	B (67)	A/E	72	5	*1*	71	6	*1*	**71 R,T**	**6**	***1***	70	7	*1*	70	7	*1*
R 2.77 W	--	MFR	2	60 MOD	61	59	1	-2	B (67)	NONE	59	0	*0*	59	0	*0*	59	0	*0*	59	0	*0*	59	0	*0*
R 2.78 W		MFR	4	61 M,ST19	62	60	1	-2	B (67)	NONE	60	0	*0*	60	0	*0*	60	0	*0*	60	0	*0*	60	0	*0*
R 2.79 W		MFR	4	65 MOD	66	65	1	-1	B (67)	NONE	65	0	*0*	65	0	*0*	65	0	*0*	65	0	*0*	65	0	*0*
R 2.80 W	S786 & S790 / R/W	SFR	3	64 MOD	65	66	1	1	B (67)	A/E	66	0	*0*	65	1	*0*	65 T	1	*0*	65	1	*0*	65	1	*0*
R 2.81 W,C		SFR	3	68 MOD	69	70	1	1	B (67)	A/E	68	2	*0*	68	2	*0*	66 T	4	*0*	**65 R**	**5**	***3***	64	6	*3*
R 2.82 W		SFR	2	67 MOD	68	69	1	1	B (67)	A/E	--	--	--	--	--	--	67 T	2	*0*	67	2	*0*	66	3	*0*
R 2.83 W		SFR	3	66 MOD	66	68	0	2	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	67	1	*0*	66	2	*0*
R 2.84 W		SFR	4	66 M,LT11,CAL	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	*0*	65	2	*0*
R 2.85 W		SFR	4	66 MOD	66	67	0	1	B (67)	A/E	--	--	--	--	--	--	-- T	--	--	66	1	*0*	65	2	*0*
R 2.86 W	--	SFR	3	65 MOD	65	67	0	2	B (67)	A/E	--	--	--	--	--	--	--	--	--	65	2	*0*	64	3	*0*
R 2.87 W		SFR	4	64 MOD	64	65	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	64	1	*0*	63	2	*0*
R 2.88 W	--	SFR	4	62 MOD	62	63	0	1	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.89 W		SFR	3	63 MOD	63	59	0	-4	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.90 W		SFR	3	61 MOD	61	59	0	-2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.91 W		SFR	2	62 MOD	62	62	0	0	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.92 W		SFR	1	59 MOD	59	61	0	2	B (67)	NONE	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.

3 - M - Measured noise level; STxx or LTxx - measurement site number; CAL - noise model calibration site; MOD - Estimated from No-Build Alternative and measurement sites.

4 - S = Substantial Increase (12 dBA or more); A/E = Approach or exceed NAC.

5 - Barrier height needed to meet requirements at adjacent receptor(s).

6 - Traffic noise from the freeway only; other local noise sources are not included.

7 - Existing soundwall is at a height of 16 feet.

R - The minimum height to meet feasibility requirements of Caltrans' Noise Abatement Criteria.

T - Minimum height required to block the line-of-sight from the receptor to truck exhaust stacks.

C - Critical design receiver.

Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.

W - Reciever protected by existing private property wall or soundwall.

* - Non first row residences.

Table 12. Future No Build and Build Noise Levels – Alternative 3 (Con't)

Receiver I.D.	Barrier I.D. and Location	Land Use[2]	Number of Dwelling Units	Existing Noise Level Leq(h), dBA[1,3]	I-405 PA-ED Alternative 3 Future Worst Hour Noise Levels - Leq(h), dBA[1,6]						Noise Prediction with Barrier, Barrier Insertion Loss (I.L.), and Number of Benefitted Receivers (NBR)														
					Design Year No Build Noise Level Leq(h), dBA[1]	Design Year Build Noise Level Leq(h), dBA[1]	Design Year No Build Noise Level Minus Existing Conditions Leq(h), dBA	Design Year Build Noise Level Minus No Build Conditions Leq(h), dBA	Activity Category (NAC)	Impact Type[4]	8 feet			10 feet			12 feet			14 feet			16 feet		
											Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*	Leq(h)	I.L.	*NBR*
R 2.93	S795 / Shoulder	MOT	7	81 MOD	81	83	0	2	B (67)	A/E	70	13	*7*	70	13	*7*	69	14	*7*	**69 R,5**	**14**	***7***	68	15	*7*
R 2.94		MOT	--	81 MOD	81	83	0	2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.94 Int		MOT	8	51 MOD	51	53	0	2	E (52)	A/E	39	14	*8*	38	15	*8*	36	17	*8*	**35 R,5**	**18**	***8***	34	19	*8*
R 2.94A		MOT	--	81 MOD	81	84	0	3	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.94A Int		MOT	22	51 MOD	51	54	0	3	E (52)	A/E	54	0	*0*	54	0	*0*	52	2	*0*	**44 R**	**10**	***22***	40	14	*22*
R 2.94B		MOT	--	81 MOD	81	83	0	2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
R 2.94B Int		MOT	22	51 MOD	51	53	0	2	E (52)	A/E	53	0	*0*	53	0	*0*	53	0	*0*	53	0	*0*	53	0	*0*
R 2.95 C		MOT	7	81 MOD	81	83	0	2	B (67)	A/E	70	13	*7*	68 T	15	*7*	67	16	*7*	**66 R**	**17**	***7***	65	18	*7*
R 2.96		MOT	1	60 MOD	60	61	0	1	B (67)	NONE	60	1	*0*	60	1	*0*	60	1	*0*	60	1	*0*	59	2	*0*
R 2.97		REC	3	79 MOD	79	81	0	2	B (67)	A/E	72	9	*3*	**72 R,5**	**9**	***3***	69	12	*3*	67	14	*3*	67	14	*3*
R 2.97A		REC	--	79 MOD	79	81	0	2	B (67)	A/E	70	11	--	70	11	--	68	13	--	67	14	--	66	15	--
R 2.98		REC	3	79 MOD	79	81	0	2	B (67)	A/E	**70 R**	**11**	***3***	69	12	*3*	68	13	*3*	67	14	*3*	66	15	*3*
R 2.99		REC	3	79 MOD	79	82	0	3	B (67)	A/E	**70 R**	**12**	***3***	69	13	*3*	67	15	*3*	67	15	*3*	66	16	*3*

Notes:

1 - Leq(h) are A-weighted, peak hour noise levels in decibels.

2 - Land Use: SFR - single-family residence; MFR - multi-family residence; MH - mobile Home; MOT - motel/hotel; SCH - school; REC - recreational/park; REL - religious institution; LIB - library.

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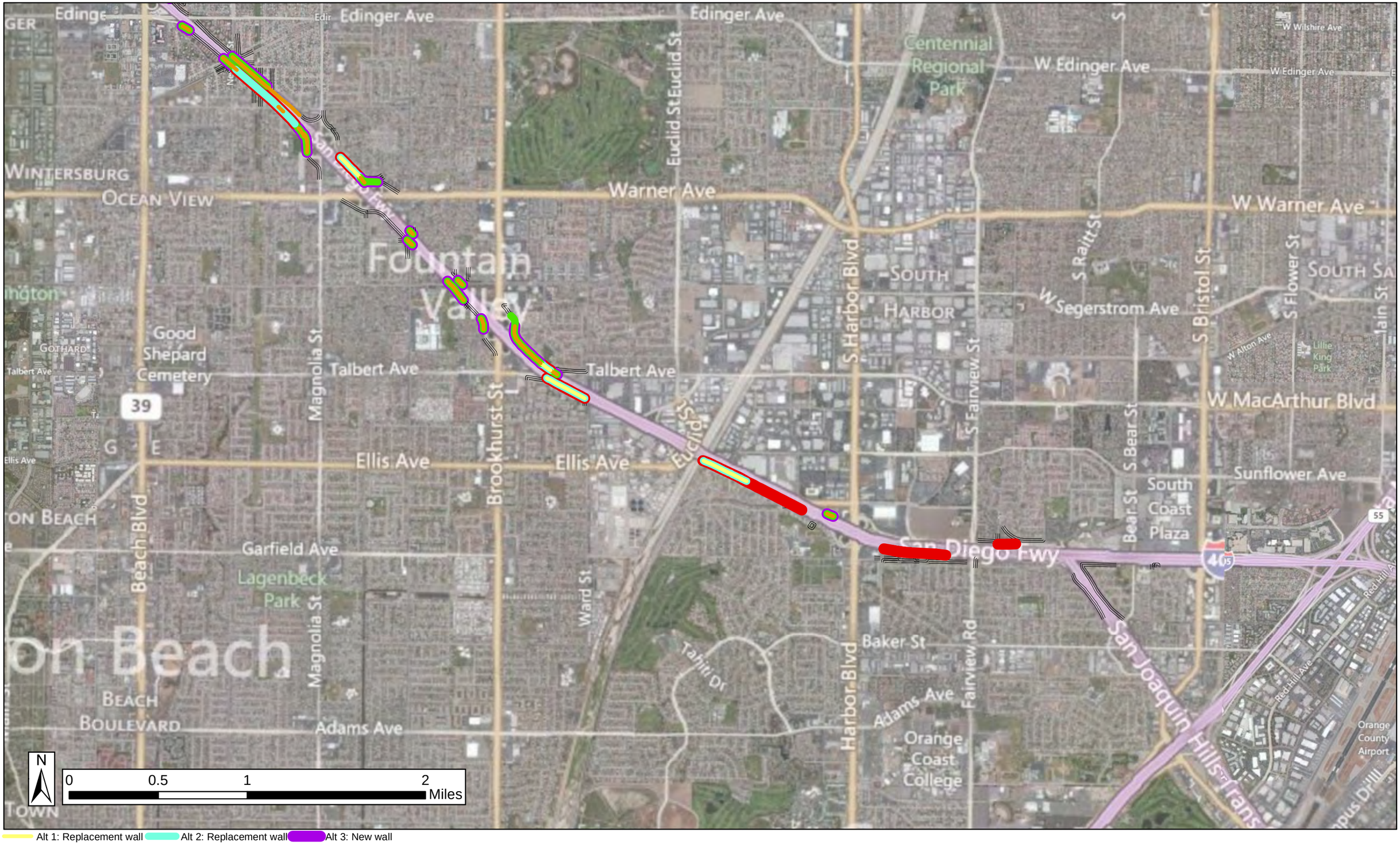
Int - The modeled exterior noise levels have been reduced based on window types and the interior noise criteria has been used for this receiver because there is no outdoor use.

W - Reciever protected by existing private property wall or soundwall.

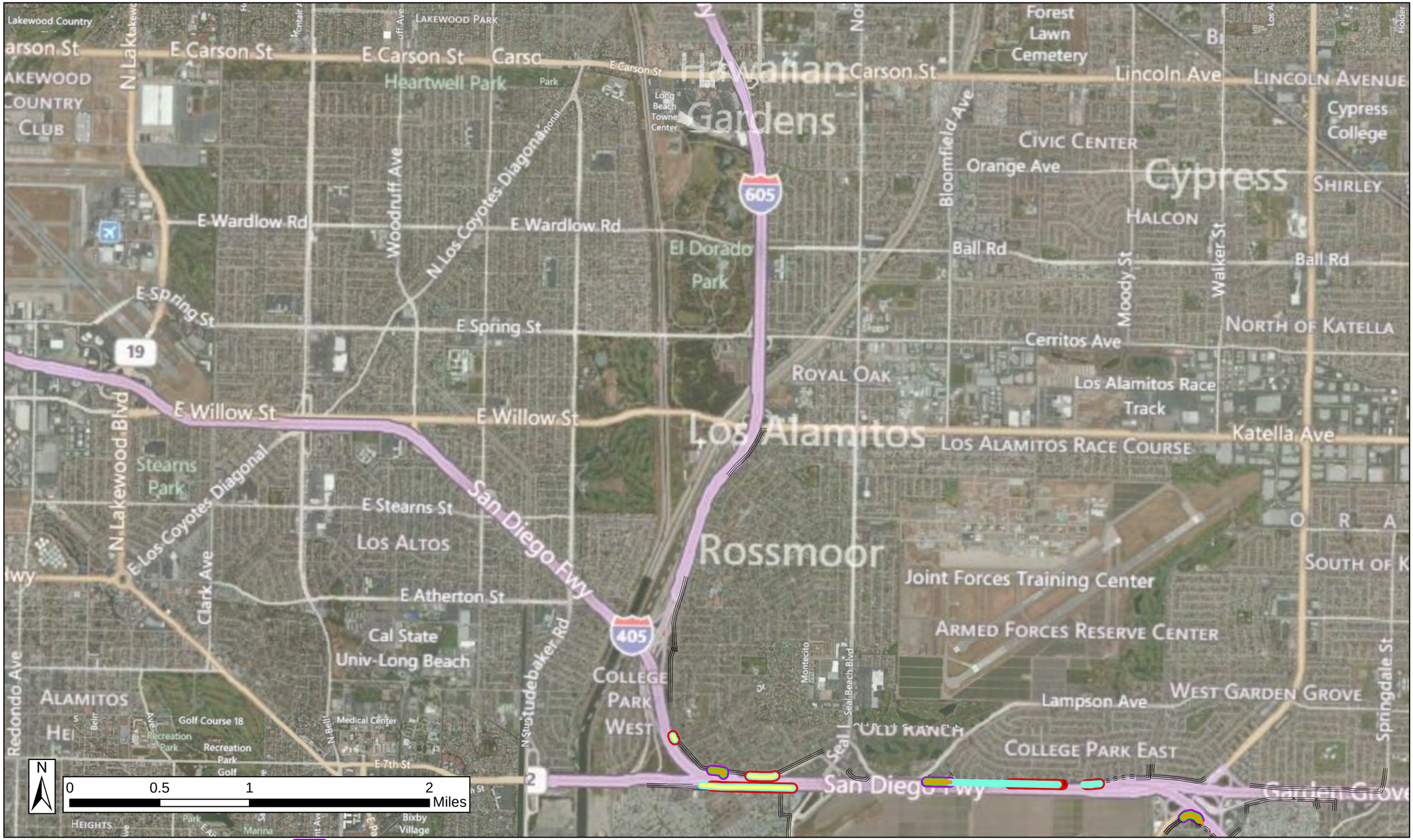
* - Non first row residences.

N2: Comparison of Recommended Soundwall Locations



Alt 1: Replacement wall
Alt 2: Replacement wall
Alt 3: New wall
Alt 1: New wall
Alt 2: New wall
Alt 3: Replacement wall
Existing Wall

Alt 1: Replacement wall
Alt 2: Replacement wall
Alt 3: New wall
Alt 1: New wall
Alt 2: New wall
Alt 3: Replacement wall
Existing Wall



Alt 1: Replacement wall
Alt 2: Replacement wall
Alt 3: New wall
Alt 1: New wall
Alt 2: New wall
Alt 3: Replacement wall
Existing Wall

N3: Alternative 1 Reasonableness Analysis Summary and Recommended Soundwall Locations

TABLE 1 - Noise Abatement Information Alternative 1 (1 of 3)

Noise Barrier No.	Height (feet)	Acoustically Feasible?	Number of Benefited Residences	Total Reasonable Allowance	Estimated Construction Cost	Cost Less than Allowance	Preliminary Noise Abatement Decision
S649	12	No	N/A	N/A	N/A	N/A	Replace in-kind
S699	16	No	N/A	N/A	N/A	N/A	Replace in-kind
S705	12	No	N/A	N/A	N/A	N/A	Replace in-kind
S710	12	No	N/A	N/A	N/A	N/A	Replace in-kind
S708	12	Yes	21	$945,000	$584,000	Yes	Reasonable
S718	16						Reasonable
S733	12-14	Yes	1	$43,000	$112,000	No	Not Reasonable
S746	12	Yes	2	$98,000	$59,000	Yes	Reasonable
S747A	12-14	Yes	2	$98,000	$137,000	No	Not Reasonable
S747B	16	Yes	2	$98,000	$119,000	No	Replace in-kind*
S765	14-16	No	N/A	N/A	$74,000	N/A	Replace in-kind*
S766	14	No	N/A	N/A	$50,000	N/A	Replace in-kind*
S776	12	Yes	1	$39,000	$82,000	No	Reasonable Severe Impact
S795	12	Yes	53	$2,385,000	$356,000	Yes	Reasonable
S807	16	Yes	9	$333,000	$258,000	Yes	Reasonable
S811	16						Replace in-kind (higher)
S819	12	No	N/A	N/A	N/A	N/A	Replace in-kind
S828A	12-14-16	Yes	3	$129,000	$118,000	Yes	Replace in-kind (higher)
S828B	12-14-16	Yes	9	$405,000	$557,000	No	Not Reasonable
S841	16	Yes	7	$399,000	$214,000	Yes	Reasonable
S857	12	Yes	7	$329,000	$74,000	Yes	Reasonable

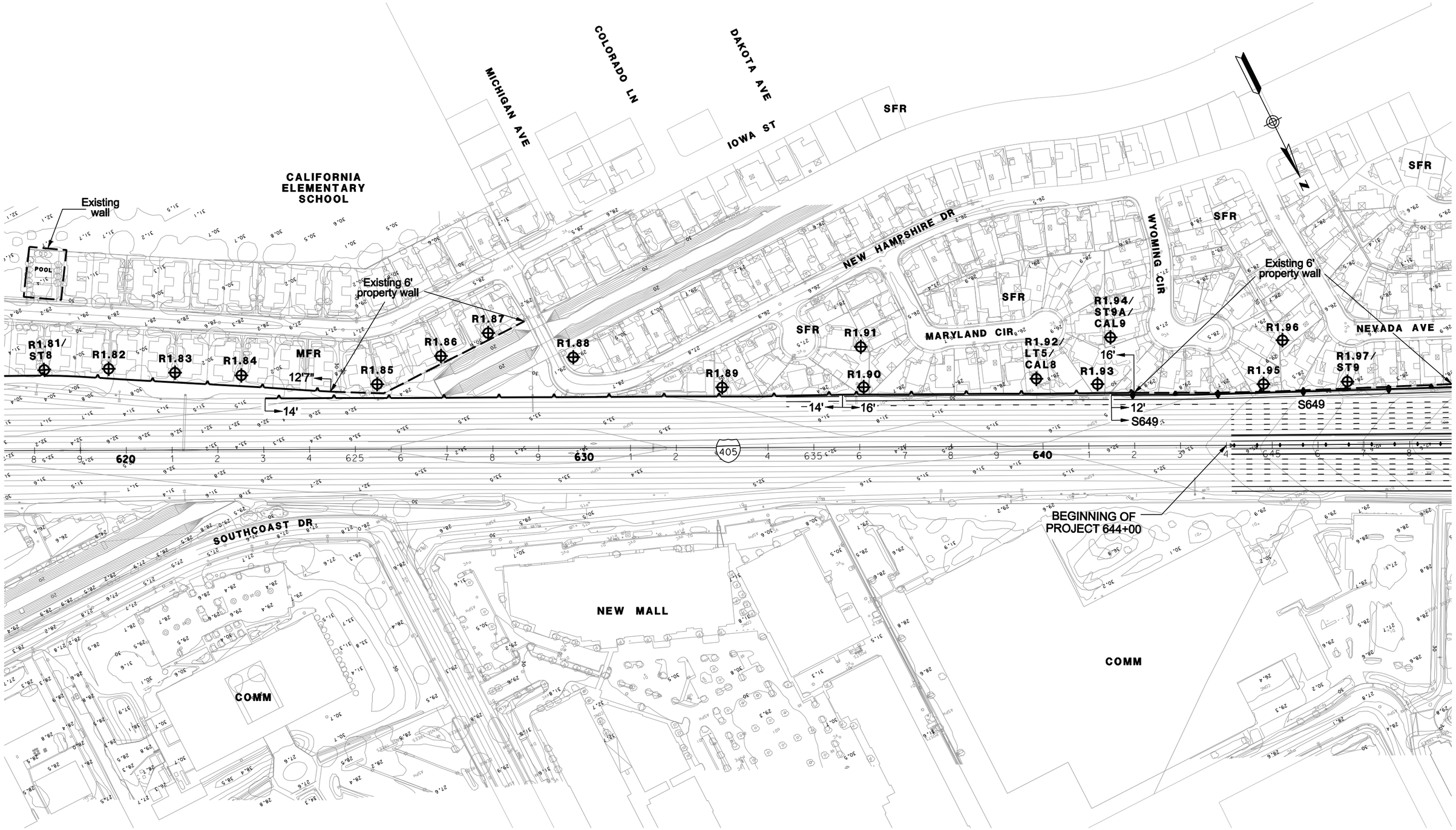
TABLE 1 - Noise Abatement Information Alternative 1 (2 of 3)

Noise Barrier No.	Height (feet)	Acoustically Feasible?	Number of Benefited Residences	Total Reasonable Allowance	Estimated Construction Cost	Cost Less than Allowance	Preliminary Noise Abatement Decision
S868	16	Yes	1	$35,000	$121,000	No	Not Reasonable
S896	10	No	N/A	N/A	$30,000	N/A	Replace in-kind*
S786/S790	16-14	Yes	3	$129,000	$134,000	No	Not Reasonable
S902	8	No	N/A	N/A	N/A	N/A	Replace in-kind
S910	10-12-14	Yes	7	$315,000	$262,000	Yes	Replace in-kind (higher)
S916	16						Reasonable
S909	14	Yes	6	$270,000	$204,000	Yes	Reasonable
S911	10-12-14						Replace in-kind (higher)
S141	8-10	No	N/A	N/A	N/A	N/A	Replace in-kind
S935	14	Yes	3	$135,000	$113,000	Yes	Reasonable
S182	10	No	N/A	N/A	N/A	N/A	Replace in-kind
S972	10	Yes	6	$222,000	$193,000	Yes	Replace in-kind
S978	12						Reasonable
S995	12-16	Yes	2	$70,000	$76,000	No	Not Reasonable
S998	16	Yes	2	$90,000	$53,000	Yes	Reasonable
S1006	16	Yes	7	$371,000	$123,000	Yes	Reasonable
S1009	16	Yes	11	$561,000	$316,000	Yes	Reasonable
S1016	16	Yes	8	$376,000	$308,000	Yes	Reasonable
S1020	16						Replace in-kind (higher)
S1024	16						Reasonable

TABLE 1 - Noise Abatement Information Alternative 1 (3 of 3)

Noise Barrier No.	Height (feet)	Acoustically Feasible?	Number of Benefited Residences	Total Reasonable Allowance	Estimated Construction Cost	Cost Less than Allowance	Preliminary Noise Abatement Decision
S1026	14	Yes	1	$45,000	$91,000	No	Replace in-kind*
S1028	16						Not Reasonable
S1079	14	Yes	5	$245,000	$190,000	Yes	Replace in-kind (higher)
S1083	14						Reasonable
S1162	12	Yes	3	$129,000	$225,000	No	Not Reasonable
S431	10-14	No	N/A	N/A	N/A	N/A	Replace in-kind
S434	14	No	N/A	N/A	N/A	N/A	Replace in-kind
S445	14	No	N/A	N/A	N/A	N/A	Replace in-kind
S1226	16	Yes	4	$188,000	$163,000	Yes	Reasonable
S464	16	No	N/A	N/A	N/A	N/A	Replace in-kind

*Replacement or gap closure soundwall for existing berm or natural abatement.



LEGEND

- RXX – RECEIVER SITE
- LT – LONGTERM MEASUREMENT
- ST – SHORTTERM MEASUREMENT
- CAL – CALIBRATION SITE
- EXISTING WALL
- SOUNDWALL
- EXISTING SOUNDWALL
- REPLACEMENT IN KIND SOUNDWALL
- SFR – SINGLE FAMILY RESIDENCE
- MFR – MULTI-FAMILY RESIDENCE
- COMM – COMMERCIAL
- b – BENEFITED RESIDENCE

1in : 200ft

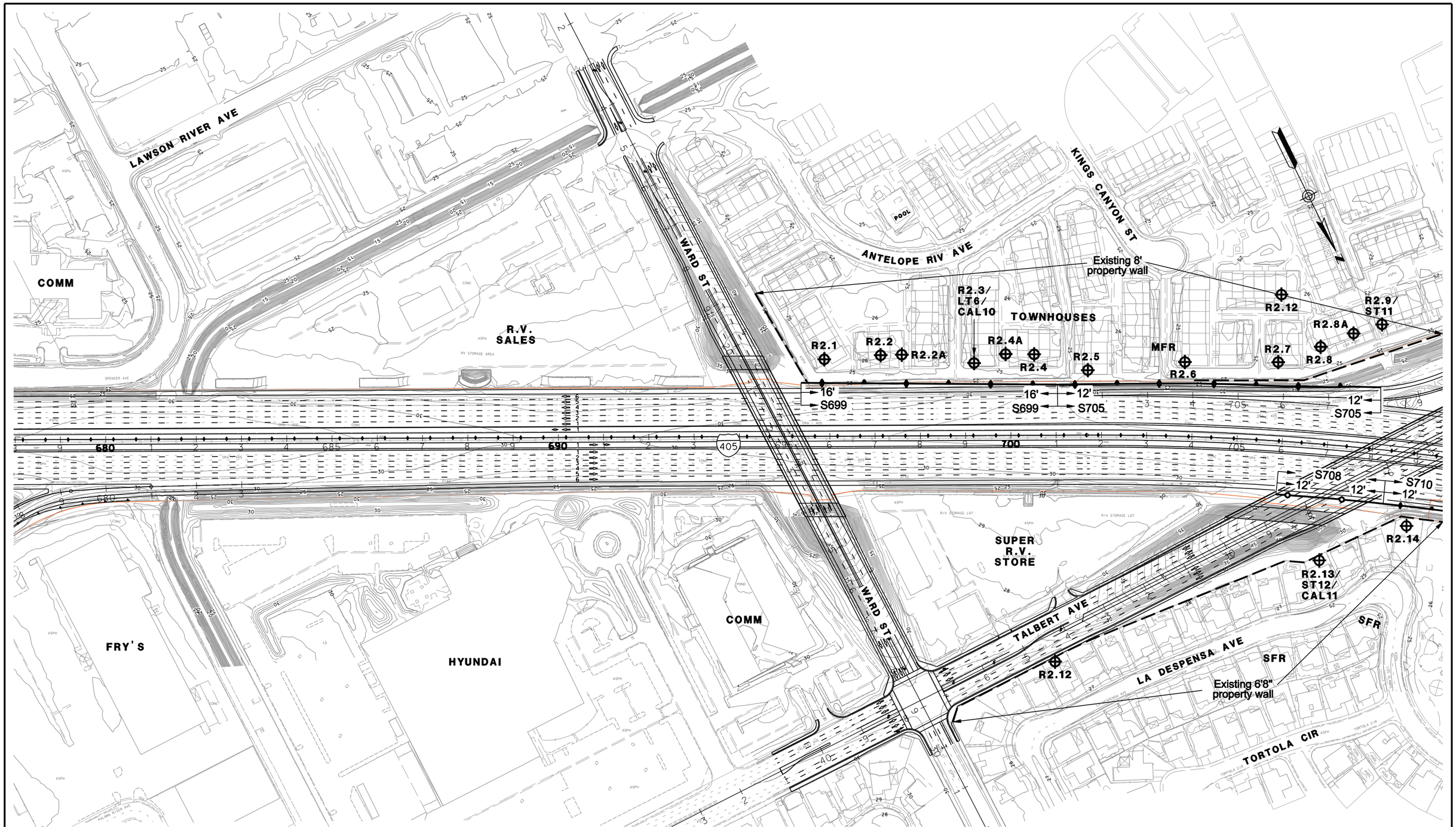
0 ft 100ft 200ft 300ft

PARSONS
100 WEST WALNUT ST.
PASADENA, CA 91124
(626) 440-6100

I-405 WIDENING PA/ED PROJECT NADR RECOMMENDED BARRIER HEIGHTS & LOCATIONS ALT1

FEBRUARY 25, 2011

FIGURE 5



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- RXX – RECEIVER SITE
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FIGURE 7