APPENDIX B - 2015 EXISTING AND FUNDED NETWORK -- CONSTRUCTION COSTS

County	Route	From	To	Segments with PSRs See Map for Segment Location #	Distance (Lane Miles) WB	Distance (Lane Miles) EB	Distance (Lane Miles) SB	Distance (Lane Miles) NB	Comments
CC	SR4	SR 160	Port Chicago Highway	4,5	15.3	15.4			**50% Medium and 50% High Cost Option:** Soundwall to outside makes widening difficult.
Total Corridor SR4					**15.3**	**15.4**			
CC		Carquinez Bridge	Central Ave (Alameda County Line)	6	16.0	14.6			
ALA	I-80	Central Ave (Alameda County Line)	Bay Bridge Toll Plaza	6	5.9	6.0			**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
SOL	I-80	Air Base Pkwy IC	SR 12	14,15	6.6	6.7			**18149656.14**
Total Corridor I-80					**28.5**	**27.3**			
ALA	SR 84	Newark Blvd	Paseo Padre/Thornton incl. Toll Plaza Dumbarton Bridge	1	3.5				**High Cost Option:** PSR describes only 1 mile of HOV widening with possible ROW take. No specific plan details.
Total Corridor SR 84					**3.5**				
SC	SR 85	US 101 (South San Jose)	US 101 (Mountain View)				26.5	26.3	**Medium Cost Option:** North of I-280 (approx 5 miles). **50% Low Cot Option and 50% Medium Cost Option** south of I-280. Standard outside and inside shoulders
Total Corridor SR 85							**26.5**	**26.3**	
SC	SR 87	US 101	SR 85				9.1	9.2	**Low Cost Option:** Construction cost for the VTA HOV segment on this route (7 miles) was $68 Million. Input from VTA suggests using a low range cost to convert to HOT lane.
Total Corridor SR 87							**9.1**	**9.2**	
ALA	SR 92	Hesperian	Toll Plaza - San Mateo Bridge		1.6				**High Cost Option**
Total Corridor SR 92					**1.6**				
SM	US 101	Whipple Ave	Line				7.0	7.0	**High Cost Option**
SC	US 101	San Mateo/Santa Clara County Line	Cochrane				35.0	34.0	**75% segment is Low Cost Option** (South of San Jose to Cochrane) and **25% of segment is equally split between High and Medium Cost Option:** From San Jose to north
MAR	US 101	SB 101/Seminary Ave & NB 101/SR1	SR 37	8,17,22			13.8	14.9	**25% Low and 50 % Medium Cost Option:** Novato, **25% High Cost Option**: Southern Marin
SON	US 101	Old Redwood Highway (Petaluma)	Windsor River Rd	16,18,19,20,21			21.7	21.2	**Medium Cost Option:** Santa Rosa.
Total Corridor US 101							**77.5**	**77.1**	
SC	SR 237	I-880	Mathilda I/C	9	7.0	7.0			**High Cost Option:** Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures
Total Corridor SR 237					**7.0**	**7.0**			
SC	I-280	Magdelena Ave	Leland Ave				11.5	11.1	**Medium Cost Option**
Total Corridor SR I-280							**11.5**	**11.1**	
ALA	I-580	Hacienda	Greenville	2,3		10.8			**Medium Cost Option:** Widen to outside
Total Corridor I-580						**10.8**			
SC	I-680	Caleveras	Alameda/Santa Clara County Line	10,11,12,13			2.5	2.5	**Medium Cost Option:** NB direction. Cost of SB HOT lane from I-680 Smart Carpool Project (2.5 mill/lane mile)
ALA	I-680	Alameda/Santa Clara County Line	SR 84	7			11.5	10.8	**Medium Cost Option:** NB direction. Cost of SB HOT lane from I-680 Smart Carpool Project (2.5 mill/lane mile)
CC	I-680	Marina Vista	Alcosta Blvd.	7			26.0	22.3	**Medium Cost Option**
Total Corridor I-680							**40.0**	**35.6**	
ALA	I-880	Marina	SR 237	12			25.0	22.9	**Medium Cost Option**
ALA	I-880	16 th Street	Merge with I-80 W					1.8	**50 % Medium to 50 % High Cost Option;** Appears that median shoulder widen for future lane and shld.
Total Corridor I-880							**25.0**	**24.7**	
Sub-Total Lane Miles and Total Cost					**55.9**	**60.5**	**189.6**	**184.0**	
Total Lane Miles all Directions				**490.0**					

Note 1: **HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.**

APPENDIX B - 2015 EXISTING AND FUNDED NETWORK -- CONSTRUCTION COSTS

County	Route	Low Range HOT Cost Cost/Lane Mile	Medium Range HOT Cost Cost/Lane Mile	High Range HOT Cost Cost/Lane Mile	HOT Cost Estimated Upgrade Costs (See Note 1)	HOT Cost (millions) Estimated Upgrade Costs (See Note 1)	Comments
		$ 1,364,636	**$ 2,243,985**	**$ 3,672,419**			
CC	SR4	$ 41,894,319	$ 68,890,327	$ 112,743,256	$ 90,816,791	$ 90.82	**50% Medium and 50% High Cost Option:** Soundwall to outside makes widening difficult.
Total Corridor SR4		**$ 41,894,319**	**$ 68,890,327**	**$ 112,743,256**	**$ 90,816,791**	**$ 90.82**	
CC		$ 41,757,855	$ 68,665,929	$ 112,376,014	$ 112,376,014	$ 112.38	
ALA	I-80	$ 16,239,166	$ 26,703,417	$ 43,701,783	$ 43,701,783	$ 43.70	**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
SOL	I-80	$ 18,149,656	$ 29,844,995	$ 48,843,169	$ 29,844,995	$ 29.84	**Medium Cost Option**
Total Corridor I-80		**$ 34,388,822**	**$ 56,548,412**	**$ 92,544,953**	**$ 185,922,792**	**$ 185.92**	
ALA	SR 84	$ 4,776,225	$ 7,853,946	$ 12,853,466	$ 12,853,466	$ 12.85	**High Cost Option:** PSR describes only 1 mile of HOV widening with possible ROW take. No specific plan details.
Total Corridor SR 84		**$ 4,776,225**	**$ 7,853,946**	**$ 12,853,466**	**$ 12,853,466**	**$ 12.85**	
SC	SR 85	$ 72,052,770	$ 118,482,387	$ 193,903,710	$ 99,910,540	$ 99.91	**Medium Cost Option:** North of I-280 (approx 5 miles). **50% Low Cot Option and 50% Medium Cost Option** south of I-280. Standard outside and inside shoulders
Total Corridor SR 85		**$ 72,052,770**	**$ 118,482,387**	**$ 193,903,710**	**$ 99,910,540**	**$ 99.91**	
SC	SR 87	$ 24,972,835	$ 41,064,918	$ 67,205,263	$ 24,972,835	$ 24.97	**Low Cost Option:** Construction cost for the VTA HOV segment on this route (7 miles) was $68 Million. Input from VTA suggests using a low range cost to convert to HOT lane.
Total Corridor SR 87		**$ 24,972,835**	**$ 41,064,918**	**$ 67,205,263**	**$ 24,972,835**	**$ 24.97**	
ALA	SR 92	$ 2,183,417	$ 3,590,375	$ 5,875,870	$ 5,875,870	$ 5.88	**High Cost Option**
Total Corridor SR 92		**$ 2,183,417**	**$ 3,590,375**	**$ 5,875,870**	**$ 5,875,870**	**$ 5.88**	
SM	US 101	$ 19,104,901	$ 31,415,784	$ 51,413,863	$ 51,413,863	$ 51.41	**High Cost Option**
SC	US 101	$ 94,159,870	$ 154,834,937	$ 253,396,894	$ 121,648,882	$ 121.65	**75% segment is Low Cost Option** (South of San Jose to Cochrane) and **25% of segment is equally split between High and Medium Cost Option:** From San Jose to north
MAR	US 101	$ 39,165,047	$ 64,402,358	$ 105,398,418	$ 68,342,045	$ 68.34	**25% Low and 50 % Medium Cost Option:** Novato, **25% High Cost Option**: Southern Marin
SON	US 101	$ 58,542,876	$ 96,266,939	$ 157,546,764	$ 96,266,939	$ 96.27	**Medium Cost Option:** Santa Rosa.
Total Corridor US 101		**$ 210,972,695**	**$ 346,920,019**	**$ 567,755,939**	**$ 337,671,729**	**$ 337.67**	
SC	SR 237	$ 19,104,901	$ 31,415,784	$ 51,413,863	$ 51,413,863	$ 51.41	**High Cost Option:** Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures
Total Corridor SR 237		**$ 19,104,901**	**$ 31,415,784**	**$ 51,413,863**	**$ 51,413,863**	**$ 51.41**	
SC	I-280	$ 30,840,769	$ 50,714,052	$ 82,996,664	$ 50,714,052	$ 50.71	**Medium Cost Option**
Total Corridor SR I-280		**$ 30,840,769**	**$ 50,714,052**	**$ 82,996,664**	**$ 50,714,052**	**$ 50.71**	
ALA	I-580	$ 14,738,067	$ 24,235,034	$ 39,662,123	$ 24,235,034	$ 24.24	**Medium Cost Option:** Widen to outside
Total Corridor I-580		**$ 14,738,067**	**$ 24,235,034**	**$ 39,662,123**	**$ 24,235,034**	**$ 24.24**	
SC	I-680	$ 6,823,179	$ 11,859,962	$ 18,362,094	$ 11,859,962	$ 11.86	**Medium Cost Option:** NB direction. Cost of SB HOT lane from I-680 Smart Carpool Project (2.5 mill/lane mile)
ALA	I-680	$ 30,431,378	$ 52,985,034	$ 81,894,938	$ 52,985,034	$ 52.99	**Medium Cost Option:** NB direction. Cost of SB HOT lane from I-680 Smart Carpool Project (2.5 mill/lane mile)
CC	I-680	$ 65,911,909	$ 108,384,456	$ 177,377,826	$ 108,384,456	$ 108.38	**Medium Cost Option**
Total Corridor I-680		**$ 103,166,466**	**$ 173,229,451**	**$ 277,634,858**	**$ 173,229,451**	**$ 173.23**	
ALA	I-880	$ 65,366,055	$ 107,486,862	$ 175,908,858	$ 107,486,862	$ 107.49	**Medium Cost Option**
ALA	I-880	$ 2,456,344	$ 4,039,172	$ 6,610,354	$ 5,324,763	$ 5.32	**50 % Medium to 50 % High Cost Option;** Appears that median shoulder widen for future lane and shld.
Total Corridor I-880		**$ 67,822,399**	**$ 111,526,035**	**$ 182,519,212**	**$ 112,811,625**	**$ 112.81**	
		Total Cost:	**$ 626,913,687**	**$ 1,034,470,741**	**$ 1,687,109,174**	**$ 1,170,428,048**	**$ 1,170.43**
				Avg. Cost per Mile:	*$ 2,388,629*	*$2.4 M/mile*	

Note 1: **HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.**

Note: All Costs are in 2006 Dollars (2006 $)

APPENDIX C - HOT NETWORK SEGMENTS ADDED 2015 and 2030 CONSTRUCTION COSTS

County	Route	From	To	Distance (Lane Miles) Added in WB	Distance (Lane Miles) Added in EB	Distance (Lane Miles) Added in SB	Distance (Lane Miles) Added in NB	Total Lane Miles HOT Lane Network (2015+2030) WB	Total Lane Miles HOT Lane Network (2015+2030) EB	Total Lane Miles HOT Lane Network (2015+2030) SB	Total Lane Miles HOT Lane Network (2015+2030) NB	Comments
CC	SR4	Port Chicago Highway	I-680	4.1	3.7			19.4	19.1			**50% Medium and 50% High Cost Option: Soundwall to outside makes widening difficult. Used $ 9.9 million per lane mile for HOV estimate based on PSRs available for the corridor.**
CC	SR 4/I-680	HOV Connector Facility										No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
Total Corridor SR4				**4.1**	**3.7**			**19.4**	**19.1**			
ALA/CC	I-80	Pomona/San Pablo thru IC and to Cummings (Carquinez Bridge)	Bay Bridge Toll Plaza					21.9	20.6			
SOL	I-80	Yolo County Line	SR 37	32.7	32.5			32.7	32.5			50% Low and 50% Medium Cost Option: Outside shoulder widths vary (10'-13') and the median shoulder width varies from 20' (south of SR 37) to 30' (north of Vallejo). 7 bridge structures (No PSR)
SOL	I-80	SR 37	Carquinez Bridge	4.6	4.6			4.6	4.6			**Medium Cost Option: PSR shows $48 mill. Need to be confirmed HOV widening assumed to be funded in Transportation 2030 Plan**
SOL	I-80	Air Base Pkwy IC	Suisun Valley Rd/I-680					6.6	6.7			
Total Corridor I-80				**37.3**	**37.1**			**65.8**	**64.4**			
ALA	SR 84	I-880/Newark Blvd	Paseo Padre/Thornton incl. Toll Plaza Dumbarton Bridge					3.5				
Total Corridor SR 84								**3.5**				
SC	SR 85	SR 87 Almaden	Moffett US 101							26.4	26.1	
Total Corridor SR 85										**26.4**	**26.1**	
SC	SR 87	US 101 Skyport	Capitol Expwy SR 85							9.1	9.2	
Total Corridor SR 87										**9.1**	**9.2**	
ALA	SR 92	Clawiter	Toll Plaza - San Mateo Bridge					1.6				
Total Corridor SR 92								**1.6**				
SM	US 101	Millbrae Ave	Whipple Ave			11.4	11.7			11.4	11.7	**High Cost Option, No PSR**
SC	US 101	Cochrane	SR 25			14.9	14.6			56.9	55.6	**Low Cost Option, HOV Costs based on VTP 2030, Approx. 6.2 million/lane mile**
MAR	US 101	SR37	San Antonio Rd			9.7	9.4					**Medium Cost Option for HOT conversion. HOV cost is 17.32 mill/lane mile based on estimate from the Marin/Sonoma Narrows project provided to MTC. HOV widening assumed funded in Transportation 2030 Plan**
SON	US 101	San Antonio Rd	Old Redwood Highway (Petaluma)			7.8	7.6			53.0	53.1	**Medium Option for HOT conversion. HOV cost is 17.32 mill/lane mile based on estimate from the Marin/Sonoma Narrows project provided to MTC. HOV widening assumed funded in Transportation 2030 Plan**
Total Corridor US 101						**43.8**	**43.3**			**121.3**	**120.4**	
SC	SR 237	Mathilda	SR 85	2.7	2.9			9.7	9.9			**High Cost Option: Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures HOV widening from Mathilda to SR 85 assumed funded in Transportation 2030 Plan**
Total Corridor SR 237				**2.7**	**2.9**			**9.7**	**9.9**			
SC	I-280	Leland Ave	US 101			3.5	4.2			15.0	15.3	**Medium Cost Option, No PSR**
Total Corridor I-280						**3.5**	**4.2**			**15.0**	**15.3**	
ALA	I-580	Greenville	San Joaquin County Line		10.2							**Medium Cost Option;PSR for part of segment shows $10 mil/HOV lane mi WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan**
ALA	I-580	San Joaquin County Line	I-680	20.9				20.9	21.0			**Medium Cost Option;PSR for part of segment shows $10 mil/HOV lane mi WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan**
ALA	I-580/I-680	Connector Facility										**No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements. Note that the connector cost comes from a preliminary cost estimate and is subject to change.**
Total Corridor I-580				**20.9**	**10.2**			**20.9**	**21.0**			
ALA	I-680	SR 84	Calveras/SR 237							14.0	13.3	
SC	I-680	Caleveras	US 101			9.0	9.0			9.0	9.0	**Medium Cost Option**
ALA	I-680	Alcosta Blvd	SR 84			10.6	10.5			10.6	10.5	**Medium Cost Option, HOV estimate for portion of NB 680 equal to 6.5 million/lane mile $2006**
CC	I-680/80	HOV Connector										No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
CC	I-680	N/O Waterfront (Benicia Bridge)	Alcosta Blvd.			1.2	3.6			27.2	25.9	**Medium Cost Option, No PSR**
SOL	I-680	I-80	I-780			12.4	12.3			12.4	12.3	**Medium Cost Option**
Total Corridor I-680						**33.2**	**35.4**			**73.2**	**71.0**	
ALA	I-880	98th Ave	Marina (SB) and Lewellling (NB)			3.3	4.3					**Medium Cost Option, No PSR**
SC	I-880	SR 237	US 101			3.3	4.3			31.5	31.5	**Medium Cost Option, No PSR**
ALA	I-880	I-880 SFOBB approach prior to off ramp to I-80 E	I-880 SFOBB approach prior to merge with I-80 W								1.8	
Total Corridor I-880						**6.5**	**8.6**			**31.5**	**33.3**	
Sub-Total Lane Miles and Cost				**65.0**	**53.9**	**87.0**	**91.5**	**120.9**	**114.4**	**276.5**	**275.3**	
Total Lane Miles all Directions/Total Upgrade Cost				**297.4**				**787.1**				

Note 1: Use $ 8 million per lane mile if no PSR is available

Note 2: HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.

Note: All Costs are in 2006 Dollars (2006 $)

APPENDIX C - HOT NETWORK SEGMENTS ADDED 2015 and 2030 CONSTRUCTION COSTS

County	Route	Low Range HOT Cost Cost/Lane Mile $ 1,364,636	Medium Range HOT Cost Cost/Lane Mile $ 2,243,985	High Range HOT Cost Cost/Lane Mile $ 3,672,419	HOV Lanes Added in 2030 Network Cost /Lane Mile (1) $ 8.00	HOT Cost (millions) Estimated Upgrade Costs	Total HOT Cost and HOV Cost (in Millions)	Comments
CC	SR4	$ 10,644,159	$ 17,503,080	$ 28,644,866	$ 77.22	$ 23.07	$ 100.29	**50% Medium and 50% High Cost Option: Soundwall to outside makes widening difficult. Used $ 9.9 million per lane mile for HOV estimate based on PSRs available for the corridor.**
CC	SR 4/I-680				$ 75.00	$ -	$ 75.00	No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
Total Corridor SR4		**$ 10,644,159**	**$ 17,503,080**	**$ 28,644,866**	**$ 152.22**	**$ 23.07**	**$ 175.29**	
ALA/CC	I-80							
SOL	I-80	$ 88,974,254	$ 146,307,796	$ 239,441,703	$ 521.60	$ 117.64	$ 639.24	50% Low and 50% Medium Cost Option: Outside shoulder widths vary (10'-13') and the median shoulder width varies from 20' (south of SR 37) to 30' (north of Vallejo). 7 bridge structures (No PSR)
SOL	I-80	$ 12,554,649	$ 20,644,658	$ 33,786,253	$ 73.60	$ 20.64	$ 94.24	**Medium Cost Option: PSR shows $48 mill. Need to be confirmed HOV widening assumed to be funded in Transportation 2030 Plan**
SOL	I-80							
Total Corridor I-80		**$ 101,528,904**	**$ 166,952,454**	**$ 273,227,955**	**$ 595.20**	**$ 138.29**	**$ 733.49**	
ALA	SR 84							
Total Corridor SR 84								
SC	SR 85							
Total Corridor SR 85								
SC	SR 87							
Total Corridor SR 87								
ALA	SR 92							
Total Corridor SR 92								
SM	US 101	$ 31,523,087	$ 51,836,044	$ 84,832,873	$ 184.80	$ 84.83	$ 269.63	**High Cost Option, No PSR**
SC	US 101	$ 40,256,756	$ 66,197,546	$ 108,336,353	$ 182.90	$ 40.26	$ 223.16	**Low Cost Option, HOV Costs based on VTP 2030, Approx. 6.2 million/lane mile**
MAR	US 101	$ 26,064,544	$ 42,860,106	$ 70,143,198	$ 330.81	$ 42.86	$ 373.67	**Medium Cost Option for HOT conversion. HOV cost is 17.32 mill/lane mile based on estimate from the Marin/Sonoma Narrows project provided to MTC. HOV widening assumed funded in Transportation 2030 Plan**
SON	US 101	$ 21,015,391	$ 34,557,363	$ 56,555,249	$ 266.73	$ 34.56	$ 301.29	**Medium Option for HOT conversion. HOV cost is 17.32 mill/lane mile based on estimate from the Marin/Sonoma Narrows project provided to MTC. HOV widening assumed funded in Transportation 2030 Plan**
Total Corridor US 101		**$ 118,859,778**	**$ 195,451,059**	**$ 319,867,673**	**$ 965.24**	**$ 202.51**	**$ 1,167.75**	
SC	SR 237	$ 7,641,960	$ 12,566,314	$ 20,565,545	$ 44.80	$ 20.57	$ 65.37	**High Cost Option: Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures HOV widening from Mathilda to SR 85 assumed funded in Transportation 2030 Plan**
Total Corridor SR 237		**$ 7,641,960**	**$ 12,566,314**	**$ 20,565,545**	**$ 44.80**	**$ 20.57**	**$ 65.37**	
SC	I-280	$ 10,507,696	$ 17,278,681	$ 28,277,624	$ -	$ 17.28	$ 17.28	**Medium Cost Option, No PSR**
Total Corridor I-280		**$ 10,507,696**	**$ 17,278,681**	**$ 28,277,624**	**$ -**	**$ 17.28**	**$ 17.28**	
ALA	I-580	$ 13,919,285	$ 22,888,643	$ 37,458,671	$ 102.00	$ 22.89	$ 124.89	**Medium Cost Option;PSR for part of segment shows $10 mil/HOV lane mi WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan**
ALA	I-580	$ 28,520,888	$ 46,899,278	$ 76,753,552	$ 209.00	$ 46.90	$ 255.90	**Medium Cost Option;PSR for part of segment shows $10 mil/HOV lane mi WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan**
ALA	I-580/I-680				$ 325.00	$ -	$ 325.00	**No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements. Note that the connector cost comes from a preliminary cost estimate and is subject to change.**
Total Corridor I-580		**$ 42,440,173**	**$ 69,787,921**	**$ 114,212,223**	**$ 636.00**	**$ 69.79**	**$ 705.79**	
ALA	I-680							
SC	I-680	$ 24,563,444	$ 40,391,723	$ 66,103,538	$ -	$ 40.39	$ 40.39	**Medium Cost Option**
ALA	I-680	$ 28,793,815	$ 47,348,075	$ 77,488,036	$ 137.15	$ 47.35	$ 184.50	**Medium Cost Option, HOV estimate for portion of NB 680 equal to 6.5 million/lane mile $2006**
CC	I-680/80				***No cost available at this time***			**No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements**
CC	I-680	$ 6,550,252	$ 10,771,126	$ 17,627,610	$ 38.40	$ 10.77	$ 49.17	**Medium Cost Option, No PSR**
SOL	I-680	$ 33,706,504	$ 55,426,420	$ 90,708,743	$ 197.60	$ 55.43	$ 253.03	**Medium Cost Option**
Total Corridor I-680		**$ 93,614,016**	**$ 153,937,344**	**$ 251,927,926**	**$ 373.15**	**$ 153.94**	**$ 527.09**	
ALA	I-880	$ 10,303,000	$ 16,942,084	$ 27,726,762	$ 60.40	$ 16.94	$ 77.34	**Medium Cost Option, No PSR**
SC	I-880	$ 10,303,000	$ 16,942,084	$ 27,726,762	$ 60.40	$ 16.94	$ 77.34	**Medium Cost Option, No PSR**
ALA	I-880							
Total Corridor I-880		**$ 10,303,000**	**$ 33,884,167**	**$ 55,453,523**	**$ 120.80**	**$ 33.88**	**$ 154.68**	
		$ 395,539,687	**$ 667,361,020**	**$ 1,092,177,336**	**$ 2,887**	**$ 659**	**$ 3,547**	
Total Cost				*Avg Cost/Mile (Millions)*	*$ 11.93*	**$ 3,547**		

Note 1: Use $ 8 million per lane mile if no PSR is available

Note 2: HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.

APPENDIX D: 2030 CONNECTED NETWORK (2015 Network Plus Segments Added Through 2030) CONSTRUCTION COSTS

County	Route	From	To	Total Lane Miles HOT Lane Network (2015+2030) WB	EB	SB	NB	Comments
CC	SR4	SR 160	I-680	19.4	19.1			**Medium to High Cost Option:** Soundwall to outside makes widening difficult.
CC	SR 4/I-680	HOV Connector Facility						No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
Total Corridor SR4				**19.4**	**19.1**			
CC	I-80	Carquinez Bridge	Central Ave (Alameda County L	16.0	14.6			**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
ALA	I-80	Central Ave (Alameda County Line)	Bay Bridge Toll Plaza	5.9	6.0			**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
SOL	I-80	Yolo County Line	SR 37	32.7	32.5			Low and Medium Cost Option: Outside shoulder widths vary (10'-13') and the median shoulder width varies from 20' (south of SR 37) to 30' (north of Vallejo). 7 bridge structures
SOL	I-80	SR 37	Carquinez Bridge	4.6	4.6			**Medium Cost Option** HOV widening assumed to be funded in Transportation 2030 Plan
SOL	I-80	Air Base Pkwy IC	Suisun Valley Rd/I-680	6.6	6.7			**Medium Cost Option**
Total Corridor I-80				**65.8**	**64.4**			
ALA	SR 84	Newark Blvd	Paseo Padre/Thornton incl. Toll Plaza Dumbarton Bridge	3.5				**High Cost Option:** PSR describes only 1 mile of HOV widening with possible ROW take. No specific plan details.
Total Corridor SR 84				**3.5**				
SC	SR 85	US 101 (South San Jose)	US 101 (Mountain View)			26.5	26.3	**Medium Cost Option:** North of I-280 (approx 7 miles). **Low Cost Option and Medium Cost Option** south of I-280. Standard outside and inside shoulders
Total Corridor SR 85						**26.5**	**26.3**	
SC	SR 87	US 101	SR 85			9.1	9.2	**Low Cost Option:** Construction cost for the VTA HOV segment on this route (7 miles) was $68 Million. Input from VTA suggests using a low range cost to convert to HOT lane.
Total Corridor SR 87						**9.1**	**9.2**	
ALA	SR 92	Hesperian	Toll Plaza - San Mateo Bridge	1.6				**High Cost Option**
Total Corridor SR 92				**1.6**				
SM	US 101	Millbrae Ave	Whipple Ave			11.4	11.7	**High Cost Option:** Soundwalls to outside and minimal median shoulder.
SM	US 101	Whipple Ave	County Line			7.0	7.0	**High Cost Option:** Soundwalls to outside and minimal median shoulder.
SC	US 101	San Mateo/Santa Clara County Line	SR 25			49.9	48.6	**Low Cost Option:** South of San Jose to Cochrane, **High & Medium Cost Option:** From San Jose to north
MAR	US 101	SB 101/Seminary Ave & NB 101/SR1	San Antonio Rd			24.0	24.0	**Low and Medium Cost Option:** Novato, **High Cost Option**: Southern Marin. HOV widening from Petaluma to Novato assumed funded in Transporation 2030 Plan
SON	US 101	San Antonio Rd	Windsor River Rd			29.0	29.1	**Medium Cost Option**
Total Corridor US 101						**121.3**	**120.4**	
SC	SR 237	I-880	SR 85	9.7	9.9			**High Cost Option:** Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures HOV widening from Mathilda to SR 85 assumed funded in Transportation 2030 Plan
Total Corridor SR 237				**9.7**	**9.9**			
SC	I-280	Magdalena Ave	US 101			15.0	15.3	**Medium Cost Option**
Total Corridor I-280						**15.0**	**15.3**	
ALA	I-580/680	HOV Connector						No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
ALA	I-580	San Joaquin County Line	I-680	20.9	21.0			**Medium Cost Option:** Roadway median already widen for future lane and shoulder. WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan
Total Corridor I-580				**20.9**	**21.0**			
SC	I-680	Caleveras	US 101			9.0	9.0	**Medium Cost Option**
SC	I-680	Line	Caleveras			2.5	2.5	**Medium Cost Option**
ALA	I-680	SR 84	Line			11.5	10.8	
ALA	I-680	Alcosta	SR 84			10.6	10.5	**Medium Cost Option**
CC	I-680/80	HOV Connector						No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
CC	I-680	Marina Vista	Alcosta Blvd.			27.2	25.9	**Medium Cost Option**
SOL	I-680	I-80	I-780			12.4	12.3	**Medium Cost Option:** Standard outside shoulders with median shoulders varying from 10' 20'.
Total Corridor I-680						**73.2**	**71.0**	
ALA	I-880	98th Ave	Marina (SB) and Lewellling (NB)			28.3	27.2	**Medium Cost Option**
SC	I-880	SR 237	US 101			3.3	4.3	**Medium Cost Option**
ALA	I-880	16th Street	Merge with I-80 W				1.8	**Medium and High Cost Option;** Appears that median shoulder will be widened for future lane and shld.
Total Corridor I-880						**31.5**	**33.3**	
Sub-Total Lane Miles and Total Cost				**120.9**	**114.4**	**276.6**	**275.5**	
Total Lane Miles all Directions/Total Upgrade Costs including 2030HOV						**787.4**		

Note 1: Use $ 8 million per lane mile if no PSR is available

Note 2: HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.

APPENDIX D: 2030 CONNECTED NETWORK (2015 Network Plus Segments Added Through 2030) CONSTRUCTION COSTS

County	Route	Low Range HOT Cost Cost/Lane Mile $ 1,364,636	Medium Range HOT Cost Cost/Lane Mile $ 2,243,985	High Range HOT Cost Cost/Lane Mile $ 3,672,419	HOV Lanes Added in 2030 Network Cost /Lane mile in millions (1) $ 8.00	HOT Upgrade Cost (millions) Estimated Upgrade Costs (2)	Total HOT Cost and HOV Cost (in Millions)	Comments
CC	SR4	$ 52,538,478	$ 86,393,407	$ 141,388,122	$ 77.22	$ 113.89	$ 191.11	**Medium to High Cost Option:** Soundwall to outside makes widening difficult.
CC	SR 4/I-680				$ 75.00	$ -	$ 75.00	No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
Total Corridor SR4		**$ 52,538,478**	**$ 86,393,407**	**$ 141,388,122**	**$ 152.22**	**$ 113.89**	**$ 266.11**	
CC	I-80	$ 41,757,855	$ 68,665,929	$ 112,376,014		$ 112.38	$ 112.38	**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
ALA	I-80	$ 16,239,166	$ 26,703,417	$ 43,701,783		$ 43.70	$ 43.70	**High Cost Option:** Total median width about 6' throughout the corridor (2' either side pluss 2' median barrier). Approx. 10 bridge structures.
SOL	I-80	$ 88,974,254	$ 146,307,796	$ 239,441,703	$ 521.60	$ 117.64	$ 639.24	Low and Medium Cost Option: Outside shoulder widths vary (10'-13') and the median shoulder width varies from 20' (south of SR 37) to 30' (north of Vallejo). 7 bridge structures
SOL	I-80	$ 12,554,649	$ 20,644,658	$ 33,786,253	$ 73.60	$ 20.64	$ 94.24	**Medium Cost Option** HOV widening assumed to be funded in Transportation 2030 Plan
SOL	I-80	$ 18,149,656	$ 29,844,995	$ 48,843,169	$ -	$ 29.84	$ 29.84	**Medium Cost Option**
Total Corridor I-80		**$ 135,917,726**	**$ 223,500,866**	**$ 365,772,908**	**$ 595.20**	**$ 324.21**	**$ 919.41**	
ALA	SR 84	$ 4,776,225	$ 7,853,946	$ 12,853,466	$ -	$ 12.85	$ 12.85	**High Cost Option:** PSR describes only 1 mile of HOV widening with possible ROW take. No specific plan details.
Total Corridor SR 84		**$ 4,776,225**	**$ 7,853,946**	**$ 12,853,466**	**$ -**	**$ 12.85**	**$ 12.85**	
SC	SR 85	$ 72,052,770	$ 118,482,387	$ 193,903,710	$ -	$ 99.91	$ 99.91	**Medium Cost Option:** North of I-280 (approx 7 miles). **Low Cost Option and Medium Cost Option** south of I-280. Standard outside and inside shoulders
Total Corridor SR 85		**$ 72,052,770**	**$ 118,482,387**	**$ 193,903,710**	**$ -**	**$ 99.91**	**$ 99.91**	
SC	SR 87	$ 24,972,835	$ 41,064,918	$ 67,205,263	$ -	$ 24.97	$ 24.97	**Low Cost Option:** Construction cost for the VTA HOV segment on this route (7 miles) was $68 Million. Input from VTA suggests using a low range cost to convert to HOT lane.
Total Corridor SR 87		**$ 24,972,835**	**$ 41,064,918**	**$ 67,205,263**		**$ 24.97**	**$ 24.97**	
ALA	SR 92	$ 2,183,417	$ 3,590,375	$ 5,875,870	$ -	$ 5.88	$ 5.88	**High Cost Option**
Total Corridor SR 92		**$ 2,183,417**	**$ 3,590,375**	**$ 5,875,870**		**$ 5.88**	**$ 5.88**	
SM	US 101	$ 31,523,087	$ 51,836,044	$ 84,832,873	$ 184.80	$ 84.83	$ 269.63	**High Cost Option:** Soundwalls to outside and minimal median shoulder.
SM	US 101	$ 19,104,901	$ 31,415,784	$ 51,413,863	$ -	$ 51.41	$ 51.41	**High Cost Option:** Soundwalls to outside and minimal median shoulder.
SC	US 101	$ 134,416,626	$ 221,032,483	$ 361,733,247	$ 182.90	$ 161.91	$ 344.81	**Low Cost Option:** South of San Jose to Cochrane, **High & Medium Cost Option:** From San Jose to north
MAR	US 101	$ 65,229,591	$ 107,262,464	$ 175,541,616	$ 330.81	$ 111.20	$ 442.01	**Low and Medium Cost Option:** Novato, **High Cost Option**: Southern Marin. HOV widening from Petaluma to Novato assumed funded in Transporation 2030 Plan
SON	US 101	$ 79,558,267	$ 130,824,302	$ 214,102,013	$ 266.73	$ 130.82	$ 397.55	**Medium Cost Option**
Total Corridor US 101		**$ 329,832,473**	**$ 542,371,078**	**$ 887,623,612**	**$ 965.24**	**$ 540.18**	**$ 1,505.42**	
SC	SR 237	$ 26,746,862	$ 43,982,098	$ 71,979,408	$ 44.80	$ 71.98	$ 116.78	**High Cost Option:** Outside shoulders 12'. Median shoulders vary from areas with 6' median shoulder to 10' -12' . Highway segment includes 11 bridge structures HOV widening from Mathilda to SR 85 assumed funded in Transportation 2030 Plan
Total Corridor SR 237		**$ 26,746,862**	**$ 43,982,098**	**$ 71,979,408**	**$ 44.80**	**$ 71.98**	**$ 116.78**	
SC	I-280	$ 41,348,465	$ 67,992,733	$ 111,274,288	$ -	$ 67.99	$ 67.99	**Medium Cost Option**
Total Corridor I-280		**$ 41,348,465**	**$ 67,992,733**	**$ 111,274,288**	**$ -**	**$ 67.99**	**$ 67.99**	
ALA	I-580 /680				$ 325.00	$ -	$ 325.00	No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
ALA	I-580	$ 57,178,240	$ 94,022,955	$ 153,874,346	$ 311.00	$ 94.02	$ 405.02	**Medium Cost Option:** Roadway median already widen for future lane and shoulder. WB HOV from Greenville to Tassajara assumed funded in Transportation 2030 Plan
Total Corridor I-580		**$ 57,178,240**	**$ 94,022,955**	**$ 153,874,346**	**$ 636.00**	**$ 94.02**	**$ 730.02**	
SC	I-680	$ 24,563,444	$ 40,391,723	$ 66,103,538	$ -	$ 40.39	$ 40.39	**Medium Cost Option**
SC	I-680	$ 6,823,179	$ 11,859,962	$ 18,362,094	$ -	$ 11.86	$ 11.86	**Medium Cost Option**
ALA	I-680	$ 30,431,378	$ 52,985,034	$ 81,894,938		$ 52.99	$ 52.99	
ALA	I-680	$ 28,793,815	$ 47,348,075	$ 77,488,036	$ 137.15	$ 47.35	$ 184.50	**Medium Cost Option**
CC	I-680/80				No Cost Available at this Time			No cost to convert HOV connector to HOT lane due to no additional ITS elements or striping requirements
CC	I-680	$ 72,462,161	$ 119,155,582	$ 195,005,436	$ 38.40	$ 119.16	$ 157.56	**Medium Cost Option**
SOL	I-680	$ 33,706,504	$ 55,426,420	$ 90,708,743	$ 197.60	$ 55.43	$ 253.03	**Medium Cost Option:** Standard outside shoulders with median shoulders varying from 10'-20'.
Total Corridor I-680		**$ 172,217,038**	**$ 286,775,072**	**$ 463,459,246**	**$ 373.15**	**$ 327.17**	**$ 700.32**	
ALA	I-880	$ 75,669,055	$ 124,428,946	$ 203,635,620	$ 60.40	$ 124.43	$ 184.83	**Medium Cost Option**
SC	I-880	$ 10,303,000	$ 16,942,084	$ 27,726,762	$ 60.40	$ 16.94	$ 77.34	**Medium Cost Option**
ALA	I-880	$ 2,456,344	$ 4,039,172	$ 6,610,354		$ 5.32	$ 5.32	**Medium and High Cost Option;** Appears that median shoulder will be widened for future lane and shld.
Total Corridor I-880		**$ 88,428,400**	**$ 145,410,202**	**$ 237,972,735**	**$ 120.80**	**$ 146.70**	**$ 267.50**	
Sub-Total Lane Miles and Total Cost		**$ 1,008,192,929**	**$ 1,661,440,038**	**$ 2,713,182,973**	**$ 2,887**	**$ 1,830**	**$ 4,717**	
				Avg Cost/Mile (Millions)	*$ 5.99*	**$ 4,717**		

Note 1: Use $ 8 million per lane mile if no PSR is available

Note 2: HOT upgrade cost may be a combination of the different costing options (low, medium, high) or one option is chosen due to specific information available.

Note: All Costs are in 2006 Dollars ($2006)

Appendix E: Analysis of AM Peak Period HOV Lane Volumes - Existing and Funded Network, 2015 through 2030

						2015					2030									
						Average	Lane Miles Above***				Average	Lane Miles Above***				Year Volumes Exceed 1360			Year that Avg Hourly **	
					Distance	Hourly	1360 vph		1600 vph		Hourly	1360 vph		1600 vph		vph Over 20% of Segment ***			Volume First Exceeds***	
Corridor	Direction	County	From	To	(miles)	Volume **	Miles	Pct	Miles	Pct	Volume **	Miles	Pct	Miles	Pct	Year	Miles	Pct	1360 vph	1600 vph
SR 4	WB*	CC	SR 160	Somersville Rd	4.8	270					350									
	WB*	CC	Somersville Rd	Port Chicago Hwy	10.5	870					1,050									
	WB TOTAL*	CC	SR 160	Port Chicago Hwy	15.3	680					830									
	EB TOTAL	CC	Port Chicago Hwy	SR 160	15.4	230					280									
I-80 ALA-CC	WB*	CC	Carquinez Bridge	Buchanan	16.0	1,220	2.5	15%			1,450	10.6	66%	4.2	26%	2017	4.2	26%	2025	
(3+ HOV)	WB*	ALA	Buchanan	merge with I-880	5.0	1,390	1.4	28%	0.5	9%	1,670	5.0	100%	4.2	85%	2015	1.4	28%	2015	2026
	WB TOTAL*	CC-ALA	Carquinez Bridge	merge with I-880	21.0	1,260	3.8	18%	0.5	2%	1,500	15.6	74%	8.4	40%	2016	7.8	37%	2023	
	EB	ALA	after I-880 split	Central	5.4	160					160									
	EB	CC	Central	toll plaza	15.2	90					100									
	EB TOTAL	ALA-CC	after I-880 split	toll plaza	20.6	110					120									
I-80 SOL	WB TOTAL*	SOL	Air Base Pkwy	SR 12	6.6	1,010					1,060									
	EB TOTAL	SOL	SR 12	thru Air Base Pkwy IC	6.7	520					510									
SR 84	WB TOTAL*	ALA	Newark Blvd	Dumbarton Br toll plaza	3.5	1,020					1,310	1.1	31%			2026	1.1	32%	2033	
SR 85	NB*	SCL	US 101 (S San Jose)	SR 87	6.0	440					610									
	NB*	SCL	SR 87	I-280	13.9	1,220	2.2	16%			1,440	11.3	81%	2.2	16%	2017	4.7	34%	2025	
	NB*	SCL	I-280	US 101(Sunnyvale)	12.4	890					1,080									
	NB TOTAL*	SCL	US 101 (S San Jose)	US 101(Sunnyvale)	26.3	990	2.2	8%			1,160	11.3	43%	2.2	8%	2019	6.3	24%		
	SB TOTAL	SCL	US 101 (Sunnyvale)	US 101 (S San Jose)	26.5	320					390									
SR 87	NB TOTAL*	SCL	SR 85	US 101	9.2	480					710									
	SB TOTAL	SCL	US 101	SR 85	9.1	340					480									
SR 92	WB*	ALA	Hesperian	San Mateo Br toll plaza	1.6	930					1,160									
US 101 SM-SCL	NB*	SCL	Cochrane	Blossom Hill Rd	10.7	820					890									
		SCL	Blossom Hill	Fair Oaks	16.3	1,100	0.5	3%			1,180	1.3	8%							
		SCL	Fair Oaks	University	8.7	850					1,000	1.6	18%							
		SM	University	Whipple	5.3	940					1,090									
	NB TOTAL*	SCL-SM	Cochrane	Whipple	41.0	950	0.5	1%			1,060	2.8	7%							
	SB*	SM	Whipple	Oregon Expwy	6.5	600					840									
		SCL	Oregon Expwy	Blossom Hill Rd	25.0	550					670									
		SCL	Blossom Hill Rd	Cochrane	10.5	440					560									
	SB TOTAL*	SM-SCL	Whipple	Cochrane	42.0	520					710									
US 101 MRN-SON	NB	MRN	SR 1	SR 37	14.9	450					500									
	NB	SON	Petaluma	Windsor River Rd	21.3	320					370									
	NB TOTAL	MRN-SON	SR 1	Windsor River Rd	36.1	370					420									
	SB	SON	Windsor River Rd	Petaluma	21.7	470					670									
	SB*	MRN	SR 37	I-580 off ramp	8.5	1,140					1,590	8.5	100%	2.6	30%	2022	2.6	30%	2023	2031
	SB*	MRN	I-580 off ramp	Seminary	5.3	670					1,130	0.8	16%			2034	1.2	23%		
	SB TOTAL*	SON-MRN	Windsor River Rd	Seminary	35.5	660					960	9.4	26%	2.6	7%	2025	7.2	20%		
SR 237	WB TOTAL*	SCL	I-880	Mathilda	6.7	560					940	1.1	17%							
	EB TOTAL	SCL	Mathilda	I-880	6.5	360					440									
I-280	NB TOTAL	SCL	Bascom	Magdalena	11.1	580					680									
	SB TOTAL	SCL	Magdalena	Leland	11.5	310					340									
I-580****	WB TOTAL	ALA	Greenville	Hacienda	10.6	1,010					1,114	0.9	9%							
	EB TOTAL	ALA	Hacienda	Greenville	10.8	380					510									
I-680 ALA-SCL	NB	SCL-ALA	Calveras	Auto Mall Pkwy	6.4	810					770									
	NB	ALA	thru Auto Mall Pkwy IC	SR 84	6.9	940					900									
	NB TOTAL	SCL-ALA	Calveras	SR 84	13.3	880					840									
	SB*	ALA	SR 84	SR 262	8.8	540					1,030									
	SB*	ALA-SCL	SR 262	Calveras	5.1	390					600									
	SB TOTAL*	ALA-SCL	SR 84	Calveras	14.0	490					870									
I-680 CC	NB*	CC	Alcosta	Rudgear	12.2	780					710									
	NB*	CC	North Main	Willow Pass Rd	3.6	530					530									
	NB*	CC	Willow Pass Rd	Marina Vista	6.4	200					130									
	NB TOTAL*	CC	Alcosta	Marina Vista	22.3	570					520									
	SB	CC	Marina Vista	Willow Pass Rd	6.0	750					990	1.6	27%	0.8	14%	2025	1.6	26%		
	SB	CC	thru Willow Pass Rd IC	SR 24	5.1	1,430	4.1	80%			1,710	5.1	100%	4.8	92%	2015	4.1	80%	2015	2025
	SB	CC	thru SR 24 IC	thru Alcosta IC	14.8	1,070					1,380	6.3	43%	1.8	12%	2022	3.0	20%	2029	
	SB TOTAL	CC	Marina Vista	thru Alcosta IC	26.0	1,070	4.1	16%			1,360	13.1	50%	7.4	28%	2019	5.9	23%	2031	
I-880 ALA-SCL	NB*	SCL-ALA	SR 237	Alvarado Niles	15.1	660					710									
	NB*	ALA	Alvarado Niles	Lewelling	7.8	1,090					1,080									
	NB TOTAL*	SCL-ALA	SR 237	Lewelling	22.9	810					840									
	SB*	ALA	Marina	Fremont Blvd	10.9	800					1,140	5.1	46%			2028	2.5	23%		
	SB*	ALA-SCL	Fremont Blvd	SR 237	14.1	1,050					1,430	8.3	59%	3.4	24%	2024	4.8	34%	2028	
	SB TOTAL*	ALA-SCL	Marina	SR 237	25.0	940					1,300	13.4	54%	3.4	13%	2026	8.5	34%	2033	
I-880 (3+ HOV)	NB*	ALA	7th Street	Bay Br Appr/I-80 merge	1.8	380					380									

Notes:
Forecasts assume 2+ HOV occupancy requirements in all corridors except as noted
Analysis assumes linear growth rate between 2015 and 2030
Green indicates average hourly volume exceeds 1360 vehicles per hour (vph)
Red indicates candidate for increasing vehicle occupancy requirements because 20% of corridor length has volumes of 1360 vph or greater
* Indicates volumes are based on adjusted HOV lane forecasts
** Distance weighted value
*** Blank indicates condition not met prior to 2035
**** Data for WB direction represent AM peak hour HOV volumes in general purpose lanes as the Existing and Funded Network assumes HOV lanes in the EB direction only.
HOV volumes under these circumstances are likely lower than they would be if a WB HOV lane were in place.

Appendix F: AM Peak Hour Average Vehicle Volumes in HOT Lanes and General Purpose Lanes

Table 1: At Current HOV Occupancy Restrictions (1)

					HOV Lane Network -- 2015			Existing and Funded HOT Lane Network -- 2015			HOV Lane Network -- 2030			Existing and Funded HOT Lane Network -- 2030			Connected HOT Lane Network -- 2030		
Corridor	Dir	HOV Lane Network	Existing & Funded Network Distance	Connected Network Distance	HOV Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total	HOV Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total
I-280 SC	NB	11.1	11.1	15.3	580	5,750	6,340	1,350	4,980	6,340	680	5,980	6,670	1,410	5,260	6,660	1,500	5,790	7,290
I-280 SC	SB	11.5	11.5	15.0	310	4,790	5,100	1,040	4,050	5,100	340	5,250	5,580	1,160	4,420	5,580	1,170	4,460	5,640
I-580 ALA	EB	10.8	10.8	21.0	380	4,530	4,920	550	4,360	4,910	510	5,740	6,240	900	5,340	6,240	680	4,550	5,230
I-580 ALA	WB			20.9													1,360	6,240	7,590
I-680 ALA-SC	NB	13.3	13.3	32.8	880	4,750	5,630	980	4,500	5,490	840	5,090	5,930	1,040	4,740	5,780	1,170	4,550	5,730
I-680 ALA-SC	SB	14.0	14.0	33.6	490	7,020	7,510	1,470	6,130	7,590	870	8,250	9,120	1,570	7,640	9,210	1,500	6,430	7,930
I-680 CC	NB	22.3	22.3	25.9	570	5,310	5,880	1,150	4,740	5,880	520	5,430	5,940	1,170	4,790	5,960	1,180	5,050	6,230
I-680 CC	SB	26.0	26.0	26.6	1,050	6,520	7,570	1,410	6,200	7,610	1,330	6,830	8,160	1,540	6,680	8,220	1,610	6,830	8,440
I-680 SOL	NB			12.4													840	1,940	2,780
I-680 SOL	SB			12.3													1,310	2,930	4,240
I-80 ALA-CC	EB	20.6	20.6	20.6	110	4,040	4,150	700	3,430	4,130	120	4,290	4,400	820	3,560	4,380	850	3,550	4,410
I-80 ALA-CC	WB	21.9	21.9	21.9	1,300	5,420	6,720	1,440	5,410	6,850	1,540	5,970	7,520	1,560	6,110	7,660	1,570	6,100	7,670
I-80 SOL	EB	6.7	6.7	39.2	520	5,830	6,350	860	5,480	6,340	510	6,330	6,840	980	5,850	6,840	1,120	5,060	6,180
I-80 SOL	WB	6.6	6.6	39.3	1,010	7,890	8,900	1,420	7,480	8,890	1,060	8,250	9,310	1,460	7,850	9,310	1,270	6,030	7,290
I-80 thru Vallejo	EB			4.6													950	3,560	4,510
I-80 thru Vallejo	WB			4.6													1,310	4,840	6,150
I-880 ALA-SC	NB	22.3	22.3	31.5	970	5,840	6,800	1,220	5,410	6,630	1,000	6,090	7,090	1,280	5,630	6,910	1,360	5,800	7,150
I-880 ALA-SC	SB	25.0	25.0	31.5	940	6,990	7,930	1,480	6,450	7,930	1,300	7,550	8,850	1,570	7,290	8,860	1,550	6,930	8,480
I-880 SFOBB approach	NB	1.8	1.8	1.8	380	1,890	2,270	490	1,780	2,270	380	2,070	2,440	500	1,940	2,440	500	1,950	2,450
SR 237 SC	EB	7.0	7.0	9.9	340	3,620	3,960	1,100	2,860	3,960	430	3,820	4,240	1,190	3,060	4,240	1,200	2,890	4,090
SR 237 SC	WB	7.0	7.0	9.7	560	4,340	4,900	1,360	3,540	4,900	940	4,600	5,530	1,440	4,090	5,530	1,340	3,590	4,930
SR 4 CC	EB	15.4	15.4	19.1	230	2,050	2,280	230	2,040	2,270	280	2,740	3,020	480	2,540	3,020	510	2,460	2,960
SR 4 CC	WB	15.3	15.3	19.4	680	5,360	6,040	1,190	4,850	6,040	830	5,540	6,370	1,250	5,120	6,360	1,240	4,740	5,980
SR 84 ALA (Dumbarton Br appr)	WB	3.5	3.5	3.5	1,020	2,770	3,780	1,160	2,620	3,780	1,310	3,820	5,130	1,440	3,690	5,130	1,420	3,660	5,080
SR 92 ALA (San Mateo Br appr)	WB	1.6	1.6	1.6	930	4,400	5,330	1,580	3,490	5,070	1,160	5,110	6,270	1,590	4,380	5,970	1,590	4,360	5,960
SR 85 SC	NB	26.3	26.3	26.1	960	3,790	4,750	1,360	3,400	4,760	1,160	3,900	5,060	1,450	3,630	5,080	1,370	3,430	4,800
SR 85 SC	SB	26.1	26.1	29.2	320	3,000	3,320	980	2,390	3,370	390	3,260	3,660	1,070	2,600	3,670	1,060	2,600	3,670
SR 87 SC	NB	9.2	9.2	9.2	480	4,210	4,690	1,400	3,290	4,680	710	4,460	5,160	1,480	3,680	5,160	1,380	3,220	4,600
SR 87 SC	SB	9.1	9.1	9.1	340	2,620	2,960	800	2,150	2,950	480	3,070	3,560	1,050	2,500	3,550	1,040	2,480	3,520
US 101 MAR-SON	NB	36.7	36.7	50.6	370	3,470	3,840	820	3,020	3,840	410	3,740	4,160	920	3,240	4,160	880	2,960	3,850
US 101 MAR-SON	SB	35.5	35.5	53.0	660	4,390	5,050	1,270	3,810	5,080	960	4,960	5,930	1,440	4,520	5,970	1,480	4,370	5,850
US 101 SM-SC	NB	41.0	41.0	55.6	950	5,990	6,950	1,440	5,430	6,870	1,060	6,270	7,320	1,480	5,760	7,230	1,410	5,370	6,780
US 101 SM-SC	SB	42.0	42.0	56.9	520	4,980	5,490	1,140	4,340	5,480	710	5,440	6,150	1,280	4,860	6,140	1,100	4,290	5,390
US 101 SM	NB			11.7													1,470	7,960	9,430
US 101 SM	SB			11.4													1,210	6,500	7,700

(1) 2+ in all corridors, except I-80 ALA-CC and I-880 ALA approach to the Bay Bridge, which are 3+

Appendix F: AM Peak Hour Average Vehicle Volumes in HOT Lanes and General Purpose Lanes, cont.

Table 2: At Increased HOV Occupancy Restrictions in Selected Corridors (2)

					HOV Lane Network -- 2015			Existing and Funded HOT Lane Network -- 2015			HOV Lane Network -- 2030			Existing and Funded HOT Lane Network -- 2030			Connected HOT Lane Network -- 2030		
Corridor	Dir	HOV Lane Network	Existing & Funded Network Distance	Connected Network Distance	HOV Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total	HOV Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total	HOT Lane	General Purpose Lanes	Total
I-280 SC	NB	11.1	11.1	15.3	580	5,750	6,340	1,350	4,980	6,340	680	5,980	6,670	1,410	5,260	6,660	1,500	5,790	7,290
I-280 SC	SB	11.5	11.5	15.0	310	4,790	5,100	1,040	4,050	5,100	340	5,250	5,580	1,160	4,420	5,580	1,170	4,460	5,640
I-580 ALA	EB	10.8	10.8	21.0	380	4,530	4,920	600	4,320	4,910	510	5,740	6,240	910	5,330	6,240	610	4,630	5,230
I-580 ALA	WB			20.9													1,320	6,270	7,590
I-680 ALA-SC	NB	13.3	13.3	32.8	880	4,750	5,630	980	4,500	5,490	840	5,090	5,930	1,040	4,740	5,780	1,170	4,550	5,730
I-680 ALA-SC	SB	14.0	14.0	33.6	490	7,020	7,510	1,470	6,130	7,590	870	8,250	9,120	1,570	7,640	9,210	1,500	6,430	7,930
I-680 CC	NB	22.3	22.3	25.9	570	5,310	5,880	1,160	4,730	5,880	520	5,430	5,940	1,170	4,790	5,960	1,170	5,060	6,230
I-680 CC	SB	26.0	26.0	26.6	1,050	6,520	7,570	1,380	6,230	7,610	1,330	6,830	8,160	1,460	6,760	8,220	1,480	6,960	8,440
I-680 SOL	NB			12.4													840	1,940	2,780
I-680 SOL	SB			12.3													1,310	2,930	4,240
I-80 ALA-CC	EB	20.6	20.6	20.6	110	4,040	4,150	700	3,430	4,130	120	4,290	4,400	820	3,560	4,380	850	3,550	4,410
I-80 ALA-CC	WB	21.9	21.9	21.9	1,300	5,420	6,720	1,440	5,410	6,850	1,540	5,970	7,520	1,560	6,110	7,660	1,570	6,100	7,670
I-80 SOL	EB	6.7	6.7	39.2	520	5,830	6,350	860	5,480	6,340	510	6,330	6,840	980	5,850	6,840	1,120	5,060	6,180
I-80 SOL	WB	6.6	6.6	39.3	1,010	7,890	8,900	1,420	7,480	8,890	1,060	8,250	9,310	1,460	7,850	9,310	1,270	6,030	7,290
I-80 thru Vallejo	EB			4.6													950	3,560	4,510
I-80 thru Vallejo	WB			4.6													1,310	4,840	6,150
I-880 ALA-SC	NB	22.3	22.3	31.5	970	5,840	6,800	1,220	5,410	6,630	1,000	6,090	7,090	1,280	5,630	6,910	1,330	5,820	7,150
I-880 ALA-SC	SB	25.0	25.0	31.5	940	6,990	7,930	1,480	6,450	7,930	1,300	7,550	8,850	1,530	7,320	8,860	1,510	6,970	8,480
I-880 SFOBB approach	NB	1.8	1.8	1.8	380	1,890	2,270	490	1,780	2,270	380	2,070	2,440	500	1,940	2,440	500	1,950	2,450
SR 237 SC	EB	7.0	7.0	9.9	340	3,620	3,960	1,100	2,860	3,960	430	3,820	4,240	1,190	3,060	4,240	1,200	2,890	4,090
SR 237 SC	WB	7.0	7.0	9.7	560	4,340	4,900	1,360	3,540	4,900	940	4,600	5,530	1,440	4,090	5,530	1,340	3,590	4,930
SR 4 CC	EB	15.4	15.4	19.1	230	2,050	2,280	230	2,040	2,270	280	2,740	3,020	480	2,540	3,020	510	2,460	2,960
SR 4 CC	WB	15.3	15.3	19.4	680	5,360	6,040	1,190	4,850	6,040	830	5,540	6,370	1,250	5,120	6,360	1,240	4,740	5,980
SR 84 ALA (Dumbarton Br appr)	WB	3.5	3.5	3.5	1,020	2,770	3,780	1,160	2,620	3,780	1,310	3,820	5,130	1,440	3,690	5,130	1,420	3,660	5,080
SR 92 ALA (San Mateo Br appr)	WB	1.6	1.6	1.6	930	4,400	5,330	1,580	3,490	5,070	1,160	5,110	6,270	1,590	4,380	5,970	1,590	4,360	5,960
SR 85 SC	NB	26.3	26.3	26.1	960	3,790	4,750	1,340	3,420	4,760	1,160	3,900	5,060	1,410	3,670	5,080	1,340	3,460	4,800
SR 85 SC	SB	26.1	26.1	29.2	320	3,000	3,320	990	2,380	3,370	390	3,260	3,660	1,080	2,600	3,670	1,070	2,600	3,670
SR 87 SC	NB	9.2	9.2	9.2	480	4,210	4,690	1,400	3,290	4,680	710	4,460	5,160	1,480	3,680	5,160	1,380	3,220	4,600
SR 87 SC	SB	9.1	9.1	9.1	340	2,620	2,960	800	2,150	2,950	480	3,070	3,560	1,050	2,500	3,550	1,040	2,480	3,520
US 101 MAR-SON	NB	36.7	36.7	50.6	370	3,470	3,840	820	3,020	3,840	410	3,740	4,160	930	3,230	4,160	900	2,940	3,850
US 101 MAR-SON	SB	35.5	35.5	53.0	660	4,390	5,050	1,270	3,810	5,080	960	4,960	5,930	1,410	4,560	5,970	1,420	4,430	5,850
US 101 SM-SC	NB	41.0	41.0	55.6	950	5,990	6,950	1,440	5,430	6,870	1,060	6,270	7,320	1,480	5,760	7,230	1,410	5,370	6,780
US 101 SM-SC	SB	42.0	42.0	56.9	520	4,980	5,490	1,140	4,340	5,480	710	5,440	6,150	1,280	4,860	6,140	1,100	4,290	5,390
US 101 SM	NB			11.7													1,470	7,960	9,430
US 101 SM	SB			11.4													1,210	6,500	7,700

(2) 2+ in all corridors, except I-80 ALA-CC and I-880 ALA approach to the Bay Bridge, I-580, and I-680 CC, which are 3+