# GL: Safety Improvements – SHOPP Collision Reduction Program (TIP ID – VAR170007)

Last updated with 2019 TIP Update

FOR 2016/2022 PROGRAM YEARS

District	County	Route		Location/Description	EA	PPNO	Prog Code (201.XXX)	FY	Support	RW	CON	Pro	ject Total
	SHOPP - C	ollision	Reduction										
04	SCL	152	0.0/5.2	In Santa Clara, from Hecker Pass to Uvas Creek. Environmental species mitigation.	2A252	0483R	201.010	16-17	\$ 500	\$ 2,000	\$ 1	\$	2,501
4	CC	4	12.9/14.4	In and near Concord, from Route 680 to Route 242. Install safety lighting, high reflective striping and markings.	2J001	1480Z	201.010	17-18	\$ -	\$ -	\$ 1,096	\$	1,096
04	ALA	92	R4.0/R5.5	In Hayward, from west of Clawiter Road to west of Hesperian Boulevard. Install safety lighting and upgrade lighting.	2J440	1482K	201.010	17-18	\$ 2,205	\$ 10	\$ 3,300	\$	5,515
04	ALA	123	2.8	In Berkeley, at Bancroft Way. Install traffic signal.	1J700	0481X	201.010	17-18	\$ 1,328	\$ 20	\$ 850	\$	2,198
04	ALA	238	R14.5/16.7	In and near San Lorenzo, from east of Mission Boulevard to 0.4 mile west of Hesperian Boulevard. Install and upgrade safety lighting.	2J670	1482N	201.010	17-18	\$ 3,130	\$ 100	\$ 4,840	\$	8,070
04	ALA	880	20.9	In San Leandro at the southbound off-ramp to southbound Route 238. Improve safety visibility by installing lighting and improving signs.	1J010	0488J	201.010	17-18	\$ 968	\$ 10	\$ 765	\$	1,743
04	ALA	VAR		In Alameda and Contra Costa Counties on various routes at various locations. Apply high friction surface treatment.	1J370	0488M	201.010	17-18	\$ 3,494	\$ 25	\$ 6,715	\$	10,234
04	CC	4	R16.4/R20.7	In and near Concord and Pittsburg, from west of Willow Pass Road to east of Bailey Road at two locations. Install safety lighting, high reflective striping and markings.	2J000	1480F	201.010	17-18	\$ 2,532	\$ 217	\$ 2,837	\$	5,586
04	CC	680	13.9/22.7	In and near Walnut Creek, Pleasant Hill, and Concord, from Olympic Boulevard to Arthur Road. Install safety lighting.	0K840	1496B	201.010	17-18	\$ 4,925	\$ 100	\$ 18,943	\$	23,968
04	MRN	101	4.7/5.6	Near Mill Valley, from Redwood Highway Frontage Road to Route 131 (Tiburon Boulevard). Install concrete barrier.	4H980	0820K	201.010	17-18	\$ 3,865	\$ 200	\$ 5,514	\$	9,579
04	SM	VAR		On Routes 92, 101 and 280 in Daly City, San Bruno and San Mateo at four locations. Wet pavement conditions safety improvements.	3J900	1489C	201.010	17-18	\$ 1,686	\$ 25	\$ 3,970	\$	5,681
04	SCL	152	0.0/6.2	Near Gilroy, at various locations from Pole Line Road to Burchell Road. Planting and environmental mitigation.	2A251	0483Q	201.010	17-18	\$ 1,700	\$ 1,000	\$ 1,100	\$	3,800

FOR 2016/2022 PROGRAM YEARS

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code	FY		Support		RW		CON	Pro	ject Total
							(201.XXX)									
		-	Reduction					1	<b>^</b>		•		•			
04	SCL	152	16.2/19.5	Near Gilroy, from Old Lake Road to San Felipe Road. Environmental species mitigation.	2A442	0485Q	201.010	17-18	\$	600	\$	913	\$	1	\$	1,514
04	SOL	12	19.2	Near Rio Vista, at the intersection of Route 12 and Route 113. Install roundabout.	4G560	8060A	201.010	17-18	\$	2,380	\$	71	\$	4,671	\$	7,122
04	SOL	80	30.6/38.4	In and near Vacaville and Dixon, from west of Gibson Canyon Creek Bridge to Curry Road. Upgrade median barrier.	4A110	0876B	201.010	17-18	\$	5,000	\$	10	\$	14,700	\$	19,710
04	SON	116	31.0/31.3	Near Sebastopol, at the intersection of Route 116 and Llano Road. Construct left-turn and merge lanes.	4G380	0817Q	201.010	17-18	\$	4,097	\$	125	\$	6,446	\$	10,668
					TOTAL	S FY 202	L6/2018		\$	38,410	\$	4,826	\$	75,749	\$	118,985
04	ALA	84	10.8/18.0	In Fremont, from Route 238 (Mission Boulevard) to Route 680. Widen shoulders, install traffic signals and upgrade barriers.	2A332	0076B	201.010	2018-19	\$	18,300	\$	2,000	\$	19,500	\$	39,800
04	ALA	13		In various cities, on various routes, at various locations. Crosswalk safety enhancements.	3J110	1487Q	201.015	2018-19	\$	2,572	\$	50	\$	4,040	\$	6,662
04	ALA	84		In Oakland, San Leandro, Hayward and Fremont on Routes 84, 92, 112, 185 and 238 at various locations. Crosswalk safety enhancements.	1J600	0448R	201.015	2018-19	\$	1,586	\$	150	\$	2,803	\$	4,539
04	ALA	185		In Oakland, San Leandro, Hayward, Union City and Fremont on Routes 185, 238, and 262 at various locations. Crosswalk safety enhancements.	3J190	1487P	201.015	2018-19	\$	2,186	\$	10	\$	3,521	\$	5,717
04	ALA	880	4.8/11.3	In Fremont, from north of Auto Mall Parkway to south of Fremont Boulevard at various locations. Highway worker safety improvements.	2J810	1483N	201.235	2018-19	\$	2,464	\$	10	\$	4,918	\$	7,392
04	СС	24	1.0/R2.5	In Orinda and Lafayette, from east of the Caldecott Tunnel to east of Camino Pablo and at Acalanes Road (PM R4.2/R4.99); also in Oakland on Route 13, at Redwood Road (PM 5.2/5.5). Install safety lighting and upgrade median barrier.	1J990	1418C	201.010	2018-19		2,285	\$	313	\$	5,050	\$	7,648
04	SM	280	R0.2/R3.4	In and near Woodside, at various locations (also Santa Clara County PM 20.4); also in the city and county of San Francisco on Route 101 at San Bruno Avenue offramp (PM 1.7). Construct maintenance worker safety improvements.	0J670	0481J	201.235	2018-19	\$	2,130	\$	10	\$	5,286	\$	7,426

FOR 2016/2022 PROGRAM YEARS

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code (201.XXX)	FY	Support	RW	CON	Pro	ject Total
·	SHOPP - C	ollision	Reduction										
04	SCL	101	R9.0/R16.8	In and near Morgan Hill, from south of Masten Avenue to East Main Avenue. Install edgeline and shoulder rumble strips, concrete barrier and reconstruct shoulders.	2J890	1483F	201.010	2018-19	\$ 1,430	\$ 10	\$ 2,420	\$	3,860
04	SCL	680	M0.0/M9.9	In San Jose and Milpitas, from Route 101 to Scott Creek Road at various locations. Construct maintenance worker safety improvements.	01660	0481T	201.235	2018-19	\$ 3,190	\$ 10	\$ 8,814	\$	12,014
04	SON	12	9.5/31.3	In various cities, on Routes 12, 101, and 116 at various locations; also in Marin County on Route 101 at various locations. Highway worker safety improvements.	0J680	0480E	201.235	2018-19	\$ 1,452	\$ 10	\$ 2,190	\$	3,652
					TOTAL	S FY 20	18/2019		\$ 37,595	\$ 2,573	\$ 58,542	\$	98,710
04	ALA	80	4.5/R7.6	In Berkeley and Albany, from Route 13 to east of El Cerrito Separation. Install median safety lighting and replace median concrete barrier.	3J700	1488S	201.010	2019-20	\$ 8,225	\$ 25	\$ 14,587	\$	22,837
04	ALA	84	R0.7/R3.1	In Fremont, from north end of Dumbarton Bridge to south of the Toll Plaza. Install outer separation barrier between route and frontage road.	4J750	1493F	201.010	2019-20	\$ 7,240	\$ 3,280	\$ 15,560	\$	26,080
04	ALA	580	R1.3/R6.0	Near Livermore, from Flynn Road to Grant Line Road. Install safety lighting and establish electrical service connection.	0K680	1495F	201.010	2019-20	\$ 2,834	\$ 493	\$ 4,211	\$	7,538
04	ALA	880	20.9	In San Leandro, at the southbound Route 880/238 Connector offramp to Washington Avenue. Reconstruct and signalize offramp.	4J730	1491G	201.010	2019-20	\$ 3,825	\$ 150	\$ 3,445	\$	7,420
04	ALA	13		In various cities, on Routes 13, 61, and 123 at various locations; also in Contra Costa County, on Route 123, at Eureka Avenue. Crosswalk safety enhancements.	0J470	0488Q	201.015	2019-20	\$ 3,181	\$ 840	\$ 4,290	\$	8,311
04	CC	80	0.0/14.1	In various cities, from the Alameda County line to the Solano County line; also on Route 242, 580, and 680 at various locations. Construct maintenance worker safety improvements	2J820	1483P	201.235	2019-20	\$ 1,789	\$ 5	\$ 2,630	\$	4,424
04	NAP	121	0.5/1.0	Near Napa, at Huichica Creek (PM 0.75). Roadway widening.	4G210	0775G	201.010	2019-20	\$ 6,370	\$ 1,852	\$ 12,247	\$	20,469

FOR 2016/2022 PROGRAM YEARS

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code (201.XXX)	FY	Support	RW	CON	Pro	oject Total
	SHOPP - C	ollision	Reduction										
04	SF	101	0.0/4.2	In the city and county of San Francisco, from San Mateo County Line to Route 101/80 Junction. Overlay existing pavement with open graded asphalt, groove concrete pavement, and upgrade drainage system.	4J390	1490F	201.010	2019-20	\$ 6,230	\$ 20	\$ 21,970	\$	28,220
04	SF	1		In the city of San Francisco, on Routes 1, 35, 80, 101 and 280 at various locations. Crosswalk safety enhancements.	31890	1489B	201.015	2019-20	\$ 2,359	\$ 5	\$ 5,800	\$	8,164
04	SM	82	13.7	Near Burlingame and Hillsborough city limits, at the intersection of Route 82 and Floribunda Avenue. Install left turn signal.	1G020	0686	201.010	2019-20	\$ 5,350	\$ 1,765	\$ 2,610	\$	9,725
4	SCL	17	0.0/3.4	Near Los Gatos, from south of Summit Road to north of Alma College Road. Install lighting, warning signs, flashing beacons, guardrail, rumble strips, wet-night visibility striping, and channelizers, and apply High Friction Surface Treatment (HFST).	2K140	1453A	201.010	2019-20	\$ 3,600	\$ 70	\$ 8,821	\$	12,491
04	SCL	152	21.8/R35.2	Near Gilroy, from east of Dunne Street/San Felipe Road to the Merced County line. Place median barrier.	01800	0480K	201.010	2019-20	\$ 4,858	\$ 60	\$ 10,984	\$	15,902
04	SCL	280	11.3	In Cupertino, at northbound offramp to Foothill Expressway. Upgrade traffic signal system for right- turn movement.	3J710	1488N	201.010	2019-20	\$ 1,047	\$ 180	\$ 982	\$	2,209
04	SON	121	3.4/6.5	Near Schellville, from north of Tolay Creek Bridge to south of Yellow Creek Bridge. Widen for standard shoulders, upgrade curves to standard, and install rumble strips.	0G680	0738	201.010	2019-20	\$ 12,250	\$ 6,264	\$ 25,000	\$	43,514
					TOTAL	S FY 20	19/2020		\$ 69,158	\$ 15,009	\$ 133,137	\$	217,304
04	ALA	580		In Alameda County, on Routes 580 and 680 at various locations; also in Contra Costa County on Routes 160 and 680 at various locations. Install concrete barrier to shield structure column from errant vehicles, and upgrade existing guardrails to current standards.	0K650	1495E	201.015	2020-21	\$ 2,266	\$ 70	\$ 3,156	\$	5,492

#### FTIP BACK-UP LIST FOR SHOPP - COLLISION REDUCTION PROJECTS (VAR170007) FOR 2016/2022 PROGRAM YEARS All amounts in \$1,000

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code	FY		Support		RW		CON	Pro	ect Total
							(201.XXX)									
	SHOPP - C	ollision	Reduction		•				-		-					
04	ALA	Var		In Alameda County on Routes 80, 84, and 880 at	1J780	1481B	201.015	2020-21	\$	4,030	\$	10	\$	6,311	\$	10,351
				various locations; also, in Contra Costa County on												
				Routes 24 and 680 at various locations. Install High												
				Friction Surface Treatment (HFST) at spot locations												
				to enhance wet pavement conditions.					<u> </u>							
04	ALA	880	30.2/R33.6	In Oakland, from south of 5th Avenue to north of	2K820	1452N	201.235	2020-21	\$	1,400	\$	5	\$	2,170	\$	3,575
				7th Street. Pave narrow strips and miscellaneous												
				areas, construct MVPs, and upgrade crash cushions												
				to reduce maintenance work and enhance highway												
				worker safety.					-				-		4	
04	SF	101	0.5/R5.2	In the city and county of San Francisco, from	4J970	1493G	201.235	2020-21	Ş	3,565	Ş	3	Ş	6,196	Ş	9,764
				Bayshore Boulevard Overcrossing (OC) to South Van												
				Ness Avenue; also, on Route 280 from Monterey												
				Boulevard onramp OC to King Street onramp (PM												
				R2.8 to T7.2). Install vandalism-resistant security												
				fence and gates to reduce maintenance repairs and												
				enhance highway worker safety.												
		I			TOTAL	S FY 202	20/2021		\$	11,261	\$	88	\$	17,833	\$	29,182
04	ALA	13		In Alameda County, on Routes 13, 24, 580, 680, and	0K120	1492F	201.015	2021-22	\$	3,980	\$	290	\$	8,237	\$	12,507
				880 at various locations; also in Contra Costa County												
				on Routes 4, 24, 80, 160, and 680 at various												
				locations. Install Rectangular Rapid Flashing Beacons												
				(RRFBs) to enhance pedestrian safety at ramp												
				termini and uncontrolled pedestrian crossings.												
04	ALA	580		In various cities, on Routes 580, 680, 880, and 980 at	3J130	1487M	201.015	2021-22	Ś	3,040	Ś	20	Ś	6,068	\$	9,128
				various locations. Enhance pedestrian safety by					Ť	-,	Ť		Ŧ	-,	Ŧ	-,
				installing Accessible Pedestrian Signal (APS) systems												
				and countdown timers and upgrading crosswalk												
				markings.												
04	ALA	580		In Alameda and Contra Costa Counties, on various	0K770	1496A	201.015	2021-22	\$	2,110	\$	108	\$	2,638	\$	4,856
				routes, at various locations. Upgrade advance										÷		·
				warning signs to make standard.												

### FTIP BACK-UP LIST FOR SHOPP - COLLISION REDUCTION PROJECTS (VAR170007) FOR 2016/2022 PROGRAM YEARS

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code	FY	Support	RW	CON	Project Total
							(201.XXX)					
	SHOPP - C	ollision	Reduction									
04	ALA	580	0.1/R9.0	In and near Livermore, from San Joaquin county line to 0.7 mile west of Greenville Road. Highway worker safety improvements.	4J940	1494D	201.235	2021-22	\$ 1,625	\$ 183	\$ 1,997	\$ 3,805
04	СС	80	0.0/13.5	In various cities, from Alameda County line to 0.6 mile west of Solano County line; also, in Alameda County in Albany, from 0.4 mile west to the Contra Costa County line (PM R7.6/8.0). Install lighting and upgrade concrete barrier.	0K160	1497F	201.010	2021-22	\$ 22,439	\$ 254	\$ 52,621	\$ 75,314
04	CC	4	0.0/R20.4	In and near Hercules, Martinez, and Concord, at various locations from Route 80 to 0.3 mile east of Bailey Road. Upgrade guardrail to make standard.	0J480	0481U	201.015	2021-22	\$ 3,952	\$ 10	\$ 12,400	\$ 16,362
04	СС	4		In Contra Costa County, on Routes 4, 24, 80, 123, 242, 580, and 680 at various locations. Install Accessible Pedestrian Signal (APS) systems and pedestrian countdown timers, and refresh crosswalk markings with high-visibility striping to enhance pedestrian safety.	3J140	1487N	201.015	2021-22	\$ 3,696	\$ 20	\$ 7,487	\$ 11,203
04	CC	4	R31.0/48.2	In and near Antioch and Brentwood, from 0.6 mile east of Route 160 to Old River Bridge. Construct and modify MVPs to improve highway worker safety.	4J950	1492H	201.235	2021-22	\$ 2,161	\$ 72	\$ 1,234	\$ 3,467
04	MRN	101	9.4/10.4	In San Rafael, at Route 580; and in Sonoma County in Santa Rosa from PM 19.7 to PM 20.7; in Solano County on Route 37 in Vallejo from PM R9.4 to PM R10.4 and on Route 80 in and near Vallejo and Fairfield from PM 6.5 to 17.5; also, in Napa County on Route 29 in and near the cities of Napa and Yountville from PM 11.0 to 21.0. Upgrade fencing to reduce maintenance worker exposure.		1452K	201.235	2021-22	\$ 1,750	\$ 100	\$ 3,142	\$ 4,992
04	NAP	121	0.5/1.0	Near Napa, at Huichica Creek (PM 0.75). Mitigation planting, monitoring. and reporting for EA 4G210.	4G21A	0775H	201.010	2021-22	\$ 900		\$ 1,000	\$ 1,900

#### FTIP BACK-UP LIST FOR SHOPP - COLLISION REDUCTION PROJECTS (VAR170007) FOR 2016/2022 PROGRAM YEARS All amounts in \$1,000

District	County	Route	PM	Location/Description	EA	PPNO	Prog Code (201.XXX)	FY	Support	RW	CON		Project Total
	SHOPP - C	ollision	Reduction				(201.////)						
04	SM	Var		In and near various cities, on Routes 1, 35, 82, 84, 92, 101, 109, 114, 280, and 380 at various locations. Enhance pedestrian safety by upgrading signals with Accessible Pedestrian Signal (APS) audible indicators, pushbuttons, and countdown timers, and upgrading crosswalk markings.	0К070	1491J	201.015	2021-22	\$ 3,925	\$ 57	\$ 5,8	32	\$ 9,814
04	SCL	9		In Santa Clara County, on Routes 9, 17, 85, 87, 101, 152, 237, 280, 680, and 880 at various locations. Relocate or shield existing electrical controller cabinets, and install 28 new maintenance vehicle pullouts.	2J950	1486A	201.015	2021-22	\$ 4,345	\$ 50	\$ 6,9	24	\$ 11,319
04	SCL	Var		On various routes, in various cities, at various locations. Replace pedestrian push-buttons and signal heads with Accessible Pedestrian Signals (APS) and countdown timers and refresh crosswalk markings to enhance pedestrian safety.	0K080	1492E	201.015	2021-22	\$ 3,633	\$ 23	\$ 10,7	11	\$ 14,367
04	SCL	152	11.2/R35.2	Near Gilroy, from Llagas Creek Bridge to the Merced County line. Construct maintenance vehicle pull- outs and vegetation control under existing guardrail to improve highway worker safety.	2K800	1452E	201.235	2021-22	\$ 2,545	\$ 10	\$ 6,5	90	\$ 9,145
04	SCL	280	R0.0/L5.4	In and near San Jose, from Route 101 to Route 17/880 Separation. Pave extended gore areas and narrow strips to improve highway worker safety.	4J960	1492D	201.235	2021-22	\$ 2,115	\$ 170	\$ 3,8	35	\$ 6,120
04	SON	12		In Sonoma County, on Routes 12 and 116 at various locations; also, in Marine County on Routes 1 and 131 at various locations; and in Napa County on Routes 29 and 121 at various locations. Install hybrid beacons, stop and yield lines, crosswalks and bulbouts, and upgrade curb ramps to enhance pedestrian safety.		1492G	201.015	2021-22	\$ 2,680	\$ 36			
							21/2022		\$ 64,896	\$ 1,403	\$ 133,49	_	\$ 199,792
				SHOPP - Collisio	on Red	uction P	ROGRAMME	D TOTAL	\$ 221,320	\$ 23,899	\$ 418,75	54	\$ 663,973