

CITY OF BONNEY LAKE

Public Works Department

Six Year Transportation Improvement Program (2006-2011)

List project categories

Category A – Intersection Improvements

Traffic signalization and channelization improvements at intersections to be funded by agency, county, WSDOT, federal or state grant funding, and/or developer mitigation

Category B - Arterial Roadway Major Improvements

Major roadway improvements, for Collector and Minor Arterial Classified roadways including right of way acquisition when required, state or federal grant funding, potential developer mitigation, city, county and/or WSDOT participation, environmental compliance, permitting, storm drainage, domestic water extension, sanitary sewer upgrades, roadway widening, bridge, curb, gutter, sidewalks on both sides, signalization, channelization, street lighting, landscaping, street trees, benches, etc. Also included will be a community involvement element.

The project phases are as follows:

- Pre-Design by agency/consultant
- Environmental Permitting by agency/consultant
- Right-of-Way acquisition by agency
- Design/P.S.&E. by agency/consultant
- Ad and Award by agency
- Construction by contractor
- Construction Management
- Project Completion

Category C - Roadway reconstruction, asphalt overlay, or chip seal

Roadway maintenance and/or reconstruction of existing pavement with minor drainage, shoulder improvements, signing and channelization, etc. Project design by agency and funded by agency, county, state or federal grant funds, and potential developer mitigation.

Category D - Transportation Studies

Transportation or traffic studies including computer traffic modeling and Sub Area Planning to be funded by agency and performed by consultants.

Category E - Trail Projects

Non-motorized transportation facilities including walking trails, bicycle routes, and other projects directed to the enhancement of pedestrian and bicycle facilities.

Six Year Transportation Improvement Program

Category "A" – Intersection Improvements

Year	Project description	Funding Source	Estimated Cost
2006			
A - 1	South Prairie Road E at SR 410 & 198th	TIB/TIF	\$ 250,000
2007			
A - 2	SR 410 at Old Buckley Highway	TIF	\$ 350,000
A - 3	SR 410 at 234th Ave E - WSDOT project	WSDOT	\$ 300,000
A - 4	SR 410 at 225 th Avenue E	Dev	\$ 300,000
2008			
A - 5	Angeline Rd E at Sumner-Buckley HWY	Dev/City	\$ 500,000
A - 6	200 th Avenue CT E at 104 th Street E	Dev/City	\$ 175,000
2009			
A - 7	Angeline Rd E at Rhodes Lake Rd E	TIF, City, Dev	\$ 275,000
2010			
A - 8	Sumner - Buckley HWY at 198 th Ave E	City/Dev	\$ 275,000
2011			
A - 9	Church Lake Rd at West Tapps HWY E	TIF, City, Dev	\$ 250,000
	Category "A" Total		<u>\$ 2,675,000</u>

Six Year Transportation Improvement Program

Category "B" Arterial Roadway Major Improvements

Year	Project description	Funding Source	Estimated Cost
2006			
B - 1	South Prairie Rd—SR 410 to 198 th Ave	TIB/TIF/Dev	\$2,239,672
B - 2	Sky Island connect to Rhodes Lake Rd	City/Dev	\$2,445,642
2007			
B - 3	S-B HWY to SR 410 to 184 th Ave E	Loan/TIB/TIF/DOT	\$2,207,866
B - 4	184 th Ave E connection to 182 nd Ave E	City/Dev	\$603,889
2008			
B - 5	192 nd Avenue Connection	TIF/City	\$4,543,272
B - 6	Myers Road Connection to B.L. Blvd	Dev/City/TIB/LID	\$934,127
2009			
B - 7	Angeline Rd—110 th St to Rhodes Lake Rd	TIF/Dev	\$1,468,754
2010			
B - 8	198 th Ave E / S-B Hwy E to SR-410	City/Dev	\$897,550
2011			
B - 9	Church Lake Rd / S-B Hwy E to 210 th Ave	City/TIB	\$8,532,312
Category "B" Total			<u>\$23,873,083</u>

Six Year Transportation Improvement Program

Category "C" Roadway reconstruction, asphalt overlay, or chip seal

Year	Project description	Funding Source	Estimated Cost
2006			
	C - 1 Causeway & 197 th Ave. E.	City	\$240,000
	C - 2 S. Tapps Dr. from 61 st St E to W. Tapps Hwy	City	\$110,000
	Chip Seal Program (Seven Miles)	City	\$120,000
2007			
	C - 3 Sumner-Buckley HWY (410 to Locust Ave E)	City	\$100,000
	C - 4 Drainage on Angeline Rd (104th to 108th St. E)	City	\$55,000
	Chip Seal Program (Seven Miles)	City	\$120,000
	Sidewalk Improvements	PWTF/City	\$275,000
2008			
	C - 5 75 th Street E. from Locust Ave E to 193 rd Ave E	City	\$107,800
	Chip Seal Program (Seven Miles)	City	\$120,000
	Sidewalk Improvements	PWTF/City	\$275,000
2009			
	C - 6 B.L. Blvd from Locust Ave E to 181 st Ave E	City	\$715,226
	Chip Seal Program (Seven Miles)	City	\$120,000
	Sidewalk Improvements	PWTF/City	\$275,000
2010			
	C - 7 84 th St E from 182 nd Ave E to Locust Ave E	City	\$586,852
	Chip Seal Program (Seven Miles)	City	\$120,000
	Sidewalk Improvements	PWTF/City	\$275,000
2011			
	C - 8 Church Lake Dr from 71 st St. W. to 71 st St. E.	City	\$164,000
	C - 9 W. Tapps Hwy from 77th St. E. to BL Blvd	City	\$75,000
	Chip Seal Program (Seven Miles)	City	\$120,000
	Sidewalk Improvements	City	\$75,000
Category "C" Total			<u>\$ 4,048,878</u>

Six Year Transportation Improvement Program

Category "D" Transportation Studies

Year	Project description	Funding Source	Estimated Cost
2011	Update City Traffic Model	City	\$25,000
Category "D" Total			<u>\$25,000</u>

Category "E" Trail Projects

Year	Project description	Funding Source	Estimated Cost
2008			
E - 1	Fennel Creek Pedestrian Trail	Dev/City	\$ 2,018,100
TOTAL PROGRAM COST			<u>\$32,385,373</u>

Project Summary

A-1	2006	South Prairie Road E at SR 410 and 198th	\$250,000	
A-2	2007	SR 410 at Old Buckley Highway	\$350,000	
A-3	2007	SR 410 at 234th Avenue E - WSDOT project	\$300,000	
A-4	2009	SR 410 at 225th Avenue E	\$300,000	
A-5	2008	Angeline Road East at Sumner - Buckley Highway	\$500,000	
A-6	2008	200th Avenue Ct E at 104th Street E	\$175,000	
A-7	2009	Angeline Road East at Rhodes Lake Road E	\$275,000	
A-8	2010	Sumner - Buckley Highway at 198th Avenue E	\$275,000	
A-9	2011	Church Lake Road at West Tapps Highway E	\$250,000	Sum \$2,675,000
B-1	2006	South Prairie Road	\$2,239,672	
B-2	2006	Sky Island Connection to Rhodes Lake Road	\$2,445,642	
B-3	2007	S-B HWY to SR 410 to 184th Ave E	\$2,207,866	
B-4	2007	184th connection to 182nd	\$603,889	
B-5	2008	192nd Avenue E Connection	\$8,725,150	
B-6	2008	Myers Road Connection	\$1,084,127	
B-7	2009	Angeline Road	\$1,468,754	
B-8	2010	198th Avenue E	\$897,550	
B-9	2011	Church Lake Road	\$8,532,312	Sum \$28,204,960
C-1	2006	Causeway & 197th Ave. E.	\$239,959	
C-2	2006	S. Tapps Dr. from 61st St. E. to W. Tapps Hwy	\$109,731	
C-3	2007	Sumner - Buckley Highway (410 to Locust OL)	\$100,719	
C-4	2007	Drainage on Angeline Rd. (104th to 108th St. E.)	\$54,647	
C-5	2008	75th Street E Overlay	\$107,806	
C-6	2009	Bonney Lake Blvd Overlay	\$715,226	
C-7	2010	84th Street E Overlay	\$586,852	
C-8	2011	Church Lake Dr from 71st St W to 71st St E	\$164,331	
C-9	2011	West Tapps Hwy from 77th St E to BL Blvd	\$74,921	
	2006-11	Chip Seal Program (7 miles per year)	\$420,000	Sum \$2,574,190
D - 1	2011	Update City Traffic Model	\$25,000	Sum \$25,000
E-1	2008	Ferrell Creek Pedestrian Trail	\$2,018,100	\$2,018,100
			\$35,497,250	\$35,497,250

Project Description South Prairie Road

B-1

The **South Prairie Road** project involves upgrading the existing roadway from the intersection of SR 410 to 200th Avenue E. The roadway cross section will be expanded from the existing two-lane configuration to a full five lanes with curb, gutter, and sidewalk. Intersection improvements at SR-410, and at the intersection of 200th Avenue Ct E and 104th Street E will be included in the overall project. Stormwater conveyance, detention and water-quality facilities will be provided per current DOE requirements.

Existing Pavement Width	36 ft
Proposed Pavement Width	60 ft
Project Length	2000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$19,690.69	LS	\$19,691
Mobilization	\$78,763	LS	\$78,763
Traffic Control Labor & Devices	\$39,381	LS	\$39,381
Erosion Control	\$8,000	LS	\$8,000
Clearing & Grubbing	\$12,534	LS	\$12,534
Pavement Overlay	\$27.00	LF*	\$54,000
Full-Depth Pavement	\$78.00	LF*	\$156,000
Cement Concrete Curb and Gutter	\$30.00	LF*	\$60,000
Cement Concrete Sidewalk	\$40.00	LF*	\$80,000
Channelization and Signing	\$5.00	LF*	\$10,000
Storm Drainage System	\$110.00	LF*	\$220,000
Detention and WQ System	\$8.00	SF**	\$384,000
	Subtotal		\$1,122,369
R/W**	\$500,000	LS	\$500,000
Construction Contingencies	\$224,474	LS	\$224,474
Design Engineering	\$224,474	LS	\$224,474
Construction Management/Admin.	\$168,355	LS	\$168,355
	TOTAL		\$2,239,672

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

City of Bonney Lake
STIP

2004

Project Description 184th to 182nd

B-4

Project to connect 184th Ave E to 182nd Ave E thru property purchased by City.

Existing Pavement Width	0 ft
Proposed Pavement Width	24 ft
Project Length	700 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$9,827.02	LS	\$9,827
Mobilization	\$26,205.38	LS	\$26,205
Traffic Control Labor & Devices	\$13,103	LS	\$13,103
Erosion Control	\$2,800	LS	\$2,800
Clearing & Grubbing	\$6,267	LS	\$6,267
Depth Pavement	\$78.00	LF*	\$54,600
Cement Concrete Curb and Gutter	\$30.00	LF*	\$21,000
Cement Concrete Sidewalk	\$40.00	LF*	\$28,000
Channelization and Signing	\$5.00	LF*	\$3,500
Storm Drainage System	\$110.00	LF*	\$77,000
Detention and WQ System	\$8.00	SF**	\$134,400
	Subtotal		\$376,702
R/W**	\$20,000	LS	\$20,000
Construction Contingencies	\$75,340	LS	\$75,340
Design Engineering	\$75,340	LS	\$75,340
Construction Management/Admin.	\$56,505		\$56,505
	TOTAL		\$603,889

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

++ R/W costs are preliminary estimates based on assumed property values and approximate required takes

2007

Project Description Sky Island Drive

B-2

The Sky Island Drive is a proposed roadway that will connect Sky Island Drive to Rhodes Lake Road. The new roadway will consist of two travel lanes, curb, gutter, and sidewalk, and include stormwater conveyance, detention, and water quality facilities per current DOE requirements.

Existing Pavement Width	0 ft
Proposed Pavement Width	26 ft
Project Length	2772 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$40,824.27	LS	\$40,824
Mobilization	\$108,864.71	LS	\$108,865
Traffic Control Labor & Devices	\$54,432	LS	\$54,432
Erosion Control	\$11,088	LS	\$11,088
Clearing & Grubbing	\$26,091	LS	\$26,091
Depth Pavement	\$84.50	LF*	\$234,234
Cement Concrete Curb and Gutter	\$30.00	LF*	\$83,160
Cement Concrete Sidewalk	\$40.00	LF*	\$110,880
Channelization and Signing	\$5.00	LF*	\$13,860
Storm Drainage System	\$110.00	LF*	\$304,920
Detention and WQ System	\$8.00	SF**	\$576,576
	Subtotal		\$1,564,930
R/W**	\$20,000	LS	\$20,000
Construction Contingencies	\$312,986	LS	\$312,986
Design Engineering	\$312,986	LS	\$312,986
Construction Management/Admin.	\$234,740		\$234,740
	TOTAL		\$2,445,642

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

++ R/W costs are preliminary estimates based on assumed property values and approximate required takes

2006

Project Description Church Lake Road

B-9

The **Church Lake Road** project includes upgrades to the existing two-lane roadway from Locust Avenue to 210th Avenue E, as well as improvements to the West Tapps Highway E. The proposed cross section will include the equivalent of three travel lanes with curb, gutter, and sidewalk. Stormwater conveyance, detention, and water quality will be provided per DOE standards.

Existing Pavement Width	24 ft
Proposed Pavement Width	36 ft
Project Length	10500 ft
Length of Wall	600 ft
Average Height	10 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$67,571.16	LS	\$67,571
Mobilization	\$270,285	LS	\$270,285
Traffic Control Labor & Devices	\$135,142	LS	\$135,142
Erosion Control	\$42,000	LS	\$42,000
Clearing & Grubbing	\$45,558	LS	\$45,558
Pavement Overlay	\$18.00	LF*	\$189,000
Full-Depth Pavement	\$39.00	LF*	\$409,500
Cement Concrete Curb and Gutter	\$30.00	LF*	\$315,000
Cement Concrete Sidewalk	\$40.00	LF*	\$420,000
Retaining Wall	\$125.00	SF	\$750,000
Channelization and Signing	\$5.00	LF*	\$52,500
Storm Drainage System	\$110.00	LF*	\$1,155,000
Detention and WQ System	\$8.00	SF**	\$1,008,000
	Subtotal		\$4,859,556
R/W**	\$1,000,000	LS	\$1,000,000
Construction Contingencies	\$971,911	LS	\$971,911
Design Engineering	\$971,911	LS	\$971,911
Construction Management/Admin.	\$728,933	LS	\$728,933
	TOTAL		\$8,532,312

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

City of Bonney Lake
STIP

2011

Project Description Drainage Angeline Rd

C-4 2006

The drainage improvements include curb and gutter along the west side of Angeline Road and some storm drainage additions.

Existing Pavement Width	2 ft
Proposed Pavement Width	2 ft
Project Length	800 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$312.00	LS	\$312
Mobilization	\$2,496	LS	\$2,496
Traffic Control Labor & Devices	\$1,248	LS	\$1,248
Erosion Control	\$3,200	LS	\$3,200
Clearing & Grubbing	\$1,928	LS	\$0
Pavement Overlay	\$1.50	LF*	\$2,000
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$24,000
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$0
Storm Drainage System	\$110.00	LF*	\$2,000
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$35,256
R/W**	\$0	LS	\$0
Construction Contingencies	\$7,051	LS	\$7,051
Design Engineering	\$7,051	LS	\$7,051
Construction Management/Admin.	\$5,288	LS	\$5,288
	TOTAL		\$54,647

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description 84th Street E

C-3 2004

The **84th Street E** improvements include resurfacing the roadway and adding curb, gutter, sidewalk, and stormwater conveyance system.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	1600 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$3,350.57	LS	\$3,351
Mobilization	\$26,805	LS	\$26,805
Traffic Control Labor & Devices	\$13,402	LS	\$13,402
Erosion Control	\$6,400	LS	\$6,400
Clearing & Grubbing	\$3,857	LS	\$3,857
Pavement Overlay	\$18.00	LF*	\$28,800
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$48,000
Cement Concrete Sidewalk	\$40.00	LF*	\$64,000
Channelization and Signing	\$5.00	LF*	\$8,000
Storm Drainage System	\$110.00	LF*	\$176,000
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$378,614
R/W**	\$0	LS	\$0
Construction Contingencies	\$75,723	LS	\$75,723
Design Engineering	\$75,723	LS	\$75,723
Construction Management/Admin.	\$56,792	LS	\$56,792
	TOTAL		\$586,852

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description 198th Avenue E

B-8

The **198th Avenue E** project includes upgrading the existing roadway and possible realignment near its intersection with SR 410. The existing travel lanes will remain the same, however curb, gutter, sidewalk, and stormwater conveyance system will be added. Additional intersections improvements will be needed at SR 410.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	1750 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$7,329.37	LS	\$7,329
Mobilization	\$29,317	LS	\$29,317
Traffic Control Labor & Devices	\$14,659	LS	\$14,659
Erosion Control	\$7,000	LS	\$7,000
Clearing & Grubbing	\$4,218	LS	\$4,218
Pavement Overlay	\$18.00	LF*	\$31,500
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$52,500
Cement Concrete Sidewalk	\$40.00	LF*	\$70,000
Channelization and Signing	\$5.00	LF*	\$8,750
Storm Drainage System	\$110.00	LF*	\$192,500
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$417,774
R/W**	\$250,000	LS	\$250,000
Construction Contingencies	\$83,555	LS	\$83,555
Design Engineering	\$83,555	LS	\$83,555
Construction Management/Admin.	\$62,666	LS	\$62,666
	TOTAL		\$897,550

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

City of Bonney Lake
STIP

2010

City of Bonney Lake
STIP

Project Description Myers Road Connection

B-6 2008

The **Myers Road Connection** involves extending Bonney Lake Blvd to connect to Myers Road. The cross-section will include two travel lanes complete with curb, gutter, and sidewalk. A storm drainage conveyance system will be added to collect and convey the stormwater runoff from the roadway to new detention and water quality facilities.

Existing Pavement Width	0 ft
Proposed Pavement Width	24 ft
Project Length	1000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$14,038.60	LS	\$14,039
Mobilization	\$37,436	LS	\$37,436
Traffic Control Labor & Devices	\$18,718	LS	\$18,718
Erosion Control	\$4,000	LS	\$4,000
Clearing & Grubbing	\$8,953	LS	\$8,953
Pavement Overlay	\$0.00	LF*	\$0
Full-Depth Pavement	\$78.00	LF*	\$78,000
Cement Concrete Curb and Gutter	\$30.00	LF*	\$30,000
Cement Concrete Sidewalk	\$40.00	LF*	\$40,000
Channelization and Signing	\$5.00	LF*	\$5,000
Storm Drainage System	\$110.00	LF*	\$110,000
Detention and WQ System	\$8.00	SF**	\$192,000
	Subtotal		\$538,146
R/W**	\$250,000	LS	\$250,000
Construction Contingencies	\$107,629	LS	\$107,629
Design Engineering	\$107,629	LS	\$107,629
Construction Management/Admin.	\$80,722	LS	\$80,722
	TOTAL		\$1,084,127

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description 192nd Avenue E Connection

B-5

The **192nd Avenue E** project involves connecting SR 410 to 104th. This section of roadway includes two travel lanes, curb, gutter, and sidewalk, stormwater facilities, and a significant retaining wall system.

A

Existing Pavement Width	0 ft
Proposed Pavement Width	30 ft
Project Length	4000 ft
Length of Wall	1000 ft
Average Height	15 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$91,869.67	LS	\$91,870
Mobilization	\$321,785.79	LS	\$321,786
Traffic Control Labor & Devices	\$160,893	LS	\$160,893
Erosion Control	\$16,000	LS	\$16,000
Clearing & Grubbing	\$41,322	LS	\$41,322
Pavement Overlay	\$0.00	LF	\$0
Full-Depth Pavement	\$97.50	LF	\$390,000
Cement Concrete Curb and Gutter	\$30.00	LF	\$120,000
Cement Concrete Sidewalk	\$40.00	LF	\$160,000
Retaining Wall	\$125.00	SF	\$1,875,000
Channelization and Signing	\$5.00	LF	\$20,000
Storm Drainage System	\$110.00	LF	\$440,000
Detention and WQ System	\$8.00	SF	\$960,000
	Subtotal		\$4,596,871
R/W	\$1,600,000	LS	\$1,600,000
Construction Contingencies	\$919,374	LS	\$919,374
Design Engineering	\$919,374	LS	\$919,374
Construction Management/Admin.	\$689,531	LS	\$689,531
	TOTAL		\$8,725,150

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

2008

Project Description Causeway and 197th Ave. E Overlay

C-1

2006

This is rebuild of 197th as well as the Causeway.

Existing Pavement Width 0 ft
 Proposed Pavement Width 24 ft
 Project Length 1600 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$2,716.00	LS	\$2,716
Mobilization	\$10,864	LS	\$10,864
Traffic Control Labor & Devices	\$5,432	LS	\$5,432
Erosion Control	\$3,000	LS	\$3,000
Clearing & Grubbing	\$10,028	LS	\$0
Overlay	\$18.00	LF*	\$0
Full-Depth Pavement	\$78.00	LF*	\$124,800
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$8,000
Storm Drainage System	\$110.00	LF*	\$0
Detention and WQ System	\$8.00	SF**	\$0
Subtotal			\$154,812
R/W**	\$500,000	LS	\$0
Construction Contingencies	\$30,962	LS	\$30,962
Design Engineering	\$30,962	LS	\$30,962
Construction Management/Admin.	\$23,222	LS	\$23,222
TOTAL			\$239,959

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description South Tapps Overlay

C-2

2006

This is an OVERLAY project for road maintenance.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	1300 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$1,242.00	LS	\$1,242
Mobilization	\$4,968	LS	\$4,968
Traffic Control Labor & Devices	\$2,484	LS	\$2,484
Erosion Control	\$1,000	LS	\$1,000
Clearing & Grubbing	\$3,134	LS	\$0
Overlay	\$18.00	LF*	\$23,400
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$6,500
Storm Drainage System	\$110.00	LF*	\$0
Petromat	\$1.00	SF**	\$31,200
	Subtotal		\$70,794
R/W**	\$500,000	LS	\$0
Construction Contingencies	\$14,159	LS	\$14,159
Design Engineering	\$14,159	LS	\$14,159
Construction Management/Admin.	\$10,619	LS	\$10,619
	TOTAL		\$109,731

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description West Tapps Hwy 77th to BL Blvd OL

C-9

2011

This is an OVERLAY project for road maintenance.

Existing Pavement Width 22 ft
 Proposed Pavement Width 22 ft
 Project Length 1800 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$848.00	LS	\$848
Mobilization	\$3,392	LS	\$3,392
Traffic Control Labor & Devices	\$1,696	LS	\$1,696
Erosion Control	\$1,000	LS	\$1,000
Clearing & Grubbing	\$4,339	LS	\$0
Overlay	\$18.00	LF*	\$32,400
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$9,000
Storm Drainage System	\$110.00	LF*	\$0
Detention and WQ System	\$8.00	SF**	\$0
Subtotal			\$48,336
R/W**	\$500,000	LS	\$0
Construction Contingencies	\$9,667	LS	\$9,667
Design Engineering	\$9,667	LS	\$9,667
Construction Management/Admin.	\$7,250	LS	\$7,250
TOTAL			\$74,921

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description Church Lake from 71 W to 71 E OL

C-8

2011

This is an OVERLAY project for road maintenance.

Existing Pavement Width	22 ft
Proposed Pavement Width	22 ft
Project Length	4000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$1,860.00	LS	\$1,860
Mobilization	\$7,440	LS	\$7,440
Traffic Control Labor & Devices	\$3,720	LS	\$3,720
Erosion Control	\$1,000	LS	\$1,000
Clearing & Grubbing	\$9,642	LS	\$0
Overlay	\$18.00	LF*	\$72,000
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$20,000
Storm Drainage System	\$110.00	LF*	\$0
Detention and WQ System	\$8.00	SF**	\$0
Subtotal			\$106,020
R/W**	\$500,000	LS	\$0
Construction Contingencies	\$21,204	LS	\$21,204
Design Engineering	\$21,204	LS	\$21,204
Construction Management/Admin.	\$15,903	LS	\$15,903
TOTAL			\$164,331

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description Old Buckley Highway Overlay

C-3

2007

This is an OVERLAY of the Old Buckley Highway from SR 410 to the Locust signal.

Existing Pavement Width	36 ft
Proposed Pavement Width	36 ft
Project Length	2000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$1,140.00	LS	\$1,140
Mobilization	\$4,560	LS	\$4,560
Traffic Control Labor & Devices	\$2,280	LS	\$2,280
Erosion Control	\$1,000	LS	\$1,000
Clearing & Grubbing	\$4,821	LS	\$0
Overlay	\$18.00	LF*	\$36,000
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$10,000
Asphalt Grinding	\$2.50	LF*	\$10,000
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$64,980
R/W**	\$500,000	LS	\$0
Construction Contingencies	\$12,996	LS	\$12,996
Design Engineering	\$12,996	LS	\$12,996
Construction Management/Admin.	\$9,747	LS	\$9,747
	TOTAL		\$100,719

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

City of Bonney Lake
STIP

Project Description S/B Highway & SR 410 Intersection Improvements **B-3**

The **Old Buckley Highway** project includes expanding the existing three-lane roadway to fit with curb, gutter, and sidewalk. In addition, 182nd Avenue E will have a cul-de-sac where it connected to the Old Buckley Highway. New stormwater facilities will be designed per DOE requirements.

Existing Pavement Width	36 ft
Proposed Pavement Width	60 ft
Project Length	2000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$19,330.69	LS	\$19,331
Mobilization	\$77,323	LS	\$77,323
Traffic Control Labor & Devices	\$38,661	LS	\$38,661
Erosion Control	\$8,000	LS	\$8,000
Clearing & Grubbing	\$12,534	LS	\$12,534
Overlay	\$18.00	LF*	\$36,000
Full-Depth Pavement	\$78.00	LF*	\$156,000
Cement Concrete Curb and Gutter	\$30.00	LF*	\$60,000
Cement Concrete Sidewalk	\$40.00	LF*	\$80,000
Channelization and Signing	\$5.00	LF*	\$10,000
Storm Drainage System	\$110.00	LF*	\$220,000
Detention and WQ System	\$8.00	SF**	\$384,000
	Subtotal		\$1,101,849
R/W**	\$500,000	LS	\$500,000
Construction Contingencies	\$220,370	LS	\$220,370
Design Engineering	\$220,370	LS	\$220,370
Construction Management/Admin.	\$165,277	LS	\$165,277
	TOTAL		\$2,207,866

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

City of Bonney Lake
STIP

2007

ve lanes
once

Project Description Angeline Road

B-7 2009

The **Angeline Road** project includes expanding the roadway to three lanes, adding curb, gutter, and sidewalks, and adding a stormwater conveyance system as well as detention and water quality facilities.

Existing Pavement Width	24 ft
Proposed Pavement Width	36 ft
Project Length	2400 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$16,624.26	LS	\$16,624
Mobilization	\$66,497	LS	\$66,497
Traffic Control Labor & Devices	\$33,249	LS	\$33,249
Erosion Control	\$9,600	LS	\$9,600
Clearing & Grubbing	\$10,413	LS	\$10,413
Pavement Overlay	\$18.00	LF*	\$43,200
Full-Depth Pavement	\$39.00	LF*	\$93,600
Cement Concrete Curb and Gutter	\$30.00	LF*	\$72,000
Cement Concrete Sidewalk	\$40.00	LF*	\$96,000
Channelization and Signing	\$5.00	LF*	\$12,000
Storm Drainage System	\$110.00	LF*	\$264,000
Detention and WQ System	\$8.00	SF**	\$230,400
	Subtotal		\$947,583
R/W**	\$0	LS	\$0
Construction Contingencies	\$189,517	LS	\$189,517
Design Engineering	\$189,517	LS	\$189,517
Construction Management/Admin.	\$142,137	LS	\$142,137
	TOTAL		\$1,468,754

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description Bonney Lake Blvd

C-2 2009

The **Bonney Lake Blvd** maintenance project includes a pavement overlay and the addition of curb, gutter, and sidewalk. Stormwater conveyance facilities will also be added.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	1950 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$4,083.50	LS	\$4,084
Mobilization	\$32,668	LS	\$32,668
Traffic Control Labor & Devices	\$16,334	LS	\$16,334
Erosion Control	\$7,800	LS	\$7,800
Clearing & Grubbing	\$4,700	LS	\$4,700
Pavement Overlay	\$18.00	LF*	\$35,100
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$58,500
Cement Concrete Sidewalk	\$40.00	LF*	\$78,000
Channelization and Signing	\$5.00	LF*	\$9,750
Storm Drainage System	\$110.00	LF*	\$214,500
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$461,436
R/W**	\$0	LS	\$0
Construction Contingencies	\$92,287	LS	\$92,287
Design Engineering	\$92,287	LS	\$92,287
Construction Management/Admin.	\$69,215	LS	\$69,215
	TOTAL		\$715,226

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

The **75th Street E** maintenance project includes a pavement OVERLAY only.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	2700 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$621.00	LS	\$0
Mobilization	\$4,968	LS	\$4,968
Traffic Control Labor & Devices	\$2,484	LS	\$2,484
Erosion Control	\$10,800	LS	\$0
Clearing & Grubbing	\$6,508	LS	\$0
Pavement Overlay	\$18.00	LF*	\$48,600
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$0
Cement Concrete Sidewalk	\$40.00	LF*	\$0
Channelization and Signing	\$5.00	LF*	\$13,500
Storm Drainage System	\$110.00	LF*	\$0
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$69,552
R/W**	\$0	LS	\$0
Construction Contingencies	\$13,910	LS	\$13,910
Design Engineering	\$13,910	LS	\$13,910
Construction Management/Admin.	\$10,433	LS	\$10,433
	TOTAL		\$107,806

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

Project Description 75th Street E

C-4 2009

The **75th Street E** maintenance project includes a pavement overlay and the addition of curb, gutter, and sidewalk. Stormwater conveyance facilities will also be added.

Existing Pavement Width	24 ft
Proposed Pavement Width	24 ft
Project Length	2700 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$5,654.08	LS	\$5,654
Mobilization	\$45,233	LS	\$45,233
Traffic Control Labor & Devices	\$22,616	LS	\$22,616
Erosion Control	\$10,800	LS	\$10,800
Clearing & Grubbing	\$6,508	LS	\$6,508
Pavement Overlay	\$18.00	LF*	\$48,600
Full-Depth Pavement	\$0.00	LF*	\$0
Cement Concrete Curb and Gutter	\$30.00	LF*	\$81,000
Cement Concrete Sidewalk	\$40.00	LF*	\$108,000
Channelization and Signing	\$5.00	LF*	\$13,500
Storm Drainage System	\$110.00	LF*	\$297,000
Detention and WQ System	\$8.00	SF**	\$0
	Subtotal		\$638,911
R/W**	\$0	LS	\$0
Construction Contingencies	\$127,782	LS	\$127,782
Design Engineering	\$127,782	LS	\$127,782
Construction Management/Admin.	\$95,837	LS	\$95,837
	TOTAL		\$990,313

* Set up for costs per linear foot of roadway

** Costs per square foot of new impervious area

** R/W costs are preliminary estimates based on assumed property values and approximate required takes

The **Fennel Creek Pedestrian Trail** is the City's portion of the regional trail proposed through the area. The extents of the project begin at Rhodes Lake Road and continue along Fennel Creek to the Sumner-Buckley Highway.

Existing Pavement Width	0 ft
Proposed Pavement Width	12 ft
Project Length	13000 ft

<u>Description</u>	<u>Unit Cost</u>	<u>Unit</u>	<u>Cost</u>
Construction Surveying	\$28,000	LS	\$28,000
Mobilization	\$47,000	LS	\$47,000
Erosion Control	\$65,000	LS	\$65,000
Clearing & Grubbing	\$60,000	LS	\$60,000
Excavation & Embankment	\$8.00	CY	\$154,000
Full-Depth Pavement	\$18.00	LF*	\$234,000
Storm Drainage/Detention System	\$200,000	LS	\$200,000
Stream Crossing	\$75,000	LS	\$75,000
Environmental Mitigation	\$150,000	LS	\$150,000
	Subtotal		\$1,013,000
R/W**	\$500,000	LS	\$500,000
Environmental Permitting	\$100,000	LS	\$100,000
Construction Contingencies	\$202,600	LS	\$202,600
Design Engineering	\$121,500	LS	\$121,500
Construction Management/Admin.	\$81,000	LS	\$81,000
	TOTAL		\$2,018,100

* Set up for costs per linear foot of trail

** R/W costs are preliminary estimates based on assumed property values and approximate required takes