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TITLE FOR AGENDA ITEM:

Resolution adopting the 2025-2030 Six-Year Water Resources Improvement Program (WRIP) by the Whatcom County Council (Council acting as the Whatcom County Flood Control Zone District Board of Supervisors)

SUMMARY STATEMENT OR LEGAL NOTICE LANGUAGE:

Resolution by the Whatcom County Flood Control Zone District Board of Supervisors adopting the Six-Year Water Resources Improvement Program (WRIP) for 2025-2030. The adoption by resolution is pursuant to the Revised Code of Washington (RCW 86.15.110)

HISTORY OF LEGISLATIVE FILE

Date:	Acting Body:		Action:	Sent To:
09/10/2024	Council		INTRODUCED FOR PUBLIC HEARING	Council
		Aye: 7	Buchanan, Byrd, Donovan, Elenb	aas, Galloway, Scanlon, and Stremler
		Nay: 0		
09/24/2024	Council		APPROVED	
		Aye: 7	Buchanan, Byrd, Donovan, Elenb	aas, Galloway, Scanlon, and Stremler
		Nay: 0		

Attachments: Memo, Proposed Resolution

PROPOSED BY: <u>Public Works</u> INTRODUCED: <u>9/10/24</u>

RESOLUTION NO. 2024-038

(A Resolution of the Whatcom County Flood Control Zone District Board of Supervisors)

WHATCOM COUNTY FLOOD CONTROL ZONE DISTRICT SIX-YEAR WATER RESOURCES IMPROVEMENT PROGRAM FOR THE YEARS 2025 THROUGH 2030

WHEREAS, pursuant to RCW 86.15.110, flood control or storm water control improvements may be extended, enlarged, acquired, or constructed by a flood control zone pursuant to a resolution adopted by its Board of Supervisors; and

WHEREAS, Whatcom County Public Works Department on behalf of the Whatcom County Flood Control Zone District has prepared a Six-Year Water Resources Improvement Program for adoption; and

WHEREAS, pursuant to RCW 86.15.120, the Supervisors shall hold a public hearing prior to adopting the resolution; and

WHEREAS, the Six-Year Water Resources Improvement Program attached hereto as Exhibit "A" has been reviewed and determined to be consistent with Whatcom County's comprehensive plan and is consistent with the following plans:

- Lower Nooksack River Comprehensive Flood Hazard Management Plan, October 1999
- Jones Creek Debris Flow Study, March 2004
- WRIA 1 Salmon Recovery Plan, October 2005
- Birch Bay Comprehensive Stormwater Plan, July 2006
- Lake Whatcom Comprehensive Stormwater Plan, March 2008
- Lake Samish Basin Comprehensive Stormwater Plan, July 2012
- Birch Bay Central North Sub-Watershed Master Plan, December 2013
- Birch Bay Central South Sub-Watershed Master Plan, January 2015
- Nooksack River System-Wide Improvement Framework, June 2016

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- Birch Point, Terrell Creek Urban Area, and Point Whitehorn Sub-watershed Master Plan, November 2016
- Lake Whatcom Comprehensive Plan: Stormwater Capital Program Update, September 2017
- Lake Whatcom East Geneva Sub-watershed Master Plan, January 2021
- Birch Point Sub-watershed Drainage Study Report, September 2023; and
- Lake Whatcom Management Program 2025-2029 Work Plan, in preparation.

WHEREAS, pursuant to RCW 86.15.110, the preliminary engineering studies for constructed improvements are on file with the Whatcom County Public Works Department; and

WHEREAS, pursuant to RCW 86.15.110, the estimated cost of the acquisition or construction of the improvement, together with supporting data, is included in the Six-Year Water Resources Improvement Program; and

WHEREAS, the improvements will benefit one or more flood control zones, subzones and the county as a whole;

NOW, THEREFORE, BE IT RESOLVED by the Whatcom County Flood Control Zone District Board of Supervisors as follows:

That the Whatcom County Flood Control Zone District Six-Year Water Resources Improvement Program for the years 2025 through 2030, which is attached hereto as Exhibit "A", is hereby adopted.

APPROVED, this 24th day of September 2024. ATTEST Flood Control Zone District Board of Supervisors WHATCOM COUNTY, WASHINGTON Cathy Haika, Clerk of the òuncil Ban

APPROVED AS TO FORM:

y Buchanan, Chair

<u>Is / Christopher Quinn</u> by JSmby 8-28-24 Christopher Quinn, Chief Deputy Prosecuting Attorney - Civil Division

WHATCOM COUNTY FLOOD CONTROL ZONE DISTRICT

2025-2030 SIX-YEAR WATER RESOURCES IMPROVEMENT PROGRAM

EXHIBIT A

Item		Database ID	A SAME STREET	024222002003	Previous Expenditures		2025	GARGER CARDING CONTRACTOR		2026			2027		030302020	2028	NESSAN SOULAGE	2010/201	2029	(SCT) (105/15/15/15	(2)(5)(2)(2)(2)	2030		10000000000000000000000000000000000000				
No.	Project Description	No.	BES	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Total				
	LAKE WHATCOM STORMWATER	<u> (* 1. 19</u>																										
				\$ 150,000	REET/LWSU	PE	\$ 175,000	LWSU	PE			PE			PE			E			PE			-				
1	SWP #SWLW24-UL tagenoge stormwater improvements: Install a water quality	20-007	61.4			CN	\$ 500,000	IWSU	CN			CN			CN			N						\$ 825,000				
1	system to bear and mater non-the coBernage acceptionent.		1			CN			CN			ICN			CN		10	N I			CN			1				
-				\$ 70,000	REET/LWSU	PE	\$ 217,375	LWSU	PE			PE			PE		F	E			PE							
,	SWP #SWEW23-06 Austin Court Stormwater Improvements: Install water quality	20-008	S8.8			RW			RW			RW			RW			w			RW			\$ 737,375				
1	system on the discharge from Austin Court.					CN			CN	\$ 450,000	LWSU	CN			CN			N		·	CN			4				
-			+	S 145 000	EENA /DECT /I WISI	ICN IPC	\$ 30,000	5EM A	CN PF			OF CN			ICN IPF			π F			DF .	-	+					
				3 145,000	TEMATREE ITEM 30	PE	3 30,000		PE			PE			PE		i	'E			PE	1		1				
3	SWP #SWLW23-05 Cedar Hills Culvert Replacement: Replacement of culvert	23-001	44.2			RW			RW			RW			RW		, ,	:W			RW			\$ 380,000				
	camaged corring the 2021 hooding event with retwork functing contribution.					CN	\$ 180,000	FEMA	CN			CN			CN		0	N			CN	I		4				
						CN	\$ 25,000	REET	CN			CN		1140511	CN			N.			CN			<u> </u>				
	Strawberry Point/Lake Whatcom Blvd Stormwater Improvements: System upgrades					PE	\$ 30,000	LWSU	IPE IPM/	\$ 300,000	REET	PE	\$ 50,000	LWSU	IPE IPW	·	P	w			PE RW	<u> </u>	1	1.				
4	to improve water quality including vaults, biofiltration swales, and channel	17-001	62.2			CN			CN	33,000	LWID	CN	\$ 455,000	REET	CN			N N			CN	1		\$ 1,170,000				
	restoration					CN			CN			CN	\$ 300,000	LWSU	CN			N			CN		1	1				
			T			PE			PE			PE	\$ 70,000	RÉET	PE			E			PE			1				
5	Geneva Street & Lake Louise Road Culvert Replacement: Replace culverts along	20-010	58.8			PE			PE			PE			PE			E			PE			\$ 270,000				
	Geneva Street and Lake Louise Road to improve water quality and conveyance					RW			RW			RW			RW	1 200,000	114/511	W			RW			4				
	I ske Whatcom Boulevard Media Filter Drain (FG.1): Install media filter drain or	·····	+						DE CN			PF	\$ 180,000	LWS1:	DC N	3 200,000					PF							
6	other water quality system along west side of Lake Whatcom Blvd to improve water	22-006	58.8			RW			RW			RW	\$ 25,000	REET	RW			W			RW	1	1	\$ 835,000				
	quality.					CN			CN			CN			CN		('N	\$ 630,000	REET	CN			1				
				L		PE			PE	\$ 10,000	LWSU	PE			PE	S 200,000	LWSU I	Æ			PE	\$ 50,000	REET	4				
	Sudden Valley Stormwater Improvements No. 2: Construct drainage system	22.007	48.0			PE			PE			PE			PE	10.000	PCCT I	E			PE	····	1	1 260.000				
1 '	upgrades and retrofits in the Sudden Valley area of the Lake Whatcom watershed.	22-007	49.0			RW			RW CN			ICN ICN	<u> </u>		CN	10,000	KEEI I	N N			ICN	\$ \$00,000	REFT	1 1,280,000				
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	to remove phosphorus and other pollutants from residential purph prior to entering	22.008	22.008	571			PE			95			PĘ			PE			×ε			PE			- S 650.000			
ľ	Lake Whatcom.					RW	·		RW			RW			RW	\$ 25,000	LWSU	W			RW			-				
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9	systems and improve conveyance near Viewhaven Lane.	20-009	58.8			CN			CN			CN		1	CN			CN		1	CN		· · ·	1 \$ 215,000				
						CN			CN			CN			CN	1		CN			.CN			1				
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10	 Subilization (2023) Swy #SW8223-04 Semiahmao Drive South & Outfall Improvements (8P-2, 8P-5): Upsize culvents and re-establish roadside ditch on east side of Semiahmao Drive. SWP #SW8223-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace 	18-009 18-010	50.3	\$ 395,000 \$ 140,000	BBWARM	RW CN CN PE PE RW CN PE RW	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000	BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE CN CN CN PE RW			CN CN PE PE RW CN PE RW			RW CN CN PE RW CN PE RW			EN EN PE RW EN EN PE RW	· · · · · · · · · · · · · · · · · · ·		RW CN CN PE RW CN PE RW RW			\$ 1,380,000				
10	szemaciat (2023) SWP #SWB823-04 Semiahmoo Drive South & Outfall Improvements (BP-2, BP-5): Upsite culvers and re-stablish roadside dich on east side of Semiahmoo Drive. SWP #SWB823-06 Lona Lane Drainage & Tide Gate Modifications (TC1-2): Replace tide gase structure and repair embankment; install Type 2 CB and culvet under Birch	18-009 18-010 18-008	29.8 50.3 42.5	\$ 395,000 \$ 140,000	BBWARM BBWARM BBWARM	RW CN CN PE PE RW CN PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 570,000	BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE CN CN CN PE RW CN			CN CN PE PE RW CN PE RW CN CN CN			RW CN CN PE PE RW CN PE RW CN			EN EN PE RW EN EN EN			RW CN CN PE PE CN CN PE RW CN			\$ 1,380,000 				
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11	Submitted (222) SWP SWB22-04 Semishmoo Drive South & Outfall Improvements (BP-2, BP-5): Upsite culvers and re-stabilish roadside ditch on east side of Semishmoo Drive. SWP SWB22-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvet; under Birch Bay Dr	18-009 18-010 18-008	29.8 50.3 42.5	\$ 395,000 \$ 140,000	BBWARM	RW CN PE PE RW CN PE RW CN CN CN CN CN DF	\$ 10,000 \$ 400,000 \$ 50,000 \$ 50,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,00000 \$ 200,00000 \$ 200,000000 \$ 200,0000000000000000000000000000000000	BBWARM FEMA BBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWABM	RW CN CN PE PE CN CN PE RW CN CN CN CN CN DF			RW CN PE PE RW CN PE RW CN PE RW CN PE RW CN CN CN PF PF			RW CN CN PE PE RW CN CN CN CN CN CN CN CN			CN			RW CN CN PE PE RW CN PE RW CN PF			\$ 1,380,000				
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10	Submitted (223) SWP 55W822-06 Semiahmoo Drive South & Outfall Improvements (8P-2, 8P-5): Upsite culvers and re-establish roadside dich on east side of Semiahmoo Drive. SWP 55W822-06 Long Lane Drainage & Tide Gate Modifications (TCL-2): Replace tode gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W822-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Upsice piece, SWP 65W823-365 Normar Piece Stormwater Improvements (8P-1): Piece Piece Stormwater Piece Stormwater Piece Stormwater Piece Stormwater Piece Stormwater Piec	18-009 18-010 18-008	29.8 50.3 42.5 52.0	\$ 395,000 \$ 140,000 \$ 160,000	2 88WARM	RW CN CN PE PE RW CN PE RW CN CN CN CN CN CN PE RW CN PE RW RW	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000	BOWARM FEMA BBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWARM BBWARM	RW CN PE PE CN PE RW CN PE RW CN PE RW CN PE PE PE PE CN PE CN CN			RW CN PE PE RW CN PE RW CN PE RW CN PE RW CN PE PE RW CN PE PE RW			RW CN PE PE RW CN PE RW CN CN CN CN PE RW CN PE PE RW CN PE PE PE PE RW			CN			RW CN PE PE RW CN PE RW CN PE RW CN CN PE RW CN PE RW CN PE PE RW			\$ 1,380,000 \$ 1,710,000 1,336,000				
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10	SWP #SWB823-05 Normar Place Stormwater Improvements (BP-3): Upsice pipes, replace CBs and install energy disspacer at pipe outfail on Normar Place	18-009 18-010 18-008 19-004	29.8 50.3 42.5 52.0	\$ 395,000 \$ 140,000 \$ 160,000	D BBWARM	RW CN CN PE PE RW CN PE RW CN CN PE RW CN PE PE RW CN CN CN CN CN CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 255,000 \$ 255,000 \$ 255,000 \$ 200,000 \$ 255,000 \$ 200,000 \$ 200,0000 \$ 200,00000 \$ 200,000000 \$ 200,00000000000000	BEWARM FEMA BEWARM BEWARM BEWARM BEWARM REET ROAD FUNDS BEWARM BBWARM	RW CN PE PE CN	\$. 580.000 \$ 200.000	BBWARM REET	CN CN CN PE PE RW CN PE RW CN			RW CN PE PE RW CN PE RW CN PE RW CN CN PE RW CN PE RW CN PE RW CN PE RW CN			IN I			RW CN CN PE RW CN PE RW CN CN CN CN CN CN PE RW CN PE RW CN PE RW CN CN CN CN CN CN			\$ 1,380,000 \$ 1,710,000 \$ 1,336,000				
11	Submitted (223) SWP SWB22-04 Semishmoo Drive South & Outfall Improvements (BP-2, BP-5): Upsite culvers and re-establish roadside dich on east side of Semiahmeo Drive. SWP SWB22-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvest under Birch Bay Or SWP SWB22-05 Normar Place Stormwater Improvements (BP-3): Upsize pipes, replace CBs and install energy dissipater at pipe outfall on Normar Place	28-011 18-009 18-010 18-008 19-004	29.8 50.3 42.5 52.0	\$ 395,000 \$ 140,000 \$ 160,000	2 BEWARM	RW CN CN PE PE RW CN RW CN CN PE PE RW CN CN CN PE PE RW CN CN DN CN DN SW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 935,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 500,000 \$ 500,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,000000 \$ 200,0000 \$ 200,0000000000000000000000000000000	EBWARM EENA BBWARM BBWARM BBWARM EBWARM REF ROAD FUNDS BBWARM BBWARM BBWARM BBWARM	RW CN CN PE CN CN CN CN CN CN CN CN PE CN CN	\$ 580.000 \$ 200.000	BBWARM REET	CN CN CN PF PE RW CN PE RW CN CN CN CN CN PE PE RW CN CN CN CN CN RW RW CN CN SN CN SN CN SN CN SN SN CN SN SN SN SN SN SN SN SN SN SN SN SN SN			RW CN PE PE RW CN PE RW CN PE PE CN CN CN SW			IN I			RW CN CN PE PE RW CN PE RW CN PE PE CN CN CN PE			\$ 1,380,000 \$ 1,710,000 \$ 1,736,000				
10	SWP SSWB23-05 Biomar Place Stormwater in provements (BP-1): Upsice pipes, Pipes and Italia Interface Stormwater at pipe outfill on Figure Pipes SWP SSWB23-05 Normar Place Stormwater Install Type 2 CB and cubert under Birch Bay Dr SWP SSWB23-05 Normar Place Stormwater Ingrovements (BP-1): Upsice pipes, replace CB and Istall energy dissipater at pipe outfill on Normar Place SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP-3 SWP SSWB23-07 Birch Point Road S	28-011 18-009 18-010 18-008 19-004 21-001	29.8 50.3 42.5 52.0 33.3	\$ 395,000 \$ 140,000 \$ 140,000 \$ 160,000	D BBWARM	RW CN CN PE RW RW CN CN CN CN CN CN CN CN CN CN CN CN CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 235,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000	EBWARM FKNA DBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWARM BBWARM BBWARM BBWARM	RW CN PE PE CN	\$ 580.000 \$ 200.006	BSWARM REET	CN CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN			RW CN CN PE PE RW CN PE RW CN CN CN PE RW CN CN CN PE RW CN PE RW CN PE RW CN CN PE RW CN CN CN CN			IN IN IN PE IN IN IN IN IN IN IN IN IN IN IN IN IN			RW CN CN PE PE RW CN RW CN RW CN RW CN RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000				
10	Submitted (223) SWP SWB22-06 Semiahmoo Drive South & Ourfall Improvements (8P-2, 8P-5): Upsize culvers and re-establish roadside dich on east side of Semiahmoo Drive. SWP SWB22-06 Semiahmoo Drive South & Ourfall Improvements (8P-2, 8P-5): Upsize culvers and re-establish roadside dich on east side of Semiahmoo Drive. SWP SWB22-06 Sont Jame Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP SWB22-05 Normar Place Stormwater Improvements (8P-1): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP SWB22-07 Birch Point Road Stormwater & Outfall Improvements (8P-3), 8P- 6): Upsize culvers and replace outfall to the back to rockuce Bulf erosion	20-011 18-009 18-010 18-008 19-004 21-001	29.8 50.3 42.5 52.0 33.3	\$ 395,000 \$ 140,000 \$ 160,000	0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM	RW CN CN PE PE RW CN PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 200,0000 \$ 200,00000 \$ 200,00000 \$ 200,000000 \$ 200,00000 \$ 20	EBWARM EFNA BSWARM BBWARM BBWARM BBWARM RET FOAD FUNDS BBWARM BBWARM BBWARM	RW CN CN PE PE CN	\$ \$80.000 \$ 200.000	BBWARM REET	CN CN CN PF PF RW CN CN CN CN CN CN CN CN CN CN CN CN CN	5 450.000	BBWARM	RW CN CN PE PE RW CN PE RW CN CN CN PE RW CN CN PE RW CN CN PE RW CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN			IN I			RW CN PE PE RW CN PE RW CN PE RW CN PE RW CN PE PE RW CN PE RW CN CN PE RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,336,000 \$ 1,336,000 \$ 970,000				
10	SWP #SW8823-05 Normar Place Stormwater in provements (IP-3): Poste pipes, Projace Cale and Install energy dissipater at pipe outfail or normar Place SWP #SW8823-05 Normar Place Stormwater Install Type 2 CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert under Birch Bay Dr SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert Under Store SWP #SW8823-05 Normar Place Stormwater install Type 2, CB and Cubert Under Store SWP #SW8823-05 Normar Place Store	20-011 18-009 18-010 18-008 19-004 21-001	29.8 50.3 42.5 52.0 33.3	\$ 395,000 \$ 140,000 \$ 160,000	BEWARM	RW CN CN PE PE RW CN PE RW CN CN CN PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 50,000 \$ 935,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000	BEWARM ERMA BEWARM BEWARM BEWARM REET ROAD FUNDS BEWARM BEWARM BEWARM BEWARM	RW CN CN PF PF CN	\$ \$80,000 \$ 200,000	BBWARM	CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	\$ 450,000 \$ 200,000	BBWARM	RW CN CN PE PE RW CN PE RW CN CN CN PE RW CN CN PE RW CN CN PE RW CN CN			IN I			RW CN PE RW CN PE RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000				
10 11 12 13 14	SWP 55W822-06 Semiahmoo Drive South & Outfall Improvements (BP-2, BP-3): Upsite culverts and re-establish roadside disch on east side of Semiahmoo Drive. SWP 55W822-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tode gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr. SWP 55W822-05 Normar Pisce Stormwater Improvements (BP-3): Upsice CB and install energy dissipater at pipe outfall on Normar Pisce SWP 55W822-05 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W822-05 Normar Pisce Stormwater & Outfall Improvements (BP-3): SWP 55W822-05 Normar Pisce Stormwater & Outfall Improvements (BP-3): SWP 55W822-05 Normar Pisce Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3): SWP 55W823-07 Birch Point Road Stormwater & Out	20-011 18-009 18-010 18-008 19-004 21-001	29.8 50.3 42.5 52.0 33.3	\$ 395,000 \$ 140,000 \$ 160,000	2 BBWARM	RW CN CN PE PE RW CN PE RW CN PE RW CN CN PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 50,000 \$ 700,000 \$ 700,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000	BBWARM FRMA BBWARM BBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE CN	\$ 580.000 \$ 200.000 \$ 660.000	BBWARM BBWARM REET BBWARM	CN CN CN PE PE CN CN CN CN CN CN CN CN CN CN CN CN CN	5 450.000 5 200.000	BBWARM REET	RW CN PE PE RW CN PE RW CN PE RW CN CN PE RW CN PE PE RW CN PE RW CN PE CN PE CN	\$ 140,000	BSWARM	IN I			RW CN CR PE PE RW CN PE RW CN CN CN PE RW CN CN PE RW CN CN PE PE RW CN CN CN PE CN CN CN CN CN PE CN CN CN PE CN CN CN PE CN CN CN PE CN			\$ 1,380,000 \$ 1,710,006 \$ 1,736,000 \$ 1,336,000 \$ 970,000				
10	Submitted (222) SWP SWB22-05 Semiahmoo Drive South & Outfall Improvements (8P-2, 9P-5): Upsite Culverts and re-stablish roadside ditch on east side of Semiahmoo Drive. SWP SWB22-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Anglace lide gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP SWB22-05 Normar Place Stormwater Improvements (8P-3): Upsite culverts and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP SWB22-05 Normar Place Stormwater Improvements (8P-3): Upsite pipes, replace CBs and install energy dissipater at pipe outfall on Normar Place SWP SWB23-07 Birch Point Road Stormwater & Outfall Improvements (8P-3, 8P-6); Upsite culverts and replace outfall to the brach to reduce bluff ension SWP PSWB23-07 Birch Point Road Stormwater & Outfall Improvements (8P-3, 8P-6); Upsite culverts and replace outfall to the brach to reduce bluff ension SWP PSWB23-07 Birch Point Road Stormwater (0, 10, 2); Address	20-011 18-009 18-010 18-008 19-004 21-001 21-001	23.8 50.3 42.5 52.0 33.3	\$ 395,000 \$ 140,000 \$ 160,000	BEWARM BEWARM BEWARM BEWARM BEWARM	RW CN CN PE PE RW CN CN PE CN CN CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 35,000 \$ 200,000 \$ 57000 \$ 200,000 \$ 570000 \$ 200,000 \$ 3,00000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,000000 \$ 3,0000000 \$ 3,000000 \$ 3,000000 \$ 3,000000000000000000000000000000000000	BEWARM ERMA BEWARM BEWARM BEWARM RET RAD FUNDS BEWARM BEWARM BEWARM BEWARM	RW CN PE PE CN PE CN	5 580.000 5 200.000 5 660.000 5 40.000	GSWARM REET BSWARM BBWARM	CN CN CN PE PE CN CN CN CN CN CN CN CN CN CN CN CN CN	\$ 450,000 \$ 200,000	BEWARM REET	RW CN CN PE PE RW CN PE RW CN CN CN CN PE RW CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN PE RW CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN	\$ 140,000	BEWARM	IN IN IN IN IN PE RW GN GN PE RW GN			RW CN PE PF RW CN PE RW CN PE RW CN PE RW CN CN CN PE RW CN CN PE RW CN CN PE RW CN CN CN PE RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000				
10 11 12 13 14 15	SWP #SWB23-06 Semiahmoo Drive South & Outfall Improvements (BP-3, BP-3) Upsite culverts and re-establish roadside disch on east side of Semiahmoo Drive. SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert SWP #SWB23-06 Lora Lane Drainage & Tide Gate Improvements (BP-3); Br Gate Gate Gate Gate Gate Gate Gate Gate	20-011 18-009 18-010 18-008 19-004 21-001 22-010	29.8 50.3 42.5 52.0 33.3 42.5	\$ 395,000 \$ 140,000 \$ 160,000	0 BBWARM	RW CN CN PE PE RW CN RW CN	\$ 10,000 \$ 400,000 \$ 535,000 \$ 20,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 300,000 \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000\$ \$ 300,000	BEWARM FEMA BEWARM BEWARM BEWARM BEWARM REET ROAD FUNDS BEWARM BEWARM BEWARM	RW CN CN PE PE CN	\$ 680.000 \$ 200.000 \$ 540.000 \$ 40.000	BBWARM REET	CN CN CN PE PE CN CN CN	\$ 450,000 \$ 200,000	B6WARM REET	RW PE CN PE PE RW CN PE RW CN CN PE RW CN CN PE RW CN CN CN CN PE RW CN CN CN PE RW CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN	5 140.000 5 1560.000	BSWASM	IN IN IN IN PE RW IN PE RW IN IN PE RW IN PE RW IN PE RW IN IN PE RW IN IN PE RW IN			RW CN PE PE RW CN CN PE RW CN CN PE RW CN CN PE RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000				
10 11 12 13 14 15	SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3, BP-3) SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3, BP-3) SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3). Upsice Upsice College and Collect Index Stormwater Structure and repairs and the Stormwater Storm St	20-011 18-009 18-010 18-008 19-004 21-001 22-010	29.8 50.3 42.5 52.0 33.3 42.5	\$ 395,000 \$ 140,000 \$ 160,000	BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE CN CN CN	\$ 10,000 \$ 400,000 \$ 500,000 \$ 735,000 \$ 700,000 \$ 570,000 \$ 570,000 \$ 570,000 \$ 570,000 \$ 570,000 \$ 570,000 \$ 570,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0	BBWARM FENA BBWARM BBWARM BBWARM BBWARM BBWARM REAT FCAT FCAT BBWARM BBWARM BBWARM BBWARM	RW CN PE PE CN	5 \$80.000 5 200.000 5 \$52.000 5 \$650.000	BBWARM REE BBWARM REE BBWARM	CN CN CN CN PE RW CN PE RW CN CN CN PE RW CN CN CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN	5 450,000 5 200,000	BEWARM REET	RW CN PE PE RW CN	\$ 140,000 5 1560,000 5 100,000	BWASM BBWASM BBWASM	N N IN IN IN PE PE IN IN IN IN <td< td=""><td></td><td></td><td>RW CN PE PFE RW CN PE RW CN PF RW CN PE RW CN PE RW CN PE RW CN CN</td><td></td><td></td><td>\$ 1,380,000 \$ 1,710,600 \$ 1,336,000 \$ 970,000 \$ 2,600,000</td></td<>			RW CN PE PFE RW CN PE RW CN PF RW CN PE RW CN PE RW CN PE RW CN			\$ 1,380,000 \$ 1,710,600 \$ 1,336,000 \$ 970,000 \$ 2,600,000				
10 11 12 13 14 15	SWP 55W823-05 Semiahmao Drive South & Outfall Improvements (BP-3, BP-3) SWP 55W823-06 Semiahmao Drive South & Outfall Improvements (BP-3, BP-3) Upsize culverts and re-establish roadside ditch on east side of Semiahmao Drive. SWP 55W823-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP 55W823-05 Normar Place Stormwater Improvements (BP-3): Upsize culvers and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP 55W823-05 Normar Place Stormwater Improvements (BP-3): Distribution of the stormwater improvements (BP-3): SWP 55W823-05 Normar Place Stormwater	20-011 18-009 18-010 18-008 19-004 21-001 22-010	29.8 50.3 42.5 52.0 33.3 42.5	\$ 195,000 \$ 146,000 \$ 160,000	BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE RW CN	5 10,000 5 400,000 5 935,000 5 935,000 5 720,000 5 720,000 5 200,000 5 200,000 5 200,000 5 200,000 5 200,000 5 200,000 5 200,000 5 300,000 5 300,0000 5 300,0000 5 300,0000 5 300,0000 5 300,0000 5 300,0	BEWARM FEMA BEWARM BEWA	RW CN PE PE CN CR CN CR CN CR RW CN	5 680.000 5 200.000 5 50.000 5 40.000	GSWARM REET GSWARM GSWARM	CN CN CN PE PE RW CON	5 450,000 5 200,000 5 750,000	BEWARM REET	RW CN CN PE PE RW CN PE RW CN	5 150.000 5 1560.000 5 200.000	BBWASM BBWASM BBWASM	NO N N PE SE RW N SE RW SE RW SE RW SE SE RW SE	\$ 150,050	BSWARM	RW CN PE PE RW CON CN CON			\$ 1,380,000 \$ 1,710,000 \$ 1,736,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000				
10	Supersonal status of the second space setting setting setting and setting and setting	20-011 18-009 18-010 18-008 19-004 21-001 22-010 23-002	29.8 50.3 42.5 52.0 33.3 42.5 70.2	\$ 395,000 \$ 140,000 \$ 160,000 	0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM	RW CN CN PE PE RW RW CN PE RW CN CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 235,000 \$ 700,000 \$ 500,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 236,000 \$ 200,000	BBWARM FRMA BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE GN PF RW CN PE CN PE CN CN	\$ 660,000 \$ 200,000 \$ 660,000 \$ 40,000	BBWARM REET	CN CN CN CN PE PE RW CN CN <	\$ 450.000 \$ 200.000 \$ 750.000	BEWARM BEET BEWARM	RW CN PE PE RW CON CN CN	\$ 1560,000 \$ 1560,000 \$ 200,000	BBWARM BBWARM BBWARM REET	N N N N N N PE N PE N PE N PE N N N <td>\$ 150.000</td> <td>BSWARM</td> <td>RW CN PE PE RW CN PE RW CN CN CN PE RW CN PE RW CN CN</td> <td></td> <td></td> <td>\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,650,000 \$ 2,650,000</td>	\$ 150.000	BSWARM	RW CN PE PE RW CN PE RW CN CN CN PE RW CN PE RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,650,000 \$ 2,650,000				
10 11 12 13 14 15 16	SWP SWB23-06 Semiahmao Drive South & Outfall Improvements (BP-2, BP-5): Upsize culvents and re-establish roadside ditch on east side of Semiahmao Drive SWP SWB23-06 Semiahmao Drive South & Outfall Improvements (BP-2, BP-5): Upsize culvents and re-establish roadside ditch on east side of Semiahmao Drive. SWP SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gaze structure and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP SWB23-05 Normar Place Stormwater Improvements (BP-3): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP SSWB23-07 Birch Point Road Stormwater & Outfall Improvements (BP-3, BP-6): Upsize culverts and replace outfall to the brach to reduce bluff leosion SWP SSWB23-07 Birch Point Road Stormwater Improvements (BP-3, BP-6): Upsize culverts and replace outfall to the brach to reduce bluff leosion SWP SSWB23-08 Richmond Park by re-routing stormwater down Shintaffer Road to a Birch Bay outfall Roger's Slough Drainage Improvements: Re-grade ditches, Install new culvers, and replace existing pipe with concrete box culvert under Birch Point Road into Roger's Slouph	20-011 18-009 18-010 18-008 19-004 21-001 22-010 23-002	29.8 50.3 42.5 52.0 33.3 42.5 70.2	\$ 140,000	BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE RW CN PE RW CN CN PE RW CN CN	\$ 10,000 \$ 400,000 \$ 935,000 \$ 200,000 \$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200	BBWARM FEMA DBWARM BBWARM BBWA	RW CN CN PE CO CN PE CN PE CN PE CN PE CN	5 580.000 5 200.000 5 660.000 5 660.000	BBWARM RET BSWARM BSWARM	RW CN CN PE RW RW CN PE RW CN CN PE RW CN	5 450,000 5 200,000 5 750,000	BSWARM BEET BSWARM	RW CN CN PE PE RW CN CN	\$ 140,000 \$ 1560,000 \$ 200,000	BSWARM BSWARM REET	N N N N N N PE PE PE RW N <td>\$ 150.000 \$ 150.000 \$ 200.000</td> <td>BSWARM BSWARM</td> <td>RW CN CN PE PE RW CN RW CN CN</td> <td></td> <td></td> <td>\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,600,000 \$ 2,850,000</td>	\$ 150.000 \$ 150.000 \$ 200.000	BSWARM BSWARM	RW CN CN PE PE RW CN RW CN			\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,600,000 \$ 2,850,000				
10 11 12 13 14 15 16	SWP SWB23-06 Semiahmoo Drive South & Outfall Improvements (BP-2, BP-3): Upsite culverts and re-establish roadside disch on east side of Semiahmoo Drive. SWP SWB23-06 Semiahmoo Drive South & Outfall Improvements (BP-2, BP-3): Upsite culverts and re-establish roadside disch on east side of Semiahmoo Drive. SWP SWB23-06 Sona Lane Drainage & Tide Gate Modifications (TCL-2): Replace tode gate structure and repair embankment; Install Type 2 CB and culvert under Birch Bary Dr. SWP SWB23-05 Normar Place Stormwater Improvements (BP-3): Upsite culverts and replace Outfall to the brach to reduce bluff ension SWP SWB23-07 Birch Point Road Stormwater A Outfall Improvements (BP-3, BP-6): Upsite culverts and replace outfall to the brach to reduce bluff ension SWP SWB23-08 Richmond Park Stormwater Improvements (SH-2): Address dianage constrors in Richmond Park by re-routing stormwater Gewn Shintaffer Road to a Birch Bay outfall Roger's Slough Drainage Improvements: Re-grade disches, Install new culverts, and replace culters pipe with concrete birs culvert under Birch Point Road into Roger's Slough	20-011 18-009 18-010 18-008 19-004 21-001 22-010 23-002	29.8 50.3 42.5 52.0 33.3 42.5 70.2 70.2	\$ 395,000 \$ 140,000 \$ 160,000 	0 BBWARM	RW CN CN PE PE RW CN CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 235,000 \$ 200,000 \$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 200,000\$ 2	BEWARM FCMA BEWARM BEWARM BEWARM BEWARM BEWARM BEWARM BESWARM BESWARM BEWARM BE	RW CN CN CN PE CN CN	\$ 660,000 \$ 200,000 \$ 40,000	BSWARM REET	RW CN CN PE PE RW CN PE RW CN CN PE RW CN CN PE RW CN	\$ 450,000 \$ 200,060	BEWARM REET BEWARM	RW CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	\$ 140.000 \$ 1560.000 \$ 200.000 \$ 330.000	BBWARM BBWARM RET BBWARM	NN N N PE PE PE N N N N N N N N N N N N	\$ 150.000 \$ 1.750.000 \$ 200.000	BSWARM BSWARM	RW CN PE PE RW CN PE RW CN PE RW CN PE RW CN PE PE RW CN PE RW CN PE RW CN CN PE RW CN CN PE RW CN CN PE RW CN	5 \$9000		\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,600,000 \$ 2,600,000				
13	SWP 55W823-05 Semiahmao Drive South & Outfall Improvements (BP-2, BP-5): Upsize culvents and re-establish roadside ditch on east side of Semiahmao Drive. SWP 55W823-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate sturcture and repair embankment; Install Type 2 CB and culvert under Birch Bay Dr SWP 55W823-05 Normar Place Stormwater Improvements (BP-3): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP 55W823-07 Birch Point Road Stormwater & Outfall Improvements (BP-3), BP- 6): Upsize culverts and replace outfall to the beach to reduce bluff erosion SWP 55W823-08 Richmond Park by re-routing stormwater down Shintaffer Road to a Birch Bay outfall Roger's Slough Drainage Improvements: Re-grade ditches, install new outvers, and replace existing pipe with concrete box culvert under Birch Road into Roger's Slough Bitch Bay Village Drainage Improvements: Upsize ditches, install new outvers, and replace base pipe with concrete box culvert under Birch Road into Roger's Slough Bitch Bay Village Drainage Improvements: Upsize disches into Roger's Biologh Bitch Bay Village Drainage Improvements: Upsize cultures and install new	20-011 18-009 18-010 18-008 19-004 21-001 22-010 23-002	298 503 425 520 333 425 702	\$ 395,000	BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN CN PE PE RW CN CN PE RW CN CN PE RW CN CN	\$ 10,000 \$ 400,000 \$ 500,000 \$ 235,000 \$ 700,000 \$ 270,000 \$ 270,000 \$ 270,000 \$ 270,000 \$ 280,000 \$ 280,000 \$ 280,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0	BEWARM FEMA DBWARM BWARM BWARM BWARM BWARM RET ROAD FUNDS BWARM BBWARM BBWARM BBWARM BWARM BWARM BBWARM BBWARM BBWARM BBWARM BBWARM	RW CN CN PE PE CN CN	5 580.000 5 200.000 5 660.000 5 40.000	BBWARM RET BSWARM SBWARM	RW CN CN PE RW CN PE RW CN CN PE RW CN CN PE RW CN	5 450,000 5 200,000	B&WABM B&ET B&WABM	RW CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	3 140,000 3 1560,000 3 1580,000 3 350,000	BSWARM BBWARM REET BBWARM	NN NN NN PE PE NN PE NN NN PE NN PE NN NN PE NN NN NN NN NN NN NN NN NN NN NN NN NN	\$ 150.000 \$ 1.750.000 \$ 200.000	BSWARM BSWARM BET	NW CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	\$\$5,000	BBWARM.	\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 970,000 \$ 2,600,000 \$ 2,850,000				
10 11 12 13 14 15 16 17	SWP #SWB23-06 Semiahmao Drive South & Outfall Improvements (BP-2, BP-3) Upsite culverts and re-establish roadside dich on east side of Semiahmao Drive. SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repair embankment; install Type 2 CB and culvert under Birch Bay Dr SWP #SWB23-06 Lora Lane Drainage for provements (IBP-3): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP #SWB23-07 Birch Point Road Stormwater Improvements (IBP-3): BP-6 ; Upsize culverts and replace outfall to the beach to reduce bluff erosion SWP #SWB23-018 Richmond Park by re-routing stormwater Som Shita1ffer Road to a Birch Bay outfall Roger's Slough Drainage Improvements: Re-grade disches, Install new culverts, and replace existing powth concrete be culvert under Birch Point Road instal Roag'rs Slough Drainage Improvements: Upsize existing culvers and install new pipe and cash basins in Birch Bay tittings to reduce Routing such as a loss Birch Bay willings Drainage Improvements: Upsize existing culvers and install new pipe and cash basins in Birch Bay tage to reduce Routing for the start basins in Birch Bay tage to reduce Routing	20-011 18-009 18-010 18-008 19-004 21-001 22-010 23-002 23-002 23-003	29.8 50.3 42.5 52.0 33.3 42.5 70.2 70.2 52.9	\$ 395,000 \$ 340,000 \$ 160,000 	0 BBWARM 0 BBWARM <td>RW CN CN CN PE PE RW CN PF RW CN CN PE RW CN CN PE RW CN CN</td> <td>\$ 10,000 \$ 400,000 \$ 50,000 \$ 235,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 300,000 \$ 300,0000 \$ 300,0000 \$ 300,0000 \$ 300,00000 \$ 300,00000 \$ 300,00000 \$ 300,0000000000000000000000000000000</td> <td>BBWARM FCMA BBWARM BBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWARM BB</td> <td>RW CN CN CN PE CN CN</td> <td>5 660,000 5 200,000 5 40,000</td> <td>BBWARM REET</td> <td>CN CN CN CN PE PE RW CN CN PE RW CN CN PE RW CN CN</td> <td>5 450.000 5 200.000 5 750.000</td> <td>BEWARM REET BEWARM</td> <td>RW CN CN CN CN CN CN CN CN CN CN CN CN CN</td> <td>5 140.000 5 1540.000 5 200.000 5 350.000</td> <td>DBWARM BBWARM REET BBWARM</td> <td>NM N N N PE PE PE PE PE PE PE N PE PE PE PE PE PE CN <td< td=""><td>\$ 150.000 \$ 1.750.000 \$ 200.000</td><td>DBWARM BBWARM REET</td><td>NW CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN</td><td>5 50.00 5 710.00</td><td></td><td>\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000 \$ 2,600,000 \$ 2,850,000 \$ 1,310,000</td></td<></td>	RW CN CN CN PE PE RW CN PF RW CN CN PE RW CN CN PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 235,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 200,000 \$ 300,000 \$ 300,0000 \$ 300,0000 \$ 300,0000 \$ 300,00000 \$ 300,00000 \$ 300,00000 \$ 300,0000000000000000000000000000000	BBWARM FCMA BBWARM BBWARM BBWARM BBWARM BBWARM REET ROAD FUNDS BBWARM BB	RW CN CN CN PE CN	5 660,000 5 200,000 5 40,000	BBWARM REET	CN CN CN CN PE PE RW CN CN PE RW CN CN PE RW CN	5 450.000 5 200.000 5 750.000	BEWARM REET BEWARM	RW CN CN CN CN CN CN CN CN CN CN CN CN CN	5 140.000 5 1540.000 5 200.000 5 350.000	DBWARM BBWARM REET BBWARM	NM N N N PE PE PE PE PE PE PE N PE PE PE PE PE PE CN CN <td< td=""><td>\$ 150.000 \$ 1.750.000 \$ 200.000</td><td>DBWARM BBWARM REET</td><td>NW CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN</td><td>5 50.00 5 710.00</td><td></td><td>\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000 \$ 2,600,000 \$ 2,850,000 \$ 1,310,000</td></td<>	\$ 150.000 \$ 1.750.000 \$ 200.000	DBWARM BBWARM REET	NW CN CN CN PE PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	5 50.00 5 710.00		\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000 \$ 2,600,000 \$ 2,850,000 \$ 1,310,000				
10 11 12 13 14 15 16 17	SWP 55WB23-06 Semiahmoo Drive South & Outfall Improvements (BP-2, BP-5): Upsize culverts and re-establish roadside ditch on east side of Semiahmoo Drive. SWP 55WB23-06 Lora Lane Drainage & Tide Gate Modifications (TCL-2): Replace tide gate structure and repare ombankment; Install Type 2 CB and culvert under Birch Bay Dr SWP 55WB23-05 Normar Place Stormwater Improvements (BP-1): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP 55WB23-07 Normar Place Stormwater improvements (BP-1): Upsize pipes, replace CBs and install energy disspater at pipe outfall on Normar Place SWP 55WB23-07 Normar Place Stormwater & Outfall Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall to the back to reduce bluit ension SWP 55WB23-08 Richmond Park Stormwater Improvements (BP-3), BP- 6): Upsize culrents and replace outfall Roger's Slough Drainage Improvements: Re-grade ditches, install new culverts, and replace existing pipe with concrete box culvert under Birch Point Road into Roger's Slough Birch Bay Village Drainage Improvements: Upsize existing culverts and install new pipe and each basins in Birch Bay Village to reduce Roading	20-011 18-003 18-008 19-004 21-001 22-010 23-002 23-003	29.8 50.3 42.5 52.0 33.3 42.5 70.2 70.2 52.9	\$ 395,000	0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM 0 BBWARM	RW CN CN CN CN PE PE RW CN	\$ 10,000 \$ 400,000 \$ 50,000 \$ 235,000 \$ 200,000 \$ 200,0000 \$ 200,0000 \$ 200,0000 \$ 200,0000	BBWARM EKNA BBWARM	RW CN ON PE PE CN CN	\$ 580,000 \$ 700,000 \$ 500,000 \$ 40,000	BSWARM REET BSWARM BSWARM	CN CN CN CN PE PE RW CN	5 450,000 5 200,000 5 750,000	BSWARM REET BSWARM	RW CN CN CN CN CN PE RW CN CN CN CN CN CN CN CN CN CN CN CN CN	\$ 1560.000 \$ 1560.000 \$ 350.000	BBWARM BBWARM REET BBWARM	N.N. N.N. N.N. PE RW CN CN PE RW CN PE RW CN	\$ 150.060 \$ 1.750.060 \$ 200.660	BSWARM BSWARM RECT	NW N CN CN PE PE RW CN RW CN RW CN RW CN RW CN CN RW CN	\$ 50,000 \$ 710,001 \$ 700,001	BBWARM BBWARM	\$ 1,380,000 \$ 1,710,000 \$ 1,710,000 \$ 1,336,000 \$ 970,000 \$ 2,600,000 \$ 2,600,000 \$ 2,600,000 \$ 1,310,000				
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WHATCOM COUNTY FLOOD CONTROL ZONE DISTRICT

2025-2030 SIX-YEAR WATER RESOURCES IMPROVEMENT PROGRAM

EXHIBIT A

Item	Inclusion and and a second s	Database ID	are .	p	revious Expenditures	(odiakas)	2025			2026	197 <u>9</u> -1910-1910		2027		atana ang	2028	52556 (george/12	02220050	2029		2 <i>2014 2016</i> 20	2030	(Terrary and the second	Total			
No.	Project Description	No.	1	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	Phase	Amount	Source	L			
	RIVER & RCDD			LC 73.000	FC70	DC 1	1	5670	T.		1							Television of				1		Project Total:			
			1	\$ 72,000	FEMA	PE	\$.	FEMA/State	1									+			+			\$ 2.945.000			
	Truck Road Bank Stabilization (720008): Phase 1 emergency construction in 2022		1	\$ 144,000	State	PE	s -	Roads															11				
20	and Phase 2 road rehab and environmental mitigation in 2024. Final Planting 2025	20-003	59.4	\$ 72,000	Roads	CN	\$ 1,400	FCZD	1			1		1				1					[FCZD Total:			
						CN	\$ 54,600	FEMA/State																\$ 73,000			
L			ļ			CN	\$ 1,400	Roads						L				-			+		└─── ′	-			
	Devries Levee Improvements: Widen and establish full crest width and backslope	18 001	49.2			PE	\$ 10,000	FCZD	+			1									+		<u> </u>	Project Intal:			
1 21	levee (SWIF project). All staff time; Diking District to construct.	19-001	45.5			CN.			+	ł		+									+		·	i .			
		—————	1	\$ 165,000	EC7D	PF	\$ 30.000	FCZD	PF			+									1			Project Total:			
			1	\$ 117,000	NOAA grant				PE	1				1							1			\$ 2,711,000			
	Cougar Creek and Neevel Levee Improvement (720010): Stabilize oversteepened	16.002	50 4	\$ 100,000	FbD grant				RW																		
1 "	section of levee (SWIF project) with new flood gate and restoration (FLIP project)	10-000	33.4			CN	\$ 1,324,000	FbD grant	CN	\$ 50,000	FCZD												<u> </u>				
						CN	\$ 386,235	EQUIP	CN	\$											+		<u> </u>	FCZD Total:			
				C 70.070	F6144	CN	\$ \$37,359	FCZD	CN		CC70										+	l	<u> </u>	5 632,000			
	Arms Woody Revetment Renair (723008): FFMA funded renair to Arms Facily			5 3787	FEMA State	PE	\$ 23,250	FEMA/State	DF.	+	FL20							+			+		ł'	5 1 095 000			
23	Chinook Restoration Project	23-005	67.7	5 3 282	FCZD	CN	\$ 96,750	FC7D	TCN	\$ 20.000	FC7D								l					FCZD Total:			
						CN	\$ 888,250	FEMA/State	CN		FEMA/State				1									\$ 82,000			
				\$ 34,000	FCZD	PE	\$ 17,500	FCZD																Project Total:			
24	Bertrand Creek Levee Stabilization (721002): Restore right and left levee prisms and	16-005	54,4	\$ 9,000	DK4	PE	\$ 7,500	DK4		L														\$ 213,000			
	install bank protection (SWIF project)					CN	\$ 101,500	FC2D						· · · · · · · · · · · · · · · · · · ·				+			-		ļ'	FCZD Total:			
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25	two sites and seepage at retaining wall deficiencies (SWIF project)	16-006	70.4		under ernden project						FC7D/LE			h	1						+						
						CN		1	CN	\$ \$0,000	Subzone	CN			1								1				
	Abbett Louise Protection and Improvement (719018): laterin accrise protection			\$ 654,000	FCZD	PE	\$ 275,500	FCZD	PE	S 60,000	FCZD	PE			PE									Project Total:			
26	measures for levee & road (Pb. 1); Extend and realize upstream end of levee (Pb. 2).	15:007	15:007	15-007	15-007	70.4	\$ 445,000	Roads	PE	s -	Roads	PE	\$.	Roads	PE			PE									\$ 3,019,500
	SWIF project)		1.4			RW			RW	\$ 75,000	FCZD	CN	\$ 1,500,000	FCZD	CN	\$ 10,000	FCZD		1	1				FCZD Total:			
		·			5570	8W	0 107 000	F.C.70	RW	TBD	Roads	ICN INC	TBD	Roads	CN	TBD	Roads	· · · ·						S 2,850,000			
27	Dahlberg Wetland Mitigation Site (719006): Develop advanced mitigation site for	20.004	66.3	5 882,000	· .	PE	5 195,000	17020	ICN .	5 115,000	FLZD	PE	5 12,500	1020	÷			1					<u> </u>	C 2 854 500			
1 ~	future impacts from Flood and Road projects					CN			ICN .	· · ·	+	CN	\$ 1,650,000	FCZD	† ···								1	2,004,000			
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				\$ 2,500	FCZD	PE	\$ 8,500	FCZD	PE	\$ 12,500	FCZD	PE	\$ 2,500	FCZD	PE		FCZD							\$ 5,993,000			
28	Hudson Rd Bridge No. 132 Bridge Replacement (722006): Alternatives analysis for	22-001	64.5			PE	\$ 8,500	Roads	PE	\$ 12,500	Roads	PE	\$ 2,500	Roads	PE		Roads						L				
	bridge replacement as required by WDFW permit condition		04.5								L				CN	\$ 4,750,000	FEMA/State							FCZD Total			
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H				\$ 438.000	ECZD	90	5 100.000	5070	PF	+	15C2D	PF	5 40.000	6070	PF	5 125,000	FC7D	PF									
				\$ 937,000	FbD grant	PE	\$ 400,000	FbD grant	PE		FbD grant	PE	\$ 150,000	FbD grant	PE		FbD grant	PE	1	1	+	1	1	Construction			
1	Glacier-Gallup Alluvial Fan Restoration (718007): Remove all or part of Glacier Creek	10.000				RW	\$ 120,000	FCZD	8W	\$ 400,000	FCZD	RW	1	FCZD	RW	\$ 100,000	FCZD	RW	1	1		1		expected in			
1 "	levee and construct setback levee along Gallup Creek. Interim revetment fix in 2023	18-000	44.5			RW	\$ 480,000	FbD grant	RW	\$ 1,600,000	FbD grant	RW		FbD grant	BW	\$ 400,000	FbD grant	RW		1				2029-2030			
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1						8W	\$ 25,000	FCZD	RW	\$ 25,000	FCZO	RW	1		8W	·····		RW	1 0,000		RW	1	1	\$ 2,256,500			
30	remoale seven improvement (719008): Reconstruct and realign Ferndale and	07-104	68.9	•		RW	\$ 200,000	FbD grant	RW	\$ 200,000	FbD grant	RW		1	8W			RW			RW			FbD Grant			
1	systement sources to improve rever or protection and adoress denciencies		1			8W	\$ 25,000	Ferndale iLA	RW	\$ 25,000	Ferndale ILA	RW			8W			R₩			RW		1	\$ 16,135,000			
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						PE	1	10.0	RW	1		RW	1	1	+	<u> </u>	t		1	1				\$ 3,341,000			
31	Fish Camp (723005): Design and log procurement in 2025, Phase 1 Construction in	24-001	71.9			RW			CN	\$ 15,000	FCZD	CN	\$ 15,000	FCZD	1		1				1		1	FCZD Total:			
1	2026, Phase 2 (incl defins) construction in 2027.						\$ 880.000							T			1							1			
L						CN	5 000,000	21/23 FbD grant	CN	\$ 800,000	23/25 FbD Gran	nt CN	\$ 1,600,000	25/27 FbD Grant	•		L							\$ 61,000			
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32	Floodplain Acquisition: Acquire key properties for future levee reconfiguration to	07-002	79.6			RW/CN	\$ 5,635,000	FbD grant	-						+		1	-		-			───	+			
	The same reaction of the second		1			BW/CN	\$ \$30,000	Commerce grant	RW	+	1	BW	1	1	+	t	1	+	+		+	+	+	+			
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	Marietta Acquisition: Acquire properties in repetitive flood loss area and remove	07.007	1 70 4			8W	\$ \$5,000	1	RW	\$ 100.000	1	RW	5 100.000	1	RW	\$ 100,000	İ	RW	\$ 100.000	1	RW	1	1	1			
33	structures	07-002	1 19.6			CN			CN	\$ 25,000		CN	\$ 25,000		CN	\$ 25,000		CN	\$ 25,000		CN						
		L				CN			CN			CN			CN			CN			CN						
34	High Creek Sediment Trap (72000S): Annual clean out of sediment traps	22-005	58.8	L		CN		l	CN			CN			CN		L	CN	-		CN		+				
<u> </u>		+		+		I CN	5 115,000	15070	ICN	\$ 120,000	IFCZD		5 125,000	FCZD	ICN	5 130,000	FCZD	ICN	5 135,000	FCZD	CN	\$ 140,000	IFCZD	4			
1	Emergency/New Projects: Typically repair projects that result from new damage as				· · · · · · · · · · · · · · · · · · ·	1 PE	25,000	1,40	PE DW	1.000	10	PE OW	1.3 25,000	11-20	PE .	15 25,000	1020	PE	3 25,000	1-20	PE -	13 25,000	Iruz	Tatal/ware			
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1						CN	\$ 350,000	FC2D	CN	\$ 350.000	FCZD	CN	\$ 350,000	FCZD	CN	\$ 350,000	FCZD	CN	\$ 350,000	FCZD	CN	\$ 350,000	FCZD	1.0,000			
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Numbers in italics are placeholders for projects still being concerved. Previos expenditures includes work contracted in 2024 that will contraully appropriate into 2025. Note L: Estimate of all project contralleder work come by U.S. Army Corps of Engineers (USACE) and Lunded directly by USACE.

Whatcom County Public Works – Stormwater Division Project Narrative

Eagleridge Stormwater Improvements Database ID No. 20-007

Construction Funding Year(s):

2025

Project Narrative:

This project includes the installation of a water quality treatment facility associated with the Eagleridge neighborhood in the Lake Whatcom watershed. The Eagleridge development is approximately 34 acres and runoff from this development will be routed through a water quality facility to help remove sediments and phosphorus before entering Lake Whatcom.

Project Status:

Design work has been initiated in 2024 and construction scheduled to take place in 2025.

Total Estimated Project Cost: \$825,000



Austin Court Stormwater Improvements Database ID No. 20-008

Construction Funding Year(s):

2026

Project Narrative:

This project includes the installation of a large filter vault to improve water quality in the existing Austin Court stormwater system. The tributary area is approximately three acres and the water quality system will remove sediments and phosphorus prior to entering Lake Whatcom.

Project Status:

Design contract is anticipated to be executed Summer 2024 and construction scheduled to take place in 2026.

Total Estimated Project Cost: \$737,375



Cedar Hills Culvert Replacement Database ID No. 23-001

Construction Funding Year(s): 2025

Project Narrative:

This project includes the replacement of a culvert that was damaged during the 2021 flooding event with a new upsized 100-linear feet long 36-inch diameter culvert. The work shall also include the modification of the culvert inlet to enhance erosion and sediment control, along with re-grading and armoring the downstream channel to provide improved conveyance capacity. This will be funded by FEMA, REET and the Lake Whatcom utility.

Project Status:

Design is anticipated in 2024-2025 and construction scheduled to take place in 2025.

Total Estimated Project Cost: \$380,000



Strawberry Point/ Lake Whatcom Blvd Stormwater Improvements Database ID No. 17-001

Construction Funding Year(s):

2027

Project Narrative:

This project will involve the installation of a water quality facility to treat approximately three acres of residential area. Project elements may include: bio-infiltration swales, filter vaults, media filter drains, and rain gardens in order to improve water quality.

Project Status:

Design is anticipated in 2025-2026 and construction scheduled to take place in 2027.

Total Estimated Project Cost: \$1,170,000



Geneva Street & Lake Louise Road Culvert Replacement Database ID No. 20-010

Construction Funding Year(s):

2028

Project Narrative:

Project will improve conveyance of roadside ditches and culverts along Geneva Street and Lake Louise Road. This will improve water quality. The project will replace approximately 200 linear feet of undersized or damaged culverts.

Project Status:

Design is anticipated in 2027 and construction scheduled to take place in 2028.

Total Estimated Project Cost: \$270,000



Lake Whatcom Boulevard Media Filter Drain (EG-1) Database ID No. 22-006

Construction Funding Year(s):

2029

Project Narrative:

The project would install Media Filter Drain (MFD), or other appropriate water quality system, along approximately 300 linear feet of roadway on the west side of Lake Whatcom Blvd. Stormwater runoff from approximately 8.5 acres on the west side of Lake Whatcom Blvd. is collected in a shallow roadside ditch, this project would treat this water prior to discharging to Lake Whatcom.

Project Status:

Design is anticipated to begin in 2027 and construction scheduled to take place in 2029.

Total Estimated Project Cost: \$835,000



Sudden Valley Stormwater Improvements No. 2 Database ID No. 22-007

Construction Funding Year(s): 2030

Project Narrative:

A project, to be determined, will be constructed within the Sudden Valley area as the second water quality improvement project focused on removing sediment and treating phosphorus in a continued collaboration with the Sudden Valley community. The project will include drainage system upgrades and retrofits to the existing stormwater infrastructure. Details will be forthcoming as Whatcom County works with representatives of the Sudden Valley Community Association.

Project Status:

Design is anticipated in 2028-2029 and construction scheduled to take place in 2030.



Lake Whatcom Boulevard Water Quality Vault (EG-4) Database ID No. 22-008

Construction Funding Year(s): 2030

Project Narrative:

This project includes the installation of a filter vault to improve water quality in the existing Lake Whatcom Blvd stormwater system. The water quality system will remove sediments and phosphorus from approximately 3 acres of residential runoff prior to entering Lake Whatcom.

Project Status:

Total Estimated Project Cost:

Design is anticipated in 2028-2029 and construction scheduled to take place in 2030.

\$650,000

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Viewhaven Lane Water Quality & Conveyance Improvements Database ID No. 20-009

Construction Funding Year(s):

2031

Project Narrative:

This project will improve conveyance and water quality near Viewhaven Lane and Lake Whatcom Blvd intersection. Project will include approximately 100 linear feet of conveyance improvements by replacing two undersized culverts and regrading a ditch. The project will also install approximately 135 linear feet of water quality facility. Project elements may include: bioinfiltration swales, filter vaults, media filter drains, and rain gardens.

Project Status:

Design is anticipated in 2029-2030 and construction scheduled to take place in 2031.

Total Estimated Project Cost: \$475,000



Charel Terrace Stormwater Outfall Repair Database ID No. 20-011

Construction Funding Year(s):

2025

Project Narrative:

The December 20, 2018 "Solstice Eve" windstorm caused damage to the stormwater outfall on Birch Point installed as part of the Charel Terrace project in 2011. In March 2019 a "Major Disaster Declaration" that covered Whatcom County for the December storm was granted. In December 2019, the Consolidated Resource Center approved the Washington State Emergency Management Division's \$110,887 request for Architectural & Engineering Services to assess the site and develop conceptual design options. An RFP was advertised by Whatcom County in March 2020 and Herrera Environmental Consultants completed a preliminary study that assessed the outfall stabilization approaches to maintain a functional outfall. From this study, a temporary repair was constructed in fall 2022 to secure the catch basin to the bluff and reposition the outfall tee. The permanent repair will be constructed in the summer of 2025.

Project Status:

Design occurring in 2021-2024 and construction is scheduled to take place in 2025.

Total Estimated Project Cost: \$797,000



Semiahmoo Drive South & Outfall Improvements (BP-2, BP-5) Database ID No. 18-009 & 18-010

Construction Funding Year(s):

2025

Project Narrative:

This project will improve the stormwater conveyance system at the south end of Semiahmoo Drive by upsizing the cross culvert to reduce flooding and increase traffic safety, and reconstruct the outfall conveyance system to the Strait of Georgia damaged during the November 2021 extreme rainfall event.

Project Status:

Design and permitting was initiated in 2021 and will continue into 2025. Construction is scheduled for 2025.

Total Estimated Project Cost: \$1,380,000



Lora Lane Drainage & Tide Gate Modifications (TC1-2) Database ID No. 18-008

Construction Funding Year(s):

2025

Project Narrative:

The purpose of this project is to replace the existing 48" corrugated metal culvert under Birch Bay Drive with an 8-ft wide fish passable box culvert, replace the existing tide gate on the waterward side of Birch Bay Drive with a new side hinge tide gate, and install shoreline armoring at the outfall area. This project will be a collaboration with the Design and Construction Division of Whatcom County Public Works and the Leisure Park Community.

Project Status:

Preliminary engineering design occurred in 2021. Permanent repair design will begin 2024 and construction is anticipated for 2025.

Total Estimated Project Cost: \$1,710,000



Normar Place Stormwater Improvements (BP-1) Database ID No. 19-004

Construction Funding Year(s):

2026

Project Narrative:

This project involves upsizing pipes, replacing catch basins and installing an outfall pipe over the bluff with an energy dissipater at Normar Place to reduce roadway flooding, scour and sediment transport.

Project Status:

Design is anticipated in 2024-2025 and construction in 2026.

Total Estimated Project Cost: \$1,336,000



Birch Point Road Stormwater & Outfall Improvements (BP-3 & BP-6) Database ID No. 21-001

Construction Funding Year(s):

2027

Project Narrative:

A corrugated metal outfall pipe over a steep bluff on Birch Point collapsed due to erosional undermining. The driveway culverts, ditches and upstream storm drain system leading to the outfall are undersized and cause flooding and erosion during storm events. This project will involve upsizing culverts, reestablishing ditches and replacing and anchoring the outfall pipe and construction of pipe-end energy dissipater.

Project Status:

Design will be completed in 2025-26. Construction is scheduled to take place in 2027.

Total Estimated Project Cost: \$970,000



Richmond Park Stormwater Improvements (SH-2) Database ID No. 22-010

Construction Funding Year(s):

2028

Project Narrative:

This project will address drainage concerns in Richmond Park by re-routing the large volume of water that currently moves through the development down Shintaffer Road to an outfall in Birch Bay. It would involve replacing 1,640 feet of ditch/culvert on Shintaffer Road with 36" diameter HDPE pipe, installing 13 Type 2 catch basins and building a new outfall into Birch Bay.

Project Status:

Design will occur in 2026-2027 and construction is scheduled to take place in 2028.

Total Estimated Project Cost: \$2,600,000



Roger's Slough Drainage Improvements Database ID No. 23-002

Construction Funding Year(s): 2029

Project Narrative:

This project will address drainage and flooding issues in Birch Bay Village, Birch Bay Drive and Birch Point Loop Road. It will involve replacing twin 30" diameter culverts that direct water under Birch Bay Drive into Roger's Slough with a fish-passable concrete box culvert, installing 285 feet of pipe, regrading 500 feet of ditch, and installing a new Type 2 catch basin and overflow pipe near the mouth of Roger's Slough.

Project Status:

Design will occur in 2027-2028 and construction is scheduled to take place in 2029.

Total Estimated Project Cost: \$2,850,000



Birch Bay Village Drainage Improvements Database ID No. 23-003

Construction Funding Year(s):

2030

Project Narrative:

This project will address drainage and flooding issues in Birch Bay Village in the vicinity of Salish Road and Kwan Lake. It will involve installing or replacing 1,400 lineal feet of pipe, installing four new catch basins along Nootka Loop and Salish Road and installing a new 36" diameter flap gate near Nootka Loop to reduce tidal backwatering.

Project Status:

Design will occur in 2028-2029 and construction is scheduled to take place in 2030.

Total Estimated Project Cost: \$1,310,000



Bay Ridge Estates Drainage Improvements Database ID No. 23-004

Construction Funding Year(s):

2031

Project Narrative:

This project will address drainage and flooding issues in Bay Ridge Estates and along Selder Road. It will involve installing or replacing 500 lineal feet of pipe, regrading 1,000-feet of ditch, and installing two new catch basins on Selder Road and Birch Point Road.

Project Status:

Design will occur in 2029-2030 and construction is scheduled to take place in 2031.

Total Estimated Project Cost: \$770,000



Wooldridge Avenue & Sunset Drive Stormwater Improvements (TC-2) Database ID No. 13-007

Construction Funding Year(s):

2032

Project Narrative:

This project will improve the conveyance system along Wooldridge Avenue, Jackson Road and Sunset Drive by upsizing pipes, installing or replacing catch basins and culverts, reestablishing roadside ditches, and installing a water quality filter vault and treatment swale.

Project Status:

Design is anticipated in 2030-2031 and construction is scheduled to take place in 2032.

Total Estimated Project Cost: 1,220,000



Truck Road Bank Stabilization Database ID No. 20-003

Construction Funding Year(s):

2022 and 2024

Project Narrative:

The project is located along Truck Road about 0.3 miles easterly from Mt. Baker Highway (SR 542). During high-water events of the 2017/2018 winter, the North Fork Nooksack River eroded the unprotected bank of Truck Road to within 13 feet of the roadway surface. This prompted an emergency project to construct a passive riprap revetment underneath a section of the roadway to provide immediate protection. Flooding during 2020 eroded the remaining bank exposing the recently constructed riprap revetment and destabilizing a portion of the north bound lane. Jersey barriers were placed by county crews to block off this lane to traffic. Additional erosion sustained the November 2021 floods, threatened the road downstream of the previous damage area. The FCZD undertook an emergency project to address the immediate threat to truck road. In 2024, additional work provided environmental mitigation for that action and to repair and realign the damaged section of road.

Project Status:

The FCZD has completed the emergency repair and is currently designing and permitting the associated Phase 2 project that will provide environmental mitigation and road repair. Construction of the Phase 2 project is anticipated to occur in 2024, with planting and restoration scheduled for 2025. The FCZD anticipates that FEMA and the State will fund 95% of the project through the Public Disaster Assistance program

Total Estimated Cost:	\$2,945,000
Expenditures to Date:	\$2,888,000



Devries Levee Improvements Database ID No. 19-001

Construction Eurodian	Veer(e)	2025	
Construction Funding	redr(S).	2025	

Project Narrative:

This project involves widening the levee crest and backsloping the levee to meet the US Army Corps of Engineers's levee geometry standards for levees in the Public Law (PL) 84-99 Levee Rehabilitation Program (SWIF project).

Project Status:

The Diking District is proposing to utilize the excess fill generated from the Cougar Creek project to complete the backsloping work.

Total Estimated Cost:	\$10,000
Expenditures to Date:	\$0



Cougar Creek Early Action / Neevel Levee Bank Stabilization Database ID No. 16-008

Construction Funding Year(s):

2025

Project Narrative:

The Neevel Levee provides varying levels of protection to a significant amount of agricultural land. Approximately 250 feet of the levee running along Cougar Creek is over-steepened and experiencing sloughing of the riverward face. A stabilization project incorporating large woody debris at the toe and reducing the slope of the riverward face is proposed in the System-wide Improvement Framework (SWIF) to resolve the deficiency identified by the US Army Corps of Engineers and keep the levee eligible for repair under the Public Law (PL) 84-99 Program. An early action project developed through the Floodplain Integrated Planning (FLIP) process includes replacement of the Cougar Creek flood gate and installation of large woody debris in the channel downstream.

Project Status:

Design of the project has been finalized. Construction is anticipated for 2025 with funding through NRCS's EQIP program, and Floodplains by Design (FbD).

Total Estimated Cost:	\$2,711,000
Expenditures to Date:	\$383,000



Acme Woody Revetment Repair Database ID No. 23-005

Construction Funding Year(s): 2025

Project Narrative:

The project site is an approximately 1/4-mile long section of eroding bank located along the left bank of the South Fork Nooksack River in the unincorporated community of Acme in Whatcom County. In 2009 and 2010 the Flood Control Zone District constructed multiple log jams and woody revetments to discourage lateral erosion and stabilize the lower reach of Landingstrip Creek for the purpose of enhancing critical habitat for ESA listed species and providing flood protection to the Acme community and the SR 9 bridge. Flooding in November 2021 damaged the lower portion of the project, destabilized the wood structures, and eroded the streambank. The proposed project will repair the woody revetment along the new stream alignment.

Project Status:

Design is anticipated to start in 2024 and construction is anticipated in the Summer of 2025 with funding through FEMA and FCZD.

Total Estimated Cost:	\$1,146,000
Expenditures to Date:	\$65,650



Bertrand Creek Levee Stabilization Database ID No. 16-005

Construction Funding Year(s): 2025

Project Narrative:

The Bertrand Creek right and left bank Levees are designed to overtop during larger floods, but provide protection to agricultural land during the growing season. The left bank levee has a 250 foot long section where erosion is threatening the levee prism. The levee will have to be repaired to remain eligible for rehabilitation through the US Army Corps of Engineers Public Law (PL) 84-99 Levee Rehabilitation Program.

Project Status:

The project has been designed by the FCZD. Construction is anticipated in the Summer of 2025.

Total Estimated Cost:	\$213,000
Expenditures to Date:	\$21,500



Upper Hampton Levee Improvements Database ID No. 16-006

Construction Funding Year(s): 2026

Project Narrative:

Several deficiencies were identified by the US Army Corps of Engineers on the Upper Hampton Levee. Improvements to the levee geometry are proposed in two locations and improvement to address seepage is proposed at a third location.

Project Status:

A conceptual design has been developed as part of the System-wide Improvement Framework (SWIF) planning process. Detailed design has not been initiated yet. However, we were able to complete a portion of the levee backsloping work at one site using excess material generated at the 2021 Abbott and Lynden Levee Improvement projects.

Total Estimated Cost:	\$61,000
Expenditures to Date:	\$6,000



Abbott Levee Protection and Improvement Project Database ID No. 16-007

Construction Funding Years:

2021 and 2028

Project Narrative:

The project is located along Abbott Road about 1.7 miles east of Hannegan Road. Erosion along the Nooksack River removed a section of riprap that previously protected the land adjacent to the Abbott Levee and Abbott Road. Phase 1 of this project addressed the ongoing erosion in this location. The FCZD is also investigating possible road and levee setback options to improve the upstream tie-in of the levee and address a deficiency identified by the US Army Corps of Engineers to maintain the levee's eligibility in the PL 84-99 Levee Rehabilitation Program. This work will be implemented as a second phase of the project.

Project Status:

Construction of Phase 1 was completed during Summer or 2021. The FZCD is working with the project consultant on Phase 2. Phase 2 will include a reach assessment to provide the technical basis for developing alternatives for upstream improvements. The FZCD will utilize this reach scale analysis to develop a capital project for Phase 2. Phase 2 construction is anticipated in 2027.

Total Estimated Cost:	\$3,020,000
Expenditures to Date:	\$1,099,000



Dahlberg Wetland Mitigation Site Database ID No. 20-004

Construction Funding Year(s):

2027 - 2028

Project Narrative:

The FCZD purchased a property northeast of Ferndale as a mitigation site for future projects having wetland or riparian impacts. The property contained a dilapidated farm house.

Project Status:

FCZD purchased the subject property and demolished the farm house in Fall of 2020. The FCZD has installed a groundwater monitoring network on the site to support developing a long-term restoration plan for the site.

Total Estimated Cost:	\$2,800,000
Expenditures to Date:	\$882,000



Hudson Road Bridge No. 132 Repair Database ID No. 22-001

Construction Funding Year(s): 2024 and 2028

Project Narrative:

The project is located near the dead end of Hudson Rd in Acme, WA. The FCZD purchased the property at the end of this road as a part of the Jones Creek Debris Flow Risk Reduction Project. The approaches to the bridge that serves the property were damaged during the November 2021 flood events. The flood damaged was repaired in 2024 to restore access. However, as a part of the Hydraulic Project Approval permit, the Department of Fish and Wildlife has required that the crossing be replaced with a new bridge that is consistent with WDFW Water Crossing Design Guidelines within five years. In 2025 the FCZD will commence an bridge replacement alternatives analysis that will evaluate the challenges associated with Jones Creek debris flow hazards and neighboring habitat restoration efforts.

Project Status:

FCZD completed the design, permitting, and construction of the temporary repair in 2024. The FCZD has provided FEMA with the damages and cost estimate to perform the temporary repair, and will continue to coordinate the full bridge replacement. An alternatives analysis for the bridge replacement and fish-passage study will start in 2025. The construction for the bridge replacement is expected in 2028. The FCZD anticipates that FEMA and the State will fund 95% of the project through the Public Disaster Assistance program.

Total Estimated Cost:	\$5,993,000
Expenditures to Date:	\$52,500



Glacier-Gallup Creeks Alluvial Fan Restoration Database ID No. 18-006

Construction Funding Year(s):

2023, 2029 and 2030

Project Narrative:

The Glacier Creek Levee on the left (west) bank of the creek was constructed in the 1960s to prevent overflows into Gallup Creek and damage to State Route (SR) 542. Since construction, the levee has been subject to ongoing damage. Constriction of the Glacier-Gallup channel migration zone (CMZ) has exacerbated aggradation upstream of SR 542 and severely degraded fish habitat. WSDOT replaced the Gallup Creek bridge in 2010 and is working to construct a new bridge over Glacier Creek and the alluvial fan between the two creeks. The FCZD is developing a project in coordination with WSDOT and is evaluating the feasibility of full or partial removal of levees blocking natural channel migration on the Glacier and Gallup Creeks alluvial fan and construction of a setback levee on Gallup Creek to protect the Community of Glacier.

Project Status:

A feasibility study and alternatives analysis for evaluating levee removal and setback alternatives was initiated in late 2018. Preliminary design of the preferred alternative will be initiated once the preferred alternative is selected. Construction of an interim project to address levee damage was completed in 2023. Construction of the levee removal and setback is anticipated will be coordinated with Glacier Creek bridge replacement. Construction is anticipated in 2029 and 2030.

Total Estimated Project Cost:	\$15,000,000
Expenditures to Date:	\$1,375,000



Ferndale Levee Improvement Project Database ID No. 07-104

Construction Funding Year(s):

2027 - 2030

Project Narrative:

Two levee segments, one sponsored by the City of Ferndale and one by the FCZD and Diking District #1 in the US Army Corps of Engineer's Public Law (PL) 84-99 Levee Rehabilitation Program, provide protection to the three treatment facilities along Ferndale Road. The US Army Corps of Engineers has identified several deficiencies along these two levee segments, including a gap in which super sacks filled with sand have been placed. The 1999 Comprehensive Flood Hazard Management Plan recommended improving these levees to provide 100-year protection to the City and the treatment facilities. The System-wide Improvement Framework (SWIF) also includes this project to address the identified levee deficiencies.

Project Status:

This project is currently in the design phase. A preferred alternative for the levee and road alignment has been selected. A 60 percent design level plan of the proposed levee configuration is anticipated at the end of 2024, a 90 percent design level plan is anticipated in 2025, and final design for each phase will be in 2026 and 2027. Grant funding through the State's Floodplain's by Design program has been secured to complete the design. Construction is anticipated to be phased with construction beginning in 2027 and lasting through 2030.

Total Estimated Construction Cost:	\$20,203,000
Expenditures to Date:	\$1,008,000



South Fork Nooksack Fish Camp (Ts'eq) Integrated Project Database ID No. 24-001

Construction Funding Year(s): 2025 - 2027

Project Narrative:

The South Fork Nooksack River Fish Camp (Ts'éq) Integrated Flood and Fish Project (Fish Camp Project) is a collaboration of the Nooksack Indian Tribe Natural Resources Department (Tribe) and the FCZD to develop broadlysupported, multi-beneficial solutions to reduce flood risk to the Acme community and restore habitat for ESA-listed earlytimed Chinook salmon and other salmonid species. The Fish Camp Project Area is located in the lower South Fork Nooksack River valley downstream and upstream of the town of Acme between river mile (RM) 7.3 and RM 9.7, respectively. The Project Area includes the SFNR mainstem channel and floodplain habitats and extends from the end of Rothenbuhler Rd. in the south to just downstream of the BNSF railway bridge in the north. The State Route (SR) 9 bridge crosses over the SFNR near RM 8.6 and conveniently separates the project area into upstream (Phase 2) and downstream (Phase 1) sections.

Project Status:

Design and log Procurement in 2025, Phase 1 Construction in 2026, Phase 2 Construction (incl Berms) in 2027

Total Estimated Cost: \$3,340,000

Expenditures to Date: \$11,000



Floodplain Acquisition Database ID No. 07-002

Acquisition Funding Year(s): 2017- TBD

Project Narrative:

Reach-scale projects to reconfigure flood infrastructure are being evaluated through the integrated planning processes that started with the System-wide Improvement Framework (SWIF) and has transitioned into the Floodplain Integrated Planning (FLIP) process. The goal of this work is to reduce flood risk and expenditures and restore habitat and the processes that form it.

Voluntary acquisition of lands is proposed to enable future levee reconfigurations to reduce flood risk and future levee repairs, while improving habitat.

Project Status:

Acquisition of 12 properties and demolition of associated structures occurred in 2024 and additional acquisitions and demolitions are anticipated in 2025. Acquisitions are targeted in areas that sustained significant damage in 2021, in areas mapped as FEMA floodways and areas that will enable future flood hazard reduction projects

Total Estimated Cost: N/A Expenditures to Date: N/A



Marietta Acquisition Database ID No. 07-002

Construction Funding Year(s):

2001 - Present

Project Narrative:

Acquisition of residential properties in the frequently-flooded repetitive flood loss area of Marietta, removal of existing structures and restoration of properties with native vegetation.

Project Status:

Property acquisition began in 2001 and is ongoing. As properties are acquired, structures are removed and native vegetation is planted. All acquisitions are voluntary and the project is ongoing as current property owners decide to sell their properties. Total project cost will need to include funding for cleanup of up to four former gas stations, though the exact nature of the work is still undefined.

Total Estimated Project Cost:	N/A
Expenditures to Date:	N/A



2025-2030 Six-Year WRIP Item No. 34

High Creek Sediment Trap Database ID No. 22-005

Construction Funding Year(s):

Annually

Project Narrative:

High Creek flooding damaged nearby homes and closed Mount Baker Highway in the mid-1990's. A legal settlement resulting from that event directs Whatcom County to prepare a creek management plan. Sediment management in the watershed including the 3400 feet of County owned right of way east of Kendall Creek is an important plan element along with fish habitat mitigation. State permits for future maintenance dredging are dependent on consistency with the final management plan. A management plan was developed and recommended the construction of two sediment traps, one sited upstream of Mount Baker Highway to trap coarser material and one by the confluence with Kendall Creek to trap finer material. The sediment traps were constructed in 2018. The project provides for the annual clean out of those sediment traps.

Project Status:

The 2025 clean out is anticipated to be complete in September 2025 for a cost of \$100,000. Total Estimated Cost is for annual estimated cleanout costs funded by the FCZD.

Total Estimated Cost:

approximately \$120,000 annually

Expenditures to Date:



Emergency/New Projects Database ID No. 08-003

Construction Funding Year(s):

2025 - 2030

Project Narrative:

This item provides funding to address unanticipated projects resulting from new damage to flood control facilities.

Project Status:

Design and construction to occur as necessary.

Total Estimated Project Cost: \$425,000/year

Expenditures to Date:

Due to the nature of this item, no map exists. Board of Supervisors review and prioritization will be sought at the appropriate time.