Regional Stormwater Monitoring Program Quarterly Report (Revised)

For April 1 through June 30, 2015

Purpose of Revision

Table 1 was revised to report the actual status of the RSMP budget at the end of State Fiscal Year 2015 (FY15). In July through September, Ecology received invoices for work done prior to June 30, 2015 on RSMP projects. Ecology retroactively applied these payments to FY15, the time period in which the costs were incurred. This is standard practice for all state agencies at the end of each fiscal year, in order to ensure incurred costs are attributed to the fiscal year in which the related work was completed.

Additionally, at the end of FY15 Ecology charged overhead on the RSMP Coordinator salary and benefits for all of FY15. In the future, Ecology will apply the federally-approved indirect rate on RSMP administration expenses at the end of each fiscal year unless it becomes possible within the state's fiscal system to apply and report the charge on a quarterly basis.

RSMP accomplishments and key decisions reported for the quarter

- Stream monitoring for monthly water quality continued at 59 sites; one site was dropped due to denied permission. Crews were trained for summer watershed health (WH) monitoring. Water quality data were submitted and loaded to EIM https://fortress.wa.gov/ecy/eimreporting/.
- The Quality Assurance Project Plan (QAPP) for nearshore marine mussel monitoring was published.
- The first four effectiveness studies to get underway this year are producing study design and monitoring results deliverables. Agreements for two effectiveness studies were completed. The contract scope of work for one more effectiveness study is being developed.

RSMP budget for the previous quarter and anticipated for the coming quarter

Table 1 shows detail for each RSMP component and for the whole program. Encumbrances in excess of projected revenues will be for projects spanning multiple years. The 2015 streams sampling will be paid partly before August 2015 permittees' payments are due and partly (mostly) after, and effectiveness studies span multiple years. Ecology's program administration expenses are limited to 5% of the total RSMP revenue and are not separately accounted for by the three RSMP components. The total balance and anticipated expenditures for the coming quarter include Ecology's administrative expenses.

Table 1. Summary of revenues, expenditures, encumbrances, and available funds for each RSMP component.

Reported and projected income and expenditures	Status and trends (4-year project total: \$3,638,710)		Effectiveness studies (4-year project total: \$6,299,238)		SIDIR (4-year project total: \$677,250)		RSMP total (4-year project total: \$10,615,198)		
	Apr-Jun 2015	Jul-Sept 2015 (anticipated)	Apr-Jun 2015	Jul-Sept 2015 (anticipated)	Apr-Jun 2015	Jul-Sept 2015 (anticipated)	Ecology's Apr-Jun administration expenses	Apr-Jun 2015	Jul-Sept 2015 (anticipated)
Balance at start of quarter	\$909,313	\$1,154,781	\$1,518,215	\$2,701,877	\$169,314	\$308,643	-	\$2,532,463	\$4,054,975
Revenues	\$722,680	\$169,496	\$1,334,561	\$240,247	\$139329	\$29,985	-	\$2,196,570	\$439,728
Expenditures	\$477,212	\$117,434	\$150,899	\$281,348	\$0	\$12,740	\$45,947	\$674,058	\$431,522
Balance at end of quarter	\$ 1,154,781	\$1,206,843	\$2,701,877	\$2,660,776	\$308,643	\$325,888	-	\$4,054,975	\$4,063,181
Encumbrances	\$ 1,635,926	\$1,718,492	\$1,903,430	\$1,797,082	\$107,255	\$94,515	-	\$3,646,611	\$3,610,089

November 6, 2015 Page 1 of 3

RSMP Activities

Status and Trends Monitoring

The RSMP Coordinator is managing the small streams monitoring, data management, and completion of a QAPP addendum to guide analysis and reporting of findings. Jennifer Lanksbury of Washington State Department of Fish and Wildlife (WDFW) is managing the nearshore marine monitoring project. The project lead for the nearshore sediment monitoring project has not yet been identified.

Small streams water quality and watershed health

Lack of rain this spring or denied permission on private properties prompted new effort to evaluate additional replacement sites. Agreements with King and Skagit Counties, and San Juan Island Conservation District were amended to cover finding and adding replacement sites and increased costs of conducting fieldwork this quarter. Monthly water quality sampling at the 59 sites is otherwise going well. Ecology provided a two-day training for WH sampling for the RSMP crews in May. Due to the drought we anticipate as few as 80-90 sites will be sampled rather than the planned 100 sites. The addendum to the QAPP to describe a multiagency stream data analysis effort was prepared and will be published next quarter. King County, USGS and Ecology will work together to compile, analyze, interpret, and report on the results of this year's RSMP stream data, compare RSMP to other relevant studies, and give recommendations for RSMP streams trend monitoring.

Marine mussel contaminant monitoring

WDFW published the QAPP for nearshore mussel monitoring. Management of the monitoring and data analysis will be led by WDFW.

Marine nearshore sediment chemistry

A draft QAPP for nearshore sediment monitoring was completed by the RSMP Coordinator. A project lead will be identified in the coming quarter and they will finalize the QAPP.

Nearshore bacteria

No activity this quarter. A scope of work to describe options for gathering Puget Sound-wide bacterial data and a process for analyzing the data will be developed in the coming quarter.

Effectiveness Studies

Agreements with the Cities of Lakewood and Bellingham for two more effectiveness studies (see *RSMP contracts and agreements*, below) were signed. One more effectiveness study agreement with the City of Puyallup is expected to be completed in the coming quarter; the scope of work is currently under development. Contracting processes for two more Stormwater Work Group (SWG) approved effectiveness studies are expected to begin in the coming quarter.

Source Identification Information Repository (SIDIR)

The City of Lakewood agreement has a stand-alone task to compile Illicit Discharge Detection and Elimination (IDDE) data submitted by permittees. The agreement with Lakewood will be revised next quarter to adjust for a three month schedule delay. The first deliverable, a preliminary database, is expected late next quarter.

RSMP contracts and agreements

Eight interagency agreements/modifications were finalized this quarter with the following partners:

- USGS, King and Skagit Counties, and San Juan Island Conservation District (three of the four streams monitoring partners) agreements were adjusted for replaced sites and increased per-site costs to a total of \$1,115,042 to conduct monitoring, a \$45,712 increase.
- WDFW for nearshore mussel contaminant monitoring for \$263,187.
- City of Lakewood:
 - o A business inspection source control effectiveness study, for \$176,682; and

November 6, 2015 Page 2 of 3

- A separate task to compile and analysis of permittee-submitted illicit discharge data, for \$30,030 with an optional task (requiring approval prior to commencement) for \$77,226. This task will be funded from the Source Identification Information Repository (SIDIR) funds.
- City of Bellingham bioretention hydrologic performance study; Phase 1 of the project (site selection and QAPP development) for \$88,634.

In the coming quarter, Ecology expects to complete agreements with:

• City of Puyallup for a project to develop a regional protocol for assessing rain garden effectiveness that can be widely implemented by many types of organizations. The protocol will be tested and refined.

RSMP deliverables received in the previous quarter

Deliverables sent to the RSMP Coordinator are reviewed, approved and posted to the RSMP website http://www.ecy.wa.gov/programs/wg/stormwater/municipal/rsmp/rsmp.html

Status and Trends

- Field and lab deliverables for streams monitoring field work and laboratory results from the monitoring partners were reviewed and approved by RSMP Coordinator and data were loaded to EIM.
- Ecology trained field crews for WH monitoring on May 20-21, 2015.
- WDFW published the QAPP for the nearshore mussel monitoring in cooperation with the RSMP coordinator and Pierce County.

Effectiveness Studies

- USFWS gave an interim results presentation to the SWG on June 3, 2015.
- A final QAPP was published for the King County Echo Lake regional BMP retrofit effectiveness study. WSDOT provided comments and serves as the liaison for this project to the SWG.
- A draft QAPP was reviewed by the RSMP Coordinator for the King County Federal Way bioretention retrofit effectiveness study.

RSMP deliverables expected in the coming quarter

In the coming quarter, we anticipate a larger number of deliverables for all three RSMP elements.

Status and Trends

- Field and lab data deliverables for streams monitoring.
- WDFW deliverables for site suitability permit for shellfish monitoring, volunteer recruitment and equipment purchases to prepare for marine nearshore mussel monitoring.
- SOW development for marine nearshore sediment monitoring and analysis.
- SOW development for marine nearshore bacteria data investigation and compilation project.

Effectiveness Studies

- Final experimental design and QAPP for the paired watershed study.
- Final report for the USFWS toxicity study.
- Final QAPP for the King County Federal Way BMP retrofit study.
- Study design for the Lakewood business source control study; technical advisory committee established.
- Draft QAPP for the Bellingham LID hydrologic performance study; technical advisory committee established.

SIDIR

Preliminary compilation of IDDE data reported by stormwater permittees to Ecology.

RSMP issues that need to be resolved or for which stakeholder input is desired No issues were identified this quarter.

November 6, 2015 Page 3 of 3