

ADMINISTRATIVE REPORT

TO: Shane Bourke, City Manager	DATE: May 27, 2025
FROM: Brian Glavin, Chief Operating Officer	MEETING: Operational Services Committee
REPORT WRITER: Richard Sali, Storm Drainage Manager	
SUBJECT: Request for Additional Funds for Bear River Control Structure Armouring Project	

RECOMMENDATIONS

That the Operational Services Committee recommends Council allocate \$396,643.00 from the 2024 Storm Utility Capital Improvements budget to the Spillway Armouring Project.

PREVIOUS COUNCIL / COMMITTEE DIRECTIONS

At the November 2024 budget deliberations, Council approved \$1,700,000.00 from Capital Tax for the Spillway Armouring Project.

BACKGROUND

In 2022, as other dam safety upgrades and maintenance work was underway, it was discovered that the armouring which protects the dam during normal and flood operations had failed. This created a critical dam safety deficiency which must be addressed immediately as per the regulations governing dam operation. The ongoing project in 2022 was completed, and a subsequent project was started to rectify the issue with the dam armouring, along with additional high-priority deficiencies discovered during the 2023 and 2024 provincially mandated Annual Engineering inspections.

Design to rectify the dam deficiencies was completed in the Fall of 2024, with the construction estimate completed utilized to support the capital budget request in the 2025 budget deliberations.

ANALYSIS

The Spillway Armouring Project was tendered Spring 2025, with one bid for \$2,342,782.00 being submitted that met the requirements of the City.

To best manage the costs of this tender, City staff have deferred the repair of specific deficiencies that were able to be delayed by one to three years following the review by a Dam Safety Expert. These deficiencies will be part of a future RFP/tender process. The final bid amount for the

required repairs for the 2025 budget year is \$2,037,222.000. The complete updated costs are summarized in Table 1.

Table 1 – Updated Armouring Costs

Spillway Armouring Costs	
Approved Budget	\$ 1,700,000.00
Tender Bid	\$ 2,037,222.00
Engineering/Contingency	\$ 176,285.00
Shortfall	-\$ 613,507.00
Available from Spillway Project	\$ 116,864.00
Final Shortfall	-\$ 396,643.00

Relationship to City Council's Areas of Focus / Strategic Priorities

Safety: Ensuring the dam's structural integrity directly supports the priority of developing a community where residents are safe and feel safe.

Strategic Growth: Preventing failure of the structure safeguards surrounding infrastructure and enables sustained urban growth.

Innovation: Incorporating modern engineering solutions reflects the City's commitment to efficient and resilient infrastructure.

Environmental Impact

By completing the current scope of work, the overall environmental impact to the surrounding ecosystem of the structure will be reduced as erosion damage will be repaired, and any potential for bank sloughing will be reduced.

Economic Impact

A structurally sound control structure supports long-term infrastructure resilience, avoiding costly emergency repairs and economic disruption in the event of failure.

Social Impact

The project reinforces public trust in municipal infrastructure, reducing anxiety over flooding and contributing to community well-being.

Relevant Statutes / Master Plans / City Documents

- 2020 Inundation Study and Dam Safety Review
- 2022, 2023, and 2024 Bear River Control Structure Engineering Inspections
- Provincial: Water Act, Water (Ministerial) Regulation, and The Alberta Dam and Canal Safety Directive
- Federal: Fisheries Act

Risk

If the required work isn't completed promptly, there is a risk that regulators could issue a remedial order compelling the City to undertake the planned repairs, and potentially additional deficiencies identified in the Annual Engineering Inspection. Continued delays will lead to further deterioration of the dam's condition, requiring expanded repairs and increased costs. Additionally, existing

environmental permits for the construction are valid for a fixed period of time, and delays or changes may necessitate obtaining new permits. Inflation could also raise costs further if work is postponed.

STAKEHOLDER ENGAGEMENT

No stakeholder engagement was conducted as part of this report.

BUDGET / FINANCIAL IMPLICATIONS

As a result of higher than anticipated unit costs for the construction scope, the tender has come in over budget. The highly technical nature of the construction and the direct exposure to weather events and the risk of flooding at the project site contribute to the cost increase.

Administration has worked with finance to identify projects which can be delayed, allowing funding to be transferred from the 2024 Storm Utility Capital Improvements to the Spillway Armouring Project.

SUMMARY / CONCLUSION

Additional funding is required due to an unforeseen increase in unit rate prices. The allocation of funding from an already approved alternative source will enable the project to be awarded and construction to commence on the critical repairs this year.

ATTACHMENTS

N/A