

## **Incentivizing Comprehensive Flood Management**

*For Consideration - Alberta Municipalities 2022 Resolution Process*

**Moved by: City of Airdrie**

**Seconded by: Regional Municipality of Wood Buffalo (*proposed*)**

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**WHEREAS** floods are an extreme weather event causing substantial loss in Alberta, with a particularly devastating effect on urban municipalities.

**WHEREAS** floods in urban municipalities require recovery time, during which their economic power and contributions to the province are severely reduced.

**WHEREAS** the provincial government has also historically provided disaster relief funds to aid in the physical and economic recovery of urban municipalities at tremendous expense.

**WHEREAS** effective, integrated stormwater management is highly correlated with reduction in flood frequency and severity.

**WHEREAS** the largest and most stable source of revenue for almost all urban municipalities comes from property assessment values.

**WHEREAS** the pursuit of such revenue sources can run counter to municipal or intermunicipal decisions that would allow for more effective or integrated stormwater management.

**IT IS THEREFORE RESOLVED THAT** Alberta Municipalities advocate for provincial incentives to better integrate storm water management within and between municipalities.

### **BACKGROUND:**

There is a rising cost from flood damage throughout Canada, including Alberta. Public Safety Canada reports a dramatic increase in the number of disasters for which provinces required and obtained federal assistance under the *Disaster Financial Assistance Arrangements (DFAA) program* from 1970 to 2015. The final six years of that term cost more than the previous 39 years combined, with flooding accounting for 75% of all weather-related expense. The DFAA is expected to cost over \$900M annually.

Similar cost increases are seen for insurance payouts from extreme weather events. Since the 1980s, property and casualty payouts have more than doubled every 5-10 years. Payouts averaged \$405M per year from 1983 to 2008, and then exceeded \$1B for 11 of the 12 years between 2009 and 2020. A report from the Intact Centre on Climate Adaptation at the University of Waterloo suggests that for every dollar of loss borne by Canadian insurers, three to four dollars are borne by government, homeowners, and business owners. The top five highest loss years on record are all flood related.

To reduce the costs and impacts of extreme events, municipalities or regional boards often look to develop at a greater distance from riparian areas. However, the stable and substantial revenues from property assessment run counter to these aims by incentivizing municipalities to maximize their land development opportunities – and lands next to rivers and streams often have premium assessment potential.

The high cost of payouts from provincial and federal governments for flood events provides economic rationale to incentivize municipalities to look at comprehensive or integrated stormwater management practices across an entire watershed. Such integrated practices can involve things like:

- mandating more permeable surface areas as part of developments;
- using stormwater catchment areas (i.e., trap lows) to slow transfer to stormwater ponds;
- reducing acceptable stormwater release rates and enhancing stormwater ponds for capacity beyond 1:100-year events;
- naturalizing riparian banks and avoiding riparian channelization; and,
- requiring intermunicipal watershed management bodies

Such measures may reduce the amount of net developable land, causing concern for developers and municipalities that rely on maximum yield. Alberta Municipalities recognizes that when a municipality agrees to reduce standards, it gains a competitive advantage. Moves by one municipality will often be countered by others within the watershed to remain competitive for property tax revenue, especially non-residential development.

Leadership is required to incentivize municipalities to collaborate on flood resiliency and reduce the long-term expense of extreme weather events, especially floods, for all Albertans.