

Report to Council



Date: July 27, 2020
To: Council
From: City Manager
Subject: Water Supply Update
Department: Utility Services

Recommendation:

THAT Council receives, for information, the report from Utility Services dated July 27, 2020 regarding an update on potable water supply in southeast Kelowna;

AND THAT Council direct staff to bring forward a bylaw amendment to extend the deadline to request the \$500 credit for using new irrigation services to October 1, 2020

Purpose:

To provide Council an update on the implementation of Stage 3 water restrictions on the potable water supply in southeast Kelowna.

Background:

On Friday July 17, staff implemented modified Stage 3 water restrictions for the potable water system in southeast Kelowna, including the Crawford Estates neighbourhood. Stage 3 water restrictions allow for property irrigation on one day per week (only) as opposed to our "normal" Stage 1 restrictions of three days per week. The modification is that residents continue to be allowed to hand water or water with a spring-loaded garden hose at any time during this Stage 3 implementation. Users of the non-potable system as well as potable water users outside of the Stage 3 area, remain on Stage 1 restrictions.

On March 23, 2020 Council amended the Water Regulation Bylaw to encourage smaller properties in southeast Kelowna to quickly switch to non-potable water for irrigation through two financial initiatives. These were pricing new irrigation services at \$500 for all of 2020, and by providing a \$500 credit opportunity for property owners that used the new services by July 1, 2020. Staff recommend the \$500 credit be extended to October 1st.

Discussion:

Stage 3 water restrictions were implemented as an urgent response to operational concerns about our ability to ensure adequate potable water to our customers in the southeast Kelowna area, plus fire protection. This is a short-term challenge related to the transition of southeast Kelowna to the new potable water system. It is related to the capacity of the water system extension to southeast Kelowna and not the volume of water available from Okanagan Lake.

The city potable water system is operated under the following priorities:

1. Water for drinking, cooking, and sanitation
2. Water stored for fire fighting
3. Water for irrigation

Over the last couple of weeks, we have seen temperatures rise along with unanticipated high demand. With the coming heat, staff had serious concerns about our ability to ensure that the system had adequate water for sanitation and firefighting and therefore implemented restrictions on irrigation. The one day per week (Stage 3) restriction is expected to be short-term while we implement additional capacity on an emergency basis and work with area residents to reduce demand on the potable water system.

The higher than expected demand is largely attributable to the following:

1. Many of the service lines in the former South East Kelowna Irrigation District (SEKID) area have significant leaks on private property. As we implement new water meters in the larger lot areas, we are finding that about 25 per cent have substantial leaks. Most homeowners are unaware of domestic water consumption (including leaks) until meters are in place. The leaks are the responsibility of the property owners and we are working with area residents to have them addressed.
2. There are a number of large properties that are irrigating with potable water when non-potable water is available to them. We are working to motivate and transition these properties to irrigate with non-potable water, but it will take time to transition completely, particularly as the higher water rate for potable water consumption does not take effect this year. The potable system was not designed to provide irrigation water to all of these properties.

In 2021 water demands are predicted to drop significantly based on resolving the two issues noted above and an increase in consumer awareness as former SEKID customers will receive a water bill on a consumption basis starting January 2021. Water meters are proven to be the most effective water conservation tool available.

High demand will need to continue to be addressed over the coming year as we complete the transition of former SEKID customers to the City utility. In the meantime, water operations staff have been working to bring a water well online that will add to our capacity to provide water to the area in a safe and reliable way as we work through this transition year. We are also working closely with the project design team to ensure that the new system is being operated to its full design capacity during this commissioning period.

Conclusion:

Mid July to early August are typical peak demand periods on the water system. We expect the current restriction to be short-term and to be able to shift to Stage 2 watering restrictions (two times per week) soon if the current restrictions and actions are effective at reducing overall water demand in the area.

If current restrictions and staff efforts to increase supply are not effective in ensuring the safety of the water supply, additional options would need to be explored to ensure water for safety and sanitation remains available to area residents.

Internal Circulation:

Infrastructure Division
Utilities Planning
Infrastructure Delivery
Communications

Considerations applicable to this report:***Communications Comments:***

Letters, signage and direct communication to residents is helping to reduce demand on the water system and ensure residents understand the restrictions. Staff have additionally responded to requests for additional information as needed from affected residents and customers through a dedicated phone line and email address. A Frequently Asked Questions summary is provided for Council and community information.

Considerations not applicable to this report:

Legal/Statutory Authority:

Legal/Statutory Procedural Requirements:

Existing Policy:

Financial/Budgetary Considerations:

External Agency/Public Comments:

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Approved for inclusion:



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