Roxboro sanitary lift station FAQs

What is a sanitary lift station?

Calgary's wastewater system is a gravity fed system – that means that sanitary flows are mostly driven by gravity to get wastewater to our treatment facilities. A sanitary lift station is essentially a pump that moves sanitary wastewater towards The City's wastewater treatment facilities when gravity is not an option due to the elevation of an area. These stations are only part of the sanitary system – they do not have any bearing on the drainage of storm water in their service area.

When will the Roxboro sanitary lift station be built?

Construction on the new sanitary lift station is expected to begin in October 2016. Construction will take approximately 1 year to complete, including landscaping. Demolition of the old lift station will take place in late 2017, once the new station is in service.

How will residents be impacted by construction?

During the construction of the new sanitary lift station, residents can expect noise from equipment and higher than average traffic in the area. There will be traffic diversion for approximately two weeks (reduced to one lane of traffic) on Roxboro Glen Rd SW in front of the current sanitary lift station. We will adhere to noise bylaws, including working hours during the weekday and weekends.

Why are you building a new sanitary lift station in Roxboro?

With the data collected from the 2013 flood and the subsequent study done on the flow in Roxboro in 2014/2015 we saw a need to replace the lift station and upgrade it in a number of ways to make sure the area continues to receive a high level of service. One of the drivers with this sanitary lift station is the flood resiliency report that has directed the construction of all critical infrastructure to be resilient to 1 in 100 year flood events.

There were three different options in the initial project presentation – why have they changed?

You may have noticed that there was a corten steel option that was first presented to the community association. Due to the cost of the corten steel it is not available as an option – we want to make sure we are mindful of spending when constructing critical infrastructure. The cost of the corten steel was

roughly twice the cost of other options presented making it unreasonably expensive for this project. In lieu of the corten steel option, we have had a third option of brick siding created that is roughly the same cost as the other two options.

How much do these exterior options cost?

The estimated cost of the exterior facade ranges between approximately \$180,000 and \$230,000 – final costs will be dependent on materials used. There is an ongoing maintenance cost that varies between all three options, but given the initial cost of the facade and anticipated maintenance costs, we believe all three options are roughly the same cost to build and maintain over the life of the sanitary lift station. They all have similar anti-graffiti properties in terms of maintenance.

Why has it taken so long to build a new sanitary lift station after the 2013 floods?

After the 2013 floods, a study was undertaken to collect data on the sanitary flows in Roxboro. This study required two years of data collection to make sure the new lift station would be designed adequately to handle the sanitary requirements of the area. As it turns out, the flow was higher than expected and the capacity of the sanitary lift station was increased from what would have normally been designed for the service area. Once the study was completed in 2015, we hired a consultant who developed the preliminary design that is under review now.

Why is the new sanitary lift station bigger?

The reason the new lift station is bigger is that we needed more space for the equipment used to run the lift station. Safety requirements have changed since the old one was built in 1956, increasing space requirements for the safety of maintenance personnel. The reason it is higher is so we can house the sensitive equipment on the second flood, keeping it safe up to a 1 in 100 year flood event.

Why is the sanitary lift station being built in a new location?

Because the current lift station does not have a bypass built into the system, if we wanted to build on the same location we would need to pay for pump trucks to keep the sanitary flow moving for the duration of the project. This would add approximately \$1.5 million to the project. To get around this problem, we will build slightly east of the current lift station, and turn the old sanitary lift station into more green space for park users. Other locations were considered but due to flood risk, the placement of other utilities in the area, impacts to trees in the park and overall cost of the project, this was the best location for the new lift station.

Are security cameras going to be added to the new lift station?

As there is no imminent threat or pattern of vandalism in the community, no security cameras will be added to the sanitary lift station.

Will there be a bench on the sanitary lift station?

No, there will not be any benches on the structure itself, nor will any be added to the surrounding area with the construction of the new building.

Will solar panels be used to power the lift station?

No, solar panels will not be used to power the sanitary lift station. There is not enough space to install adequate solar panels needed to power the equipment in the station.