

BULLETIN #17:

Arch Culvert and Paving



Paving begins

Anyone driving along Zenway Boulevard recently, would have noticed a big change as part of the Highway 427 expansion.

Following months of steady progress, the first section of paving has begun north of Zenway, along the 6.6-kilometre extension from Highway 7 to Major Mackenzie Drive.

The extension will include:

- 8 lanes from Highway 7 to Rutherford Road;
- 6 lanes from Rutherford Road to Major Mackenzie Drive;
- 3 new interchanges (Langstaff Road, Rutherford Road and Major Mackenzie Drive);

Paving work will be ongoing through to the anticipated 2021 completion of the expansion.



The base layer of paving began in the southbound lanes of the Highway 427 extension, just north of Zenway Boulevard on Thursday, July 25.



The first nine sections of a precast arch culvert were completed on Thursday, July 25.

Precast culvert installation

The first section of a precast arch culvert was installed over Rainbow Creek at Langstaff Road, between Huntington Road and Line Drive.

A 600-tonne crane was used for the installation of the first nine pieces of the culvert, which were installed in one day.

This new culvert will allow for better flow of the creek and support the realignment of a section of Langstaff, as part of the Highway 427 expansion.

The majority of the Langstaff crossing will be built offline to avoid impacts to the existing travel lanes. Therefore, minimal traffic impacts are anticipated.



View of one of the nine culvert sections, pre-lift during installation on Thursday, July 25.

What is it?

A culvert is a tunnel or crossing located under a road. It can be built to transport either water, people or animals.

Why Pre-cast?

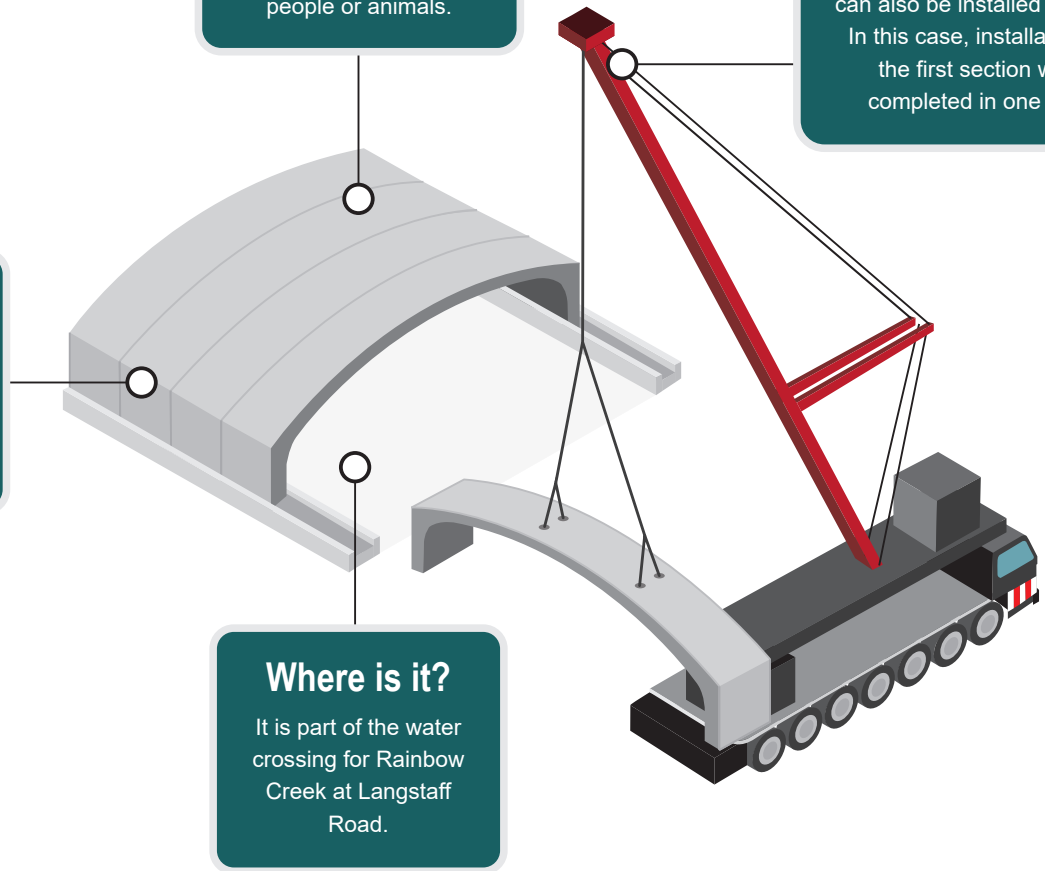
Pre-cast culverts have lower installation and maintenance costs. They can also be installed quickly. In this case, installation of the first section was completed in one day.

Advantages

- Prevents Erosion
- Prevents Flooding
- Allows Water to Flow Unobstructed

Where is it?

It is part of the water crossing for Rainbow Creek at Langstaff Road.



A video of construction progress, including paving, can be viewed at:
<http://427expansion.ca/about-link-427/videos/>

What is the Highway 427 Expansion Project?

The Highway 427 Expansion project will extend the highway 6.6 km, from Highway 7 to Major Mackenzie Drive and widen the existing highway to 8 lanes between Finch Avenue and Highway 7.

Who is LINK427?

LINK427 is the consortium selected by the Ministry of Transportation (MTO) and Infrastructure Ontario (IO) to design, build, finance, and maintain the Highway 427 widening and extension.