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Muldoon's Corner Easing Project



Project progress

Heavy rainfall, snow and ice on the hill have continued to be a challenge for the team during the past few months. However, the earthworks programme allowed for poor weather conditions during the 2010/11 winter seasons so the project is still on target for completion by August 2012.



Site conditions 22 September 2010

What's been happening?

During the investigation stage of any project geotechnical engineers carry out a full survey of the area to assess the physical features of the ground such as, soil and rock type – and its stability – and water tables.



A recent find on site included this amazing specimen of a milk worm. This large white worm approximately 300mm long with the girth of an average man's index finger, was extricated from its hole by Opus' Site Engineer Simon Grundy .

Their findings are worked into the final design, for example slopes may be designed to shallow angles or rock anchors specified to prevent slips, but it is not until the digging starts that engineers see what is really lying beneath the surface.

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Opus geotechnical engineers scrambling up the hill like mountain goats were safely anchored by ropes as they directed professional absailers across the slip.

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The photograph shows a slip at Cut Site A, which happened overnight in late August, after a period of heavy rain. No-one was injured but a large shipping container used as storage was shunted aside, and, in scenes a bit like the children's picture book, the little yellow digger got stuck and the team used a bigger digger to rescue it.

Investigations indicate that water built up behind a shear plane in the hill, where blocks of rock join, which caused it to slip. This photograph shows just how tricky it is to carry out those investigations too.

Coming up

- Traffic management using stop/go signs for short periods
- Continue filling to Two Bobs Corner fill site
- Completion of Cut A
- Pavement construction across Fill Site A and through Cut A will start once the Cut A is finished
- Drilling and installing rock anchors
- Construction of retaining walls



It's our first anniversary

It is now just over a year since contractors, Hawkins Infrastructure, started on site. Since then more than 110,000 cubic metres of material (of the 230,000 required) have been cut from the hillside and placed in the gullies below.

Here are some of the milestones achieved in the project's first year:

- The first fill area from the summit (Fill A) is at its finished level and the first year's target of landscaping the formed slope has been reached.
- Fill Site 1 at the southern end of the project is also at its final level.
- The team has finished laying the pipes for the new 1600mm diameter culvert at Fill Site B – near the forestry access, and has excavated an access track down to the toe, or bottom, of the fill area. This means that this site has also started to take fill.
- A new fill site has also been established at 'Two Bob's Corner' further down the hill. This area will take about 40,000 cubic metres of material from this project and will have space to take fill from future projects.
- Despite the dreadful winter weather conditions, 'cats eyes' were installed along the centre line and line markings through the site were re-laid.



The project team and partners met for a progress meeting last month and celebrated the team's first year's achievements.

Our contact details

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