

Billys Lookout

Teralba, NSW

Read about targeted grout placement in historical mine voids over 50,000m² using custom fly ash mixes.



The project

To minimise the risk of future mine subsidence events beneath the proposed Billys Lookout residential subdivision, targeted grouting was required to meet the projects DA requirements. Keller worked closely with the client and geotechnical consultant ahead of the works to develop a custom minefill grout to practically and economically reduce the subsidence risk and conform to Subsidence Advisory NSW requirements.

The challenge

Due to a combination of collapsed zones and open voids, targeted grouting was critical to minimise grout volumes and reduce project costs. The client also requested to accelerate the program to meet desired land release dates.

The solution

Keller successfully produced and placed a custom fly ash grout using an onsite batch plant and an offsite batch grout delivered in concrete agitators. Grout was placed on two fronts to achieve daily production rates up to $600 \, \mathrm{m}^3$ per shift. Regular downhole CCTV camera inspections and sonar surveys were used to monitor grout flow and ensure it reached the target locations. All works were verified by the consulting engineer to meet SA NSW requirements.

Project facts

Owner(s)

McCloy Group

Keller business unit(s)

Keller Australia

Main contractor(s)

Keller Pty Ltd

Solutions

Mine stabilisation / void filling

Markets

Residential

Techniques

Mine infill or cavity grouting