



Aknes/Tafjord land slide monitoring system.

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Fugro Survey AS has been involved in the Åkenes-Tafjord landslide monitoring project for the two last years, both in instrumentation and data management.

Instruments provided by Fugro Survey are lasers, GPS network and robot station.

The presentation will give an overview on the different system used for tracking movement. Experience and results from the system setup and logging of data.

An important part of the Åknes/Tafjord project is the data management and presentation of data of all different systems in real time. This system will also be presented with system setup, different modules and functionality.

Project:

There are two lasers measuring the largest crack continuously. The GPS network consists of 8 GPS receivers located around in the landslide area. The data from the receivers are sent to two separate computers calculating the position in two different ways. One gives you near real time solution and the other gives a post processed solution.

The robot station measures 30 different points in the landslide area.

There are several companies involved in instrumentation at this site. A good data management is very important to get the full overview of all the data that are collected.

All data collected by the different sensors are sent to a central database. On top of this database there is an application that gives the user the opportunity to look at and compare data from all the sensors. The data base also automatically create alarms when sensors excide given threshold values. An alarm results in an e-mail and cellular phone text message to the monitoring group.