



### Shahdag Tourism Complex, Azerbaijan



#### PROJECT SUMMARY

NAME: Shahdag Winter Summer Tourism Complex

YEAR: August 2013 – Ongoing

CLIENT: Ministry of Culture and Tourism of Azerbaijan Republic

MAIN CONTRACTOR: Dia Holding FZCO

CONSULTANT: ENARGEO



#### OVERVIEW

Shahdag Tourism Complex is located in the north eastern of the Caucasus near to city of Gusar which is 180km away from Baku in Azerbaijan. When it is completed, the complex will provide a number of activities for the visitors both in summer and winter period.

The Tourism Complex will be located within the Shahdag National Park, which is known for having an intact ecological system and an untouched flora and fauna.

#### MONITORING

The most critical section of the tourism complex is the 24m high earth dam which is an artificial reservoir with a 15900m<sup>3</sup> capacity which will be used for water storage during the lifetime of the project to provide a continuous water supply for snow production. Therefore, a monitoring system is required for both construction control and the long-term performance and overall stability of the reservoir.

The vertical settlement and lateral displacement in the reservoir body will be monitored by a number of borehole locations which include vertical or horizontal inclinometer systems and a number of vertical inclinometer systems combined with a magnetic extensometer system allowing the acquisition of data for both horizontal and vertical displacement from a single borehole.

#### PRODUCTS USED

##### QJ Inclinometer Casing

For use with portable inclinometers.

##### Portable MEMS Inclinometer

Includes both vertical and horizontal probe for measuring lateral and vertical displacements.

##### Inclanalysis Software

For analysing the data from vertical and horizontal boreholes.

##### Data Loggers

Multi-channel remote reading & logging.

##### GXM300i

Magnetic settlement & inclinometer casing system for measuring ground settlement and lateral displacement.