

Title (en)
METHOD AND ARRANGEMENT FOR THE INJECTION OF ROCK AND SOIL MATERIAL

Title (de)
VERFAHREN UND ANORDNUNG ZUR INJEKTION VON GESTEIN UND BODENMATERIAL

Title (fr)
PROCÉDÉ ET AGENCEMENT POUR L'INJECTION DE MATÉRIAU DE ROCHE ET DE SOL

Publication
EP 3184732 B1 20190102 (EN)

Application
EP 16206348 A 20161222

Priority
SE 1551697 A 20151222

Abstract (en)
[origin: EP3184732A1] A method and an arrangement for the injection of rock or soil material, for example injection into boreholes in correlation with tunnelling, the excavation of rock caverns, or during the construction of dams. Grout from a common supply pump (1) is pumped at the same time through several injection pipes (3) to several injection holes (A-G), and where at least the pressure (10) and injected volume (9) are monitored and individually measured by a control unit for the supply to each one of the said injection holes (A-G), and where the control unit (11), at a final interruption of the injection of an injection hole (A-G), regulates a valve arrangement (4) such that no grout is any longer fed to the injection pipe (3) that leads to the relevant injection hole (A-G) and instead connects a water line (6) for the supply of water to the valve arrangement (4) and the injection pipe (3) for the rinsing clean of these. The arrangement comprises a pressure sensor (10) and a flow gauge (9) for each injection pipe (3) connected to a monitoring arrangement (11) in order to, for each one of the injection pipes (3) of injection holes (A-G), record the pressure and the volume of the supplied grout that has been injected.

IPC 8 full level
E21D 9/00 (2006.01); **E21D 20/02** (2006.01)

CPC (source: EP SE)
E21B 33/138 (2013.01 - SE); **E21D 9/001** (2013.01 - EP SE); **E21D 20/028** (2013.01 - EP); **E21D 20/02** (2013.01 - SE)

Cited by
CN114352328A; CN113513349A

Designated contracting state (EPC)
AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

DOCDB simple family (publication)
EP 3184732 A1 20170628; **EP 3184732 B1 20190102**; DK 3184732 T3 20190423; EP 3492697 A1 20190605; SE 1551697 A1 20170623; SE 541021 C2 20190312

DOCDB simple family (application)
EP 16206348 A 20161222; DK 16206348 T 20161222; EP 18214578 A 20161222; SE 1551697 A 20151222