

Title (en)
Injection tube with anchor effect.

Title (de)
Injektionsrohr mit Ankerwirkung.

Title (fr)
Tuyau d'injection avec effet d'ancrage.

Publication
EP 0398838 B1 19931215 (DE)

Application
EP 90630104 A 19900510

Priority
DE 8906126 U 19890518

Abstract (en)
[origin: EP0398838A1] Injection tubes are used for injecting media, such as, for example, synthetic resin, suitable in particular for rock consolidation. An injection tube essentially consists of a tube which can be inserted into a borehole and is provided with a borehole closure as well as a non-return valve. To subsequently use the injection tube as an anchor, provision is made for the tube to be designed as an anchor rod (1) with a thread (2) rolled onto the end located outside the borehole, for a non-return valve (4) to be arranged in the injection head (3) and for a bursting disc (5) to be arranged on the end of the anchor rod (1) directed towards the bottom of the borehole, and for the borehole closure (6) to be designed as an inflatable flexible tubing section (8) which surrounds the anchor rod (1), is held at the ends by bindings (7) and has a non-return valve (10) integrated between anchor rod (1) and inflation space (9). <IMAGE>

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E21B 33/13

IPC 8 full level
E02D 5/76 (2006.01); **E21B 33/127** (2006.01); **E21B 33/13** (2006.01); **E21B 34/06** (2006.01); **E21D 9/00** (2006.01); **E21D 20/02** (2006.01)

CPC (source: EP)
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Cited by
WO03008762A1; CN103206234A; CN104196486A; US7594366B2; DE4128154A1; DE4209802C1; FR2689175A1; DE10135159C1; CN100378293C; JP2017106207A; US5653557A; CN105221171A; EP2354448A3; US7077195B2

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