

Title (en)

INGROUND DRILL STRING HOUSING AND METHODS FOR SIGNAL COUPLING

Title (de)

UNTERGRUNDBOHRSTRANGGEHÄUSE UND SIGNALEINKOPPLUNGSVERFAHREN

Title (fr)

BOÎTIER SOUTERRAIN POUR TRAIN DE TIGES ET PROCÉDÉS DE COUPLAGE DE SIGNAL

Publication

**EP 2678517 A2 20140101 (EN)**

Application

**EP 12749614 A 20120208**

Priority

- US 201113035774 A 20110225
- US 201113035833 A 20110225
- US 2012024261 W 20120208

Abstract (en)

[origin: WO2012115778A2] A coupling adapter is insertable in at least one joint of a drill string as the drill string is extended from a drill rig. The coupling adapter includes an arrangement for receiving a data signal that is generated by an inground tool and for electromagnetically coupling the data signal onto at least a portion of the drill string that extends from the adapter to the drill rig such that at least some of the drill pipe sections cooperate as an electrical conductor for carrying the data signal to the drill rig. In another feature, a current transformer is resiliently supported to isolate the current transformer from mechanical shock and vibration that is produced by an inground operation that is performed using the drill string. In another feature, a drill string repeater is described.

IPC 8 full level

**E21B 19/16** (2006.01); **E21B 17/00** (2006.01); **E21B 19/18** (2006.01)

CPC (source: EP US)

**E21B 17/003** (2013.01 - EP); **E21B 17/0283** (2020.05 - EP US); **E21B 47/12** (2013.01 - EP US)

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)

**WO 2012115778 A2 20120830; WO 2012115778 A3 20131024**; CN 103518034 A 20140115; CN 104040108 A 20140910; EP 2678516 A2 20140101; EP 2678516 A4 20171122; EP 2678517 A2 20140101; HK 1201898 A1 20150911; RU 2013138440 A 20150227; RU 2013138441 A 20150227; WO 2012115779 A2 20120830; WO 2012115779 A3 20131017

DOCDB simple family (application)

**US 2012024257 W 20120208**; CN 201280015145 A 20120208; CN 201280015241 A 20120208; EP 12748918 A 20120208; EP 12749614 A 20120208; HK 15102400 A 20150310; RU 2013138440 A 20120208; RU 2013138441 A 20120208; US 2012024261 W 20120208