

Title (en)
Methods and apparatus for cementing wells

Title (de)
Verfahren und Vorrichtung zum Zementieren von Bohrlöchern

Title (fr)
Procédés et appareil pour la cimentation de puits

Publication
EP 2647789 A2 20131009 (EN)

Application
EP 13162620 A 20130405

Priority
US 201213506227 A 20120405

Abstract (en)
Return flow diverters are provided for which are adapted to allow return flow during cementing of a liner for a well. The return flow diverter comprises a cylindrical body adapted for installation in a well as part of the liner. The cylindrical body has a fluid port therein adapted to allow fluids displaced by a cementing operation to flow from an annulus between the liner and the well into the cylindrical body. The return flow diverter also comprises a cover supported on the cylindrical body for movement from an open position, in which the port is open, to a closed position, in which the port is closed by the cover, a transmission disposed within the cylindrical body and defining a cylindrical passageway adapted to accommodate a tubular conduit.

IPC 8 full level
E21B 33/13 (2006.01); **E21B 43/10** (2006.01)

CPC (source: BR EP)
E21B 33/13 (2013.01 - BR); **E21B 33/14** (2013.01 - EP); **E21B 34/12** (2013.01 - EP); **E21B 43/10** (2013.01 - BR EP);
E21B 2200/06 (2020.05 - EP)

Citation (applicant)
• US 7225880 B2 20070605 - BRADDICK BRITT O [US]
• US 7387169 B2 20080617 - HARRALL SIMON J [GB], et al
• US 7441606 B2 20081028 - MAGUIRE PATRICK [US]
• US 7048065 B2 20060523 - BADRAK ROBERT P [US], et al
• US 6598677 B1 20030729 - BAUGH JOHN L [US], et al

Cited by
CN114991703A; KR102179939B1; NO339650B1; CN107246249A; CN112177562A; WO2016060570A1

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

Designated extension state (EPC)
BA ME

DOCDB simple family (publication)
EP 2647789 A2 20131009; EP 2647789 A3 20170726; BR 102013008358 A2 20160119; BR 102013008358 A8 20180522;
BR 122016016988 A2 20160119; BR 122016016988 A8 20170711; CA 2811638 A1 20131005; CA 2811638 C 20160426;
MX 2013003792 A 20131014; MX 344176 B 20161208

DOCDB simple family (application)
EP 13162620 A 20130405; BR 102013008358 A 20130405; BR 122016016988 A 20130405; CA 2811638 A 20130402;
MX 2013003792 A 20130404