

Title (en)

METHOD OF OPTIMIZING DRILLING OPERATION USING EMPIRICAL DATA

Title (de)

VERFAHREN ZUR OPTIMIERUNG DES BOHRVORGANGS MIT EMPIRISCHEN DATEN

Title (fr)

PROCÉDÉ D'OPTIMISATION D'UNE OPÉRATION DE FORAGE UTILISANT DES DONNÉES EMPIRIQUES

Publication

EP 3385497 A1 20181010 (EN)

Application

EP 17305405 A 20170404

Priority

EP 17305405 A 20170404

Abstract (en)

A method for drilling a wellbore includes: generating an optimal cluster using historical drilling data; drilling an interval of the wellbore; and while drilling the wellbore interval: generating a working cluster using data collected while drilling the wellbore interval; identifying a plurality of data points proximate to a centroid of the working cluster; selecting one of the data points that converges toward a centroid of the optimal cluster; and adjusting one or more drilling control parameters using the convergent data point.

IPC 8 full level

E21B 41/00 (2006.01); **E21B 44/00** (2006.01); **G06F 17/00** (2006.01)

CPC (source: EP US)

E21B 21/08 (2013.01 - EP US); **E21B 44/00** (2013.01 - EP); **E21B 44/02** (2013.01 - US); **E21B 44/06** (2013.01 - EP US); **E21B 49/003** (2013.01 - US)

Citation (applicant)

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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)

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DOCDB simple family (application)

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