

Title (en)

Method and apparatus for transmitting data to the surface from an oil well.

Title (de)

Verfahren und Vorrichtung zum Übertragen von Daten aus einem Bohrloch an die Oberfläche.

Title (fr)

Dispositif et procédé pour transmettre des données à la surface à partir d'un puits de pétrole.

Publication

EP 0314654 A1 19890503 (EN)

Application

EP 88850358 A 19881021

Priority

NO 874428 A 19871023

Abstract (en)

Method and apparatus for transmitting measuring data to the surface from a oil well, where electromagnetic signals are cyclic transmitted a clock activated transmitting unit in the oil well, the signals comprising data for registrated parameters, using the casing of the oil well as transmission line, up to a receiver unit arranged at the upper end of the oil well, which receiver unit is activated by a receiver clock synchronized by the transmitter clock, for reception corresponding to the cyclic activation of the transmitter, and where the signals received by the receiving unit are filtered for electromagnetic noise and the filtered signals are transmitted from the receiver unit to a receiving unit activated in a corresponding cyclus and arranged on the surface.

IPC 1-7

E21B 47/12

IPC 8 full level

E21B 47/12 (2012.01)

CPC (source: EP)

E21B 47/13 (2020.05)

Citation (search report)

- [A] WO 8603545 A1 19860619 - SAGA PETROLEUM [NO]
- [A] US 4569598 A 19860211 - JACOBS DONALD H [CA]
- [A] US 3905010 A 19750909 - FITZPATRICK JOHN DOUGLAS
- [A] GB 1557863 A 19791212 - SHELL INT RESEARCH

Cited by

US10858932B2; GB2559501B; EP0927812A3; GB2259832B; AU2007292254B2; US2021131274A1; US11674385B2; GB2552557A; GB2552557B; AU2017407833B2; GB2317797A; GB2317797B; EP1473256A1; FR2854425A1; EP0932054A3; US2018252100A1; EP4151832A1; EP4151831A1; EP4328416A3; US7151465B2; US10100634B2; US7636052B2; US8575936B2; WO0214907A1; WO2018236352A1; WO2009038474A1; WO2008031021A3; US7810993B2; US8083405B2; US11085272B2; US11156062B2; US10683748B2; US11448062B2; US6772082B2; US9547104B2; WO2008031021A2; US8390471B2; EP0922836B1; US10488286B2; US10975688B2; WO2018178688A1; WO2018178607A1; WO2006059079A1; WO2018178606A1; US7841234B2; US8164475B2; US8261607B2; US7863907B2; US8106791B2; US8143906B2; US8353677B2; US8784068B2

Designated contracting state (EPC)

ES FR GB GR IT NL

DOCDB simple family (publication)

EP 0314654 A1 19890503; EP 0314654 B1 19920108; ES 2029077 T3 19920716; NO 163578 B 19900312; NO 163578 C 19900620; NO 874428 D0 19871023; NO 874428 L 19890424

DOCDB simple family (application)

EP 88850358 A 19881021; ES 88850358 T 19881021; NO 874428 A 19871023