

Title (en)

PROCESS FOR PRODUCING HYDROGEN AT DIFFERENT DEGREES OF PURITY IN A H<sub>2</sub> PSA

Title (de)

VERFAHREN ZUR HERSTELLUNG VON WASSERSTOFF MIT VERSCHIEDENEN REINHEITSGRADEN IN EINER H<sub>2</sub>-PSA-ANLAGE

Title (fr)

PROCÉDÉ DE PRODUCTION D'HYDROGÈNE À DIFFÉRENTS NIVEAUX DE PURETÉ PAR UN PSA H<sub>2</sub>

Publication

**EP 2854990 A1 20150408 (FR)**

Application

**EP 13728465 A 20130523**

Priority

- FR 1255147 A 20120604
- FR 2013051120 W 20130523

Abstract (en)

[origin: WO2013182774A1] Process for producing hydrogen from a gas mixture comprising hydrogen (H<sub>2</sub>), and at least one impurity to be removed using an H<sub>2</sub> PSA unit comprising N adsorbers subjected to a pressure cycle of duration T with N > 1, comprising the following successive steps: a) said gas mixture is introduced into said unit, b) at least one first stream enriched in hydrogen having an average impurity content Y<sub>pd</sub> is extracted, c) at least one second stream enriched in hydrogen having an average impurity content of Y<sub>hp</sub> is extracted, d) at least one third stream enriched in hydrogen having an average impurity content Y<sub>pd'</sub> is extracted, with Y<sub>pd</sub> > 3Y<sub>hp</sub> and Y<sub>pd'</sub> > 3Y<sub>hp</sub>.

IPC 8 full level

**B01D 53/047** (2006.01); **B01D 53/04** (2006.01); **C01B 3/56** (2006.01)

CPC (source: EP US)

**B01D 53/0446** (2013.01 - EP US); **B01D 53/047** (2013.01 - EP US); **C01B 3/56** (2013.01 - EP US); **B01D 2256/12** (2013.01 - EP US); **B01D 2256/16** (2013.01 - US); **B01D 2259/40024** (2013.01 - EP US); **B01D 2259/4006** (2013.01 - US); **C01B 2203/0233** (2013.01 - EP US); **C01B 2203/025** (2013.01 - EP US); **C01B 2203/0283** (2013.01 - EP US); **C01B 2203/042** (2013.01 - US); **C01B 2203/0425** (2013.01 - US); **C01B 2203/043** (2013.01 - EP US); **C01B 2203/0465** (2013.01 - US)

Citation (search report)

See references of WO 2013182774A1

Designated contracting state (EPC)

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**FR 2991192 A1 20131206**; CN 104519977 A 20150415; EP 2854990 A1 20150408; US 2015158726 A1 20150611; WO 2013182774 A1 20131212

DOCDB simple family (application)

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