

Title (en)

METHOD FOR PURIFYING A RAW GAS STREAM AND PURIFICATION DEVICE

Title (de)

VERFAHREN ZUR REINIGUNG EINES ROHGASSTROMS UND REINIGUNGSVORRICHTUNG

Title (fr)

PROCÉDÉ POUR PURIFIER UN GAZ BRUT ET DISPOSITIF DE PURIFICATION

Publication

**EP 3701191 B1 20220427 (DE)**

Application

**EP 19805884 A 20191030**

Priority

- DE 102018219105 A 20181108
- DE 2019100937 W 20191030

Abstract (en)

[origin: WO2020094183A1] The aim of the invention is to provide a method for purifying a raw gas stream containing water vapour, which method can be carried out simply and economically. This aim is achieved, according to the invention, in that the method comprises the following: feeding the raw gas stream to a reforming zone, in which contaminants contained in the raw gas stream react chemically with the water vapour contained in the raw gas stream, by which means a reformed raw gas stream is obtained; feeding the reformed raw gas stream and an oxidiser stream to an oxidation zone, in which constituents of the reformed raw gas stream react chemically with oxidisers of the oxidiser stream, by which means a pure gas stream is obtained. Optionally, control of the oxygen content is additionally provided. Furthermore, provision is optionally made for the pure gas stream to be fed to a condenser, by means of which the volume flow of the pure gas stream is reduced and/or by means of which energy is recovered and can be used for the oxidiser pre-heating and for other production processes.

IPC 8 full level

**F23G 7/06** (2006.01)

CPC (source: EP US)

**F23G 7/061** (2013.01 - EP US); **F23G 7/068** (2013.01 - EP US); **F23N 3/002** (2013.01 - US); **F28D 17/02** (2013.01 - US); **F23G 2201/40** (2013.01 - EP US); **F23G 2206/10** (2013.01 - EP US); **F23N 2241/18** (2020.01 - 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)

**DE 102018219105 A1 20200514**; BR 112021006652 A2 20210713; CL 2021001115 A1 20211119; CL 2022000728 A1 20221111; CN 113167469 A 20210723; DE 112019005585 A5 20210902; EP 3701191 A1 20200902; EP 3701191 B1 20220427; ES 2914423 T3 20220610; PT 3701191 T 20220519; US 2022003412 A1 20220106; WO 2020094183 A1 20200514

DOCDB simple family (application)

**DE 102018219105 A 20181108**; BR 112021006652 A 20191030; CL 2021001115 A 20210429; CL 2022000728 A 20220323; CN 201980073625 A 20191030; DE 112019005585 T 20191030; DE 2019100937 W 20191030; EP 19805884 A 20191030; ES 19805884 T 20191030; PT 19805884 T 20191030; US 201917291948 A 20191030