Title (en)

DEVICE AND PROCESS FOR PRODUCING AN AQUEOUS SOLUTION OF UREA

Title (de)

VORRICHTUNG UND VERFAHREN ZUR HERSTELLUNG EINER WÄSSRIGEN LÖSUNG AUS HARNSTOFF

Title (fr)

DISPOSITIF ET PROCÉDÉ DE PRODUCTION D'UNE SOLUTION AQUEUSE D'URÉE

Publication

EP 3481538 B1 20211229 (FR)

Application

EP 17734102 A 20170703

Priority

- FR 1656580 A 20160708
- EP 2017066491 W 20170703

Abstract (en)

[origin: WO2018007312A1] Device and process for producing an aqueous solution of urea. The production device comprises: - at least one device (26) for dissolving solid urea in demineralized water, comprising a tank (42) for receiving the solid urea and the demineralized water and an outlet (62) for recovering the aqueous solution of urea, - a solid urea storage station (2), - a device (14) for transporting the solid urea from the storage station (2) to the dissolving device (26), said transporting device (14) being arranged in order to pour solid urea into the tank (42) of the dissolving device (26). The dissolving device (26) comprises at least one nozzle (54) for injecting demineralized water into the solid urea, arranged in the vicinity of the bottom of the tank (42) in order to create water turbulence below the surface of the solid urea and to dissolve the solid urea in the demineralized water.

IPC 8 full level

B01F 1/00 (2006.01); **B01F 5/02** (2006.01); **B01F 5/10** (2006.01); **B01F 13/10** (2006.01); **B01F 15/02** (2006.01); **B65B 69/00** (2006.01)

CPC (source: EP US)

B01F 21/221 (2022.01 - EP US); **B01F 21/30** (2022.01 - US); **B01F 25/21** (2022.01 - EP US); **B01F 25/50** (2022.01 - EP US); **B01F 25/53** (2022.01 - US); **B01F 33/813** (2022.01 - EP US); **B01F 35/7131** (2022.01 - EP US); **B01F 35/7173** (2022.01 - EP US); **B65B 69/0033** (2013.01 - EP US); **B65B 69/0083** (2013.01 - EP US); B01F 2101/2204 (2022.01 - 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)

WO 2018007312 A1 20180111; BR 112019000256 A2 20190716; EP 3481538 A1 20190515; EP 3481538 B1 20211229; FR 3053603 A1 20180112; FR 3053603 B1 20210312; MX 2019000322 A 20190520; US 2019240627 A1 20190808

DOCDB simple family (application)

EP 2017066491 W 20170703; BR 112019000256 A 20170703; EP 17734102 A 20170703; FR 1656580 A 20160708; MX 2019000322 A 20170703; US 201716315822 A 20170703