

Title (en)
PLANT AND PROCESS FOR GENERATING BIOGAS FROM BIODEGRADABLE MATERIAL CONTAINING LIQUID AND SOLID COMPONENTS, IN PARTICULAR WASTE PRODUCTS, AND ALSO BIOGAS GENERATION CONTAINER FOR USE IN THE PLANT

Title (de)
ANLAGE UND VERFAHREN ZUR ERZEUGUNG VON BIOGAS AUS FLÜSSIGE UND FESTE BESTANDTEILE ENTHALTENDEM BIOLOGISCH ABBAUBAREN MATERIAL, INSBESONDERE ABFALLPRODUKTEN, SOWIE BIOGASERZEUGUNGSBEHÄLTER ZUR VERWENDUNG BEI DER ANLAGE

Title (fr)
INSTALLATION ET PROCEDE DE PRODUCTION DE BIOGAZ A PARTIR D'UN MATERIAU BIOLOGIQUEMENT DÉCOMPOSABLE QUI CONTIENT DES COMPOSANTS LIQUIDES ET DES COMPOSANTS SOLIDES, EN PARTICULIER DES PRODUITS DE REBUT, AINSI QUE RECIPIENT DE CREATION DE BIOGAZ DESTINE A ETRE UTILISE DANS L'INSTALLATION

Publication
EP 1966095 A1 20080910 (DE)

Application
EP 06829530 A 20061212

Priority

- EP 2006011948 W 20061212
- DE 102005059723 A 20051214
- DE 102006005859 A 20060209

Abstract (en)
[origin: WO2007068446A1] A plant for generating biogas from organic biodegradable material containing liquid and solid components, such as waste products, in particular liquid manure from agricultural enterprises, comprises a biogas generation container (9) having a feed for the degradable material and a biogas collection zone (6) having a biogas outlet, and a flotation separation unit having a microbubble generation unit (15) for separating off the solid components from the liquid components of the degradable material. The flotation separation unit comprises a chamber region (14) which is delimited in the interior of the biogas generation container and essentially active in the direction of gravity and having a closed bottom and an open upper end arranged below the liquid level of the biogas generation container. Clarified liquid from the chamber region and a gas, in particular the biogas from the biogas collection region, can be fed to the microbubble generation unit for charging the liquid with gas. The outlet of the microbubble generation unit is connected to an inlet (18) of the chamber region in order to recycle microbubble-forming clarified liquid to the chamber region. Near the bottom of the chamber region, an outlet (116) for clarified liquid from the chamber region is provided. The flotation separation takes place in the chamber region in countercurrent flow to the ascending microbubbles.

IPC 8 full level
C02F 3/28 (2006.01); **B03D 1/00** (2006.01); **C02F 1/24** (2006.01); **C02F 103/28** (2006.01)

CPC (source: EP)
B03D 1/02 (2013.01); **B03D 1/1431** (2013.01); **B03D 1/1462** (2013.01); **B03D 1/1493** (2013.01); **B03D 1/18** (2013.01); **B03D 1/24** (2013.01); **C02F 1/24** (2013.01); **C02F 3/282** (2013.01); **C02F 11/04** (2013.01); **C12M 21/04** (2013.01); **C12M 27/06** (2013.01); **C12M 29/04** (2013.01); **C12M 29/24** (2013.01); **C12M 45/04** (2013.01); **Y02E 50/30** (2013.01)

Citation (search report)
See references of WO 2007068446A1

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)
WO 2007068446 A1 20070621; CA 2628323 A1 20070621; EP 1966095 A1 20080910; RU 2008128492 A 20100120; RU 2383497 C1 20100310

DOCDB simple family (application)
EP 2006011948 W 20061212; CA 2628323 A 20061212; EP 06829530 A 20061212; RU 2008128492 A 20061212