

Title (en)

Double boiler with impeller for the production of a gaseous mixture

Title (de)

Doppelkessel mit Flügelrad zur Erzeugung eines Gasgemischs

Title (fr)

Chaudière double avec une palette d'agitation pour mélanger des gaz

Publication

EP 0913188 A3 20000426 (DE)

Application

EP 98120305 A 19981027

Priority

DE 29719197 U 19971029

Abstract (en)

[origin: EP0913188A2] A gas mixing vessel basically consists of two superimposed tanks with a rotating paddle wheel in the upper section. The dual tank is assembled from a number of components; (b) the basic upper tank section (1) has a flat surface (3) which is closed by an overhead cover plate (2) and seal; (c) a paddle wheel (14) rotates horizontally within the upper tank section (1) turned by a motor (21); (d) the motor (21) is linked to the paddle wheel (14) by a drive shaft (17); (e) the drive shaft (17) ends in the overhead cover plate (2) where it rests in a bearing, and has an intermediate bearing in the lower cover plate (11); (f) the lower cover plate (11) is secured to the lower part (6) of the dual tank by sealing surfaces (10,12); (g) different gases are introduced to the gas vessels via inlets (13) drilled in the lower cover plate (11); (g) the incoming gases enter the lower tank together with a carrier gas at increased pressure, and rise through a constriction (15) and inwards-directed passage (9) towards the rotating paddle wheel (14); (h) the gases are mixed by the paddle wheel and migrate into the free space (16) above the wheel; (i) mixed gases are discharged through outlets (18) in the upper plate (2).

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B01F 7/00; **B01F 7/22**

IPC 8 full level

B01F 5/12 (2006.01); **B01F 25/60** (2022.01)

CPC (source: EP)

B01F 25/60 (2022.01)

Citation (search report)

- [X] US 4594228 A 19860610 - LAMBERT JR JOSEPH M [US], et al
- [A] US 5240327 A 19930831 - NYMAN BROR G [FI], et al
- [A] US 4483624 A 19841120 - BACON JR FRANKLIN C [US], et al
- [A] EP 0465703 A1 19920115 - KANEGAFUCHI CHEMICAL IND [JP]

Cited by

WO0228520A1; KR100758258B1

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