

Title (en)

A HYBRID TUBE BUNDLE EVAPORATOR WITH AN IMPROVED SERVICE REFRIGERANT FLUID DISTRIBUTOR

Title (de)

HYBRIDROHRBÜNDELVERDAMPFER MIT EINEM KÄLTEMITTELFLUIDVERTEILER MIT VERBESSERTEM SERVICE

Title (fr)

ÉVAPORATEUR DE FAISCEAU DE TUBES HYBRIDE DOTÉ D'UN DISTRIBUTEUR DE FLUIDE RÉFRIGÉRANT DE SERVICE AMÉLIORÉ

Publication

EP 3748271 B1 20220824 (EN)

Application

EP 20175899 A 20200521

Priority

IT 201900008139 A 20190605

Abstract (en)

[origin: EP3748271A1] A tube bundle evaporator longitudinally extending along a horizontal axis, comprising a shell, a tube bundle housed inside said shell, a shell-side refrigerant fluid, a tube-side refrigerated fluid, a lower zone of said evaporator flooded by the refrigerant fluid in the liquid state and containing a first number of tubes of said tube bundle, comprising a service refrigerant fluid distributor positioned in an upper zone of said evaporator, comprising a plurality of distribution tubes provided with a plurality of lower longitudinal dispensing openings for dispensing the refrigerant fluid in the liquid state by free fall onto a second number of tubes of the tube bundle positioned outside said lower zone above said first number of tubes, said plurality of distribution tubes being longitudinally superposed on said second number of tubes of said tube bundle.

IPC 8 full level

F28D 7/16 (2006.01); **F25B 39/02** (2006.01); **F28D 3/04** (2006.01); **F28F 9/22** (2006.01)

CPC (source: EP)

F25B 39/028 (2013.01); **F28D 3/04** (2013.01); **F28D 7/16** (2013.01); **F28D 21/0017** (2013.01); **F28F 9/22** (2013.01); **F25B 2339/0242** (2013.01);
F28D 2021/0071 (2013.01); **F28F 2009/224** (2013.01); **F28F 2009/226** (2013.01)

Citation (examination)

EP 2807439 B1 20170823 - CARRIER CORP [US]

Cited by

IT202100029945A1; WO2023095025A1

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)

EP 3748271 A1 20201209; EP 3748271 B1 20220824

DOCDB simple family (application)

EP 20175899 A 20200521