

Title (en)
AIR CONDITIONER

Title (de)
KLIMAANLAGE

Title (fr)
CLIMATISEUR

Publication
EP 2631560 A4 20140430 (EN)

Application
EP 11834368 A 20111019

Priority
• JP 2010235855 A 20101020
• JP 2011073988 W 20111019

Abstract (en)
[origin: EP2631560A1] Control of a decompression structure is made easier. An air conditioner (1) is provided with a refrigerant circuit (10) for connecting an indoor unit (2) and an outdoor unit (3). The indoor unit (2) has: an indoor heat exchanger (20) provided in the interior thereof so as to face a fan (21); and a radiation panel (22) provided on the surface thereof. The cooling circuit (10) has: a principal channel (11) in which a decompression structure (34), an outdoor heat exchanger (32) and a compressor (30) are provided in order; a first channel (12) for, during heating operation, connecting a branching section (11a) provided downstream from the compressor (30) in the principal channel (11), and a merging section (11b) provided upstream from the decompression structure (34), and having the indoor heat exchanger (20) provided therein; and a second channel (13) for, during heating operation, connecting the branching section (11a) and the merging section (11b) in parallel with the first channel (12), and having the radiation panel (22) provided therein. In addition, a valve structure (23) is provided within the second channel (13).

IPC 8 full level
F24F 1/00 (2011.01); **F24F 1/0063** (2019.01); **F24F 1/0073** (2019.01); **F25B 1/00** (2006.01); **F25B 6/02** (2006.01); **F25B 13/00** (2006.01)

CPC (source: EP US)
F24F 1/0063 (2019.01 - EP US); **F24F 1/0073** (2019.01 - EP US); **F24F 5/0089** (2013.01 - EP); **F24F 11/30** (2017.12 - EP); **F24F 11/56** (2017.12 - EP US); **F24F 11/77** (2017.12 - EP US); **F24F 11/84** (2017.12 - EP US); **F24F 11/86** (2017.12 - EP US); **F25B 13/00** (2013.01 - EP); **F24F 2110/10** (2017.12 - EP); **F24F 2140/20** (2017.12 - EP); **F25B 2313/005** (2013.01 - EP); **F25B 2313/006** (2013.01 - EP); **F25B 2313/0213** (2013.01 - EP)

Citation (search report)
• [X] WO 2010106771 A1 20100923 - DAIKIN IND LTD [JP], et al
• [X] GB 2213962 A 19890823 - TOSHIBA KK [JP]
• [X] JP H05280762 A 19931026
• [A] JP H0533968 A 19930209 - SHARP KK
• See references of WO 2012053529A1

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 2631560 A1 20130828; **EP 2631560 A4 20140430**; **EP 2631560 B1 20191218**; AU 2011319038 A1 20130523; AU 2011319038 B2 20150409; CN 103168205 A 20130619; CN 103168205 B 20160224; ES 2776986 T3 20200803; JP 2012087998 A 20120510; JP 5187373 B2 20130424; WO 2012053529 A1 20120426

DOCDB simple family (application)
EP 11834368 A 20111019; AU 2011319038 A 20111019; CN 201180049916 A 20111019; ES 11834368 T 20111019; JP 2010235855 A 20101020; JP 2011073988 W 20111019