

Title (en)  
Refrigeration cycle apparatus

Title (de)  
Kältekreislaufvorrichtung

Title (fr)  
Appareil de circuit de réfrigération

Publication  
**EP 1983277 A3 20141119 (EN)**

Application  
**EP 08153996 A 20080403**

Priority  
• JP 2007110243 A 20070419  
• JP 2007301512 A 20071121

Abstract (en)  
[origin: EP1983277A2] A refrigeration cycle apparatus for effectively performing defrosting, in which a compressor (1), a four-way valve (11), a condenser (2), a throttling device (3), and an evaporator (4) are connected via pipes, including: discharge gas bypasses (31, 32, 33) for flowing a discharge refrigerant to at least one of a suction pipe (1b) of the compressor and an evaporator pipe (4a) for connecting the throttling device and the evaporator, from a discharge pipe (1a) for connecting the compressor and the four-way valve; and a refrigerant controller (40) capable of optionally flowing the discharge refrigerant to the discharge gas bypasses, wherein the discharge refrigerant of the compressor is partially passed through the discharge gas bypasses during defrosting in a heating operation, and a flow rate to the discharge gas bypasses is larger than a flow rate to the four-way valve.

IPC 8 full level  
**F25B 13/00** (2006.01); **F25B 47/02** (2006.01)

CPC (source: EP)  
**F25B 13/00** (2013.01); **F25B 47/022** (2013.01); **F25B 2313/02741** (2013.01); **F25B 2313/0315** (2013.01); **F25B 2700/2106** (2013.01)

Citation (search report)  
• [Y] JP S6291759 A 19870427 - MITSUBISHI ELECTRIC CORP  
• [Y] JP S6257038 U 19870409

Cited by  
CN107023950A; EP2623897A4; CN107152819A; EP2505941A4; CN113639491A; WO2018223927A1

Designated contracting state (EPC)  
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MT NL NO PL PT RO SE SI SK TR

Designated extension state (EPC)  
AL BA MK RS

DOCDB simple family (publication)  
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