

Title (en)
HYBRID CHILLER SYSTEM

Title (de)
HYBRIDES KÜHLERSYSTEM

Title (fr)
SYSTÈME HYBRIDE DE REFROIDISSEUR

Publication
EP 3604972 A1 20200205 (EN)

Application
EP 19185716 A 20190711

Priority
JP 2018142633 A 20180730

Abstract (en)
There is provided a hybrid chiller system in which a chiller system can be constructed and entrapment of a refrigerant in the chiller system can be prevented. The system includes a GHP outdoor unit 2 including a GHP compressor 13 to be driven by a gas engine 12, an EHP outdoor unit 3 including a compressor to be driven by a commercial power source, and a water heat exchanger 8 that exchanges heat between a refrigerant and cold and hot water that are sent from the GHP outdoor unit 2 and the EHP outdoor unit 3. This can construct the chiller system in which the water heat exchanger 8 exchanges heat with the cold and hot water by use of the GHP outdoor unit 2 and the EHP outdoor unit 3.

IPC 8 full level
F25B 27/00 (2006.01); **F25B 41/20** (2021.01); **F25B 49/02** (2006.01)

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F25B 13/00 (2013.01 - CN); **F25B 27/00** (2013.01 - EP); **F25B 29/003** (2013.01 - CN); **F25B 41/20** (2021.01 - CN); **F25B 49/02** (2013.01 - CN EP); **F25B 2313/003** (2013.01 - EP); **F25B 2313/004** (2013.01 - EP); **F25B 2313/02741** (2013.01 - CN); **F25B 2327/00** (2013.01 - EP); **F25B 2400/06** (2013.01 - EP); **F25B 2400/075** (2013.01 - EP); **F25B 2400/19** (2013.01 - CN)

Citation (applicant)
JP 2017150687 A 20170831 - PANASONIC IP MAN CORP

Citation (search report)
• [X] EP 3048376 A1 20160727 - LG ELECTRONICS INC [KR]
• [X] EP 3217121 A1 20170913 - PANASONIC IP MAN CO LTD [JP]
• [X] WO 2014065548 A1 20140501 - LG ELECTRONICS INC [KR]
• [X] US 2008034777 A1 20080214 - COPELAND LARRY [US], et al
• [X] EP 1288592 A2 20030305 - MITSUBISHI HEAVY IND LTD [JP]

Cited by
CN116033726A

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

Designated extension state (EPC)
BA ME

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DOCDB simple family (application)
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