

Title (en)

Multi-unit air conditioner and method for controlling the same

Title (de)

Mehrzonenklimaanlage und Verfahren zur Steuerung derselben

Title (fr)

Conditionneur d'air comprenant plusieurs unités et procédé de commande de celui-ci

Publication

EP 1526341 A1 20050427 (EN)

Application

EP 04250231 A 20040117

Priority

KR 20030073328 A 20031021

Abstract (en)

An air conditioner having an outdoor unit (100) and a plurality of indoor units (200a-d) connected to the outdoor unit (100), and a method of controlling an operation of the air conditioner. The air conditioner includes an outdoor control unit (120) and a plurality of indoor control units (210a-d). The indoor control units (210a-d) output operational loads to be borne by the indoor units (200a-d), and the outdoor control unit (120) controls an opening ratio of an outdoor expansion valve (102) in response to the operational loads to be borne by the indoor units (200a-d), thus appropriately controlling the amounts of refrigerant fed from compressors (103a/b) to indoor units (200a-d) operating in a cooling mode and indoor units (200a-d) operating in a heating mode. The outdoor control unit (120) further determines a desired compression capacity of the compressors (103a/b) according to outdoor air temperatures, and controls the rpm of an outdoor fan (113) according to an output refrigerant pressure of the compressors (103a/b), thus optimally operating the compressors (103a/b) in response to variations in the outdoor air temperatures.

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