

Title (en)

ARRANGEMENT FOR VENTILATING A ROOM, IN PARTICULAR A LABORATORY ROOM

Title (de)

ANORDNUNG ZUR BELÜFTUNG EINES RAUMS, INSBESONDERE EINES LABORRAUMS

Title (fr)

SYSTÈME DE VENTILATION D'UNE PIÈCE, NOTAMMENT D'UN LABORATOIRE

Publication

EP 2614196 A1 20130717 (DE)

Application

EP 11749743 A 20110827

Priority

- DE 102010044590 A 20100907
- EP 2011004314 W 20110827

Abstract (en)

[origin: WO2012031700A1] An arrangement for ventilating a room (2), in particular a laboratory room with an aisle region (4) bounded to both sides by worktables (6a, 6b), comprising a supply air duct (8) arranged above the aisle region (4) for delivering fresh air into the room (2) and, arranged above said supply air duct, an exhaust air duct (14) for discharging exhaust air from the room (2), wherein the supply air duct (8) has a multiplicity of air outlet openings (10a, 10b) from which the supply air exits above the aisle region (4), said arrangement being characterized in that the supply air duct (8) comprises two lateral air delivery portions (8a, 8b) which extend along the aisle region (4) and which each comprise a multiplicity of circular air outlet openings (10a, 10b) from which the supply air exits laterally in the direction of the worktables (6a, 6b), in that a substantially airtight central separating portion (8c) is provided and separates the first and the second air delivery portion (8a, 8b) from one another, and in that the exhaust air duct (14) comprises two slot-like suction openings (14a, 14b) which extend substantially parallel to the supply air duct (8) and which are arranged in the region of the ceiling (16) of the room (2) in such a way that there is formed on both sides of the aisle region (4) a rolling air flow (18a, 18b) via which supply air heated in the region of the worktables (6a, 6b) passes in a vertical direction into the region (28) of the ceiling (16) of the room (2).

IPC 8 full level

E04B 9/00 (2006.01); **E04B 9/02** (2006.01); **F24F 7/08** (2006.01); **F24F 13/068** (2006.01)

CPC (source: EP US)

E04B 9/006 (2013.01 - EP US); **E04B 9/02** (2013.01 - EP US); **F24F 7/08** (2013.01 - EP US); **F24F 13/062** (2013.01 - US); **F24F 13/068** (2013.01 - EP US); **F24F 2013/0608** (2013.01 - EP US); **F24F 2221/14** (2013.01 - EP US)

Citation (search report)

See references of WO 2012031700A1

Cited by

EP3805653A4

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)

DE 102010044590 A1 20120308; **DE 102010044590 B4 20220421**; DK 2614196 T3 20171023; EP 2614196 A1 20130717; EP 2614196 B1 20170712; US 2013210336 A1 20130815; US 9759444 B2 20170912; WO 2012031700 A1 20120315

DOCDB simple family (application)

DE 102010044590 A 20100907; DK 11749743 T 20110827; EP 11749743 A 20110827; EP 2011004314 W 20110827; US 201113821060 A 20110827