

Title (en)

TWO-PHASE HEAT-TRANSFER DEVICE WITH LIQUID OVERFLOW TANK

Title (de)

ZWEIPHASIGE WÄRMEÜBERTRAGUNGSVORRICHTUNG MIT FLÜSSIGKEITSÜBERLAUFTANK

Title (fr)

DISPOSITIF DIPHASIQUE DE TRANSFERT DE CHALEUR À RÉSERVOIR D'EXCÉDENT DE LIQUIDE

Publication

**EP 4323711 A1 20240221 (FR)**

Application

**EP 22814485 A 20221007**

Priority

- FR 2110636 A 20211007
- FR 2022051900 W 20221007

Abstract (en)

[origin: WO2023057730A1] Disclosed is a two-phase heat-transfer device, said device comprising a closed cavity comprising at least one evaporation zone (20) subjected to heat exchange with at least one heat source and at least one condensation zone (30) subjected to heat exchange with at least one cold source, the closed cavity containing a two-phase fluid with a liquid-steam balance and comprising at least one channel (13) for circulating the two-phase fluid in the steam phase and at least one main capillary structure (14) suitable for allowing the two-phase fluid to circulate in the liquid phase between the cold source and the heat source, the two-phase device being characterised in that it further comprises at least one additional capillary medium (15) for storing and restoring excess liquid relative to a maximum capacity of liquid contained in the main capillary structure, the additional capillary structure and the main capillary structure being connected to each other so as to ensure capillary continuity for the two-phase fluid in the liquid phase.

IPC 8 full level

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CPC (source: EP)

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Designated contracting state (EPC)

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Designated extension state (EPC)

BA

Designated validation state (EPC)

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DOCDB simple family (publication)

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DOCDB simple family (application)

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