

Title (en)  
HEAT TRANSFER DEVICE

Publication  
**EP 0048873 A3 19820901 (DE)**

Application  
**EP 81107194 A 19810911**

Priority  
DE 3036334 A 19800926

Abstract (en)  
[origin: EP0048873A2] 1. Heat transfer device for the transfer of heat between two flowing media which are separated from each other by heat transfer surfaces, in which the heat transfer surfaces are formed as at least two tubes (2) arranged in a tubular jacket (1) and through each of these tubes there extends at least one conduit tube (3) such that a clearance space (13) is formed between each conduit tube and the inner wall surface of the associated tube, and in which both the tubular jacket and also the conduit tubes are connected to each other by way of a distributing chamber (10) for a first medium on the one hand and a collector (15) for the first medium on the other hand, said distributing chamber and collector being separated respectively from a distributing chamber (5a) and collecting chamber (5) for a second medium connecting the tubes and the clearance spaces to each other, characterised in that the tubular jacket (1) and the tubes (2) which are arranged therein and which each surround a conduit tube (3) each have a rectangular cross-section and each conduit tube (3) has a circular cross-section, and, both in the clearance space (30) formed between the outer wall surfaces of the tubes (2) and also in the clearance space (14) formed between the outer wall surfaces of the tubes (2) and the inner wall surface of the tubular jacket (1), there are arranged flow-guiding devices (12) in the form of meander wires having a thickness corresponding to the effective width of the clearance spaces (14, 30).

IPC 1-7  
**F28D 7/10**

IPC 8 full level  
**F28D 7/10** (2006.01)

CPC (source: EP)  
**F28D 7/106** (2013.01)

Citation (search report)

- [X] DE 2143276 A1 19730315 - PARCA WAERMEPRODUKTE GMBH
- [X] US 2633338 A 19530331 - HIRSCH FREDERICK A
- [X] DE 44091 C
- [A] DE 2029910 A1 19710107
- [A] DE 2819777 A1 19781123 - PRESSURE VESSELS INC
- [A] FR 1501741 A 19671118 - ENGLISH ELECTRIC CO LTD
- [A] DE 1117148 B 19611116 - GEA LUFTKUEHLER HAPPEL GMBH

Cited by  
CN110608623A

Designated contracting state (EPC)  
AT BE CH DE FR GB IT LI LU NL SE

DOCDB simple family (publication)  
**EP 0048873 A2 19820407; EP 0048873 A3 19820901; EP 0048873 B1 19840613**; AT E7960 T1 19840615; DE 3036334 A1 19820729; DE 3036334 C2 19850912; DE 3164193 D1 19840719

DOCDB simple family (application)  
**EP 81107194 A 19810911**; AT 81107194 T 19810911; DE 3036334 A 19800926; DE 3164193 T 19810911