

Title (en)  
Heat exchanger tube

Title (de)  
Wärmetauscherrohr

Title (fr)  
Tube d'échangeur de chaleur

Publication  
**EP 1033547 A3 20001004 (DE)**

Application  
**EP 00103870 A 20000224**

Priority  
DE 19909368 A 19990303

Abstract (en)  
[origin: DE19909368C1] Inner and outer tubes form the heat exchanger tube, at least one tube having rib type formations which in turn form a screw-line flow channel over the axial length for a product to be heated or cooled. The rib type formations have comb surfaces and the inner and outer tubes are separable from one another by axial relative movement. The comb surfaces (14,17) of opposing rib type formations of the inner and outer tubes (12,13) have a gap (24) between them provided for a short circuit flow, whilst the main product flow occurs through the flow channel.

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

IPC 8 full level  
**F28D 7/02** (2006.01); **F28D 7/10** (2006.01)

CPC (source: EP US)  
**F28D 7/022** (2013.01 - EP US); **F28D 7/026** (2013.01 - EP US); **F28D 7/103** (2013.01 - EP US)

Citation (search report)

- [X] US 1005441 A 19111010 - LOVEKIN LUTHER D [US]
- [X] BE 670481 A 19660131
- [A] FR 1158943 A 19580620 - CHANTIERS DE LATLANTIQUE
- [A] GB 394643 A 19330629 - SARC SA DE REPRESENTATION ET D
- [A] DE 29500063 U1 19951221 - ERENER MURAT [DE]
- [A] DE 203201 C
- [A] DE 3320956 A1 19841213 - KABELMETAL ELECTRO GMBH [DE]
- [A] US 4351389 A 19820928 - GUARNASCHELLI STEPHEN

Designated contracting state (EPC)  
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE

DOCDB simple family (publication)  
**DE 19909368 C1 20000810**; EP 1033547 A2 20000906; EP 1033547 A3 20001004; JP 2000297991 A 20001024; US 6220344 B1 20010424

DOCDB simple family (application)  
**DE 19909368 A 19990303**; EP 00103870 A 20000224; JP 2000102806 A 20000229; US 51845000 A 20000303