

Title (en)
HEAT EXCHANGE PIPE AND MANUFACTURING METHOD THEREOF

Title (de)
WÄRMETAUSCHERROHR UND HERSTELLUNGSVERFAHREN DAFÜR

Title (fr)
TUYAU D'ÉCHANGE DE CHALEUR ET MÉTHODE DE FABRICATION DE CELUI-CI

Publication
EP 2781873 B1 20191002 (EN)

Application
EP 12850007 A 20120119

Priority
• KR 20110118184 A 20111114
• KR 2012000466 W 20120119

Abstract (en)
[origin: EP2781873A1] The present invention pertains to a heat exchanger pipe and a manufacturing method thereof, wherein heat exchange is carried out between fluid which flows along the inside of a pipe and fluid which exists outside the pipe. In particular, the flow of the fluid flowing in the pipe becomes more active and the amount of contact is increased so as to improve heat exchange efficiency. Furthermore, the manufacturing of the heat exchanger pipe is simple while the contact characteristics and sealing characteristics between an outer pipe and an object to be inserted into the inside of the outer pipe are improved.

IPC 8 full level
F28F 1/40 (2006.01); **B21C 37/22** (2006.01); **F28D 15/02** (2006.01); **F28F 1/10** (2006.01); **F28F 21/08** (2006.01)

CPC (source: EP KR)
B21C 37/225 (2013.01 - EP); **B21D 53/06** (2013.01 - KR); **F28F 1/02** (2013.01 - EP); **F28F 1/10** (2013.01 - KR); **F28F 1/40** (2013.01 - EP); **F28F 13/06** (2013.01 - KR); **F28F 21/082** (2013.01 - EP); **F28F 21/084** (2013.01 - EP); **F28F 2215/04** (2013.01 - EP); **F28F 2215/10** (2013.01 - EP); **F28F 2255/16** (2013.01 - EP); **F28F 2275/14** (2013.01 - EP)

Cited by
CN105546848A; EP3040638A1; AU2016204398B2; US9739503B2; EP3301378A1

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)
EP 2781873 A1 20140924; **EP 2781873 A4 20151007**; **EP 2781873 B1 20191002**; CN 103477178 A 20131225; CN 103477178 B 20150930; KR 101287707 B1 20130807; KR 20130052869 A 20130523; RU 2561802 C1 20150910; WO 2013073741 A1 20130523

DOCDB simple family (application)
EP 12850007 A 20120119; CN 201280018729 A 20120119; KR 20110118184 A 20111114; KR 2012000466 W 20120119; RU 2013146202 A 20120119