

Title (en)
Water heater

Title (de)
Warmwasser-Heizgerät

Title (fr)
Chauffe-eau

Publication
EP 0990861 A3 20020807 (DE)

Application
EP 99118879 A 19990924

Priority
DE 19844856 A 19980930

Abstract (en)
[origin: EP0990861A2] The heater has a heat exchanger (7) heated by a burner (4), which is connected to a cold water intake (12) and a hot water outlet (13). A regulator controlling the fuel supply to the burner is connected to a flow sensor (1) in the cold water intake, and a temperature sensor (11) in the hot water outlet. A bypass channel (17) is positioned in front of the flow sensor in flow direction, between intake and outlet. Flow limiters (15,14) are positioned in the bypass channel and a heater circuit (5,10) containing the heat exchanger.

IPC 1-7
F24H 9/20

IPC 8 full level
F24H 9/20 (2006.01)

CPC (source: EP US)
F24H 9/2035 (2013.01 - EP US); **F24H 15/219** (2022.01 - EP US); **F24H 15/238** (2022.01 - EP US); **F24H 15/36** (2022.01 - EP US)

Citation (search report)

- [Y] US 4501261 A 19850226 - TSUTSUI OSAMU [JP], et al
- [YD] DE 3805441 A1 19880915 - STIEBEL ELTRON GMBH & CO KG [DE]
- [AD] DE 4308770 A1 19930930 - RINNAI KK [JP]
- [Y] PATENT ABSTRACTS OF JAPAN vol. 015, no. 441 (M - 1177) 11 November 1991 (1991-11-11)

Cited by
EP1310736A3; EP1063481A3; ITMI20110245A1; EP1063475A3; US2011174463A1; WO0179733A1; WO2009136211A3; TWI557383B

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)
EP 0990861 A2 20000405; EP 0990861 A3 20020807; EP 0990861 B1 20051116; DE 19844856 C1 20000518; DE 59912798 D1 20051222;
ES 2252901 T3 20060516

DOCDB simple family (application)
EP 99118879 A 19990924; DE 19844856 A 19980930; DE 59912798 T 19990924; ES 99118879 T 19990924