

Title (en)
METALLURGICAL VESSEL COMPRISING A TAPPING DEVICE AND METHOD FOR THE CONTROLLED, SLAG-FREE EXTRACTION OF
MOLTEN METAL FROM SAID VESSEL

Title (de)
METALLURGISCHES GEFÄSS MIT EINER ABSTICHVORRICHTUNG UND VERFAHREN ZUM KONTROLLIERTEN, SCHLACKENFREIEN
ABZIEHEN VON FLÜSSIGEM METALL AUS DIESEM GEFÄSS

Title (fr)
CUVE METALLURGIQUE DOTÉE D'UN DISPOSITIF DE COULÉE ET PROCÉDE DE SOUTIRAGE COMMANDE ET SANS SCORIES DE METAL
LIQUIDE DE CETTE CUVE

Publication
EP 1181491 B1 20030806 (DE)

Application
EP 00925154 A 20000331

Priority
• DE 19914982 A 19990401
• DE 19919378 A 19990428
• EP 0002903 W 20000331

Abstract (en)
[origin: US6596221B1] In a metallurgical vessel (1) having a tapping apparatus (5) for the slag-free withdrawal of liquid metal (3) from a molten metal bath (3) which is disposed in the vessel (1), a first leg (11) of a discharge duct (10) passes through the refractory vessel wall (15) and an overflow edge (14) in the connecting region of the two legs (11, 12) of the discharge duct (10) is higher than the upper edge (18) of the inlet opening (17) of the discharge duct. The molten metal (3) in the discharge duct is preferably inductively heatable.

IPC 1-7
F27D 3/14; F27B 3/19

IPC 8 full level
F27B 3/08 (2006.01); **B22D 11/10** (2006.01); **B22D 11/113** (2006.01); **B22D 39/00** (2006.01); **B22D 41/14** (2006.01); **C21C 5/46** (2006.01); **F27B 3/06** (2006.01); **F27B 3/19** (2006.01); **F27B 3/20** (2006.01); **F27B 3/28** (2006.01); **F27D 3/14** (2006.01); **F27D 3/15** (2006.01); **F27D 11/08** (2006.01); **F27D 3/00** (2006.01); **F27D 9/00** (2006.01)

CPC (source: EP US)
B22D 11/10 (2013.01 - EP US); **B22D 11/113** (2013.01 - EP US); **B22D 39/003** (2013.01 - EP US); **B22D 41/14** (2013.01 - EP US); **C21C 5/46** (2013.01 - EP US); **F27B 3/19** (2013.01 - EP US); **F27D 3/159** (2013.01 - EP US); **F27D 9/00** (2013.01 - EP US); **F27D 2003/0056** (2013.01 - EP US)

Cited by
DE102013219682A1; DE102013219686A1; CN102735066A; US5537934A; WO2015043900A1; DE102008008033A1; WO2015043910A1; EP4311994A1; WO2024023095A1

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)
US 6596221 B1 20030722; AT E246791 T1 20030815; AU 4397300 A 20001023; AU 763426 B2 20030724; BR 0009479 A 20020219; CA 2367997 A1 20001012; CA 2367997 C 20070109; CN 1187566 C 20050202; CN 1345409 A 20020417; CZ 20013496 A3 20021016; CZ 297606 B6 20070207; EA 003075 B1 20021226; EA 200101018 A1 20020425; EP 1181491 A1 20020227; EP 1181491 B1 20030806; ES 2204571 T3 20040501; JP 2002541422 A 20021203; MX PA01009780 A 20020514; PL 193887 B1 20070330; PL 350411 A1 20021202; TR 200102772 T2 20020422; WO 0060297 A1 20001012

DOCDB simple family (application)
US 93773401 A 20010928; AT 00925154 T 20000331; AU 4397300 A 20000331; BR 0009479 A 20000331; CA 2367997 A 20000331; CN 00805743 A 20000331; CZ 20013496 A 20000331; EA 200101018 A 20000331; EP 0002903 W 20000331; EP 00925154 A 20000331; ES 00925154 T 20000331; JP 2000609752 A 20000331; MX PA01009780 A 20000331; PL 35041100 A 20000331; TR 200102772 T 20000331