

Title (en)
MORTAR MIXING PUMP

Title (de)
MÖRTELMISCHPUMPE

Title (fr)
POMPE DE MELANGE DE MORTIER

Publication
EP 1603720 A1 20051214 (DE)

Application
EP 04718929 A 20040310

Priority
• EP 2004002458 W 20040310
• DE 10311342 A 20030314

Abstract (en)
[origin: WO2004080676A1] The invention relates to a mortar mixing pump (10) comprising a motor driven conveying screw (14) which guides material which is to be mixed into a mixing chamber (18) which is provided with a lining (52) made of rubber and plastic, said material being arranged at least in an essentially coaxial manner in relation to the conveying screw (14). The liquid can be fed through one or several liquid injection nozzles. A mixing element (36), which rotates with the conveying screw (14), is received in the mixing chamber (18) in order to mix the material conveyed into the mixing chamber (18) with liquid. The end of the mixing chamber which is arranged at a distance from the conveying screw (14) is defined by a specific pump flange (20) for connection to the pump (22). In order to improve the entire operating manner, especially to reduce each deposition of material, and to simplify purification, the conveying screw (14) is arranged in a funnel (12) which is used to fill the material which is to be mixed. The mixing chamber (18) is configured as a component which is separate from the funnel (12) and the pump flange (20) and which is connected to the funnel (12). The lining (52) of the mixing chamber (18) is in direct contact with the funnel (12) and with the surface of the pump flange (20), and a plurality of liquid injection nozzles (6) are received in a nozzle carrier (60) which is arranged in a recess of the lining (52) in an at least approximately flush manner with the inner surface of the lining (52) and which can be detachably fixed to the outside of the mixing chamber (18) by means of accessible fixing means.

IPC 1-7
B28C 5/14; **B01F 15/00**; **B01F 7/02**

IPC 8 full level
B01F 7/00 (2006.01); **B01F 7/02** (2006.01); **B01F 15/00** (2006.01); **B01F 15/02** (2006.01); **B28C 5/08** (2006.01); **B28C 5/12** (2006.01); **B28C 7/12** (2006.01)

CPC (source: EP KR)
B01F 27/053 (2022.01 - EP); **B01F 27/2123** (2022.01 - EP); **B01F 27/62** (2022.01 - EP); **B01F 35/511** (2022.01 - EP KR); **B01F 35/71731** (2022.01 - EP); **B28C 5/0862** (2013.01 - EP KR); **B28C 5/1292** (2013.01 - EP KR); **B28C 5/14** (2013.01 - KR); **B28C 7/126** (2013.01 - EP KR); **F04C 2/107** (2013.01 - EP); **F04C 11/006** (2013.01 - EP)

Citation (search report)
See references of WO 2004080676A1

Cited by
CN106182424A; CN106182430A

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IT LI LU MC NL PL PT RO SE SI SK TR

DOCDB simple family (publication)
WO 2004080676 A1 20040923; AT E331596 T1 20060715; DE 10311342 B3 20040826; DE 502004000888 D1 20060810; DK 1603720 T3 20060731; EP 1603720 A1 20051214; EP 1603720 B1 20060628; JP 2006523149 A 20061012; JP 4708328 B2 20110622; KR 100963999 B1 20100615; KR 20050114613 A 20051206

DOCDB simple family (application)
EP 2004002458 W 20040310; AT 04718929 T 20040310; DE 10311342 A 20030314; DE 502004000888 T 20040310; DK 04718929 T 20040310; EP 04718929 A 20040310; JP 2006504623 A 20040310; KR 20057014189 A 20040310