

Title (en)

INSERTABLE TOOL AND TOOL HOLDER FOR DRILLING AND/OR IMPACTING ELECTRIC MACHINES

Title (de)

EINSATZWERKZEUG UND WERKZEUGHALTER FÜR ELEKTRISCHE MASCHINEN MIT BOHR- UND/ODER SCHLAGBETRIEB

Title (fr)

OUTIL INSERABLE ET PORTE-OUTIL POUR MACHINES ELECTRIQUES A PERCER ET/OU PERCUTANTES

Publication

**EP 0854773 B1 20030409 (DE)**

Application

**EP 96945347 A 19961001**

Priority

- DE 9601889 W 19961001
- DE 19539414 A 19951012
- DE 19604284 A 19960207

Abstract (en)

[origin: US5984596A] PCT No. PCT/DE96/01889 Sec. 371 Date Apr. 13, 1998 Sec. 102(e) Date Apr. 13, 1998 PCT Filed Oct. 1, 1996 PCT Pub. No. WO97/13602 PCT Pub. Date Apr. 17, 1997A combination of an insertable tool (2), e.g. a drill or chisel, for an electrical machine for drilling and/or impact operation and a tool holder (20) for the insertable tool is disclosed. The insertable tool includes a tool shaft (11) provided with a round core cross section (1) not weakened or reduced at any point along the tool shaft (11) up to an inserted tool shaft end. The tool shaft has longitudinal struts (6) for torque transmission and axial guidance extending beyond the round core cross section (1) and the longitudinal struts (6) are shaped to merge with the core cross section in front of a cylindrical end portion (3). The tool holder (20) has a receiving sleeve (21) including a front portion (21a) for sealing and guidance of the tool shaft (11) and another portion (21b) including radially inwardly protruding longitudinal cleats (25) engagable between the longitudinal struts (6) for rotary driving of the insertable tool (2), an impact bolt (24) arranged for impact on the tool shaft (11) of the insertable tool (2) and at least one locking body (23) arranged between two adjacent longitudinal cleats (25) so that the at least one locking body (23) is radially movable between a locking position locking the insertable tool (2) in the receiving sleeve (21) and another position in which the insertable tool is released from the receiving sleeve.

IPC 1-7

**B25D 17/08**

IPC 8 full level

**B23B 45/02** (2006.01); **B23B 45/16** (2006.01); **B25D 17/08** (2006.01); **B28D 1/14** (2006.01)

CPC (source: EP US)

**B25D 17/088** (2013.01 - EP US); **B25D 2217/0003** (2013.01 - EP US); **B25D 2217/0034** (2013.01 - EP US); **B25D 2217/0038** (2013.01 - EP US); **B25D 2217/0042** (2013.01 - EP US); **Y10T 279/17068** (2015.01 - EP US); **Y10T 279/17752** (2015.01 - EP US); **Y10T 408/907** (2015.01 - EP US); **Y10T 408/953** (2015.01 - EP US)

Cited by

DE102018220545A1

Designated contracting state (EPC)

AT CH DE DK ES FR GB IT LI NL SE

DOCDB simple family (publication)

**WO 9713602 A2 19970417**; **WO 9713602 A3 19970509**; AT E236764 T1 20030415; BR 9610916 A 19990928; CN 1060713 C 20010117; CN 1199358 A 19981118; DE 59610334 D1 20030515; EP 0854773 A2 19980729; EP 0854773 B1 20030409; JP 2000501031 A 20000202; RU 2189305 C2 20020920; TW 350801 B 19990121; US 5984596 A 19991116

DOCDB simple family (application)

**DE 9601889 W 19961001**; AT 96945347 T 19961001; BR 9610916 A 19961001; CN 96197570 A 19961001; DE 59610334 T 19961001; EP 96945347 A 19961001; JP 51461997 A 19961001; RU 98108541 A 19961001; TW 85112405 A 19961011; US 5142298 A 19980413