

Title (en)

Device for honing shafts, particularly crankshafts

Title (de)

Vorrichtung für die Feinschleifbearbeitung von Wellen, insbesondere Kurbelwellen

Title (fr)

Dispositif pour le rodage d'arbres, en particulier de vilebrequins

Publication

EP 0802017 B1 19991027 (DE)

Application

EP 97101583 A 19970201

Priority

US 1562996 P 19960419

Abstract (en)

[origin: EP0802017A1] The bearing sections of the shaft eg. crankshaft journals, are fine finished by pressing a grinding belt onto the rotating shaft (2) using a profiled pressure block (1). This has a central pressure area (10) and two lateral hydraulic pressure elements to maintain the side pressure on the area between the work area and the side flanges (4). This pressure is maintained while the central part of the block oscillates to ensure a fine finish. The lateral hydraulic pressure is provided by two hydraulic chambers (7,8) linked by a cross duct to equalise pressures. The hydraulic chambers are bounded by elastic walls which contour the fine finish area into the side flanges.

IPC 1-7

B24B 5/42; B24B 21/02

IPC 8 full level

B24B 5/42 (2006.01); **B24B 21/02** (2006.01); **B24B 35/00** (2006.01)

CPC (source: EP US)

B24B 5/42 (2013.01 - EP US); **B24B 21/02** (2013.01 - EP US); **B24B 35/00** (2013.01 - EP US)

Cited by

DE102015008814A1; WO2019115323A1; DE102015122189A1; DE10259137A1; DE10259137B4; EP1447170A1; US7794306B2;
US10589396B2; EP3181293A1

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DE FR GB

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