

Title (en)

BOTTOM TOOL OF A PRESS BRAKE AND A PRESS BRAKE

Title (de)

UNTERWERKZEUG EINER ABKANTPRESSE UND ABKANTPRESSE

Title (fr)

OUTIL INFÉRIEUR D'UNE PRESSE PLIEUSE ET PRESSE PLIEUSE

Publication

EP 4176987 A1 20230510 (EN)

Application

EP 22203721 A 20221026

Priority

FI 20216143 A 20211105

Abstract (en)

A bottom tool (7) of a press brake (1), comprising: a lower frame (8), two movable upper frames (9) arranged over the lower frame (8), between which upper frames there is an elongate slot (10) with a bending axis (15) about which a plate for press-brake bending is arranged to be bent during the press-brake bending, and a moving mechanism (12) for moving the upper frames (9) toward each other and away from each other to change the width of the slot (10). The moving mechanism (12) comprises, in connection with each upper frame (9), a first wedge row (13) with wedges (14) arranged one after another, their front faces (14.1) fastened to the upper frame (9) and their back faces (14.2) being inclined relative to the bending axis (15) of the slot (10), and a second wedge row (16) with wedges (17) arranged one after another, their front faces (17.1) being inclined relative to the bending axis (15) of the slot (10) and which front faces (17.1) are arranged against the back faces (14.2) of the wedges (14) of the first wedge row (13). The moving mechanism (12) comprises a moving device (18) for moving the second wedge rows (16) parallel to the bending axis (15). On the inclined back faces (14.2) of the wedges (14) of the first wedge rows (13) there are stepped ridges (21), and on the inclined front faces (17.1) of the wedges (17) of the second wedge rows (16) there are stepped ridges (21) arranged to be supported to the ridges (21) of the wedges (14) of the first wedge rows (13).

IPC 8 full level

B21D 5/02 (2006.01); **B21D 37/02** (2006.01)

CPC (source: EP FI)

B21D 5/02 (2013.01 - EP); **B21D 5/0209** (2013.01 - EP FI); **B21D 5/0272** (2013.01 - FI); **B21D 5/14** (2013.01 - FI); **B21D 37/02** (2013.01 - EP)

Citation (search report)

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- [Y] US 5103665 A 19920414 - VAN MERKSTEIJN JACOBUS L [NL]
- [Y] US 6018979 A 20000201 - DAVIS STEPHEN B [US]
- [A] CN 201832897 U 20110518 - ANHUI LIANMENG MOULD IND CO LTD

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC ME MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA

Designated validation state (EPC)

KH MA MD TN

DOCDB simple family (publication)

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DOCDB simple family (application)

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