

Title (en)

TOOL AND MACHINE TOOL AND METHOD FOR MACHINING PLANAR WORKPIECES

Title (de)

WERKZEUG UND WERKZEUGMASCHINE SOWIE VERFAHREN ZUR BEARBEITUNG VON PLATTENFÖRMIGEN WERKSTÜCKEN

Title (fr)

OUTIL ET MACHINE-OUTIL AINSI QUE PROCÉDÉ POUR USINER DES PIÈCES EN FORME DE PANNEAUX

Publication

EP 3515618 A1 20190731 (DE)

Application

EP 17777003 A 20170926

Priority

- DE 102016118175 A 20160926
- DE 102016119457 A 20161012
- EP 2017074286 W 20170926

Abstract (en)

[origin: WO2018055180A1] The invention relates to a tool and to a machine tool and to a method for machining planar workpieces (10), in particular metal sheets, having an upper tool (11) and a lower tool (9), which can be moved toward each other in a reciprocation direction in order to machine the workpiece (10) arranged therebetween, the upper tool (11) having a clamping shaft (34) and a main body (33), which lie on a common positioning axis (35), and having a tool body (39), which is arranged opposite the clamping shaft (34) on the main body (33) and which has a bending edge (38), the lower tool (9) having a main body (41), which holds a rotary body (52), which can be rotated about an axis of rotation (54) extending toward the bending edge (38) of the tool body (39), wherein the main body (33) of the upper tool (11) forms a projection surface (P) as viewed perpendicularly to the positioning axis (35) in the reciprocation direction and the bending edge (38) of the tool body (39) tangentially adjoins the projection surface (P) or is provided outside of the projection surface (P).

IPC 8 full level

B21D 5/04 (2006.01); **B21D 19/08** (2006.01)

CPC (source: EP US)

B21D 5/042 (2013.01 - EP US); **B21D 19/086** (2013.01 - EP US); **B21D 35/001** (2013.01 - EP US)

Citation (search report)

See references of WO 2018055180A1

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 MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)

BA ME

DOCDB simple family (publication)

WO 2018055180 A1 20180329; CN 109789465 A 20190521; CN 109789465 B 20220211; EP 3515618 A1 20190731; EP 3515618 B1 20200701; PL 3515618 T3 20201214; US 11219936 B2 20220111; US 2019217362 A1 20190718

DOCDB simple family (application)

EP 2017074286 W 20170926; CN 201780058765 A 20170926; EP 17777003 A 20170926; PL 17777003 T 20170926; US 201916364398 A 20190326