

Title (en)
METHOD FOR PRODUCING A SHAPED PART

Title (de)
VERFAHREN ZUR HERSTELLUNG EINES FORMTEILS

Title (fr)
PROCÉDÉ DE FABRICATION D'UNE PIÈCE MOULÉE

Publication
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Application
EP 10718421 A 20100419

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Abstract (en)
[origin: EP2248926A1] The method for producing a shaped part (1) from an aluminum sheet (2) comprising aluminum alloy of the 5000 series, comprises introducing the aluminum sheet in a forming tool, cold-forming the aluminum sheet, heating the cold-formed aluminum sheet once in some regions, and then subjecting the heated aluminum sheet to a further formation step yet before reaching a temperature which has the aluminum sheet during its cold-forming. The aluminum sheet is formed into a partial form of the shaped part by cold forming and into the final form of the shaped part by the further formation. The method for producing a shaped part (1) from an aluminum sheet (2) comprising aluminum alloy of the 5000 series, comprises introducing the aluminum sheet in a forming tool, cold-forming the aluminum sheet, heating the cold-formed aluminum sheet once in some regions, and then subjecting the heated aluminum sheet to a further formation step yet before reaching a temperature which has the aluminum sheet during its cold-forming. The aluminum sheet is formed into a partial form of the shaped part by cold forming and into the final form of the shaped part by the further formation. The cold-formed aluminum sheet is heated at 150-350[deg] C below a recrystallization temperature of the aluminum sheet. Before cold-forming, the aluminum sheet is provided with a temperature -resistant lubricant, which is removed from the aluminum sheet in a step after the further formation step. The aluminum sheet is introduced into the forming tool during the further formation step, and is partially formed by deep-drawing. For heating the cold-formed aluminum sheet, the aluminum sheet is partially introduced into a counter mold of a heating tool following the form of the aluminum sheet. The cold-formed aluminum sheet is partially cut before and/or after the further formation step.

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