

Title (en)
METHOD FOR PRODUCING A MOULDED BODY FROM SINTERED STEEL

Title (de)
VERFAHREN ZUM HERSTELLEN EINES FORMKÖRPERS AUS SINTERSTAHL

Title (fr)
PROCEDE DE FABRICATION D'UN CORPS MOULE A PARTIR D'ACIER FRITTE

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Abstract (en)
[origin: WO2004031427A2] The invention relates to a method for producing a moulded body from sintered steel. According to said method, a sintered powder based on iron is mixed with a master alloy powder containing nickel, boron and iron, and the powder mixture is compressed to form a blank which is then sintered under conditions of a liquid phase sintering with a part by volume in the liquid phase of up to 15 %. In order to improve the impact strength, the boron content of the powder mixture is between 0.03 and 0.2 wt. % when the boron part of the master alloy powder is less than 10 wt. %, the weight ratio between the nickel part and the boron part of the powder mixture exceeds 5, and the master alloy powder has an average particle size of between 10 and 90 nm.

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