

Title (en)
3D-METAL-PRINTING METHOD AND ARRANGEMENT THEREFOR

Title (de)
3D-METALLDRUCKVERFAHREN UND ANORDNUNG FÜR EIN SOLCHES

Title (fr)
PROCÉDÉ D'IMPRESSION DE MÉTAL 3D ET DISPOSITIF ASSOCIÉ

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Application
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Abstract (en)
[origin: WO2020035109A1] The invention relates to a 3D-metal-printing method for producing a spatial metal product substantially consisting of a metal powder or metal filaments as the starting material, the powder or the filaments being structured layer-by-layer by applying starting material layers to a respectively previously produced layer and selective local heating of predefined points of the layer above a sintering or melting temperature of the powder and sintering or fusing the molten points with the underlying layer and optional tempering of the points, wherein at least the respectively newly applied starting material layer is formed by planar irradiating IR radiation in such a manner that a radiation spot having a surface area of at least 5mm², more specifically of more than 20mm² and even more specifically of more than 100mm², is pre-heated and/or, following the local heating of the predetermined points, is post-treated for thermal stress compensation.

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See references of WO 2020035109A1

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