

Title (en)

SYSTEM AND METHOD FOR CONTROLLED MANUFACTURING

Title (de)

SYSTEM UND VERFAHREN ZUR KONTROLIERTEN HERSTELLUNG

Title (fr)

SYSTEME ET PROCEDE DE FABRICATION CONTROLEE

Publication

EP 3986646 A1 20220427 (FR)

Application

EP 20739748 A 20200525

Priority

- FR 1906669 A 20190620
- FR 2020050864 W 20200525

Abstract (en)

[origin: WO2020254738A1] Controlled manufacturing system suitable for controlling a method for manufacturing, repairing or resurfacing a part by deposition of material under concentrated energy, the controlled manufacturing system comprising: - means for obtaining a three-dimensional digital model of the part; - means for generating a manufacturing file for the part, on the basis of the three-dimensional digital model of the part, in order to define manufacturing parameters of an additive manufacturing machine, the manufacturing parameters being associated with manufacturing instructions; - means for generating a control file for the part in order to define control parameters of a control effector, the control parameters being associated with control instructions; - means for analysis in order to analyse the manufacturing file and the control file to determine whether the manufacturing parameters and the control parameters can coexist during the simultaneous application of the manufacturing parameters to the additive manufacturing machine and the control parameters to the control effector; - a control module comprising at least one communication channel for receiving and sending the manufacturing instructions to a polyarticulated manufacturing system suitable for supporting the additive manufacturing machine, and at least one communication channel for receiving and sending the control instructions to a polyarticulated control system suitable for supporting the control effector, in order to simultaneously control the additive manufacturing machine and the control effector.

IPC 8 full level

B22F 3/105 (2006.01); **B33Y 50/02** (2015.01); **G01N 29/06** (2006.01); **G01N 29/22** (2006.01); **G01N 29/24** (2006.01); **G01N 29/265** (2006.01); **G01N 29/32** (2006.01); **G05B 19/4061** (2006.01); **G05B 19/4099** (2006.01)

CPC (source: CN EP KR US)

B22F 10/22 (2021.01 - CN US); **B22F 10/25** (2021.01 - EP US); **B22F 10/28** (2021.01 - CN KR US); **B22F 10/38** (2021.01 - EP KR US); **B22F 10/85** (2021.01 - CN EP KR US); **B22F 12/41** (2021.01 - KR US); **B22F 12/45** (2021.01 - KR); **B22F 12/90** (2021.01 - CN KR); **B23K 26/034** (2013.01 - US); **B29C 64/153** (2017.07 - CN); **B29C 64/393** (2017.07 - CN); **B33Y 10/00** (2014.12 - CN KR US); **B33Y 30/00** (2014.12 - CN KR US); **B33Y 50/00** (2014.12 - KR); **B33Y 50/02** (2014.12 - CN EP KR US); **G01N 29/069** (2013.01 - EP KR); **G01N 29/225** (2013.01 - EP KR); **G01N 29/2418** (2013.01 - EP KR); **G01N 29/265** (2013.01 - EP KR); **G01N 29/326** (2013.01 - EP KR); **G05B 19/4099** (2013.01 - KR); **B22F 12/45** (2021.01 - EP US); **B22F 12/90** (2021.01 - EP US); **B23K 9/044** (2013.01 - US); **B23K 26/342** (2015.10 - US); **G05B 19/4099** (2013.01 - EP); **Y02P 10/25** (2015.11 - EP KR)

C-Set (source: EP)

B22F 2999/00 + B22F 10/30 + B22F 10/85 + B22F 12/22 + B22F 12/53 + B22F 12/90

Citation (search report)

See references of WO 2020254738A1

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)

FR 3097463 A1 20201225; FR 3097463 B1 20220923; CN 114258344 A 20220329; EP 3986646 A1 20220427; JP 2022537449 A 20220825; KR 20220031900 A 20220314; US 2022347754 A1 20221103; WO 2020254738 A1 20201224

DOCDB simple family (application)

FR 1906669 A 20190620; CN 202080058587 A 20200525; EP 20739748 A 20200525; FR 2020050864 W 20200525; JP 2021576242 A 20200525; KR 20227002109 A 20200525; US 202017621072 A 20200525