DMP PROCESS ENGINEER (M/F)

PHD CANDIDATE, PAM² MARIE CURIE ITN

(M/F)

About 3D Systems Leuven

3D Systems Leuven, formerly LayerWise, is a dynamic and leading enterprise, specialised in 3D Printing of metal components. 3D Systems Leuven is not only a technology developer but also a technology user. This makes us a strong innovation partner for clients in the industrial, medical and dental sector.

With this technology, we build up material in layers using a high intensity laser until it becomes a solid product. Unlike conventional production techniques, this one does not render any material loss, nor does it require any tooling. It does however, enable the designers to manufacture very complex geometries which are not producible using the traditional techniques.

3D Systems group is a world leader in 3D printing technology.

JOB DESCRIPTION

You will join the PAM2 Marie Curie Innovative Training Networks program funded by the European Commission. You become a researcher embedded at 3D Systems with the aim of obtaining a 4 year PhD at KU Leuven under the academic guidance of Prof. Jean-Pierre Kruth.

As an interdisciplinary engineer you will develop strategies for improved in-process and post-process accuracy. This includes the identification of typical part feature shapes, critical sizes and relative position, which are prone to in- and post-process deformations. In this context, the relation between the process parameters and the part deformations will be studied in order to optimize the build strategy with respect to the present features.

RESPONSIBILITIES

- Familiarize yourself with hardware and software aspects of the DMP machines.
- Identify key part feature shapes, critical sizes and relative position, which are prone to in- and postprocess deformations.
- Study and understand the effect of the process parameters and conditions on the identified shapes.
- Develop new process strategies to improve feature accuracy.
- Assess the effect of post-processing treatments on final feature accuracy and roughness.
- Attend to a small amount of academic duties, e.g., teaching.

PROFILE

- MSc. degree in mechanical, materials or aerospace engineering or a closely related field
- Background in physical and mechanical properties of materials and metrology
- Interdisciplinary nature: interest to work with hardware, software and product quality team
- Good communication skills and ability to be a team player in a multidisciplinary setting
- Hands-on experimental attitude is a must
- Knowledge of Dutch is a big plus
- Prepared to spend 2 times 2 months abroad in the context of the ITN

WE OFFER

- A challenging job in a young and dynamic team
- A competitive salary and additional non-statutory benefits
 Career opportunities in a global company with exponential growth.
- We welcome 45+ & Junior.

INTERESTED?

Please send your resume and motivation mail in English to: Frederik Verbist

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