CORE
Metadata, citation and similar papers at core.ac.uk
Provided by Online Research Database In Technology

Nanomanufacturing-Perspective and applications - DTU Orbit (09/11/2017)

Nanomanufacturing-Perspective and applications

Nanomanufacturing involves scaled-up, reliable, and cost-effective manufacturing of nanoscale materials, structures, devices, and systems. Nanomanufacturing methods can be classified into top-down and bottom-up approaches, including additive, subtractive, and replication/mass conservation processes. These include a cluster of various techniques such as nanomachining, nanofabrication, and nanometrology to produce nanotechnology components and conduct evaluation. This paper mainly focuses on the manufacturing methods for complex shapes or structures, such as textures on curves and hierarchical structures, and outlines the research perspectives and the current application status of nanomanufacturing fundamentals and key technologies.

General information

State: Published
Organisations: Department of Mechanical Engineering, Tianjin University, Tohoku University, University of Alabama, University College Dublin
Authors: Fang, F. Z. (Ekstern), Zhang, X. D. (Ekstern), Gao, W. (Ekstern), Guo, Y. B. (Ekstern), Byrne, G. (Ekstern), Hansen, H. N. (Intern)
Pages: 683-705
Publication date: 2017
Main Research Area: Technical/natural sciences

Publication information

Journal: C I R P Annals
Volume: 66
Issue number: 2
ISSN (Print): 0007-8506
Ratings:
BFI (2017): BFI-level 2
Web of Science (2017): Indexed Yes
BFI (2016): BFI-level 2
Scopus rating (2016): CiteScore 3.93 SJR 1.672 SNIP 3.072
Web of Science (2016): Indexed yes
BFI (2015): BFI-level 2
Scopus rating (2015): SJR 1.839 SNIP 3.185 CiteScore 3.83
Web of Science (2015): Indexed yes
BFI (2014): BFI-level 2
Scopus rating (2014): SJR 2.73 SNIP 3.99 CiteScore 4.39
Web of Science (2014): Indexed yes
BFI (2013): BFI-level 2
Scopus rating (2013): SJR 2.455 SNIP 3.875 CiteScore 3.87
ISI indexed (2013): ISI indexed yes
Web of Science (2013): Indexed yes
BFI (2012): BFI-level 2
Scopus rating (2012): SJR 2.175 SNIP 4.2 CiteScore 3.04
ISI indexed (2012): ISI indexed yes
Web of Science (2012): Indexed yes
BFI (2011): BFI-level 2
Scopus rating (2011): SJR 2.153 SNIP 3.507 CiteScore 2.81
ISI indexed (2011): ISI indexed yes
Web of Science (2011): Indexed yes
BFI (2010): BFI-level 2
Scopus rating (2010): SJR 2.172 SNIP 3.45
Web of Science (2010): Indexed yes
BFI (2009): BFI-level 2
Scopus rating (2009): SJR 1.625 SNIP 2.205
Web of Science (2009): Indexed yes
BFI (2008): BFI-level 1
Scopus rating (2008): SJR 1.069 SNIP 1.615
Web of Science (2008): Indexed yes

Scopus rating (2007): SJR 1.145 SNIP 1.482
Web of Science (2007): Indexed yes
Scopus rating (2006): SJR 0.867 SNIP 1.962
Web of Science (2006): Indexed yes
Scopus rating (2005): SJR 0.936 SNIP 1.843
Web of Science (2005): Indexed yes
Scopus rating (2004): SJR 1.575 SNIP 2.264
Web of Science (2004): Indexed yes
Scopus rating (2003): SJR 1.155 SNIP 1.703
Web of Science (2003): Indexed yes
Scopus rating (2002): SJR 0.82 SNIP 2.063
Web of Science (2002): Indexed yes
Scopus rating (2001): SJR 0.576 SNIP 2.107
Web of Science (2001): Indexed yes
Scopus rating (2000): SJR 1.088 SNIP 1.907
Web of Science (2000): Indexed yes
Scopus rating (1999): SJR 0.756 SNIP 2.546
Original language: English
Manufacturing, Metrology, Nanomanufacturing
Electronic versions:
1_s2.0_S0007850617301439_main.pdf
DOIs:
10.1016/j.cirp.2017.05.004
Source: FindIt
Source-ID: 2371337888
Publication: Research - peer-review › Journal article – Annual report year: 2017