Frontiers of Mechanical Engineering

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REVIEW ARTICLE

- Nanoparticle-enhanced coolants in machining: mechanism, application, and prospects

 Shuguo HU, Changhe LI, Zongming ZHOU, Bo LIU, Yanbin ZHANG, Min YANG, Benkai LI, Teng GAO, Mingzheng LIU, Xin CUI, Xiaoming WANG, Wenhao XU, Y. S. DAMBATTA, Runze LI, Shubham SHARMA
- 50 Edge preparation methods for cutting tools: a review

 Yu ZHOU, Wei FANG, Lanying SHAO, Yanfei DAI, Jiahuan

 WANG, Xu WANG, Julong YUAN, Weigang GUO, Binghai LYU
- Review of key technologies of climbing robots

 Ye DAI, Shikun LI, Xukun RUI, Chaofang XIANG, Xinlei NIE

RESEARCH ARTICLE

- Comparison of internal force antagonism between redundant cable-driven parallel robots and redundant rigid parallel robots

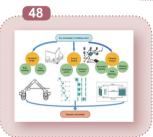
 Yuheng WANG, Xiaoqiang TANG
- Design and experiment of a novel pneumatic soft arm based on a deployable origami exoskeleton

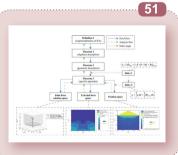
 Yuwang LIU, Wenping SHI, Peng CHEN, Yi YU,

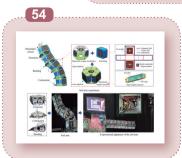
 Dongyang ZHANG, Dongqi WANG











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Development and testing of a wireless smart toolholder with multi-sensor fusion

Jin ZHANG, Xinzhen KANG, Zhengmao YE, Lei LIU, Guibao TAO, Huajun CAO

- Multiresolution and multimaterial topology optimization of fail-safe structures under B-spline spaces

 Yingjun WANG, Zhenbiao GUO, Jianghong YANG,

 Xinqing LI
- Improved minimum variance distortionless response spectrum method for efficient and robust non-uniform undersampled frequency identification in blade tip timing

 Ruochen JIN, Laihao YANG, Zhibo YANG, Shaohua TIAN,

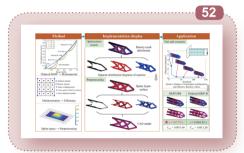
 Guangrong TENG, Xuefeng CHEN
- Multi-material additive manufacturing—functionally graded materials by means of laser remelting during laser powder bed fusion

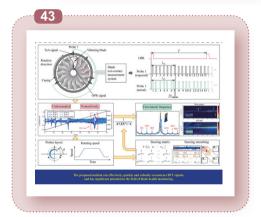
Alexander SCHMIDT, Felix JENSCH, Sebastian HÄRTEL

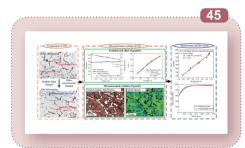
A new modeling approach for stress—strain relationship taking into account strain hardening and stored energy by compacted graphite iron evolution

Jiahui NIU, Chuanzhen HUANG, Zhenyu SHI, Hanlian LIU, Zhengyi TANG, Binghao LI, Zhen CHEN, Guoyan JIANG









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