

专稿 Feature

14 钛合金TB6连接孔挤压强化残余应力及疲劳寿命试验研究

冯平法 刘嘉辉 王子标 冯峰 张翔宇 沈岳 张建富 王健健 吴志军 郁鼎文
Experimental Study on Residual Stress and Fatigue Life of TB6 Titanium Alloy Connection Hole After Cold Expansion
FENG Pingfa LIU Jiahui WANG Zibiao FENG Feng ZHANG Xiangyu SHEN Yue
ZHANG Jianfu WANG Jianjian WU Zhijun YU Dingwen

封面文章 Cover Story

22 基于刚度最优区间的机器人搅拌摩擦焊工件位置优化方法

肖聚亮 王能 刘海涛 岳巍 王健 赵慧慧 高嘉爽
Optimization Method of Position of Robot Friction Stir Welding Parts Based on Optimal Stiffness Interval
XIAO Juliang WANG Neng LIU Haitao YUE Wei WANG Jian ZHAO Huihui GAO Jiashuang

论坛 Forum

异种材料焊接/连接 Welding/Joining of Dissimilar Materials

34 铝/镁异种合金焊接研究现状

朱政强 陈昊 朱云明 郭玉坤 孙亮
Research Status of Al/Mg Dissimilar Alloys Welding
ZHU Zhengqiang CHEN Hao ZHU Yunming GUO Yukun SUN Liang

43 添加钛箔镁/铝异种金属激光焊接研究

周惦武 赵蕾 王新宇 张书迈 刘金水
Study on Mg/Al Dissimilar Metal Laser Welded Joints With Addition of Ti-Foil
ZHOU Dianwu ZHAO Lei WANG Xinyu ZHANG Shumai LIU Jinshui

49 转速对含Zr中间层铝/镁搅拌摩擦焊搭接接头组织与性能的影响

郑洋 任国春 宿振宇 赵梓昊 李亮玉 臧立彬 刘伟 余政哲
Effect of Rotation Rate on Microstructure and Properties of Friction Stir Weld Al/Mg Dissimilar Lap Joints With Zr Interlayer
ZHENG Yang REN Guochun SU Zhenyu ZHAO Zihao LI Liangyu ZANG Libin LIU Wei YU Zhengzhe

59 Al/Mg搅拌摩擦点焊-钎焊接头的微观组织与拉伸剪切性能研究

谢吉林 汪洪伟 陈玉华 刘文阔 张体明 王善林
Research on Microstructure and Tensile Shear Properties of Al/Mg Friction Stir Spot Welding-Brazing Joints
XIE Jilin WANG Hongwei CHEN Yuhua LIU Wenkuo ZHANG Timing WANG Shanlin

- 66 不锈钢与6061铝合金旋转摩擦焊接接头组织与力学性能
—— 许辉 夏佩云 张选明 闫学文 朱帅 封小松 袁雅俊 周佳俊
Microstructure and Mechanical Properties of Rotary Friction Welded Joint Between Stainless Steel and 6061 Aluminum Alloy
XU Hui XIA Peiyun ZHANG Xuanming YAN Xuewen ZHU Shuai FENG Xiaosong YUAN Yajun ZHOU Jiajun
- 71 工艺参数对TiNi合金/TC4钛合金超声波焊焊接接头形貌和力学性能的影响研究
—— 吴鸿燕 陈炯 桑玉蕊 陈玉华 王理涛
Study on Effect of Process Parameters on Morphology and Mechanical Properties of TiNi Alloy/TC4 Titanium Alloy Ultrasonic Welding Joint
WU Hongyan CHEN Jiong SANG Yurui CHEN Yuhua WANG Litao

研究论文 Research

- 78 DD5 与GH3039高温合金钎焊接头的微观组织与力学性能研究
—— 尚泳来 陈波 贾崇林 毛唯 李文文 静永娟
Study on Microstructure and Mechanical Properties of Brazed Joint of DD5 Single Crystal Superalloy and GH3039 Superalloy
SHANG Yonglai CHEN Bo JIA Chonglin MAO Wei LI Wenwen JING Yongjuan
- 84 激光选区熔化TC4合金在HF-H₂O₂体系的化学抛光研究
—— 李紫杨 吴松全 杨义 王喆 黄爱军
Study on Chemical Polishing of Selective Laser Melted TC4 Alloy in HF-H₂O₂
LI Ziyang WU Songquan YANG Yi WANG Hao HUANG Aijun
- 90 增材制造金属点阵结构性能研究进展
—— 黄安坤 温耀杰 张百成 曲选辉
Research Progress on Properties of Metal Lattice Structure by Additive Manufacturing
HUANG Ankun WEN Yaojie ZHANG Baicheng QU Xuanhui
- 102 薄盘工件不平衡量在线测算及去重试验研究
—— 张仕海 朱冶诚
Research on Unbalance Vector Online Measuring and Weight Removing Method for Thin-Disc Workpiece
ZHANG Shihai ZHU Yecheng