



艰苦朴素 实事求是 严格要求 勇于探索

首页 海工装备与水下技术研究所

### 卢向雨

发布人: 港航院 发布时间: 2020-03-04 访问次数: 1709



卢向雨 女 副教授 博士

#### 简历

##### 学习经历

2008/09-2013/07 北京化工大学 材料科学与工程 博士 硕博连读 获工学博士学位  
2003/09-2007/07 北京化工大学 材料科学与工程 学士 获工学学士学位

##### 工作经历

2018/07-至今 河海大学 港口海岸与近海工程学院 副教授  
2017/08-2018/07 江苏科技大学 材料科学与工程学院 副教授  
2013/07-2017/07 江苏科技大学 材料科学与工程学院 讲师

#### 研究方向

- 海洋装备腐蚀与防护
- 海下装备动力源开发
- 金属材料的腐蚀与防护

#### 主讲课程

《从陆地走向海洋的材料奥秘》《科技论文阅读与写作》

#### 科研项目

- [1]国家自然科学基金青年项目“基于镁粉活性调控的镁合金表面聚苯胺-镁粉长效复合防护涂层研究”(51601074). 2017/01-2019/12. 项目负责人.
- [2]江苏省高校自然科学研究项目“基于改性镁粉阴极保护效率的高效环氧富镁涂层体系研究”(14KJB430012). 2014/08-2016/12. 项目负责人
- [3]中央高校科研业务费项目“环氧富镁铝涂层对舰船用铝合金的防护机制及性能优化”(2018B07214). 2018/07-2019/12. 项目负责人.
- [4]先进土木工程材料教育部重点实验室(同济大学)开放基金项目“海洋混凝土结构浪溅区的镁合金牺牲阳极防护系统研究”(201701). 2017/01-2018/12. 项目负责人.
- [5]高性能土木工程材料国家重点实验室开放基金科研项目“浪花飞溅区混凝土结构中钢筋的镁合金牺牲阳极保护系统设计”(2015CEM006). 2016/01-2017/12. 项目负责人..
- [6]地质灾害防治与地质环境保护国家重点实验室开放基金项目“聚磷酸-聚羧酸超塑化剂在高强灌浆砂浆中的作用机制及应用研究”(SKLGP2017K011) 2018/01-2019/12.项目负责人.
- [7]材料腐蚀与防护四川省重点实验室开放基金科研项目“基于纯镁颗粒改性的长寿命富镁涂层研制”(2015CL08)2015/04-2017/03. 项目负责人.
- [8]国家自然科学基金青年项目“基于电脉冲辅助的大气等离子喷涂飞行粒子特性及其细化、加速机理研究”(51401091). 2015/01-2017/12. 主要参与者.

[9]国家级军工项目“镁合金\*\*\*\*\*” (BHJG2007025), 2008/01-2010/12. 主要参与人

[10]教育部重点项目“镁合金高性能表面改性层制备的关键技术研究”, (108129), 2008/01-2011/12. 主要参与人

## 论文论著

[1]Xingguo Feng, Chao Zhu, Xiangyu Lu\*, Yiji Zhang, Tong Wu, Yu Zuo, Xuhui Zhao, Yuchao Dun, Mai Wang, The influence of hydrofluoric acid doped polyaniline on the protective performance of a mg-rich epoxy coating on AZ91D magnesium alloy, *Progress in Organic Coatings*, 2020, 141: 105550. (SCI)

[2]Xiangyu Lu, Sichen Sun, Qiqi Fan, Xiangjun Pei\*, Yuchao Dun, Xingguo Feng, Chen Zou, Wang Lu, Investigation of protective performance of a Mg-rich primer containing aluminum tri-polyphosphate on AZ91D magnesium alloy in simulated acid rain, *Coatings*, 2019, 9(10): 649. (SCI)

[3]Xiangyu Lu, Leyuan Zhang, Xingguo Feng\*, Da Chen, Yu Zuo, Effect of aluminum tripolyphosphate on pitting initiation on carbon steel in chloride contaminated concrete pore solution, *Anti-Corrosion and Materials*, 2019, 66(5): 603-612. (SCI)

[4]Pengfei Xu, Xiangyu Lu\*, Hongxia Chen, Xingguo Feng, Zuopeng Zhao, Yanxu Ding, Yalin Shen, Xingling Shi, Investigation of the surface modification of magnesium particles with stannate on the corrosion resistance of a Mg-rich epoxy coating on AZ91D magnesium alloy, *Progress in Organic Coatings*, 2019, 135: 591-600. (SCI)

[5]Jing Zhang, Xiangyu Lu\*, Shengli Chen, Leyuan Zhang, Chao Zhu, Yiji Zhang, Tong Wu, Corrosion-inhibition effect of different phosphate compounds for carbon steel in chloride-contaminated mortars, *International Journal of Electrochemical Science*, 2019, 14: 8601-8610. (SCI)

[6]Yiwen Xu, Chao Zhu, Shengli Chen, Yiji Zhang, Tong Wu, Xiangyu Lu\*, Mai Wang, Xingguo Feng, Corrosion inhibition effect of sodium pyrophosphate on carbon steel in chloride contaminated mortar, *International Journal of Electrochemical Science*. 2019, 14: 9726- 9740. (SCI)

[7]Xingguo Feng, Leyuan Zhang, Jing Zhang, Xiangyu Lu\*, Yiwen Xu, Xiangying Zhang, Ruilong Shi, Da Chen, Effect of aluminum tri-polyphosphate on corrosion behavior of reinforcing steel in seawater prepared coral concrete, *Journal of Wuhan University of Technology-Materials Science*, 2019 34(4): 906-913.

[8]Xingguo Feng, Yiwen Xu, Xiangying Zhang, Xiangyu Lu\*, Ruilong Shi, Leyuan Zhang, Jing Zhang, Da Chen, Metastable pitting on 304 stainless steel in cement extract solution with different concentration of Cl<sup>-</sup>, *International Journal of Electrochemical Science*, 2019, 14: 3494-3508. (SCI)

[9]Xingguo Feng, Xiangying Zhang, Yiwen Xu, Ruilong Shi, Xiangyu Lu\*, Leyuan Zhang, Jing Zhang, Da Chen, Corrosion behavior of deformed low-nickel stainless steel in groundwater solution, *Engineering Failure Analysis*, 2019, 98: 49-57. (SCI)

[10]Xingguo Feng, Yiwen Xu, Xiangying Zhang, Xiangyu Lu\*, Leyuan Zhang, Ruilong Shi, Jing Zhang, Da Chen, Xibing zhang, A statistical study on metastable pitting of 304 stainless steel in chloride contaminated carbonated concrete pore solution. *International Journal of Electrochemical Science*, 2018, 13: 10339-10354. (SCI)

[11]Xiangyu Lu\*, Xingguo Feng, Yu Zuo, Pei Zhang, Chuanbo Zheng\*. Improvement of protection performance of Mg-rich epoxy coating on AZ91D magnesium alloy by DC anodic oxidation. *Progress in Organic Coatings*, 2017, 104: 188-198. (SCI)

[12]Xiangyu Lu\*, Yunxia Guo, Pei Zhang, Chuanbo Zheng. Effect of Air Humidity on the Diffusion Rate of Migrating Corrosion Inhibitor in Mortars. *International Journal of Electrochemical Science*, 2017, 12: 7547-7556. (SCI)

[13]Xiangyu Lu\*, Xingguo Feng, Yu Zuo, Chuanbo Zheng, Sheng Lu, Lei Xu. Evaluation of the micro-arc oxidation treatment effect on the protective performance of a Mg-rich epoxy coating on AZ91D magnesium alloy. *Surface and Coatings Technology*, 2015, 270: 227-235. (SCI)

[14]Xiangyu Lu, Yu Zuo\*, Xuhui Zhao, Shangyi Shen. The effects of magnesium particles in Mg-rich primers applied on AZ91D magnesium alloy. *International Journal of Electrochemical Science*, 2015, 10: 9586-9640. (SCI)

[15]Xiangyu Lu, Yu Zuo\*, Xuhui Zhao, Yuming Tang. The influence of aluminum tri-polyphosphate on the protective behavior of Mg-rich epoxy coating on AZ91D magnesium alloy. *Electrochimica Acta*, 2013, 93: 53-64. (SCI)

[16]Xiangyu Lu, Yu Zuo\*, Xuhui Zhao, Yuming Tang. The improved performance of a Mg-rich epoxy coating on AZ91D magnesium alloy by silane pretreatment. *Corrosion Science*, 2012, 60(1): 165-172. (SCI)

[17]Xiangyu Lu, Yu Zuo\*, Xuhui Zhao, Yuming Tang, Xingguo Feng. The study of a Mg-rich epoxy primer for protection of AZ91D magnesium alloy. *Corrosion Science*, 2011, 53(1): 153-160. (SCI)

[18]卢向雨, 冯兴国, 芦笙, 王泽鑫, 郑传波\*. H<sub>2</sub>S溶液中316L不锈钢TIG焊接头的腐蚀性能. *焊接学报*, 2017, 38(5): 69-73. (EI)

[19]卢向雨, 吴静英, 左禹, 郑传波\*. AZ91D 镁合金表面不同树脂体系富镁涂层的保护性能. *化工学报*, 2015, 66(11): 4578-4587. (EI)

[20]卢向雨\*, 姚胜, 唐俊荣, 赵刘明, 冯兴国. 316L 不锈钢TIG 焊接接头在H<sub>2</sub>S 溶液中的钝化性能. *表面技术*, 2015, 12(44): 6-11.

[21]卢向雨, 唐聿明, 左禹\*. 钢筋混凝土在环境与应力协同作用下的性能劣化与腐蚀行为. *混凝土*, 2009(4): 39-42.

- [22]Xingguo Feng, Xiangyu Lu, Yu Zuo, Ning Zhuang, Da Chen. Electrochemical study the corrosion behaviour of carbon steel in mortars under compressive and tensile stresses, Corrosion Science. 2016, 103: 66-74. (SCI)
- [23]Xingguo Feng, Xiangyu Lu, Yu Zuo, Ning Zhuang, Da Chen. The effects of deformation on metastable pitting of 304 stainless steel in chloride contaminated concrete pore solution, Corrosion Science. 2016 103: 223-229. (SCI)
- [24]Xingguo Feng, Xiangyu Lu, Yu Zuo, Da Chen. The passive behaviour of 304 stainless steels in saturated calcium hydroxide solution under different deformation. Corrosion Science, 2014, 82: 347-355. (SCI)
- [25]Xingguo Feng, Xiangyu Lu, Longqia Guo, Da Chen. The effects of deformation on corrosion behavior of stainless steel in chlorides contaminated concrete pore solution, International Journal of Electrochemical Science. 2015 10: 10677-10688 (SCI)
- [26]Li Zhang, Xiangyu Lu, Yu Zuo. The influence of cathodic polarization on performance of two epoxy coatings on steel. International Journal of Electrochemical Science, 2014, 9(1): 6266-6280. (SCI)
- [27]Xingguo Feng, Xiangyu Lu, Yu Zuo, Da Chen. The influence of plastic deformation on the structure of passive films on carbon steel in simulated pore solution. Journal of the Brazilian chemical society, 2014, 25(2): 372-379. (SCI)
- [28]Feng Xingguo, Lu Xiangyu, Zuo Yu, Chen Da. Tensile strength and oxide analysis of carbon steel in concrete exposed in atmospheric environment for 53 years, Journal of Wuhan University of Technology-Materials Science. 2015 30(4): 790-795. (SCI)
- [29]Xingguo Feng, Ruilong Shi, Xiangyu Lu, Yiwen Xu, Xiufeng Huang, Da Chen. The corrosion inhibition efficiency of aluminum tripolyphosphate on carbon steel in carbonated concrete pore solution. Corrosion Science, 2017, 124: 150-159. (SCI)
- [30]Jianguo Wang, Yu Zuo, Yuming Tang, Xiangyu Lu. Phosphatizing of Mg particles to improve the protective performance of Mg-rich primer on A2024 Al alloy. Applied Surface Science, 2014, 292: 93-99. (SCI)
- [31]Xingguo Feng, Yu Zuo, Yuming Tang, Xuhui Zhao, Xiangyu Lu. The degradation of passive film on carbon steel in concrete pore solution under compress and tensile stresses. Electrochimica Acta, 2011, 58: 258-263. (SCI)
- [32]冯兴国, 卢向雨, 左禹, 陈达. 拉应力和压应力对砂浆中钢筋锈蚀的影响研究, 建筑材料学报. 2015 18(4): 640-646. (EI)
- [33]冯兴国, 卢向雨, 左禹, 陈达. 应变对混凝土孔隙液中不锈钢钝化性能影响的电化学研究. 中国腐蚀与防护学报. 2015 35(4):372-378.
- [34]Xingguo Feng, Xiangyu Lu, Yingdi Liao, Chaohua Jiang, The corrosion behavior of rebar in stressed mortars, Applied Mechanics and Materials. 2014 518: 244-247. (EI)
- [35]王淑清, 卢向雨, 左禹, 唐聿明, 赵旭辉. 环氧带锈涂层在干湿交替环境中失效过程的电化学阻抗谱研究. 化工学报, 2012, 63(11): 3625-3631. (EI)
- [36]王雅萍, 赵旭辉, 卢向雨, 左禹. 添加氧化铈对 AZ91D 镁合金表面富镁涂层的保护作用. 物理化学学报, 2012, 28(2): 407-413. (SCI)
- [37]杜翠玲, 陈静, 汤莉, 芦笙, 卢向雨, 许蕾. 正向电压对 ZK60 镁合金微弧氧化过程及膜层的影响. 中国有色金属学报, 2014, 24(5): 1118-1126. (EI)

## 专利

- [1]卢向雨, 吴静英, 芦笙. 干湿循环紫外光照自动腐蚀试验箱及试验方法, 中国, 专利号: ZL201510177630.0
- [2]左禹, 范育京, 赵旭辉, 唐聿明, 卢向雨. 一种用于镁合金保护的防腐蚀涂料及其制备方法, 2013.9, 中国, ZL 2013104064351.
- [3]左禹, 李黎, 卢向雨, 赵旭辉, 唐鑫磊. 一种镁合金防腐蚀涂料及其制备方法, 2012.8, 中国, ZL 200910084217.4.

## 表彰奖励

- [1]《荷载作用下海工混凝土结构腐蚀评估与防护技术》获中国腐蚀与防护学会科技进步二等奖 (排名第二) . 2019/02
- [2]论文《The study of a Mg-rich epoxy primer for protection of AZ91D magnesium alloy》获第七届全国腐蚀大会优秀论文奖. 2013/07.
- [3]论文《微弧氧化处理对 AZ91D 镁合金表面环氧富镁涂层耐蚀性改善研究》获2014 年度“风帆杯”青年腐蚀与防护科技论文讲评会暨海峡两岸青年腐蚀与防护论坛论文讲评会二等奖. 2014/10.
- [4]《荷载与腐蚀介质耦合作用下海工混凝土结构的劣化机制研究》荣获2016年度江苏省教育科学研究成果奖自然科学奖三等奖. (排名第三) 2016/06

---

## 学术兼职

中国腐蚀与防护学会会员, Corrosion Science、Cement and Concrete Composite、Applied surface Science, Surface and Coatings Technology, Surface Review and Letters等期刊审稿人

---

## 联系方式

邮箱: luxiangyu2013@163.com; luxiangyu@hhu.edu.cn

关闭窗口

校内链接

校外链接

下载中心