

[学院介绍](#)[系所导航](#)[教学招生](#)[师资队伍](#)[学科基地](#)[合作交流](#)[党建工作](#)[学生园地](#)[学院校友](#)[教育基金](#)[您当前的位置](#)： [首页](#) >> [师资队伍](#) >> [各系教师](#) >> [可再生能源系](#) >> [正文](#)

师资队伍

[各系教师](#)[博士生导师](#)[硕士生导师](#)

可再生能源系

陈蓉

2018-06-07 18:35 点击：[5185]

姓名	陈蓉	性别	男	
所在部门	新能源系	职称	教授	
职务		联系电话	65102019	
邮箱	rchen@cqu.edu.cn			

*个人简历:

博士、教授、博士生导师；国家优秀青年科学基金获得者，“长江学者奖励计划”青年学者、国家“万人计划”科技创新领军人才、创新人才推进计划中青年科技创新领军人才、教育部新世纪优秀人才支持计划人选、重庆市杰出青年科学基金获得者。

2000年和2003年在重庆大学动力工程学院分别获得学士和硕士学位，2007年获得香港科技大学机械工程博士学位，之后在同一单位继续博士后研究，并在2008-2009年被香港科技大学聘为访问助理教授工作一年。2010年，加入重庆大学动力工程学院，2014年晋升为教授。目前担任中国工程热物理学会传热传质分会青年工作委员会副主任和“低品位能源利用技术及系统”教育部重点实验室室务委员会委员，并担任了两个SCI国际期刊《International Journal of Green Energy》和《Journal of Energy Engineering-ASCE》的客座编辑。作为项目或课题负责人主持了国家自然科学基金优秀青年科学基金、面上项目和863项目子课题等项目7项。2013年获国家自然科学基金二等奖（排名第3）1项。主要从事光微流体、太阳能光化学利用、新能源转换技术、微尺度传输及环境治理技术中的关键热物理问题等方面的研究。至今已发表SCI收录论文100余篇，并在Elsevier、CRC和科学出版社出版的三部学术专著上撰写一个章节。所有发表论文SCI总他引2000余次。

教育经历:

2003-2007	香港科技大学	博士
2000-2003	重庆大学	硕士
1996-2000	重庆大学	学士

*研究方向:

1. 光微流体技术
2. 太阳能光化学利用
3. 新能源转换技术
4. 微尺度传输
5. 环境治理技术中的关键热物理问题

研究生培养:

招收以上及相关方向动力工程及工程热物理专业博士、硕士研究生。

在研科研项目:**已结题科研项目:*****发表论文:**

1. Xuefeng He, Rong Chen*, Xun Zhu, Qiang Liao, Dingding Ye, Biao Zhang, Long Jiao, Zhibin Wang, Yuanpeng Lei, Pulsating flow triggered by the laser induced phase change in microchannels with sawtooth-shaped baffles, *Sensors and Actuators B-Chemical*, 2018, 260: 1018-1024
2. Zhibin Wang, Rong Chen*, Xun Zhu*, Qiang Liao, Dingding Ye, Biao Zhang, Xuefeng He, Long Jiao, Dynamic behaviors of the coalescence between two droplets with different temperatures simulated by the VOF method, *Applied Thermal Engineering*, 2018, 131: 132-140
3. Zhibin Wang, Rong Chen*, Xun Zhu*, Qiang Liao, Dingding Ye, Biao Zhang, Xuefeng He, Wei Li, Control of the droplet generation by an infrared laser, *AIP Advances*, 2018, 8(1): 015302
4. Xiaohong Jiao, Rong Chen*, Xun Zhu, Qiang Liao, Dingding Ye, Biao Zhang, Liang An, Hao Feng, Wei Zhang, A microfluidic all-vanadium photoelectrochemical cell for solar energy storage, *Electrochimica Acta*, 2017, 258: 842-849
5. Rong Chen, Hao Feng, Xun Zhu*, Qiang Liao, Dingding Ye, Jian Liu, Ming Liu, Gang Chen, Kun Wang, Interaction of the Taylor flow behaviors and catalytic reaction inside a gas-liquid-solid microreactor under long-term operation, *Chemical Engineering Science*, 2017, 175: 175-184
6. L. An*, R. Chen*, Mathematical modelling of direct formate fuel cells, *Applied Thermal Engineering*, 2017, 124: 232-240
7. Ming Chen, Rong Chen*, Xun Zhu**, Qiang Liao, Liang An***, Dingding Ye, Yuan Zhou, Xuefeng He, Wei Zhang, A membrane electrode assembled photoelectrochemical cell with a solarresponsive cadmium sulfide-zinc sulfide-titanium dioxide/mesoporous silica photoanode, *Journal of Power Sources*, 2017, 371: 96-105
8. Zhibin Wang, Yingying Lin, Rong Chen*, Qiang Liao, Xun Zhu*, Liang An**, Xuefeng He, Wei Zhang, A micro membrane-less photoelectrochemical cell for hydrogen and electricity generation in the presence of methanol, *Electrochimica Acta*, 2017, 245: 549-560
9. Zhibin Wang, Shuzhe Li, Rong Chen*, Xun Zhu*, Qiang Liao, Simulation on the dynamic flow and heat and mass transfer of a liquid column induced by the IR laser photothermal effect actuated evaporation in a microchannel, *International Journal of Heat and Mass Transfer*, 2017, 113: 975-983
10. Rong Chen*, Xiao Cheng, Xun Zhu*, Qiang Liao, Liang An, Dingding Ye, Xuefeng He, Zhibin Wang, High-performance optofluidic membrane microreactor with a mesoporous CdS/TiO₂/SBA-15@carbon paper composite membrane for the CO₂ photoreduction, *Chemical Engineering Journal*, 2017, 316: 911-918
11. Xiao Cheng, Rong Chen*, Xun Zhu*, Qiang Liao, Liang An, Dingding Ye, Xuefeng He, Shuzhe Li, Lin Li, An optofluidic planar microreactor for photocatalytic reduction of CO₂ in alkaline environment, *Energy*, 120 (2017) 276-282
12. Lin Li, Rong Chen*, Xun Zhu, Qiang Liao, Hong Wang, Liang An, Muxing Zhang, A cascading gradient pore microstructured photoanode with enhanced photoelectrochemical and photocatalytic activities, *Journal of Catalysis*, 2016, 344: 411-419
13. Zhi-Bin Wang, Rong Chen*, Hong Wang, Qiang Liao, Xun Zhu, Shu-Zhe Li, An overview of smoothed particle hydrodynamics for simulating multiphase flow, *Applied Mathematical Modelling*, 2016, 40: 9625-9655
14. Ming Xia, Rong Chen*, Xun Zhu*, Qiang Liao, Liang An*, Zhibin Wang, Xuefeng He, Long Jiao, A micro photocatalytic fuel cell with an air-breathing, membraneless and monolithic design, *Science Bulletin*, 2016, 60 (21): 1699-1710
15. L. An*, R. Chen*, Recent progress in alkaline direct ethylene glycol fuel cells for sustainable energy production, *Journal of Power Sources*, 2016, 329: 484-501

16. Shuzhe Li, Rong Chen*, Xun Zhu**, Qiang Liao, Numerical investigation of the Marangoni convection during the liquid column evaporation caused by IR laser heating in microchannels, *International Journal of Heat and Mass Transfer*, 2016, 101: 970-980
17. Xuefeng He, Rong Chen*, Xun Zhu**, Qiang Liao, Liang An, Xiao Cheng, Lin Li, Optofluidics based membrane microreactor for wastewater treatment by photocatalytic ozonation, *Industrial & Engineering Chemistry Research*, 2016, 55(31): 8627-8635
18. Rong Chen*, Xuefeng He, Xun Zhu**, Qiang Liao, Liang An, Zhibin Wang, Shuzhe Li, Characteristics of the IR laser photothermally induced phase change in microchannels with different depths, *Industrial & Engineering Chemistry Research*, 2016, 55(30): 8450-8459
19. L. An*, R. Chen*, Direct formate fuel cells: A review, *Journal of Power Sources*, 2016, 320: 127-139
20. Long Jiao, Rong Chen*, Xun Zhu, Qiang Liao, IR laser caused droplet evaporation on the hydrophobic surface, *International Journal of Heat and Mass Transfer*, 2016, 94: 180-190
21. Xiao Cheng, Rong Chen*, Xun Zhu, Qiang Liao, Xuefeng He, Shuzhe Li, Lin Li, Optofluidic membrane microreactor for photocatalytic reduction of CO₂, *International Journal of Hydrogen Energy*, 2016, 41(4): 2457-2465
22. Qiang Liao, Lin Li, Rong Chen*, Xun Zhu, Hong Wang, Dingding Ye, Xiao Cheng, Muxing Zhang, Yuecheng Zhou, Respective electrode potential characteristics of photocatalytic fuel cell with visible-light responsive photoanode and air-breathing cathode, *International Journal of Hydrogen Energy*, 2016, 40(46): 16547-16555
23. Lin Li, Shao Xue, Rong Chen*, Qiang Liao, Xun Zhu, Zhibin Wang, Xuefeng He, Hao Feng, Xiao Cheng, Performance characteristics of a membraneless solar responsive photocatalytic fuel cell with an air-breathing cathode under different fuels and electrolytes and air conditions, *Electrochimica Acta*, 2015, 182: 280-288
24. Shuzhe Li, Rong Chen*, Hong Wang, Qiang Liao, Xun Zhu, Zhibin Wang, Xuefeng He, Investigation of the moving liquid column coalescing with a droplet in triangular microchannels using CLSVOF method, *Science Bulletin*, 2015, 60(22): 1911-1926
25. Qingyun Xu, Rong Chen*, Hong Wang, Xun Zhu, Qiang Liao, Xuefeng He, IR laser induced meniscus evaporation from a microchannel, *Chemical Engineering Science*, 2015, 130: 31-40
26. Rui Wu, Rong Chen*, Hong Wang, Zhibin Wang, Xun Zhu, Qiang Liao, Kwansan Hui & Kwunnam Hui, Numerical study on catalytic combustion of methane with ozone using Pd-exchanged zeolite X, *Science China-Chemistry*, 2015, 58(5): 899-904.
27. Rong Chen*, Lin Li, Xun Zhu, Hong Wang, Qiang Liao, Mu-Xing Zhang, Highly-durable optofluidic microreactor for photocatalytic water splitting, *Energy*, 2015, 83: 797-804
28. Rong Chen*, Shuzhe Li, Hong Wang, Qiang Liao, Xun Zhu, Qinlin Fan, Xuefeng He, Zhibin Wang, Dynamic behavior of the liquid flow coalescing with a droplet in hydrophobic microchannels, *Journal of Nanoscience and Nanotechnology*, 2015, 15(4): 2923-2931
29. Qiang Liao, Shuzhe Li, Rong Chen*, Hong Wang, Xun Zhu, Wei Zhang, Xuefeng He, Coalescence with droplets caused acceleration of the liquid movement in microchannels, *Industrial & Engineering Chemistry Research*, 2015, 54(3): 1161-1169
30. Lin Li, Rong Chen*, Qiang Liao, Xun Zhu, Guanyi Wang, Dongye Wang, High surface area optofluidic microreactor for redox mediated photocatalytic water splitting, *International Journal of Hydrogen Energy*, 2014, 39(33): 19270-19276
31. Xuefeng He, Rong Chen*, Qiang Liao, Hong Wang, Xun Zhu, Qingyun Xu, Shuzhe Li, Siyang Xiao, IR laser assisted photothermal condensation in a microchannel, *Chemical Engineering Science*, 2014, 119: 288-294
32. Shu-Zhe Li, Rong Chen*, Hong Wang, Qiang Liao, Xun Zhu, Zhi-Bin Wang, Simulation on the coalescence of the moving liquid column and droplet in a hydrophilic microchannel by volume of fluid method, *Applied Thermal Engineering*, 2014, 64(1-2): 139-138
33. Lin Li, Guanyi Wang, Rong Chen*, Xun Zhu, Hong Wang, Qiang Liao, Youxu Yu, Optofluidics based micro photocatalytic fuel cell for efficient wastewater treatment and electricity generation, *Lab on a Chip*, 2014, 14(17): 3368-3375

34. Lin Li, Rong Chen*, Xun Zhu, Hong Wang, Yongzhong Wang, Qiang Liao, Dongye Wang, Optofluidic microreactors with TiO₂-coated fiberglass, *ACS Applied Materials & Interfaces*, 2013, 5(23): 12548-12553
35. Chao Zhang, Rong Chen*, Qiang Liao, Xun Zhu, Simulation of bacterial locomotion and attachment in the interspaces of packed bed reactors, *International Journal of Hydrogen Energy*, 2013, 38: 15680-15685
36. Rong Chen, Yu-Kang Pu, Qiang Liao, Xun Zhu, Yong-Zhong Wang, A simulation on PSB biofilm formation with considering cell inactivation, *International Journal of Hydrogen Energy*, 2013, 38: 15670-15679
37. Rong Chen, Yong-Zhong Wang, Qiang Liao, Xun Zhu, Teng-Fei Xu, Hydrolysates of lignocellulosic materials for biohydrogen production, *BMB Reports*, 2013, 46: 244-251
38. Rong Chen, Qiang Liao*, Xin Tian, Yong-Zhong Wang, Xun Zhu, Junhe Miao, Characterization of the start-up behavior and steady-state performance of biotrickling filter removing low concentration toluene waste gas, *Science China Technological Sciences*, 2012, 55: 1701-1710
39. R. Chen, T. S. Zhao, W. W. Yang, C. Xu, Two-dimensional two-phase thermal model for passive direct methanol fuel cells, *Journal of Power Sources*, 2008, 175(1): 96-105
40. R. Chen, T. S. Zhao, Performance characterization of passive direct methanol fuel cells, *Journal of Power Sources*, 2007, 167(2): 455-460
41. R. Chen, T. S. Zhao, A novel electrode architecture for passive direct methanol fuel cells, *Electrochemistry Communications*, 2007, 9(4): 718-724
42. R. Chen, T. S. Zhao, Porous current collectors for passive direct methanol fuel cells, *Electrochimica Acta*, 2007, 52(13): 4317-4324
43. R. Chen, T. S. Zhao, J. G. Liu, Effect of cell orientation on the performance of passive direct methanol fuel cells, *Journal of Power Sources*, 2006, 157(1): 351-357
44. R. Chen, T. S. Zhao, Mathematical modeling of a passive-feed DMFC with heat transfer effect, *Journal of Power Sources*, 2005, 152(1): 122-130

学术会议交流:

上一条: 朱贤青 下一条: 夏晔
【关闭】



低品位能源利用技术及系统教育部重点实验室

能源与动力电气虚拟仿真实验教学中心

地址: 重庆市沙坪坝区沙正街174号 邮编: 400044
电话: (023)65102473
传真: (023)65102473
Email: cte@cqu.edu.cn

Copyright ? 2017 重庆大学能源与动力工程学院 All Rights Reserved.