

中文目次

综述	
3351 细菌中脯氨酸的生物合成、降解及功能 刘玉霞, 窦世娟, 王秀伶	3594 嗜水气单胞菌中转录因子AHA_1581对细菌生理功能调控机制的研究 李碗芯, 赵怡扬, 林玲, 林向民
3363 植物病原真菌的自噬 刘伟, 杜春梅	3607 苯唑西林敏感、 <i>mecA</i> 基因阳性的猪源金黄色葡萄球菌的流行、分子分型及耐药性研究 张鹏飞, 寇明莹, 张强, 张萌, 徐旭, 张钰嘉, 王婷, 杨雪微, 吴聪明, 王新
3377 革兰氏阴性菌VI型分泌系统及其参与金属离子转运的研究进展 刘琬洋, 权国梅, 刘家奇, 连思琪, 朱国强	3619 中药蛴螬多肽Proberelin抗白色念珠菌活性研究 胡平, 赵卓冉, 袁亚萍, 李莎莎, 景晓愿, 李钟杰
3391 硫化镉纳米粒子对原核生物的毒理作用 王赫, 崔岱宗, 杨典, 赵敏	3631 珊瑚来源真菌 <i>Parengyodontium album</i> SCSIO SX7W11中聚酮化合物的发现及其生物合成途径分析 周晓雪, 杨佳凡, 李明哲, 宋永相, 鞠建华, 李晓帆, 王立岩
3412 肠道微生物在肝细胞癌发生发展中的作用机制及其作为诊断指标的可行性(英文) 李金金, 李占景, 倪加加	3642 分娩方式对北京地区持续母乳喂养的34周龄婴儿肠道菌群影响 方圆, 李玭, 武微, 熊倩, 律娜, 朱宝利, 张玉梅
3413 丛枝菌根真菌数个种的基因组和转录组研究概况 熊天, 梁洁良, 李金天, 束文圣, 王宇涛	3653 结核分枝杆菌耐药相关单碱基突变的计算方法比较 李志远, 刘飞, 曹德民, 潘元龙, 律娜, 刘东鑫, 贺文从, 程城, 王亚楠, 赵雁林, 朱宝利
研究报告	3667 阿卡波糖生物合成调控蛋白的钓取与功能解析 汪雪梅, 翁倩卉, 赵芹芹, 白林泉
3431 贵州紫云刺葡萄自然发酵中野生酿酒酵母基因型多样性分析 杨金仙, 吴成, 王春晓, 田进, 许引虎, 邱树毅	3686 甘肃典型高寒草原退化植物瑞香狼毒对根际土壤微生物群落的影响研究 程济南, 金辉, 许忠祥, 杨晓燕, 秦波, 张金林
3444 基于窖泥微生物相对定量与绝对定量联用的窖泥老熟特征分析 辜杨, 项兴本, 王少磊, 曹荣升, 任聪, 范文来, 徐岩	3705 副溶血弧菌VP2918基因缺失株的构建及功能研究 张海洋, 王权, 刘爽, 戚雪芹, 齐瑜, 刘鹏选, 李洋洋, 郭容, 方维焕, 韩先干, 蒋蔚
3458 基于转录组测序的姬松茸镉胁迫下内参基因筛选 黄在兴, 陈华, 翁伯琦, 刘斌, 王义祥, 刘朋虎	3715 猪源乳杆菌 <i>Lactobacillus reuteri</i> strain DSM和 <i>Lactobacillus taiwanensis</i> strain BCRC对肠道炎症的影响 毛明雨, 张若凡, 黄国文, 李轩, 成艳芬, 余凯凡, 朱伟云
3471 <i>Burkholderia xenovorans</i> LB400联苯双加氧酶及突变体对DDTs的降解 孙成成, 王媛, 李俊德, 陈卫卫, 阎军, 胡晓珂	3726 硒与内生真菌对中华羊茅生长和代谢产物的影响 周连玉, 焦璐, 巨家升, 马学兰, 蒋霞, 乔枫
3483 极耐盐碱固氮菌的分离鉴定及固氮特性研究 曹晶晶, 熊悯梓, 钟亚鹏, 赵盼, 汪志琴, 仲乃琴	3744 基于宏基因组技术解析南极不同纬度地区土壤抗生素抗性基因的分布与迁移 李毅, 张利环, 冯焱, 李宏, 张峰, 白芸, 丁云云, 康美琳, 王雨竹, 雷嘉轩, 申少斐
3496 A型肉毒毒素轻链胞内残留模型的建立 高洁, 王建新, 南楠, 宫赛赛, 李涛, 王慧	学科先贤
3506 构建酿酒酵母细胞工厂高效合成摩尔酸 高惠芳, 邵明龙, 周武林, 张显, 杨套伟, 徐美娟, 高晓冬, 饶志明	3757 霍乱斗士高守一 青宁生
3520 紫花针茅根际和体内真菌群落结构及与土壤环境因子的相关性研究 金辉, 杨晓燕, 柳皓月, 赵玉卉, 郑伟丽, 程济南, 阎灯, 许欣欣, 秦波	其他
3542 小白链霉菌ε-聚赖氨酸降解酶生理功能分析 刁文娇, 朱道君, 潘龙, 陈旭升	封二 《微生物学报》2020年度“优秀论文”名单
3557 混合菌群DBFC对二苯并呋喃的降解特性及其代谢途径 孙倩姝, 白洁, 李辉, 于浩, 胡春辉	文后I 《微生物学报》编委会名单
3582 嵌合鞭毛蛋白和壳聚糖/三聚磷酸(CS/TPP)纳米凝胶封装对鼻接种幽门螺杆菌黏附素诱导的免疫应答的佐剂作用(英文) 翟新, 颜鑫, 孟庆文, 李文婷, 贺进田, 王改珍	文后II 《微生物学报》征稿简则
3583 利用CRISPR-Cas9技术构建敲除VDH的产香兰素拟无枝酸菌 郑义培, 吴丹, 郑璞	封三 欢迎订阅《微生物学报》
	广告
	文前(I/II) 国家微生物科学数据中心
	文前(III/IV) 镇江东方生物工程设备有限公司

CONTENTS

REVIEWS

- 3362 Research progress in proline biosynthesis, degradation and function in bacteria
Yuxia Liu, Shijuan Dou, Xiuling Wang
- 3376 Research progress on autophagy of plant pathogenic fungi
Wei Liu, Chunmei Du
- 3390 Advances of the Gram-negative bacterial type VI secretion system and its function for metal ion acquisition
Wanyang Liu, Guomei Quan, Jiaqi Liu, Siqi Lian, Guoqiang Zhu
- 3400 Toxicity effects of cadmium sulfide nanoparticles on prokaryotes
He Wang, Daizong Cui, Dian Yang, Min Zhao
- 3401 Role and mechanism of intestinal microorganisms in the development of hepatocellular carcinoma and its feasibility as a diagnostic index
Jinjin Li, Zhanjing Li, Jiajia Ni
- 3430 Genomic and transcriptomic studies of several species of arbuscular mycorrhizal fungi
Tian Xiong, Jieliang Liang, Jintian Li, Wensheng Shu, Yutao Wang

RESEARCH ARTICLES

- 3443 Genotype diversity analysis of indigenous *Saccharomyces cerevisiae* during spontaneous fermentations of *Vitis davidii*/Föex in Ziyun, Guizhou
Jinxian Yang, Cheng Wu, Chunxiao Wang, Jin Tian, Yinhu Xu, Shuyi Qiu
- 3457 Profiling the community structure of pit clay during aging process with the combination of relative and absolute quantitative approaches
Yang Gu, Xingben Xiang, Shaolei Wang, Rongsheng Cao, Cong Ren, Wenhai Fan, Yan Xu
- 3470 Screening of reference genes under cadmium stress in *Agaricus brasiliensis* based on transcriptome sequencing
Zaixing Huang, Hua Chen, Boqi Weng, Bin Liu, Yixiang Wang, Penghu Liu
- 3482 The degradation of DDTs by *Burkholderia xenovorans* LB400 biphenyl dioxygenase and mutants
Chengcheng Sun, Yuan Wang, Junde Li, Weiwei Chen, Jun Min, Xiaoke Hu
- 3495 Isolation and identification of extremely salt-tolerant azotobacter and its nitrogen-fixing characteristics
Jingjing Cao, Minzi Xiong, Yapeng Chao, Pan Zhao, Zhiqin Wang, Naiqin Zhong
- 3505 Establishment of an intracellular persistence model of botulinum toxin type A light chain
Jie Gao, Jianxin Wang, Nan Nan, Saisai Gong, Tao Li, Hui Wang
- 3519 Efficient biosynthesis of morolic acid in *Saccharomyces cerevisiae* cell factories
Huifang Gao, Minglong Shao, Wulin Zhou, Xian Zhang, Taowei Yang, Meijuan Xu, Xiaodong Gao, Zhiming Rao
- 3541 The structure of rhizosphere soil and endophytic fungal communities associated with *Stipa purpurea* and their correlation with soil environmental factors
Hui Jin, Xiaoyan Yang, Haoyue Liu, Yuhui Zhao, Weili Zheng, Jinan Cheng, Deng Min, Xinxin Xu, Bo Qin
- 3556 Physiological function analysis of ε-poly-L-lysine-degrading enzymes in *Streptomyces albulus*
Wenjiao Diao, Daojun Zhu, Long Pan, Xusheng Chen
- 3568 Characterization of dibenzofuran biodegradation by a bacterial consortium DBFC
Qianshu Sun, Jie Bai, Hui Li, Hao Yu, Chunhui Hu
- 3569 Adjuvant effects of chimeric flagellin and chitosan/ tripolyphosphate (CS/TPP) nanogel encapsulation on immune response induced by nasal vaccination of *Helicobacter pylori* adhesin
Xin Zhai, Xin Yan, Qingwen Meng, Wenting Li, Jintian He, Gaizhen Wang
- 3593 A vanillin producing *Amycolatopsis* sp. with the VDH gene knockout by CRISPR-Cas9 technology
Yipei Zheng, Dan Wu, Pu Zheng
- 3606 Study on the transcription factor AHA_1581 in *Aeromonas hydrophila* on the regulation mechanism of bacterial physiological functions
Wanxin Li, Yiyang Zhao, Ling Lin, Xiangmin Lin
- 3618 Molecular typing and antimicrobial susceptibility of oxacillin-susceptible, *mecA*-positive *Staphylococcus aureus* from pigs
Pengfei Zhang, Mingying Kou, Qiang Zhang, Meng Zhang, Xu Xu, Yujia Zhang, Ting Wang, Xuewei Yang, Congming Wu, Xin Wang
- 3630 Activity of the antimicrobial peptide probrelin from traditional Chinese medicine grub against *Candida albicans*
Ping Hu, Zhouran Zhao, Yaping Yuan, Shasha Li, Xiaoyuan Jing, Zhongjie Li
- 3641 Discovery of polyketide natural products from corals derived fungi *Parengyodontium album* SCSIO SX7W11 and their biosynthetic pathway analysis
Xiaoxue Zhou, Jiafan Yang, Mingzhe Li, Yongxiang Song, Jianhua Ju, Xiaofan Li, Liyan Wang
- 3652 The impact of delivery mode on the gut microbiota of 34-week-old infants continuously breastfed in Beijing
Yuan Fang, Pin Li, Wei Wu, Qian Xiong, Na Lü, Baoli Zhu, Yumei Zhang
- 3666 Evaluation of three methods searching resistant-related mutations in *Mycobacterium tuberculosis* genome
Zhiyuan Li, Fei Liu, Demin Cao, Yuanlong Pan, Na Lü, Dongxin Liu, Wencong He, Cheng Cheng, Yanan Wang, Yanlin Zhao, Baoli Zhu
- 3685 Mining and function studies of regulators for acarbose biosynthesis in *Actinoplanes* sp. SE50/110
Xuemei Wang, Qianhui Weng, Qinjin Zhao, Linquan Bai
- 3704 Effects of degraded plant *Stellera chamaejasme* L. on the rhizosphere soil microbial communities in typical alpine grassland, Gansu Province
Jinan Cheng, Hui Jin, Zhongxiang Xu, Xiaoyan Yang, Bo Qin, Jinlin Zhang
- 3714 Gene deletion and functional analysis of vp2918 gene in *Vibrio parahaemolyticus*
Haiyang Zhang, Quan Wang, Shuang Liu, Xueqin Qi, Yu Qi, Pengxuan Liu, Yangyang Li, Rong Guo, Weihuan Fang, Xian'gan Han, Wei Jiang
- 3725 Effects of *Lactobacillus reuteri* strain DSM and *Lactobacillus taiwanensis* strain BCRC on intestinal inflammation
Mingyu Mao, Ruofan Zhang, Guowen Huang, Xuan Li, Yanfen Cheng, Kaifan Yu, Weiyun Zhu
- 3743 Effects of Se and *Epichloë* endophyte on the growth and metabolic compounds of *Festuca sinensis*
Lianyu Zhou, Lu Jiao, Jiasheng Ju, Xuelan Ma, Xia Jiang, Feng Qiao
- 3756 Deciphering distribution and migration of soil antibiotic resistance genes in different latitude regions of Antarctica by metagenomics
Yi Li, Lihuan Zhang, Yan Feng, Hong Li, Feng Zhang, Yun Bai, Yunyun Ding, Meilin Kang, Yuzhu Wang, Jiaxuan Lei, Shaofei Shen

(本期责编：李磊)