

中国科技核心期刊
《CAJ-CD规范》执行优秀期刊
中国农林核心期刊

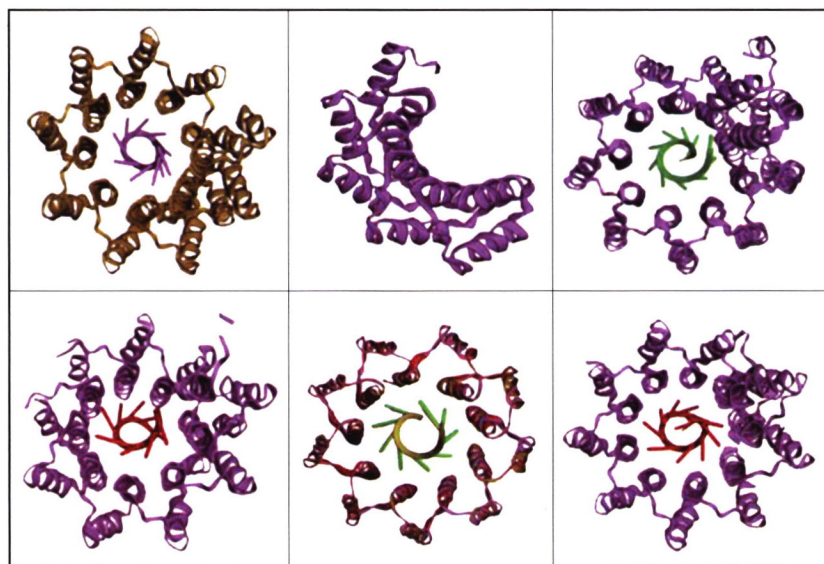
QK2223350 N 0412-0914
11-2184/Q

植物病理学报

ACTA PHYTOPATHOLOGICA SINICA

ZHIWU BINGLI XUEBAO

VOL.52 NO.3 2022



ISSN 0412-0914



中国植物病理学会
中国农业大学 主办

2022年6月
52卷第3期

植物病理学报

第 52 卷 第 3 期

目 次

2022 年 6 月

病原学

- 301 瓜拟多隔孢引起的砂田西瓜叶疫病
何苏琴, 文朝慧, 白滨, 张广荣, 孙述俊

细胞生物学、生理学、生物化学、分子生物学

- 310 荔枝霜疫霉自噬相关基因的鉴定与表达分析
王荣波, 陈妹樽, 郭滕滕, 李文强, 刘裴清, 李本金, 翁启勇, 陈庆河
- 321 香蕉枯萎病菌 *myosin-1* 基因的功能分析及外施 dsRNA 介导的抗性评估 曾凡云, 刘远征, 王艳玮, 漆艳香, 张欣, 谢艺贤, 彭军
- 334 丁香假单胞菌 III 型分泌系统组分 HrpH 酶学功能解析
王若娜, 马毅楠, 李俊州, 王远宏, 魏海雷
- 341 假禾谷镰孢中三角状五肽重复蛋白的全基因组鉴定与表达分析 王利民, 孟家兴, 庄训宇, 张媛, 李海洋, 陈琳琳, 汪敏, 丁胜利, 李洪连
- 352 L-半胱氨酸对稻曲病菌菌丝生长的抑制作用及其转录组分析 张璐, 赵心雨, 郭宇燕, 胡东维, 梁五生
- 364 西芹腐根二次酮层物对黄瓜枯萎病的诱导抗性及其转录组学分析 郭嘉华, 武兆昕, 李蕾, 云兴福
- 377 西瓜噬酸菌铜代谢相关基因 *copZ* 功能分析 刘堰凤, 关巍, 王铁霖, 李展鸿, 杨玉文, 刘慧芹, 赵廷昌
- 388 南瓜蚜传黄化病毒甜瓜分离物的侵染性克隆构建 任倩, 刘莉铭, 彭斌, 康保珊, 吴会杰, 古勤生

致病性抗病性遗传

- 396 陕西省小麦白粉菌群体毒性结构及遗传多样性
李莹, 马康杰, 宫丹丹, 吴蕾, 李强, 王保通
- 404 吉林省主栽水稻品种抗瘟性评价及抗瘟基因型鉴定
杨林浩, 王瀚, 赵丹, 李泽豪, 林品轩, 李大勇, 孙文献

流行学与生态学

- 416 江苏省稻瘟病菌对稻瘟灵的抗药性监测及特性分析

潘夏艳, 朱凤, 齐中强, 郭雨洁, 于俊杰, 张荣胜, 刘永锋

植物病害及其防治

- 425 两株木霉共培养发酵提高对小麦苗期茎基腐病的防治效果
陈凯, 隋丽娜, 杨凯, 赵忠娟, 扈进冬, 李纪顺
- 434 醚菌酯对假禾谷镰孢的抑制作用及对小麦茎基腐病的防效研究 王莉莉, 徐建强, 朱凯, 孙莹, 郑伟, 侯颖
- 443 烯酰吗啉对葡萄叶际微生物区系影响研究
何涛, 杜鸿燕, 孙家秀, 陈吉越, 邓维萍, 朱书生, 何霞红, 杜飞
- 459 翠香猕猴桃黑点病与果实矿质元素失调相关性
刘巍, 吴治然, 王丽, 陈霖晖, 秦虎强, 黄丽丽
- 465 镰刀菌酸在尖孢镰刀菌侵染过程中的产生规律及运输过程探究
王瑞瑞, 王敏, 曾吉兴, 朱林星, 郭世伟
- 476 利用枯草芽胞杆菌表达系统进行马铃薯抗细菌基因的筛选 郭鹏飞, 张家欣, 王洁玉, 董五辈

研究简报

- 489 广西苦瓜棒孢叶斑病的病原鉴定
秦健, 刘杏连, 康德贤, 黎炎, 黄如葵, 吴永官
- 493 引起花生果腐病的新孢镰刀菌及其生物学特性
何弯弯, 冯丽娜, 李振云, 张锴, 张友青, 温晓蕾, 孙伟明
- 499 香榧根腐病病原菌分离鉴定及绿色药剂筛选
张思琦, 沈黄莹, 庾金武, 苏秀, 周水根, 周旭东, 林海萍
- 504 首次发现巴西果胶杆菌 (*Pectobacterium brasiliense*) 引起甘薯茎腐病
马媛媛, 罗金燕, 王艳丽, 朱洁, 李斌, 安千里
- 508 山东局地甜瓜细菌性茎软腐病病原菌的分离与鉴定
李磊, 张子玉, 赵昱榕, 谢华, 石延霞, 柴阿丽, 谢学文, 李宝聚

封面照片的注释见王利民等的文章(348 页)。

ACTAPHYTOPATHOLOGICASINICA

Volume 52 Number 3

CONTENTS

June 2022

ETIOLOGY

- 301 Watermelon foliar blight caused by *Stagonosporopsis cucurbitacearum* in gravel-mulched field
HE Suqin, WEN Zhaohui, BAI Bin, ZHANG Guangrong, SUN Shujun

CELL BIOLOGY, PHYSIOLOGY, BIOCHEMISTRY, AND MOLECULAR BIOLOGY

- 310 Identification and expression analysis of autophagy-related genes in *Peronophythora litchii*
WANG Rongbo, CHEN Shuzun, GUO Mengmeng, LI Wenqiang, LIU Peiqing, LI Benjin, WENG Qiyong, CHEN Qinghe
- 321 Functional analysis of *myosin-1* in *Fusarium oxysporum* f. sp. *cubense* race 4 and evaluation of resistance mediated by exogenous dsRNA
ZENG Fanyun, LIU Yuanzheng, WANG Yanwei, QI Yanxiang, ZHANG Xin, XIE Yixian, PENG Jun
- 334 Enzymatic characterization of the type III secretion system substrate HrpH in *Pseudomonas syringae*
WANG Ruona, MA Yinan, LI Junzhou, WANG Yuanhong, WEI Hailei
- 341 Genome-wide identification and expression analysis of pentatricopeptide repeat proteins in *Fusarium pseudograminearum*
WANG Limin, MENG Jiaxing, ZHUANG Xunyu, ZHANG Yuan, LI Haiyang, CHEN Linlin, WANG Min, DING Shengli, LI Honglian
- 352 Inhibitory effect of L-cysteine on the mycelial growth of *Villosiclava virens* and its transcriptome analysis
ZHANG Lu, ZHAO Xinyu, GUO Yuyan, HU Dongwei, LIANG Wusheng
- 364 Resistance to *Fusarium* wilt in cucumber seedlings induced by acetone extract from celery rotten roots and its transcriptome analysis
GUO Jiahua, WU Zhaoxin, LI Lei, YUN Xingfu
- 377 Functional analysis of *copZ* involved in copper metabolism of *Acidovorax citrulli*
LIU Yanfeng, GUAN Wei, WANG Tielin, LI Zhanhong, YANG Yuwen, LIU Huiqin, ZHAO Tingchang
- 388 Construction of infectious clone of cucurbit aphid-borne yellows virus melon isolate
REN Qian, LIU Liming, PENG Bin, KANG Baoshan, WU Huijie, GU Qinsheng

GENETICS OF DISEASE-RESISTANCE AND PATHOGENICITY

- 396 Virulence and genetic diversity of *Blumeria graminis* f. sp. *tritici* population in Shaanxi Province
LI Ying, MA Kangjie, GONG Dandan, WU Lei, LI Qiang, WANG Baotong
- 404 Rice blast resistance evaluation and identification of major blast resistance genes in main rice varieties in Jilin Province, China
YANG Linhao, WANG Han, ZHAO Dan, LI Zehao, LIN Pinxuan, LI Dayong, SUN Wenxian

EPIDEMIOLOGY AND ECOLOGY

- 416 Sensitivity test and characteristic analysis of *Magnaporthe oryzae* to isoprothiolane in Jiangsu Province
PAN Xiayan, ZHU Feng, QI Zhongqiang, GUO Yujie, YU Junjie, ZHANG Rongsheng, LIU Yongfeng

PLANT DISEASE AND CONTROL

- 425 Co-culturation of two *Trichoderma* strains enhanced control efficiency against wheat crown rot at seedling stage
CHEN Kai, SUI Lina, YANG Kai, ZHAO Zhongjuan, HU Jindong, LI Jishun
- 434 Inhibitory effect of kresoxim-methyl on *Fusarium pseudograminearum* and control effect on crown rot of wheat
WANG Lili, XU Jianqiang, ZHU Kai, SUN Ying, ZHENG Wei, HOU Ying
- 443 Effects of dimethomorph on the microflora of grape leaf
HE Tao, DU Hongyan, SUN Jiaxiu, CHEN Jiyue, DENG weiping, ZHU Shusheng, HE Xiahong, DU Fei
- 459 Correlation between the occurrence of 'Cuixiang' kiwifruit black spot and imbalance of mineral elements of fruits
LIU Wei, WU Zhiran, WANG Li, CHEN Jihui, QIN Huqiang, HUANG Lili
- 465 Study on the production and transportation of Fusaric acid during *Fusarium oxysporum* infection
WANG Ruirui, WANG Min, ZENG Jixing, ZHU Linxing, GUO Shiwei
- 476 Screening of potato antimicrobial genes using a *Bacillus subtilis* expression system
GUO Pengfei, ZHANG Jiaxin, WANG Jieyu, DONG Wubei

RESEARCH NOTES

- 489 Identification of pathogen from *Corynespora* leaf spot on balsam pear in Guangxi
QIN Jian, LIU Xinglian, KANG Dexian, LI Yan, HUANG Rukui, WU Yongguan
- 493 *Fusarium neocosmosporiellum* causing peanut pod rot and its biological characteristics
HE Wanwan, FENG Lina, LI Zhenyun, ZHANG Kai, ZHANG Youqing, WEN Xiaolei, SUN Weiming
- 499 Pathogen identification of *Torreya grandis* root rot and green fungicides screening
ZHANG Siqi, SHEN Huangying, YU Jinwu, SU Xiu, ZHOU Shuigen, ZHOU Xudong, LIN Haiping
- 504 First report of *Pectobacterium brasiliense* causing stem rot disease of sweet potato
MA Yuanyuan, LUO Jinyan, WANG Yanli, ZHU Jie, LI Bin, AN Qianli
- 508 Isolation and identification of the pathogen of bacterial stem soft rot of muskmelon in some areas of Shandong Province
LI Lei, ZHANG Ziyu, ZHAO Yurong, XIE Hua, SHI Yanxia, CHAI Ali, XIE Xuewen, LI Baoju

《植物病理学报》编辑委员会 Editorial Board of ACTA PHYTOPATHOLOGICA SINICA

主 编 (Editor-in-Chief): 郭泽建 (Guo Zejian)

副主编 (Associate Editors-in-Chief) (以姓氏笔画为序):

于嘉林 (Yu Jialin)

孙文献 (Sun Wenxian)

陈功友 (Chen Gongyou)

周益林 (Zhou Yilin)

姜道宏 (Jiang Daohong)

简 恒 (Jian Heng)

窦道龙 (Dou Daolong)

编 委 (Members of Editorial Board) (以姓氏笔画为序):

马 平 (Ma Ping)

马忠华 (Ma Zhonghua)

王文明 (Wang Wenming)

王宗华 (Wang Zonghua)

王锡锋 (Wang Xifeng)

王源超 (Wang Yuanchao)

朱振东 (Zhu Zhendong)

刘文德 (Liu Wende)

严 进 (Yan Jin)

李大伟 (Li Dawei)

李洪连 (Li Honglian)

何勇强 (He Yongqiang)

宋凤鸣 (Song Fengming)

张力群 (Zhang Liqun)

张正光 (Zhang Zhengguang)

陈立杰 (Chen Lijie)

陈保善 (Chen Baoshan)

范 军 (Fan Jun)

罗朝喜 (Luo Chaoxi)

周明国 (Zhou Mingguo)

周雪平 (Zhou Xueping)

单卫星 (Shan Weixing)

姜子德 (Jiang Zide)

钱 韦 (Qian Wei)

钱国良 (Qian Guoliang)

曹克强 (Cao Keqiang)

康振生 (Kang Zhensheng)

彭友良 (Peng Youliang)

彭德良 (Peng Deliang)

储昭辉 (Chu Zhaohui)

魏太云 (Wei Taiyun)

Overseas Members of Editorial Board: Yong Luo

Cindy Morris

Yinong Yang

Tom Hsiang

Wong Sek Man

Xiao-Bing Yang

Philippe C. Nicot

责任编辑 (Executive Editors): 于金枝 (Yu Jinzhi)

曾晓葳 (Zeng Xiaowei)

植物病理学报 (双月刊)

2022 年第 52 卷第 3 期 (1955 年创刊)

编 辑 《植物病理学报》编辑部

(地址: 中国农业大学植保楼

1036 室 北京 100193)

电话: 010-62732364

传真: 010-62813785

E-mail: zwbldb@cau.edu.cn

网址: <http://zwbldb.magtech.com.cn>

主 编 郭泽建

主 管 中国科学技术协会

主 办 中国植物病理学会

中国农业大学

出 版 中国植物病理学会

印 刷 北京科信印刷有限公司

国内发行 中国邮政集团有限公司

北京市报刊发行局

国外发行 中国国际图书贸易集团有限公司

(北京 399 信箱)

ACTA PHYTOPATHOLOGICA SINICA (Bimonthly)

Vol. 52 No. 3 2022 (Started in 1955)

Edited by Editorial Board of ACTA PHYTOPATHOLOGICA SINICA

(1036 Plant Protection Bldg., China Agricultural

University, Beijing 100193)

Editor-in-Chief Guo Zejian

Responsible Institution China Association for Science and Technology

Sponsored by Chinese Society for Plant Pathology

China Agricultural University

Published by Chinese Society for Plant Pathology

Printed by Beijing Kexin Printing Co., Ltd

Beijing 102208

Distributed by

Domestic China Post Group Co., Ltd, Beijing Bureau for Distribution of

Newspapers and Journals (Periodical No. 82-214)

Foreign China International Book Trading Corporation

(P. O. Box 399, Beijing, China) (No. Q447)