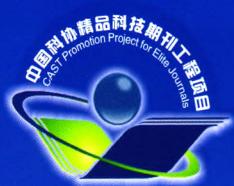


ISSN 1002-7807
CN 41-1163/S



MIANHUA XUEBAO

棉花学报

Cotton Science

2014年 第二十六卷 第一期 Vol. 26 No. 1

中国农学会
中国农业科学院棉花研究所 主办

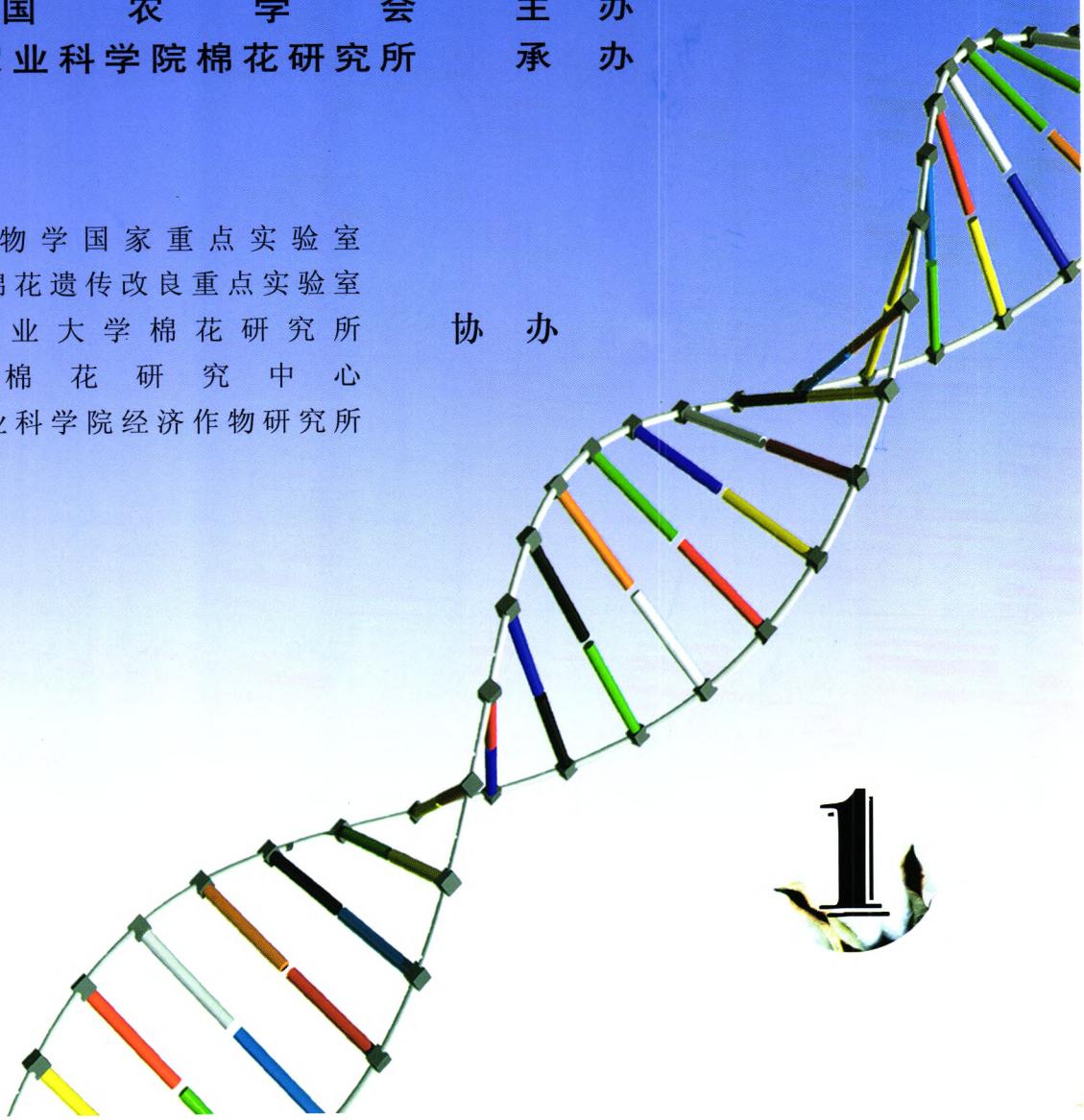
棉花生物学国家重点实验室
农业部棉花遗传改良重点实验室
河北农业大学棉花研究所
山东棉花研究中心
新疆农业科学院经济作物研究所

协办



9 771002 780146

万方数据



棉花学报

Mianhua Xuebao

Cotton Science

ISSN 1002-7807

CN 41-1163/S

2014年, 第26卷, 第1期, 1月15日

目 次

·研究与进展·

- (1) 棉花三系杂交种不同生态区遗传效应及优势表现 崔艳利, 郭立平, 邢朝柱, 等
- (10) 棉花黄萎病生防芽孢杆菌Z-5菌株发酵培养基的优化 张冬冬, 姜军坡, 朱宝成
- (18) 1株抗草甘膦棉花突变体草甘膦抗性的初步鉴定 巩元勇, 郭书巧, 束红梅, 等
- (25) 陆地棉主要农艺与纤维品质性状的双列杂交分析 刘艳改, 马雄风, 周晓箭, 等
- (34) 光质对离体诱导棕色棉纤维基因表达影响的cDNA-SRAP分析 陈沙沙, 樊洪泓, 关蕾, 等
- (41) 灌溉制度对机采棉生长、产量及品质的影响 王峰, 孙景生, 刘祖贵, 等
- (49) 山东植棉区降水与棉花需水耦合度的时空变化特征分析 崔日鲜, 付金东
- (58) 灌溉水盐度和施氮量对棉花根系分布影响研究 闵伟, 侯振安, 冶军, 等
- (66) NaCl胁迫对棉花叶片衰老特征的影响及其生理学机制 王涛, 孔祥强, 宋迎, 等
- (73) 河南植棉区施氮量对麦棉两熟产量及氮肥利用率的影响 董合林, 李鹏程, 刘爱忠, 等
- (81) 陆地棉种子发育过程中microRNA的挖掘与功能研究 Wang Gaskin, 余道乾, 杜雄明
- (87) 一种快速提取棉花干种子基因组DNA的新方法 郎需勇, 刘伟霞, 杨亮, 等

棉花学报

Mianhua Xuebao

Cotton Science

ISSN 1002-7807

CN 41-1163/S

2014, Vol. 26, No. 1, January 15

Contents

•RESEARCH REPORTS•

- (1) Genetic Effects and Heterosis of Three-line Hybrid Cotton in Different Ecological Environments Cui Yanli, Guo Liping, Xing Chaozhu, et al
- (10) Optimization of Fermentation Conditions of a Biocontrol Bacterial Isolate *Bacillus Z-5* against Cotton Verticillium Wilt Zhang Dongdong, Jiang Junpo, Zhu Baocheng
- (18) Preliminary Identification of Glyphosate Resistance of a New Cotton Mutant Gong Yuanyong, Guo Shuqiao, Shu Hongmei, et al
- (25) Report on Diallel Analysis for Main Agronomic and Fiber Quality Traits in Upland Cotton Liu Yan'gai, Ma Xiongfeng, Zhou Xiaojian, et al
- (34) Differential Expression Analysis of the Effect of Light Quality on Tissue Culture of Brown Cotton Fiber by cDNA-SRAP Chen Shasha, Fan Honghong, Guan Lei, et al
- (41) Effects of Irrigation Scheduling on Growth, Yield and Fiber Quality of Cotton under Mechanical Harvest Cropping Model Wang Feng, Sun Jingsheng, Liu Zugui, et al
- (49) Spatial and Temporal Variation of Coupling between Rainfall and Crop Water Requirements of Cotton in Shandong Cui Rixian, Fu Jindong
- (58) Effects of Water Salinity and Nitrogen Rate on Cotton Root Spatial Distribution under Drip Irrigation with Saline Water Min Wei, Hou Zhenan, Ye Jun, et al
- (66) The Effects of NaCl Stress on Cotton Leaf Senescence Characteristics and Physiological Mechanisms Wang Tao, Kong Xiangqiang, Song Ying, et al
- (73) Effect of Nitrogen Application Rate on Yield and Nitrogen Use Efficiency of Wheat-Cotton Double Cropping in the Henan Cotton Region Dong Helin, Li Pengcheng, Liu Aizhong, et al
- (81) Identification of microRNAs in Upland Cotton Wang Gaskin, Yu Daoqian, Du Xiongming
- (87) A New Rapid DNA Extraction Method Suitable for Dry Cotton Seed Lang Xuyong, Liu Weixia, Yang Liang, et al



1989 年创刊, 2014 年第 26 卷第 1 期, Vol. 26, No.1, 单月 15 日出版发行

本刊被 AGRICOLA, AGRIS, CABI 收录 COTTON SCIENCE is indexed in AGRICOLA, AGRIS and CABI.

编委会

顾问: 卢良恕 洪俊曾 路明 季道藩 潘家驹 黄滋康 汪若海 夏敬源 项时康

主任: 王坤波 副主任: 张天真 张献龙

委员: 别墅 崔金杰 段留生 房卫平 郭香墨 简桂良 KOHEL, R J 李付广 李雪源 马峙英 毛树春 裴炎 王留明 吴孔明院士 夏桂先 YU, John Z 瞿学军 ZHANG, Jin-fa 周治国 朱军 祝水金 朱玉贤院士

EDITORIAL BOARD (Technical Editors)

Prof. Dr. BIE, Shu(crop production and tillage)
Industrial Crop Institute of Hubei Academy of Agricultural Sciences, Wuhan 430064, China
bieshu02@163.com

Prof. Dr. CUI, Jin-jie (integrated pests management and bio-safety of GMOs)
Cotton Research Institute of CAAS
Anyang, Henan 455000, China
cuijj@cricaas.com.cn

Prof. Dr. DUAN, Liu-sheng(physiology, metabolism and regulation)
College of Agronomy and Biotechnology, China Agri Univ, 2 Yuanmingyuan Xilu, Beijing 100193, China
duanls@cau.edu.cn

Prof. Dr. FANG, Wei-ping (cotton genetics & breeding)
Industrial Crop Research Institute, Henan Academy of Agricultural Sciences
Zhengzhou 450002, China
hncot@163.com

Prof. GUO, Xiang-mo(breeding)
Cotton Research Institute of CAAS
Anyang, Henan 455000, China
gxm214@126.com

Prof. JIAN, Gui-liang (pathology)
Plant Protection Research Institute of CAAS,
2 Yuanmingyuan Xilu, Beijing 100193, China
jianguiliang@yahoo.com.cn

Dr. KOHEL, Russel J (genetics)
Cotton Germplasm Research Unit,
Southern Plain Agriculture Research Center,
USDA-ARS, 2881 F&B Road,
College Station, TX 77845, USA
kohel@qutun.tamu.edu

Prof. Dr. LI, Fu-guang (biotechnology)
Cotton Research Institute of CAAS,
Anyang, Henan 455000, China
lifug@cricaas.com.cn

Prof. LI, Xue-yuan(breeding)
Institute of Industrial Crops, Xinjiang
Academy of Agricultural Sciences,

38 Nanchanglu, Urumqi 830000, China
yixiantao@sina.com

Prof. Dr. MA, Zhi-ying(genetics and breeding)
Agricultural University of Hebei,
Baoding, Hebei 071001, China
mzhy@mail.hebau.edu.cn

Prof. MAO, Shu-chun (technology and production)
Cotton Research Institute of CAAS,
Anyang, Henan 455000, China
maosc@cricaas.com.cn

Prof. Dr. PEI, Yan (fiber development and fiber improvement of cotton)
Biotechnology Research Center, Southwest Univ, Beibei, Chongqing 400716, China
peiyian3@swu.edu.cn

Prof. WANG, Liu-ming (breeding)
Shandong Cotton Research Center of SAAS,
Jinan 250100, China
screwlm@saas.com.cn

Prof. WANG, Kun-bo(germplasm and inter-specific hybridization)
Cotton Research Institute of CAAS,
Anyang, Henan 455000, China
wkberi@cricaas.com.cn

Academician, CAE, Prof. Dr. WU, Kong-ming(integrated pest management)
Institute of Plant Protection of CAAS,
2 Yuanmingyuan Xilu, Beijing 100193, China
wkm@caascose.net.cn

Prof. Dr. XIA, Gui-xian(molecular biology)
Institute of Microbiology, Chinese Academy of Sciences, Beijing 100080, China
guixianx@yahoo.com

Dr. YU, John Z (germplasm and genetics)
USDA-ARS-SPARC, Crop Germplasm Research Unit, College Station, TX 77845, USA
zyu@qutun.tamu.edu

Prof. Dr. ZHAI, Xue-jun(breeding methodology and abiotic stress)

National Semi-drought Agro-engineer Tech Research Center,
Shijiazhuang, Hebei 050051, China
houy@371.net

Prof. Dr. ZHANG, Jin-fa (genetics, breeding and biotechnology)
Department of Agronomy and Horticulture,
New Mexico State University, Las Cruces,
NM88001, USA
jinzhang@nmsu.edu

Prof. Dr. ZHANG, Tian-zhen (genetics, genome analysis and molecular breeding)
Cotton Research Institute of Nanjing Agri Univ,
Weigang, Nanjing 210095, China
cotton@njau.edu.cn

Prof. Dr. ZHANG, Xian-long(tissue culture and genetic transformation)
Huazhong Agri Univ,
Shizishan, Wuchang 430070, China
xlzhang@mail.hzau.edu.cn

Prof. Dr. ZHOU, Zhi-guo(crop physiology and ecology and agriculture information technology)
Nanjing Agricultural University,
Weigang, Nanjing 210095, China
giscott@njau.edu.cn

Prof. Dr. ZHU, Jun (bioinformatics and quantitative genetics)
Zhejiang University,
Huajiachi Campus, Hangzhou 310029, China
jzhu@zju.edu.cn

Prof. Dr. ZHU, Shui-jin (genetics, breeding and biotechnology)
College of Agri & Biotech, Zhejiang University,
Huajiachi Campus, Hangzhou 310029, China
shjzhu@zju.edu.cn

Academician, CAS, Prof. Dr. ZHU, Yu-xian (plant physiology and molecular biology)
College of Life Sciences, Peking University,
Beijing 100871, China
zhuyx@water.pku.edu.cn

主管: 中国科协
主办: 中国农学会
承办: 中国农业科学院棉花研究所
协办: 棉花生物学国家重点实验室
农业部棉花遗传改良重点实验室
河北农业大学棉花研究所
山东棉花研究中心
新疆农业科学院经济作物研究所
编辑出版: 中国棉花杂志社
地址: 河南省安阳市开发区黄河大道 38 号中棉所办公区
邮编: 455000
广告经营许可证: 4105004001001
印刷: 安阳市泰亨印刷有限责任公司

总编: 喻树迅院士
Editor-in-chief: Academician, CAE, Prof. Dr. YU, Shu-xun
责任编辑: 牛巧鱼
电话: (0372) 2525361/362/369
传真: (0372) 2525361
E-mail: journal@cricaas.com.cn; cottonsci@gmail.com
http://journal.cricaas.com.cn
国内发行: 河南省安阳市邮政局
国内代号: 36-63
国外发行: 中国国际图书贸易总公司 (北京 399 信箱)
国外代号: BM6545
国内定价: ¥120.00/年, 单价: ¥20.00/期
国外定价: US\$80/年, 单价: US\$15/期

期刊基本参数: CN 41-1163/S * 1989 * B * 大 16 * 96 * Zh * P * ¥20.00 * 1000 * 12 * 2014-1

刊号: ISSN 1002-7807/CN 41-1163/S