

江苏农业科学

第 47 卷 第 21 期 2019 年 11 月 5 日

目 次

●“乡村振兴”专栏

生态保护与经济发展协同机制研究——基于南京市美丽乡村建设的思考

- 马志娟,王诗雨,吴春兰,等(1)
- 蔬菜在休闲农业中的创意应用 梅雪莹,贾新平,贾俊丽,等(5)
- 草本芳香植物在休闲农业中的应用 罗海蓉,贾俊丽,梅雪莹,等(11)
- 基于乡村振兴战略的旅游性村镇规划初探——以安徽省霍山县某镇为例 杨成栋,李长奇,王小兰(16)
- 我国农业绿色全要素生产率水平及绿色转型路径分析 黄稳书,胡丽丽(21)
- 基于地貌形态的湖南星级农庄空间分布 黄国林,曾 斌,李卫东,等(28)
- 江南稻作文化景观模式探索——以南京溧水郭兴村为例 罗 璇,徐 悦(33)
- 基于网络评论的乡村旅游住宿质量评价——结合 AHP 和 BP 神经网络的实证分析 ... 刘文龙,吉蓉蓉(38)
- 双创背景下新农人乡村旅游创新活动类型、空间分布与影响因素——以浙江省为例
- 刘传喜,唐代剑(44)
- 江苏省农业特色小镇发展路径评价与优化 张月兰,王 芳(49)
- 中国“淘宝村”的农村社区嵌入型创业发展路径探析 吕 齐,李良睿,樊孝凤(53)
- 基于乡村振兴的农村宅基地低效利用问题及驱动机制——以重庆市北碚区澄江镇五一村为例
- 陈 琦,何多兴,翟羽佳(56)

●专论与综述

- 植物病毒混合侵染研究进展 贺 振,甘海峰,陈 雯(60)
- miRNA 调控植物抗逆机制的研究现状 李昕晏,崔 杰,李俊良,等(63)
- 鸡蛋脂肪酸组成营养调控的研究进展 张 蓉,尚以顺,吴佳海,等(67)
- 转基因作物快速检测技术进展与展望 梁晋刚,徐俊锋,焦 悦,等(71)
- 无人机在现代农业中的应用综述 苏瑞东(75)
- 我国睡莲研究现状及展望 苏 群,卜朝阳,张进忠,等(79)
- 利用诱捕作物防除向日葵列当的研究现状及展望 邱 娜,崔 超,王 靖,等(84)
- 微藻富集重金属的机制及在环境修复中的应用综述 杨 荧,刘莉文,李建宏(88)
- 全混式厌氧发酵反应器(CSTR)研究进展 赵兰兰,郭占斌,王心语,等(95)

●生物技术

- 斜纹夜蛾核型多角体病毒 II 型分离株同源重复区 *hrI* 的结构功能分析 ... 刘惠芬,衣葵花,刘文光,等(100)

罗非鱼 <i>SIRT1</i> 基因的克隆及其表达规律分析	陈亨德,褚武英,李玉琬,等(103)
香蕉 EST-SNP 标记的开发	赵 涛,王静毅,刘菊华,等(107)
金艳猕猴桃组织培养适宜条件筛选	吴燕燕,章辰飞,吴志勇,等(111)
杜梨响应盐胁迫 <i>CIPK01</i> 的克隆及表达分析	王 影,李 慧,蔺 经,等(115)

●遗传育种与耕作栽培

硒和谷胱甘肽复合作用对大麦苗生理和抗氧化特性的影响	赵风云,宋新华(120)
利用 SSR 标记分析高含油量甘蓝型油菜种质资源遗传多样性	薛 艳,李 英,谌国鹏,等(124)
秸秆还田方式对半干旱区春玉米生长特性、产量及水分利用效率的影响	徐莹莹,王俊河,刘玉涛,等(128)
长期施肥对旱地谷子产量和养分利用效率的影响	王晓军,孙玉琴,杨军学,等(133)
粳稻扬粳 3012 在不同播期条件下的产量表现	张林巧,尹 康,杨德祯,等(137)
猪粪与氮肥配施对水稻生长及氮素利用的影响	郑网宇,吴园园,张 辉,等(139)
夜间增温对南京地区冬小麦生产的影响	苏海报,陈 昆,江晓东,等(144)
杂交中粳新组合宁香优 2 号的选育和应用	赵庆勇,张亚东,陈 涛,等(148)
水稻机械化直播品比试验适宜播种量研究	黄年生,曾 波,李爱宏,等(152)
优质高产抗病小麦新品种宁麦资 126 的选育及栽培技术	吴纪中,吴小有,张巧凤,等(157)

●植物保护

3 种杀菌剂对 2015—2016 年东北和华北地区致病疫霉群体的室内毒力测定	屈智莲,赵冬梅,杨志辉,等(160)
苍耳子不同萃取相的抗菌及杀蚜活性	周 雍,王 伟,魏 磊,等(165)
小花宽叶十万错石油醚萃取相 GC-MS 分析及其化感作用研究	李晓霞,沈奕德,刘 延,等(168)
乌头霜霉病病原菌生物学特性及致病力	王 婷,陈茂婷,王卓源,等(172)
濒危药用植物青天葵内生真菌的鉴定及抑菌活性研究	宋利沙,蒋 妮,蓝祖裁,等(175)

●园艺与林学

不同形态氮肥供应对草莓宁玉生长的影响	庞夫花,赵密珍,王 静,等(179)
多效唑对桃熏草莓生长与果实品质的影响	王全智,孙朋朋,吴文文,等(182)
河沙、甘草渣混配基质理化性状及其对草莓生长的影响	马全会,张 娟,刘义飞,等(185)
江苏省葡萄农药与化肥使用情况调查及其减量、减次施用建议	钱亚明,吴伟民,王壮伟,等(189)
不同授粉品种对南果梨果实性状的影响	徐 锴,赵德英,袁继存,等(191)
氮磷钾配方施肥对灵武长枣果实品质和产量的影响	王文放,孙亚萍,李占文,等(195)
负载量水平对矮化中间砧苹果生长发育、光合作用及产量品质的影响	薛晓敏,韩雪平,王来平,等(202)
低温胁迫下橄榄耐寒性研究	彭远琴,赵金星,邱志浩,等(207)
草坪式屋顶绿化中 4 种景天科植物的抗旱性	吴小青,陈思逸,曹 丹,等(210)
重金属铅对怀牛膝根际土壤酶活性及药材化学成分的影响	王新民,魏志华,李利红,等(214)
钼硼肥对关苍术花部综合特征及产量性状的影响	计 禹,王 悦,王 敏,等(216)
水杨酸处理对低温胁迫豇豆幼苗生理生态特性的影响	向 娟,潘绍坤,鲁荣海,等(220)

丛枝菌根真菌对镍胁迫桂花幼苗光合作用及抗氧化酶活性的影响】 李晓曼,王建军(223)

● 畜牧兽医与水产蚕桑

猪传染性胸膜肺炎放线杆菌分离鉴定及 *floR* 基因检测 罗行炜,孙华润,魏单单,等(228)

金荞麦对肉仔鸡抗氧化功能、肠道屏障功能及血清生化指标的影响 谭露霖,张定红,张 洁,等(232)

不同油脂水平日粮添加胆汁酸对肉鸡肝脏及其脂代谢的影响 葛晓可,李 璐,马晓娇,等(236)

酵母菌发酵对常用饲料原料营养指标和抗营养因子含量的影响 谢 鹏,袁 园,葛 莹,等(241)

苏紫黑猪 1~5 世代繁殖与生长性能分析 王学敏,涂 枫,任守文,等(247)

● 贮藏加工与检测分析

⁶⁰Co- γ 辐照对中式传统菜肴方便食品品质的影响 陈 谦,杨 敏,高 鹏,等(249)

人参多糖 3 种提取工艺的优化比较 赵立春,张亚玉,李小平,等(254)

微波辐射法提取藏药唐古特乌头总生物碱的工艺 李钦玲,陈玉乾(260)

基于正交设计的云南烟叶打叶技术研究 许 强,胡宗玉,李少鹏,等(263)

UV-B 对红豆杉不同提取方式紫杉醇含量的影响 郝婧玮,梅念念,渠利霞,等(266)

● 农业工程与信息技术

中部烟叶主脉的力学特性试验 全振伟,张秀丽,邹彩虹,等(270)

某采棉机大梁结构设计与优化 吾尔科木·冉合木,买买提明·艾尼,伊里哈木·阿不都热依木,等(273)

温室基质栽培水肥一体化施肥系统的构建 黄语燕,刘善文,陈永快,等(278)

● 资源与环境

农田土壤氮素转化特征对冻融作用的响应 隽英华,刘 艳,宫 亮,等(282)

硝化/脲酶抑制剂对宁夏灌淤土土壤氮含量及其转化的影响 王长军,李凤霞,谭松伟,等(285)

缓释肥料草酰胺合成工艺及其性能 李 俊,陈 驰,张 弘,等(290)

宁南黄土区不同年限撂荒梯田土壤水文物理特征 王月玲,马 璠,许 浩,等(293)

克氏原螯虾摄食对沉水植物生长和群落结构的影响 吕敬才,张海波,代亮亮,等(298)

不同绿地结构对 PM_{2.5} 和 PM₁₀ 的消减作用 张建设,冯万富,史晓海,等(302)

大豆油多元醇包膜尿素膜的结构与红外光谱特征及氮素释放特性研究 张宇东,张小平,阎 杰,等(305)

鲁中山区坡面尺度下的土壤侵蚀特征分析 靳 洋,孙希华,陈凤琴(309)

土霉素对 10 种经济作物的生态毒理效应 姚洪伟,商照聪,舒耀皋(313)

● 农业经济与管理

新型农业经营主体农业技术服务需求研究——基于湖北武汉家庭农场的调查 朱 萌,张全红,朱月季,等(318)

我国城市化进程与农村教育人力资本的动态关系及其区域差异——基于省级面板数据的 PVAR 模型分析 张 鹏,于 伟(325)

基于收益共享契约的农业供应链外部融资协调策略分析 孙凡松,付 恒,蹇 明(332)

基于各方努力水平的生鲜农产品供应链网络模型研究 梁薇薇,周礼南,周根贵,等(337)

边疆民族地区园林专业人才培养模式分析 荣立苹,高玉福,刘继生,等(344)

JIANGSU AGRICULTURAL SCIENCES

Vol. 47 No. 21 November 5 2019

CONTENTS

Rural Revitalization

- Study on synergistic mechanism of ecological protection and economic development—Reflections on beautiful countryside construction in Nanjing City *Ma Zhijuan, et al*(1)
- Creative application of vegetables in leisure agriculture *Mei Xueying, et al*(5)
- Application of herbal aromatic plants in leisure agriculture *Luo Hairong, et al*(11)
- Conceptual planning for development of characteristic tourism towns based on rural revitalization strategy—Taking a town in Huoshan County, Anhui Province as an example *Yang Chengdong, et al*(16)
- Analysis of green total factor productivity level and green transition path for China's agriculture *Huang Wenshu, et al*(21)
- Study on spatial distribution characteristics of star – rated farms in Hunan Province based on geomorphology *Huang Guolin, et al*(28)
- Exploration on rice cultivation landscape pattern in Jiangnan area—Taking Guoxing Village, Lishui District, Nanjing City as an example *Luo Xuan, et al*(33)
- Evaluation of rural tourism accommodation quality based on online reviews—Empirical analysis combining AHP and BP neural networks *Liu Wenlong, et al*(38)
- Types, spatial distribution and influencing factors of rural tourism innovation activities of new farmers under background of double innovation—Taking Zhejiang Province as an example *Liu Chuanxi, et al*(44)
- Evaluation and optimization of development path of agricultural characteristic towns in Jiangsu Province *Zhang Yuelan, et al*(49)
- Study on development path of embedded entrepreneurship in rural communities of China's "Taobao Village" *Lü Qi, et al*(53)
- Study on inefficient utilization and driving mechanism of rural homestead based on rural revitalization—Taking Wuyi Village, Beibei District, Chongqing City as an example *Chen Qi, et al*(56)

Monograph and Review

- Research progress on mixed infection of plant virus *He Zhen, et al*(60)
- Research status of miRNA regulating plant stress resistance mechanism *Li Xinyan, et al*(63)
- Research progress on nutritional regulation of fatty acid composition in eggs *Zhang Rong, et al*(67)
- Research progress and prospect on rapid detection technology of GM crops *Liang Jingang, et al*(71)
- Application of UAVs in modern agriculture: a review *Su Ruidong*(75)
- Research progress and prospect on waterlily *Su Qun, et al*(79)
- Research progress and prospect of controlling sunflower broomrape by trap crops *Di Na, et al*(84)
- Accumulation mechanism of heavy metals by microalgae and its application in environmental remediation: a review *Yang Ying, et al*(88)
- Research progress on optimization of completely stirred tank reactor(CSTR) *Zhao Lanlan, et al*(95)

Bio-technology

- Structure – function analysis of homologous repeat region *hrI* from *Spodoptera litura* nuclear polyhedrosis virus type II *Liu Huifen, et al*(100)
- Cloning and expression of *SIRT1* gene of *Oreochromis niloticus* *Chen Hengde, et al*(103)
- Development of banana EST – SNP markers *Zhao Tao, et al*(107)
- Screening of suitable conditions of tissue culture for "Jinyan" kiwifruit *Wu Yanyan, et al*(111)

Cloning and expression analysis of *CIPK01* gene in *Pyrus betulaefolia* under salt stress Wang Ying, et al(115)

Genetics and Breeding · Tillage and Cultivation

Effects of selenium and glutathione complex on physiology and antioxidant characteristics of barley seedlings Zhao Fengyun, et al(120)

Genetic diversity analysis of *Brassica napus* with high oil content based on SSR markers Xue Yan, et al(124)

Impacts of straw return method on growth, yield and water use efficiency of spring maize in semiarid area Xu Yingying, et al(128)

Effects of long – term fertilization on grain yield and nutrient utilization efficiency in dry land Wang Xiaojun, et al(133)

Yield performance of *japonica* rice “Yangjing 3012” under different sowing dates Zhang Linqiao, et al(137)

Effects of combined application of pig manure and nitrogen fertilizer on rice growth and nitrogen utilization Zheng Wangyu, et al(139)

Influence of night temperature increase on winter wheat production in Nanjing City Su Haibao, et al(144)

Breeding and application of new medium *indica* hybrid rice combination “Ningxiangyou 2” Zhao Qingyong, et al(148)

Study on suitable seeding amount of mechanical directing comparison test for rice Huang Niansheng, et al(152)

Breeding and cultivation techniques of new wheat cultivar “Ningmaizi 126” with high quality, high yield and disease resistance Wu Jizhong, et al(157)

Plant Protection

Indoor toxicities of three fungicides against *Phytophthora infestans* in northeastern and northern China from 2015 to 2016 Qu Zhilian, et al(160)

Antibacterial and insecticidal activity of *Xanthium sibiricum* Patr. extracts Zhou Yong, et al(165)

GC – MS analysis of petroleum ether extract from *Asystasia gangetica* subsp. *micrantha* and its allelopathy Li Xiaoxia, et al(168)

Biological characteristics and pathogenicity of pathogen of downy mildew of *Aconitum carmichaelii* Wang Ting, et al(172)

Identification and antimicrobial activities of endophytic fungi from endangered medicinal plant *Nervilia fordii* (Hance) Schltr. Song Lisha, et al(175)

Horticulture and Forestry

Effects of different forms of nitrogen fertilizer on growth of strawberry cultivar “Ningyu” Pang Fuhua, et al(179)

Influences of paclobutrazol on growth and fruit quality of Toukun strawberry Wang Quanzhi, et al(182)

Physicochemical properties of coarse sand mixed with glycyrrhiza residues and its effect on growth of strawberry Ma Quanhui, et al(185)

Investigation on usage of pesticide and chemical fertilizer for grape in Jiangsu Province and suggestions for rationalized application Qian Yaming, et al(189)

Effects of different pollination cultivars on fruit characters of Nanguo pear Xu Kai, et al(191)

Impacts of formula fertilization on fruit quality and yield of jujube cultivar “Ningwuchangzao” Wang Wenfang, et al(195)

Effects of different fruit load levels on growth, photosynthesis, yield and quality of apples with dwarf interstock Xue Xiaomin, et al(202)

Study on cold tolerance of olives under low temperature stress Peng Yuanqin, et al(207)

Study on drought resistance of four species of Crassulaceae plants in lawn roof greening Wu Xiaoqing, et al(210)

Effects of heavy metal Pb on soil enzymatic activities in rhizosphere and chemical components of *Achyranthes bidentate* Blume Wang Xinmin, et al(214)

Influences of molybdenum boron fertilizer on comprehensive characteristics of flower and yield characters of *Atractylodes japonica* Ji Yu, et al(216)

Impacts of salicylic acid treatments on eco – physiological characteristics of cowpea seedlings under low temperature stress Xiang Juan, et al(220)

Effects of arbuscular mycorrhizal fungi on photosynthesis and antioxidant enzyme activities of osmanthus seedlings under nickel stress Li Xiaoman, et al(223)

Husbandry and Veterinary • Aquaculture and Sericulture

Isolation , identification and *floR* gene detection of swine infectious pleuropneumoniae *Actinomyces*
..... Luo Xingwei ,et al(228)

Effects of *Fagopyrum dibotrys* on antioxidant activity ,intestinal barrier function and serum biochemical parameters of broilers
..... Tan Lulin ,et al(232)

Influences of adding bile acids to diets with different fat levels on liver and lipid metabolism of broilers
..... Ge Xiaoke ,et al(236)

Effects of yeast fermentation on nutritive parameters and anti – nutritive factor contents in common feed stuff
..... Xie Peng ,et al(241)

Study on reproduction and growth performance of Suzi black pig in 1 ~5 generations Wang Xuemin ,et al(247)

Storage and Processing • Detection

Effect of ⁶⁰Co – γ irradiation on quality of traditional Chinese instant food Chen Qian ,et al(249)

Optimization and comparison of three extraction processes of ginseng polysaccharide Zhao Lichun ,et al(254)

Microwave – assisted extraction technology of total alkaloid from *Aconitum tanguticum* (Maxmi.) Stapf
..... Li Qinling ,et al(260)

Study on threshing technology of Yunnan tobacco leaf based on orthogonal design Xu Qiang ,et al(263)

Effect of UV – B on taxol contents in *Taxus cuspidate* under different extraction methods Hao Jingwei ,et al(266)

Agricultural Engineering and Information Technology

Experimental study on mechanical properties of main vein of middle tobacco leaves Tong Zhenwei ,et al(270)

Design and optimization of frame structure of a cotton picker Orkin Rahim ,et al(273)

Construction of water and fertilizer integrated fertilization system for greenhouse substrate cultivation
..... Huang Yuyan ,et al(278)

Resources and Environment

Response of nitrogen transformation properties to freezing – thawing cycles in farmland soils Juan Yinghua ,et al(282)

Effects of nitrification – urease inhibitor on soil nitrogen content and transformation in irrigation – silted soil of Ningxia area
..... Wang Zhangjun ,et al(285)

Study on synthetic process and property of slow release fertilizer oxamide Li Jun ,et al(290)

Soil physical and hydrological characteristics of abandoned hill terrace with different years in southern Ningxia Loess Region
..... Wang Yueling ,et al(293)

Effects of *Procambarus clarkii* feeding on growth and community structure of submerged macrophyte ... Lü Jingcai ,et al(298)

Reduction of PM_{2.5} and PM₁₀ by different green space structures Zhang Jianshe ,et al(302)

Study on membrane structure , infrared spectra and nitrogen release characteristics of soybean oil polyol coated urea
..... Zhang Yudong ,et al(305)

Study on soil erosion characteristics on slope scale in central Shandong Jin Yang ,et al(309)

Ecotoxicological effects of oxytetracycline on 10 economic crops Yao Hongwei ,et al(313)

Agricultural Economy and Management

Study on demand of agricultural technology service for new agricultural business entities—Based on survey of family farms in
Wuhan City ,Hubei Province Zhu Meng ,et al(318)

Dynamic relationship between China’s urbanization and rural education human capital and its regional differences—PVAR
model analysis based on provincial panel data Zhang Peng ,et al(325)

Analysis of external financing coordination strategy of agricultural supply chain based on revenue sharing contract
..... Sun Fansong ,et al(332)

Study on supply chain network model of fresh agricultural products based on effort level of all parties
..... Liang Weiwei ,et al(337)

Analysis of talent training mode of landscape architecture speciality in frontier minority areas Rong Liping ,et al(344)