

- ❖ 英国《科学文摘》(INSPEC) 来源期刊
- ❖ 俄罗斯《文摘杂志》(AJ) 来源期刊
- ❖ 美国《乌利希期刊指南(网络版)》(Ulrichsweb) 收录期刊
- ❖ 2017—2019 年中国国际影响力优秀学术期刊(自然科学与工程)
- ❖ 第二届国家期刊奖百种重点科技期刊
- ❖ 中国科技核心期刊 ❖ 全国中文核心期刊
- ❖ 中国科技论文统计源期刊
- ❖ 中国学术期刊综合评价数据库来源期刊
- ❖ RCCSE 核心学术期刊 ❖ 中国期刊方阵双效期刊

- ❖ 《日本科学技术振兴机构数据库》(JST) 来源期刊
- ❖ 美国《艾博思科学学术数据库》(EBSCO) 全文来源期刊
- ❖ 美国《剑桥科学文摘(自然科学)》(CSA (NS)) 核心期刊
- ❖ 波兰《哥白尼索引》(IC) 来源期刊
- ❖ 中国科学引文数据库(CSCD) 来源期刊
- ❖ 《中文科技期刊数据库》来源期刊
- ❖ 《中国期刊网》《中国学术期刊(光盘版)》来源期刊
- ❖ 中国精品科技期刊顶尖学术论文(F5000)项目来源期刊
- ❖ 《电子科技文献数据库》来源期刊
- ❖ 《中国工程技术电子信息网》来源期刊

计算机应用研究

Jisuanji Yingyong Yanjiu

第 38 卷 第 5 期 2021 年 5 月

目 次

综述评论

DNA 甲基化差异模式识别方法综述	赵 倩, 张 雪, 张 彦, 林正奎, 孙野青(1281)
云控制系统研究现状综述	吕书玉, 马 中, 戴新发, 高 毅, 胡哲琨(1287)
自然图像抠图技术综述	梁椅辉, 黄 翰, 蔡昭权, 郝志峰, 冯夫健(1294)

区块链技术

Hyperledger Fabric 中基于层级结构的公钥广播加密方案	黄宗敏, 张大伟(1302)
面向智能合约链升级的松耦合模型研究	刘云霞, 胡大裘, 蒋玉明(1309)
基于联盟区块链的供应链信息协同博弈研究	张 志, 李军祥, 张栋梁(1314)
基于博弈论与区块链融合的 k -匿名位置隐私保护方案	杨少杰, 郑 琨, 张 辉, 张光华(1320)

算法研究探讨

基于对抗学习和全局知识信息的关系检测技术研究	王勇超, 杨英宝, 曹 钰, 邢 卫(1327)
基于非平衡数据下不完备混合型信息系统的属性约简	姚 晟, 李初宴, 陈 悦(1331)
基于 MapReduce 和 IFOA 的并行密度聚类算法	胡 健, 徐锴滨, 毛伊敏(1336)
基于脑功能网络和共空间模式分析的脑电情绪识别	刘 柯, 张 孝, 李沛洋, 陈 多, 王国胤(1344)
基于遗忘函数的均值贝叶斯个性化排序算法研究	申艳梅, 姜冰倩, 敖 山, 刘志中(1350)
一种属性不一致性加权的 K 近邻分类方法	徐 政, 邓安生, 曲衍鹏(1355)
基于多头注意力机制的社交网络符号预测	颜仕雄, 朱 焱, 李春平(1360)
一种基于网络表示学习的 miRNA-疾病关联预测方法	耿 霞, 韩凯健(1365)
融合自注意力机制与长短期偏好的序列推荐模型	沈学利, 杜志伟(1371)
多头注意力评论量化的聚类优化推荐算法	邱宁佳, 王宪勇, 王 鹏(1376)
融合 LSTM 结构的脉冲神经网络模型研究与应用	王清华, 王丽娜, 徐 颂(1381)
基于层次策略的半监督 K-medoids 算法研究	李 乐, 王 斐(1387)
基于多种信息组合模式的非负矩阵分解链路预测模型	唐明虎(1393)
处理不平衡数据的聚类欠采样加权随机森林算法	王 磊, 刘 雨, 刘志中, 齐俊艳(1398)
基于主观倾向值和 EasyEnsemble 算法的虚假评论识别方法	陶朝杰, 杨 进(1403)
面向方面级别情感分析的端到端多跳记忆网络	卢天兰, 陈 荔(1409)
基于大数据的并行化深度卷积神经网络优化算法	毛伊敏, 张瑞朋, 曹文梁(1416)
基于网格密度和局部敏感哈希函数的并行化聚类算法	毛伊敏, 陶 涛, 曹文梁(1422)
垃圾分类收运路径问题的新型混合蚁群算法求解	赵今越, 马 良, 刘 勇(1428)

基于翻筋斗觅食策略的灰狼优化算法	王正通,程凤芹,尤文,李双(1434)
启发式回溯算法求解约束满足问题	范如梦,赵春艳,李飞龙(1438)
自适应差分进化算法及对动态环境经济调度问题应用	武慧虹,林妤,曾茜,钱淑渠(1443)
基于前景理论的毕达哥拉斯二元语义 PROMETHEE 决策方法	常娟,刘卫锋(1449)
基于最小化 snap 方法的无人机多项式轨迹优化	唐刚,侯志鹏,胡雄(1455)
基于改进 KNPE 算法的化工过程故障检测	李军祥,李春阳,夏丽莎(1459)
一种基于信息瓶颈的神经网络混合压缩方法	卓越,姜黎(1463)

系统应用开发

基于国产处理器增量式实时交通流预测算法及实现	季一木,杨启凡,李奎,尤帅,邵思思,刘强,刘尚东(1468)
有限产能下多部件设备视情维修策略与多订单批量生产联合优化研究	汤乐成,刘勤明,王上润(1472)
基于马尔可夫模型的多 agent 自适应在线验证	叶幸瑜,刘玮,王宁,甘陈峰(1477)
竞争市场中考虑顾客感知效用的新能源汽车长期扩散研究	徐亚萍,李林(1482)

软件技术研究

基于程序变异的程序谱错误定位方法	王曙燕,林敬,孙家泽(1487)
面向危险函数调用的多粒度影响分析方法研究	郭严磊,牟永敏,张志华(1491)

网络与通信技术

基于深度双 Q 网络的多用户蜂窝网络功率分配算法研究	王伟,殷爽爽(1498)
基于共同邻居邻域拓扑稠密性加权的链路预测方法	李星,朱宇航,柏溢,李劲松(1503)
面向异质变分超图自动编码器的超边链接预测模型	杨伟英,王英,吴越(1508)
软件定义网络中基于分段路由的多路径调度算法	李艺,唐宏,马枢清(1514)
无线可充电传感器网络的锚点算法与移动设备调度研究	石振国,孙景玉(1520)
低复杂度大规模 MIMO 上行链路软输出信号检测	申东,赵丹,李强,邸敬(1524)

信息安全技术

一类 SP 结构的不可能差分区分器证明	李艳俊,许星霖(1529)
LS&SSS-RS:可更新密钥分片的数据安全散布方法	李国,殷俊锋,李静(1533)
对抗网络下的密钥协商问题研究	吴少乾,李西明,王璇,蔡河鑫(1539)

图形图像技术

基于全局分组策略的对抗训练在人体轮廓点回归中的应用模型	马丹,吴跃(1544)
基于深度学习的含堆叠字符的车牌识别算法	祁忠琪,涂凯,吴书楷,张三元(1550)
认知任务驱动的 fMRI 脑功能网络构建方法	张笑非,马莲芳,刘若豪,杨阳,郗弘智,钟宁(1555)
基于深度学习的人脸妆容迁移算法	王伟光,钱祥利(1559)
基于生成对抗网络的 MR 图像合成研究	陈佳,骆爽,何儒汉,胡新荣(1563)
基于强化底层特征的无人机航拍图像小目标检测算法	吕晓君,向伟,刘云鹏(1567)
轻量化卷积神经网络在 SAR 图像语义分割中的应用	水文泽,孙盛,余旭,邓少平(1572)
基于改进深度残差网络的矿井图像分类	程德强,王雨晨,寇旗,付新竹,陈亮亮,赵凯(1576)
基于图卷积神经网络的织物分类研究	彭涛,彭迪,刘军平,胡新荣,张自力,陈常念,姜明华(1581)
无人机航拍图像拼接重影消除技术研究	胡育诚,芮挺,杨成松,王东,刘恂(1586)
基于分组卷积和特征图级联的轻量级目标检测	杨贤志,黄国方,周宁宁(1590)
基于概率图与视觉显著性的海面目标检测方法	马莹,惠斌,金天明,常铮,杨雨涵(1595)

信息集萃

下期要目	(1507)
------------	--------

期刊基本参数:CN51-1196/TP * 1984 * m * A4 * 320 * zh * P * ¥50.00 * 3840 * 60 * 2021-05 * n

Application Research of Computers

Vol. 38 No. 5 May 2021

Contents

Survey

Survey of DNA differentially methylated patterns identification	Zhao Qian,Zhang Xue,Zhang Yan, <i>et al.</i> (1281)
Survey on cloud control systems	Lyu Shuyu, Ma Zhong, Dai Xinfu, <i>et al.</i> (1287)
Survey of natural image matting	Liang Yihui, Huang Han, Cai Zhaoquan, <i>et al.</i> (1294)

Technology of Blockchain

Hierarchical structure-based public key broadcast encryption scheme in Hyperledger Fabric	Huang Zongmin,Zhang Dawei(1302)
Loose coupling model research for upgrading smart contracts already deployed on blockchain	Liu Yunxia,Hu Dasha,Jiang Yuming(1309)
Research on collaborative game of supply chain information based on alliance blockchain	Zhang Zhi,Li Junxiang,Zhang Dongliang(1314)
k -anonymous location privacy protection scheme based on game theory and blockchain fusion	Yang Shaojie,Zheng Kun,Zhang Hui, <i>et al.</i> (1320)

Algorithm Research & Explore

Research on relation detection based on adversarial learning and global knowledge information	Wang Yongchao,Yang Yingbao,Cao Yu, <i>et al.</i> (1327)
Attribute reduction of incomplete hybrid information system based on unbalanced data	Yao Sheng,Li Chuyan,Chen Yue(1331)
Density-based clustering algorithm by using improve fruit fly optimization based on MapReduce	Hu Jian,Xu Kaibin,Mao Yimin(1336)
EEG emotion recognition based on common spatial pattern of brain functional network	Liu Ke,Zhang Xiao,Li Peiyang, <i>et al.</i> (1344)
Research on forgetting function-based mean Bayesian personalized ranking algorithm	Shen Yanmei,Jiang Bingqian,Ao Shan, <i>et al.</i> (1350)
Attribute inconsistency weighted K nearest neighbor classification method	Xu Zheng,Deng Ansheng,Qu Yanpeng(1355)
Social network sign prediction based on multi-head attention mechanism	Yan Shixiong,Zhu Yan,Li Chunping(1360)
miRNA-disease association prediction based on network representation learning method	Geng Xia,Han Kaijian(1365)
Sequential recommendation model that combines self-attention mechanism with long-term and short-term preferences	Shen Xueli,Du Zhiwei(1371)
Clustering optimization recommendation algorithm for multi-head attention comment quantization	Qiu Ningjia,Wang Xianyong,Wang Peng(1376)
Research and application of spiking neural network model based on LSTM structure	Wang Qinghua,Wang Lina,Xu Song(1381)
Research on semi-supervised K-medoids algorithm based on hierarchical strategy	Li Le,Wang Fei(1387)
Based on nonnegative matrix factorization for link prediction model via multiple information combination modes	Tang Minghu(1393)
Clustering under-sampling weighted random forest algorithm for processing unbalanced data	Wang Lei,Liu Yu,Liu Zhizhong, <i>et al.</i> (1398)
Detection of spam reviews based on subjectivity and EasyEnsemble algorithm	Tao Chaojie,Yang Jin(1403)
End-to-end multi-hop memory network for aspect-level sentiment analysis	Lu Tianlan,Chen Li(1409)
Parallel deep convolution neural network optimization algorithm based on big data	Mao Yimin,Zhang Ruipeng,Cao Wenliang(1416)
Partitioning-based clustering algorithm using grid density and locality sensitive hash function based on MapReduce Mao Yimin,Tao Tao,Cao Wenliang(1422)
Novel hybrid ant colony algorithm for solving problem of waste classification and transportation	Zhao Jinyue, Ma Liang, Liu Yong(1428)
Grey wolf optimization algorithm based on somersault foraging strategy	Wang Zhengtong, Cheng Fengqin, You Wen, <i>et al.</i> (1434)
Heuristic backtracking algorithm to solve constraint satisfaction problems	Fan Rumeng,Zhao Chunyan,Li Feilong(1438)
Adaptive different evolutionary algorithm and its application of dynamic emission economic dispatch problem Wu Huihong,Lin Yu,Zeng Xi, <i>et al.</i> (1443)

Pythagorean 2-tuple linguistic PROMETHEE decision making method based on prospect theory	Chang Juan, Liu Weifeng(1449)
Polynomial trajectory optimization of UAV based on minimum-snap method	Tang Gang, Hou Zhipeng, Hu Xiong(1455)
Fault detection based on improved KNPE in chemical process	Li Junxiang, Li Chunyang, Xia Lisha(1459)
Neural network hybrid compression method based on information bottleneck	Zhuo Yue, Jiang Li(1463)

System Development & Application

Incremental real-time traffic flow prediction algorithm based on domestic processor and its implementation	Ji Yimu, Yang Qifan, Li Kui, <i>et al.</i> (1468)
Joint optimization of multi-component equipment maintenance strategy and multi-order batch production under limited capacity	Tang Lecheng, Liu Qinming, Wang Shangrun(1472)
Multi-agent adaptive run-time verification based on Markov model	Ye Xingyu, Liu Wei, Wang Ning, <i>et al.</i> (1477)
Research on long-term diffusion of new energy vehicles considering customer perceived utility in competitive markets	Xu Yaping, Li Lin(1482)

Software Technology Research

Program spectrum fault location based on program mutation	Wang Shuyan, Lin Jing, Sun Jiaye(1487)
Research on multi-granularity impact analysis method for unsafe function call	Guo Yanlei, Mu Yongmin, Zhang Zhihua(1491)

Technology of Network & Communication

Multi-user cellular network power allocation based on deep double Q network	Wang Wei, Yin Shuangshuang(1498)
Link prediction method based on topological density weighting of common neighbor neighborhood	Li Xing, Zhu Yuhang, Bai Yi, <i>et al.</i> (1503)
Exploring heterogeneous variational hypergraph autoencoder for hyper-edge link prediction	Yang Weiyang, Wang Ying, Wu Yue(1508)
Multi-path scheduling algorithm based on segment routing in SDN	Li Yi, Tang Hong, Ma Shuqing(1514)
Research of point tracing algorithm and mobile device scheduling in WRSN	Shi Zhenguo, Sun Jingyu(1520)
Low-complexity soft-output signal detection on uplink for large-scale MIMO	Shen Dong, Zhao Dan, Li Qiang, <i>et al.</i> (1524)

Technology of Information Security

Proof of class of SP structure for impossible differential cryptanalysis	Li Yanjun, Xu Xinglin(1529)
LS&SSS-RS: updatable key sharding method for data security dissemination	Li Guo, Yin Junfeng, Li Jing(1533)
Research on key agreement based on adversarial network	Wu Shaoqian, Li Ximing, Wang Xuan, <i>et al.</i> (1539)

Technology of Graphic & Image

Human outline keypoints detecting via global and grouping strategy based on GAN	Ma Dan, Wu Yue(1544)
Recognizing license plate with stacked characters based on deep learning	Qi Zhongqi, Tu Kai, Wu Shukai, <i>et al.</i> (1550)
Cognitive task driven method for fMRI functional brain network construction	Zhang Xiaofei, Ma Lianfang, Liu Ruohao, <i>et al.</i> (1555)
Face makeup transfer algorithm based on deep learning	Wang Weiguang, Qian Xiangli(1559)
Research on MR image synthesis based on generative adversarial network	Chen Jia, Luo Shuang, He Ruhan, <i>et al.</i> (1563)
Small object detection algorithm on UAV aerial images based on enhanced lower feature	Lyu Xiaojun, Xiang Wei, Liu Yunpeng(1567)
Application of lightweight convolutional neural network in SAR image semantic segmentation	Shui Wenzhe, Sun Sheng, Yu Xu, <i>et al.</i> (1572)
Classification of mine images based on improved deep residual network	Cheng Deqiang, Wang Yuchen, Kou Qiqi, <i>et al.</i> (1576)
Fabric classification based on graph convolutional network	Peng Tao, Peng Di, Liu Junping, <i>et al.</i> (1581)
Research on eliminate ghosting technique of UAV image mosaic	Hu Yucheng, Rui Ting, Yang Chengsong, <i>et al.</i> (1586)
Light-weight object detection network based on group convolution and feature maps cascade	Yang Xianzhi, Huang Guofang, Zhou Ningning(1590)
Maritime object detection method based on probabilistic graph and visual saliency	Ma Ying, Hui Bin, Jin Tianming, <i>et al.</i> (1595)