

Liming Chen

List of Publications by Year in descending order

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122
papers

3,513
citations

236612

25
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149479

56
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124
all docs

124
docs citations

124
times ranked

2964
citing authors

| # | ARTICLE | IF | CITATIONS |
|----|--|-----|-----------|
| 1 | Sensor-Based Activity Recognition. IEEE Transactions on Systems, Man and Cybernetics, Part C: Applications and Reviews, 2012, 42, 790-808. | 3.3 | 782 |
| 2 | A Knowledge-Driven Approach to Activity Recognition in Smart Homes. IEEE Transactions on Knowledge and Data Engineering, 2012, 24, 961-974. | 4.0 | 475 |
| 3 | Ontology-based activity recognition in intelligent pervasive environments. International Journal of Web Information Systems, 2009, 5, 410-430. | 1.3 | 207 |
| 4 | Dynamic sensor data segmentation for real-time knowledge-driven activity recognition. Pervasive and Mobile Computing, 2014, 10, 155-172. | 2.1 | 128 |
| 5 | From Activity Recognition to Intention Recognition for Assisted Living Within Smart Homes. IEEE Transactions on Human-Machine Systems, 2017, 47, 368-379. | 2.5 | 124 |
| 6 | An Ontology-Based Hybrid Approach to Activity Modeling for Smart Homes. IEEE Transactions on Human-Machine Systems, 2014, 44, 92-105. | 2.5 | 117 |
| 7 | Feature learning for Human Activity Recognition using Convolutional Neural Networks. CCF Transactions on Pervasive Computing and Interaction, 2020, 2, 18-32. | 1.7 | 87 |
| 8 | Towards a Knowledge-Based Approach to Semantic Service Composition. Lecture Notes in Computer Science, 2003, , 319-334. | 1.0 | 67 |
| 9 | Extending knowledge-driven activity models through data-driven learning techniques. Expert Systems With Applications, 2015, 42, 3115-3128. | 4.4 | 67 |
| 10 | Healthcare in the Smart Home: A Study of Past, Present and Future. Sustainability, 2017, 9, 840. | 1.6 | 64 |
| 11 | Combining ontological and temporal formalisms for composite activity modelling and recognition in smart homes. Future Generation Computer Systems, 2014, 39, 29-43. | 4.9 | 60 |
| 12 | Ontological user modelling and semantic rule-based reasoning for personalisation of Help-On-Demand services in pervasive environments. Future Generation Computer Systems, 2014, 34, 97-109. | 4.9 | 59 |
| 13 | Semantic Smart Homes: Towards Knowledge Rich Assisted Living Environments. Studies in Computational Intelligence, 2009, , 279-296. | 0.7 | 52 |
| 14 | An Open Internet of Things System Architecture Based on Software-Defined Device. IEEE Internet of Things Journal, 2019, 6, 2583-2592. | 5.5 | 45 |
| 15 | Security and privacy issues of physical objects in the IoT: Challenges and opportunities. Digital Communications and Networks, 2021, 7, 373-384. | 2.7 | 45 |
| 16 | IoT-Enabled Social Relationships Meet Artificial Social Intelligence. IEEE Internet of Things Journal, 2021, 8, 17817-17828. | 5.5 | 41 |
| 17 | Activity Recognition: Approaches, Practices and Trends. Atlantis Ambient and Pervasive Intelligence, 2011, , 1-31. | 0.2 | 40 |
| 18 | A semantics-based approach to sensor data segmentation in real-time Activity Recognition. Future Generation Computer Systems, 2019, 93, 224-236. | 4.9 | 40 |

| # | ARTICLE | IF | CITATIONS |
|----|--|-----|-----------|
| 19 | Semantic segmentation of real-time sensor data stream for complex activity recognition. Personal and Ubiquitous Computing, 2017, 21, 411-425. | 1.9 | 38 |
| 20 | A Generic Framework for Constraint-Driven Data Selection in Mobile Crowd Photographing. IEEE Internet of Things Journal, 2017, , 1-1. | 5.5 | 37 |
| 21 | Comparison of fusion methods based on DST and DBN in human activity recognition. Journal of Control Theory and Applications, 2011, 9, 18-27. | 0.8 | 36 |
| 22 | SRAM-PUF-Based Entities Authentication Scheme for Resource-Constrained IoT Devices. IEEE Internet of Things Journal, 2021, 8, 5904-5913. | 5.5 | 36 |
| 23 | Smart Home Research. International Journal of Ambient Computing and Intelligence, 2009, 1, 32-45. | 0.8 | 35 |
| 24 | Computational Sleep Behavior Analysis: A Survey. IEEE Access, 2019, 7, 142421-142440. | 2.6 | 35 |
| 25 | A Deep Learning Approach for Privacy Preservation in Assisted Living. , 2018, , . | | 33 |
| 26 | Users' Privacy Concerns in IoT Based Applications. , 2018, , . | | 32 |
| 27 | A Hybrid Ontological and Temporal Approach for Composite Activity Modelling. , 2012, , . | | 28 |
| 28 | SEMANTICS-ASSISTED PROBLEM SOLVING ON THE SEMANTIC GRID. Computational Intelligence, 2005, 21, 157-176. | 2.1 | 26 |
| 29 | A Semantic Web-Based Approach to Knowledge Management for Grid Applications. IEEE Transactions on Knowledge and Data Engineering, 2007, 19, 283-296. | 4.0 | 26 |
| 30 | Using Event Calculus for Behaviour Reasoning and Assistance in a Smart Home. Lecture Notes in Computer Science, 2008, , 81-89. | 1.0 | 26 |
| 31 | Ontology-Based Learning Framework for Activity Assistance in an Adaptive Smart Home. Atlantis Ambient and Pervasive Intelligence, 2011, , 237-263. | 0.2 | 26 |
| 32 | A user profile ontology based approach for assisting people with dementia in mobile environments. , 2012, 2012, 6390-3. | | 24 |
| 33 | A novel ontology consistent with acknowledged standards in smart homes. Computer Networks, 2019, 148, 101-107. | 3.2 | 24 |
| 34 | Modeling Users, Context and Devices for Ambient Assisted Living Environments. Sensors, 2014, 14, 5354-5391. | 2.1 | 22 |
| 35 | Genetic algorithm and pure random search for exosensor distribution optimisation. International Journal of Bio-Inspired Computation, 2012, 4, 359. | 0.6 | 19 |
| 36 | Privacy-Enabled Smart Home Framework with Voice Assistant. Computer Communications and Networks, 2020, , 321-339. | 0.8 | 17 |

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|----|---|-----|-----------|
| 37 | A Survey of Hybrid Human-Artificial Intelligence for Social Computing. IEEE Transactions on Human-Machine Systems, 2022, 52, 468-480. | 2.5 | 17 |
| 38 | Semantic data management for situation-aware assistance in ambient assisted living. , 2009, , . | | 16 |
| 39 | Does Age Make a Difference in the Behaviour of Online Social Network Users?. , 2011, , . | | 16 |
| 40 | Featuring, Detecting, and Visualizing Human Sentiment in Chinese Micro-Blog. ACM Transactions on Knowledge Discovery From Data, 2016, 10, 1-23. | 2.5 | 16 |
| 41 | Towards a service-oriented architecture for a mobile assistive system with real-time environmental sensing. Tsinghua Science and Technology, 2016, 21, 581-597. | 4.1 | 15 |
| 42 | A Conceptual framework for Adaptive User Interfaces for older adults. , 2018, , . | | 15 |
| 43 | Multi-resident type recognition based on ambient sensors activity. Future Generation Computer Systems, 2020, 112, 108-115. | 4.9 | 15 |
| 44 | NFC based provisioning of instructional videos to assist with instrumental activities of daily living. , 2014, 2014, 4131-4. | | 14 |
| 45 | Guest EditorialSpecial Issue on Situation, Activity, and Goal Awareness in Cyber-Physical Human-Machine Systems. IEEE Transactions on Human-Machine Systems, 2017, 47, 305-309. | 2.5 | 12 |
| 46 | Sensor-Based Activity Recognition Review. , 2019, , 23-47. | | 12 |
| 47 | Exploring the Relationship Between Online Social Network Site Usage and the Impact on Quality of Life for Older and Younger Users: An Interaction Analysis. Journal of Medical Internet Research, 2016, 18, e245. | 2.1 | 12 |
| 48 | Automatic Metadata Generation Through Analysis of Narration Within Instructional Videos. Journal of Medical Systems, 2015, 39, 94. | 2.2 | 11 |
| 49 | Combining Users' Activity Survey and Simulators to Evaluate Human Activity Recognition Systems. Sensors, 2015, 15, 8192-8213. | 2.1 | 11 |
| 50 | Conceptual Motivation Modeling for Students with Dyslexia for Enhanced Assistive Learning. , 2017, , . | | 11 |
| 51 | Comparing CNN and Human Crafted Features for Human Activity Recognition. , 2019, , . | | 11 |
| 52 | High-level geospatial information discovery and fusion for geocoded multimedia. International Journal of Pervasive Computing and Communications, 2013, 9, 367-382. | 1.1 | 10 |
| 53 | Wearable accelerometer based extended sleep position recognition. , 2017, , . | | 10 |
| 54 | Hybrid Human-Artificial Intelligence. Computer, 2020, 53, 14-17. | 1.2 | 10 |

| # | ARTICLE | IF | CITATIONS |
|----|--|-----|-----------|
| 55 | Exploring Multi-Dimension User-Item Interactions With Attentional Knowledge Graph Neural Networks for Recommendation. IEEE Transactions on Big Data, 2023, 9, 212-226. | 4.4 | 10 |
| 56 | Formal Modeling Techniques for Ambient Assisted Living. Ageing International, 2011, 36, 192-216. | 0.6 | 9 |
| 57 | Detecting Chronic Diseases from Sleep-Wake Behaviour and Clinical Features. , 2018, , . | | 9 |
| 58 | Ontology-Enabled Activity Learning and Model Evolution in Smart Homes. Lecture Notes in Computer Science, 2010, , 67-82. | 1.0 | 9 |
| 59 | Applying AI Planning to Semantic Web Services for Workflow Generation. , 2005, , . | | 8 |
| 60 | Audio-based event recognition system for smart homes. , 2017, , . | | 8 |
| 61 | An Intelligent Recommender System for Web Resource Discovery and Selection. Studies in Computational Intelligence, 2008, , 113-140. | 0.7 | 8 |
| 62 | A Semantic Web Service Based Approach for Augmented Provenance. , 2006, , . | | 7 |
| 63 | CrowdPic: A Multi-coverage Picture Collection Framework for Mobile Crowd Photographing. , 2015, , . | | 7 |
| 64 | Privacy modelling and management for assisted living within smart homes. , 2017, , . | | 7 |
| 65 | Automatic Summarization of Activities Depicted in Instructional Videos by Use of Speech Analysis. Lecture Notes in Computer Science, 2014, , 123-130. | 1.0 | 7 |
| 66 | Spatiotemporal Data Acquisition Modalities for Smart Home Inhabitant Movement Behavioural Analysis. Lecture Notes in Computer Science, 2009, , 294-298. | 1.0 | 7 |
| 67 | A Knowledge-Driven Approach to Composite Activity Recognition in Smart Environments. Lecture Notes in Computer Science, 2012, , 322-329. | 1.0 | 6 |
| 68 | Ontology-based Activity Recognition Framework and Services. , 2013, , . | | 6 |
| 69 | A Geospatial Semantic Enrichment and Query Service for Geotagged Photographs. Sensors, 2015, 15, 17470-17482. | 2.1 | 6 |
| 70 | Physical unclonable functions based secret keys scheme for securing big data infrastructure communication. Information Sciences, 2019, 503, 307-318. | 4.0 | 6 |
| 71 | An Assistive Augmented Reality-based Smartglasses Solution for Individuals with Autism Spectrum Disorder. , 2019, , . | | 5 |
| 72 | Fuzzy-Based Fine-Grained Human Activity Recognition within Smart Environments. , 2019, , . | | 5 |

| # | ARTICLE | IF | CITATIONS |
|----|---|-----|-----------|
| 73 | Ontological Goal Modelling for Proactive Assistive Living in Smart Environments. Lecture Notes in Computer Science, 2013, , 262-269. | 1.0 | 5 |
| 74 | A systematic approach to adaptive activity modeling and discovery in smart homes. , 2011, , . | | 4 |
| 75 | Situation, activity and goal awareness in ubiquitous computing. International Journal of Pervasive Computing and Communications, 2012, 8, 216-224. | 1.1 | 4 |
| 76 | Sentiment detection and visualization of Chinese micro-blog. , 2014, , . | | 4 |
| 77 | Towards a Mobile Assistive System Using Service-Oriented Architecture. , 2016, , . | | 4 |
| 78 | Ubiquitous Intelligence and computing for enabling a smarter world. Personal and Ubiquitous Computing, 2017, 21, 407-409. | 1.9 | 4 |
| 79 | Visual Attention-Based Object Detection in Cluttered Environments. , 2019, , . | | 4 |
| 80 | An approach to provide dynamic, illustrative, video-based guidance within a goal-driven smart home. Journal of Ambient Intelligence and Humanized Computing, 2020, 11, 3045-3056. | 3.3 | 4 |
| 81 | Multimodal motivation modelling and computing towards motivationally intelligent E-learning systems. CCF Transactions on Pervasive Computing and Interaction, 2023, 5, 64-81. | 1.7 | 4 |
| 82 | Spatial-frequency data acquisition using rotational invariant pattern matching in smart environments. Annales Des Telecommunications/Annals of Telecommunications, 2010, 65, 557-570. | 1.6 | 3 |
| 83 | Pure random search for ambient sensor distribution optimisation in a smart home environment. Technology and Health Care, 2011, 19, 137-160. | 0.5 | 3 |
| 84 | A System for Real-Time High-Level Geo-Information Extraction and Fusion for Geocoded Photos. , 2013, , . | | 3 |
| 85 | Towards Knowledge Driven Decision Support for Personalized Home-Based Self-Management of Chronic Diseases. , 2015, , . | | 3 |
| 86 | Real-time sensor observation segmentation for complex activity recognition within smart environments. , 2017, , . | | 3 |
| 87 | Reality and perception: Activity monitoring and data collection within a real-world smart home. , 2017, , . | | 3 |
| 88 | Composite Activity Recognition. , 2019, , 151-181. | | 3 |
| 89 | Gaze-Based Assessment of Dyslexic Students' Motivation within an E-Learning Environment. , 2019, , . | | 3 |
| 90 | A Knowledge-Driven Tool for Automatic Activity Dataset Annotation. Advances in Intelligent Systems and Computing, 2015, , 593-604. | 0.5 | 3 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 91 | A Mechanism for Nominating Video Clips to Provide Assistance for Instrumental Activities of Daily Living. Lecture Notes in Computer Science, 2015, , 65-76. | 1.0 | 3 |
| 92 | An Examination of the Behaviour of Young and Older Users of Facebook. Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, 2012, , 9-16. | 0.2 | 3 |
| 93 | A Privacy Aware Architecture for IoT Enabled Systems. , 2019, , . | | 3 |
| 94 | Semantic Tagging for Large-scale Content Management. , 2007, , . | | 2 |
| 95 | Stopping Criterion Impact on Pure Random Search Optimisation for Intelligent Device Distribution. , 2010, , . | | 2 |
| 96 | Discovering social behaviour variances of younger and older users through social interaction analysis. International Journal of Web Science, 2013, 2, 44. | 0.8 | 2 |
| 97 | Fall Detection Using Plantar Inclinometer Sensor. , 2015, , . | | 2 |
| 98 | VIPR: A Visual Interface Tool for Programming Semantic Web Rules. , 2016, , . | | 2 |
| 99 | A Conceptual System Architecture for Motivation-enhanced Learning for Students with Dyslexia. , 2017, , . | | 2 |
| 100 | A hybrid approach to inferring the Internet of Things for complex activity recognition. Eurasip Journal on Wireless Communications and Networking, 2019, 2019, . | 1.5 | 2 |
| 101 | Fine-grained Emotion Role Detection Based on Retweet Information. ACM Transactions on Internet Technology, 2019, 19, 1-23. | 3.0 | 2 |
| 102 | Requirements for the Deployment of Sensor Based Recognition Systems for Ambient Assistive Living. Lecture Notes in Computer Science, 2010, , 218-221. | 1.0 | 2 |
| 103 | GazeMotive: A Gaze-Based Motivation-Aware E-Learning Tool for Students with Learning Difficulties. Lecture Notes in Computer Science, 2019, , 544-548. | 1.0 | 2 |
| 104 | Active power dynamic interval control based on operation data mining for wind farms to improve regulation performance in AGC. IET Generation, Transmission and Distribution, 2020, 14, 6207-6219. | 1.4 | 2 |
| 105 | Semantic-Enabled and Agent-based Environment Aware Agile Service Utilities. , 2008, , . | | 1 |
| 106 | Time handling for real-time progressive activity recognition. , 2011, , . | | 1 |
| 107 | Context, intelligence and interactions for personalized systems. Journal of Ambient Intelligence and Humanized Computing, 2018, 9, 1557-1559. | 3.3 | 1 |
| 108 | Time-Window Based Data Segmentation. , 2019, , 103-126. | | 1 |

| # | ARTICLE | IF | CITATIONS |
|-----|---|-----|-----------|
| 109 | Fine-Grained Sleep-Wake Behaviour Analysis. , 2019, , . | | 1 |
| 110 | Enhanced multi-source data analysis for personalized sleep-wake pattern recognition and sleep parameter extraction. Personal and Ubiquitous Computing, 0, , 1. | 1.9 | 1 |
| 111 | Using modelâ€™s temporal features and hierarchical structure for similar activity recognition. Journal of Ambient Intelligence and Humanized Computing, 2020, , 1. | 3.3 | 1 |
| 112 | Discovering the Social Interaction Patterns of Younger and Older Facebook Users. Lecture Notes in Computer Science, 2012, , 295-303. | 1.0 | 1 |
| 113 | Reducing Communication Costs of Federated Contrastive Learning by Particle Swarm Optimization. , 2021, , . | | 1 |
| 114 | Using Personalized Knowledge Portal for Information and Knowledge Integration and Sharing. , 2007, , . | | 0 |
| 115 | A Bioinspired Feature-Projection-Based Approach to Electromyographic Pattern Recognition Based for High Dimensional Sparse Sensor Data. , 2015, , . | | 0 |
| 116 | Evaluation Of MediaPlace. , 2015, , . | | 0 |
| 117 | Using Fuzzy Evidential Reasoning for Multiple Assessment Fusion in Spondylarthropathic Patient Self-management. Studies in Computational Intelligence, 2016, , 15-39. | 0.7 | 0 |
| 118 | Human Centred Cyber Physical Systems. , 2019, , 217-249. | | 0 |
| 119 | A Home-Based IoT-Enabled Framework for Sleep Behaviour Assessment. , 2019, , . | | 0 |
| 120 | Recognition of Similar Activities Based on Activity Relationship. , 2019, , . | | 0 |
| 121 | Contemporary Gold Rush or Scientific Advancement. Advances in Computational Intelligence and Robotics Book Series, 2015, , 210-226. | 0.4 | 0 |
| 122 | Semantic-Based Sensor Data Segmentation. , 2019, , 127-149. | | 0 |