Vasileios A Karyotis

List of Publications by Year
in descending order

72 papers	557 citations	623734 14 h-index	752698 20 g-index
72 all docs	72 docs citations	72 times ranked	491 citing authors

#	Article	IF	Citations
1	Topology Inference and Link Parameter Estimation Based on End-to-End Measurements. Future Internet, 2022, 14, 45.	3.8	1
2	ENERDGE: Distributed Energy-Aware Resource Allocation at the Edge. Sensors, 2022, 22, 660.	3.8	17
3	Design, Development, and Evaluation of 5G-Enabled Vehicular Services: The 5G-HEART Perspective. Sensors, 2022, 22, 426.	3.8	15
4	Scalable Community Detection for Complex Data Graphs via Hyperbolic Network Embedding and Graph Databases. IEEE Transactions on Network Science and Engineering, 2021, 8, 1269-1282.	6.4	2
5	Optimal Resource Allocation in Multihop Wireless Networks Relying on Energy Harvesting. IEEE Communications Letters, 2021, 25, 224-228.	4.1	3
6	Network Tomography for Efficient Monitoring in SDN-Enabled 5G Networks and Beyond: Challenges and Opportunities. IEEE Communications Magazine, 2021, 59, 70-76.	6.1	22
7	Socio-Aware Recommendations Under Complex User Constraints. IEEE Transactions on Computational Social Systems, 2021, 8, 377-387.	4.4	1
8	Improving the Utility of Polygenic Risk Scores as a Biomarker for Alzheimer's Disease. Cells, 2021, 10, 1627.	4.1	7
9	Future Network Traffic Matrix Synthesis and Estimation Based on Deep Generative Models. , 2021, , .		4
10	CoveR: An Information Diffusion Aware Approach for Efficient Recommendations Under User Coverage Constraints. IEEE Transactions on Computational Social Systems, 2021, 8, 894-905.	4.4	4
11	5G for Vehicular Use Cases: Analysis of Technical Requirements, Value Propositions and Outlook. IEEE Open Journal of Intelligent Transportation Systems, 2021, 2, 73-96.	4.8	8
12	5G Network Requirement Analysis and Slice Dimensioning for Sustainable Vehicular Services. , 2021, , .		6
13	Demo Proposal: Tele-Operated Support over 4G/5G Mobile Communications. , 2021, , .		3
14	A Software Defined Radio Cross-Layer Resource Allocation Approach for Cognitive Radio Networks: From Theory to Practice. IEEE Transactions on Cognitive Communications and Networking, 2020, 6, 740-755.	7.9	60
15	A Distance-based Agglomerative Clustering Algorithm for Multicast Network Tomography. , 2020, , .		5
16	A Review of Advanced Algebraic Approaches Enabling Network Tomography for Future Network Infrastructures. Future Internet, 2020, 12, 20.	3.8	21
17	Mathematical Models for Malware Propagation. Security and Communication Networks, 2019, 2019, 1-2.	1.5	0
18	Autonomic Network Management and Cross-Layer Optimization in Software Defined Radio Environments. Future Internet, 2019, 11, 37.	3.8	10

#	Article	IF	Citations
19	A Realistic Evaluation of MRF-based Resource Allocation for SDR Cognitive Radio Networks. , 2019, , .		0
20	Sensing and monitoring of information diffusion in complex online social networks. Peer-to-Peer Networking and Applications, 2019, 12, 604-619.	3.9	4
21	A Markov Random Field Framework for Modeling Malware Propagation in Complex Communications Networks. IEEE Transactions on Dependable and Secure Computing, 2019, 16, 551-564.	5.4	10
22	Temporal Dynamics of Information Diffusion in Twitter: Modeling and Experimentation. IEEE Transactions on Computational Social Systems, 2018, 5, 256-264.	4.4	39
23	Utility Decisions for QoE-QoS Driven Applications in Practical Mobile Broadband Networks. , 2018, , .		3
24	On the Energy-Efficient Coverage of Network Regions with Convex Opaque Obstacles. , 2018, , .		0
25	Enhancing Community Detection for Big Sensor Data Clustering via Hyperbolic Network Embedding. , 2018, , .		0
26	Big Data Clustering via Community Detection and Hyperbolic Network Embedding in IoT Applications. Sensors, 2018, 18, 1205.	3.8	8
27	Hyperbolic Embedding for Efficient Computation of Path Centralities and Adaptive Routing in Large-Scale Complex Commodity Networks. IEEE Transactions on Network Science and Engineering, 2017, 4, 140-153.	6.4	9
28	Strategy evolution of information diffusion under time-varying user behavior in generalized networks. Computer Communications, 2017, 100, 91-103.	5.1	10
29	A path-based recommendations approach for online systems via hyperbolic network embedding. , 2017, , .		2
30	Hyperbolic Traffic Load Centrality for large-scale complex communications networks. , 2016, , .		1
31	A Component-Based Cross-Layer Framework for Software Defined Wireless Networks. , 2016, , .		4
32	On the Evolution of Complex Network Topology Under Network Churn. Lecture Notes in Computer Science, 2016, , 227-240.	1.3	0
33	A hyperbolic space analytics framework for big network data and their applications. IEEE Network, 2016, 30, 11-17.	6.9	19
34	Analysis and control of information diffusion dictated by user interest in generalized networks. Computational Social Networks, 2015, 2, 18.	2.1	6
35	User interest dictated information diffusion over generalized networks. , 2015, , .		1
36	On the Impact of Network Evolution on NUM Resource Allocation Problems in Wireless Multihop Networks. Lecture Notes in Computer Science, 2015, , 62-75.	1.3	0

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37	Macroscopic Malware Propagation Dynamics for Complex Networks With Churn. IEEE Communications Letters, 2015, 19, 577-580.	4.1	17
38	Exploiting social features for improving cognitive radio infrastructures and social services via combined MRF and back pressure cross-layer resource allocation. Computational Social Networks, 2014, 1, .	2.1	7
39	An MRF cross-layer resource allocation approach with back-pressure features for QoS in dynamic social and cognitive communications. , 2014, , .		0
40	A Spatio-Stochastic Framework for Cross-Layer Design in Cognitive Radio Networks. IEEE Transactions on Parallel and Distributed Systems, 2014, 25, 2762-2771.	5.6	4
41	Discovering and exploiting spectrum power correlations in cognitive radio networks: an experimentally driven approach. Eurasip Journal on Wireless Communications and Networking, 2014, 2014, .	2.4	3
42	Exploiting socio-physical network interactions via a utility-based framework for resource management in mobile social networks. IEEE Wireless Communications, 2014, 21, 10-17.	9.0	18
43	Cross-Layer Based Resource Management Frameworks for Mobile Cognitive Radio Networks. Modeling and Optimization in Science and Technologies, 2014, , 285-322.	0.7	4
44	Evaluation of Malware Spreading in Wireless Multihop Networks with Churn. Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, 2014, , 63-74.	0.3	1
45	On the optimal, fair and channel-aware cognitive radio network reconfiguration. Computer Networks, 2013, 57, 1739-1757.	5.1	17
46	Diffusion Models for Information Dissemination Dynamics in Wireless Complex Communication Networks. Journal of Complex Systems, 2013, 2013, 1-13.	0.7	15
47	Topology Enhancements in Wireless Multihop Networks: A Top-Down Approach. IEEE Transactions on Parallel and Distributed Systems, 2012, 23, 1344-1357.	5.6	14
48	A Markov Random Field framework for channel assignment in Cognitive Radio networks. , 2012, , .		12
49	Wireless multi-hop network topology control optimization and trade-off analysis. , 2012, , .		3
50	A Cross-Layer-Based Topology Control Framework for Wireless Multihop Networks. IEEE Transactions on Vehicular Technology, 2012, 61, 2858-2864.	6.3	4
51	Topology control in multi-channel cognitive radio networks with non-uniform node arrangements. , 2011, , .		1
52	Time-based cross-layer adaptations in wireless cognitive radio ad hoc networks. , 2011, , .		3
53	Enhancing trust establishment in wireless multi-hop networks via preferential attachment. , 2011, , .		0
54	A socially-driven topology improvement framework with applications in content distribution and trust management. Journal of Internet Services and Applications, 2011, 2, 113-127.	2.1	2

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55	Comparison of efficient random walk strategies for wireless multi-hop networks. Computer Communications, 2011, 34, 1258-1267.	5.1	2
56	Analytic stochastic propagation model for urban streets. IET Microwaves, Antennas and Propagation, 2010, 4, 91.	1.4	3
57	Enhanced service provisioning in wireless multi-hop networks via socially-driven inverse topology control. , 2010, , .		1
58	Markov Random Fields for Malware Propagation: The Case of Chain Networks. IEEE Communications Letters, 2010, 14, 875-877.	4.1	12
59	Towards self-managing systems inspired by economic organizations. , 2010, , .		2
60	On topology control and non-uniform node deployment in ad hoc networks. , 2010, , .		2
61	Socially-Inspired Topology Improvements in Wireless Multi-Hop Networks. , 2010, , .		7
62	Topology-Aware Hybrid Random Walk Protocols for Wireless Multihop Networks. Lecture Notes of the Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering, 2010, , 107-118.	0.3	0
63	On the Tradeoff between MAC-Layer and Network-Layer Topology-Controlled Malware Spreading Schemes in Ad Hoc and Sensor Networks. , 2009, , .		1
64	Malware-Propagative Mobile Ad Hoc Networks: Asymptotic Behavior Analysis. Journal of Computer Science and Technology, 2008, 23, 389-399.	1.5	26
65	Stochastic Ray Propagation for Two Parallel Urban Streets: Exact and Approximate Results. IEEE Antennas and Wireless Propagation Letters, 2008, 7, 381-384.	4.0	1
66	On the problem of joint power and rate control in CDMA ad hoc networks. , 2008, , .		1
67	An Opportunistic Combined Power and Rate Allocation Approach in CDMA Ad Hoc Networks. , 2008, , .		3
68	On the malware spreading over non-propagative wireless ad hoc networks. , 2007, , .		4
69	On the Asymptotic Behavior of Malware-Propagative Mobile Ad Hoc Networks. , 2007, , .		3
70	Risk-based attack strategies for mobile ad hoc networks under probabilistic attack modeling framework. Computer Networks, 2007, 51, 2397-2410.	5.1	7
71	A novel framework for mobile attack strategy modelling and vulnerability analysis in wireless ad hoc networks. International Journal of Security and Networks, 2006, 1, 255.	0.2	26
72	Evolutionary Dynamics of Complex Communications Networks. , 0, , .		26