

James M Keller

List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/2541341/publications.pdf>

Version: 2024-02-01

153
papers

6,419
citations

159585

30
h-index

82547

72
g-index

156
all docs

156
docs citations

156
times ranked

4525
citing authors

#	ARTICLE	IF	CITATIONS
1	StreamSoNG: A Soft Streaming Classification Approach. IEEE Transactions on Emerging Topics in Computational Intelligence, 2022, 6, 700-709.	4.9	5
2	New Linguistic Description Approach for Time Series and Its Application to Bed Restlessness Monitoring for Eldercare. IEEE Transactions on Fuzzy Systems, 2022, 30, 1048-1059.	9.8	4
3	Divergence Regulated Encoder Network for Joint Dimensionality Reduction and Classification. IEEE Geoscience and Remote Sensing Letters, 2022, 19, 1-5.	3.1	0
4	Mechanism-Driven Modeling to Aid Non-invasive Monitoring of Cardiac Function via Ballistocardiography. Frontiers in Medical Technology, 2022, 4, 788264.	2.5	5
5	Explainable AI for the Choquet Integral. IEEE Transactions on Emerging Topics in Computational Intelligence, 2021, 5, 520-529.	4.9	15
6	Extending the Morphological Hit-or-Miss Transform to Deep Neural Networks. IEEE Transactions on Neural Networks and Learning Systems, 2021, 32, 4826-4838.	11.3	9
7	Evaluating Evolving Structure in Streaming Data With Modified Dunn's Indices. IEEE Transactions on Emerging Topics in Computational Intelligence, 2021, 5, 262-273.	4.9	6
8	Non-invasive monitoring of vital signs for older adults using recliner chairs. Health and Technology, 2021, 11, 169-184.	3.6	8
9	Comments on "TLPCM: Transfer Learning Possibilistic C-Means": Errata and Observations. IEEE Transactions on Fuzzy Systems, 2021, 29, 702-704.	9.8	0
10	TLPCM: Transfer Learning Possibilistic C-Means. IEEE Transactions on Fuzzy Systems, 2021, 29, 940-952.	9.8	10
11	Streaming Data Analysis: Clustering or Classification?. IEEE Transactions on Systems, Man, and Cybernetics: Systems, 2021, 51, 91-102.	9.3	16
12	Explainable Systematic Analysis for Synthetic Aperture Sonar Imagery. , 2021, , .		2
13	Combining Physiology-Based Modeling and Evolutionary Algorithms for Personalized, Noninvasive Cardiovascular Assessment Based on Electrocardiography and Ballistocardiography. Frontiers in Physiology, 2021, 12, 739035.	2.8	6
14	Noninvasive cardiovascular monitoring based on electrocardiography and ballistocardiography: a feasibility study on patients in the surgical intensive care unit. , 2021, 2021, 951-954.		3
15	Enabling Explainable Fusion in Deep Learning With Fuzzy Integral Neural Networks. IEEE Transactions on Fuzzy Systems, 2020, 28, 1291-1300.	9.8	47
16	Granular Modeling of Fuzzy Color Categories. IEEE Transactions on Fuzzy Systems, 2020, 28, 1897-1909.	9.8	9
17	Tracking personalized functional health in older adults using geriatric assessments. BMC Medical Informatics and Decision Making, 2020, 20, 270.	3.0	7
18	A Weighted Matrix Visualization for Fuzzy Measures and Integrals. , 2020, , .		6

#	ARTICLE	IF	CITATIONS
19	Sequential Possibilistic Local Information One-Means Clustering For Image Segmentation. , 2020, , .		2
20	Possibilistic Clustering Enabled Neuro Fuzzy Logic. , 2020, , .		4
21	On a Granular Approach for Fuzzy Color Modelling. , 2020, , .		3
22	Monitoring the Relative Blood Pressure Using a Hydraulic Bed Sensor System. IEEE Transactions on Biomedical Engineering, 2019, 66, 740-748.	4.2	40
23	Linguistic summarization of in-home sensor data. Journal of Biomedical Informatics, 2019, 96, 103240.	4.3	20
24	Non-Invasive In-Home Sleep Stage Classification Using a Ballistocardiography Bed Sensor. , 2019, , .		15
25	Cardiovascular Function and Ballistocardiogram: A Relationship Interpreted via Mathematical Modeling. IEEE Transactions on Biomedical Engineering, 2019, 66, 2906-2917.	4.2	41
26	Surgery Task Classification Using Procrustes Analysis. , 2019, , .		0
27	A Novel Distance for Automated Surgical Skill Evaluation. , 2019, , .		1
28	Data Stream Trajectory Analysis Using Sequential Possibilistic Gaussian Mixture Model. , 2019, , .		4
29	Linear Order Statistic Neuron. , 2019, , .		5
30	Evaluating Path Costs in Multi-Attributed Fuzzy Weighted Graphs. , 2019, , .		0
31	A New Incremental Cluster Validity Index for Streaming Clustering Analysis. , 2019, , .		4
32	Fuzzy Clustering: A Historical Perspective. IEEE Computational Intelligence Magazine, 2019, 14, 45-55.	3.2	111
33	Deep convolutional neural network target classification for underwater synthetic aperture sonar imagery. , 2019, , .		23
34	Sequential Possibilistic One-Means Clustering with Dynamic Eta. , 2018, , .		12
35	Sleep Posture Classification Using Bed Sensor Data and Neural Networks. , 2018, 2018, 461-465.		34
36	Analysis of Streaming Clustering Using an Incremental Validity Index. , 2018, , .		10

#	ARTICLE	IF	CITATIONS
37	Analysis of Incremental Cluster Validity for Big Data Applications. International Journal of Uncertainty, Fuzziness and Knowledge-Based Systems, 2018, 26, 47-62.	1.9	7
38	Adaptive multidimensional fuzzy sets for texture modeling. International Journal of Approximate Reasoning, 2018, 103, 288-302.	3.3	3
39	Robust On-Line Streaming Clustering. Communications in Computer and Information Science, 2018, , 467-478.	0.5	5
40	Early illness recognition in older adults using transfer learning. , 2017, , .		6
41	Sequential possibilistic one-means clustering. , 2017, , .		10
42	Context preserving representation of daily activities in elder care. , 2017, , .		3
43	Possibilistic fuzzy local information C-Means for sonar image segmentation. , 2017, , .		17
44	Multiple Instance Choquet integral for classifier fusion. , 2016, , .		17
45	A temporal analysis system for early detection of health changes. , 2016, , .		15
46	Sleep stage recognition using respiration signal. , 2016, 2016, 2843-2846.		11
47	A myopic Monte Carlo strategy for the partially observable travelling salesman problem. , 2016, , .		1
48	Quantitative and qualitative comparison of periodic sensor data. , 2016, , .		4
49	On the computation of semantically ordered truth values of linguistic protoform summaries. , 2015, , .		13
50	Textual summarization of events leading to health alerts. , 2015, 2015, 7634-7.		10
51	Automated In-Home Fall Risk Assessment and Detection Sensor System for Elders. Gerontologist, The, 2015, 55, S78-S87.	3.9	68
52	Recognizing complex instrumental activities of daily living using scene information and fuzzy logic. Computer Vision and Image Understanding, 2015, 140, 68-82.	4.7	32
53	Patient stratification based on Activity of Daily Living score using Relational Self-Organizing Maps. , 2014, , .		1
54	Evolving a fuzzy goal-driven strategy for the game of Geister: An exercise in teaching computational intelligence. , 2014, , .		2

#	ARTICLE	IF	CITATIONS
55	A framework for harmonizing sensor data to support embedded health assessment. , 2014, 2014, 1747-51.		5
56	Visualizing uncertainty with fuzzy rose diagrams. , 2014, , .		4
57	A human geospatial predictive analytics framework with application to finding medically underserved areas. , 2014, , .		2
58	Day or Night Activity Recognition From Video Using Fuzzy Clustering Techniques. IEEE Transactions on Fuzzy Systems, 2014, 22, 483-493.	9.8	82
59	Sit-to-Stand Measurement for In-Home Monitoring Using Voxel Analysis. IEEE Journal of Biomedical and Health Informatics, 2014, 18, 1502-1509.	6.3	11
60	Building a framework for recognition of activities of daily living from depth images using fuzzy logic. , 2014, , .		1
61	Linguistic Prototypes for Data From Eldercare Residents. IEEE Transactions on Fuzzy Systems, 2014, 22, 110-123.	9.8	36
62	Extension of the Fuzzy Integral for General Fuzzy Set-Valued Information. IEEE Transactions on Fuzzy Systems, 2014, 22, 1625-1639.	9.8	40
63	A Memetic Algorithm for Matching Spatial Configurations With the Histograms of Forces. IEEE Transactions on Evolutionary Computation, 2013, 17, 588-604.	10.0	22
64	A framework for computing crowd emotions using agent based modeling. , 2013, , .		6
65	A graph-based memetic approach to sketch geolocation. , 2013, , .		1
66	A Fuzzy Measure Similarity Between Sets of Linguistic Summaries. IEEE Transactions on Fuzzy Systems, 2013, 21, 183-189.	9.8	36
67	Anomaly detection from linguistic summaries. , 2013, , .		7
68	Detecting foreground disambiguation of depth images using fuzzy logic. , 2013, , .		3
69	Generation of prototypes from sets of linguistic summaries. , 2012, , .		7
70	Detection of buried objects in FLIR imaging using mathematical morphology and SVM. , 2012, , .		5
71	Implementing bounded rationality in disaster agent behavior using OGA operators. , 2012, , .		4
72	A distance metric for a space of linguistic summaries. Fuzzy Sets and Systems, 2012, 208, 79-94.	2.7	26

#	ARTICLE	IF	CITATIONS
73	An extension of a confined space evacuation model to human geography. , 2012, , .		5
74	Causal cueing system for above ground anomaly detection of explosive hazards using support vector machine localized by K-nearest neighbor. , 2012, , .		2
75	Dirt road segmentation using color and texture features in color imagery. , 2012, , .		3
76	Similarity evaluation of sets of linguistic summaries. International Journal of Intelligent Systems, 2012, 27, 926-938.	5.7	10
77	Similarity measure for anomaly detection and comparing human behaviors. International Journal of Intelligent Systems, 2012, 27, 733-756.	5.7	16
78	Clustering of Detected Changes in High-Resolution Satellite Imagery Using a Stabilized Competitive Agglomeration Algorithm. IEEE Transactions on Geoscience and Remote Sensing, 2011, 49, 4687-4703.	6.3	16
79	Linguistic description of adult skeletal age-at-death estimations from fuzzy integral acquired fuzzy sets. , 2011, , .		9
80	Conflation of Vector Buildings With Imagery. IEEE Geoscience and Remote Sensing Letters, 2011, 8, 83-87.	3.1	7
81	Clustering ellipses for anomaly detection. Pattern Recognition, 2011, 44, 55-69.	8.1	77
82	Object set matching with an evolutionary algorithm. , 2011, , .		2
83	Linguistic summarization of long-term trends for understanding change in human behavior. , 2011, , .		34
84	Linguistic summarization of sensor data for eldercare. , 2011, , .		37
85	Quantitative analysis of 180 degree turns for fall risk assessment using video sensors. , 2011, 2011, 7606-9.		9
86	Nighttime in-home action monitoring for eldercare. , 2011, 2011, 5299-302.		6
87	Body sway measurement for fall risk assessment using inexpensive webcams. , 2010, 2010, 2225-9.		24
88	A fuzzy Choquet integral with an interval type-2 fuzzy number-valued integrand. , 2010, , .		21
89	A modified genetic algorithm for matching building sets with the histograms of forces. , 2010, , .		3
90	Sit-to-stand detection using fuzzy clustering techniques. , 2010, , .		12

#	ARTICLE	IF	CITATIONS
91	A relational dual of the fuzzy possibilistic c-means algorithm. , 2010, , .		5
92	Segmentation and linguistic summarization of voxel environments using stereo vision and genetic algorithms. , 2010, , .		16
93	Comparing Fuzzy, Probabilistic, and Possibilistic Partitions. IEEE Transactions on Fuzzy Systems, 2010, 18, 906-918.	9.8	105
94	Relational Generalizations of Cluster Validity Indices. IEEE Transactions on Fuzzy Systems, 2010, 18, 771-786.	9.8	46
95	Relational Duals of Cluster-Validity Functions for the c -Means Family. IEEE Transactions on Fuzzy Systems, 2010, 18, 1160-1170.	9.8	7
96	Computing With Words With the Ontological Self-Organizing Map. IEEE Transactions on Fuzzy Systems, 2010, 18, 473-485.	9.8	18
97	Extracting footfalls from voxel data. , 2010, 2010, 1119-22.		16
98	Learning Fuzzy-Valued Fuzzy Measures for the Fuzzy-Valued Sugeno Fuzzy Integral. Lecture Notes in Computer Science, 2010, , 502-511.	1.3	36
99	A Comparison of Five Fuzzy Rand Indices. Communications in Computer and Information Science, 2010, , 446-454.	0.5	6
100	Modeling Human Activity From Voxel Person Using Fuzzy Logic. IEEE Transactions on Fuzzy Systems, 2009, 17, 39-49.	9.8	94
101	Video-based activity monitoring for indoor environments. , 2009, , .		15
102	Contour tracking of human exercises. , 2009, , .		11
103	Clustering in ordered dissimilarity data. International Journal of Intelligent Systems, 2009, 24, 504-528.	5.7	29
104	Finding the number of clusters in ordered dissimilarities. Soft Computing, 2009, 13, 1125-1142.	3.6	19
105	Is VAT really single linkage in disguise?. Annals of Mathematics and Artificial Intelligence, 2009, 55, 237-251.	1.3	32
106	Linguistic summarization of video for fall detection using voxel person and fuzzy logic. Computer Vision and Image Understanding, 2009, 113, 80-89.	4.7	202
107	Fuzzy contour tracking of human silhouettes. , 2009, , .		2
108	Mapping natural language to imagery: Placing objects intelligently. , 2009, , .		8

#	ARTICLE	IF	CITATIONS
109	eCCV: A new fuzzy cluster validity measure for large relational bioinformatics datasets. , 2009, , .		4
110	Dunn’s cluster validity index as a contrast measure of VAT images. , 2008, , .		24
111	Activity Analysis, Summarization, and Visualization for Indoor Human Activity Monitoring. IEEE Transactions on Circuits and Systems for Video Technology, 2008, 18, 1489-1498.	8.3	111
112	Speedup of Fuzzy Clustering Through Stream Processing on Graphics Processing Units. IEEE Transactions on Fuzzy Systems, 2008, 16, 1101-1106.	9.8	30
113	Minimum Classification Error Training for Choquet Integrals With Applications to Landmine Detection. IEEE Transactions on Fuzzy Systems, 2008, 16, 225-238.	9.8	61
114	A new cluster validity measure for bioinformatics relational datasets. , 2008, , .		10
115	Roach Infestation Optimization. , 2008, , .		75
116	Adaptive temporal difference learning of spatial memory in the water maze task. , 2008, , .		4
117	Genetic fuzzy programs. , 2008, , .		1
118	Fuzzy cluster analysis of bioinformatics data composed of microarray expression data and gene ontology annotations. , 2008, , .		12
119	Growing neural gas for temporal clustering. , 2008, , .		22
120	Emergent trend detection in diurnal activity. , 2008, 2008, 3815-8.		11
121	Falls, Technology, and Stunt Actors. Journal of Nursing Care Quality, 2008, 23, 195-201.	0.9	17
122	Scene Matching between a Map and a Hand Drawn Sketch Using Spatial Relations. Proceedings - IEEE International Conference on Robotics and Automation, 2007, , .	0.0	12
123	A Robot in a Water Maze: Learning a Spatial Memory Task. Proceedings - IEEE International Conference on Robotics and Automation, 2007, , .	0.0	4
124	Learning the Fuzzy Connectives of a Multilayer Network Using Particle Swarm Optimization. , 2007, , .		4
125	Frequency Subband Processing and Feature Analysis of Forward-Looking Ground-Penetrating Radar Signals for Land-Mine Detection. IEEE Transactions on Geoscience and Remote Sensing, 2007, 45, 718-729.	6.3	55
126	Possibilistic C-Shell Clustering with Inter-Cluster Constraints. , 2006, , .		0

#	ARTICLE	IF	CITATIONS
127	GENE ONTOLOGY SIMILARITY MEASURES BASED ON LINEAR ORDER STATISTICS. International Journal of Uncertainty, Fuzziness and Knowledge-Based Systems, 2006, 14, 639-661.	1.9	10
128	Adaptive Silhouette Extraction and Human Tracking in Complex and Dynamic Environments. , 2006, , .		16
129	Recognizing Falls from Silhouettes. , 2006, 2006, 6388-91.		122
130	Recognizing Falls from Silhouettes. Annual International Conference of the IEEE Engineering in Medicine and Biology Society, 2006, , .	0.5	13
131	Relational mountain (density) clustering method and web log analysis. International Journal of Intelligent Systems, 2005, 20, 375-392.	5.7	8
132	Phase signatures in acoustic-seismic land mine detection. Radio Science, 2004, 39, n/a-n/a.	1.6	4
133	The use of force histograms for affine-invariant relative position description. IEEE Transactions on Pattern Analysis and Machine Intelligence, 2004, 26, 1-0_6.	13.9	88
134	Title is missing!. Autonomous Robots, 2003, 14, 51-69.	4.8	38
135	Generalized Choquet fuzzy integral fusion. Information Fusion, 2002, 3, 69-85.	19.1	104
136	Anti-Personnel Land Mine Detection and Discrimination Using Acoustic Data. Subsurface Sensing Technologies and Applications, 2002, 3, 75-93.	0.9	5
137	Pulsed-Field Gel Electrophoresis Pattern Recognition of Bacterial DNA: A Systemic Approach. Pattern Analysis and Applications, 2001, 4, 244-255.	4.6	6
138	A Fuzzy Rule-Based Approach to Scene Description Involving Spatial Relationships. Computer Vision and Image Understanding, 2000, 80, 21-41.	4.7	36
139	LADAR target detection using morphological shared-weight neural networks. Machine Vision and Applications, 2000, 11, 300-305.	2.7	31
140	Some neural net realizations of fuzzy reasoning. International Journal of Intelligent Systems, 1998, 13, 859-886.	5.7	10
141	<title>Detection and classification of MSTAR objects via morphological shared-weight neural networks</title>. , 1998, , .		13
142	Training the fuzzy integral. International Journal of Approximate Reasoning, 1996, 15, 1-24.	3.3	95
143	Fuzzy additive hybrid operators for network-based decision making. International Journal of Intelligent Systems, 1994, 9, 1001-1023.	5.7	21
144	Advances in fuzzy integration for pattern recognition. Fuzzy Sets and Systems, 1994, 65, 273-283.	2.7	135

#	ARTICLE	IF	CITATIONS
145	A fuzzy logic rule-based automatic target recognizer. International Journal of Intelligent Systems, 1991, 6, 295-312.	5.7	17
146	Local fractal geometric features for image segmentation. International Journal of Imaging Systems and Technology, 1990, 2, 267-284.	4.1	20
147	Image segmentation in the presence of uncertainty. International Journal of Intelligent Systems, 1990, 5, 193-208.	5.7	30
148	AN APPROXIMATE REASONING TECHNIQUE FOR RECOGNITION IN COLOR IMAGES OF BEEF STEAKS. International Journal of General Systems, 1990, 16, 331-342.	2.5	13
149	Characteristics of Natural Scenes Related to the Fractal Dimension. IEEE Transactions on Pattern Analysis and Machine Intelligence, 1987, PAMI-9, 621-627.	13.9	130
150	Fuzzy Confidence Measures in Midlevel Vision. IEEE Transactions on Systems, Man, and Cybernetics, 1987, 17, 676-683.	0.9	19
151	Incorporating Fuzzy Membership Functions into the Perceptron Algorithm. IEEE Transactions on Pattern Analysis and Machine Intelligence, 1985, PAMI-7, 693-699.	13.9	206
152	A fuzzy K-nearest neighbor algorithm. IEEE Transactions on Systems, Man, and Cybernetics, 1985, SMC-15, 580-585.	0.9	1,964
153	Fuzzy Approaches for the Analysis CpG Island Methylation Patterns. , 0, , 141-165.		0