

Yasser Mohammad

Principal Researcher Data Science Labs, NEC

Professor Assiut University, Egypt

- Date of Birth: Sep. 7, 1976
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Interests

- Automated Negotiation
- Time Series Data Mining
- Activity Recognition
- Robotics and HRI

Short Bio

Yasser received his PhD from Kyoto University in 2009. Since then he worked in universities, national research institutes, research companies and industrial research laboratories. He collaborated with experts in psychology, computer science, mathematics, robotics, HCI, HRI, machine learning among other fields. His research spans the area of applied AI with a focus on robotics and multiagent systems. Author of two books and a hundred articles with over a thousand ciations. A senior IEEE member, PC member and reviewer for AAAI, IJCAI, AA-MAS, IROS, HRI, IEEE Trans. on System Man and Cybernetics, Social Robotics, Applied Intelligence, among many others. Main organizer of the SCML@ANAC running yearly in conjunction of IJCAI.

Industrial Experience

Jan, 2020 – ongoing	Principal Researcher Data Science Research Laboratories NEC, Japan Conducting research and developing systems in the areas of multiagent systems and ML. Leading platform development and international cooperation in automated negotiation.	
Feb, 2020 – ongoing	Specially Appointed Researcher Research in automatic negotiation specially preference elicitation.	
August, 2020 - July 2021	Visiting Researcher Research in automatic negotiation specially concurrent negotiation.	
Nov, 2017 – Dec, 2019	Researcher AIRC, AIST, Japan Research in automatic negotiation.	
Jun, 2017 – Nov, 2017	Data Science Advisor Xtrava (xtrava.co), USA Developing innovative real-time machine learning systems for biosensor data analysis.	
Nov, 2016 – Nov, 2017	Chief Research Engineer KDDI Research Inc. (kddi-research.jp) Japan Conducting state of the art research in human behavior understanding using machine learning techniques. Applying pattern recognition and deep learning techniques to time-series data mining.	
Jan, 2007 – Mar 2009	Technical Executive Officer Produced the complete first version of Ayofa SDK (A face detection/recognition SDK). Managed the development team of all products in the company.	
Apr, 2004 – Oct, 2005	Developer Developed Assiut University Information Systems Internet Portal and designed software for university automation.	

Academic Experience

Sep, 1999 -

Apr, 2000

Teaching Assistant

supervising graduation-projects

Dec, 2022 – ongoing	Professor (currently on leave) Teaching and conducting research in intelligent systems as pating in administrative efforts. Assiut	Univ., Egypt nd partici-
Aug, 2016 – Dec, 2022	Associate Professor Teaching and conducting research in computer and systemeering and participating in administrative efforts.	Univ., Egypt ems engi-
Oct, 2015 – Jun, 2016	Adjunct Professor Working as an Adjunct Assistant Professor for one day/week at Mechatronics and Robotics Engineering Department, Egypt-Japan University of Science and Technology (E-JUST), Egypt.	
Sep, 2012 – Aug, 2014	JSPS Fellow Conducting research in imitation learning and its application robotics. Kyoto U	Univ., Japan Cations in
Jul, 2011 – Dec, 2011	GCOE Postdoc Visiting Researcher Conducting research in the applied intelligence dept. in coll with Prof. T. Nishida.	Univ., Japan aboration
Jan, 2010 – Aug, 2016	Assistant Professor Teaching and conducting research in computer and systemeering and participating in administrative efforts.	Univ., Egypt ems engi-
Jun, 2005 – Dec, 2009	Teaching Associate Assisting in teaching courses to students of Electrical Engineering and introductory Engineering cousupervising graduation-projects	
Apr, 2000 – Jun, 2005	Teaching Assistant Assisting in teaching courses to students of Electrical Engineering and introductory Engineering cousupervising graduation-projects	

Assisting in teaching courses to students of Electrical Engineering,

Mechanical Engineering and introductory Engineering courses and

Assiut Univ., Egypt

Metrics Citations Books 1,292 G Scholar Scopus h-index **Publications** h-index 15 RGScore i10 index 410.1

Profiles



Languages

Arabic (Mother Tongue)

English (Fluent)

Japanese (Learning)

Personal

Yasser lives with his partner, a medical doctor, and three children in Tokyo since 2016.

Education

2006 – 2009	Ph.D. in Informatics (AI) Title: Autonomous Development of Natural Interactive Behavior for Robots and Embodied Agents.
	AI HRI Unsupervised Learning Time Series Analysis
2001 – 2005	M.Sc. in Computers and Systems Engineering Title: Anubis: A novel network authentication protocol. Computer Security Network Authentication BAN Logic
1993 – 1998	B.Sc. in Electrical Engineering Graduation Project: Construction and control of a 2D robot for drawing applications. Robotics Automatic Control Simulation

Review and Editorial Duties publons profile

Journals	New Generation Computing, Social Robotics, IEEE Trans. on
	Systems Man and Cybernetics, IEEE Trans. on Industrial
	Electronics, Neurocomputing, AI & Society, Applied Intelligence,
	among many others

Conferences AAAI, IJCAI, AAMAS, IEEE ROMAN, IEEE HRI, IEEE IROS, DATA,

IEA/AIE, ISIEA, PECON, ACHI, ICCCI, ICAS, KUI, ...

Organizer SCM league of the ANAC competition in conjunction with IJCAI

since 2019

Honours and Awards

Dec 2023	Best Paper Award The 7th IEEE International Conference on Ager	Kyoto, Japan nts (IEEE ICA)
Jan 2021	Finalist for the International Automated Negotiating Agents Competition (Genius track) Nagoya, Japan International Joint Conference on Artificial Intelligence (IJCAI)	
Nov 2020	Runner for Best Paper Award The 23rd International Conference on Princip Multi-Agent Systems (PRIMA)	Nagoya, Japan oles and Practice of
Mar 2015	Best Presentation Award Kitakyush, Japan the 3rd International Conference on Industrial Application Engineering	
Sep 2014	Outstanding Paper Award ICROS International Conference on Control, Automation and Systems (ICCAS) 2014 (out of 337 accepted papers from 25 countries)	
Sep 2012	JSPS Fellowship JSPS long term post-doc fellowship for foreign 2014)	Kyoto University, Japan n researchers (2012-
Jul 2011	GCOE Postdoc Fellowship July-December 2011	Kyoto University, Japan
Oct 2011	Best Paper Award IEEE SII 2012 (Control) (from 248 accepted pa	Kitakyush, Japan apers)
Jun 2009	Best Paper Award Tainan, Taiwan the Twenty Second International Conference Industrial, Engineering, and other applications of Applied Intelligent Systems (IEA/AIE 2009). Acceptance rate was 29% out of 286 submitted papers (ranked 46th among top 701 computer science conferences)	
Jun 2008	Best Paper Award the Twenty First International Conference Ind	Wroclaw, Poland ustrial, Engineering,

and other applications of Applied Intelligent Systems (IEA/AIE 2008). Acceptance rate was 30% out of 270 submitted papers (ranked 46th

among top 701 computer science conferences)

Teaching Experience

Undergradute Courses (Partial List)

Assiut **Electrical Engineering** 2010–2015 University Introduction to Computer Science, Numerical Analysis, Micropro-

cessors, Computer Organization, Computer Architecture, Database

Systems, Digital Signal Processing, Databases

Assiut Mechatronics 2010–2015

University Robotics Engineering

Assiut Information and Computers 2010–2015

University Graphical User Interfaces, Network Security, Computer Security,

Microprocessors, Computer Organization

Postgraduate Courses (Partial List)

E-JUST Mechatronics Engineering M.sc. and PhD 2016

University Intelligent Control Systems

Assiut Electrical Engineering M.sc. and PhD 2010–2015

University Robot Motion Planning, Pattern Recognition, Probabilistic Inference,

Data Sciences and BigData

Academic Supervision

2012–2016 Mostafa Abdallah M.Sc., AUN, Egypt
An Integrated ROS stack for Autonomous learning of Perceptual and

Motion Primitives

2015–2020 Yomna Mohammad M.Sc., AUN, Egypt

Pattern Discovery in Time Series

2019–2022 **Niang Yo** M.Sc., Fraunhofer, ISC, Germany

Design of AI agent for Supply Chain Management using Deep Rein-

forcement Learning

2019–2022 Alyaa Sabra M.Sc., AUN, Egypt

Feature Selection for Face Recognition

2019–2022 **Zaynab Ashraf** M.Sc., AUN, Egypt

Text Mining tool for Genome Scale Metabolic Model

2021– **Abdallah Ahmed** M.Sc., EJUST, Egypt

Deep Learning for Robot Navigation in Dynamic Environments

Funded Projects

Japan

Japan

May 2014 Theoretical Framework for Interactive Game Design >10M JPY
Investigator Japan Aerospace Research and Development (AFOSR/AOARD) To establish a theoretical framework for achieving content-rich, proficient

and reliable communication between people and robots.

Sep 2012 Fluid Imitation Learning 2.5M JPY
PI Japanese Society for Promotion of Science To design, implement and evaluate an imitation engine for humanoid robots that achieves

and evaluate an imitation engine for humanoid robots that achieves fluid imitation by autonomously discovering interesting motions to

imitate during its interaction with humans.

Nov 2008 Grounded Action Segmentation and Association 1M JPY
PI Global Centre of Excellence Young Researcher Program, Kyoto Uni-

versity To build and evaluate an unsupervised algorithm for learning interactive behavior both in implicit and explicit nonverbal communi-

cation settings.

Dec 2007 Natural Listening for a Humanoid Robot 1.5M JPY
PI Global Centre of Excellence Young Researcher Program, Kyoto

University To design and implement a learning system that can help the robot achieve natural listening behavior in an automatic

way.

References

Brown Univ., Amy Greenwald Professor

USA amy_greenwald@brown.edu

MIT, USA Mark Klein Senior Research Scientist

m_klein@mit.edu

Fukuchiyama Toyoaki Nishida Dean of the Faculty of Informatics

Univ., Japan toyoaki.nishida@fukuchiyama.ac.jp

Patents

US17/388,004 Application	Negotiation method including elicitation and system for implementing USA 2022 A system for negotiation under uncertainty with elicitation-during-negotiation support using Value of Information concept (50%)
JP6838259B2 Granted	Learning data generator, judgment device and program A method for training multiple pipelines of convolutional neural networks to achieve high accuracy in activity recognition (90%)
JP6754343B2 Granted	Neural network regulators, devices and programs A method for compression neural networks (convolutional or otherwise) based on novel application of feature selection techniques (90%)
US17/184,590 Application	Adaptive Autonomous Negotiation Method and System of Using A new automated negotiation method that can generalize along negotiation domains and opponents (30%)
PCT/JP2020- 029145 Application	Policy Generation Apparatus, Control Method, and Non Transitory Computer-Readable Storage Medium PCT 2020 A method for concurrent negotiation proven to be optimal against opponents with static acceptance models (100%).

Publications and Talks

Tutorials

- 1. [2023] Automated Negotiation in Supply Chains, Yasser Mohammad, IEEE International Conference on Agents (ICA),
- 2. [2023] Reinforcement Learning for Automated Negotiation, Yasser Mohammad, Australasian Joint Conference on Artificial Intelligence (AJCAI), Brisbane, Australia.
- 3. [2022] Automated Negotiation: Challenges and Tools, Yasser Mohammad and Amy Greenwald, The 36th AAAI Conference on Artificial Intelligence, Vancouver, Canada
- 4. [2020] Automated Negotiation in Supply Chain Management, Yasser Mohammad, The 23nd International Conference on Principles and Practice of Multi-Agent Systems, Nagoya, Japan
- 5. [2019] Automated Negotiation: Challenges and Tools, Yasser Mohammad, The 22nd International Conference on Principles and Practice of Multi-Agent Systems, Torino, Italy

Invited Talks

- 6. [2022] Generalized Bargaining Mechanisms: Mechanism Design for Automated Negotiation, IBM/DIMACS Workshop on Bridging Game Theory and Machine Learning for Multi-party Decision Making, October 27-28, New Jersey, USA.
- 7. [2022] Concurrent Negotiation in Supply Chains: Problems, Solutions and Challengs, The 13th International Workshop on Agent-based Complex Automated Negotiations in conjunction with the 31st International Joint Conference on Artificial Intelligence, Vienna, Austria.
- 8. [2018] Analysis and commentary on PRIANAC and ANAC, Pacific Rim International Automated Negotiation Agents Competition (PRIANAC) in conjunction with PRIMA. Tokyo, Japan.
- 9. [2018] Fluid Imitation, Human-Robot Interaction: From Service to Industry (HRI-SI2018) part of IEEE ROMAN 2018, Nanjing, China.
- 10. [2012] SSA application to motif discovery and causality analysis in robotics, Third International Conference on SSA and its applications, Beijing, China, May 17th-May 20th.

Books

- 11. [2016] Yasser Mohammad and Toyoaki Nishida, Data Mining for Social Robotics, in preparation to appear from Springer in early 2016, ISBN 978-3-319-25230-8.
- 12. [2014] T. Nishida, A. Nakazawa, Y. Ohmoto, Y. Mohammad, Conversational Informatics: A data intensive approach with emphasis on Nonverbal Communication, Springer, ISBN 978-4431550396.

International Journals

- 13. [2023] An octopamine receptor involved in feeding behavior of the two-spotted spider mite, Tetranychus urticae Koch: a possible candidate for RNAi-based pest contro, Faten Abdelsalam Hamdi, Kosuke Kataoka, Yuka Arai, Naoki Takeda, Masanobu Yamamoto, Yasser F. O. Mohammad, Noureldin Abuelfadl Ghazy, Takeshi Suzuki, Entomologia Generalis, February 9th, 2023
- 14. [2022] Optimal Time-based Strategy for Automated Negotiation, Yasser Mohammad and Shinji Nakadai, Applied Intelligence, July, 2022.
- 15. [2021] Concurrent Local Negotiations with a Global Utility Function: A Greedy Approach, Yasser Mohammad, Autonomous Agents and Multiagent Systems, 35(28).
- 16. [2020] Supply Chain Management League(SCML) Automated Negotiating Agent Competition for Manufacturing Value Chain, Yasser Mohammad, Shinji Nakadai, Satoshi Morinaga, Katsuhide Fujita, JSAI Journal Vol 35 No 3, May 2020

- 17. **[2019]** Selecting orientation-insensitive features for activity recognition from accelerometers, **Mohammad, Y.**, Matsumoto, K., Hoashi, K. IEICE Transaction on Information and Systems, 102(1), 104-115.
- 18. **[2018]** Primitive activity recognition from short sequences of sensory data, **Y. Mohammad**, K Matsumoto, K Hoashi Applied Intelligence.
- 19. **[2016]** Exact multi-length scale and mean invariant motif discovery, **Yasser Mohammad** and Toyoaki Nishida, Applied Intelligence, vol.44, no.2, pp. 322-339, March
- 20. [2015] Learning interaction protocols by mimicking: Understanding and reproducing human interactive behavior, Yasser Mohammad and Toyoaki Nishida, Pattern Recognition Letters, vo. 66, no. 15, pp. 62-70, November
- 21. **[2015]** Why should we imitate robots? Effect of back imitation on judgment of imitation skill, **Yasser Mohammad** and Toyoaki Nishida, International Journal on Social Robotics, vol.7, no.4, pp. 497-512, August
- 22. **[2015]** Shift Density Estimation based Approximately Recurring Motif Discovery, **Yasser Mohammad** and Toyoaki Nishida, International Journal of Applied Intelligence, vol. 42, no. 1, pp. 112-134, January
- 23. [2013] Learning where to look: Autonomous Development of Gaze Behavior for Natural Human-Robot Interaction, Yasser Mohammad and Toyoaki Nishida, International Journal of Interaction Studies, Springer, no. 32, pp. 419-450, .
- 24. **[2012]** Fluid Imitation: Learning from Unplanned Demonstrations, **Yasser Mohammad** and Toyoaki Nishida, International Journal of Social Robotics, vol. 4, pp 369-382,
- 25. **[2010]** Using Physiological Signals to Detect Natural Interactive Behavior, **Yasser Mohammad** and Toyoaki Nishida, Applied Intelligence, vol. 13, no. 1, pp. 79-92,
- 26. **[2010]** Controlling Gaze with an Embodied Interactive Control Architecture, **Yasser Mohammad** and Toyoaki Nishida, International Journal of Applied Intelligence, Vol. 32, No. 2, pp 148-163,
- 27. **[2009]** Constrained Motif Discovery in Time Series, **Yasser Mohammad** and Toyoaki Nishida, New Generation Computing Journal, vol. 27, pp. 319-346,
- 28. **[2009]** Interaction Between Untrained Users and a Miniature Robot in a Collaborative Navigation Controlled Experiment, **Yasser Mohammad** and Toyoaki Nishida, International Journal of Information Acquisition, World Scientific Publishing Company. Vol. 5, No. 4, pp 291–308, April
- 29. [2009] Towards Combining Autonomy with Interaction for Social Robots, Yasser Mohammad and Toyoaki Nishida, AI & Society, vol. 24, no. 1, pp 35-53,
- 30. **[2009]** Interactive Perception for amplification of intended behavior in complex noisy environment, **Yasser Mohammad** and Toyoaki Nishida, AI & Society Journal, vol. 23, no. 2, pp 167-186, March
- 31. **[2006]** Towards Robots as an Embodied Knowledge Medium, Toyoaki Nishida, Kazunori Terada, Takashi Tajima, Makoto Hatakeyama, Yoshiyasu Ogasawara, Xu Yong, **Yasser Mohammad**, Kateryna Tarasenko, Taku Ohya, and Tatsuya Hiramatsu, IEICE Trans. On Inf. & Sys., vol. E89-D, No 6, pp. 1768-1780, June

International Conferences

- 32. [2023] Evaluating Automated Negotiations, Yasser Mohammad, IEEE International Conference on Agents (ICA), December 2023, Kyoto, Japan [Best Paper Award].
- 33. [2023] Generalized Bargaining Protocols: Mechanism Design for Automated Negotiations, Yasser Mohammad, Australasian Joint Conference on Artificial Intelligence, November 2023, Brisbane, Australia.
- 34. **[2022]** End-to-End Mobile Robot Navigation using a Residual Deep Reinforcement Learning in Dynamic Human Environments, Abdullah Ahmed, **Yasser Mohammad**, Victor Parque, Haitham El-Hussieny and Sabah Ahmed, 18th IEEE/ASME International Conference on Mechatronic, Embedded Systems and Applications (MESA), November 2022, Taipei, Taiwan
- 35. **[2022]** Transfer Learning based Adaptive Automated Negotiating Agent Framework, Ayan Sengupta, **Yasser Mohammad**, Shinji Nakadai, The 31st International Joint Conference on Artificial Intelligence (IJCAI 2022), pp. 1163–1172, July 2022, Vienna, Austria
- 36. [2022] Concurrent Negotiations with Local Utility Functions, Yasser Mohammad, Shinji Nakadai, The 21st International Conference on Autonomous Agents and Multiagent Systems (AAMAS), London, UK, May.
- 37. **[2022]** Applying Generative Adversarial Networks and Vision Transformers in Speech Emotion Recognition, Panikos Heracleous, Satoru Fukayama, Wei Yang, Jun Ogata, **Yasser Mohammad**, 24th International Conference on Human-Computer Interaction (HCI 2022 International), June 26 July 1st, Cothernbury, Sweden.
- 38. **[2021]** An Autonomous Negotiating Agent Framework with Reinforcement Learning Based Strategies and Adaptive Strategy Switching Mechanism, Ayan Sengupta, **Yasser Mohammad**, Shinji Nakadai, The 20th International Conference on Autonomous Agents and Multiagent Systems (AAMAS), London, UK, May.
- 39. [2021] Speech Emotion Recognition Using Combined Multiple Pairwise Classifiers, Panikos Heracleous, Yasser Mohammad, Akio Yoneyama, 22nd International Conference On Human-Computer Interaction, Copenhagen, July.
- 40. [2020] Optimal Deterministic Time-dependent Policy in Automated Negotiation, Yasser Mohammad, The 23rd International Conference on Principles and Practice of Multi-Agent Systems (PRIMA), Nagoya, Japan, November [Best Paper Runner].
- 41. **[2020]** NegMAS: A platform for Automated Negotiations, **Yasser Mohammad**, Shinji Nakadai, and Amy Greenwald, The 23rd International Conference on Principles and Practice of Multi-Agent Systems (PRIMA), Nagoya, Japan, November.
- 42. [2020] Integrating Language and Emotion Features for Multilingual Speech Emotion Recognition, Panikos Heracleous, Yasser Mohammad, Akio Yoneyama, 22nd International Conference On Human-Computer Interaction, Copenhagen, Denmark, July.
- 43. **[2020]** An Empirical Study On Feature Extraction In DNN-Based Speech Emotion Recognition, Panikos Heracleous, Kohichi Takai, Yanan Wang, Keiju Yasuda, Akio Yoneyama, **Yasser Mohammad**, 22nd International Conference On Human-Computer Interaction, Copenhagen, Denmark, July.
- 44. [2019] Empirical Mechanism Design under Uncertainty, Enrique Areyan Viqueira, Amy Greenwald, Yasser Mohammad, Uncertainty in AI.
- 45. **[2019]** Research Challenges for the Automated Negotiating Agents Competition (ANAC), Reyhan Aydoğan, Tim Baarslag, Katsuhide Fujita, Johnathan Mell, Jonathan Gratch, Dave De Jonge, **Yasser Mohammad**, Shinji Nakadai, Satoshi Morinaga, Hirotaka Osawa, Claus Aranha and Catholijn Jonker, EUMAS AT 2020
- 46. **[2019]** Optimal Value of Information Based Elicitation During Negotiation, **Yasser Mohammad** and Shinji Nakadai, AAMAS, Montreal, Canada pp. 242-250
- 47. **[2019]** Multidimensional Permutation Entropy for Constrained Motif Discovery, Yomna Rayan, **Yasser F. O. Mohammad**, Samia A. Ali, ACIIDS 231-243

- 48. **[2019]** Speech emotion recognition using spontaneous children's corpus, Heracleous P., **Mohammad Y.**, Yasuda K., Yoneyama A., CICLing 2019, La Rochelle, France, April.
- 49. **[2018]** Comparative Study on Spoken Language Identification Based on Deep Learning, Heracleous, P., Takai, K., Yasuda, K., **Mohammad**, Y., and Yoneyama, A., In 2018 26th European Signal Processing Conference (EUSIPCO) (pp. 2265-2269). IFFF.
- 50. **[2018]** Deep feature learning and selection for activity recognition, (, April), **Y. Mohammad**, K. Matsumoto, K. Hoashi, In Proceedings of the 33rd Annual ACM Symposium on Applied Computing (pp. 930-939). ACM.
- 51. [2018] FastVOI: Ecient Utility Elicitation During Negotiations, Yasser Mohammad and Shinji Nakadai, PRIMA, October 2018, Tokyo, Japan
- 52. **[2018]** Utility Elicitation During Negotiation with Practical Elicitation Strategies, **Yasser Mohammad** and Shinji Nakadai, IEEE International Conference on Systems, Man, and Cybernetics (IEEE SCM), Miyazaki, Japan, October 7-10.
- 53. **[2018]** Deep feature learning and selection for activity recognition, **Yasser Mohammad**, Kazunori Matsumoto, and Keiichiro Hoashi, In Proceedings of the 33rd Annual ACM Symposium on Applied Computing (SAC '18), pp. 930-939, New York, NY, USA
- 54. **[2018]** Comparative Study on Spoken Language Identification Based on Deep Learning, Panikos Heracleous, Kohichi Takai and Keiji Yasuda, **Yasser Mohammad**, Akio Yoneyama, 26th European Signal Processing Conference (EUSIPCO), Rome, Italy, September 3-7, 2018
- 55. **[2018]** I-vectors and Deep Convolutional Neural Networks for Language Identification in Clean and Reverberant Environments, Panikos Heracleous, **Yasser Mohammad**, Akio Yoneyama, International Conference on Computational Linguistics and Intelligent Text Processing (CICLing), March 18 to 24, Hanoi, Vietnam
- 56. [2018] Spoken Language Identification Based on I-vectors and Conditional Random Fields, Panikos Heracleous, Yasser Mohammad, Akio Yoneyama, 14th International Wireless Communications and Mobile Computing Conference IWCMC, Limassol, Cyprus, June 25-29, 2018
- 57. **[2017]** A dataset for activity recognition in an unmodified kitchen using smart-watch accelerometers, **Yasser Mohammad**, Kazunori Matsumoto, and Keiichiro Hoashi, In Proceedings of the 16th International Conference on Mobile and Ubiquitous Multimedia (MUM '17). ACM, New York, NY, USA, 63-68, .
- 58. **[2017]** COLD: A ROS Package for Continuous Learning from Demonstration: teaching a robot to write, Mostafa Hussein, **Yasser Mohammad**, Samia Ali, Toyoaki Nishida, IEEE International Conference on Mechatronics and Automation ICMA, pp. 651-657, Takamatsu, Japan,
- 59. **[2016]** MC2: An integrated toolbox for change, causality, and motif discovery, **Yasser Mohammad** and Toyoaki Nishida, IEA/AIE, August, pp. 128-141, Morioka, Japan
- 60. **[2015]** Learning From Demonstration Using Variational Bayesian Inference, Mostafa Hussein, **Yasser Mohammad**, and Samia A. Ali, First International Conference on Industrial, Engineering & Other Applications of Applied Intelligent Systems IEA/AIE, pp. 371-381, Seool, Korea,
- 61. **[2015]** Synthetic Evidential Study as Augmented Collective Thought Process Preliminary Report, Toyoaki Nishida, Masakazu Abe, Takashi Ookaki, Divesh Lala, Sutasinee Thovuttikol, Hengjie Song, **Yasser Mohammad**, Christian Nitschke, Yoshimasa Ohmoto, Atsushi Nakazawa, Takaaki Shochi, Jean-Luc Rouas, Aurelie Bugeau, Fabien Lotte, Zuheng Ming, Geoffrey Letournel, Marine Guerry and Dominique Fourer, 7th Asian Conference on Intelligent Information and Database systems (ACIIDS), pp. 13-22, Indonesia,
- 62. **[2015]** Simple Incremental GMM Modeling using Multidimensional Piecewise Linear Segmentation for Learning from Demonstration, **Yasser Mohammad** and Toyoaki Nishida, 3rd International Conference on Industrial Application Engineering (ICIAE), Japan, **(Best Presentation Award)**
- 63. [2014] Robust Learning from Demonstrations using Multidimensional SAX, Yasser Mohammad and Toyoaki Nishida, International Conference on Control, Automation, and Systems, pp. 64-71, Korea (September 22-26, 2014), (Outstanding Paper Award)
- 64. **[2014]** Scale Invariant Molti-length Motif Discovery, **Yasser Mohammad** and Toyoaki Nishida, The 27th International Conference on Industrial, Engineering and Other Applications of Applied Intelligent Systems, pp. 417-426, Kaohsiung, Taiwan.
- 65. **[2014]** Exact Motif Discovery of Length-Range Motifs, **Yasser Mohammad**, Toyoaki Nishida, and Atsushi Nakazawa, The 6th Asian Conference on Intelligent Information and Database Systems (ACIIDS), pp. 23-32, Bangkok, Thailand
- 66. **[2014]** Why shoold we imitate robots?, **Yasser Mohammad** and Toyoaki Nishida, 13th International Conference on Autonomous Agents and Moltiagents Systems (AAMAS), pp. 1499-1500, [extended abstract]
- 67. **[2014]** A joint activity theory analysis of body interactions in moltiplayer virtual basketball, Divesh Lala, **Yasser Mohammad**, Toyoaki Nishida, Proceedings of the 28th International BCS Human Computer Interaction Conference on HCI, pp. 62-71, .
- 68. **[2014]** Detection of Hidden Laughter for Human-agent Interaction, Shiho Tatsumi, **Yasser Mohammad**, Yoshimasa Ohmoto, Toyoaki Nishida, Knowledge-Based and Intelligent Information & Engineering Systems 18th Annual Conference, pp. 1053-1062 Gdynia, Poland, September 15-17,
- 69. **[2013]** Arm Pose Copying for Humanoid Robots, **Yasser Mohammad**, Toyoaki Nishida, and Atsushi Nakazawa, IEEE International Conference on Robotics and Biomimetics, ROBIO, Shenzhen, China, 2013
- 70. **[2013]** Unsupervised gesture recognition system for learning manipolative actions in virtual basketball, Divesh Lala, Toyoaki Nishida, and **Yasser Mohammad**, International Conference on Human-Agent Interaction iHAI, pp. II-1-3,
- 71. **[2013]** Tackling the Correspondence Problem: Exact solution for a Humanoid Upper Body?, **Yasser Mohammad**, Toyoaki Nishida, International Conference on Active Media Technology , pp. 84-95, Maebashi, Japan, 2013
- 72. **[2013]** Approximately Recurring Motif Discovery Using Shift Density Estimation, **Yasser Mohammad**, Toyoaki Nishida, International Conference on Industrial, Engineering, Other Applications of Applied Intelligent Systems IEA/AIE, pp. 141-150, 2013
- 73. **[2013]** Learning Sensorimotor Concepts Without Reinforcement, **Yasser Mohammad**, Toyoaki Nishida, AAAI Summer Symposium on Life Long Machine Learning, Stanford, USA
- 74. [2012] Unsupervised Discovery of Basic Human Actions from Activity Recording Datasets, **Yasser Mohammad**, Toyoaki Nishida, IEEE/SICE International Symposium on System Integration, pp. 402-409, Kyushu, Japan,
- 75. **[2012]** Self-Initiated Imitation Learning Discovering what to imitate, **Yasser Mohammad**, Toyoaki Nishida, International Conference on Control, Automation and Systems, pp. 726-732, Jeju, South Korea, 2012
- 76. [2012] G-SteX: Greedy Stem Extension for Free-Length Constrained Motif Discovery, Yasser Mohammad, Toyoaki Nishida, International Conference on Industrial, Engineering, Other Applications of Applied Intelligent Systems IEA/AI, pp. 417-426,

- 77. **[2012]** Common Sensorimotor Representation for Self-Initiated Imitation Learning, **Yasser Mohammad**, Toyoaki Nishida, International Conference on Industrial, Engineering, Other Applications of Applied Intelligent Systems IEA/AIE, pp. 381-390,
- 78. **[2012]** CPMD: A Matlab Toolbox for Change Point and Constrained Motif Discovery, **Yasser Mohammad**, Toyoaki Nishida, International Conference on Industrial, Engineering, Other Applications of Applied Intelligent Systems IEA/AIE, pp. 114-123,
- 79. **[2011]** Discovering Causal Change Relationships Between Processes in Complex Systems, **Yasser Mohammad**, Toyoaki Nishida, IEEE/SICE International Symposium on System Integratio, pp. 12-17,
- 80. **[2011]** On Comparing SSA-based Change Point Discovery Algorithms, **Yasser Mohammad**, Toyoaki Nishida, IEEE/SICE International Symposium on System Integration, pp. 938-945, **(Best Paper Award)**
- 81. **[2010]** Incremental Gesture Discovery for Interactive Robots, **Yasser Mohammad**, Toyoaki Nishida, IEEE International Conference on Robotics and Biomimetics ROBIO, pp. 185-189, Tianjin, China,
- 82. **[2010]** Learning Interaction Protocols using Augmented Bayesian Networks Applied to Guided Navigation, **Yasser Mohammad**, Toyoaki Nishida, Taipei, Taiwan, IEEE/RSJ International Conference on Intelligent Robots and Systems IROS, pp. 4119-4126.
- 83. **[2010]** Learning Spontaneous Nonverbal Behavior using a Three Layers Hierarchy, **Yasser Mohammad**, Toyoaki Nishida, 10th WSEAS International Conference on Applied Computer Science, pp. 430-435, Iwate, Japan, October
- 84. **[2010]** Down-Up-Down Behavior Generation for Interactive Robots, **Yasser Mohammad**, Toyoaki Nishida, The Twenty Third International Conference on Industrial, Engineering & Other Applications of Applied Intelligent Systems (IEA/AIE), pp. 92-101, Spain, June 2010
- 85. **[2009]** Unsupervised Simoltaneous Learning of Gestures, Actions and their Associations for Human-Robot Interaction, **Yasser Mohammad**, Toyoaki Nishida, and Okada Shogo, IEEE/RSJ International Conference on Intelligent Robots and Systems IROS, pp. 2537-2544, October 11 to 15, MO, USA, 2009
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