Francesco Semeraro

Department of Computer Science **Type of address: Visiting address.** Room 1.19, Kilburn Building Oxford Rd M13 9PL

Manchester United Kingdom

Email: francesco.semeraro@manchester.ac.uk

Mobile: +44 7753 958455



Research interests

Human-Robot Collaboration, Human-Robot Interaction, Robotics, Deep learning, Reinforcement learning, Affective Computing

Qualifications

Master of Science, Robotics and Computation, University College London (UCL)

15 Sept 2018 → 2 Sept 2019 Award Date: 13 Nov 2020

Master of Science, Bionics Engineering, Scuola Superiore Sant'Anna The BioRobotics Institute

21 Sept 2015 → 3 May 2018 Award Date: 3 May 2018

Bachelor of Science, Electronic Engineering, Universita di Pisa

24 Sept 2012 → 22 Sept 2015 Award Date: 24 Sept 2015

Employment

Doctor of Philosophy, PhD Computer Science (48)

Department of Computer Science The University of Manchester 3 Aug 2020 → present

Robotics Engineer

Fieldwork Robotics Ltd.
United Kingdom
20 Jan 2020 → 18 Sept 2020

Automation Engineer

Aidrivers Ltd.
United Kingdom
15 Oct 2018 → 8 Nov 2019

Researcher

Scuola Superiore Sant'Anna The BioRobotics Institute Pisa, Italy
1 Jun 2018 → 30 Sept 2018

Prizes

"Vincenzo Tagliasco" Prize

Semeraro, Francesco (Recipient), 12 Sept 2018

1st Prize as Young Researcher

Semeraro, Francesco (Recipient), 2 Jul 2018

1st Prize in Engineers in Business Competition

Varasteh Kia, Golshid (Recipient), Semeraro, Francesco (Recipient), Podder, Shirsendu (Recipient) & Baron, Leone (Recipient), Jun 2019

RPL Summer School 2022

Semeraro, Francesco (Recipient), 19 Apr 2022

UKRI EPSRC/BAE Systems plc. DTP CASE Conversion Award "Human-robot collaboration for flexible manufacturing" Semeraro, Francesco (Recipient), 1 Jun 2020

Research outputs

Towards Multi-User Activity Recognition through Facilitated Training Data and Deep Learning for Human-Robot Collaboration Applications

Semeraro, F., Carberry, J. & Cangelosi, A., 2 Aug 2023, International Joint Conference on Neural Networks (IJCNN 2023).

Simpler rather than Challenging: Design of Non-Dyadic Human-Robot Collaboration to Mediate Human-Human Concurrent Tasks

Semeraro, F., Carberry, J. & Cangelosi, A., 30 May 2023, 22nd International Conference on Autonomous Agents and Multiagent Systems (AAMAS 2023), London. Association for Computing Machinery

Unsupervised emotional state classification through physiological parameters for social robotics applications Fiorini, L., Mancioppi, G., Semeraro, F., Fujita, H. & Cavallo, F., 29 Feb 2020, In: Knowledge-Based Systems. 190, 105217.

Mood classification through physiological parameters

Cavallo, F., Semeraro, F., Mancioppi, G., Betti, S. & Fiorini, L., 7 Dec 2019, In: Journal of Ambient Intelligence and Humanized Computing. p. 1-14

Physiological Wireless Sensor Network for the Detection of Human Moods to Enhance Human-Robot Interaction Semeraro, F., Fiorini, L., Betti, S., Mancioppi, G., Santarelli, L. & Cavallo, F., 2 Jul 2019, *Lecture Notes in Electrical Engineering*. p. 361-376

Physiological sensor system for the detection of human moods towards internet of robotics thing applications Fiorini, L., Semeraro, F., Mancioppi, G., Betti, S., Santarelli, L. & Cavallo, F., 17 Sept 2018, *Frontiers in Artificial Intelligence and Applications*. p. 967-980

Emotion Modelling for Social Robotics Applications: A Review

Cavallo, F., Semeraro, F., Fiorini, L., Magyar, G., Sincak, P. & Dario, P., 23 Mar 2018, In: Journal of Bionic Engineering. 15, 2, p. 185-203 18 p., 1.