

Dichiarazioni sostitutive di certificazione e dell'atto di notorietà ai sensi degli artt. 46 e 47 del D.P.R. 28 dicembre 2000 n. 445 e s.m.i.

Il sottoscritto PIOGGIA GIOVANNI

visto il D.P.R. 28 dicembre 2000, n. 445 e successive modifiche ed integrazioni; vista la Legge 12 novembre 2011, n. 183; consapevole che, ai sensi dell'art.76 del DPR 445/2000, le dichiarazioni mendaci, la falsità negli atti e l'uso di atti falsi sono punite ai sensi del Codice penale e delle leggi speciali vigenti in materia, dichiara sotto la propria responsabilità che quanto dichiarato nel seguente curriculum attestante il possesso dei titoli di studio e professionali, nonché degli ulteriori requisiti richiesti ai fini dell'ammissione alla procedura, corrisponde a verità.

Curriculum didattico scientifico e professionale

Dati personali

Giovanni Pioggia

Posizione

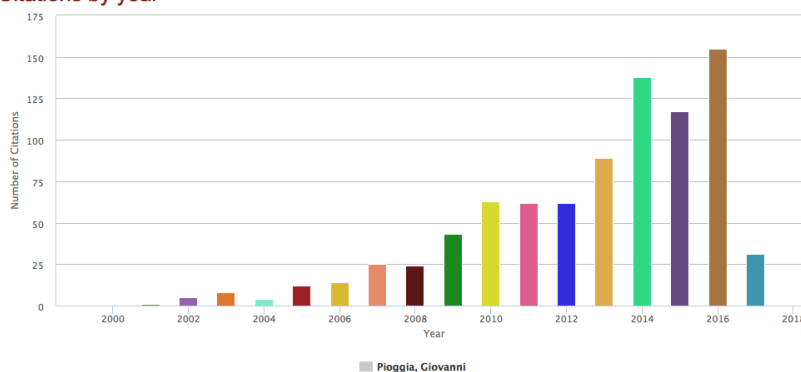
Ricercatore del Consiglio Nazionale delle Ricerche (CNR)
Istituto di Scienze Applicate e Sistemi Intelligenti "Eduardo Caianello"
Responsabile della sede di Messina

h-index

h=20 (fonte Google Scholar)
h=15 (fonte Scopus)
h=13 (ISI_WOS)

Citazioni per anno
(fonte Scopus)

Citations by year



Esperienze lavorative	E' stato responsabile del modulo CNR: Pervasive healthcare and biomedical engineering (ME.P01.015.002) della Commessa: imaging cardiovascolare, polmonare e nuove tecnologie. Dal 1998 al 2009 ha lavorato al Centro Interdipartimentale di Ricerca "E. Piaggio" della Facoltà di Ingegneria dell'Università di Pisa in collaborazione con l'Istituto di Fisiologia Clinica del CNR e con l'IRCCS Fondazione Stella Maris. E' coinvolto in numerosi progetti nazionali ed internazionali. E' stato <i>visiting researcher</i> al NDEAA Lab del Jet Propulsion Laboratory della NASA (Pasadena, USA) ed all'Università di Valladolid (Spagna).
Istruzione e formazione	Luglio 1990: Maturità Scientifica conseguita presso il Liceo Scientifico Statale "G. Seguenza" di Messina. 11 Dicembre 1997: Laurea in Ingegneria Elettronica orientamento Bioingegneria conseguita presso l'Università degli Studi di Pisa. Votazione 105/110. 29 Gennaio 2002: Dottorato di Ricerca in Robotica XIV ciclo, sede amministrativa: Università di Genova, sede consorziata: Università di Pisa.
Abilitazioni professionali	1998: abilitazione alla Professione di Ingegnere conseguita presso l'Università degli Studi di Pisa
Stage formativi all'estero	Periodi fra il 1998 ed il 2001: Università di Valladolid (Spagna). 1 Febbraio 2001 - 09 Maggio 2001: Jet Propulsion Laboratory (NASA, USA) del California Institute of Technology (CALTECH) e della National Aeronautics and Space Administration (NASA).
Conoscenza di lingue straniere	Inglese, ottimo parlato e scritto, buona conoscenza dell'inglese tecnico. Periodo di lavoro negli Stati Uniti con conseguente miglioramento della conoscenza della lingua. Spagnolo, buono parlato e scritto. Periodo di lavoro in Spagna con conseguente miglioramento della conoscenza della lingua.
Attività di ricerca	Le mie attività di ricerca si focalizzano sull'esplorazione scientifica e tecnologica nell'ambito dei sistemi intelligenti per la salute, della neuroingegneria socio-cognitiva e della <i>social robotics</i> per mezzo delle metodologie proprie della bioingegneria, dell'informatica, delle neuroscienze e delle scienze cognitive, con lo scopo di sviluppare strumenti innovativi, modelli e nuovi approcci per indagare come il cervello processa le informazioni sociali, emotive, motorie e cognitive, nonché il linguaggio ed il comportamento. Gli studi sperimentali delle mie ricerche hanno lo scopo di migliorare le conoscenze sul substrato fisiologico e comportamentale relativo ai disturbi del neurosviluppo e ai deficit neurosensoriali, neuromotori, socio-emotivi e cognitivi. In particolare, mi occupo di esplorare l'uso delle tecnologie robotiche per la valutazione del processing socio-emotivo e per la riabilitazione, basata sull'interazione uomo-macchina, sull'imitazione e sull'uso pragmatico della reciprocità sociale ed emotiva con lo scopo di aiutare le persone con deficit socio-emotivi ad imparare ad identificare, interpretare ed utilizzare le informazioni emotive, estendendo le loro capacità di adattamento

al contesto sociale. Lo studio del sistema di riconoscimento e regolazione delle emozioni, dell'intersoggettività e della mente sociale, nonché della reciprocità sociale e dell'apprendimento per imitazione, ha l'obiettivo di fornire soluzioni tecnologiche per migliorare le tecniche di valutazione, di abilitazione e di riabilitazione. Mi occupo di analisi neuromotoria e neurosensoriale, di bioingegneria dello sviluppo affettivo ed emotivo e delle interazioni sociali, nonché di sistemi mobili di valutazione remota e teleriabilitazione. Al fine di indagare sul legame fra misure comportamentali o neuro-psicologiche e scoperte neurofunzionali, mi occupo di allestire set-up sperimentali che prevedono misure di segnali fisiologici e comportamentali quali ECG, qEEG, risposta elettrodermica, temperatura periferica, cinematica e dinamica degli arti, postura, movimenti oculari e mira visiva attraverso nuovi sistemi e sensori non invasivi ed indossabili, segnali audio/video e social robots. Sviluppo metodologie scientifiche e tecnologie per la promozione di un approccio di "continuità della cura". Mi occupo della realizzazione di sensori biomedici e micro-sistemi ergonomici portatili wireless non intrusivi ed indossabili, di modelli di sistemi fisiologici, di elaborazione intelligente del segnale e di tecniche di soft computing. Combino il monitoraggio multi-parametrico e remoto dello stato di salute con il contesto sociale ed ambientale del paziente e con le evidenze cliniche sia per cercare di migliorare le capacità di predire, diagnosticare, trattare o gestire una patologia in modo efficiente che per realizzare sistemi di supporto alla decisione clinica. Le mie attività scientifiche, didattiche e di trasferimento tecnologico sono direttamente o indirettamente connesse con l'attività clinica al fine di individuare, definire e sviluppare progetti scientifici innovativi di ricerca di base e trasferimento tecnologico nei settori della bioingegneria applicata alle neuroscienze ed ai disordini neurali in età evolutiva, allo sviluppo di metodologie di pervasive healthcare, a dispositivi diagnostici, trattamenti e salute pubblica, ed allo studio della fisiologia e patofisiologia, con particolare attenzione all'applicazione clinica di innovazioni tecnologiche diagnostiche e terapeutiche nei seguenti settori di interesse: disturbi dello spettro autistico; disturbi specifici dell'apprendimento; malattia cardiovascolare e polmonare; disordini neurologici e psichiatrici; disturbi del sistema sensoriale; disordini comportamentali, cognitivi e neurofisiologici.

Pubblicazioni – Fonte: Scopus

1. Tonacci, A. and Billeci, L. and Tartarisco, G. and Ruta, L. and Muratori, F. and Pioggia, G. and Gangemi, S., Olfaction in autism spectrum disorders: A systematic review, *Review, Child Neuropsychology*, 23, 1, 1-25, 2017
2. Billeci, L. and Tonacci, A. and Tartarisco, G. and Narzisi, A. and Palma, S.D. and Corda, D. and Baldus, G. and Cruciani, F. and Anzalone, S.M. and Calderoni, S. and Pioggia, G. and Muratori, F., An integrated approach for the monitoring of brain and autonomic response of children with Autism Spectrum Disorders during treatment by wearable technologies, *Article, Frontiers in Neuroscience*, 10, JUN, , 2016
3. Fabio, R.A. and Billeci, L. and Crifaci, G. and Troise, E. and Tortorella, G. and Pioggia, G., Cognitive training modifies frequency EEG bands and neuropsychological measures in Rett syndrome, *Article, Research in Developmental Disabilities*, 53-54, , 73-85, 2016
4. Di Giorgio, E. and Frasnelli, E. and Rosa Salva, O. and Maria Luisa, S. and Puopolo, M. and Tosoni, D. and Simion, F. and Vallortigara, G. and Apicella, F. and Gagliano, A. and Guzzetta, A. and Molteni, M. and Persico, A. and Pioggia, G. and Valeri, G. and Vicari, S., Difference in Visual Social Predispositions between Newborns at Low-and High-risk for Autism, *Article, Scientific Reports*, 6, , , 2016
5. Bono, V. and Narzisi, A. and Jouen, A.-L. and Tilmont, E. and Hommel, S. and Jamal, W. and Xavier, J. and Billeci, L. and Maharatna, K. and Wald, M. and Chetouani, M. and Cohen, D. and Muratori, F. and Bonfiglio, S. and Apicella, F. and Sicca, F. and Pioggia, G. and Cruciani, F. and Paggetti, C. and Giuliano, A. and Francisa, M. and Das, S. and Galway, L. and Donnelly, M., GOLIAH: A gaming platform for home-based intervention in autism - principles and design, *Article, Frontiers in Psychiatry*, 7, APR, , 2016
6. Billeci, L. and Tonacci, A. and Tartarisco, G. and Ruta, L. and Pioggia, G. and Gangemi, S., Reply to Fluegge: Association Between Atopic Dermatitis and Autism Spectrum Disorders: A Systematic Review, *Letter, American Journal of Clinical Dermatology*, 17, 2, 189-190, 2016
7. Tonacci, A. and Billeci, L. and Tartarisco, G. and Mastorci, F. and Borghini, A. and Mrakic-Sposta, S. and Moretti, S. and Vezzoli, A. and Faraguna, U. and Pioggia, G. and Guido, G. and Pratali, L., A novel application for cognitive evaluation in mountain ultramarathons: Olfactory assessment, *Article, Wilderness and Environmental Medicine*, 27, 1, 131-135, 2016
8. Leo, M. and Coco, M.D. and Carcagni, P. and Distante, C. and Bernava, M. and Pioggia, G. and Palestra, G., Automatic Emotion Recognition in Robot-Children Interaction for ASD Treatment, *Conference Paper, Proceedings of the IEEE International Conference on Computer Vision, 2016-February*, , 537-545, 2016
9. Pennisi, P. and Tonacci, A. and Tartarisco, G. and Billeci, L. and Ruta, L. and Gangemi, S. and Pioggia, G., Autism and social robotics: A systematic review, *Review, Autism Research*, 9, 2, 165-183, 2016
10. Cazzato, D. and Adamo, F. and Palestra, G. and Crifaci, G. and Pennisi, P. and Pioggia, G. and Ruta, L. and Leo, M. and Distante, C., Non-intrusive and calibration free visual exploration analysis in children with autism spectrum disorder, *Conference Paper, Computational Vision and Medical Image Processing V - Proceedings of 5th Eccomas Thematic Conference on Computational Vision and Medical Image Processing, VipIMAGE 2015*, , , 201-208, 2016
11. Billeci, L. and Narzisi, A. and Campatelli, G. and Crifaci, G. and Calderoni, S. and Gagliano, A. and Calzone, C. and Colombi, C. and Pioggia, G. and Muratori, F. and Raso, R. and Ruta, L. and Rossi, I. and Ballarani, A. and Fulceri, F. and Darini, A. and

- Maroscia, E. and Lattarulo, C. and Tortorella, G. and Siracusano, R. and Comminiello, V., Disentangling the initiation from the response in joint attention: An eye-tracking study in toddlers with autism spectrum disorders, Article, *Translational Psychiatry*, 6, 5, , 2016
12. Gargani, L. and Raso, R. and Tartarisco, G. and Matucci Cerinic, M. and Pioggia, G. and Picano, E., Reply: Objectively Measuring the Ghost in the Machine: B-Lines as Uncertain Measures on Which to Base Clinical Assessment, Letter, *JACC: Cardiovascular Imaging*, 8, 12, 1470, 2015
 13. Varanini, M. and Tartarisco, G. and Balocchi, R. and Macerata, A. and Pioggia, G. and Billeci, L., A new method for QRS complex detection in multichannel ECG: Application to self-monitoring of fetal health, Article in Press, *Computers in Biology and Medicine*, , , , 2015
 14. Di Palma, S. and Tonacci, A. and Narzisi, A. and Domenici, C. and Pioggia, G. and Muratori, F. and Billeci, L., Monitoring of autonomic response to sociocognitive tasks during treatment in children with Autism Spectrum Disorders by wearable technologies: A feasibility study, Article in Press, *Computers in Biology and Medicine*, , , , 2015
 15. Billeci, L. and Tonacci, A. and Tartarisco, G. and Ruta, L. and Pioggia, G. and Gangemi, S., Association Between Atopic Dermatitis and Autism Spectrum Disorders: A Systematic Review, Review, *American Journal of Clinical Dermatology*, 16, 5, 371-388, 2015
 16. Raso, R. and Tartarisco, G. and Matucci Cerinic, M. and Pioggia, G. and Picano, E. and Gargani, L., A soft computing-based B-line analysis for objective classification of severity of pulmonary edema and fibrosis, Letter, *JACC: Cardiovascular Imaging*, 8, 4, 495-496, 2015
 17. Tonacci, A. and Chilosi, A.M. and Pioggia, G. and Morales, M.A. and Cioni, G., Effect of olfactory stimulation in agenesis of the corpus callosum: A case report, Article, *Brain Impairment*, 15, 3, 216-222, 2015
 18. Tonacci, A. and Corda, D. and Tartarisco, G. and Pioggia, G. and Domenici, C., A Smart Sensor System for Detecting Hydrocarbon Volatile Organic Compounds in Sea Water, Article, *Clean - Soil, Air, Water*, 43, 1, 147-152, 2015
 19. Gangemi, S. and Casciaro, M. and Trapani, G. and Quartuccio, S. and Navarra, M. and Pioggia, G. and Imbalzano, E., Association between HMGB1 and COPD: A systematic review, Review, *Mediators of Inflammation*, 2015, , , 2015
 20. Billeci, L. and Tartarisco, G. and Brunori, E. and Crifaci, G. and Scardigli, S. and Balocchi, R. and Pioggia, G. and Maestro, S. and Morales, M.A., The role of wearable sensors and wireless technologies for the assessment of heart rate variability in anorexia nervosa, Article, *Eating and Weight Disorders*, 20, 1, 23-31, 2015
 21. Tonacci, A. and Lacava, G. and Lippa, M.A. and Lupi, L. and Pioggia, G. and Gualdesi, L. and Domenici, C. and Cocco, M., A smart multimodal innovative model for marine environmental monitoring, Conference Paper, *Proceedings - 29th European Conference on Modelling and Simulation, ECMS 2015*, , , 455-461, 2015
 22. Tartarisco, G. and Carbonaro, N. and Tonacci, A. and Bernava, G.M. and Arnao, A. and Crifaci, G. and Cipresso, P. and Riva, G. and Gaggioli, A. and De Rossi, D. and Tognetti, A. and Pioggia, G., Neuro-fuzzy physiological computing to assess stress levels in virtual reality therapy, Article, *Interacting with Computers*, 27, 5, 521-533, 2015
 23. Pifferi, M. and Bush, A. and Michelucci, A. and Di Cicco, M. and Piras, M. and Caramella, D. and Mazzei, F. and Neri, M. and Pioggia, G. and Tartarisco, G. and Saggese, G. and Simi, P. and Boner, A.L., Mannose-binding lectin 2 gene

- polymorphism and lung damage in primary ciliary dyskinesia, Article, *Pediatric Pulmonology*, 50, 2, 179-186, 2015
24. Varanini, M. and Tartarisco, G. and Billeci, L. and Macerata, A. and Pioggia, G. and Balocchi, R., An efficient unsupervised fetal QRS complex detection from abdominal maternal ECG, Article, *Physiological Measurement*, 35, 8, 1607-1619, 2014
 25. Gaggioli, A. and Cipresso, P. and Serino, S. and Pioggia, G. and Tartarisco, G. and Baldus, G. and Corda, D. and Ferro, M. and Carbonaro, N. and Tognetti, A. and De Rossi, D. and Giakoumis, D. and Tzovaras, D. and Riera, A. and Riva, G., A decision support system for real-time stress detection during virtual reality exposure, Conference Paper, *Studies in Health Technology and Informatics*, 196, , 114-120, 2014
 26. Tonacci, A. and Corda, D. and Tartarisco, G. and Pioggia, G. and Domenici, C., A smart system to detect volatile organic compounds produced by hydrocarbons on seawater, Conference Paper, *Lecture Notes in Electrical Engineering*, 268 LNEE, , 99-102, 2014
 27. Boucenna, S. and Narzisi, A. and Tilmont, E. and Muratori, F. and Pioggia, G. and Cohen, D. and Chetouani, M., Interactive Technologies for Autistic Children: A Review, Article, *Cognitive Computation*, 6, 4, 722-740, 2014
 28. Carcagnì, P. and Cazzato, D. and Del Coco, M. and Leo, M. and Pioggia, G. and Distante, C., Real-time gender based behavior system for human-robot interaction, Conference Paper, *Lecture Notes in Computer Science (including subseries Lecture Notes in Artificial Intelligence and Lecture Notes in Bioinformatics)*, 8755, , 74-83, 2014
 29. Pioggia, G. and Tonacci, A. and Tartarisco, G. and Billeci, L. and Muratori, F. and Ruta, L. and Gangemi, S., Autism and lack of D3 vitamin: A systematic review, Article, *Research in Autism Spectrum Disorders*, 8, 12, 1685-1698, 2014
 30. Billeci, L. and Guerriero, L. and L'Abbate, A. and Pioggia, G. and Tartarisco, G. and Trivella, M.G., Telemedicine and wireless devices in heart failure [Telemedicina e sistemi wireless nello scompenso cardiaco], Article, *Recenti Progressi in Medicina*, 105, 5, 210-216, 2014
 31. Gaggioli, A. and Pallavicini, F. and Morganti, L. and Serino, S. and Scaratti, C. and Briguglio, M. and Crifaci, G. and Vetrano, N. and Giulintano, A. and Bernava, G. and Tartarisco, G. and Pioggia, G. and Raspelli, S. and Cipresso, P. and Vigna, C. and Grassi, A. and Baruffi, M. and Wiederhold, B. and Riva, G., Experiential virtual scenarios with real-time monitoring (interreality) for the management of psychological stress: A block randomized controlled trial, Article, *Journal of Medical Internet Research*, 16, 7, , 2014
 32. Varanini, M. and Tartarisco, G. and Billeci, L. and Macerata, A. and Pioggia, G. and Balocchi, R., A multi-step approach for non-invasive fetal ECG analysis, Conference Paper, *Computing in Cardiology*, 40, , 281-284, 2013
 33. Pifferi, M. and Bush, A. and Montemurro, F. and Pioggia, G. and Piras, M. and Tartarisco, G. and Di Cicco, M. and Chinellato, I. and Cangiotti, A.M. and Boner, A.L., Is the sensitivity of primary ciliary dyskinesia detection by ciliary function analysis 100%?, Letter, *European Respiratory Journal*, 42, 4, 1161, 2013
 34. Pifferi, M. and Bush, A. and Montemurro, F. and Pioggia, G. and Piras, M. and Tartarisco, G. and Di Cicco, M. and Chinellato, L. and Cangiotti, A.M. and Boner, A.L., Erratum: Rapid diagnosis of primary ciliary dyskinesia: Cell culture and soft computing analysis (*European Respiratory Journal* (2013) 41 (960-965)), Erratum, *European Respiratory Journal*, 42, 4, 1162, 2013

35. Tonacci, A. and Borghini, A. and Mercuri, A. and Pioggia, G. and Andreassi, M.G., Brain-derived neurotrophic factor (Val66Met) polymorphism and olfactory ability in young adults, Article, Journal of Biomedical Science, 20, 1, , 2013
36. Billeci, L. and Sicca, F. and Maharatna, K. and Apicella, F. and Narzisi, A. and Campatelli, G. and Calderoni, S. and Pioggia, G. and Muratori, F., On the application of Quantitative EEG for characterizing autistic brain: A systematic review, Review, Frontiers in Human Neuroscience, , JUL, , 2013
37. Solar, H. and Fernández, E. and Tartarisco, G. and Pioggia, G. and Cvetković, B. and Kozina, S. and Luštrek, M. and Lampe, J., A non invasive, wearable sensor platform for multi-parametric remote monitoring in CHF patients, Conference Paper, Health and Technology, 3, 2, 99-109, 2013
38. Gargani, L. and Raso, R. and Pioggia, G. and Pratali, L., Extravascular lung water: from genes to telemedicine [Acqua extravascolare polmonare: Dalla genetica alla telemedicina], Review, Recenti Progressi in Medicina, 104, 4, 133-140, 2013
39. Pifferi, M. and Bush, A. and Montemurro, F. and Pioggia, G. and Piras, M. and Tartarisco, G. and Cicco, M.D. and Chinellato, I. and Cangiottie, A.M. and Boner, A.L., Rapid diagnosis of primary ciliary dyskinesia: Cell culture and soft computing analysis, Article, European Respiratory Journal, 41, 4, 960-965, 2013
40. Billeci, L. and Magliaro, C. and Pioggia, G. and Ahluwalia, A., NEuronMORphological analysis tool: Open-source software for quantitative morphometrics, Article, Frontiers in Neuroinformatics, 6, JANUARY 2013, , 2013
41. Gaggioli, A. and Pioggia, G. and Tartarisco, G. and Baldus, G. and Corda, D. and Cipresso, P. and Riva, G., A mobile data collection platform for mental health research, Article, Personal and Ubiquitous Computing, 17, 2, 241-251, 2013
42. Crifaci, G. and Billeci, L. and Tartarisco, G. and Balocchi, R. and Pioggia, G. and Brunori, E. and Maestro, S. and Morales, M.A., ECG and GSR measure and analysis using wearable systems: Application in anorexia nervosa adolescents, Conference Paper, International Symposium on Image and Signal Processing and Analysis, ISPA, , , 499-504, 2013
43. Tartarisco, G. and Billeci, L. and Ricci, G. and Volpi, L. and Pioggia, G. and Siciliano, G., A personal monitoring architecture to detect muscular fatigue in elderly, Article, Neuromuscular Disorders, 22, SUPPL. 3, , 2012
44. Gaggioli, A. and Cipresso, P. and Serino, S. and Pioggia, G. and Tartarisco, G. and Baldus, G. and Corda, D. and Riva, G., An open source mobile platform for psychophysiological self tracking, Conference Paper, Studies in Health Technology and Informatics, 173, , 136-138, 2012
45. Pifferi, M. and Bush, A. and Pioggia, G. and Caramella, D. and Tartarisco, G. and Cicco, M.D. and Zangani, M. and Chinellato, I. and Maggi, F. and Tezza, G. and Macchia, P. and Boner, A., Evaluation of pulmonary disease using static lung volumes in primary ciliary dyskinesia, Article, Thorax, 67, 11, 993-999, 2012
46. Solar, H. and Fernández, E. and Tartarisco, G. and Pioggia, G. and Cvetković, B. and Kozina, S. and Luštrek, M. and Lampe, J., A non invasive, wearable sensor platform for multi-parametric remote monitoring in CHF patients, Conference Paper, Lecture Notes in Computer Science (including subseries Lecture Notes in Artificial Intelligence and Lecture Notes in Bioinformatics), 7251 LNCS, , 140-147, 2012
47. Tartarisco, G. and Baldus, G. and Corda, D. and Raso, R. and Arnao, A. and Ferro, M. and Gaggioli, A. and Pioggia, G., Personal Health System architecture for stress monitoring and support to clinical decisions, Article, Computer Communications, 35, 11, 1296-1305, 2012
48. Serino, S. and Cipresso, P. and Tartarisco, G. and Baldus, G. and Corda, D. and Pioggia, G. and Gaggioli, A. and Riva, G., An event-driven psychophysiological

- assessment for health care, Conference Paper, Proceedings of the 2nd International Workshop on Computing Paradigms for Mental Health, MindCare 2012, in Conjunction with BIOSTEC 2012, , , 25-34, 2012
49. Gaggioli, A. and Pioggia, G. and Tartarisco, G. and Baldus, G. and Ferro, M. and Cipresso, P. and Serino, S. and Popleteev, A. and Gabrielli, S. and Maimone, R. and Riva, G., A system for automatic detection of momentary stress in naturalistic settings, Article, Studies in Health Technology and Informatics, 181, , 182-186, 2012
 50. Gaggioli, A. and Pioggia, G. and Tartarisco, G. and Cipresso, P. and Riva, G., PsychLog: A personal data collection platform for psychophysiological research, Article, Annual Review of CyberTherapy and Telemedicine, 9, 1, 82-84, 2011
 51. Valenza, G. and Pioggia, G. and Armato, A. and Ferro, M. and Scilingo, E.P. and De Rossi, D., A neuron-astrocyte transistor-like model for neuromorphic dressed neurons, Article, Neural Networks, 24, 7, 679-685, 2011
 52. Pifferi, M. and Bush, A. and Pioggia, G. and Di Cicco, M. and Chinellato, I. and Bodini, A. and Macchia, P. and Boner, A.L., Monitoring asthma control in children with allergies by soft computing of lung function and exhaled nitric oxide, Article, Chest, 139, 2, 319-327, 2011
 53. Mazzei, D. and Billeci, L. and Armato, A. and Lazzeri, N. and Cisternino, A. and Pioggia, G. and Iglizzi, R. and Muratori, F. and Ahluwalia, A. and De Rossi, D., The FACE of autism, Conference Paper, Proceedings - IEEE International Workshop on Robot and Human Interactive Communication, , , 791-796, 2010
 54. Pioggia, G. and Tartarisco, G. and Ricci, G. and Volpi, L. and Siciliano, G. and De Rossi, D. and Bonfiglio, S., A wearable pervasive platform for the intelligent monitoring of muscular fatigue, Conference Paper, Proceedings of the 2010 10th International Conference on Intelligent Systems Design and Applications, ISDA'10, , , 132-135, 2010
 55. Pioggia, G. and Carbonaro, N. and Anania, G. and Tognetti, A. and Tartarisco, G. and Ferro, M. and De Rossi, D. and Gaggioli, A. and Riva, G., Interreality: The use of advanced technologies in the assessment and treatment of psychological stress, Conference Paper, Proceedings of the 2010 10th International Conference on Intelligent Systems Design and Applications, ISDA'10, , , 1047-1051, 2010
 56. Pioggia, G. and Tartarisco, G. and Valenza, G. and Ricci, G. and Volpi, L. and Siciliano, G. and Bonfiglio, S., A pervasive activity management and rehabilitation support system for the elderly, Conference Paper, 2010 8th IEEE International Conference on Pervasive Computing and Communications Workshops, PERCOM Workshops 2010, , , 813-816, 2010
 57. Billeci, L. and Pioggia, G. and Vaglini, F. and Ahluwalia, A., Automated extraction and classification of dynamic metrical features of morphological development in dissociated Purkinje neurons, Article, Journal of Neuroscience Methods, 185, 2, 315-324, 2010
 58. Carelli, L. and Gaggioli, A. and Pioggia, G. and De Rossi, F. and Riva, G., Affective robot for elderly assistance, Conference Paper, Studies in Health Technology and Informatics, 144, , 44-49, 2009
 59. Landi, A. and Piaggi, P. and Pioggia, G., Backpropagation-based non linear PCA for biomedical applications, Conference Paper, ISDA 2009 - 9th International Conference on Intelligent Systems Design and Applications, , , 635-640, 2009
 60. Carelli, L. and Gaggioli, A. and Pioggia, G. and De Rossi, F. and Riva, G., Affective robot for elderly assistance, Review, Annual Review of CyberTherapy and Telemedicine, 7, 1, 44-49, 2009
 61. Ferro, M. and Pioggia, G. and Tognetti, A. and Dalle Mura, G. and De Rossi, D., Event related biometrics: Towards an unobtrusive sensing seat system for continuous

- human authentication, Conference Paper, ISDA 2009 - 9th International Conference on Intelligent Systems Design and Applications, , , 679-682, 2009
62. Pioggia, G. and Ricci, G. and Bonfiglio, S. and Bekiaris, E. and Siciliano, G. and De Rossi, D., An ontology-driven multisensorial platform to enable unobtrusive human monitoring and independent living, Conference Paper, ISDA 2009 - 9th International Conference on Intelligent Systems Design and Applications, , , 620-623, 2009
 63. Armato, A. and Fanucci, L. and Pioggia, G. and De Rossi, D., Low-error approximation of artificial neuron sigmoid function and its derivative, Article, Electronics Letters, 45, 21, 1082-1084, 2009
 64. Pioggia, G., Special issue on neuron-glia interactions, Editorial, Journal of Biological Physics, 35, 4, 311-315, 2009
 65. Billeci, L. and Pioggia, G. and Vaglini, F. and Ahluwalia, A., Assessment and comparison of neural morphology through metrical feature extraction and analysis in neuron and neuron-glia cultures, Article, Journal of Biological Physics, 35, 4, 447-464, 2009
 66. Ferro, M. and Pioggia, G. and Tognetti, A. and Carbonaro, N. and De Rossi, D., A sensing seat for human authentication, Article, IEEE Transactions on Information Forensics and Security, 4, 3, 451-459, 2009
 67. Sohn, J.H. and Pioggia, G. and Craig, I.P. and Stuetz, R.M. and Atzeni, M.G., Identifying major contributing sources to odour annoyance using a non-specific gas sensor array, Article, Biosystems Engineering, 102, 3, 305-312, 2009
 68. Pifferi, M. and Ragazzo, V. and Previti, A. and Pioggia, G. and Ferro, M. and MacChia, P. and Piacentini, G.L. and Boner, A.L., Exhaled Breath Temperature: A key feature to discriminate asthmatic children: Letter to the Editor, Letter, Pediatric Allergy and Immunology, 20, 2, 202-203, 2009
 69. Pifferi, M. and Ragazzo, V. and Previti, A. and Pioggia, G. and Ferro, M. and MacChia, P. and Piacentini, G.L. and Boner, A.L., Exhaled air temperature in asthmatic children: A mathematical evaluation, Article, Pediatric Allergy and Immunology, 20, 2, 164-171, 2009
 70. Bekiaris, E. and Panou, M. and Pioggia, G., An innovative framework for elderly-friendly transportation and driver support services, Conference Paper, 15th World Congress on Intelligent Transport Systems and ITS America Annual Meeting 2008, 2, , 847-856, 2008
 71. Pioggia, G. and Igliazzi, R. and Sica, M.L. and Ferro, M. and Muratori, F. and Ahluwalia, A. and de Rossi, D., Exploring emotional and imitational android-based interactions in autistic spectrum disorders, Article, Journal of Cyber Therapy and Rehabilitation, 1, 1, 49-62, 2008
 72. Pioggia, G. and Di Francesco, F. and Ferro, M. and Sorrentino, F. and Salvo, P. and Ahluwalia, A., Characterization of a carbon nanotube polymer composite sensor for an impedimetric electronic tongue, Article, Microchimica Acta, 163, 1-2, 57-62, 2008
 73. Di Francesco, F. and Loccioni, C. and Fioravanti, M. and Russo, A. and Pioggia, G. and Ferro, M. and Roehrer, I. and Tabucchi, S. and Onor, M., Implementation of Fowler's method for end-tidal air sampling, Article, Journal of Breath Research, 2, 3, , 2008
 74. Mazzoldi, A. and Tesconi, M. and Tognetti, A. and Rocchia, W. and Vozzi, G. and Pioggia, G. and Ahluwalia, A. and De Rossi, D., Electroactive carbon nanotube actuators: Soft-lithographic fabrication and electro-chemical modelling, Article, Materials Science and Engineering C, 28, 7, 1057-1064, 2008
 75. De Pittà, M. and Volman, V. and Levine, H. and Pioggia, G. and De Rossi, D. and Ben-Jacob, E., Erratum: Coexistence of amplitude and frequency modulations in intracellular calcium dynamics (Physical Review E (2008) 77 (030903 (R))), Erratum, Physical Review E - Statistical, Nonlinear, and Soft Matter Physics, 78, 1, , 2008

76. Sohn, J.H. and Atzeni, M. and Zeller, L. and Pioggia, G., Characterisation of humidity dependence of a metal oxide semiconductor sensor array using partial least squares, Article, *Sensors and Actuators, B: Chemical*, 131, 1, 230-235, 2008
77. De Pittà, M. and Volman, V. and Levine, H. and Pioggia, G. and De Rossi, D. and Ben-Jacob, E., Coexistence of amplitude and frequency modulations in intracellular calcium dynamics, Article, *Physical Review E - Statistical, Nonlinear, and Soft Matter Physics*, 77, 3, , 2008
78. Pioggia, G. and Ferro, M. and Di Francesco, F. and Ahluwalia, A. and De Rossi, D., Assessment of bioinspired models for pattern recognition in biomimetic systems, Article, *Bioinspiration and Biomimetics*, 3, 1, , 2008
79. Pioggia, G. and Ferro, M. and Di Francesco, F., Towards a real-time transduction and classification of chemoresistive sensor array signals, Article, *IEEE Sensors Journal*, 7, 2, 237-244, 2007
80. Sohn, J.H. and Atzeni, M. and Zeller, L. and Pioggia, G., Characterisation of humidity dependence of a metal oxide semiconductor (MOS) sensor array using partial least squares (PLS), Conference Paper, Proc. 14th International Union of Air Pollution Prevention and Environmental Protection Associations (IUAPPA) World Congress 2007, 18th Clean Air Society of Australia and New Zealand (CASANZ) Conf., , , , 2007
81. Sohn, J.H. and Atzeni, M. and Zeller, L. and Pioggia, G., Characterisation of humidity dependence of a metal oxide semiconductor (MOS) sensor array using Partial Least Squares (PLS), Conference Paper, Proc. 14th International Union of Air Pollution Prevention and Environmental Protection Associations (IUAPPA) World Congress 2007, 18th Clean Air Society of Australia and New Zealand (CASANZ) Conf., , , , 2007
82. Pioggia, G. and Ferro, M. and Zupone, G. and Chirulli, L. and Derossi, D., Development of a sensing seat for human authentication, Conference Paper, IET Conference Publications, , 531 CP, 481-485, 2007
83. Di Francesco, F. and Tabucchi, S. and Loccioni, C. and Ferro, M. and Pioggia, G., Development of a CO₂ triggered alveolar air sampler, Conference Paper, IEEE International Symposium on Industrial Electronics, , , 2834-2837, 2007
84. Sgambelluri, N. and Valenza, G. and Ferro, M. and Pioggia, G. and Scilingo, E.P. and De Rossi, D. and Bicchi, A., An artificial neural network approach for haptic discrimination in minimally invasive surgery, Conference Paper, Proceedings - IEEE International Workshop on Robot and Human Interactive Communication, , , 25-30, 2007
85. Pioggia, G. and Sica, M.L. and Ferro, M. and Iglizzi, R. and Muratori, F. and Ahluwalia, A. and De Rossi, D., Human-robot interaction in autism: FACE, an android-based social therapy, Conference Paper, Proceedings - IEEE International Workshop on Robot and Human Interactive Communication, , , 605-612, 2007
86. Arena, A. and Donato, N. and Saitta, G. and Rizzo, G. and Neri, G. and Pioggia, G., Photosensitive heterojunctions of silicon coated with sol-gel derived TiO₂ dispersed in poly(3,4-ethylendi oxythiophene)/ poly(styrenesulfonate), Article, *Journal of Sol-Gel Science and Technology*, 43, 1, 41-46, 2007
87. Pioggia, G. and Di Francesco, F. and Marchetti, A. and Ferro, M. and Ahluwalia, A., A composite sensor array impedentiometric electronic tongue. Part I. Characterization, Article, *Biosensors and Bioelectronics*, 22, 11, 2618-2623, 2007
88. Pioggia, G. and Di Francesco, F. and Marchetti, A. and Ferro, M. and Leardi, R. and Ahluwalia, A., A composite sensor array impedentiometric electronic tongue. Part II. Discrimination of basic tastes, Article, *Biosensors and Bioelectronics*, 22, 11, 2624-2628, 2007

89. Arena, A. and Donato, N. and Saitta, G. and Pioggia, G. and Rizzo, G., All-organic electrochemical devices based on a tetracyanoquinodimethane complex, Article, *Solid-State Electronics*, 51, 5, 639-643, 2007
90. Pioggia, G. and Tassoni, L. and Mazzoldi, A. and Bertarelli, C. and Di Francesco, F. and De Rossi, D., Preparation and characterization of conducting chemo-sensitive layers based on alkoxy-substituted polythiophenes, Article, *Measurement Science and Technology*, 17, 12, 3265-3271, 2006
91. Pioggia, G. and Ferro, M. and Di Francesco, F. and De Rossi, D., A processing architecture for associative short-term memory in electronic noses, Article, *Measurement Science and Technology*, 17, 11, 3066-3072, 2006
92. Arena, A. and Donato, N. and Pioggia, G. and Rizzo, G. and Saitta, G., Preparation and optical characterization of photosensitive multilayered structures based on polythiophenes and tetracyanoquinodimethane, Article, *Microelectronics Journal*, 37, 11, 1384-1388, 2006
93. Pioggia, G. and Igliozzi, R. and Ferro, M. and Ahluwalia, A. and Muratori, F. and De Rossi, D., An android for enhancing social skills and emotion recognition in people with autism, Article, *IEEE Transactions on Neural Systems and Rehabilitation Engineering*, 13, 4, 507-515, 2005
94. Fort, A. and Rocchi, S. and Serrano-Santos, M.B. and Ulivieri, N. and Vignoli, V. and Pioggia, G. and Di Francesco, F., A high-performance measurement system for simultaneous mass and resistance variation measurements on gas sensing polymer films, Conference Paper, *Sensors and Actuators, B: Chemical*, 111-112, SUPPL., 193-199, 2005
95. Di Francesco, F. and Falcitelli, M. and Marano, L. and Pioggia, G., A radially symmetric measurement chamber for electronic noses, Article, *Sensors and Actuators, B: Chemical*, 105, 2, 295-303, 2005
96. Chimenti, M. and De Rossi, D. and Di Francesco, F. and Domenici, C. and Pieri, G. and Pioggia, G. and Salvetti, O., A neural approach for improving the measurement capability of an electronic nose, Article, *Measurement Science and Technology*, 14, 6, 815-821, 2003
97. Gallazzi, M.C. and Tassoni, L. and Bertarelli, C. and Pioggia, G. and Di Francesco, F. and Montoneri, E., Poly(alkoxy-bithiophenes) sensors for organic vapours, Article, *Sensors and Actuators, B: Chemical*, 88, 2, 178-189, 2003
98. Falcitelli, M. and Benassi, A. and Di Francesco, F. and Domenici, C. and Marano, L. and Pioggia, G., Fluid dynamic simulation of a measurement chamber for electronic noses, Article, *Sensors and Actuators, B: Chemical*, 85, 1-2, 166-174, 2002
99. Carpi, F. and Lorussi, F. and Mazzoldi, A. and Pioggia, G. and Pasquale Scilingo, E. and De Rossi, D., Electroactive polymers based skin and muscles for man machine interfaces, Conference Paper, *Materials Research Society Symposium - Proceedings*, 698, , 29-33, 2002
100. Pioggia, G. and Hanson, D. and Dinelli, S. and Di Francesco, F. and Francesconi, R. and De Rossi, D., The importance of nonverbal expression to the emergence of emotive artificial intelligence systems, Article, *Proceedings of SPIE-The International Society for Optical Engineering*, 4695, , 403-414, 2002
101. Hanson, D. and Pioggia, G. and Cohen, Y.B. and De Rossi, D., Androids: Application of EAP as artificial muscles to entertainment industry, Article, *Proceedings of SPIE - The International Society for Optical Engineering*, 4329, 1, 375-379, 2001
102. Di Francesco, F. and Lazzerini, B. and Marcelloni, F. and Pioggia, G., An electronic nose for odour annoyance assessment, Review, *Atmospheric Environment*, 35, 7, 1225-1234, 2001

103. Pioggia, G. and Di Francesco, F. and Geraci, C. and Chiarelli, P. and De Rossi, D., An human-like android face equipped with EAP artificial muscles to endow expressivity, Conference Paper, Proceedings of SPIE - The International Society for Optical Engineering, 4329, , 350-356, 2001

Autorizzo il trattamento dei miei dati personali ai sensi del Decreto Legislativo 30 giugno 2003, n. 196 "Codice in materia di protezione dei dati personali".

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Ing. Giovanni Pioggia

