

## PERSONAL INFORMATION

## Giovanni Vozzi



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Sex Male | *Date of birth* 06/09/1972 | *Nationality* Italian

## WORK EXPERIENCE

- 2th December 2019-present **Full professor**  
▪ Permanent Full Professor in Bioengineering (ING-INF/06) at University of Pisa.
- 1st June 2018-31st August 2018 **Visiting professor**  
▪ Visiting Professor at Sabanci University Campus in Tuzla, Turkey
- 20th March 2017-30th March 2023 **Qualification for the role of full professor**  
▪ Italian National Scientific qualification for the role of Full professor in Bioengineering
- 1st March 2015-present **Adjunct Associate Professor**  
▪ Adjunct Associate professor in Biomedical Engineering and Medical Physics Discipline, School of Chemistry, Physics and Mechanical Engineering in the Science and Engineering Faculty at the Queensland University of Technology, Australia
- 29th December 2014-1st December 2019 **Associate Professor**  
▪ Permanent Associate Professor in Bioengineering (ING-INF/06) at University of Pisa.
- April 2012-present **Visiting professor**  
▪ Visiting professor at IPL-Centro Para o desenvolvimento rapido e sustentado de producto – Instituto Politecnico de Leiria, Portugal
- May 2006-28th December 2014 **Assistant professor**  
▪ Permanent Assistant Professor in Industrial Bioengineering (ING-IND/34) at University of Pisa.
- 18th March 2006-3rd April 2006 **Collaboration contract**  
▪ Collaboration contract for two months on European Project UE CT. ASIA-LINK for "Training on the use of Biopac and transducers and Biomaterials" at University of Pisa
- 1st April 2006-30th April 2006 **Collaboration contract**  
▪ Collaboration contract for four months at Research Center "E. Piaggio" – University of Pisa on "Optimisation of a laminar flow bioreactor".
- 2nd November 2005-1st February 2006 **Collaboration contract**  
▪ Collaboration contract at Department of Chemical Engineering, Industrial Chemistry and Material Science of University of Pisa on "Synthesis and characterisation of monomers to realise elastomers used as solid propellents".
- 9th November 2005-17th December 2005 **Collaboration contract**  
▪ Collaboration contract for teaching Chemical Bioengineering at Bachelor degree of Biomedical Engineering for academic year 2005-2006.
- 1st July 2003-30th April 2006 **Post-doc**

- Post-Doc grant on FIRB project “Development of materials and technologies focused for controlled drug release systems for endovascular devices” at Institute of Composite and Biomedical Materials – CNR in Pisa

1<sup>st</sup> July 2002-30<sup>th</sup> June 2003

**Post-doc**

- Post-Doc grant on “Microfabrication of biomimetic actuators” on European Project “BioloCh” at Research Center “E. Piaggio” – University of Pisa

2<sup>nd</sup> April 2002-30<sup>th</sup> June 2002

**Collaboration contract**

- Collaboration contract for two months at Research Center “E. Piaggio” – University of Pisa to set-up a Soft-Lithography laboratory.

12<sup>th</sup> November 2001-3<sup>rd</sup> March 2002

**Collaboration contract**

- Collaboration contract for four months at Research Center “E. Piaggio” – University of Pisa to optimise a measure chamber for TIRF optical sensors

20<sup>th</sup> October 2000-25<sup>th</sup> April 2001

**Collaboration contract**

- Collaboration contract for six months at Microscale Tissue Engineering Laboratory of UCSD- San Diego-CA, USA to develop new microfabrication techniques obtained by soft-lithography.

22<sup>nd</sup> December 1999-22<sup>nd</sup> March 2000

**Collaboration contract**

- Collaboration contract for three months at Research Center “E. Piaggio” – University of Pisa for the development of conductive polymers sensors.

22<sup>nd</sup> July 1998-22<sup>nd</sup> October 1998

**Collaboration contract**

- Collaboration contract for three months at Research Center “E. Piaggio” – University of Pisa to develop a bioreactor for the growth of endothelial cells in a hemodynamic simulated environment.

**EDUCATION AND TRAINING**

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October 1998 – October 2001

**PhD in Bioengineering**

- PhD in Bioengineering obtained at Politecnico of Milan on 5<sup>th</sup> February 2002, with PhD thesis “Microfabrication techniques for the realisation of organised engineered tissue”, was carried out at Interdepartmental Research Center “E. Piaggio” in Pisa, with the collaboration of Institute of Clinical Physiology at Pisa, of institute of Neurophysiology at Pisa and of Microscale Tissue Engineering Laboratory of University of California San Diego, USA.

21<sup>st</sup> December 1998

**Engineer professional qualification**

24<sup>th</sup> June 1998

**Degree in Electronic Engineering**

- Degree in Electronic Engineering (Course Bioengineering) at University of Pisa with 103/110

**INSTITUTIONAL POSITIONS**

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January 2022-present

Vice-President of the Board of Directors of the National Bioengineering Group

15<sup>th</sup> September 2021-14<sup>th</sup> September 2024

President of the Aggregate Council of the Bachelor and Master Degree Courses in Biomedical Engineering and of the Master Degree Course in Bionics Engineering and member of the Joint Teaching Commission and of the Review Commission for the above-mentioned Degree Courses

November 2020-present

Member of the Doctoral Board in Information Engineering

2019-present

Member of the Board of Directors of the National Bioengineering Group

2018-present

Member of the Board of the School of Engineering; Member of the Interdepartmental Research Centre on Health Technology Assessment of the University of Pisa; Member of the

	Interdepartmental Centre "Frontier Law and Technologies" of the University of Pisa; Member of the Centre for the Integration of Scientific Instrumentation of the University of Pisa
November 2018-September 2021	President of the Aggregate Council of the Bachelor and Master Degree Courses in Biomedical Engineering and of the Master Degree Course in Bionics Engineering and member of the Joint Teaching Commission and of the Review Commission for these Degree Courses
September 2017-present	University member in agreement for research activities at the Fondazione Toscana Gabriele Monasterio for medical and public health research
November 2016-October 2018	Managing security for University of Pisa appointed by the Chancellor
November 2014-October 2018	Elected member of Commission for the evaluation of the Research for Industrial and Information Engineering
January 2014-present	Member of the Doctoral board of Ingegneria dell'Informazione, University of Pisa, Italy
November 2015-October 2018	VicePresident of Council of Biomedical Engineering and Bionics Engineering degree
November 2013-October 2015	President of Didactics Commission of Council of Biomedical Engineering degree
November 2012-October 2018	Elected Member of Security Committee; Assistant Coordinator, University of Pisa – Italy
November 2010-18 <sup>th</sup> September 2012	Elected Member of "Giunta di Dipartimento" at Department of Chemical Engineering, Industrial Chemistry and Materials Science of University of Pisa
May 2009-18 <sup>th</sup> September 2012	Elected Member of "Comitato di Presidenza" at faculty of Engineering of University of Pisa
October 2009-present	Member of the board of PhD in Automaton, Robotics and Bioengineering, "Leonardo Da Vinci" PhD School of University of Pisa
June 2006-present	Expert member of the commission of the University of Pisa for the qualification to the profession of engineer
June 2006-2015	Member of the board of PhD in Chemical and Material Engineering, "Leonardo Da Vinci" PhD School of University of Pisa
2006-present	Active member of defence for Biomedical Engineering of Bachelor and Master degree thesis
2006-2012	Faculty member, University of Pisa - Engineering Faculty – Italy
1998-present	Member of the Research Centre "E. Piaggio" – University of Pisa and currently responsible for safety at the Centre

**TEACHING ACTIVITY**

2021-present	<ul style="list-style-type: none"> <li>▪ Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).</li> <li>▪ Artificial Organs, (6CFU), (Bachelor Degree in Biomedical Engineering).</li> <li>▪ Micro and Nanosystems (6 CFU) (Master Degree in Biomedical Engineering)</li> <li>▪ Laboratory of Biomedical Technologies (6 CFU) (Master Degree in Biomedical Engineering)</li> <li>▪ Neural Prostheses (6 CFU) (Master Degree in Bionics Engineering)</li> <li>▪ Lab Training (3 CFU) (Master Degree in Bionics Engineering)</li> <li>▪ Bioengineering Principles for the development of phantom for medical application (1 CFU) (Master degree in Medicine)</li> <li>▪ Bioengineering Principles for the development of 3D in vitro models in physiological and pathological conditions (6 CFU) (Master degree in Pharmacy)</li> <li>▪ Law of Biotechnological Innovation in the European Perspective (6 CFU) (Master degree in Law)</li> </ul>
2020-2021	<ul style="list-style-type: none"> <li>▪ Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).</li> </ul>

- Artificial Organs, (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and Nanosystems (6 CFU) (Master Degree in Biomedical Engineering)
  - Laboratory of Biomedical Technologies (6 CFU) (Master Degree in Biomedical Engineering)
  - Neural Prostheses (6 CFU) (Master Degree in Bionics Engineering)
  - Lab Training (3 CFU) (Master Degree in Bionics Engineering)
  - Bioengineering Principles for the development of phantom for medical application (1 CFU) (Master degree in Medicine)
  - Bioengineering Principles for the development of 3D in vitro models in physiological and pathological conditions (6 CFU) (Master degree in Pharmacy)
- 2018-2020
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and Nanosystems (6 CFU) (Master Degree in Biomedical Engineering)
  - Laboratory of Biomedical Technologies (6 CFU) (Master Degree in Biomedical Engineering)
  - Neural Prostheses (6 CFU) (Master Degree in Bionics Engineering)
  - Lab Training (3 CFU) (Master Degree in Bionics Engineering)
  - Bioengineering Principles for the development of phantom for medical application (1 CFU) (Master degree in Medicine)
  - Bioengineering Principles for the development of 3D in vitro models in physiological and pathological conditions (6 CFU) (Master degree in Pharmacy)
- 2017-2018
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  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
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  - Laboratory of Biomedical Technologies (6 CFU) (Master Degree in Biomedical Engineering)
  - Neural Prostheses (6 CFU) (Master Degree in Bionics Engineering)
  - Bioengineering Principles for the development of phantom for medical application (1 CFU) (Master degree in Medicine)
- 2016-2017
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and Nanosystems (6 CFU) (Master Degree in Biomedical Engineering)
  - Laboratory of Biomedical Technologies (6 CFU) (Master Degree in Biomedical Engineering)
  - Neural Prostheses (6 CFU) (Master Degree in Bionics Engineering)
- 2015-2016
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and Nanosystems (6 CFU) (Master Degree in Biomedical Engineering)
- 2014-2015
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
- 2012-2014
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and nano systems, (9CFU), ( Master Degree in Biomedical Engineering).
- 2011-2012
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and nano systems, (9CFU), (Master Degree in Biomedical Engineering).
- 2010-2011
- Prosthesis (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Micro and nano systems, (6CFU),( Master Degree in Biomedical Engineering).
  - Laboratory for Biomedical Engineering (3CFU), (Bachelor Degree in Biomedical Engineering)
- 2009-2010
- Laboratory for Biomedical Engineering (3CFU), (Bachelor Degree in Biomedical Engineering);
  - New Technologies in Surgery, Minimally Invasive Therapies (2 CFU), (Master Degree in Biomedical Engineering)
  - Chemical Bioengineering, (6CFU), (Bachelor Degree in Biomedical Engineering.
  - Biomechanics (6CFU), (Bachelor Degree in Biomedical Engineering);
  - New technologies in surgery (6CFU), (Master Degree in Biomedical Engineering).
- 2006-2008
- Laboratory for Biomedical Engineering (3CFU), (Bachelor Degree in Biomedical Engineering);
  - New Technologies in Surgery, Minimally Invasive therapies (2 CFU), (Master Degree in Biomedical Engineering).
  - Chemical Bioengineering (6CFU), (Bachelor Degree in Biomedical Engineering).
  - Biomechanics (6CFU),(Bachelor Degree in Biomedical Engineering).

- New technologies in surgery (6CFU), (Master Degree in Biomedical Engineering).
- Biomolecular and Tissue engineering (6CFU), (Master Degree in Biomedical Engineering).

## PERSONAL SKILLS

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Mother tongue(s)	Italian
Other language(s)	English C1/C2
Research interests	<ul style="list-style-type: none"> <li>▪ Development of Micro and Nanofabrication techniques for the biomedical field.</li> <li>▪ Development of bioreactors for engineered tissue culture.</li> <li>▪ In-vitro and in-vivo physico-chemical, mechanical and cellular characterisation of micro- and nanofabricated polymer microstructures.</li> <li>▪ In silico modelling of cell metabolism</li> <li>▪ Analysis of neuronal functional recovery by means of electromyographic and electroneurographic signal analysis following the implantation of hollow tubular polymeric structures or new neuronal surgery methods.</li> <li>▪ Development and optimisation of natural and/or composite biomaterials for applications in the biomedical engineering field.</li> <li>▪ Development of touch sensors</li> </ul>
Other skills	<ul style="list-style-type: none"> <li>▪ Reviewer for several international journals, such as Acta Biomaterialia, Biosensors &amp; Bioelectronics, Biomaterials, Biomedical Microdevices, Biotechnology Progress, Journal of Controlled Release, Materials Science &amp; Engineering C, Open Chemical Engineering Journal, Sensors and Actuators, Tissue Engineering, ACS Nano, Journal of Neural Engineering, IEEE EMBS, Polymer Composites, etc.</li> <li>▪ Member of Editorial Board of International Journal of Osteology and Biomaterials, of Open Nanoscience Journal, of Open Chemical Journal and of Bentham Sciences Publishers Ltd.</li> <li>▪ Member of Editorial Board of Biomedical Science and Engineering, Recent patents in Engineering, International Journal of Bioprinting, Journal of 3D printing in Medicine, AIMS Bioengineering, Annals of Medicinal Chemistry and Research, Open Chemical Engineering Journal, Trends in Medicine and Health, Regenerative Medicine Frontiers, Journal of Polymer Science and Engineering, Orthoplastic Surgery &amp; Orthopedic Care International Journal.</li> <li>▪ member of various committees within and outside the University of Pisa for competitions for admission to the PhD programme in Information Engineering, for research grants, research scholarships, type A and type B researcher and full professor positions.</li> <li>▪ Founding member, member of the Directors board and currently treasurer of the International Society for Biofabrication, member of IEEE, of the National Bioengineering Group, of the Italian Digital Biomanufacturing Network (IDBN), of the Interuniversity Consortium for Additive Manufacturing (CIRAM), of the Interdepartmental Research Centre on Health Technology Assessment (CIRHTA) of the University of Pisa and of the Interdepartmental Centre for Law and Technologies of the Frontier (DETECT) of the University of Pisa.</li> <li>▪ Auditor of projects for the Romanian Executive Agency for Higher Education, Research, Development and Innovation Funding, for the Estonian Science Foundation and for the Autonomous Province of Trento, University and Scientific Research Service. I was evaluator of Consolidator Grant 2013, ERC Program, European Commission and of the Italian Ministry of Education, University and Research (MIUR) for FAS projects.</li> <li>▪ Scientific advisor for Dipromed Srl in San Mauro Torinese (To), Italy for following European Manunet Era Net Call and FP7 projects: Nanowell Manunet (2008); Biodress Manunet (2010); Nasla Capacities FP7 (2009); Nabla Converging Technology (2008)</li> <li>▪ Evaluator of innovation project in industrial area for Fondimpresa, Italy</li> <li>▪ Co-organizer of the National Congress of the Italian Digital Biomanufacturing Network IDBN2019 "3D Printing and Bioprinting" (Pisa Centro Congressi le Benedettine 28th-30th OCTOBER 2019).</li> <li>▪ Organizer of the Winter School of Bioprinting "From 3D printing set-up to laboratory analysis" at the University of Pavia from 11th to 13th February 2020, of the XL Annual School of Bioengineering entitled "Biofabrication: an integrated bioengineering approach for the automated fabrication of biological structures for clinical and research applications" from 13 to 16 September 2021 and of the international congress of the Advanced Functional Polymers for Medicine society from 13th to 16th July 2021.</li> </ul>

- Scientific Grants Involved in the following grants:
- Fondazione Cassa Di Risparmio di Pisa 2002: Development of miniaturized bioreactors for testing drugs on cell cultures in a dynamic regime in models of nervous and vascular pathologies;
  - FIRB 2002 Development of technologies for the realisation of electronic components and devices on textile substrates;
  - PRIN 2002: Development and realisation of a micromechanical transducer system for the determination of messenger RNA in biomedical applications;
  - PRIN 2003: New neuro-electronic interfaces: functional coupling of networks of neurons in-vitro to planar polymeric structures for the development of a bidirectional connection system for monitoring and conditioning the electrophysiological activity of such neuronal systems;
  - European project IST 2001-34181 BIOLOCH 2002-2005 BIO-mimetic structures for LOComotion in the Human body;
  - European project FP7-NMP-2008-SMALL-2: In-liveTox: Intestinal, Liver and Endothelial Nanoparticle Toxicity Development and evaluation of a novel tool for high-throughput data generation.
  - FP7, INNOVATION -201207: Reliver: design of biomimetic bioartificial liver.
  - PRIN 2010: Engineering of organ models of physiological and pathological interest for the investigation of age-related disorders. (MIND)
  - Research project of the University of Pisa PRA\_2016\_57 "Conveying cell-specific drugs and molecules in the retina: Targeted therapy approaches".
  - H2020 European project - INFRASUPP - 2016 -1- GA 731053Euro-African Open Biomedical Engineering e-Platform for Innovation through Education
- Scientific coordinator of the following grants:
- MANUNET 2011-1136: MES-STAR- Morphologically Engineered scaffold for soft tissue application and regeneration
  - POR CRO FSE 2007-2013 ASSE IV- Capitale Umano : INNOMED:Dispositivi biomedicali innovativi integranti nanotecnologie e materiali bioattivi
  - MISTI Global Seed Funds project "Design And Realization of a 3-D Multi-scale In Vitro Model Of Breast Tumor Microenvironment" from January 2016 to July 2017
- Currently involved in the following grants:
- ERC-CoG-2015 scientific project - ERC Consolidator Grant: BOOST: Biomimetic trick to re-balance Osteblast-Osteoclast loop in osteoporosis treatment: Topological and materials driven approach coordinated by Prof. Chiara Vitale Brovarone of the Politecnico di Torino
  - University of Pisa Research Project PRA\_2018\_68 "CRISP/Cas9: Gene Editing to study gene function in physiological and pathological conditions".
  - Jean-Monnet ELATE European Health Law and Technology project funded by Erasmus+ Action - Jean Monnet Module - No 621002-EPP-1-2020-1-IT-EPPJMO-MODULE, from September 2020 to September 2022)
- Currently coordinator in the following grants:
- M-ERA.NET Call 2016 – BIOMEMBRANE project from May 2017 to April 2020 (extended to June 2021 due to COVID19 pandemic).
  - POR FSE 2014 – 2020 Asse A Occupazione - Priorità di investimento A.2 – Obiettivo A.2.1 – Azione A.2.1.7- SIMPLIFY. Design of phthalate-free cannule for dentistry application.
  - MANUNET III call 2017 – MNET17/NMAT-0060 KERAPACK: novel integrated approach for the reduction, recycling and reuse of poultry feathers by keratins based packaging manufacturing. European project from January 2018 to January 2020.
  - IMAGO- Italian Mexican working Group on biofabrication, progetto granted by Italian Minister of Foreign Affairs for the international collaboration projects Italy-Mexico, from January 2018 to December 2019.
  - Technological Demonstrator Project "Electrospider - Device for multiscale and multimaterial biofabrication by electrospinning and microextrusion" funded by the University of Pisa from 31 December 2019 to 30 November 2020.
  - MISTI Funds Global Seed, project "An In Vitro Model of Pyelonephritis" from January 2019 to July 2021.
- Currently project unit leader in the following grants:
- European project GIOTTO "Active aGelng and Osteoporosis: The next challenge for smart nanobiomaterials and 3D technologies" project number: 814410 —H2020-NMBP-TR-IND-2018-202 (330 K€) from 1st January 2019 to 28th February 2023.
  - Project financed by the Region of Tuscany under the Bando Ricerca Salute 2018 with the project "TRITONE: smart bioactive personalised and implantable 3D printed scaffold for tendon regeneration".

#### Major collaborations

- Project co-financed by the POS FESR Toscana 2014-2020 "LEATHER-UP: LEATHER UPGRADE", Call 2 - Research and development projects for SMEs, from January 2021 to December 2022
- MIT-UNIFI Project "An In Vitro Model of Pyelonephritis" from January 2019 to July 2022
- Prof. Thomas Boland, Ink-jet system, University of Texas at El Paso (USA)
- Prof. Paulo Bartolo, Microfabrication platforms, University of Manchester (UK) and Politecnico di Leiria (Portugal)
- Prof. Lorenzo Moroni, Electrospinning system, University of Twente (The Netherland)
- Prof. Joachim Kohn, Development of biomaterials, Rutgers University (USA)
- Prof. Paolo Madeddu, Angiogenesis process, Bristol University (UK)
- Prof. Iulian Antoniac, Bioceramics, University Politehnica of Bucharest (Romania)
- Prof. John Cooke, Cardiovascular medicine, Stanford University (USA)
- Dr. Ngan Huang, Cardiac muscle cells regeneration, Stanford University (USA)
- Prof. Helen Blau, Stem cell biology, Stanford University (USA)
- Prof. Jonathon Aylott, Design and Realisation of nanoparticles for sensing and controlled release, University of Nottingham, (UK)
- Prof. Dietmar Hutmacher, Biofabbrication, Queensland University of Technology, Brisbane, Australia e Technische Universitat Munchen
- Prof. Alex K. Shalek, Institute for Medical Engineering & Science , MIT (USA)
- Prof. Wei Sun, Drexel Univeristy (USA) & Tsingua University (China)
- Prof. James J. Yoo, Wake Forrest (USA)
- Prof. Paolo Bonaldo, Università degli studi di Padova
- Prof. Gianluca Ciardelli, Politecnico di Torino
- Prof.ssa Chiara Vitale Brovarone, Politecnico di Torino
- Prof. Monica Mattioli- Belmonte, Università Politecnica delle Marche

#### AWARDS

- 2001: 1st price in the "Research Capital 2001" for the "development of a system of microfabricated polymer microstructures for applications in the field of Biomedical Engineering"
- 2001: 3rd price in the "Research Capital 2001" for the "Design and implementation of a bioreactor and isobaric laminar flow for applications in the field of tissue engineering and pharmacology"
- 2002: EUROPRACTICE VC Funding Forum funded by the European Community for the development of a multicompartment bioreactor (MCB)
- Award "Augusto Bonola" 2007 by the Italian Society of Surgery of the Hand for the contribution in the advancement of hand surgery
- Prize 2011 "Young Researcher" of University of Pisa
- 2017/7/1: Cover Image on Journal of Tissue Engineering and Regenerative Medicine, Volume 11, Issue 7, with paper "M Mattioli - Belmonte, C De Maria, C Vitale - Brovarone, F Baino, M Dicarlo, G Vozzi, Pressure-activated microsyringe (PAM) fabrication of bioactive glass-poly(lactic-co-glycolic acid) composite scaffolds for bone tissue regeneration"

#### ADDITIONAL INFORMATION

##### Relevant publications

- Vozzi, G., Flaim, C., Ahluwalia, A., & Bhatia, S. (2003). Fabrication of PLGA scaffolds using soft lithography and microsyringe deposition. *Biomaterials*, 24(14), 2533-2540.
- Groll, J., Boland, T., Blunk, T., Burdick, J. A., Cho, D. W., Dalton, P. D., ... & Malda, J. (2016). Biofabrication: reappraising the definition of an evolving field. *Biofabrication*, 8(1), 013001.
- Urciuolo, A., Quarta, M., Morbidoni, V., Gattazzo, F., Molon, S., Grumati, P., ... & Bonaldo, P. (2013). Collagen VI regulates satellite cell self-renewal and muscle regeneration. *Nature communications*, 4(1), 1-13.
- Moroni, L., Boland, T., Burdick, J. A., De Maria, C., Derby, B., Forgacs, G., ... & Vozzi, G. (2018). Biofabrication: a guide to technology and terminology. *Trends in biotechnology*, 36(4), 384-402.
- Ciardelli, G., Chiono, V., Vozzi, G., Pracella, M., Ahluwalia, A., Barbani, N., ... & Giusti, P. (2005). Blends of poly( $\epsilon$ -caprolactone) and polysaccharides in tissue engineering

applications. *Biomacromolecules*, 6(4), 1961-1976.

- Chiono, V., Pulieri, E., Vozi, G., Ciardelli, G., Ahluwalia, A., & Giusti, P. (2008). Genipin-crosslinked chitosan/gelatin blends for biomedical applications. *Journal of Materials Science: Materials in Medicine*, 19(2), 889-898.
- Vozi, G., Previti, A., De Rossi, D., & Ahluwalia, A. R. T. I. (2002). Microsyringe-based deposition of two-dimensional and three-dimensional polymer scaffolds with a well-defined geometry for application to tissue engineering. *Tissue engineering*, 8(6), 1089-1098.
- Miao, S., Castro, N., Nowicki, M., Xia, L., Cui, H., Zhou, X., ... & Zhang, L. G. (2017). 4D printing of polymeric materials for tissue and organ regeneration. *Materials Today*, 20(10), 577-591.
- Rosellini, E., Cristallini, C., Barbani, N., Vozi, G., & Giusti, P. (2009). Preparation and Characterization of alginate/gelatin Blend Films for Cardiac Tissue Engineering. *Journal of biomedical materials research. Part A*, 91(2), 447-453.
- Vozi, G., Flaim, C. J., Bianchi, F., Ahluwalia, A., & Bhatia, S. (2002). Microfabricated PLGA scaffolds: a comparative study for application to tissue engineering. *Materials Science and Engineering: C*, 20(1-2), 43-47.
- Resta, V., Novelli, E., Vozi, G., Scarpa, C., Caleo, M., Ahluwalia, A., ... & Galli - Resta, L. (2007). Acute retinal ganglion cell injury caused by intraocular pressure spikes is mediated by endogenous extracellular ATP. *European Journal of Neuroscience*, 25(9), 2741-2754.
- Forte, G., Carotenuto, F., Pagliari, F., Pagliari, S., Cossa, P., Fiaccavento, R., ... & Di Nardo, P. (2008). Criticality of the biological and physical stimuli array inducing resident cardiac stem cell determination. *Stem Cells*, 26(8), 2093-2103.
- Mattioli-Belmonte, M., Vozi, G., Whulanza, Y., Seggiani, M., Fantauzzi, V., Orsini, G., & Ahluwalia, A. (2012). Tuning polycaprolactone-carbon nanotube composites for bone tissue engineering scaffolds. *Materials Science and Engineering: C*, 32(2), 152-159.
- Sartori, S., Rechichi, A., Vozi, G., D'acunto, M., Heine, E., Giusti, P., & Ciardelli, G. (2008). Surface modification of a synthetic polyurethane by plasma glow discharge: Preparation and characterization of bioactive monolayers. *Reactive and Functional Polymers*, 68(3), 809-821.
- Pulieri, E., Chiono, V., Ciardelli, G., Vozi, G., Ahluwalia, A., Domenici, C., ... & Giusti, P. (2008). Chitosan/gelatin blends for biomedical applications. *Journal of Biomedical Materials research. Part A*, 86(2), 311-322.
- Bonfiglio, A., De Rossi, D., Kirstein, T., Locher, I. R., Mameli, F., Paradiso, R., & Vozi, G. (2005). Organic field effect transistors for textile applications. *IEEE Transactions on Information Technology in biomedicine*, 9(3), 319-324.
- Tirella, A., Orsini, A., Vozi, G., & Ahluwalia, A. R. T. I. (2009). A phase diagram for microfabrication of geometrically controlled hydrogel scaffolds. *Biofabrication*, 1(4), 045002.
- Vozi, G., Corallo, C., Carta, S., Fortina, M., Gattazzo, F., Galletti, M., & Giordano, N. (2014). Collagen - gelatin - genipin - hydroxyapatite composite scaffolds colonized by human primary osteoblasts are suitable for bone tissue engineering applications: In vitro evidences. *Journal of biomedical materials research Part A*, 102(5), 1415-1421.
- Ciardelli, G., Gentile, P., Chiono, V., Mattioli - Belmonte, M., Vozi, G., Barbani, N., & Giusti, P. (2010). Enzymatically crosslinked porous composite matrices for bone tissue regeneration. *Journal of Biomedical Materials Research Part A: An Official Journal of The Society for Biomaterials, The Japanese Society for Biomaterials, and The Australian Society for Biomaterials and the Korean Society for Biomaterials*, 92(1), 137-151.
- Giannessi, E., Coli, A., Stornelli, M. R., Miragliotta, V., Pirone, A., Lenzi, C., ... & Giorgetti, M. (2014). An autologously generated platelet-rich plasma suturable membrane may enhance peripheral nerve regeneration after neurotomy in an acute injury model of sciatic nerve neurotmesis. *Journal of reconstructive microsurgery*, 30(09), 617-626.

#### Books

- Chiono V, Farè S, Netti P, Vozi G. *Biofabrication: an integrated bioengineering approach for the automated fabrication of biological structures for clinical and research applications*, 2021, Patron Editore, Collana: Gruppo Nazionale di Bioingegneria n. 40, ISBN/EAN: 9788855535281

#### Book chapters

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