

MILICA RADISIC
Curriculum Vitae

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1. GENERAL INFORMATION

1.1 CONTACT INFORMATION

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1.2 EDUCATION

Post Doctorate Harvard-MIT Division of Health Science and Technology
Massachusetts Institute of Technology 2004-2005
Advisor: Gordana Vunjak-Novakovic

Ph.D. Chemical Engineering, Massachusetts Institute of Technology 1999-2004
Doctoral thesis: "Biomimetic Approach to Cardiac Tissue Engineering"
Advisor: Robert Langer

B.Eng. Chemical Engineering, McMaster University 1996-1999
Undergraduate thesis: "Interfacial tension in polymer melts"
Advisor: Andrew Hrymak

Chemical Engineering, University of Novi Sad, Serbia 1995-1996

1.3 WORK AND TRAINING EXPERIENCE

07/2017-06/2020 Associate Chair-Research, Department of Chemical Engineering and Applied Chemistry,
University of Toronto

07/2017-current, Director Ontario-Quebec Center for Organ-on-a-Chip Engineering

07/2017-current, Visiting Professor, Faculty of Medicine, University of Novi Sad, Serbia

May 2019

04/2016-03/2022 Director, NSERC CREATE Training Program in Organ-on-a-Chip Engineering and Entrepreneurship

09/2011- current, Canada Research Chair (Tier 2)

03/2016-current, Senior Scientist, Toronto General Research Institute

07/2014-current, Professor, University of Toronto

I teach courses in Chemical and Biomedical Engineering. I direct a research program focused on engineering microenvironments for cardiovascular regeneration. We work with cardiomyocytes derived from human pluripotent stem cells and design microfabricated systems for their maturation. We are also working in the area of organ-on-a-chip engineering designing vascularized and perfusable models of human heart, liver and tumor tissue for drug discovery and safety testing. An important aspect of our research is the development of new elastic and immunomodulatory materials for the development of injectable polymer scaffolds. These materials allow us to inject scaffolds and living tissues in the body in the minimally invasive manner. They also prevent infection in situ and modulate immune response towards healing.

07/2010-06/2014 Associate Professor, University of Toronto

**07/2005-06/2010- Assistant Professor, University of Toronto
Institute of Biomaterials and Biomedical Engineering (IBBME)
Department of Chemical Engineering and Applied Chemistry**

My research program consists of several different projects that all fall under umbrella of cardiac tissue engineering and regenerative medicine. We are focused on pursuing molecular mechanisms governing the formation of contractile cardiac tissue in vitro as well as on practical strategies for treatment of myocardial infarction and heart failure through development of new biomaterials. Our work can be grouped into the following areas:

Tissue Engineering of Cardiac Patches: The key projects in this area are focused on: 1) designing advanced bioreactors for cardiac tissue engineering capable of integrating mechanical and electrical stimuli with perfusion, 2) developing strategies to engineer vascularized myocardium based on the tri-culture of key heart cell types and 3) using the engineered cardiac tissue based on cardiomyocytes derived from human embryonic stem cells and induced pluripotent stem cells as a model system for cardiac cell therapy or drug testing.

Injectable Biomaterials: Cell injection into the infarcted myocardium can result in functional improvements, but the utility of this procedure in clinical settings is hampered by the massive death and washout of the injected cells (~90%). We are working on the development of injectable hydrogels that will promote survival and localization of cardiomyocytes injected into the infarcted myocardium. The hydrogels are functionalized with specific peptides capable of promoting survival of cardiomyocytes.

Microfluidic Cell Separation: Cardiomyocytes do not have well established surface markers. The main goal of this project is to develop size and adhesion based microfluidic cell separation methods capable of fractionating cells from small samples such as human biopsies or differentiating human pluripotent stem cell cultures. The system would enable fractionation of endothelial cells, cardiomyocytes, fibroblasts and smooth muscle cells without the need for labeling.

Microfabricated Systems for Cell Culture: In vivo, multiple physical and biochemical stimuli act in concert to determine cell fate and phenotype. In order to engineer functional cardiac patches and develop advanced bioreactors we need to understand interactive effects of multiple physical stimuli. We are currently developing microfabricated cell culture systems with built-in electrodes and precisely defined topography for simultaneous application of field stimulation and contact guidance cues. These microfabricated systems serve as platforms for maturation of human pluripotent stem cell derived cardiomyocytes.

07/2004-06/2005 Post-doctoral Associate, Harvard-MIT Division of Health Science and Technology

Supervisor: Dr. Gordana Vunjak-Novakovic

Microfluidic cell separation, surface patterning via photocrosslinkable chitosan, optical mapping of electrical signal propagation in engineered heart tissue, subcutaneous implantation of PGS based channeled cardiac constructs.

01/ 2000-07/2004 Research Assistant, Department of Chemical Engineering, MIT

Supervisor: Prof. Robert Langer

Developed methods for cell seeding of porous scaffolds at physiological cell densities. Designed cell culture hardware (perfused, recirculating loops) that allows for nutrient and oxygen supply to the growing tissue by convection-diffusion. Utilized synthetic oxygen carriers (Oxygent™) in perfused tissue cultures to simulate the role of haemoglobin *in vivo*. Developed methods and set-up for cultivation of engineered myocardium in the presence of *in vivo*-like electrical stimuli. Derived mathematical model for oxygen transport in engineered tissues. Developed methods for characterization of contractile response of engineered myocardium to electrical pacing. Analytical methods: FACS, histology, immunohistochemistry, Western blot, RT-PCR, computer-based image analysis.

09/1998-07/1999 Research Assistant, Department of Chemical Engineering, McMaster University

Supervisor: Prof. Andrew Hrymak

Implemented imbedded disc retraction method (IDR) for measurement of interfacial tension in high viscosity polymer melts. Extended Newtonian model for IDR to include elastic effects. Developed a method of estimating the significance of elastic effects in measurement of interfacial tension for a given polymer pair.

09/1997-07/1998 Research Assistant, Department of Chemical Engineering, McMaster University

Research Supervisor: Prof. Robert Pelton

Synthesized defoaming agents; investigated their efficiency and mechanism of defoaming.

07-08/1995 Research Assistant Department of Material Science, Weizmann Institute of Science

Research Supervisor: Dr. Gregory Kahluzny

Prepared organic thiol SAM's on gold surfaces. Investigated metal ion binding to the end amine groups and change in oxidation state for potential application in electronic devices.

1.4 AFFILIATIONS

01/2014- current: Cardiovascular Sciences Collaborative Program

01/2011-current: Member of the **Ontario Stem Cell Initiative (OSCI), Ontario Institute of Regenerative Medicine**

07/2007- 03/2016: **Affiliated Scientist**, Toronto General Hospital Research Institute (**TGHRI**)

09/2006 –current: Member Heart & Stroke/Richard Lewar Center of Excellence in Cardiovascular Research (**HSRLCE**), University of Toronto

07/2005-06/2009: **Principal Investigator**, Advanced Regenerative Tissue Engineering Centre (**ARTEC**)
University of Toronto, Sunnybrook & Women's Hospital Health Sciences Center, Toronto

07/2005-current: Associate Member, Pediatric Regenerative Medicine Program (**PRM**)
Hospital for Sick Children, Toronto

07/2005-current: Research Collaborator Tissue Engineering Resource Center (**TERC**)
Tufts University, MIT, NIH

1.5 PROFESSIONAL REGISTRATIONS

2011-current P.Eng. License, Professional Engineers Ontario

2007-2011 Engineering Intern Training (EIT), Professional Engineers Ontario

1.6 AWARDS, HONORS AND SCHOLARSHIPS

10/1997 **ICI Canada Inc.** Scholarship for outstanding performance in Level Two Chemical Engineering, McMaster University

11/1997 **The Mabel Stoakely Scholarship**; awarded for outstanding academic achievement and leadership, McMaster University

02/1998 **CSCHE Student Paper Award** (2nd Place) “The role of defoamers in brownstock washing”

09/1998 **The Herbert A. Ricker Scholarship**; awarded for academic excellence, McMaster University

11/1998 **The Chancellor’s Gold Medal**; the highest University award for undergraduate students, awarded for academic excellence, leadership and influence, McMaster University

04/1999 **The Presidential Graduate Fellowship**; awarded by the Department of Chemical Engineering, Massachusetts Institute of Technology for exceptional record and promising future

06/1999 **The Canadian Society of Chemical Industries Merit Award**; awarded to Chemical Engineering graduate with the highest cumulative average

06/2000-06/2004 **Studenica Foundation Graduate Fellowship**

05/ 2002 **Poitras Pre-Doctoral Fellowship**; awarded for studies in biomedical engineering, MIT

07/2003 **Cambridge Science Foundation Travel Grant**

08/2007 **Early Researcher Award**; Ministry of Research and Innovation, Ontario

08/2008 **MIT Technology Review Top 35 Innovators under 35 (TR35)**

04/2009 **Breaking the Glass Ceiling Award**; Women in Science and Engineering Club, University of Toronto

01/2010 **2010’s People to Watch**; Toronto Star

04/2010 **NSERC Discovery Accelerator Supplement**

06/2010 **McMaster Arch Award** for work in Bioengineering, McMaster University Alumni Association, Recognizes McMaster's graduates within 10 years after convocation for their unique and interesting contributions to society, their local community, and to McMaster University.

06/2010 **Scientist to Watch**; named by the Scientist Magazine

01/2011 **Connaught Innovation Award**; University of Toronto

07/2011 **Young Engineer Award**; Professional Engineers Ontario, Ontario Society of Professional Engineering

11/2011 **Canada Research Chair Functional Cardiovascular Tissue Engineering (Tier 2)**

06/2012 **Engineers Canada Young Engineer Award**

07/2012 **McLean Award, University of Toronto**

02/2013 **Queen Elizabeth II Diamond Jubilee Medal**

05/2013 **University of Toronto Inventor of the Year Award** (with Axel Guenther, Liang Leng, Arianna McAllister, Andrew Woollard and Boyang Zhang)

02/2014 **E.W.R. Steacie Memorial Fellowship**, National Science and Engineering Research Council of Canada

09/2014 **Royal Society of Canada**, member of The College of New Scholars, Artists and Scientists

03/2015 **Fellow of the American Institute for Medical and Biological Engineering (AIMBE)**

10/2015 **Hatch Innovation Award**, Canadian Society of Chemical Engineers

06/2016 **Fellow, Canadian Academy of Engineering**

05/2017 **Dr. E. R. Smith Lectureship in Cardiovascular Research Award**, Libin Cardiovascular Institute, University of Calgary

08/2017 **Top 150 alumni**, as an outstanding **McMaster Engineering** Graduate

11/2017 **Fellow, Royal Society of Canada (RSC), Academy of Science, Applied Sciences and Engineering Division**

02/2018 **Steacie Prize for Natural Sciences**, Trustees of the E.W.R. Steacie Memorial Fund

03/2018 **YWCA Toronto Women of Distinction Award, Honouring Women in Canada**

09/2018 **Fellow Tissue Engineering and Regenerative Medicine Society**

04/2019 **Engineering Medal for Research and Development, Ontario Professional Engineers**

2. PUBLICATIONS and TECH TRANSFER (h-index 55, 10789 citations by Google Scholar):

2.1 REFEREED JOURNAL PAPERS

Published: (after line at the University of Toronto)

1. Rodic M, (maiden name) and Hrymak AN: "The modified disc retraction method for measurement of interfacial tension in polymer melts", *Rheologica Acta*, 40:339-349, 2001
2. Radisic M, Euloth M, Yang L, Langer R, Freed LE, Vunjak-Novakovic G: "High density seeding of myocyte cells for cardiac tissue engineering", *Biotechnology & Bioengineering* 82: 403-414, 2003

3. Radisic M , Yang L, Boublik J, Langer R, Freed LE, Vunjak-Novakovic G: “Medium perfusion enables cultivation of compact and contractile cardiac tissue”, *American Journal of Physiology-Heart and Circulatory Physiology* 286: H507-516, 2004
4. Radisic M , Park H, Shin H, Consi T, Schoen FJ, Freed LE, Vunjak-Novakovic G: “Functional assembly of engineered myocardium by electrical stimulation of cardiac myocytes cultured on scaffolds”, *Proceedings of the National Academy of Sciences of the United States of America*, 101:18129-18134, Dec 28, 2004 (Cover article)
5. Radisic M , Deen WM, Langer R, Vunjak-Novakovic G: “Mathematical model of oxygen distribution in engineered cardiac tissue with parallel channel array perfused with culture medium containing oxygen carriers”, *American Journal of Physiology-Heart and Circulatory Physiology*, 288: H1278-H1289, 2005
6. Boublik J, Park H, Radisic M, Tognana E, Chen F, Pei M, Vunjak-Novakovic G, Freed LE: “Mechanical function and remodeling of hybrid cardiac constructs made from heart cells, fibrin, and a biodegradable, elastomeric knitted fabric”, *Tissue Engineering*, 11: 1122-1132, 2005
7. Park H, Radisic M, Lim JO, Chung BH, Vunjak-Novakovic G: “A novel composite scaffold for cardiac tissue engineering”, *In Vitro Cell and Developmental Biology-Animal*, 41:188-196, 2005
8. Radisic M , Malda J, Epping E, Geng W, Langer R, Vunjak-Novakovic G: “Oxygen gradients correlate with cell density and cell viability in engineered cardiac tissue”, *Biotechnology & Bioengineering*, 93:332-343, 2006
9. Radisic M , Park H, Chen F, Wang Y, Dennis R, Langer R, Freed LE, Vunjak-Novakovic G: “Biomimetic approach to cardiac tissue engineering: Oxygen carriers in channeled scaffolds”, *Tissue Engineering*, 12: 2077-91, 2006 (Cover article)
10. Murthy SK, Sethu P, Vunjak-Novakovic G, Toner M, Radisic M (corresponding author): “Size-Based Microfluidic Enrichment of Neonatal Rat Cardiac Cell Populations”, *Biomedical Microdevices*, 8:231-237, 2007
11. Karp JM, Yeo Y, Geng W, Cannizarro C, Jan K, Kohane DS, Vunjak-Novakovic G, Langer RS, Radisic M (corresponding author): “A Photolithographic Method to Create Cellular Micropatterns”, *Biomaterials* 27:4755-64, 2006
12. Yeo Y, Geng, W, Ito T, Kohane DS, Burdick JA, Radisic M (corresponding author): “A photocrosslinkable hydrogel for myocyte cell culture and injection”, *Journal of Biomedical Materials Research Part B*, 81:312-322, 2006
13. Plouffe BD, Njoka D, Harris J, Liao J, Horick NK, Radisic M, Murthy SK: “Peptide-Mediated Selective Adhesion of Smooth Muscle and Endothelial Cells in Microfluidic Shear Flow”, *Langmuir*, 23:5050-5055, 2007
14. Khademhosseini A, Eng G, Yeh J, Kucharczyk PA, Langer R, Vunjak-Novakovic G, Radisic M (corresponding author): “Microfluidic patterning for fabrication of contractile cardiac organoids”, *Biomedical Microdevices*, 9:149-157, 2007

15. Au HTH, Cheng I, Chowdhury MF, Radisic M “Interactive effects of surface topography and pulsatile electrical field stimulation on fibroblasts and cardiomyocytes”, *Biomaterials*, 28: 4277-93, 2007
16. Radisic M, Park H, Salazar-Lazaro JE, Wang Y, Langer R, Freed LE, Vunjak-Novakovic G: “Pretreatment of synthetic elastomeric scaffolds by cardiac fibroblasts improves engineered heart tissue”, *Journal of Biomedical Materials Research Part A*, 86:713-724, 2008
17. Wallis MC, Yeger H, Cartwright L, Shou Z, Radisic M, Haig J, Suoub M, Farhat WA: “Feasibility study of a novel urinary bladder bioreactor” *Tissue Engineering*, 14:339-348, 2008
18. Radisic M, Marsano A, Maidhof R, Wang Y, Vunjak-Novakovic G. “Cardiac tissue engineering using perfusion bioreactor systems” , *Nature Protocols*, 3:719-38, 2008
19. Plouffe BD, Radisic M, Murthy SK: “Microfluidic Depletion of Endothelial Cells, Smooth Muscle Cells, and Fibroblasts from Heterogeneous Suspensions”, *Lab-on-a-Chip*, 3:462-472, 2008
20. Shen Y-H, Shoichet M, Radisic M (corresponding author): “Vascular endothelial growth factor immobilized in collagen scaffold promotes proliferation and penetration of endothelial cells”, *Acta Biomaterialia*, 4:477-489, 2008
21. Iyer RK, Chiu L, Radisic M (corresponding author): “Microfabricated poly(ethylene glycol) templates enable rapid screening of tri-culture conditions for cardiac tissue engineering”, *Journal of Biomedical Materials Research Part A*, 89A:616-31, 2009
22. Radisic M (co-corresponding author), Fast VG, Sharifov OF, Iyer RK, Park H, Vunjak-Novakovic G: “Optical mapping of impulse propagation in engineered cardiac tissue”, *Tissue Engineering Part A*, 15:851-60, 2009
23. Brown MA, Iyer RK, Radisic M (corresponding author): “Pulsatile perfusion bioreactor for cardiac tissue engineering”, *Biotechnology Progress*, 24:907-920, 2008
24. Park H, Bhalla R, Saigal R, Radisic M, Watson N, Langer R, Vunjak-Novakovic G. “Effects of electrical stimulation in C2C12 muscle constructs”, *Journal of Tissue Engineering and Regenerative Medicine* 2:279-287, 2008
25. Tandon N, Cannizzaro C, Chao PH, Maidhof R, Marsano A, Au HT, Radisic M, Vunjak-Novakovic G. “Electrical stimulation systems for cardiac tissue engineering”, *Nature Protocols*, 4:155-173, 2009
26. Heidi Au HT, Cui B, Chu ZE, Veres T, Radisic M. (co-corresponding author): “Cell culture chips for simultaneous application of topographical and electrical cues enhance phenotype of cardiomyocytes” , *Lab-on-a-Chip*, 9:564-575, 2009
27. Iyer RK, Chui J, Radisic M. (corresponding author): “Spatiotemporal tracking of cells in tissue-engineered cardiac organoids.”, *Journal of Tissue Engineering and Regenerative Medicine*, 3:196-207, 2009
28. Plouffe BD, Brown MA, Iyer RK, Radisic M (co-corresponding author), Murthy SK: “Controlled Capture

and Release of Cardiac Fibroblasts using Peptide-Functionalized Alginate Gels in Microfluidic Channels”, *Lab-on-a-Chip*, 9:1507-10, 2009

29. Green JV, Radisic M, Murthy SK: “Deterministic Lateral Displacement as a Means to Enrich Large Cells for Tissue Engineering”, *Analytical Chemistry*, 81:9178-9182, 2009
30. Chiu LLY, Radisic M (corresponding author): “Scaffolds with covalently immobilized VEGF and Angiopoietin-1 for vascularization of engineered tissues”, *Biomaterials*, 31:226-241, 2010
31. Song H, Yoon C, Kattaman SJ, Dengler J, Thavaratnam T, Gewarges M, Masse S, Nanthakumar K, Rubart M, Keller GM, Radisic M (co-corresponding author), Zandstra P: “Interrogating functional integration between injected pluripotent stem cell derived-cells and surrogate cardiac tissue”, *Proceedings of the National Academy of Sciences of the United States of America*, 107:3329-3334, 2010
32. Chiang K, Chowdhury MF, Iyer RK, Stanford WL, Radisic M (co-corresponding author): “Engineering surfaces for site specific vascular differentiation of mouse embryonic stem cells”, *Acta Biomaterialia*, 6:1904-16, 2010
33. Rask F, Dallabrida SM, Ismail NS, Amoozgar Z, Yeo Y, Rupnick M, Radisic M. (corresponding author): “Photocrosslinkable chitosan modified with angiopoietin-1 peptide, QHREDGS, promotes survival of neonatal rat heart cells”, *Journal of Biomedical Materials Research Part A*, 95:105-117, 2010
34. Bhana B and Iyer RK, Chen WLK, Zhao R, Sider KL, Simmons CA, Radisic M (corresponding author): “Influence of Substrate Stiffness on the Phenotype of Heart Cells”, *Biotechnology & Bioengineering*, 105:1148-1160, 2010 (cover in June 2011)
35. Chiu LLY, Weisel RD, Li R-K, Radisic M (co-corresponding author): “Defining conditions for covalent immobilization of angiogenic growth factors onto scaffolds for tissue engineering”, *Journal of Tissue Engineering and Regenerative Medicine*, 5:69-84, 2011
36. Rask F, Mihic A, Reis L, Dallabrida SM, Ismail NS, Sider K, Simmons CA, Rupnick MA, Weisel RD, Li R-K, Radisic M (corresponding author): “Hydrogels modified with QHREDGS peptide support heart cell survival in vitro and after sub-cutaneous implantation”, *Soft Matter*, 6:5089-5099, 2010
37. Dengler J, Song H, Massé S, Wood G, Nanthakumar K, Zandstra PW and Radisic M (corresponding author): “An in vitro model system for cardiac stem cell therapy”, *Biotechnology & Bioengineering*, 108: 704-719, 2011
38. Miyagi Y and Chiu LLY, Cimini M, Weisel RD, Radisic M (co-corresponding author), Li R-K “Biodegradable collagen patch with covalently immobilized VEGF improves right ventricular repair”, *Biomaterials*, 32:1280-90, 2011
39. Song H, Zandstra P, Radisic M (corresponding author): “Engineered heart tissue model of diabetic myocardium.”, *Tissue Engineering*, (13-14):1869-78, 2011
40. Odedra D, Shoichet M, Radisic M (co-corresponding author): “Endothelial Cells Guided by Immobilized Gradients of Vascular Endothelial Growth Factor on Porous Collagen Scaffolds”, *Acta Biomaterialia*, 7:3027-35, 2011
41. Chiu LLY, Iyer RK, Radisic M (corresponding author): “Biphasic electrical field stimulation aids in tissue engineering of multi-cell type cardiac organoids”, *Tissue Engineering Part A*, 17:1465-77, 2011

42. Chiu LLY, Radisic M (corresponding author): "Controlled release of thymosin β 4 using collagen-chitosan composite hydrogels promotes epicardial cell migration and angiogenesis", *Journal of Controlled Release*, 155:376-85, 2011
43. Reis LA, Chiu LL, Liang Y, Hyunh K, Momen A, Radisic M (corresponding author): "A peptide-modified chitosan-collagen hydrogel for cardiac cell culture and delivery", *Acta Biomaterialia*, 8:1022-36, 2012
44. Boudou T, Legant WR, Mu A, Borochin MA, Thavandiran N, Radisic M, Zandstra PW, Epstein JA, Margulies KB, Chen CS: "A Microfabricated Platform to Measure and Manipulate the Mechanics of Engineered Cardiac Microtissues", *Tissue Engineering Part A*. (9-10):910-9, 2012
45. Chiu LLY, Janic K, Radisic M (corresponding author): "Engineering of oriented myocardium on three-dimensional micropatterned collagen-chitosan hydrogel", *International Journal of Artificial Organs*, 35:237-250, 2012
46. Iyer RK, Odedra D, Vunjak-Novakovic G, Radisic M (corresponding author): "VEGF Secretion by Non-Myocytes Modulates Connexin-43 Levels in Cardiac Organoids", *Tissue Engineering Part A*, 18:1771-83, 2012
47. Zhang B, Green JV, Murthy SK, Radisic M (corresponding author): "Label-free enrichment of functional cardiomyocytes using microfluidic deterministic lateral flow displacement", *PLoS One* 2012;7(5):e37619. Epub 2012 May 29.
48. Leng L, McAllister A, Zhang B, Radisic M, Günther A: "Mosaic hydrogels: One-step formation of multidimensional, multiscale soft materials", *Advanced Materials*, 24:3650-8, 2012 (cover article)
49. Al-Haque S, Miklas J, Feric N, Chiu LLY, Chen WLK, Simmons CA, Radisic M (corresponding author): "Substrate stiffness and topography simultaneously influence cardiac fibroblast contact guidance on hydrogels", *Macromolecular Bioscience*, 12:1342-53, 2012 (cover article)
50. Iyer TK, Chiu LLY, Vunjak-Novakovic G, Radisic M (corresponding author): "Sequential Preculture of Non-Myocytes Improves Formation of Vascular-Like Cords in Engineered Cardiac Tissues", *Biofabrication* 4:035002, 2012
51. Chiu LLY, Reis LA, Momen A, Radisic M (corresponding author): "Controlled release of thymosin β 4 from injected collagen-chitosan hydrogels promotes angiogenesis after myocardial infarction in rats", *Regenerative Medicine*, 7:523-33, 2012
52. Kang K, Sun L, Xiao Y, Li S-H, Wu Y, Yau TM, Weisel RD, Radisic M, Li R-K : "Aged Human Cells Rejuvenated by Cytokine-Enhancement of Biomaterials for Surgical Ventricular Restoration", *Journal of the American College of Cardiology*, 20:2237-49, 2012
53. Chiu LLY, Montgomery M, Liang Y, Liu H, Radisic M (corresponding author): "Perfusable branching microvessel bed for vascularization of engineered tissues", *Proceedings of the National Academy of Sciences of the United States of America*, 109:E3414-23, 2012
54. Martin C, Sofla AYN, Zhang B, Nunes SS, Radisic M (corresponding author): "Fusible core molding for fabrication of branched three-dimensional perfusable microvessels for vascular tissue engineering", *International Journal of Artificial Organs*, 36:159-65, 2013
55. Sofla A, Cirkovic B, Hsieh A, Miklas JW, Filipovic N, Radisic M (corresponding author): "Enrichment

of live unlabelled cardiomyocytes from heterogeneous cell populations using manipulation of cell settling velocity by magnetic field”, *Biomicrofluidics* 7, 014110, 2013; <http://dx.doi.org/10.1063/1.4791649>

56. Nunes SS, Miklas JW, Xiao Y, Zhang B, Hsieh A, Thavandiran N, Jiang J, Masse S, Ggaliardi M, Laflamme MA, Nanthakumar K, Gross G, Keller G, Radisic M (corresponding author): “Biowire: a platform for maturation of human pluripotent stem cell derived cardiomyocytes”, *Nature Methods* 10:781-787, 2013 (*On July 03rd, 2013 the article ranked in the 98 percentile of a sample of 10,000 of the 31,524 tracked articles of a similar age in all journals and in the 95 percentile (ranked 3rd) of the 46 tracked articles of a similar age in Nature Methods*)
57. Redpath CJ, Bou Khalil M, Drozdal G, Radisic M, McBride HM: “Mitochondrial hyperfusion during oxidative stress is coupled to a dysregulation in calcium handling within a C2C12 cell model”, *PLoS One* 8;8(7):e69165, 2013 doi: 10.1371/journal.pone.0069165
58. Zhang B, Peticone C, Murthy S, Radisic M (corresponding author): “A standalone perfusion platform for drug testing in microvessel networks “, *Biomicrofluidics* 7, 044125 , 2013; <http://dx.doi.org/10.1063/1.4818837>
59. Miklas JW, Dallabrida SM, Reis LA, Ismail N, Rupnick M, Radisic M (corresponding author): “QHREDGS enhances tube formation, cell metabolism and cell survival of human umbilical cord endothelial cells in collagen-chitosan hydrogels” *PLoS One*, 8(8):e72956, 2013 doi:10.1371/journal.pone.0072956
60. Xiao Yun, Zhang B, Liu H, Miklas JW, Gagliardi M, Pahnke A, Thavandiran N, Sun Y, Simmons CA, Keller G, Radisic M (corresponding author): “Microfabricated perfusable cardiac biowire: a platform that mimics native cardiac bundle”, *Lab-on-a-Chip* 14:869-82, 2014 (cover article)
61. Thavandiran N, Dubois D, Mikryukov A, Massé S, Beca B, Simmons CA, Deshpande V, McGarry P, Chen CS, Nanthakumar K, Keller G, Radisic M (co-corresponding author), Zandstra PW: “Design criteria-guided formulation of pluripotent stem cell-derived cardiac microtissues”, *Proceedings of the National Academy of Sciences of the United States of America* 110(49):E4698-707. doi: 10.1073/pnas.1311120110 , 2013
62. Liu H, Wen J, Xiao Y, Liu J, Hopyan S, Radisic M, Simmons CA, Sun Y : “In situ mechanical characterization of the cell nucleus by atomic force microscopy”, *ACS Nano*, 8:3821-8, 2014
63. Miklas JW, Nunes SS, Pahnke A, Sofla A, Radisic M: “Bioreactor for modulation of cardiac microtissue phenotype by combined mechanical and electrical stimulation” *Biofabrication*, 6(2):024113. doi: 10.1088/1758-5082/6/2/024113, 2014
64. Traister A, Li M, Aafaqi S, Lu M, Arab S, Radisic M, Guido F, Sherret J, Verma S, Slorach C, Mertens L, Hui W, Hannigan G, Maynes JT, Coles JG: “Rescue of disrupted mechanotransduction as a new therapeutic strategy in human dilated cardiomyopathy” *Nature Communications*, Sep 11;5:4533. doi: 10.1038/ncomms5533, 2014
65. Dang LT, Feric N, Laschinger C, Chang WY, Zhang B, Wood G, Stanford WL, Radisic M (corresponding author):” A biomaterials-based approach to inhibit apoptosis of human induced pluripotent stem cells during expansion in a defined culture using angiopoietin-1 derived peptide QHREDGS”, *Biomaterials*, 35:7786-99, 2014
66. Feric N, Cheng C, Coh C, Yang L, Di Tizio V, Radisic M (corresponding author): “QHREDGS promotes osteoblast differentiation, bone matrix deposition and mineralization”, *RSC Biomaterials Science*, 2,

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33. Miklas J, Radisic M, Thavandiran N, Vasconcelos S, Xiao Y, Zhang B, Zhao Y: “COMPOSITIONS AND METHODS FOR MAKING AND USING THREE-DIMENSIONAL TISSUE SYSTEMS” US Patent Number 10,254,274 issued April 9, 2019
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35. Zhao Y, Radisic M: “Methods for atrial or ventricular specification of cardiac tissues”, US Provisional Patent Filed, Dec 2018

2.7 START-UPS

Co-founder of **TARA Biosystems**, New York, NY. August 2014 . VC funded start-up focused on model systems for drug testing. Raised \$11.75M up to date.

3. PROFESSIONAL ACTIVITIES

3.1 CONFERENCE PRESENTATIONS-ABSTRACTS (name of presenter underlined)

Radisic M: ” Biomimetic approach to the tissue engineering of functional myocardium”, “Tissue Engineering” conference, Cold Spring Harbor Laboratories, New York, Nov 21-24, 2002 (oral)

Vunjak-Novakovic G, Radisic M, Park H, Boublik J, Freed LE: “Biomimetic Approach to the Tissue Engineering of Functional Myocardium”, 2003 NASA Cell Science Conference, Houston, TX, February 21, 2003 (oral)

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Yeo Y, Geng W, **Radisic M**: “A simple method for fabrication of micropatterned cell arrays using photocrosslinkable chitosan.” Nov 28-Dec 02, Boston, MA (poster)

Yeo Y, Geng W, Burdick J, **Radisic M**: “Injectable hydrogel blend for regeneration of infarcted myocardium” 2005 MRS Fall Meeting, Nov 28-Dec 02, Boston, MA (poster)

Park H, Saigal R, Bhalla R, **Radisic M**, Watson N, Langer R, Vunjak-Novakovic G: “Electrical field stimulation enhanced excitation-contraction coupling in engineered muscle constructs: effects of voltage and frequency” 2005 MRS Fall Meeting, Nov 28-Dec 02, Boston, MA (poster)

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Park H, **Radisic M**, Peterson L, Langer R, Freed L, Vunjak-Novakovic G: “Cardiac differentiation of human bone marrow derived mesenchymal stem cells (HMSC) by cultivation on a three-dimensional scaffold with electrical stimulation” International Society for Stem Cell Research, 2005, San Francisco, CA . (poster)

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Radisic M, Park H, Langer R, Freed LE, Vunjak-Novakovic G: “Bioreactors with electrical stimulation for functional tissue engineering of myocardium”, 2005 BMES Annual Meeting, Sept 28-Oct 01 Baltimore, MD (oral)

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Iyer RK and **Radisic M**: “Microfabricated Poly(Ethylene Glycol) Templates for Cell Culture in Cardiac Tissue Engineering” 28th Annual International Society for Heart Research- American Section Meeting, June 14-16, 2006 Toronto, ON (poster)

Brown M, Iyer RK, **Radisic M**: “Pulsatile Perfusion Bioreactors Improve Differentiation of Engineered Cardiac Tissue” 2006 BMES, Annual Meeting, Oct 11-14, Chicago, IL (oral)

Iyer RK, Chiu L, **Radisic M**: “Engineering Cardiac Organoids Via Microfabricated Poly(Ethylene Glycol) Templates” 2006 BMES, Annual Meeting, Oct 11-14, Chicago, IL (poster)

Iyer RK, Chiu L, **Radisic M**: “Novel microfabricated PEG templates for rapid screening of engineered organoids” IBBME Scientific Day, University of Toronto, June 07, 2006 (oral)

Murthy SK, Plouffe BD, **Radisic M**: “Surface Engineering in Microfluidic Devices for the Isolation of Smooth Muscle Cells and Endothelial Cells” 2007 Society for Biomaterials Annual Meeting, Chicago, IL. April 20, 2007 (oral)

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Au HTH, Cheng I, Chowdhury MF, **Radisic M**: “Interactive effects of contact guidance and pulsatile electrical field stimulation on fibroblasts and cardiomyocytes” IBBME Scientific Day, University of Toronto, June 08, 2007 (oral)

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Au HTH, Cheng I, Chowdhury MF, **Radisic M**: “Interactive effects of contact guidance and pulsatile electrical field stimulation on fibroblasts and cardiomyocytes” 26th Annual Canadian Biomaterials Society Meeting, May 25-26, 2007, London, ON (poster)

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Dengler J, Zandstra P, **Radisic M**: "An *in vitro* model system for cardiac stem cell therapy" 2008 ISSCR Annual Meeting, June 11-14, Philadelphia, PA (poster)

Chowdhury MF, Stanford WL, **Radisic M**: "Site-specific patterned differentiation of murine embryonic stem cells to vascular cells" 2008 ISSCR Annual Meeting, June 11-14, Philadelphia, PA (oral)

Song H, Dengler J, **Radisic M**, Zandstra P: "Defining conditions for the efficient integration of pluripotent stem cell-derived cardiogenic cells into engineered heart tissue (EHT)" 2008 Stem Cell Network Annual Meeting, Nov 2008 (oral and poster)

Miyagi Y, Chiu L, Cimini M, Kitagawa A, Weisel RD, **Radisic M**, Li R-K: "Biodegradable Collagen Patch with Covalently Bound VEGF Improves Right Ventricular Repair" American Heart Association Scientific Sessions 2008, November 8-12, 2008, New Orleans, LA. (oral)

Chiu LLY and **Radisic M**: "Scaffolds Covalently Immobilized with VEGF and Angiopoietin-1 to Promote Angiogenesis in Engineered Cardiac Tissues." AIChE Annual Meeting 2008, November 16-21, 2008, Philadelphia, PA. (oral)

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Brown MA, Murthy SK, **Radisic M**: "Characterization of Microfluidic Devices for Cell Separation via Adhesion to Peptide-Functionalized Surfaces", AIChE Annual Meeting 2008, November 16-21, 2008, Philadelphia, PA. (oral)

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Green JV, Plouffe BD, **Radisic M**, Murthy SK : "Effect of Microchannel Geometry in a Cell-Affinity Chromatography Process" 23rd International Symposium on Microscale Bioseparations, Boston, MA. February 4, 2009.(poster)

Plouffe BD, Brown MA, **Radisic M**, Murthy SK: "Capture and Release of Cardiac Fibroblasts in Microfluidic Devices using Peptide-Functionalized Alginate Gels." Materials Research Society Spring 2009 National Meeting, San Francisco, CA. April 15, 2009 (oral)

Green JV, **Radisic M**, Murthy SK: "Peptide-Functionalized Surfaces in Microfluidic Devices for Cell Separation by Negative Selection." Materials Research Society Spring 2009 National Meeting, San Francisco, CA. April 15, 2009 (oral)

Rask F, Radisic M: "An Injectable hydrogel for the site-specific delivery of cardiomyocytes to the heart" (poster) IBBME Scientific Day, May 14, 2009 (poster)

Chiu LLY, Radisic M: "Scaffolds Covalently Immobilized with VEGF and Angiopoietin-1 to Promote Angiogenesis in Engineered Cardiac Tissues" IBBME Scientific Day, May 14, 2009(poster)

Odedra D, Radisic M, Shoichet M: "Biomaterials with Growth Factor Gradients for Cardiac Tissue Engineering" IBBME Scientific Day, May 14, 2009 (poster)

Chiu LLY and **Radisic M**: "Scaffolds Immobilized with VEGF and Angiopoietin-1 to Create Cardiovascular Grafts. 8th World Congress of Chemical Engineering, August 23-27, 2009, Montreal, QC (oral)

Chiu LLY, **Radisic M**: "Scaffolds covalently immobilized with VEGF and Angiopoietin-1 to promote angiogenesis in engineered cardiac tissues" Heart and Stroke Richard Lewar Centre of Excellence Scientific Day April 23, 2009 (poster) *Lorraine was one of 5 finalists of the poster competition. Total of 43 posters were presented.

Dengler J, Zandstra P, **Radisic M**: "An in vitro model system for cardiac cell therapy" Heart and Stroke Richard Lewar Centre of Excellence Scientific Day April 23, 2009 (poster)

Rask F, **Radisic M**: "An injectable hydrogel for the site-specific delivery of cardiomyocytes to the heart" Heart and Stroke Richard Lewar Centre of Excellence Scientific Day April 23, 2009 (poster)

Green JV, Plouffe BD, **Radisic M**, Murthy SK: "Microfluidic Cell Separation - Applications & Challenges in Tissue Engineering." Gordon Conference on Physics & Chemistry of Microfluidics, Lucca, Italy. June 30-July 2, 2009. (poster)

Green JV, **Radisic M**, Murthy SK: "Deterministic Lateral Displacement as a Means to Enrich Large Cells for Tissue Engineering" 2009 Annual Meeting of AIChE, Nov 11, 2009, Nashville, TN (oral)

Plouffe BD, Brown MA, **Radisic M**, Murthy SK: "Capture and Release of Cardiac Fibroblasts in Microfluidic Devices Using Peptide-Functionalized Alginate Gels" 2009 Annual Meeting of AIChE, Nov 10, 2009, Nashville, TN (oral)

Chiu LLY, Chiang K, Stanford WL and **Radisic M**: "Covalently Immobilized Growth Factors for Control of Progenitor Cell Differentiation and Vascularization of Engineered Tissues" Materials Research Society Annual Meeting, November 30 - December 4, 2009, Boston, MA (oral)

Song H, Yoon C, Kattman SJ, Dengler J, Masse S, Thavaratnam T, Gewargues M, Nanthakumar K, Keller GM, Rubart M, **Radisic M**, Zandstra PW: "Interrogating functional integration between injected cells and surrogate cardiac tissue", Stem Cell Network Annual General Meeting. November 1-4, 2009, Montreal, QC, Canada (poster)

Song H, Yoon C, Kattman SJ, Dengler J, Masse S, Thavaratnam T, Gewargues M, Nanthakumar K, Keller GM, Rubart M, **Radisic M**, Zandstra PW: "Engineered heart tissue: an in vitro model system for cardiac disease and stem cell therapy" Cardiac Discussion Group, McEwan Centre, February 11th, 2010 (oral)

Chiu LLY, Miyagi Y, Cimini M, Weisel RD, Li R-K, **Radisic M**: "Scaffolds Immobilized with VEGF and Angiopoietin-1 to Create Cardiovascular Grafts". Cardiac Discussion Group, McEwan Centre, February 25th, 2010 (oral)

Chiu L, Chiang K, Chowdhury K, Stanford WL, **Radisic M**: "Covalently Immobilized Growth Factors Enable Scaffold Vascularization and Site-specific Vascular Progenitor Differentiation" Regenerative Medicine: Advancing to Next Generation Therapies, The Annual Hilton Head Workshop, March 10-14, 2010 (oral)

Song H, Dengler J, Yoon C, Masse S, Nanthakumar K, Keller G, Zandstra P, **Radisic M**: "Engineered heart tissue enables interrogation of regenerative potential of injected pluripotent stem cells and their derivatives" Society for Biological Engineering's Second International Conference on Stem Cell Engineering, May 02-05, 2010, Boston, MA (oral)

Iyer RK, Odedra D, Vunjak-Novakovic G, **Radisic M**. "VEGF signaling regulates phenotype and function in Precultured versus Tricultured Engineered Cardiac Tissues through changes in Cx-43." Institute of Biomaterials and Biomedical Engineering (IBBME) E. Llewellyn Thomas Scientific Day. May 19, 2010, Toronto, ON (poster, honorable mention).

Chiang CK, Stanford WL, **Radisic M**: "Site-specific differentiation of cardiovascular progenitor cells in 3d vascular constructs for cardiac tissue engineering" 2010 NSERC Create MATCH Student Symposium,

May 20-21, 2010, Toronto, ON (poster)

Odedra D, **Radisic M**, Shoichet M: "A novel platform for generation of immobilized protein gradients on biomaterials for cardiac tissue engineering." Ontario-on-a-chip and MATCH Annual Symposium. May 20-21, 2010, Toronto, ON. (Poster)

Chiu L, Chiang CK, Chowdhury MF, Stanford WL, **Radisic M**: "Covalent immobilization of growth factors for vascular tissue engineering" 93rd Canadian Chemistry Conference and Exhibition, May 29-June 02, 2010, Toronto, ON (poster)

Chiu LLY, Chiang CK, Chowdhury MF, Stanford WL, **Radisic M**: "Covalent immobilization of growth factors for vascular tissue engineering" 93rd Canadian Chemistry Conference, May 29- June 02, 2010, Toronto, ON (poster)

Odedra D, **Radisic M**, Shoichet M: "A novel platform for generation of immobilized protein gradients on biomaterials for cardiac tissue engineering." IBBME Scientific Day. May 19, 2010, Toronto, ON. (Poster)

Odedra D, **Radisic M**, Shoichet M: "A novel platform for generation of immobilized protein gradients on biomaterials for cardiac tissue engineering." The 28th Canadian Biomaterials Society Meeting. June 2-4, 2010, Kingston, ON. (Poster)

Thavandiran N, Zandstra P, **Radisic M**: "Investigating Heart Development and Disease using Engineered Heart Microtissue Bioreactors" 28th Canadian Biomaterials Society Meeting, June 02-05, 2010, Kingston, Ontario (poster)

Thavandiran N, Zandstra P, **Radisic M**: "Investigating Heart Development and Disease using Engineered Heart Microtissue Bioreactors" Ontario on a Chip/MATCH Symposium, June 2010, Toronto, Ontario (poster)

Chiang CK, Stanford WL, **Radisic M**: "Site-specific Differentiation of Cardiovascular Progenitor Cells for Cardiac Tissue Engineering" Cardiac Discussion Group Meeting, McEwan Centre, June 10, 2010, Toronto, ON (oral)

Reis L, Huynh K, **Radisic M**: "Development of a peptide modified collagen-chitosan hydrogel for the site-specific delivery of cardiomyocytes to the heart" 28th Canadian Biomaterials Society Meeting, June 4-6, 2010, Kingston, ON. (Poster).

Chiang CK, Stanford WL, **Radisic M**: "Site-specific Differentiation of Cardiovascular Progenitor Cells in 3D Vascular Constructs for Cardiac Tissue Engineering" 28th Canadian Biomaterials Society Meeting, June 02-04, 2010, Kingston ON (oral)

Song H, Zandstra PW, **Radisic M**. "Reverse of Myosin isoform conversion by insulin therapy in engineered heart tissue", October 6-9, 2010, BMES 2010, Austin, TX, USA

Radisic M: "Engineered heart tissue", Cardiovascular Seminar, American Heart Association, Scientific Sessions, November 14-16, 2010, Chicago, IL (oral)

Chiang CK, Chowdhury MF, Stanford WL, **Radisic M**: "Immobilized Growth Factors and Site- Specific Differentiation of ES-derived Vascular Progenitors" Stem Cell Network Annual Scientific Meeting, November 22-24, 2010, Calgary, AB (poster)

Iyer RK, Odedra D, Vunjak-Novakovic G, **Radisic M**. "VEGF-Cx43 Signaling Dynamics Modulate Structure and Function in Engineered Cardiac Tissues." Tissue Engineering and Regenerative Medicine International

Society (TERMIS), Orlando, FL, December 5-8, 2010 (poster, finalist).

Chiang CK, Stanford WL, **Radisic M**: "Site-specific Differentiation of Embryonic Stem Cell Derived Progenitor Cells for Cardiac Tissue Engineering" TERMIS-NA 2010 Annual Conference, December 05-08, 2010, Orlando, FL (poster)

Iyer RK, Odedra DO, Vunjak-Novakovic G, **Radisic M**: "Connexin-43 Expression in Cardiomyocytes is Transcriptionally and Translationally Regulated by VEGF/VEGFR2 Binding in Engineered Heart Tissues." IBBME Scientific Day, May 19, 2011 (oral)

Song H, **Radisic M**, Zandstra PW, "2D and 3D quantitative cellular and molecular screening test beds for myocardial infarction and cell therapy", January 22-27, 2012, Taos, New Mexico, USA (poster)

Song H, Yoon C, Fluri D, Thravandiran N, Masse S, Rubart M, Nanthakumar K, Keller G, **Radisic M**, Zandstra. "Quantitative cellular and molecular screening strategies for myocardial infarction reveal a potential cardiac regenerative therapy", ISSCR June 15-18, 2011, Toronto, Canada (poster)

Song H, Yoon C, Fluri D, Thravandiran N, Masse S, Rubart M, Nanthakumar K, Zandstra P, **Radisic M**. "Quantitative cellular and molecular screening of pluripotent stem cell derivatives in an engineered heart tissue model", June 7-10, 2011, TERMIS-EU, Granada, Spain (oral)

Zhang B, Green J, Murthy S, **Radisic M**. "Label-free size-based separation of cardiomyocytes in microfluidic system" MATCH Symposium, June 2011 (oral)

Zhang B, Green J, Murthy S, **Radisic M**. "Label-free size-based separation of cardiomyocytes in microfluidic system" IBBME Scientific Day, University of Toronto, May 19, 2011 (oral)

Chiu, LLY, Liang, Y, **Radisic, M**: "Oriented Capillary Structures for Cardiac Tissue Engineering." 2011 BMES Annual Meeting, October 12-15, 2011. Hartford, CT. (oral)

Chiu, LLY, Liang, Y, **Radisic, M**: "Oriented Capillary Outgrowths for Cardiac Tissue Engineering." IBBME Scientific Day 2011, University of Toronto, May 19, 2011. Toronto, ON. (oral)

Reis L, Chiu LLY, Liang Y, Huynh K, & **Radisic M**. "A peptide modified collagen-chitosan hydrogel for the site-specific delivery of cardiomyocytes to the heart." University of Toronto Institute of Biomaterials & Biomedical Engineering Scientific Day May 19, 2011 (Poster)

Reis L, Chiu LLY, Wu J, Momen A, Li RK, & **Radisic M**. "A bio-instructive hydrogel for cardiac regeneration." 5th Annual Regenerative Medicine Symposium, Toronto, ON, CAN, April 4-5, 2012 (Oral)

Reis L, Chiu LLY, Wu J, Momen A, Li RK, & **Radisic M**. "A peptide modified hydrogel to reduce long term effect of acute myocardial infarction." University of Toronto Institute of Biomaterials & Biomedical Engineering Scientific Day May 7, 2012 (Poster)

Reis L, Chiu LLY, Wu J, Momen A, Li RK, & **Radisic M**. "A peptide modified hydrogel for cardiac regeneration." Canadian Student Health Research Forum, Winnipeg, MB, CAN, June 13, 2012 (Poster)

Nunes SS, Miklas JW, Xiao Y, Gagliardi M, Keller G and **Radisic M**: "Electrical field stimulation maturation of human embryonic stem cell-derived cardiomyocytes". Ontario Stem Cell Network Till & McCulloch Meetings. 2012 (poster)

Nunes SS, Dang L, Gagliardi M, Keller G and **Radisic M**: "Use of human embryonic stem cell-derived

cardiomyocytes as an in vitro model of human cardiovascular hypertrophy". Personalized Medicine in the Genomics Era, 2011 (poster)

Xiao Y, **Radisic M**: "Engineering Cardiac Organoids with Microfabricated Devices" IBBME Scientific Day, May 19, 2011 (poster)

Iyer RK, Chui J, Odedra D, Chiu LLY, Vunjak-Novakovic G, **Radisic M**. Cardiac Tissue Engineering: Micro-scale Technologies and Applications. IEEE Engineering Medicine and Biology (EMBC) Nanobiomaterials Session, August 30, 2011 (oral).

Rashedi I, Wang X, Viswanathan S, **Radisic M**, Keating A: "Bone marrow mesenchymal stromal cell: the effect of environment on cardiogenic cellular reprogramming". Till & McCulloch annual meeting, April 30-May 2, 2012.

Rashedi I, Radisic M, Keating A: "characterization of bone marrow mesenchymal stromal cells undergoing cardiac lineage differentiation". 9th annual meeting of International Society for Stem Cell Research, June 15-18, 2011 (poster).

Rashedi I, **Radisic M**, Keating A: "characterization of bone marrow mesenchymal stromal cells undergoing cardiac lineage differentiation". IBBME Scientific Day, May 19, 2011 (poster).

Vasconcelos S, Xiao Y, Thavandiran N, Au H, **Radisic M**. "Microbioreactors for cardiac tissue engineering", June 7-10, 2011, TERMIS-EU, Granada, Spain (oral)

Hsieh A, Sofla A, **Radisic M**: "Label-free Cardiomyocyte Enrichment in Microfabricated Device" Microtechnology Conference and Expo, Boston, MA, 2011 (poster)

Hsieh A, Sofla A, **Radisic M**: "Label-free, cardiomyocyte enrichment: A biochemical and microfabricated approach", BMES Annual Meeting, Hartford, CT, 2011 (poster)

Hsieh A, Sofla A, **Radisic M**; "Cardiomyocyte enrichment in microfabricated device", Ontario-on-Chip/MATCH Symposium, Toronto, ON, 2011 (poster)

N. Thavandiran, N. Dubois, S. Masse, B. Beca, C. A. Simmons, P. McGarry, V. Deshpande. C. S. Chen, K. Nanthakumar. G. Keller, **M. Radisic**, P. W. Zandstra. Engineering the heart cell niche in a microscale self-assembling tissue-mimetic in vitro model. Microfluidic Applications and Training in Cardiovascular Health (MATCH)/Ontario On A Chip (OOAC) symposium. Toronto, Canada, 2011 (poster). Best poster award.

N. Thavandiran, N. Dubois, S. Masse, B. Beca, C. A. Simmons, P. McGarry, V. Deshpande. C. S. Chen, K. Nanthakumar. G. Keller, **M. Radisic**, P. W. Zandstra. (2011) Cardiac MicroWire: A microengineered tissue-mimetic system for studying cardiac development and disease. Microtechnologies in Medicine and Biology (MMB). Lucerne, Switzerland. (Podium/poster presentation), 2011 Best talk/poster award.

Boudou T, Legant WR, Mu A, Borochin MA, Thavandiran N, **Radisic M**, Zandstra PW, Epstein JA, Margulies KB, Chen CS: "A Microfabricated Platform to Measure and Manipulate the Mechanics of Engineered Cardiac Microtissues", ASME 2012 Summer Bioengineering Conference, June 20-23, 2012 Fajardo, Puerto Rico

Li M, Traister A, Aafaqi S, Lu M, Jiang J, Guido F, Sherret J, **Radisic M**, Gross G, Hannigan G, Maynes J, Coles J: " Integrin-Linked Kinase Regulates Cardiomyocyte Calcium Signaling through Protein-Protein Interaction with Sarcoplasmic Reticulum Calcium ATPase" American Heart Association Scientific Sessions, Los Angeles, CA, Nov 3-7, 2012 (poster)

Montgomery M, **Radisic M**: "An Elastomeric, Biodegradable Cardiac Patch for Myocardial Infarction Treatment" Scientific Writing II, Chemical Engineering and Applied Chemistry, University of Toronto, April 1, 2013 (poster)

Miklas J.W, Nunes S.S, Xiao Y, Gagliardi M Keller G, **Radisic M**: "An in vitro model of hypertrophic engineered heart tissue" 2012 Till and McCulloch Meetings, Montreal, QC. April 29 – May 4, 2012 (poster)

Miklas J.W, Nunes S.S, Keller G, and **Radisic M**: "An in vitro model of hypertrophic engineered heart tissue" Institute of Biomaterials and Biomedical Engineering Scientific Day, Toronto, ON. May 7, 2012 (poster)

Nunes SS, Miklas JW, Xiao Y, Gagliardi M, Keller G and Radisic M. "Electrical field stimulation promotes maturation of human embryonic stem cell-derived cardiomyocytes". Ontario Stem Cell Network Till & McCulloch Meetings. 2012. (poster)

Hsieh A, **Radisic M**: "The development of cardiomyocyte separation, a biochemical and microfluidic approach" Ontario-on-a-Chip and MATCH ,Toronto, ON, May 17-18, 2012 (poster)

Rashedi I, Wang XH, **Radisic M**, Keating A: "Cardiac Reprogramming of TLR-Activated Human Bone Marrow Mesenchymal Stromal Cells" Hematology & Hematopathology Research Day, University of Toronto, Toronto, Canada, April 23, 2013, (poster)

Rashedi I, Wang XH, Viswanathan S, **Radisic M**, Keating A: "Human Bone Marrow Mesenchymal Stromal Cells: The Effect of Environment on Cardiogenic Cellular Reprogramming" Hematology & Hematopathology Research Day, University of Toronto, Toronto, Canada, May 8, 2012, poster.

Rashedi I, Wang XH, Viswanathan S, **Radisic M**, Keating A: "Human Bone Marrow Mesenchymal Stromal Cells: The Effect of Environment on Cardiogenic Cellular Reprogramming", IBBME Research Day, University of Toronto, Toronto, Canada, May 7, 2012, (poster)

Rashedi I, Wang XH, Viswanathan S, **Radisic M**, Keating A: "Human Bone Marrow Mesenchymal Stromal Cells: The Effect of Environment on Cardiogenic Cellular Reprogramming" Till & McCulloch meeting, Montreal, Canada, April 30- May 2, 2012, (poster)

Zhang B, **Radisic M**: "Synthetic Cardiac Tissue Patch with Built-in Vasculature Allows for Direct Vascular Anastomosis in Cardiac Repair", MATCH Symposium, Toronto, ON May 24th, 2013 (oral)

XiaoY, Zhang B, Liu H, Miklas JW, Gagliardi M, Pahnke A, Thavandiran N, Sun Y, Simmons CA, Keller G, **Radisic M** "Cardiac biowires mimicking native cardiac bundles generated by microfabricated bioreactors" 30th Annual Meeting of the Canadian Biomaterials Society, Ottawa, ON May 2013 (poster)

Reis L.A., Chiu L.L.Y., Wu J., Momen A., Li R.K., & **Radisic M**. "A peptide modified hydrogel for treatment after acute myocardial infarction. 30th Annual Meeting of the Canadian Biomaterials Society, Ottawa, Ottawa, ON, May 2013 (poster)

Chiu L, Montgomery M, Liang Y, Liu H, **Radisic M**: "Perfusable branching microvessel bed for vascularization of engineered tissues", Canadian Medical and Biomedical Engineering Society (CMBES), Ottawa, ON, May 21-24, 2013 (poster)

Montgomery M, **Radisic M**: "Developing a Biodegradable Elastic Cardiac Patch for Myocardial Infarction Therapy" Ontario-on-a-Chip (OOAC)/MATCH, University of Toronto, Toronto, ON, May 23-24th, 2013

(poster)

Montgomery M, **Radisic M**: "An Elastomeric, Biodegradable Cardiac Patch for Myocardial Infarction Therapy" IBBME Scientific Day, University of Toronto, Toronto, ON May 02nd, 2013 (poster)

Nunes SS, Miklas JW, Liu J, Aschar-Sobi R, Xiao Y, Zhang B, Jiang J, Masse S, Nanthakumar K, Gross G, Backx P, Keller G and **Radisic M**. "Biowire: a platform for maturation of human pluripotent stem cell derived cardiomyocytes". Biomedical Engineering Society (BMES) Annual Meeting, Seattle, WA, Sept 25-28, 2013. (Oral)

Zhang B, Montgomery M, Pahnke A, Reis L, Nunes SS, **Radisic M**: "MICROFLUIDIC TISSUE: A BIODEGRADABLE SCAFFOLD WITH BUILT-IN VASCULATURE FOR CARDIAC TISSUE VASCULARIZATION AND SURGICAL VASCULAR ANASTOMOSIS" mTAS, 27-31 October, 2013 Freiburg, Germany (Oral)

Montgomery M, Zhang B, **Radisic M**: "BioMesh: An Injectable Tissue for Minimally Invasive Cardiac Repair" Centre for Microfluidic Systems in Chemistry and Biology Small Talks Competition, August 28th, 2013 (oral, Awarded 1st Prize)

Zhang B, Montgomery M, **Radisic M**: "BioSynMartix: Human on a Plate" Centre for Microfluidic Systems in Chemistry and Biology Sales Pitch Competition, August 28th, 2013 (oral, Awarded 1st Prize)

Zhang B, **Radisic M** "Microfluidic tissue: a biodegradable scaffold with built-in vasculature for cardiac tissue vascularization and surgical vascular anastomoses" 17th international conference on miniaturized system for chemistry and life sciences, Freiburg, Germany, 2013, (oral).

Nimalan Thavandiran, Samuel McEwen, George Graham, **Milica Radisic**, Peter Zandstra: "Re-engineering the 96-well plate using 3D printing: A screening platform for measuring contractile force in engineered cardiac microtissues" Keystone Meeting, April 2014

Hsieh A, Ramachandran A, **Radisic M**: "High gradient magnetic separation of label-free cardiomyocytes" CSCHE Ontario-Quebec Biotechnology Meeting, May 15-16, 2014, Toronto, ON

Hsieh A, Ramachandran A, **Radisic M**: "High gradient magnetic separation of label-free cardiomyocytes" Ontario-on Chip & MATCH symposium, May 29-30, 2014, Toronto (poster)

Reis L.A., Chiu L.L.Y., Wu J., Feric N., Momen A., Li R.K., **Radisic M**. A peptide modified hydrogel therapy for acute myocardial infarction. 2014 Annual University of Toronto Institute of Biomaterials & Biomedical Engineering Scientific Day, May 2014, Toronto, ON, CAN (poster)

Hsieh A, Ramachandran A, **Radisic M**: "High gradient magnetic separation of label-free cardiomyocytes" The Till & McCulloch Meetings, October 27-29, 2014, Ottawa, ON (poster)

Xiao Y, **Radisic M**: "Chitosan-Collagen Hydrogel Modified with QHREDGS Peptide for Wound Healing" 2014 TERMIS-AM Annual Meeting, December 13th-16th, 2014, Washington, DC (poster)

Xiao Y, Zhang B, Liu H, Sun Y, Simmons C, **Radisic M**: "Microfabricated Perfusable Cardiac Biowire: A Platform That Mimics Native Cardiac Bundle" 2014 TERMIS-AM Annual Meeting, December 13th-16th, 2014, Washington, DC (oral)

Montgomery M, Zhang B, Reis L, **Radisic M**: "Designing a Shape-Memory Scaffold for Minimally Invasive Functional Cardiac Tissue Delivery" Canadian Biomaterials Society Annual Meeting, May 27th-30th, 2015,

Thavandiran, N; Blit P, Graham G, Prowse A, Gagliardi M, Witty A, Afshar M, Ostblom J, Chau E, McEwen S, Gilbert P, Keller G, **Radisic M**, Zandstra P: “Next-generation 96-well tissue culture plates re-engineered via 3D printing: A screening platform for measuring contractile force in human pluripotent stem cell-derived cardiac microtissues “ European Society of Animal Cell Technology (ESACT) Meeting, May 30th, 2015 Barcelona, Spain (oral)

Thavandiran, N; Blit P, Graham G, Prowse A, Gagliardi M, Witty A, Afshar M, Ostblom J, Chau E, McEwen S, Gilbert P, Keller G, **Radisic M**, Zandstra P: “Next-generation 96-well tissue culture plates re-engineered via 3D printing: A screening platform for measuring contractile force in human pluripotent stem cell-derived cardiac microtissues. Microfluidic Applications and Training in Cardiovascular Health (MATCH)/Ontario On A Chip (OOAC) symposium. May 29, 2015, Toronto, ON Canada (oral)

Zhang B, Montgomery M, Chamberlain MD, Ogawa S, Korolj A, Pahnke A, Wells LA, Massé S, Kim J, Reis L, Momen A, Nunes SS, Wheeler AR, Nanthakumar K, Keller G, Sefton MV, **Radisic M**: “ Biodegradable scaffold with built-in vasculature for organ-on-a-chip engineering and direct surgical anastomosis” Nature Conference on Tissue Engineering and Regenerative Medicine, Guangzhou, China. April 7-9, 2016 (oral)

Korolj A, Zhang B, Montgomery M, **Radisic M**: “Biomaterials with Fine-Tunable Properties for Soft Tissue Engineering” Canadian Biomaterials Society Annual Meeting, May 27-30, 2015, Toronto, ON (oral)

Xiao Y, **Radisic M**: “Angiopoietin-1-derived peptide promotes keratinocyte survival and diabetic wound healing”, 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (oral)

Ahadian S, Yamada S, Estili M, Liang X, Nakajima K, Shiku H, Matsue T, **Radisic M**: “Carbon nanotubes embedded in embryoid bodies direct cardiac differentiation”, 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (oral)

Conant G, Zhao Y, **Radisic M**: “High-throughput analysis of kinase inhibitor drugs on cardiac function using engineered heart tissue constructs” 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (poster)

Davenport Huyer, L., Zhang, B., Montgomery, M., Korolj, A., Drecun, S., Conant, G., Radisic, M: “A highly elastic and moldable polyester biomaterial for cardiac tissue engineering applications” 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (oral)

Feric N, Cheng CHC, Goh MC, Dudnyk V, Di Tizio V, **Radisic M**: “Biomedical materials modified with the Angiopoietin-1-derived peptide QHREDGS induce osteoblast differentiation, bone matrix deposition and mineralization” 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (oral)

Korolj A, Zhang B, Montgomery M, **Radisic M**: “Study of a synthetic elastomer with tunable mechanical properties”, 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (poster)

Zhang B, Montgomery M, Chamberlain MD, Ogawa S, Korolj A, Pahnke A, Wells LA, Massé S, Kim J, Reis L, Momen A, Nunes SS, Wheeler AR, Nanthakumar K, Keller G, Sefton MV, **Radisic M**: “AngioChip: a biodegradable scaffold with built-in vasculature for organ-on-a-chip engineering and direct surgical anastomosis”, 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (oral)

Zhao, Y., Feric, N., Zhang, B., Aschar-Sobbi, R., Ronaldson, K., Conant, G., Pahnke, A., Vunjak-Novakovic,

G., Backx, P., and **Radisic, M**: “High Throughput Drug Testing Platform for Long Term Cardiotoxicity Monitoring Using High Fidelity Engineered Cardiac Tissue” 10th World Biomaterials Congress, Montreal, Quebec, Canada. May 17-22, 2016 (poster)

Korolj A, Zhang B, Laschinger C, **Radisic M**: “Microfabrication of a biomimetic ‘bubbly’ surface” Ontario-on-a-Chip Symposium, Toronto, Ontario, Canada. May 26-27, 2016 (poster)

Korolj A, Zhang B, Laschinger C, James C, Hu E, Willette R, **Radisic M**: “Biomimetic curvatures in 3D cell culture platform improves podocyte differentiation in vitro” Toronto General Research Institute Research Day, Toronto, Ontario, Canada. October 6, 2016 (poster, moderated)

Korolj A, Zhang B, Laschinger C, James C, Hu E, Willette R, **Radisic M**: “Biomimetic 3D platform induces nephrin upregulation in differentiating podocytes” 20th International Conference on Miniaturized Systems for Chemistry and Life Sciences, Dublin, Ireland. October 9-13, 2016 (poster)

Ahadian S, Davenport Huyer L, Estili M, Yee B, Smith N, Xu Z, Sun Y, **Radisic M**: “Hybrid carbon nanotube-polymer scaffolds for cardiac tissue regeneration” 5th International Conference on Stem Cell Engineering, Toronto, Ontario, Canada. October 23-26, 2016 (poster)

Korolj A, Zhang B, Laschinger C, James C, Hu E, Willette r, **Radisic M**: “Geometric cues in bioengineered scaffold enhance podocyte differentiation in vitro” International Conference on Stem Cell Engineering, Toronto, Ontario, Canada. October 23-26, 2016 (poster)

Davenport Huyer L, Zhang B, Montgomery M, Korolj A, Drecun S, Conant G, Reis L, **Radisic M**: “Highly elastic and moldable polyester biomaterial for cardiac tissue engineering applications” 2016 TERMIS-Americas Conference and Exhibition, San Diego, California, USA. Dec 11-14, 2016 (Podium)

Montgomery M, Zhang B, Davenport-Huyer L, Korolj A, **Radisic M**: “Platform Technology for Assembly of Instantaneously Functional Mosaic Tissues” Tissue Engineering and Regenerative Medicine International Society - Americas Annual Meeting, San Diego, California, USA. Dec 11-14, 2016 (oral)

Ahadian S, Davenport Huyer L, Smith N, **Radisic M**: “Hybrid carbon nanotube-polymer scaffolds for cardiac tissue regeneration” Microfluids, BioMEMS, and Medical Microsystems XV, San Francisco, SA. Jan 28-Feb 2, 2017 (oral)

Korolj A, Laschinger C, James C, Hu E, Willette R, Ahadian S, **Radisic M**, Zhang B: “Biometric curvature in cell culture platform improves podocyte differentiation in vitro” Keystone Symposia on Molecular and Cellular Biology: Engineered Cells and Tissues as Platforms for Discovery and Therapy, Boston, Massachusetts, USA. March 9-12, 2017 (poster and oral)

Zhao Y, Wang EY, Simmons C, Bhattacharya S, **Radisic M**: “Biowire II platform: a microfabricated device for cardiac fibrosis disease modelling” Engineered Cells and Tissues as Platforms for Discovery and Therapy (K1) Conference, Boston, Massachusetts, USA. March 9-12, 2017 (abstract)

Montgomery M, **Radisic M**: “Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues” ChemE Research Exhibition, Toronto, Ontario, Canada April 7, 2017 (oral)

Montgomery M, **M. Radisic**: “Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues”, Ontario-on-a-chip, Toronto, ON, Canada, May, 2017 (oral)

Montgomery M, **Radisic M**: “Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues” Ontario Institute of Regenerative Medicine, Toronto, Ontario, Canada May, 2017 (oral)

Montgomery M, Radisic M: "Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues". Institute of Biomaterials and Biomedical Engineering Annual Research Day, Toronto, ON, Canada, May, 2017 (oral)

Lai F, Radisic M: "Perfusable vascularized tissues for drug testing and modeling inter-organ biological events on a microfluidic plate" 12th Annual Ontario on a Chip/ToEP Symposium, University of Toronto, Toronto, Ontario, Canada. May 25-26, 2017 (poster)

Korolj A, Laschinger C, James C, Hu E, Willette R, Smith N, Ahadian S, Radisic M, Zhang B: "Biomimetic curvature in cell culture platform improves podocyte differentiation in vitro" Ontario-on-a-Chip Symposium, Toronto, Ontario, Canada. May 25-26, 2017 (oral)

Hossein M, Radisic M: "Development of functional heart ventricle using hiPSC-derived cardiomyocytes" 12th Annual Ontario-on-Chip Symposium, Toronto, Ontario, Canada. May 25-26, 2017 (poster)

Montgomery M, Radisic M: "Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues" 12th Annual Ontario-on-a-chip, Toronto, Ontario, Canada. May 25-26, 2017 (Oral)

Montgomery M, Radisic M: "Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues", Ontario Institute of Regenerative Medicine Research Symposium, Toronto, ON, Canada, May 25-26, 2017 (oral)

Davenport Huyer L, Montgomery, M, Radisic, M. "Noxa Biomedical: Antimicrobial polymer solutions" Ontario on a Chip Symposium, Toronto, Ontario, CA May 25-26, 2017 (Oral, Awarded best pitch)

Bannerman D, Duong B, Jadidian P, Voicu D, Guenther A. "Fabrication of a Flow Focusing Microfluidic Device for Generation of Flavoured Alginate Microgels". Ontario-on-a-chip, Toronto, Ontario, May 25-26, 2017 (poster).

Davenport Huyer L*, Ahadian, S.*, Estill, M., Yee, B., Smith, N., Zhensong, X., Sun, Y., **Radisic, M.** "Moldable elastomeric polyester-carbon nanotube scaffolds for cardiac tissue engineering" Ontario on a Chip Symposium, Toronto, Ontario, CA May 25-26, 2017 (Poster, Awarded best poster)

Montgomery M, Radisic M: "Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues" Ontario Institute of Regenerative Medicine, Toronto, Ontario, Canada May 26, 2017 (poster)

Korolj A, Laschinger C, James C, Hu E, Willette R, Velinkonja C, Smith N, Ahadian S, Radisic M, Zhang B: "Tissue architecture in the cell microenvironment: Microcurvature promotes differentiation of kidney podocytes" Gordon Conference on Biomaterials and Tissue Engineering, Holderness, NH, USA. July 23-28, 2017 (poster)

Davenport Huyer, L.*, Ahadian, S.*, Estill, M., Yee, B., Smith, N., Zhensong, X., Sun, Y., **Radisic, M.** "Moldable elastomeric polyester-carbon nanotube scaffolds for cardiac tissue engineering" Gordon Research Conference: Biomaterials & Tissue Engineering. Holderness, New Hampshire, USA July 23-28, 2017 (Poster)

Montgomery M, Radisic M: "Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues", Biomedical Engineering Society Annual Meeting, Phoenix, Arizona, USA, October 10-14, 2017 (oral)

Lai F, Radisic M: "InVADE: Integrated Vasculature for Assessing Dynamic Events" Toronto General Research Institute Research Day, Toronto, Ontario, Canada. October 11, 2017 (poster)

Bannerman D, Radisic M: "Design and fabrication of an adhesive patch for myocardial repair" Toronto General Hospital Research Day, Toronto, Ontario, Canada. October 11, 2017 (poster)

Lai F, Radisic M: “Perfusable vascularized tissues for drug testing and modeling inter-organ biological events on a microfluidic plate” Keystone Symposia T3 Hong Kong October 15-19, 2017 (poster)

Lai BFL, Davenport Huyer L, Lu RXZ, Drecun S, Zhang B, Radisic M: “Perfusable Vascularized Organoids for Drug Testing and Modeling Inter-organ Biological Events on Microfluidic Plates” Keystone Symposium—Regenerative Biology and Applications: Cell Differentiation, Tissue Organization, and Biomedical Engineering (T3), University of Hong Kong, Hong Kong, China October 15-19, 2017 (oral and poster)

Montgomery M, Radisic M: “Flexible Shape-memory Scaffold for Minimally Invasive Delivery of Functional Tissues” Biomedical Engineering Society Annual Meeting, Phoenix, Arizona, USA October 10-14, 2017 (oral)

Korolj A, Laschinger C, James C, Hu E, Willette R, Velikonja C, Smith N, Ahadian S, Radisic M, Zhang B: “Microcurvature promotes differentiation of kidney podocytes” Biomedical Engineering Society Conf for Cellular and Biomolecular Engineering, Florida Keys, FL, USA. January 2-6, 2018 (oral) (Recipient of Graduate Shooting Star Award)

Bannerman D, Montgomery M, Lu R, Velikonja C, Civitarese R, Davenport Huyer L, Radisic M: “A novel adhesive biomaterial for cardiac patch technology”. Chemical Engineering and Applied Chemistry Exhibition, University of Toronto, Toronto, Ontario, Mar. 23, 2018 (poster)

Mohammadi MH, Savoji H, Kim L, Ahadian S, Rafatian N, Foroughi S, Ebrahimi Warkiani M, Radisic M: “Label-Free, High-Throughput Purification of Cardiomyocytes Using Spiral Microfluidic Separation”. Canadian Biomaterials Society, University of Victoria, Victoria, British Columbia, May 17th, 2018 (poster)

Mandla S, Davenport-Huyer L, Radisic M: “Peptide modifies hydrogel for wound healing applications”. Ontario Organ on a Chip Conference, University of Toronto, Toronto, Ontario, May 24, 2018 (poster)

Mohammadi MH, Savoji H, Kim L, Ahadian S, Rafatian N, Foroughi S, Ebrahimi Warkiani M, Radisic M: “Label-Free, High-Throughput Purification of Cardiomyocytes Using Spiral Microfluidic Separation” Ontario on a Chip and TOeP Symposium, Toronto, Ontario, May 24th, 2018 (poster)

Davenport Huyer L, Yee B, Montgomery M, Euler C, Nemr K, Mahadevan R, Radisic M: “Biomimetic polyester materials with cell functionality for immunological and antibacterial applications”. Ontario on a Chip, University of Toronto, Toronto, Ontario, May 24, 2018 (Poster)

Lai BFL, Davenport Huyer L, Lu RXZ, Drecun S, Radisic M*, Zhang B*: “Perfusable vascularized tissues for drug testing and modeling inter-organ biological events on a microfluidic plate”. 2018 Joint OOAC-TOeP Symposium, University of Toronto, Toronto, Ontario, May 24th to 25th, 2018 (poster)

Bannerman D, Montgomery M, Davenport Huyer L, Velikonja C, Radisic M: “A photocrosslinkable adhesive polymer for cardiac patch technology”. 2018 Joint Ontario-on-a-Chip and TOeP Symposium, University of Toronto, Toronto, Ontario, May 24-25, 2018 (poster)

Korolj A, Laschinger C, James C, Hu E, Velikonja C, Gu I, Willette R, Smith N, Ahadian S, Radisic M, Zhang B: “Biomimetic curvature in cell culture platform improves podocyte differentiation in vitro”. Joint TOeP and Ontario-on-a-Chip Conference, Toronto, Canada, May 25, 2018 (oral)

Lai BFL, Davenport Huyer L, Lu RXZ, Drecun S, Radisic M*, Zhang B*: “Perfusable vascularized tissues for drug testing events on a microfluidic plate”. 2018 Joint OOAC-TOeP Symposium, University of Toronto, Toronto, Ontario, May 24th to 25th, 2018 (poster)

Savoji H, Davenport Huyer L, Mohammadi MH, Lai BF, Radisic M: “3D Printing of Microvasculatures”, 34th

Annual Meeting of Canadian Biomaterials Society, Victoria, Canada, May 2018 (Poster)

Korolj A, Laschinger C, James C, Hu E, Velikonja C, Gu I, Willette R, Smith N, Ahadian S, Radisic M, Zhang B. "Model system with biomimetic topography promotes podocyte differentiation". International Podocyte Conference, Montreal, Canada, May 31, 2018 (poster)

Mohammadi MH, Savoji H, Radisic M. "Development of Functional Heart Ventricle Using Human Induced Pluripotent Stem Cell Derived Cardiomyocytes". 14th Conference on Stem Cell Biology and Technology, Tehran, Iran, Aug. 29th, 2018 (Oral)

Lu RXZ, Bengt T, Lai BFL, Huyer LD, **Radisic M**. "An engineering perfusable platform for recapitulating in vivo nanoparticle translocation". TERMIS, Kyoto, Japan, Sept. 4, 2018 (poster)

Lai BFL, Davenport Huyer L, Lu RXZ, Drecun S, Radisic M*, Zhang B*. "Perfusable vascularized tissues for drug testing and modeling inter-organ biological events on a microfluidic plate". 5th TERMIS World Congress, Kyoto International Conference Center, Kyoto, Japan, Sept. 4th to 7th, 2018 (poster)

Wang E, Kuzmanov U, Zhao Y, Rafatian N, Gramolini A, Emili A, Backx P, Radisic M. "Combined strategy of human induced pluripotent stem cells, organ-on-a-chip engineering and precision proteomics analysis for cardiac disease study". 2018 TERMIS World Congress, Kyoto, Japan. Sept. 6, 2018 (poster)

Mandla S, Sparks H, Pope H, Hee O, Tarraf S, di Martino E, Radisic M, Biernaskie J, Scott M. "Peptide modified hydrogels to enhance healing in an equine cutaneous wound model" Calgary international equine symposium, University of Calgary, Calgary, Alberta, September 7, 2018 (poster)

Korolj A, Laschinger C, James C, Hu E, Velikonja C, Gu I, Willette R, Smith N, Ahadian S, Radisic M, Zhang B. "Biomimetic curvature in cell culture platform improves podocyte differentiation in vitro". TERMIS International Symposium, Kyoto, Japan, Sep. 7, 2018 (oral)

Bannerman D, Davenport Huyer L, Montgomery M, Zhao N, Radisic M. "A novel adhesive biomaterial for cardiac patch technology". Biomedical Engineering Society Annual Meeting, Atlanta, Georgia, Oct. 17-20, 2018 (poster)

Davenport Huyer L, Yee B, Montgomery M, Euler C, Nemr K, Mahadevan R, Radisic M. "Biomimetic polyester materials with cell functionality for immunological and antibacterial applications". 68th Canadian Chemical Engineering Conference, Toronto, Ontario, Oct. 29, 2018 (Oral)

Korolj A, Laschinger C, James C, Hu E, Velikonja C, Gu I, Willette R, Smith N, Ahadian S, Radisic M, Zhang B. "Biomimetic curvature in cell culture platform improves podocyte differentiation in vitro". Canadian Society for Chemical Engineering Conference, Toronto, Canada, Oct. 28, 2018 (oral and poster)

Bannerman D, Davenport Huyer L, Montgomery M, Zhao N, Radisic M. "A photocrosslinkable adhesive polymer for cardiac patch technology". Canadian Chemical engineering Conference, Toronto, Ontario, Oct. 28-31, 2018 (podium presentation)

Wagner K, Liu B, Vunjak-Novakovic G, Radisic M. "Can your ex(osomes) mend your broken heart?". Regenerative Medicine Symposium, University of Toronto, Toronto, Ontario, Apr. 11, 2019 (oral presentation)

3.2 INVITED PRESENTATIONS

"Biomimetic Approach to Cardiac Tissue Engineering" McMaster University, Feb 16, 2004

"Biomimetic requirements for cardiac tissue engineering" Tissue Engineering the Next Generation, NIH

Sponsored Workshop May 02-04 2005, Cambridge, MA

“Biomimetic Approach to cardiac Tissue Engineering” Department of Pharmacology, SUNY Upstate Medical University, Dec 01, 2005

“Biomimetic Approach to cardiac Tissue Engineering” Toronto General Hospital (Laboratory of Dr. R-K. Li) Dec 09, 2005

“My experience as an assistant professor” THE500 (Dr. Kay, instructor), University of Toronto, guest lecture, March 21, 2006

“Biomimetic Approach to Cardiac Tissue Engineering” ARTEC Technology Exchange, Jan25, 2006, Toronto, ON

“Biomimetic Approach to Cardiac Tissue Engineering” Annual Cardiovascular Scientific Day, Heart & Stroke/Richard Lewar Centre of Excellence in Cardiovascular Research, University of Toronto May 11, 2006

“ Micro-scale systems in cardiac tissue engineering” National research Council (NRC), Industrial Materials Institute (**IMI**), Boucherville, QC, Canada (Laboratory of Dr. T. Veres), Sept 28, 2006

“Size and Adhesion Based Microfluidic Enrichment of Cardiac Cell Populations” 90th Canadian Chemistry Conference and Exhibition (**CSC**), Winnipeg, MB, May 27, 2007

“Engineering Microenvironments for Cardiovascular Regeneration” Heart & Stroke/Richard Lewar Centre of Excellence in Cardiovascular Research, University of Toronto, May 10, 2007

"Microfluidic Enrichment of Heart Cell Subpopulations" Ontario-on-a-Chip, University of Toronto, Nov 01, 2007

“Ex-vivo construction of myocardial tissue: Bioreactor Cultivation” The 4th International Conference on Cell Therapy for Cardiovascular Diseases, New York, NY, Jan 17, 2008

“Engineering Microenvironments for Cardiovascular Regeneration” Department of Chemical and Biological Engineering, SUNY at Buffalo, Buffalo, NY, March 19, 2008,

Discussion Leader, “Engineering Cell Responses to ECM”, Gordon Research Conference Signal Transduction By Engineered Extracellular Matrices, July 6-11, 2008, Bates College Lewiston, ME

Panel of Women in Technology, 2008 Emerging Technologies Conference, M.I.T., Cambridge, MA (declined due to maternity leave)

Panel on Regenerative Medicine, 2008 Emerging Technologies Conference, M.I.T., Cambridge, MA (declined due to maternity leave)

“Tissue Engineering of a Living Cardiac Patch”, VIPSI2009 and World Rector Conference, April 02-04 2009, Belgrade, Serbia

“Cardiac Tissue Engineering”, Design of Medical Devices Conference, April 14-16, 2009 Minneapolis, MN

“Cardiac Tissue Engineering”, The Royal Canadian Institute (RCI) for the Advancement of Science, Table Host for “The RCI Science Dinner of the Year”, April 23, 2009

“Biomaterials and Bioreactors for Stem Cell Differentiation” Toronto Stem Cell Rounds, Toronto, ON May 04, 2009

“Tissue Engineering” REMEDI Symposium, Toronto General Research Institute, June 12, 2009

“From Cells to Tissue Engineering: Re-making of the Heart” Institute of Medical Science Summer Program, University of Toronto, June 24, 2009

“Immobilized Growth Factors for Vascularization of Engineered Tissues” Symposium in Honor of Dr. Michael Sefton’s 60th Birthday, University of Toronto, October 16, 2009

“Women in Research and Teaching” National Conference on Women in Engineering 2009: Designing the World to Come, Toronto, Nov 28, 2009

“Engineering Microenvironments for Cardiovascular Regeneration” Symposium on Advanced Research, Jan 12, 2010

“Engineered Heart Tissue for Drug Development” Presentation to Merrimack Pharma on Feb 12, 2009

“Innovation in Tissue Engineering and Regenerative Medicine”, The International Diaspora Youth Leadership Conference, March 22, 2010, Toronto, ON

“Cardiac tissue engineering”, Laurence Becker Symposium on Advances in Laboratory Medicine- Frontiers in Tissue Engineering: Paediatric Regenerative Medicine, The Hospital for Sick Children, Toronto, June 03, 2010

“Engineered Heart Tissue”, 2010 AHA Scientific Sessions, November 15, Chicago, IL

“Student Meet the Mentor Lunch, 2010 TERMIS-NA Meeting, Orlando, FL

“Engineered Heart Tissue” presentation to External Reviewers of the Department of Chemical Engineering and Applied Chemistry, Dec 02, 2010

“Engineering Microenvironments for Cardiovascular Regeneration”, 10th Congress of the Japanese Society for Regenerative Medicine, Tokyo, Japan, March 01, 2011

“Engineering Microenvironments for Cardiovascular Regeneration”, Tokyo Women’s Medical University, Tokyo, Japan, March 03, 2011

“Healthy and diseased heart tissue on a chip”, School of Engineering and Applied Sciences, Harvard University, Boston, MA, April 27th, 2011

“Engineering Microenvironments for Cardiovascular Regeneration”, Biochemical and molecular engineering XVII, June 26-30, 2011 Seattle, WA

“Tissue Engineering and Biomaterials for Cardiovascular Regeneration”, Personalized Medicine in the Genomics Era, Oct 17th, 2011 Toronto, ON

Discussant for “A Phase II Dose-Escalation Study of Allogeneic Mesenchymal Precursor Cells in Patients With Ischemic and Nonischemic Heart Failure” by Perin et al American Heart Association Scientific Sessions, Nov 14, 2011 Orlando, Florida

“Collagen patches for cardiac repair”, California Institute for Regenerative Medicine Tissue Engineering

Workshop (closed, by invitation), Jan 11-14, 2012 San Francisco, CA

“Healthy and Diseased Heart Tissue on a Chip”, CCRM-Roche Meeting, March 12, 2012, Toronto, ON

“Healthy and Diseased Heart Tissue on a Chip”, Chemical Engineering Research Consultants Limited, March 09, 2012, Toronto, ON

“Controlled delivery of Thymosin $\beta 4$ for tissue engineering and cardiac regenerative medicine”, Third International Symposium on Thymosins in Health and Disease, March 15, 2012, Washington, DC

“Engineering microenvironments for cardiovascular regeneration”, Department of Chemistry, York University, April 19, 2012

“In vitro models of heart disease and regeneration” Experimental Biology 2012, America Association of Anatomists, April 25th, 2012 San Diego, CA

“Engineering microenvironments for cardiovascular regeneration”, Department of Bioengineering, University of California-San Diego, April 19, 2012

“Engineering Microenvironments for Cardiovascular Regeneration” TMF, University of Belgrade, June 29th, 2012

“Healthy and Diseased Heart Tissue on a Chip”, Functional Imaging in Regenerative Medicine, NIST, Gaithersburg, MD, May 31st, 2012

“Healthy and Diseased Heart Tissue on a Chip”, Alumni Spring Reunion Engineering Lectures, University of Toronto, June 02nd, 2012

“Engineering Microenvironments for Cardiovascular Regeneration” NSERC CREATE-IDEM, McMaster University, Hamilton, ON, July 10th, 2012

“Bioreactors for Development of Healthy and Diseased Myocardial Tissue Models”, TERMIS World Congress, Vienna, Austria, September 08th, 2012

“Healthy and Diseased Heart Tissue on a Chip”, IBBME Seminar Series, University of Toronto, Sept 27th, 2012

“Bioreactors for Development of Healthy and Diseased Myocardial Tissue Models”, NIH Tissue Engineering Resource Center Site Visit, Tufts University, Boston, MA, November 08, 2012

“Tissue Engineering”, Health Canada, Ottawa, ON, November 30th, 2012

“Novel Approach to Engineered Microvascular Networks”, Conference on Cell Therapy for Cardiovascular Disease, New York, NY, Jan 24th, 2013

“Healthy and diseased heart tissue on a chip”, Beyond Borders: Lyon Sachs Symposium, Technion, Haifa, IL May 08th, 2013

“Biological Wire: A New Platform for Maturation of Human Pluripotent Stem Cell Derived Cardiomyocytes”, MFI Symposium, Ottawa Heart Institute, Ottawa, ON, June 28th, 2013

“Engineering microenvironments for cardiovascular regeneration”, Emory University/Georgia Institute of Technology, July 17th, 2013

“3D Cell Culture and Bioreactors”, International Summer School, Piran/Vipava, Slovenia, August 26th, 2013

“Tissue engineering for cardiac applications”, International Summer School, Piran/Vipava, Slovenia, August 28th, 2013

“Engineering microenvironments for cardiac applications”, Gladstone Institute of Cardiovascular Disease, San Francisco, CA, October 14th, 2013

“Healthy and diseased heart tissue on a chip”, University of Pennsylvania Bioengineering's 40th Anniversary Symposium, Philadelphia, PA, November 21st, 2013

Impactful research panel, Simcoe Hall - Governing Council Chamber, November 27th, 2013

“Engineering microenvironments for cardiovascular regeneration”, Excellence in Interventional Cardiology 2013, Whistler, BC, December 6th, 2013

Invited panelist, WISE Dinner with Industry, Queens University, January 22nd, 2014

“Engineering microenvironments for cardiovascular regeneration”, 4th International conference on Stem Cell Engineering (ICSCE) organized by SBE and ISSCR, Coronado, CA, March 16-17, 2014 (canceled due to overlap with teaching)

“Engineering microenvironments for cardiovascular regeneration”, Department of Bioengineering, University of Illinois Urbana-Champaign, February 06th, 2014

“Engineering microenvironments for cardiovascular regeneration”, School of Applied Science and Engineering, Topics in Bioengineering, Harvard University, Cambridge, MA April 15th, 2014

“Engineering microenvironments for cardiovascular regeneration”, Tissue Engineering and regenerative Medicine (TIME) Symposium, Temple University, Philadelphia, PA, April 30th, 2014

“Engineering microenvironments for cardiovascular regeneration”, 4th Lugano Stem Cell Meeting, Lugano, Switzerland, June 23rd, 2014

“Perfusable microvessel networks and perfusion platforms for engineered tissues”, 11th International Symposium on Stem Cell Therapy and Cardiovascular Innovations, Madrid, Spain, May 29th, 2014

“Cardiac tissue engineering and stem cells” Microfluidics Professional Course, University of Toronto May 26th, 2014

“High fidelity cardiac tissue models” CCRM Course, The Business of Regenerative Medicine: New Therapies, New Models Toronto, ON, July 15th, 2014

“Tissue engineering and cardiac model systems”, Connaught Summer Institute, University of Toronto, August 20th, 2014

“Perfusable microvessel networks and perfusion platforms for engineered tissues”, Ontario-Germany Lab-on-a-chip Workshop, Toronto, Canada, October 08th, 2014

“Biowire plates for cell maturation and screening of cardiac contractility”, GlaxoSmithKline, Inc King of Prussia, PA October 02nd, 2014

“Human cardiac biowires”, Eli Lilly Corporate Headquarters, Indianapolis, IN, November 18th, 2014

“Human cardiac biowires and injectable tissues”, Micro- and Nano-technology in Medicine, IEEE EMBS, December 09th, Oahu, HI 2014

“Human cardiac biowires and injectable tissues”, MIREx McMaster University, January 14th, 2015

“Human cardiac biowires and injectable tissues”, LMP Student Union, University of Toronto, January 17th, 2015

“Human cardiac biowires and injectable tissues”, Division of Medical Sciences, University of Victoria, January 30th, 2015

“Human cardiac biowires and injectable tissues”, Department of Biomedical Engineering, Cornell University, Ithaca, NY, March 09th, 2015

“Human biowires for in vitro studies of cardiac physiology“, Department of Chemical Engineering, McMaster University, Hamilton, ON, March 12th, 2015

“Human biowires for in vitro studies of cardiac physiology“, University of Toronto in Your Neighbourhood, Toronto, ON, March 26th, 2015

“Human biowires and injectable tissues“, Joint meeting of the International Symposia on Surface and Interface of Biomaterials, Society for Tissue Engineering and Biomaterials, Sydney, Australia, April 09th, 2015 (**Keynote**)

“Human biowires and injectable tissues”, Victor Chang Cardiac Research Institute/University of New South Wales, Sydney, Australia, April 10th, 2015

“Human biowires for in vitro studies of cardiac physiology “, Regeneron, April 23rd, 2015

“Big Idea-Human Biowires for Predictive Cardiac Physiology”, American Heart Association Investment Forum, New York, NY, April 22nd, 2015

“Contractile mechanics of stem-cell derived cardiomyocytes”, PCBC Cardiovascular Tissue Engineering Workshop Agenda, Stanford, May 21st, 2015

“ Human cardiac biowires and injectable tissues”, CARDIOVASCULAR TISSUE ENGINEERING SYMPOSIUM, STANFORD, CA, May 22st, 2015

“Human cardiac biowires and injectable tissues” University of Toronto 3D Bioprinting Course, Toronto, Ontario, Canada, June 16th, 2015

“Tissue Velcro® For Rapid 3D Assembly of Functional Cardiac Co-cultures”, 2015 TERMIS World Congress, Boston, Massachusetts, United States. Sep 10th, 2015

“Human cardiac biowires and injectable tissues”. Cellular Dynamics iForum. Chicago, Illinois, United States. Sept 14, 2015

“Human cardiac biowires and injectable tissues. National Heart Lung Blood Institute (NHLBI) Sixth Symposium on Cardiovascular” Regenerative Medicine. Bethesda, Maryland, United States. Sep 30th, 2015

(Keynote speaker)

“Human cardiac biowires and injectable tissues”. 65th Canadian Chemical Engineering Conference, Oct 06th, 2015 (**Hatch Innovation Award Lecture**)

“Angiochip: A biodegradable scaffold for organ-on-a-chip engineering and direct surgical anastomosis. North American Vascular Biology Organization Annual Meeting, Vascular Matrix Biology and Bioengineering Workshop, Cape Cod, Massachusetts, October 21st, 2015

“ Human cardiac biowires and injectable tissues” CCRM Till and McCulloch Meetings, Toronto, Ontario, Canada, Oct 26th, 2015

“Hook-In-Tissue™ For Rapid 3D Assembly of Functional Cardiac Co-cultures”, Southmedic Site Visit, Toronto, ON, Canada, Dec 12th, 2015

“Engineering microenvironments for regenerative medicine” McMaster University BME Symposium. Hamilton, Ontario, Canada, Jan 08th, 2016 (**Keynote lecture**)

“Engineering microenvironments for regenerative medicine” Department of Laboratory Medicine and Pathobiology Seminar Series, University of Toronto, Toronto, ON Canada, Jan 11th, 2016

“Engineering microenvironments for regenerative medicine”, University of Toronto, Department of Chemical Engineering & Applied Chemistry. Toronto, Ontario, Canada, Research Dayz, Jan 18th 2016

“Engineering microenvironments for cardiovascular regeneration”, Ontario Institute of Regenerative Medicine Seminar Series, Toronto, Ontario, Canada, Feb 03rd, 2016

“Engineering biomaterials for regenerative healing”, Covalon, Mississauga, ON, Canada Feb 09th, 2016

“Biowire platform for cardiac drug screening”, Abbvie site visit, Feb 29th, 2016

“Engineering and Medical Treatment”, Engineering Innovations Forum. Toronto, ON, Canada, March 02nd, 2016 (**Keynote presentation**)

“Towards Person-on-a-Plate: Microfabrication and Biodegradable Polymers for High Fidelity Modelling of Human Tissues”, 8th Annual Hands-on Workshop in Micro & Nano Bioengineering, McGill University, Montreal, QC, March 03rd, 2016 (**Keynote lecture**)

“Engineering Microenvironments for Cardiovascular Regeneration”, Stem Cells The Future of Medicine, Student Society for Stem Cell Research, University of Toronto, Toronto, ON, March 12th, 2016

“Vascularization Platform for Organ-on-a-Chip Engineering and Direct Surgical Anastomosis” NIH Progenitor Cell Biology Consortium (PCBC) Cardiovascular Tissue Engineering (CVTE) Symposium, the University of Alabama at Birmingham, Birmingham, AL, USA March 28th, 2016

“ Effective Science Communications Panel”, Science Leadership Program, University of Toronto, April 14th, 2016

“Bioengineering stem cell-derived models of cardiac function”, Ted Rogers Centre for Heart Research 1st Scientific Symposium: Advances in Heart Failure, May 13th, 2016

“Heart-on-a-plate for drug discovery and disease modelling”, Georg-August-Universität Göttingen, Göttingen, Germany, May 31st, 2016

“Platform technology for maturation of human stem cell derived cardiomyocytes and drug discovery”, International Society for Stem Cell Research (ISSCR) Annual Meeting, San Francisco, CA, June 25th, 2016

“AngioChip Technology for Vascularization and Organ-on-chip Engineering”, American Heart Association Basic Cardiovascular Sciences 2016 Scientific Sessions, Phoenix, AZ, July 20th, 2016

“Perfusable Vasculature for Organ-on-a-Chip Engineering”, Microfluidics Professional Course, University of Toronto, July 12th, 2016

“Platform technology for maturation of stem cell derived cardiomyocytes and drug discovery”, International Society for Cardiovascular Biology (ISACB) 15th Biennial Meeting, Banff, Alberta September 10th 2016

“Towards human-on-a-plate”, Frontiers in Translational Research: Ex vivo models of human disease, Toronto, ON, September 16th 2016

“Engineered Tissues for Better Health and Longer Life”, TEDx Vaughan, September 23rd, 2016

“Bioengineering for the failing heart: The next frontier”, Pediatric Heart Failure Summit, Toronto, ON, September 26th, 2016

“Heart-on-a-Plate for Drug Discovery and Disease Modelling”, Annual Meeting of the Biomedical Engineering Society, Minneapolis, MN, October 07th, 2016

“Innovations and commercialization for cardiovascular disease – lessons learned panel”, The Ori Rotstein Lecture in Translational Research, St. Michael’s Hospital, Toronto, ON, October 13th, 2016

“Heart-on-a-Plate for Modelling of Cardiac Physiology and Drug Screening”, 5th International Conference on Stem Cell Engineering”, SBE/AICHe, Toronto, ON, October 24th, 2016

“Human Cardiac Biowires As a New Platform for Cell Maturation, Drug Discovery, and Safety Testing”, Society of Toxicology Special Meeting on The Use of Cardiomyocytes for the Assessment of the Proarrhythmic Risk, Arlington, VA, October 26th, 2016

“Heart-on-a-plate for drug discovery and disease modelling”, University of Waterloo, Waterloo, ON, October 27th, 2016

“Innovations in tissue engineering”, The Annual Claudette McKay-Lassonde Fall Forum, Toronto, ON November 12th, 2016

“Academic Start-ups”, Lunch-and-Learn, St. Michael’s Hospital, Toronto, ON, December 14th, 2016

“Towards human-on-a-plate and injectable functional tissues”, TARA Biosystems, New York, NY, January 26th, 2017

“Bioengineering functional heart tissues for drug discovery and therapy”, Ryerson University, Toronto, ON, February 09th, 2017

“Bioengineering functional tissues for drug discovery and therapy”, International Media Tour, University of Toronto, Toronto, ON, February 27th 2017

Guest Discussant on “Regulation”, University of Toronto, Toronto, ON, February 28th, 2017

“Evaluation of cardiotoxicity using Biowires”. Keystone Symposium Engineered Cells and Tissues as Platforms for Discovery and Therapy, Boston, MA, March 11th 2017

“AngioChip: vascularization platform for organ-on-a-chip engineering and direct surgical anastomosis”, Society of Toxicology Annual Meeting, Baltimore, MD, March 16th, 2017

“Stem cells and regenerative medicine”, PrO event, University of Toronto, March 29th, 2017

“Bioengineering functional tissues for drug discovery and therapy”, Bioengineering and Cardiovascular Training Grant Symposium, University of Washington, Seattle, WA, April 04th, 2017

“Bioengineering functional tissues for drug discovery and therapy”, Libin Research Day, University of Calgary, Calgary, AB, April 06th, 2017

“Bioengineering functional tissues for drug discovery and therapy”, Department of Chemical and Biological Engineering, University at Buffalo Buffalo, NY April 12th, 2017

“Perfusable vasculature for organ-on-a-chip engineering”, Professional Course in Microfluidics, University of Toronto, Toronto, ON, May 17th, 2017

“Bioengineered heart tissue for drug discovery and therapy”, The Hospital for Sick Kids, Toronto, ON, May 24th, 2017

“Bioengineered heart tissue for drug discovery and therapy”, 8th Annual Muscle Health Awareness Day Program, York University, Toronto, ON, May 26th, 2017

“Bioengineering functional tissue for drug discovery and therapy”, Canadian Biomaterials Society Annual Meeting, Winnipeg, MB, May 27th, 2017 (**Keynote presentation**)

“The Davos Debate- A Few Clinical Successes”, Tissue Engineering and Regenerative Medicine International Society (TERMIS) European Chapter 2017 Conference, Davos, Switzerland, June 26th, 2017

“Career Development Strategies”, SYIS Career Session, Tissue Engineering and Regenerative Medicine International Society (TERMIS) European Chapter 2017 Conference, Davos, Switzerland, June 26th, 2017

“Towards human-on-a-plate and injectable tissues”, Gordon Research Conference, Biomaterials and Tissue Engineering, Holderness, NH, USA, July 24th, 2017

“Tissue engineering and emerging cell based therapies”, Faculty of Medicine, University of Novi Sad, Novi Sad, Serbia, July 12th, 2017

“Engineering microenvironments for cardiovascular regeneration”, Department of Biomedical Engineering, Yale University, New Haven, CT, September 13th, 2017

“ Bioengineering Functional Heart Tissues for Drug Discovery and Therapy” 8th Annual Wyss International Symposium Therapeutic Organ Engineering, Boston, MA, September 22nd, 2017

“Towards organs-on-a-plate and injectable tissues”, Max Planck Institute for the Science of Light, Erlangen, Germany, October 04th, 2017

“Functional cardiac tissue engineering”, Roche Pharma Organ-on-a-chip Symposium Basel, Switzerland, October 6th, 2017

“Biomaterials that promote macrophage survival and recovery after injury”, Department of Chemical Engineering and Applied Chemistry, University of Toronto, Toronto General Hospital Research Institute, Toronto ON, October 11th, 2017

“Engineering Microenvironments for Cardiovascular Regeneration”, Department of Biomedical Engineering, Northwestern University, Chicago, IL, October 26th, 2017

“Tissue Engineering for Therapeutic Discovery”, Center for Molecular Cardiology, Northwestern University, Chicago, IL, October 27th, 2017

“Lab grown organs”, The Genesis Project Beth Tzedec Congregation, Toronto, ON October 31st, 2017

“Towards Injectable Human Tissues”, Bioengineering Student Association, University of Toronto, Toronto ON, November 2nd, 2017

“How to make cardiomyocyte cultures thrive “, Cardiac Physiome Workshop, Toronto, ON November 08th, 2017

“Tissue Engineering for Therapeutic Discovery”, Scientific Sessions of the American Heart Association, Anaheim, CA, November 12th, 2017

“Writing Proposal”, Prospective Professors in Training Program, Toronto ON, November 28th, 2017

“Tissue Engineering: Organ-on-a-Chip Engineering”, Regenerative Medicine Course, University of Toronto, January 11th, 2018

“Microfabrication of elastomeric polymers for organ-on-a-chip engineering and injectable tissues”, Department of Mechanical Engineering, Boston University, January 22nd, 2018

“Microfabrication of elastomeric polymers for organ-on-a-chip engineering and injectable tissues”, Department of Physics, University of Toronto, January 25th, 2018

“Designer biomaterials for cardiovascular regeneration”, Department of Biomedical Engineering, Yale University, February 06th, 2018

“Microfabrication of Elastomeric Polymers for Organ-on-a-Chip Engineering and Injectable Tissues”, University of Toronto Faculty of Dentistry Research Day, February 13th, 2018 (**Keynote presentation**)

“Designer Materials for Cardiovascular Regeneration”, Steacie Prize Event, Department of Chemical Engineering & Applied Chemistry, Institute of Biomaterials and Biomedical Engineering, E.W.R. Steacie Memorial Fund and the Faculty of Applied Science and Engineering, University of Toronto, February 26, 2018

“Designer Biomaterials for Cardiovascular Regeneration”, 21st Annual Department of Laboratory Medicine Graduate Research Conference, University of Toronto, April 3, 2018 (**Keynote presentation**)

“Smart biomaterials for wound healing, cardiac regeneration and antibacterial applications”, Myant visit, Faculty of Applied Science and Engineering, University of Toronto, April 04th, 2018

“Organ-on-a-Chip Engineering”, The Future of Health Innovation, Toronto, ON, April 12th, 2018

“Designer Biomaterials for Cardiovascular Regeneration” Heart and Stroke Foundation, Toronto, ON May 10th, 2018

“Microfabrication of Elastomeric Polymers for organ-on-a-chip Engineering and Injectable Tissues”, Andrew and Peggy Cherng Department of Medical Engineering Distinguished Speaker Seminar, Caltech and UCLA, Pasadena, CA May 17th, 2018

”Bioengineering functional heart tissues for discovery and therapy”, Heart and Stroke Foundation, Aird and Berlis, Toronto, ON, May 31st, 2018

“Microfabrication of Elastomeric Polymers for organ-on-a-chip Engineering and Injectable Tissues”, ECI (Engineering Conferences International) Nanotechnology in Medicine II: Bridging Translational in vitro and in vivo Interfaces, Albufeira Portugal, June 5th-9th, 2018 (**Plenary Speaker**)

“Microfabrication of Elastomeric Polymers for organ-on-a-chip Engineering and Injectable Tissues” iBEST Symposium, Ryerson University, Toronto, ON June 14th, 2018 (**Keynote Speaker**)

“Designer Biomaterials for Healing Regeneration”, Drug Carriers in Medicine and Biology Gordon Research Conference, West Dover, VT, August 12-17, 2018 (**Invited Speaker**)

Panel Discussion on Intellectual Property and Entrepreneurship, 2018 The Clinical Translation Education Group (CTEG), Toronto, ON September 14, 2018 (**Invited Speaker**)

“Advances in Organ-on-a-chip”, Sanofi Future of Biologics, Boston MA, October 15, 2018 (**Invited Speaker**)

“Organs-on-a-Plate and Injectable Tissues”, Regenerative Engineering Symposium, Pittsburgh PA, October 28, 2018 (**Plenary Speaker**)

“Elastomeric Polymers for Microfabrication of Organs-on-a-Chip”, Materials Research Society (MRS) Fall Meeting Symposium, Boston MA, November 27, 2018 (**Invited Speaker**)

“Microfabrication of Elastomeric Polymers for Organ-on-a-chip Engineering and Injectable Tissues”, Petit Institute Seminar at Georgia Tech, Atlanta GA, November 29, 2018 (**Invited Speaker**)

“Engineering atrial and ventricular cardiac tissues for drug testing”, Society of Toxicology of Canada 50th Annual Symposium, Toronto ON, December 11, 2018 (**Invited Speaker**)

“Engineering Microenvironments for Cardiovascular Regeneration”, Stem Cell Institute Weekly Research Conference at University of Minnesota, Minnesota MN, December 12, 2018 (**Keynote Speaker**)

“Microfabrication of Elastomeric Polymers for Organ-on-a-Chip Engineering and Injectable Tissues” Department of Biomedical Engineering, Columbia University, New York, NY, January 29th, 2019

“How to achieve tenure”, ACS Biomaterials Science & Engineering Webinar, February 22nd, 2019

“Engineering tissue architecture through microfabrication and polymer engineering”, EMBO/EMBL Symposia, Heidelberg, Germany, March 17-20, 2019 (**Invited Speaker**)

“Engineering tissue architecture through microfabrication and polymer engineering” Department of Biomedical Engineering, National University of Ireland Galway, Galway, Ireland, March 29th, 2019

“Predicting Proarrhythmia Using Cardiomyocytes Derived from iPS Cells”, Gordon Research Conference, Tuscany, Italy, March 31-April 5, 2019 (**Invited Speaker**)

“Heart-on-a-chip for Drug Discovery and Disease Modeling”, ICS Seminars and Visiting Scientist Program at the University of Manitoba & St. Boniface Hospital, Winnipeg, Manitoba, May 8, 2019 (**Invited Speaker**)

“Organ-on-a-Chip Engineering & Injectable Tissues”, Ottawa Cardiovascular Research Day, University of Ottawa Heart Institute (UOHI), Ottawa, ON, May 13, 2019 (**Keynote Speaker**)

“Engineering atrial and ventricular cardiac tissues for drug testing”, CBS2019 35th Annual Meeting of The Canadian Biomaterials Society, Quebec City, Quebec, May 21-24, 2019 (**Invited Speaker**)

“Organs-on-a-plate and injectable tissues”, Biomimetics in Bioengineering, Brisbane, Australia, August 4-6, 2019 (**Invited Speaker**)

“Making spare parts - engineered tissue for cardiac repair”, American Heart Association Conference 2019, Philadelphia PA, November 16-18, 2019 (**Invited Speaker**)

3.3 PROFESSIONAL ASSOCIATION MEMBERSHIPS

- (2003-2006, 2010) Materials Research Society (**MRS**)
- (2003-current) Tissue Engineering and Regenerative Medicine Society International (**TERMIS**)
- (2005-current) American Institute of Chemical Engineers (**AIChE**), Senior Member since 2008
- (2005-current) Society for Biological Engineering (**SBE**)
- (2006-2007) American Society for Engineering Education (**ASEE**)
- (2010-current) Biomedical Engineering Society (**BMES**)
- (2012-current) American Association for the Advancement of Science (**AAAS**)
- (2015-current) American Institute for Medical and Biological Engineering (**AIMBE**)

3.4 PROFESSIONAL ASSOCIATION ACTIVITIES

2005 AIChE Annual Meeting; Session Co-chair: Cardiovascular Tissue Engineering, Oct 30-Nov 04, Cincinnati, OH

2006 ISHR Meeting, North American Section; Session Chair: Tissue Engineering and Nanotechnology in the Heart/Vascular System, June 13-16th, 2006, Toronto, ON

2007 Scientific Day Program Committee and Verma Award Selection Panel, Heart & Stroke/Richard Lewar Centre of Excellence in Cardiovascular Research, University of Toronto

2007 TERMIS NA Conference and Exhibition on Tissue Engineering and Regenerative Medicine; Session Co-chair: Cardiac Tissue, June 13th-16th, 2007, Toronto, ON, Canada

2007 Annual Meeting of the American Electrophoresis Society (Topical conference at the 2007 AIChE Annual Meeting); Session Co-chair: Biomems and Microfluidics-Novel Applications, Nov 4-9, Salt Lake City, UT

2007 AIChE Annual Meeting, November 4-9, Salt Lake City, UT Session Co-chair:
Stem Cells in Tissue Engineering
Engineering Fundamentals of Life Sciences Poster Session

2008 World Biomaterials Congress, May 28-June 01, Amsterdam, The Netherlands, Symposium

organizer: Young Scientist Forum (replaced due to pregnancy)

2008 TERMIS EU, June 22-26, Porto, Portugal, Symposium Organizer/Chair: Cardiac Tissue Engineering (replaced due to pregnancy)

2008 AIChE Annual Meeting, November 2008, Philadelphia, PA Session Chair, Biomems and Microfluidics: Cell and Biomolecule Analysis (replaced due to pregnancy)

2009 World Congress of Chemical Engineering, August 23-27, Montreal, QC, Session Co-chair: Biomaterials, Tissue Engineering and Regenerative Medicine (6 and 7)

2009 AIChE Annual Meeting, November 8-13, 2009, Nashville, TN, Session Co-chair:
Biomaterial-Cell Interactions in Tissue Engineering
Bioreactors in Tissue Engineering

2009 MRS Fall Meeting, November 30 - December 4, Boston, MA, Session Chair: Engineering Biomaterials for Regenerative Medicine, RR4-Advanced Scaffold Design

2011 Society for Biological Engineering's Second International Conference on Stem Cell Engineering, May 02-05, 2010, Boston, MA – Poster Session Chair

2010 Canadian Biomaterials Society Meeting, June 02-04, Kingston, ON, Session Chair: Cardiovascular Biomaterials 1103

2010 BMES Annual Meeting, October 06-10, Austin, TX, Session Chair: Bioreactors and Bioprocessing in Tissue Engineering

2010 AHA Scientific Sessions, November 13-17, Chicago, IL, Session Moderator: Cardiovascular Seminar CVS.306.Update on Tissue Engineering: What's Growing?

2010 TERMIS-NA Annual Conference, December 08-08, Orlando, FL, Session Chair: Bioreactor Technologies

2010-2012 TERMIS-NA Membership Committee

2011 IEEE-EMBC Meeting, August 30th- Sept 3rd, Boston, MA Program Co-chair for Theme 7 Molecular and Cell Biomechanics, Tissue Engineering, Biomaterials

2011 IEEE-EMBC Meeting, August 30th- Sept 3rd, Boston MA, Mini-symposium organizer: Electrical Fields at the Cell and Protein Scale

2011 BMES Annual Meeting, October 12-15, Hartford, CT, Session Chair: Bioreactors and Bioprocessing in Tissue Engineering”

2011 AIChE Annual Meeting, October 28-November 02, Minneapolis, MN, Session Chair: Bioreactors In Tissue Engineering

2012 California Institute for Regenerative Medicine Tissue Engineering Workshop (closed, by invitation), Chair: Hydrogels for Cell Delivery & Tissue Repair I, January 11-14, 2012 San Francisco, CA

2012 TERMIS World Congress Advisory Board Member

2012 TERMIS World Congress, September 05-08, Vienna, Austria;

Session Chair: Cardiac Regeneration
Poster Session Chair: Translation in Tissue Engineering and Stem Cell Therapy
Poster Session Chair: Cardiac Regeneration
Poster Session Chair: Bioreactors for Translational Research

2012 BMES Annual Meeting , October 24th-27th, Atlanta, GA; Session Chair: Cardiovascular Tissue Engineering II

2012 Symposium Organizer “Beyond Borders: Lyon Sachs Symposium on Tissue Engineering and Regenerative Medicine”, Toronto, ON May 08-09

2012-2014 TERMIS-AM Membership Committee

2012-2013 Review Committee, **Israeli Council on Higher Education**, The Committee for the Evaluation of Biotechnology and Biotechnology Engineering, Reviewed the following institutions:
-Hadassah Academic College -Technion -Ben Gurion University -Tel Aviv University

2012 IBBME 50th Anniversary, October 10th, Toronto, ON; Session Chair: Biophysics of Cell Behavior

2012-2018, Member of Ontario Society of Professional Engineers Women in Engineering Committee

2013 Symposium Organizer “Beyond Borders: Lyon Sachs Symposium on Tissue Engineering and Regenerative Medicine”, Haifa, IL, May 06-08

2013 Society for Biomaterials Annual Meeting, April 10-13, Boston, MA; Session co-Chair: Biomaterials for Cardiac Repair

2013 TREMIS-AM Annual Meeting, November 10-13, Atlanta, GA; Organizer of the Inaugural Workshop on Women in Tissue Engineering and Regenerative Medicine. Wrote proposals to fund the Workshop.

2013 TREMIS-AM Annual Meeting, November 10-13, Atlanta, GA; Session Co-Chair: Engineering Tissues for in vitro Screening and Diagnostics

2013-2015 TERMIS-AM Membership Committee Chair

2013 BMES Annual Meeting, Sept 25-28, Seattle WA; Cardiovascular Engineering Track Chair; Abstract Reviewer

2013-2015 Founding chair of the Cardiovascular/Angiogenesis/Blood Thematic Working Interest Group (TWIG) at TERMIS-AM

2013-ongoing, Contributing member of Faculty of 1000 (F1000)

2014 TERMIS-AM Annual Meeting, Dec 11-15, Washington, DC; Scientific Advisory Committee Member

2014 TERMIS-AM Annual Meeting, Dec 11-15, Washington, DC

- Session Co-Chair: Cardiac tissue engineering: Current State and Future Perspectives
- Women in TERM Workshop Organizer

2014 BMES Annual Meeting, Oct 22-25, San Antonio, TX;

- Cardiovascular Engineering Track Chair; Abstract Reviewer
- Abstract Reviewer

- Poster session chair "Cardiac Electrophysiology and Mechanics"
- Poster session chair "Cardiovascular Regeneration and Functional Restoration"
- Platform session chair "Cardiac Regeneration"

2014-2015 IEEE BioMEMS Technical Committee Member

2015 TERMIS World Congress, Sept 08th-11th, Boston, MA; Scientific Advisory Committee Member

2015 TERMIS World Congress, Scientific Abstract Reviewer, Boston, Massachusetts, United States

2015-2018 **Council of Ontario Deans of Engineering (CODE)**, representative of OSPE

2015 **Canadian Biomaterials Society** Annual Meeting, Toronto, ON, Canada
Session Chair, "Soft tissue engineering"

2015 Annual Meeting of the **European Society of Artificial Organs**, Abstract Reviewer

2015 Annual Meeting of **Biomedical Engineering Society (BMES)**, Tampa FL, Abstract Reviewer

2015 **American Institute for Medical and Biological Engineering**, Nominations Review Panel

2015 Scientific Committee Member of the **42th European Society for Artificial Organs** meeting in Leuven, Belgium

2015 **Royal Society of Canada**, Chair of the Nominations Committee for College of New Scholars, Artists and Scientists.

2015 **AIMBE VOICE** Initiative

2016 **World Biomaterials Congress**, Montreal Canada
Abstract reviewer
Session Co-chair Organ-on-a-Chip Engineering
Workshop Organizer, "Round Table 4: Avenues of scientific information dissemination"

2016 Scientific Committee Member, **European Elastin Meeting**, Stuttgart, June 17th-19th

2016 **American Heart Association (AHA) Basic Cardiovascular Sciences (BCVS)**, Phoenix, AZ, USA
Scientific Program Committee
Abstract Reviewer

2016 GLP training February 10th

2016-2018 **OSPE Scholarships Review Panel**

2016 Organizing Committee, **AIChE International Conference on Stem Cell Engineering**, Toronto, ON, October 23-26, 2016.

2016 **American Institute for Medical and Biological Engineering**, Nominations Review Panel, Biomaterials

2016 **Workshop on the Future of Regenerative Medicine in Canada**, by invitation only, Council of

2016 **Program Committee, IEEE Micro- and Nanoengineering in Medicine Conference**, Waikoloa, HI, December 12th-16th, 2016

2016 Review Committee, “**Israeli Council on Higher Education**”, Member of the External Review Panel for Biomedical Engineering, 2016. Reviewed biomedical engineering programs at the following institutions:
-Technion-Israel Institute of Technology - Ben Gurion University -Tel Aviv University - Afeka College

2017 **Conference Co-Chair, Keystone Symposia**, “Engineered Cells and Tissues as Platforms for Discovery and Therapy (K1)” March 09-12th, 2017

2017 Session Chair, Engineered Tissues in Cancer, **Keystone Symposium**, “Engineered Cells and Tissues as Platforms for Discovery and Therapy” , Boston, MA, March 11th, 2017

2017 Session Organizer, “Biomaterials for Cardiovascular Regeneration”, Society for Biomaterials, Minneapolis, MN, April 5-8, 2017

2017 Session Chair, “Targeting Regenerative Medicine”, **Ted Rogers Centre for Heart Research- Heart Failure Update**, Toronto, ON, May 12th, 2017

2017 Review Subcommittee “**2017 AIMBE Cellular and Tissue Engineering**”

2017 Review Subcommittee “ **2017 AIMBE Biomaterials**”

2017 Session Co-Chair, “Advances in Cardiac Tissue Engineering & Bioengineered Valves for Vascular Repair”, **TERMIS-AM Annual Meeting**, Charlotte, NC, December 3rd-6th, 2017

2017 Poster judge, **TERMIS-AM Annual Meeting**, Charlotte, NC, December 3rd-6th, 2017

2017 Student/mentor lunch, **TERMIS-AM Annual Meeting**, Charlotte, NC, December 3rd-6th, 2017

2018 **TERMIS World Congress Meeting**, Full Investigator, Kyoto, Japan, September 3rd-7th, 2018

2018 **BMES Annual Meeting**, Editors & EAB Meeting, October 17th-18th, 2018 Alabama, USA

2018 Organizing Committee member for the Society for Biological Engineering **6th International Conference on Stem Cell Engineering** (Stem Cell 2018), Los Angeles, CA December 5th-7th, 2018

2018 Session Co-Chair, **Michael V. Sefton Symposium**, Toronto ON, October 29th & 30th, 2018

2018-2020 aster Alumni Association Board Member

2018 Organizing Committee member for the Society for Biological Engineering 6th International Conference on Stem Cell Engineering (Stem Cell 2018), Los Angeles, CA December 5th-7th

2018Session Co-Chair, Michael V. Sefton Symposium, CSChE Toronto ON, October 29th & 30th, 2018

2019 Organizer The Ontario-on-a-Chip (OOAC) Symposium, Toronto ON, May 16th & 17th, 2019

3.5 DEPARTMENTAL/FACULTY/UNIVERSITY COMMITTEES

- 2005-2009 Member Scientific Advancement Board of Advanced Regenerative Tissue Engineering Centre (ARTEC), Sunnybrook Health Sciences Centre, Toronto
- 2005 Biomaterials Search Committee Faculty of Dentistry/Department of Materials Science and Engineering and IBBME
- 2006-current Graduate Recruitment Committee, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2006 IBBME Scientific Day, University of Toronto, Poster Judge
- 2006-2008 Graduate Studies Committee, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2007-2008 Faculty of Applied Science and Engineering, member of the Working Group on Branding-defining the new brand for the Faculty
- 2007-2008, 2009-current Department of Chemical Engineering and Applied Chemistry, Awards and Honours Committee
- 2007-current Member of the Executive Committee for the REMEDI Project with the budget of \$18 million, University Health Network, Toronto
- 2007 IBBME Scientific Day, University of Toronto, Poster Judge
- 2007 PTR/Activity Evaluation Committee, IBBME, University of Toronto
- 2007 PTR/Activity Evaluation Committee, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2008 Organizer of the Assistant Professor's Retreat, Department of Chemical Engineering and Applied Chemistry
- 2009 Reviewer, Ontario Post-doctoral Fellowship, University of Toronto
- 2009 Organizer of the Symposium in Honour of Dr. Michael Sefton's 60th Birthday, University of Toronto
- 2010 PTR/Activity Evaluation Committee, IBBME, University of Toronto
- 2009-2010 IBBME Graduate Journal Advisory Committee
- 2010 Post-doctoral Fellowship Review Committee, Center of Excellence in Cardiovascular Research (HSRLCE), University of Toronto
- 2010 Reading Committee for a Tenure File, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2010-2011 Chair Search Committee for Department of Chemical Engineering and Applied Chemistry,

- 2011 Faculty Search Committee for IBBME/CCBR faculty position in stem cell bioengineering
- 2011 Third year review committee for Prof. Alison McGuigan, Department of Chemical Engineering and Applied Chemistry
- 2011, 2012 Graduate Coordinator-Collaborative Program, IBBME, University of Toronto
- 2012 Faculty Search Committee for Department of Chemical Engineering and Applied Chemistry
- 2012 Graduate Department Academic Appeals Committee (GDAAC), Chemical Engineering and Applied Chemistry
- 2012-current, Mentor for Prof. Rodrigo Fernandez-Gonzalesz, IBBME
- 2012-2013 IBBME Seminar Series organized visit of
 - Prof. Kursad Turksen, Feb 04th, 2013
 - Prof. Muhammad Yousaf, Feb 28th, 2013
- 2013 Three Year Review Committee for Prof. Arun Ramachandran, Department of Chemical Engineering and Applied Chemistry
- 2013-2014 Tenure Committee for Prof. Ofer Levi, Institute of Biomaterials and Biomedical Engineering
- 2013 Internal Reviewer for NSERC Discovery Grants, Institute of Biomaterials and Biomedical Engineering
- 2013 Graduate Scholarship Review Committee, Center of Excellence in Cardiovascular Research (HSRLCE), University of Toronto
- 2013-2014 IBBME Graduate Appeals Committee, University of Toronto
- 2013-2014 PRT Committee Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2014-2016 Center for Microfluidic Systems, Operations Committee
- 2014-2017 Member of the Connaught Committee, University of Toronto. This University committee oversees the use of funds from the sale of Connaught Labs to Sanofi-Pasteur for research and scholarship purposes.
- 2014-current, Mentor for Prof. Gizele Azimi, Department of Chemical Engineering and Applied Chemistry
- 2015 October-present Faculty Advisor for AIChE Student Chapter, University of Toronto
- 2015 October- present, Faculty Advisor for ChemE Car, University of Toronto
- 2016 **Search committee for Department Chair**, Chemical Engineering & Applied Chemistry
- 2016 **Search committee for a Faculty Member**, Department of Chemical Engineering and Applied

- 2016 **Advisory committee for selection of the Dean** of the Faculty of Applied Science and Engineering, University of Toronto.
- 2017 Tenure Committee member, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2017 Judge for the BESt Design Case Competition 2017, University of Toronto
- 2016-2017 IBBME Faculty Mentor for Undergraduate Student
- 2017-2020 Research Committee, Faculty of Applied Science and Engineering, University of Toronto
- 2017 Academic Planning Committee, Faculty of Applied Science and Engineering, University of Toronto
- 2017 Search Committee Member for the Director of the Institute of Biomaterials and Biomedical Engineering, University of Toronto
- 2018 President's International Council on the United States Committee, School of Public Policy & Governance, University of Toronto
- 2018 McCharles Prize Selection Committee, Faculty of Applied Science and Engineering, University of Toronto
- 2018 Decanal representative for the Electrical and Computer Engineering Faculty Search Committee
- 2018 Faculty Search Committee, Department of Chemical Engineering and Applied Chemistry
- 2018-current Space Committee, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2018 Annual Performance Review Committee, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2018-current Co-organizer of Ontario on a Chip/NSERC TOeP symposium, May 24th-25th, 2019
- 2017-current Associate Chair-Research, Department of Chemical Engineering and Applied Chemistry, University of Toronto
- 2017-current Research Committee, Faculty of Applied Science and Engineering, University of Toronto
- 2017-current Academic Planning Committee, Faculty of Applied Science and Engineering, University of Toronto
- 2016-current Director, Ontario-Quebec Center for Organ-on-a-Chip Engineering
- 2017-current Director, NSERC CREATE Training Program in Organ-on-a-Chip Engineering and Entrepreneurship
- International Scientific Advisory Board, TERMIS EU 2021

3.6 BOARDS

- Council Member, Tissue Engineering and Regenerative Medicine Society-Americas (2014-2016)
- Board of Directors, TARA Biosystems (2014-current)
- Board of Directors, Quthero Inc (2017-current)
- Board of Directors, Ontario Society of Professional Engineers (2015-2018)
- Board of Directors, McMaster Alumni Association (2018-current)
- Board of Directors, Canadian Biomaterials Society (2018-current)
- Centre for Doctoral Training External Advisory Board, University of Manchester (2018-current)

3.7 EDITORIAL BOARD MEMBER and REVIEWER

Journal Editor

- Associate Editor, **ACS Biomaterials Science & Engineering**, 2014-current
- Reviewing Editor, **eLife**, 2018-current
- Consulting Editor, **Journal of Molecular and Cellular Cardiology**, 2019-current
- Section Editor-Bioengineering, **International Journal of Artificial Organs** 2010-2014
- Editorial Board, **Tissue Engineering**, 2013-current
- Editorial Board, **Advanced Drug Delivery Reviews**, 2016-current
- Editorial Board, **Advanced Biosystems**, 2018-current
- Editorial Board, **Regenerative Biomaterials**, 2017-current
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Special Issue Editor

- "Tissue engineering of the heart: from in vitro models to regenerative solutions", **Advanced Drug Delivery Reviews**, Volume 96, January 2016
- "Biomaterials for cardiac tissue engineering", **Biomedical Materials**, Volume 10, Number 3, June 2015
- "Biomaterials in Canada", **ACS Biomaterials Science and Engineering**, 2018

Member of review panel:

- **NSERC RTI Peer Review Panel Member** (2018-current)
- **Innovation Fund Review Panel Member, Republic of Serbia** (2018-current)
- **Canadian Institutes of Health Research**, Project Scheme, Stage 2 Review Panel Member, 2017
- **Israeli Council on Higher Education**, Member of the External Review Panel for Biomedical Engineering, 2016. Reviewed biomedical engineering programs at the following institutions:
 - Technion-Israel Institute of Technology
 - Ben Gurion University
 - Tel Aviv University
 - Afeka College
- **Canadian Institutes of Health Research**, Project Scheme, College of Reviewers, 2015, 2016, 2017
- **NIH T32 & R25 Review Panel Member**, November 2016, November 2017
- **Canadian Institutes of Health Research**, Foundation Scheme, Stage 1, 2014, 2015
- Steacie Fellowship Nominations, University of Toronto Internal Review Panel, 2015, 2016
- **NIH Diabetic Complications Consortium**, Collaborative Funding Program, Grant Review Panel, 2015
- **NIH/NHLBI Program Project Grant Peer Review Panel Member**, June 05th, 2014
- **Israeli Council for Higher Education**, The Committee for the Evaluation of Biotechnology and Biotechnology Engineering, 2012-2013 Reviewed the following institutions
 - Hadassah Academic College
 - Technion
 - Ben Gurion University
 - Tel Aviv University

- **Heart and Stroke Foundation**, Committee V: Molecular Basis of Cardiac and Vascular Function, December 2012
- **NIH** Study Section (RO1 and R21): “New Strategies for Growing 3D Tissues”-ZHL CSR-N (M1 and M2) March 2011
- **Canadian Institutes of Health Research**, Biomedical Engineering Peer Review Panel (**CIHR-BME**) (Spring 2008, Fall 2010, Spring/Fall 2011, Spring/Fall 2012, Spring/Fall 2013, Spring 2014, Spring 2015, Spring 2019)
- Ontario Graduate Scholarship (**OGS**) Ministry of Training Colleges and Universities (2007-2009)
- McEwan Centre for Regenerative Medicine Post-doctoral Fellowship Review Panel (2007)

External reviewer:

- A*STAR, Biomedical Research Council, Singapore
- British Foundation Rosetrees Trust
- Fondazione Cariparo, Italy
- Fondation pour la Recherche Médicale, France (Bioengineering for Health)
- Heart and Stroke Foundation of Canada (**HSF**)
- Human Science Frontier
- Israel Science Foundation (**ISF**)
- Israeli Ministry of Science
- National Children’s Research Centre (Ireland)
- National Science and Engineering Research Council of Canada (**NSERC**)
- Sick Kids Hospital, Toronto
- US-Israel Binational Foundation
- Knut and Alice Wallenberg Foundation, Sweden
- NIH Diabetic Complications Consortium
- Weil College of Medicine
- European Research Commission
- Serbia Innovation Fund
- Research Council of Norway
- Research Fund Denmark

Ad hoc reviewer:

- ACS Biomaterials Science and Engineering
- ACS Nano
- Acta Biomaterialia
- Advanced Biosystems
- Advanced Drug Delivery Reviews
- Advanced Functional Materials
- Advanced Healthcare Materials
- Advanced Science
- Annals of Biomedical Engineering
- Biofabrication
- Biomacromolecules
- Biomaterials
- Biomatter
- Biomedical Materials
- Biomicrofluidics
- BioTechniques
- Biotechnology & Bioengineering
- Biotechnology Progress
- Cardiovascular Engineering
- Cardiovascular Engineering and Technology

- Circulation
- Circulation Research
- Communications Biology
- Current Opinion in Chemical Engineering
- Current Vascular Pharmacology
- eLife
- Experimental Cell Research
- FASEB Journal
- Industrial & Engineering Chemistry Research
- Integrative Biology
- International Journal of Artificial Organs
- Israel Journal of Chemistry
- Journal of Biomaterials Applications
- Journal of Biomechanics
- Journal of Biomedical Materials Research Part A
- Journal of Biomedical Materials Research Part B
- Journal of Cellular Physiology
- Journal of the American Heart Association
- Journal of Theoretical Biology
- Journal of Tissue Engineering and Regenerative Medicine
- Lab on a Chip
- Langmuir
- Materials Today
- Methods
- Nature
- Nature Biomedical Engineering
- Nature Biomedical Engineering
- Nature Biotechnology
- Nature Cardiology
- Nature Communications
- Nature Materials
- Nature Medicine
- Nature Methods
- Nature Protocols
- Neurological Research
- Organogenesis
- PLoS One
- PNAS
- PNAS (4)
- Proceedings of the Materials Research Society
- Science (1)
- Science Advances
- Science Translational Medicine
- Scientific Reports
- Soft Matter
- Stem Cell Reports
- Stem Cell Research
- Stem Cell Research and Therapy
- Stem Cells Translational Medicine
- Tissue Engineering
- Trends in Cardiovascular Medicine
- **Outstanding Reviewer Status**, Acta Biomaterialia, April 2014

3.8 PUBLIC AWARENESS/EDUCATION

- Featured on the cover of “**Changing our world: The Stories of Women Engineers**” (Feb 2006). This is a flagship book of an outreach program sponsored by 55 US institutions aimed at increasing the enrolment of women in engineering <http://www.engineeringwomen.org/>
- Appeared on **TVOntario** show **More2Life** with Mary Ito. Topic: Women in Science, Jan 06, 2006.
- **Summer 2006 Institute of Biomaterials and Biomedical Engineering**. Seminar to the Summer Students in IBBME, University of Toronto, on cardiac tissue engineering, most of whom were the undergraduate students of the University of Toronto.
- Winter 2008-2012 **Chemical Engineering Research Days**. Presentation to Chemical Engineering undergraduate students, University of Toronto.
- **Youth Outreach, April 14, 2009** Organized a full day of laboratory demonstrations for high school students from the Hill Academy in Kleinburg, Ontario. Sponsored by the Youth Outreach Funds from my Early Researcher Award. The teacher was Stacy Shulz and 18 students attended.
- **CAIGS visit, Department of Chemical Engineering and Applied Chemistry, April 07, 2009** We showcased our lab to the Canadian Association of Girls in Science.
- **Science Rendez-vous, May 09, 2009 and 2010**. We participated and helped organize the demonstrations for the University-wide event focused on raising awareness about science. During Science Rendez-vous, the University is open to the public and it is estimated that thousands of people bring their children to this event every year.
- **Let’s Talk Science Lab Tours and Outreach, May 19, 2009 and 2010** Forty students grade 7-8 attended the lab tours. We showed them beating cardiac tissue and H&E stained slides of sectioned hearts.
- “Engineered Heart Tissue” presentation for Graduate Recruitment weekend Department of Chemical Engineering and Applied Chemistry, Jan 28th, 2011
- “Cardiac Tissue Engineering” presentation to the **Club for Undergraduate Biomedical Engineering**, University of Toronto, October 17, 2011
- **Galbraith Society Mentor**, University of Toronto, mentoring 4 undergraduate students 2011-2012
- “Engineered Heart Tissue”, Department of Chemical Engineering and Applied Chemistry, University of Toronto, **Research Days**, Jan 26th, 2012
- “Managing students, time and money” presentation to **Prospective Professors in Training Program**, University of Toronto, Faculty of Applied Science and Engineering, January 30th, 2012
- “Developing therapies for replacing damaged heart tissue vs. endogenous repair”, **Let’s Talk Science**, Stem Cell Talks, Toronto, ON, March 09th, 2012
- 2013 Featured on “**Canadian Women of Innovation**” web-site created by the Canada Science and Technology Museum in Ottawa, Ontario, Canada in partnership with Engineers Canada

<http://www.women-innovation.technomuses.ca/>

- “Tissue engineering vs endogenous healing for spinal cord injury” Debate, Let’s Talk Science, Stem Cell Talks, Toronto, ON, March 07th, 2014
- 03/2014 Featured in #30in30: 30 Women in Engineering in 30 days again this year in celebration of National Engineering Month by Women in Science and Engineering. Milica Radisic featured on March 18th.
<http://scieng-women-ontario.ca/en/features/30in30/march-18-milica-radisic/>
- BME 1450 Tissue Engineering and Biomaterials Theme Presentation, University of Toronto, Sept 2014
- Chemical Engineering Research Days, University of Toronto, February 9th, 2015
- “Tissue Engineering” Track One Presentation, University of Toronto, January 15th, 2015
- **CAIGS visit, Department of Chemical Engineering and Applied Chemistry, December 09th, 2015** We showcased our lab to the Canadian Association of Girls in Science.

3.9 SELECTED MEDIA FEATURES

1. “Heart tissue is grown from rat heart cells” Associated Press, Dec 14, 2004
2. “Heart patch pulses like the real thing” – study Reuters, Dec 14, 2004
3. “Beating heart tissue grown in lab” BBC News, Dec 15, 2004
4. “Electrical Signals Key to Culturing Heart Tissue” Scientific American, online, Dec 14, 2004
5. “MIT grows beating heart tissue” Boston Globe, Dec 14, 2004
6. “Engineered grow heart tissue that mends broken hearts” MIT TechTalk Dec 15, 2004
7. “Rebuilding broken hearts” The Toronto Star, Sept 27th, 2004
8. “How to fix a broken heart in ten easy steps” The Varsity, Apr 17th, 2003
9. “Tissue engineering: The beat goes on” Nature, Feb 27;421(6926):884-6. 2003
10. “Rebuilding Site: Bioactive scaffolds combine physical support with biological activity” WellcomeScience Issue 2, pg 10-11, March 2006,
11. Brochure, Department of Chemical Engineering, McMaster University (Fall 2005); Interfaces, Department of Chemical Engineering, University of Toronto (Spring 2006).
12. “Transplants made to order” The Scientist, 20 (9) 35, Sept 2006
13. Interview at www.regenerativemedicinetoday.com (#35) July 17, 2007
14. “Top 35 Innovators under 35”, M.I.T. Technology Review, September/October 2008
15. “Technology Review names U of T's Radisic top innovator”, University of Toronto Homepage on
16. August 19th, 2008
17. “Leading Edge: Healing the heart”, UofT Magazine, Winter 2009
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- Nunes et al Nature Methods 2013 highlighted by SciBX 6(29); doi:10.1038/scibx.2013.774: "Platform for maturation of human pluripotent stem cell-derived cardiomyocytes"
- Xiao et al Lab on a Chip 2014 selected as a HOT article by the journal and featured on the cover.
- Zhang et al Science Advances 2015 featured in The Scientist magazine. "Next Generation: Cell-Covered Fastener", *The Scientist*, August 31st, 2015
- Zhang et al Nature Materials, 2016 highlighted in Nature Reviews Materials. "A hearty chip", by Stoddart A, *Nature Reviews Materials*, doi:10.1038/natrevmats.2016.26, 1: 2016
- Zhang et al Nature Materials, 2016 highlighted in "Tissue engineering: Scalable vascularized implants" by Zheng Y, Roberts MA. *Nature Materials*, 15:597-9, 2016
- Davenport-Huyer et al Acta Biomaterialia 2016 highlighted in "CNT-polyester scaffolds do not miss a beat", *Materials Today*, January 31st, 2016
- "Ways to patch a broken heart", Science, vol. 357, p.1110, 2017
- Zhao et al Cell, 2019 highlighted in Parker KK "Designer Assays for Your Sick, Subdivided Heart" Cell 176: 684-685, 2019

3.11 RESEARCH FUNDING

<u>Agency</u>	<u>Total amount</u>	<u>Period</u>	<u>Annual Amount for MR</u>	<u>Project Title/PI</u>
National Institutes of Health (NIH) (USA)	US\$1,520,000 (\$117, 258 for MR)	2005-2010	\$23,542	Engineering Vascularized Myocardium PI: G. Vunjak-Novakovic
Ontario Research Development Challenge Fund (ORDCF)	\$6,099,250 (\$150,019 for MR)	2005-2009	\$37,505	Advanced Regenerative Tissue Engineering Centre (ARTEC) PI: J. Semple, K. Woodhouse +4 others “Tissue engineering of a functional cardiac patch based on peptide modified chitosan scaffold” PI: M. Radisic
University of Toronto Connaught Start-Up Award	\$10,000	2005-2007	\$5,000	Advanced Bioreactor for Functional Tissue Engineering PI: M. Radisic
CFI Leaders Opportunity Fund / ORF-RI	\$281,875	2006-2008	\$140,937	Laboratory for Functional Tissue Engineering PI: M. Radisic

NSERC Discovery Grants -Individual	\$98, 000	2006-2010	\$24,500	Advanced Bioreactors for Functional Tissue Engineering of Myocardium PI: M. Radisic
New Staff Matching Grant Connaught Fund, University of Toronto	\$30,000	2006-2008	\$15,000	Resident Cardiac Progenitor Cell for Tissue Engineering Applications PI: M. Radisic
Dean of Medicine- New Staff Grants, University of Toronto	\$10,000	2006-2011	\$2,000	Photocrosslinkable biomaterial for cell injection and cardiac tissue engineering PI: M. Radisic
Turner Biosystems Grants Program	\$3,800	2007	\$3,800	Turner Biosystems Fluorometer (TSB-380) Grant PI: C. Simmons
American Health Assistance Foundation National Heart Foundation	\$60,000 (\$12,000 for MR)	2007-2009	\$6,000	Microscale Isolation of Cardiac Progenitor Cells PI: S. Murthy
CFI Leading Edge Fund	\$18,000,000 (\$321,432 for MR)	2007-2010	\$107,144	The Regenerative Medicine Project PI: R. Weisel
CFI Infrastructure Operating Fund	\$33,825	2007-2010	\$11,275	Laboratory for Functional Tissue Engineering PI: M. Radisic

CIHR Regenerative Medicine and Nanomedicine Team Grant	\$2,287,690 (\$65,354 for MR)	2006- 2011	\$13,071	The Cardiac Regeneration (CARE) Project PI: R. Weisel
Heart and Stroke Foundation (Grant-in-Aid)	\$ 156,521	2007- 2010	\$52,174	“Peptide modified photocrosslinkable chitosan for cell therapy in myocardial infarction” PI: M. Radisic , Co-Is: R-K Li, M Rupnick
Juvenile Diabetes Research Foundation Innovative Grant	\$107,848	2007- 2008	\$107,848	“ <i>In vitro</i> model system for cardiac cell therapy in diabetic patients” PI: M. Radisic , co-PI: P. Zandstra
Early Researcher Award Ministry of Research (ERA) and Innovation, Ontario	\$100,000 (ERA) \$50,000 (Univer sity of Toronto matchin g)	2007- 2012	\$30,000	“Functional cardiac patch based on resident cardiac progenitor cells” PI: M. Radisic
Ontario Centers of Excellence	\$ 33,716	2008- 2009	\$ 33,716	“Biomaterials with growth factor gradients for cardiac cell therapy” PI: M. Radisic , Co-PI: M. Shoichet
NSERC Research Tools and Instrumentation	\$112,390	2008- 2009	\$112,390	Real Time PCR for Advanced Tissue Engineering PI: M. Shoichet; Co-Is: C. Morshead, M. Radisic

Heart and Stroke Foundation (Grant-in-Aid)	~\$718,500 (~\$70,000 for MR)	2009-2013	\$17,500	“Interrogating the cardiomyogenic hierarchy to optimize cardiovascular cell therapy” PI: P. Zandstra; Co-I: M. Husain, K. Nanthakumar, M. Radisic
NSERC CREATE	\$1,650,000	2009-2015	Student scholarships awarded on competitive basis	NSERC CREATE Program in Microfluidic Applications and Training in Cardiovascular Health PI: M. Sefton +9 Co-Is (C. Simmons, A. Guenther, M. Radisic etc.)
CFI New Initiatives Fund/ORF	\$9,374,885 (all for common facility)	2009-2012	\$0	Centre for Microfluidic Systems in Chemistry and Biology PI: M. Sefton, A. Guenther
NSERC Strategic Projects	\$422,000	2009-2012	\$140,667	“Engineering vascular networks by site specific differentiation of angiogenic progenitor cells” PI: M. Radisic , co-I: M. Sefton, W. Stanford
HSFO Grant-in-Aid	\$249,277	2010-2014	\$62,319.35	“Chitosan hydrogel with immobilized growth factors for cell therapy in myocardial infarction” PI: M. Radisic , co-I: R-K Li
NSERC Discovery Grant	\$270,000	2010-2015	\$54,000	“Cardiac tissue engineering and cell separation” PI: M. Radisic

NSERC Discovery Accelerator Supplement	\$120,000	2010- 2013	\$40,000	“Processing and design criteria for engineering artificial tissues” PI: M. Radisic
ORF GL2	\$6,641,774 (\$480,000 for MR)	2009- 2013	\$120,000	“Cardiovascular biomarker discovery in disease and development through predictive precision proteomics (CBD3P3)” PIs: P. Liu and G. Keller, co- Is: A. Gramolini, T. Kislinger, P. Zandstra, M. Radisic, S. Mital, J. Coles
NIH RO1	\$1,384,974 (\$147,600 for MR)	2010- 2014	\$36,900	Microfluidic Cell Separation for Tissue Engineering and Regenerative Medicine PI: S. Murthy, co-I. R. Carrier, M. Radisic, V. Sales/J. Mayer, Y. Nahmias/M. Yarmush
NSERC-CIHR CHRP	\$444,765	2010- 2014	\$111,191	Tissue engineered patches for the repair of cardiovascular congenital malformations PI: M. Radisic Co-I: Li R-K, Stanford WL
Connaught Fund, University of Toronto	\$60,000	2011	\$60,000	Application of QHREDGS peptide in survival and expansion of human stem cells and their cardiovascular progeny PI: M. Radisic
NSERC Engage	\$24,985	2011	\$24,985	Peptide functionalized bone implant coatings for improved osteogenesis PI: M. Radisic

Canada Research Chair (Tier 2)	\$500,000	2011-2016	\$100,000	Functional Cardiovascular Tissue Engineering PI: M. Radisic
CFI-LOF	\$150,000	2013	\$150,000	Laboratory for Cardiovascular Tissue Engineering PI: M. Radisic
ORF	\$150,000	2013	\$150,000	Laboratory for Cardiovascular Tissue Engineering PI: M. Radisic
NIH UH2	\$1,560,000 (\$0 for MR)	2012-2017	\$0 (it turned out money was not allowed to leave USA)	Integrated heart-liver-vascular systems for drug testing in human health and disease PI: G. Vunjak-Novakovic CO-Is: C. Chen S. Bhatia K. Hirshi (M. Radisic)
NIH RO1	\$2,098,047 (\$423,845 for MR)	2013-2018	\$84,769	Engineering Vascularized Myocardium PI: G. Vunjak-Novakovic Co-I: M. Radisic

NSERC I2I	\$123,950	2012 - 2013	\$123,950	Device for cell separation based on manipulation of settling velocity PI: M. Radisic
NSERC CREATE	\$1,650,000	2013-2018	Student scholarships awarded on competitive basis	NSERC CREATE training program in manufacturing, materials and mimetics (M3) PI: M. Shoichet (+9co-PIs including Radisic)
CIHR Operating Grant	\$523,039	2013-2017	\$130,760	Engineering Microenvironments for Cardiac Regeneration PI: M. Radisic Co-I: K. Nanthakumar, G. Keller
McLean Award	\$100,000	2013-2017	\$25,000	Cardiovascular tissue engineering
Peter Munk Cardiac Center Innovation Committee	\$257,000 (\$65,000 for MR)	2013-2014 (\$65,000 for MR)	\$65,000	Personalized Antiarrhythmic Therapy using iPS cells in a Novel Arrhythmia in Dish Technique PI: K. Nanthakumar Co-I: M. Radisic, G. Keller, P. Backx
E.W.R. Steacie Memorial Fellowship	\$250,000 research grant +\$60,000 salary support	2014-2016	\$125,000 grant and \$30,000 salary	E.W.R. Steacie Memorial Fellowship
NSERC RTI	\$149,854	2014-2016	\$149,854	Light sheet microscopy for studies of fractal tubulogenesis PI: M. Radisic

CIHR Operating Grant	\$546,590	2014-2018	\$136,647	Injectable functional tissues: a perfect marriage of tissue engineering and minimally invasive delivery
NSERC Discovery Grant	\$285,000	2016-2021	\$57,000	Biomaterial processing for organ-on-a-chip Engineering PI: M. Radisic
NSREC CREATE	\$1,650,000	2016-2022	\$300,000	Training program in organ-on-a-chip engineering and entrepreneurship (TOeP) PI: M. Radisic and 10 colleagues from IBBME, Chem Eng and MIE
NSERC Engage	\$25,000 +\$15,000 industrial contribution +\$40,000 in kind	2015	\$25,000	Platform technologies for podocyte in vitro cultivation PI: M. Radisic
Ontario Institute of Regenerative Medicine-New Ideas Grant	\$50,000	2015-2016	\$25,000	Mechanical Interlock Technology for Scalable Assembly of Injectable Cardiac Patches In vivo PI: M. Radisic
Heart and Stroke Foundation, Grant-in-Aid	\$274,593	2016-2019	\$91,532	Mobilizing epicardial cells for enhanced integration of human cardiac patches PI: M. Radisic

NSERC-CIHR Collaborative Health Research Program	\$298,575	2016-2019	\$99,525	Platform technology for maturation of human stem cell derived cardiomyocytes and cardiotoxicity screening PI: M. Radisic
NSERC RTI	\$149,911	2016-2018	\$149,911	Advanced platform to characterize the mechanical and structural properties of natural and engineered soft biomaterials PI: C. Simmons
NSERC RTI	\$140,618	2016-2018	140,618	“Key Characterization and Synthesis Tools for Defined Polymeric Hydrogels to Guide Cell Fate” PI: M. Shoichet
Canada Research Chair	\$500,000	2016-2021	\$100,000	CRC in Functional Cardiovascular Tissue Engineering (Tier II) PI: M. Radisic
CFI Innovations Fund/ORF/Quebec	\$10,587,979	2018-2021	\$6,500,000	Ontario-Quebec Centre for Organ-on-a-Chip Engineering PI: M. Radisic
NSERC RTI	\$150,000	2017	\$150,000	An integrated incubator-microscope for cell manipulation and measurement PI: Yu Sun

NSERC CRD	\$107,000	2017-2019	\$53,500	Technology for high fidelity podocyte cultivation PI: M. Radisic
University of Toronto/UHN	\$60,000	2016-2018	0	EMH Seed - Rescue of resident macrophages with biomaterials after myocardial infarction PI: K. Nanthakumar
NSERC Strategic Partnership Grants	\$544,434	2017 2018 2019	\$183,636 \$179,704 \$181,094	Additive manufacturing of organs-on-a-chip using biodegradable elastomeric polymers PI: M. Radisic Co-PI: D. Juncker
Rogers Strategic Initiative Projects	\$1,000,000	2018-2020	\$80,000	Precision therapeutics for MYH7 and MYBPC3 associated cardiomyopathies PI: J. Ellis Co-Is: M. Radisic, S. Mital, C. Simmons, P. Billia
Heart and Stroke Foundation Grant-in-Aid	\$246,463	2018-2021	\$91,532	Harnessing the body's inherent molecular defense to develop new antimicrobial and immunomodulatory polymers for cardiac and surgical applications PI: M. Radisic Co-I: S. Epelman

NSERC RTI	\$147,116	2018-2020	\$150,000	Enabling the discovery and development of functional materials and technologies via confocal rheometry PI: A. Ramchandran Co-I: M. Radisic, E. Acosta, E. Young
University of Toronto-University of Manchester joint research fund	GBP £5,000 (UoM funding) and CAD \$8,500 (U of T funding).	2019	\$8,500	Collaboration with Manchester University M. Radisic & Sarah Cartmell
NSERC RTI	150,000	2019	\$150,000	Everyday Tools for Biomaterials for Protein Release PI: M. Shoichet
CFI IOF	\$1,251,566	2019-2021	\$353,190	Ontario Quebec Center for Organ-on-a-Chip engineering PI: M. Radisic
NIH RO1	\$2,000,000	2019-2024	\$270,000	Engineering vascularized cardiac muscle PI: G. Vunjak-Novakovic Co-I: M. Radisic

4. TEACHING

4.1 COURSES

Role/Period	Subject/curriculum	Duties/Purpose
Instructor Winter 2017 Winter 2018	CHE 416 Chemical Engineering in Human Health	The course provides an overview of areas in which chemical engineers provided a transformative contributions to the human health: e.g. tissue

		engineering, biomaterials, cell expansion, development of antibiotics etc
Instructor Fall 2011	BME496/BME455 Cellular and Molecular Bioengineering	Taught engineering methodologies to characterize cellular behavior and the rational modification of cells to become part of systems that solve biomedical problems
Instructor Fall 2010 Fall 2013 Fall 2018	JTC 1331 Biomaterials	Coordinated and taught in a multi-instructor graduate course focused on biomaterials, host response and applications of biomaterials in tissue engineering and regenerative medicine
Instructor Winter 2010 Winter 2011 Winter 2012 Winter 2014	CHE210 Heat and Mass Transfer (2 th year course, 120 students)	Taught fundamentals of heat and mass transfer: conduction, diffusion, convection, steady state and transient problems, 1D and 2D. Heat exchangers. Convective heat/mass transfer coefficient correlations. Simultaneous heat and mass transfer. Mass transfer between phases.
Instructor Winter 2007 Winter 2008 Fall 2009	CHE466 Bioprocess Engineering (4 th year course, 28 students)	Designed a new tissue culture laboratory. Taught material relevant to bioreactor design, fermentations, bioseparations, tissue culture and waste-water treatment.
Instructor Winter 2007 Winter 2008 Winter 2010 Winter 2011 Winter 2013	BME105 Systems Biology (1 st year course, 270 students)	Taught a course section covering material in cell biology (cell structure, cell membrane and transport across the membrane)
Instructor Fall 2005	CHE353 Engineering Biology (3 rd year course, 180 students School of Engineering)	Designed a course section to examine cell structure and transport across cell membrane
Teaching Lab Supervisor 2007-2008	IBBME Teaching Lab Faculty Supervisor	IBBME offers labs for 18 different courses to over 1000 students. Roles to ensure 1) that all safety certificates are in place 2) that the labs are scientifically and practically sound and 3) that the cost is within the allocated budget.
Guest Lecturer Winter 2007 Winter 2008	BME395 Molecular Bioengineering (3 rd year course, ~70students)	Gave 2 hrs of lectures on cardiac tissue engineering: advances and challenges
Guest Lecturer Winter 2008 Winter 2009 Fall 2009	BME1450 Introduction to Bio-Engineering (Graduate Course, IBBME ~100 students)	Gave 1 hr lecture on cardiac tissue engineering
Guest Lecturer Winter 2009 Winter 2012	PPIT Prospective Professors in Training	Managing students, time and money
Guest Lecturer Winter 2013	PSL 462/PSL 1462 Molecular Aspects of Cardiac Physiology	Human pluripotent stem cells and cardiomyocytes
Teaching Assistant Fall 2003	Introduction to Chemical Engineering, MIT (Instructors: Sawin/Stephanopoulos)	Help session instruction, preparation of homework and test solutions, exam review sessions (20hr/week)

4.2 THESIS COMMITTEES

Date	Role	Student/Department	Student's supervisor
09.04.2019	PhD Committee Meeting	Christoph Haller, IBBME	M. Laflamme
08.03.2019	PhD Committee Meeting	Ratna Varman, IBBME	T. Waddell
29.01.2019	PhD Committee Meeting	Marianne Wauchop, IMS	P. Backx
20.12.2018	PhD Committee Meeting	Mohsen Afshar, IBBME	M. Sefton
19.12.2018	MASc Committee Meeting	Serena Mandla, IBBME	M. Radisic
14.12.2018	MASc Thesis Defense	Gyu-Tae Kim, IBBME	B. Hinz
13.12.2018	PhD Committee Meeting	Mohammad Hossein Mohammadi	M. Radisic
07.12.2018	PhD Committee Meeting	Neal Callaghan, IBBME	C. Simmons
19.11.2018	PhD Committee Meeting	Anastasia Korolj, Chem Eng	M. Radisic
09.11.2018	PhD Committee Meeting	Christoph Haller, IBBME	M. Laflamme
02.11.2018	PhD Committee Meeting	Dawn Bannerman, IBBME	M. Radisic
24.09.2018	PhD Committee Meeting	Virginie Coindre, IBBME	M. Sefton
24.09.2018	PhD Committee Meeting	Richard Cheng, IBBME	A. Guenther
13.09.2018	PhD Qualifying Exam	Darren Rodenhizer, ChemEng	A. McGuigan
12.09.2018	PhD Committee Meeting	Locke Davenport-Huyer, ChemEng/IBBME	M. Radisic
24.08.2018	MASc Committee Meeting	Stasja Drecun, IMS	C. Morshed
24.08.2018	PhD Committee Meeting	Gyu-Tae Kim, IBBME	B. Hinz
20.07.2018	PhD Committee Meeting	Elisa D'Arcangelo, Chem Eng	A. McGuigan
19.07.2018	PhD Qualifying Exam	Nimalan Thavandiran, Chem Eng	M. Radisic
11.07.2018	PhD Qualifying Exam	Samantha Payne, Chem Eng	M. Shoichet
20.07.2018	PhD Committee Meeting	Elisa D'Arcangelo	A. McGuigan
11.07.2018	PhD Qualifying Exam	Samantha Payne, Chem Eng	M. Shoichet
03.07.2018	PhD Qualifying Exam	Miles Montgomery, Chem Eng/IBBME	M. Radisic
20.06.2018	PhD Qualifying Exam	Neal Callaghan, IBBME	C. Simmons
19.06.2018	PhD Committee Meeting	Marianne Wauchop, IMS	P. Backx
23.05.2018	PhD Committee Meeting	Ratna Varman, IBBME	T. Waddell
25.04.2018	PhD Committee Meeting	Mohsen Afshar, IBBME	P.E. Gilbert
07.03.2018	PhD Committee Meeting	Darren Rodenhizer, Chem Eng	A. McGuigan
13.02.2018	PhD Committee Meeting	Samantha Payne, Chem Eng	M. Shoichet
02.02.2018	PhD Committee Meeting	Jieun Kim, IBBME	P. Zandstra
29.01.2018	PhD Committee Meeting	Ben Fook Lai, IBBME	M. Radisic
26.01.2018	PhD Committee Meeting	Masood Khaksar, Chem Eng	K. Mahadevan
20.12.2017	PhD Qualifying Exam	Marianne Wauchop, IMS	P. Backx
13.12.2017	PhD Committee Meeting	Erika Wang, IBBME	M. Radisic
08.12.2017	PhD Committee Meeting	Masood Khaksar, Chem Eng	R. Mahadevan
29.11.2017	PhD Qualifying Exam	Rick Lu, IBBME	M. Radisic
27.11.2017	PhD Committee Meeting	Elisa D'Arcangelo, Chem Eng	A. McGuigan
03.11.2017	MASc Committee Meeting	Stasja Drecun, IMS	C. Morshead
26.10.2017	PhD Committee Meeting	Ben Fook Lai, IBBME	M. Radisic
23.10.2017	PhD Committee Meeting	Neal Callaghan, IBBME	C. Simmons
17.10.2017	PhD Committee Meeting	Richard Cheng, IBBME	A. Guenther

02.10.2017	PhD Committee Meeting	Locke Davenport Huyer, ChemEng/IBBME	M. Radisic
28.09.2017	PhD Qualifying Exam	Ben Fook Lai, IBBME	M. Radisic
27.09.2017	PhD Qualifying Exam	Mohammad Hossein	M. Radisic
19.09.2017	PhD Qualifying Exam	Dawn Bannerman, IBBME	M. Radisic
19.09.2017	PhD Committee Meeting	Samantha Payne, Chem Eng	M. Shoichet
08.09.2017	PhD Committee Meeting	Anastasia Korolj, Chem Eng	M. Radisic
06.09.2017	PhD Qualifying Exam	Mohammad Hossein	M. Radisic
05.09.2017	PhD Qualifying Exam	Dawn Bannerman, IBBME	M. Radisic
05.09.2017	PhD Committee Meeting	Charlie Xu Chen	???
18.08.2017	PhD Committee Meeting	Gyu-Tae Kim	B. Hinz
15.02.2017	PhD Committee Meeting	Miles Montgomery, Chem Eng	M. Radisic
08.02.2017	MASc Committee Chair	Stasja Drecun, IMS	C. Moreshead
08.02.2017	MASc Thesis Defense	Genna Contant, Chem Eng	M. Radisic
24.01.2017	PhD Committee Bypass Chair	Samantha Cheung, Chem Eng	G. Allen
12.01.2017	PhD Committee Meeting, Member	Mohsen, Afshar, IBBME	P. Gilbert
05.01.2017	PhD Defense, Member	Yang Li, ChemEng	A. Ramchandran
20.12.2016	PhD Qualifying Exam, Member	Richard Cheng, IBBME	A. Gunether
16.12.2016	PhD Qualifying Exam	Ben Fook Lai, IBBME	M. Radisic
14.12.2016	PhD Committee Meeting, Member	Ratna Verma, IMS	T. Waddell
22.11.2016	PhD Committee Meeting	Anastasia Korolj, Chem Eng	M. Radisic
22.11.2016	PhD Committee Meeting, Chair	Elisa Archangelo, Chem Eng	A. McGuigan
16.11.2016	PhD Defense	Iran Rashedi, IBBME	A. Keating/M. Radisic
09.11.2016	MASc Defense, Committee Member	Patricia Omoruwa, IBBME	A. Guenther
04. 11.2016 17. 06. 2016	PhD Committee Meeting	Nimalan Thavandiran, Chem Eng	P. Zandstra/M. Radisic
03.11.2016	PhD Committee Meeting	Locke Davenport-Huyer, Chem Eng	M. Radisic
02.11.2016	PhD Committee Meeting, Member	Samantha Payne, Chem Eng	M. Shoichet
03.10.2016	PhD Qualifying Exam, Committee Member	Marianne Wauchop, IMS	P. Backx
01.10. 2016	MASc Thesis Defense, Chair	Jessica Ngai, IBBME	M. Shoichet
29.08.2016	PhD Committee Meeting, Member	Chris Ahuja, IMS	M. Fehlings
05.07.2016	PhD Committee Meeting	Yimu Zhao, Chem Eng	M. Radisic
08.06.2016	PhD Committee Meeting, Member	Jieun Kim, IBBME	P. Zandstra
26.04.2016	PhD Cmt Chair	Darren Rodenhizer, Chem Eng	A. McGuigan
22.04.2016	SGS Defense	Boyang Zhang, Chem Eng	M. Radisic
12.04.2016	PhD Cmt Meeting	Stephanie Fisher, Chem Eng	M. Shoichet
27.11.2015	PhD qualifying exam	Ratna Verma, IMS	T. Waddell

14.07.2015	PhD cmt meeting		
25.11.2015	PhD qualifying exam	Locke Davenport-Huyer, ChemEng/IBBME	M. Radisic
24.11.2015	MASc cmt meeting	Genna Conant, ChemEng/IBBME	M. Radisic
20.11.2015	PhD cmt meeting	Elisa Archangelo, ChemEng	A. McGuigan
15.10.2015	MASc cmt meeting	Patricia Omoruwa, MIE	A. Guenther
02. 07. 2015	M.A.Sc. Bypass Oral Examination, Cmt Chair	N. Hilker, Chem Eng	G. Evans
26. 05. 2015	M.A.Sc Internal Thesis Reviewer	Wei Jie Cao, IMS	H. Leong-Poi
30. 04.2015	Ph.D. Committee Chair	Darren Rodenhizer, ChemEng	A. McGuigan
27.04.2015	Ph.D. Committee	Stephanie Fischer, Chem Eng	M. Shoichet
21.04. 2015	Ph.D. Committee Meeting	Kacey Ronaldson	A.G. Vunjak-Novakovic
13.03.2015	Masters Defense	Steve Mayers	A.J. Audet
27.03.2015	Ph.D. Committee Meeting	Boyang Zhang	M. Radisic
25.03.2015	SGS Defense	Kyle Battiston	P. Santerre
25.03.2015	SGS Defense	Lewis Reis	M. Radisic
17.02.2015	Ph.D. Committee Meeting	Miles Montgomery	M. Radisic
15.01. 2015	M.A.Sc. Committee Meeting	Steven Myers	J. Audet
12.01.2015	M.A.Sc. Committee Meeting	Zachary Laksman	P. Backx
18.12.2014	Departmental Defense	Kyle Battiston	P. Santerre
18.12.2014	Departmental Defense	Lewis Reis	M. Radisic
29.11.2014	Ph.D. Committee Meeting	Sarah Kwon	W. Stanford
26.11.2014	Ph.D. Committee Meeting	Haotian Chen	A. Guenther
05. 11. 2015 14.11.2014	Ph.D. Cmt Meeting Ph.D. Qualifying Exam	Yimu Zhao, Chem Eng,	M. Radisic
21.10.2014	Ph.D. Qualifying Exam	Aric Pahnke	M. Radisic
16.10.2014	M.A.Sc. Bypass Committee Member	Suraj Brokar	A. Ramchandran
10.01.2014	M.A.Sc. Defense Committee Member	Arianna McAlister	A. Guenther
24.11.2015 05.09.2014	Ph.D. Committee Meeting Ph.D. Committee Meeting	Mohsen Afshar	P. Gilbert
22.08.2014	M.A.Sc. Thesis Defense	Haotian Chen	A. Guenther
20.08.2014	M.A.Sc. Thesis Defense	Phenix Qing Ba	A. Guenther
09.06.2014	M.A.Sc. Committee Meeting	Zachary Lacksman, IMS	P. Backx, G. Keller
17.06.2014	Ph.D. Committee	Stephanie Fischer, Chem Eng	M. Shoichet

14.12.2015 21.09.2015 09.06.2014	Ph.D. Defense Ph.D. Cmt Meeting Ph.D.Committee Meeting	Malgosia Pakulska, ChemEng/IBBME	M. Shoichet
04.03.2016 10.07.2015 23.05.2014	Ph.D. Cmt Meeting Ph.D.Committee Meeting	Jieun Kim, IBBME	P. Zandstra
05.09.2014	Ph.D.Committee Meeting	Mohsen Afshar	P. Gilbert
22.08.2014	M.A.Sc. Thesis Defense	Haotian Chen	A. Guenther
20.08.2014	M.A.Sc. Thesis Defense	Phenix Qing Ba	A. Guenther
09.06.2014	M.A.Sc.Committee Meeting	Zachary Lacksman, IMS	P. Backx, G. Keller
23.05.2014	Ph.D.Committee Meeting	Jieun Kim	P. Zandstra
23.04.2014	M.H.Sc.Committee Member	Mohammadsadegh Mansouri	R. Mahadevan, K. Nanthakumar
22.04.2014	M.A.Sc.Bypass Committee Member	Darren Rodenhizer	A. McGuigan
14.09.2015 08.04.2014	Ph.D Cmt Meeting Ph.D.Committee Meeting	Iran Rashedi	A. Keating, M Radisic
04.04.2013	Ph.D.Defense Committee	Kathy Ye Morgan, Tufts University	L. Black
21.10.2014	Ph.D. Qualifying Exam	Aric Pahnke	M. Radisic
16.10.2014	M.A.Sc.Bypass Committee Member	Suraj Brokar	Ramchandran
10.01.2014	M.A.Sc.Defense Committee Member	Arianna McAlister	A. Guenther
29.11.2014	Ph.D.Committee Meeting	Sarah Kwon	W. Stanford
26.11.2014	Ph.D.Committee Meeting	Haotian Chen	A.Guenther
14.11.2014	Ph.D. Qualifying Exam	Yimu Zhao	M. Radisic
28.10.2013	Ph.D.SGS Defense Committee Member	Yuanfei Wang	M. Shoichet
24.09. 2013	Ph.D.Committee Meeting	Boyang Zhang	M.Radisic
24.09.2013	M.H.ScCommittee Meeting	Mohammadsadegh Mansouri	R. Mahadevan, K. Nanthakumar
16.09.2013	Ph.D.Committee Meeting	Kathy Ye Morgan, Tufts University	L. Black
19.07.2013	Ph.D. Defense, SGS Chair	Wanjuan Lin, Chemistry	M. Winnik
11.07.2013	M.A.Sc. Defense	Maria Jimena Loureiro	A. McGuigan
04.06. 2013	M.A.Sc. Defense	Jason Miklas	M. Radisic
18.04.2013	Ph.D. Qualifying Exam	Nimalan Thavandiran	P. Zandstra, M. Radisic

09.12.2013	Ph.D.Committee Meeting	Anton Mihic, IMS	R-K Li
05.12.2012 24.01.2013	Ph.D.Committee Meeting	George Eng, Columbia University	G. Vunjak-Novakovic
26.11.2012	Ph.D.Departmental Defense	Emma Circuicel, IBBME	M. Sefton
25.07.2013 04.10.2012	M.A.Sc. Defense M.A.Sc.Committee Meeting	Manseesha Rajora, IBBME	P. Santerre
18.01. 2016 13.11.2015 09.10.2015 28.09.2012	SGS Defense Departmental Defense Ph.D. Cmt Meeting Ph.D. Qualifying Exam	Yun Xiao, Chem Eng	M. Radisic
25.09.2012	Ph.D.Committee Meeting	Boyang Zhang, Chem Eng	M. Radisic
17.06.2014 06.08. 2013 24.09.2012	Ph.D.Committee Meeting Ph.D. Qualifying Exam	Stephanie Fischer, Chem Eng	M. Shoichet
18.09. 2012	M.A.Sc. Thesis Defense, Chair	Diana Chan, IBBME	M. Shoichet
17.09. 2012	Committee Meeting	Arianna McAlister, IBBME	A.Guenther
15.08.2012	Master's Committee Meeting	Mark Li, IBBME	M. Radisic
09.06.2014 21.06.2013 31.07.2012	Ph.D.Committee Meeting Ph.D.Committee Meeting	Malgosia Pakulska, IBBME	M. Shoichet
23.07.2012	Ph.D Defense, External Appraisal	Cassandra Gardner, Department of Chemistry, McMaster University	H. Stover
06.06.2012	Departmental Ph.D. Oral	Loriane Chiu, Chem Eng	M. Radisic
18.08.2012	Committee member	John Soleas, IMS	McGuigan/T. Waddell
04.04.2011	Ph.D. Committee Member	Jon Rodness, IMS	R.-K. Li
30.11.2011	Ph.D. Committee Meeting	Iran Rashedi, IBBME	A.Keating/M.Radisic
01.11.2010	Ph.D. Qualifying Exam	Lewis Reis, IBBME	M. Radisic
20.10.2010	M.A.Sc. Committee Member	Derek Voice, IBBME	M. Sefton
08.02. 2010	Ph.D. Defense (Senate) Committee Member	Rohini Gupta, Chem Eng	M. Sefton
18.02. 2010	PhD Thesis Supervisor	Katherine Chiang, IBBME	M. Radisic
14.01 2010	Bypass Committee Member	Brett Kamino, Chem Eng	A.T. Bender
08.12. 2009	M.A.Sc. Defence Committee Member	Nafees Rahman, IBBME	P. Zandstra/M. Shoichet
23.10.2009 03.05.2007 23.10.2006	Ph.D. Committee Member	Wei Jia Wang, IBBME	J. Audet
19.11.2010	Senate Oral	Omar Khan, Chem Eng	M. Sefton

15.09.2010 20.11. 2009	Departmental Defense Ph.D. Thesis Committee Member		
07.10.2009	SGS Ph.D. Committee Chair	Rama Natarajan, Computer Science	R. Zemel
05.10. 2009 04.05. 2009	Ph.D. Committee Committee Member Departmental Defense Chair	Ian Parrag, Chem-Eng	A.K. Woodhouse
01.09. 2009	Ph.D. Defense Committee Member	Irena Barbulovic-Nad, IBBME	A. Wheeler
25.08.2015 17.08.2015 29.04.2011 18.11.2010 20.08.2009	SGS Defense Departmental Defense Ph.D. Committee Meeting Ph.D. Qualifying Exam M.A.Sc. Defense Committee Chair	Anne Hsieh, Chem-Eng	M. Radisic M. Radisic M. Shoichet
10.08. 2009	M.A.Sc. Defense Supervisor	Fiona Rask, Chem-Eng	M. Radisic
03.01.2011 27.10.2010 24.06.2009 10.10.2006	Senate Oral Departmental Defense PhD Committee Member	Elaine Fok, IBBME	W. Stanford
12.06.2009	M.A.Sc. Defense Internal Examiner	Vanessa Scanga, IMS	M. Shoichet
17.11.2010 20.08.2010 01.03. 2010 28.05. 2009 13.12.2007 20.12.2006	Senate Oral Departmental Defense Ph.D. Committee Member	Brendan Leung, Chem Eng Appl Chem	W. Sefton
21.06.2013 20.05. 2009	Ph.D. Committee Meeting Ph.D. Transfer Exam Committee Member	Sarah Kwon, IBBME	W. Stanford
14.04.2011 02.12.2010 27.07.2010 21.04. 2009 2007	Departmental Defense Ph.D. Committee Member Ph.D. Committee Member Ph.D. Committee Member Ph.D. Transfer Exam	Elizabeth Pham, IBBME	K. Truong
20.04. 2009	Bypass Exam	David Lee, IBBME	W. Stanford R. Kandel
01.04.2010 11.03. 2008 19.12.2006	Ph.D. Committee Member	Soror Sharifpoor, IBBME	P. Santerre

22. 03.2010 09.03. 2009	Ph.D. Committee Meeting M.A.Sc. Defense	Loraine Chiu, Chem Eng Appl Chem	M. Radisic M. Radisic
18.02. 2009 25.10.2007	M.A.Sc. Defense M.A.Sc. Committee Meeting	Melissa Brown, Chem Eng Appl Chem/IBBME	M. Radisic
11.02. 2009	M.A.Sc Defense	Brandon Driscoll, IBBME	J. Audent
02.02. 2009 28.11.2007	M.A.Sc. Defense M.A.Sc. Committee Meeting	Jana Dengler, Chem Eng Appl Chem/IBBME	M. Radisic
16.01. 2009	M.A.Sc. Defense	Fahad Chowdhury, Chem Eng Appl Chem	M. Radisic
17.07. 2008	M.A.Sc. Defense	Heidi Au, Chem Eng Appl Chem	M. Radisic
18.10.2010 10.12. 2009 19.06. 2008 27.03.2007	Ph.D. Committee Meeting Ph.D. Committee Supervisor	Rohin Iyer, IBBME	M. Radisic
06.01.2011 05.11. 2009 06.12. 2007 Jan 2006	Senate Oral Ph.D.Committee Member By-pass Committee Member	Patrick Blit, Chem Eng Appl Chem	P. Santerre
29.11.2007	Ph.D. Committee Meeting Chair	Raheem Peerani,, Chem Eng Appl Chem	P. Zandstra
23.11.2007	M. A. Sc. Committee Meeting Committee Member	Amy Yuen, Faculty of Dentistry	C. McCulloch
30.10.2007	M.A.Sc Thesis Defence Committee Chair	Derek Watt, MIE, University of Toronto	C. Simmons
22.08.2007	M.Sc. Committee Meeting Committee Chair	Andy Hung, IBBME, University of Toronto	W. Chan
19.03.2007 26.02.2007 03.08.2006	M.Sc. Thesis Defence Committee Member M.Sc. Committee Member	Gilbert Tang, IMS, University of Toronto	R-K Li
24.01.2007 26.10.2006	Ph.D. Senate Defence, Examiner Ph.D. Departmental Defense, Examiner	Cecilia Alperin, Chem Eng Appl Chem, University of Toronto	K. Woodhouse
10.11.2006	M. A. Sc. Thesis Defense Examiner	Tayyab Khan, IBBME, University of Toronto	W. Stanford
18.10.2006	M. A. Sc. Committee Meeting Committee Member	Derek Watt, Mechanical and Industrial Engineering, Unversity of Toronto	C. Simmons
03.08.2006	M.Sc. Committee Meeting	Gilbert Tang, IMS, University of Toronto	R-K Li

	Committee Member		
24.06.2006	M.A.Sc Thesis Defense Examiner	Jane Ennis, IBBME, University of Toronto	J.E. Davies
Sept 2005	Examiner, M.Sc. Thesis	Mark Butler, Dept. of Chem. Eng. And App. Chem., University of Toronto	M. Sefton
Sept 2005	Examiner, M.Sc. Thesis	Jennifer Morin, IBBME, University of Toronto	P. Zandstra
08.04.2010	Ph.D. Defense (Senate) Committee Member	M. Doug Bowman, Dept. of Chem. Eng. And App. Chem., University of Toronto	M. Shoichet
17.02. 2010	Ph.D. Defense (Departmental) Committee Member		
Dec 2005	By-pass committee Examiner		
Jan 2006	M.Sc. Thesis Committee Member	Christina Holmes, IBBME, University of Toronto	W. Stanford

4.3 RESEARCH TRAINING

4.3.1 Postdoctoral Fellows

Name	Dept.	Degree Sought	Project Title	Period	Current Position
Hannah Song (co-supervised with Peter Zandstra)	IBBME	Post-Doc	In vitro model system for cardiac cell therapy	2007-2015	Post-doctoral Fellow University of Toronto
Aleksandra Urbanska	IBBME	Post-Doc	Peptide-chitosan scaffolds for cardiac tissue engineering	2008-2009	
Aarash Sofla	IBBME	Post-Doc	Magnetic cell separation	2011-2012	CEO uFluidix
Nicole Feric	IBBME	Post-Doc	Bone Implant Materials	2012-2016	Senior Scientist, TARA Biosystems
Sara Vasconcelos-Nunes	IBBME	Post-Doc	Vascular tissue engineering	2011-2012	Assistant Scientist, UHN
Dario Bogojevic	IBBME	Post-Doc	Microfluidic Cell separation	2012-2014	St.Michael's Hospital, Toronto
Samad Ahadian	IBBME	Post-doc	Injectable tissues	2015-2017	Post-doc, University of Toronto

Boyang Zhang	IBBME	Post-doc	Organ-on-a-chip engineering	2016-current	Post-doc, University of Toronto
Houman Savoji	IBBME	Post-doc	3D Printing	2017-current	Post-doc, University of Toronto
Qinghua Wu	IBBME	Post-doc	Microfabrication of organ-on-a-chip devices	2018-current	Post-doc, University of Toronto
Simon Pascual de Gil	UHN	Post-doc	Epicardial cell migration	2018-current	Post-doc, University of Toronto

4.3.2 Research Technicians and Associates

Name	Dept.	Degree Sought	Project Title	Period	Current Position
John-Paul King	IBBME	Technician	Bioreactors for cardiac tissue engineering	2007-2008	McMaster University, Teaching Lab
Gordana Bulajic	IBBME	Technician	Lab maintenance	2009	
Larry Meng	IBBME	Technician	Lab maintenance, Tissue engineering	2009-2011	
Lan Dang	IBBME	Technician	QHREDGS peptide	2011-2012	UHN
Carol Laschinger	IBBME	Research Associate	QHREDGS Peptide	2012-current	Radisic lab
Erika J. Knee	IBBME	Research Associate	Cardiac tissue engineering	2013-2014	Radisic lab
Elena Bajenova	IBBME	Research Associate	Cardiac tissue engineering	2017-current	Radisic lab
Lewis Reis	IBBME	Research Associate PT	Wound healing	2015-2016	PriceWaterhouseCoopers
Ericka Knee-Walden	IBBME	Research Associate	Disease modelling with Cardiac Biowires	2018-current	Radisic Lab

4.3.3 Graduate Students

Name	Dept.	Degree Sought	Project Title	Period	Current Position
Fahad Chowdhury (co-supervised with Dr. W. Stanford)	Chem Eng	M.A.Sc.	Engineering vascular networks based on flk1+ progenitors and immobilized VEGF	09/2006-01/2009	Medical Student, University of Toronto

Heidi Au	Chem Eng	M.A.Sc.	Interactive effects of surface topography and electrical field stimulation	09/2006-07/2008	ADVENT Consulting
Melissa Brown	Chem Eng IBBME	M.A.Sc.	Microfluidic cell separation	09/2006-02/2009	Abbott
Jana Dengler	Chem Eng IBBME	M.A.Sc.	<i>In vitro</i> model system for myocardial cell therapy	09/2006-02/2009	Medical Resident University of Toronto
Fiona Rask	Chem Eng	M.A.Sc.	Injectable peptide modified hydrogel for cardiac cell therapy	09/2007-08/2009	Nuclear Safety Solutions, Analyst
Rohin Iyer	IBBME	Ph.D. M.A.Sc.	Cell tri-culture for cardiac tissue engineering	03/2007-11/2011 09/2005-03/2007	GE Healthcare
Loraine Chiu	Chem Eng	Ph.D. M.A.Sc.	Angiogenic scaffolds	05/2009-10/2012 09/2007-05/2009	Post-doc, McMaster University
Devang Odedra (co-supervised with Dr. M. Shoichet)	Chem Eng Collab IBBME	M.A.Sc	Scaffolds with growth factor gradients	09/2008-02/2011	Medical student, Queens University
Katherine Chiang (co-supervised with Dr. W. Stanford)	IBBME	Ph.D.	Site-specific stem cell differentiation	01/2009-01/2011	Research technician
Nimalan Thavandiran (co-supervised with P. Zandstra)	Chem Eng	Ph.D. M.A.Sc.	Cardiac microwires Bioreactors for cardiac tissue engineering	03/2012-current 09/2009-03/2012	PhD student, University of Toronto
Anne Hsieh	Chem Eng	Ph.D.	Cell separation	09/2009-11/2015	Post-doc UHN
Lewis Reis	IBBME	Ph.D.	Injectable hydrogels for myocardial cell therapy	09/2009-06/2015	Price Waterhouse Coopers
Boyang Zhang	Chem Eng	Ph.D.	Microfluidic cell separation	09/2010-05/2016	Doctoral student, University of Toronto
Yun Xiao	Chem Eng	Ph.D.	Cardiac tissue engineering	09/2010-03/2016	Sichuan University
Iran Rashedi (co-supervised with Dr. A. Keating)	IBBME	Ph.D.	Cardiac tissue engineering	09/2008-11/2016	Research Associate
Jason Miklas	IBBME	M.A.Sc.	hESC based cardiac tissue engineering	09/2011-06/2013	Doctoral student, University of Washington

Mark Li (co-supervised with John Coles)	IBBME	M.A.Sc.	Ca handling in iPSC derived CM	09/2011-06/2013	Research technician
Yimu Zhao	Chem Eng	Ph.D.	Drug testing in cardiac tissues	09/2012-current	Doctoral student, University of Toronto
Aric Phanke	Chem Eng	Ph.D.	Modelling of cardiac disease using iPSC cardiomyocytes	09/2012-current	Doctoral student, University of Toronto
Miles Montgomery	IBBME	PhD	Injectable tissue	09/2012-current	Doctoral student, University of Toronto
Genevieve Conant	Chem Eng	M.A.Sc.	Cardiac tissues for drug testing application	09/2014-02/2017	Hammock Therapeutics
Locke Davenport Huyer	Chem Eng	Ph.D.	Drug delivery from an injectable tissue	09/2014-current	Ph.D. student, University of Toronto
Anastasia Korolj	Chem Eng	Ph.D.	Fractal vascular networks	09/2015-current	Doctoral student, University of Toronto
Fook Lai	IBBME	Ph.D.	Angiotube	09/2015-current	Doctoral student, University of Toronto
Dawn Bannerman	Chem Eng	Ph.D.	Biomaterial adhesion to epicardium	09/2016-current	Doctoral student, University of Toronto
Rick Lu	IBBME	Ph.D.	Organ-on-a-chip engineering for pollution assessment	09/2016-current	Doctoral student, University of Toronto
Erika Wang	IBBME	Ph.D.	Disease modelling using biowires	09/2016-current	Doctoral student, University of Toronto
Mohammad Hosein Mohammadi	Chem Eng	Ph.D.	Bioprinting a heart ventricle	09/2016-current	Doctoral student, University of Toronto
Robert Civitarese	IBBME	Ph.D.	Epicardial cell recruitment	09/2016-current	Doctoral student, University of Toronto
Serena Mandla	IBBME	MASc	Wound Healing	09/2017-current	Masters student, University of Toronto
Ruoxiao Xie	Tsinghua U	PhD	AngioChip	09/2017-08/2018	PhD student
Karl Wagner	Chem Eng/ IBBME	PhD	Understanding the Role of Exosome-Mediated Signalling in Patient-Specific Models of Cardiac Injury-Regeneration	09/2018-Present	PhD student

4.3.4 Undergraduate Students

Name	Dept.	Degree Sought	Project Title	Period	Current Position
Johana Salazar-Lazaro	MIT	Summer Stud	Cardiac cell co-culture	09/2003-05/2005	Air Liquide
Wenliang Geng	MIT	Summer Stud	Oxygen gradients in cardiac tissue engineering	01/2003-06/2005	Resident Physician, Miami Children's Hospital
Ruth Misener	MIT	Summer Stud	Cardiac tissue engineering	01/2003-01/2004	Research Fellow at Imperial College
Sasha Kucharczyk	Univ Guelph	Summer Stud	Image analysis for cell culture	07-08/2005	MBA Candidate, Rotman School
Irene Cheng	Chem Eng	Undergrad	Effect of contact guidance and electrical field stimulation on cell orientation and elongation	01-08/2006	Graduate student, Ryerson University
Heidi Au	Chem Eng	Summer Stud	Effect of contact guidance and electrical field stimulation on cell orientation and elongation	07-08/2006	ADVENT Consulting
Fahad Chowdhury	Eng Sci	Summer Stud	Effect of contact guidance and electrical field stimulation on cell orientation and elongation	05-08/2006	Medical student, University of Toronto
Melissa Brown	Eng Sci	Thesis Summer Stud	Pulsatile Perfusion Bioreactor for Cardiac Tissue Engineering	09/2005-08/2006	Abbott
Filip Marinkovic	Middlebury College	Summer Stud	Cardiac tissue engineering in perfusion bioreactors	07-08/2006 07-08/2007	TSX
Loraine Chiu	Chem Eng	Thesis Summer Stud	Cell tri-culture for cardiac tissue engineering	05/2006-08/2007	Post-doc, McMaster University
Yi-Hao Alex Shen (co-supervised with Dr. M. Shoichet)	Eng Sci	Thesis Summer Stud	Immobilized growth factors in cardiac tissue engineering	05/2006-05/2007	Medical student, University of Ottawa
Ying Meng	Eng Sci	Summer Stud	<i>In vitro</i> model system for cardiac cell therapy	05-08/2007	

Jane Chui	Eng Sci	Summer Stud	Cell tri-culture for cardiac tissue engineering	05-08/2007	Graduate student, MIT
Evelyn Mukwedeya	Eng Sci	Summer Stud	Perfusion cultivation of cardiac tissues	05-08/2007	Canadian Tire
Zane Chu	Eng Sci	Thesis Summer Stud	RT-PCR characterization of isl1 in neonatal rat heart cell preparations	05/2007-09/2008	
Bashir Bhana (co-supervised with Dr. C. Simmons)	Chem Eng	Thesis Stud	The influence of substrate stiffness on phenotype of heart cells	09/2007-04/2008	Ontario Power Authority
Mena Gewarges	Human Biol	Undergrad Stud	Electrical Stimulation Bioreactors	09/2008-09/2009	MD
Katarina Janic	Human Biol	Thesis Stud	Chitosan scaffolds for cardiac tissue engineering	09/2009-08/2010	MD
Kent Hyunh	Chem Eng	Summer Student	Injectable hydrogel for treatment of myocardial infarction	05/2010-08/2010	Student, MIT
Shahed Al Haque	Eng Sci	Thesis Student	Micropatterning for cardiac tissue engineering	09/2010-04/2011	Graduate student, MIT
Jason Miklas	Materials Science	Thesis Student	Injectable hydrogel for treatment of myocardial infarction	09/2010-04/2011	Doctoral student, University of Washington
Mark Li	Eng Sci	Thesis Student	Cardiac tissue engineering based on mouse ESC	09/2010-04/2011	Research Technician
Yan Liang	Chem Eng	Thesis Student	Vascular tissue engineering	09/2010-04/2011	Student, Columbia University
Carlotta Peticone	Chem Eng	Thesis Student	Vascular tissue engineering in microfluidics	09/2011-04/2012	Graduate student, university College London
Kujaany Kana	York U.	Volunteer	Cardiac tissue engineering with electrical stimulation	09/2011-04/2012	Masters student, York University
Lara Fu	Eng Sci	Thesis Students	Sensor for electrical activity in biowires	06/2012-04/2013	Graduate student, Harvard-MIT
Anastasia Korolj	Chem Eng	Thesis student	Biodegradable Elastomers	09/2014-05/2015	Doctoral student
Stasja Drecun	Neuroscience	Undergraduate student	Biowire cardiac tissue	09/2014-05/2015	Undergraduate student

Raimundo Fernandes Moreira Filho	Chem Eng	Summer student	Mechanical stimulation	05/2014-08/2014	Undergraduate student
Steven Yin Liao	Chem Eng	Summer student	Microfabrication	05/2014-08/2014	Undergraduate student
Junhao Gu	Chem Eng	Summer student	Wound healing	05/2014-08/2014	Undergraduate student
Carolina Ferreira	Chem Eng	Summer student	Cardiac tissue engineering	05/2014-08/2014	Undergraduate student
Jesse Wang	Engineering Track I	Summer student	Cardiac tissue engineering	05/2014-01/2016	Undergraduate student
Shuting Lin	Chem Eng	Summer student	Microfabrication	05/2014-08/2014	Undergraduate student
Dawn Lin	MIE	Undergraduate student	Microfluidic cell separation	09/2015-01/2016	Undergraduate student
Julia Antonovich	Neuroscience	Undergraduate student	Wound healing	05/2015-05/2016	Graduate student
Akhil Patel	Eng Sci	Undergraduate student	Mechanical testing	01/2016-05/2016	Undergraduate student
Nathaniel Smith	McMaster Univ	Summer student	CNT loaded elastomeric scaffolds	05/2016-08/2016	Undergraduate student
Bess Ye	Chem Eng	Summer student	Elastomeric Polyesters	05/2016-08/2017	Undergraduate student
Serena Mandla	Eng Sci	Summer student	Engineering a heart ventricle	05/2016-05/2017	Undergraduate student
Charlie Seung	Eng Sci	Summer student	Biowire II	05/2016-08/2016	Undergraduate student
Lucie Kim	Biology	Undergraduate student	Tissue engineering	09/2016-05/2018	Undergraduate student
Friday Anighoro	Biology	Undergraduate student	Tissue engineering	09/2016-04/2017	Undergraduate student
Joshua Isle	BME	Undergraduate student	Undergraduate mentor	09/2016-04/2017	Undergraduate student
Danica Jekic	McGill	Undergraduate student	Biowires	05-08/2017 05-08/2019	Undergraduate student
Claire Velikonja	Eng Sci	Undergraduate student	Podocytes	05-08/2017	Undergraduate student
Ruonan Cao	Eng Sci	Undergraduate student	Biowires	05-08/2017	Undergraduate student
Bess Ye	Chem Eng	Undergraduate student	Macrophage response to new polymers	09/2017-05/2018	Job Market
Thomas Bengt	Chem Eng	Undergraduate student	Organ-on-a-Chip Systems to Study Pollution	09/2017-05/2018	Job Market
Irene Yu	Chem Eng	Undergraduate student	Kidney-on-a-Chip	09/2017-05/2018	Job Market
Dawn Lin	Eng Sci	Undergraduate student	Antimicrobial polymers	09/2017-05/2018	Job Market
Yufeng Wang	Chem Eng	Undergraduate student	Macrophage response to new polymers	05/2018-05/2019	PhD student UofT

Mary Liu	Chem Eng	Undergraduate student	New polyester elastomers	09/2018-07/2019	PhD student UofT
Han Shao	Eng Sci	Undergraduate student	Kidney-on-a-Chip	09/2018-05/2019	PhD student UofT

4.3.5 Visiting Scientists

Name	University	Period
Prof. Calum Redpath	University of Ottawa	Period training of PI and post-doc 2011
Prof. Cristina Martin	University of Salamanca, Spain	July-October, 2011
Prof. Javad Behravan	Mashhad University of Medical Sciences, Iran	July-December, 2011
Prof. Pascal Jonkheijm	University of Twente, Netherlands	July 2017- March 2018

4.3.6 High School Students

Name	Period
Pavle Kotarac	July-August, 2011
Sonia Sharma	July-August, 2012
Ramin Mirzaei	July-August, 2012
Tya Vine	Sept 2013-April 2014
Camilla Parpia	Sept 2013-April 2014
Andrew Yang	June-August 2017

4.4 TRAINEE AWARDS AND SCHOLARSHIPS

4.4.1 Post-doctoral Associates

Student name	Award	Year
Hannah Song	<ul style="list-style-type: none"> HSFC Post-doctoral Fellowship Stem Cell Network (SCN) bursary to participate in “Advanced Multi-colour Flow Cytometry” course 	2010-2012 2010
Aarash Sofla	<ul style="list-style-type: none"> MITACS Fellowship 	Declined
Sara Nunes	<ul style="list-style-type: none"> IBBME Best paper award for Nunes et al Nature Methods, 2013 	2014
Houman Savoji	<ul style="list-style-type: none"> FRQNT Post-doctoral Fellowship CIHR Post-doctoral Fellowship 	2017-2018 2018-2020
Boyang Zhang	<ul style="list-style-type: none"> Banting Post-doctoral Fellowship 	2016-2018

4.4.2 Graduate Students

Student name	Award	Year
Rohin K. Iyer	<ul style="list-style-type: none"> Ontario Graduate Scholarship in Science and Technology (OGSST) Ontario Graduate Scholarship (OGS) Heart and Stroke/Richard Lewar Centre of Excellence Scientific Day- Best Poster Award (\$1,000) IBBME Anna Jamieson Award 	2005-2006 2006-2007 2007 2007

	<ul style="list-style-type: none"> • 2008 TERMIS-NA Travel Award • NSERC Canada Graduate Scholarship • OCE International Scholarship 	2008 2008-2011 2009
Jana Dengler	<ul style="list-style-type: none"> • Ontario Graduate Scholarship in Science and Technology (OGSST) • NSERC Post Graduate Scholarship-M (PGS-M) • Student Session Co-Chairs at 2010 TERMIS-NA • Honorable Mention for Poster Presentation- IBBME Scientific Day 2010 	2006-2007 2007-2008 2010 2010
M. Fahad Chowdhury	<ul style="list-style-type: none"> • Heart and Stroke Foundation Master's Studentship • Heart and Stroke Richard Lewar Centre of Excellence Master's Studentship (declined) • Ontario Graduate Scholarship in Science and Technology (declined) • 2008 TERMIS-EU Travel Award • 2008 ISSCR Travel Award 	2007-2009 2007-2008 2007-2008
Lorraine Chiu	<ul style="list-style-type: none"> • NSERC Canada Graduate Scholarship • Mary H. Beatty Fellowship • NSERC CGS for Doctoral Studies • One of 5 finalists of the 2 HSRLCE poster competition • Inaugural Irving O. Shoichet Graduate Scholarship • Queen Elizabeth II Graduate Scholarship • NSERC Post-doctoral Fellowship 	2007-2009 2008 2009-2012 2009 2011 2011 2012-2014
Heidi Au	<ul style="list-style-type: none"> • OGS (declined) • Helen L. Cross Graduate Memorial Scholarship 	2007-2008 2008
Fiona Rask	<ul style="list-style-type: none"> • NSERC Canada Graduate Scholarship 	2007-2009
Devang Odedra	<ul style="list-style-type: none"> • Heart and Stroke/Ontario Graduate Scholarship in Science and Technology (OGSST) • University of Toronto, Gordon Cressy Award 	2009-2010 2010
Anne Hsieh	<ul style="list-style-type: none"> • NSERC CGS for Doctoral Studies • MATCH Travel Grant • MATCH Scholarship • Best Poster Award MATCH Symposium • MATCH Scholarship • Doctoral completion grant • Travel award for Till & McCulloch Meeting (by Stem Cell Network) in Ottawa, ON Oct. 27 -29 	2009-2011 2011 2011-2012 2012 2012-2013 2013-2014 2014
Nimalan Thavandrian	<ul style="list-style-type: none"> • CIHR Master's Scholarship • HSFC Master's Scholarship • MATCH Travel Grant • SGS Travel Grant • HSF Doctoral Fellowship • Poster award Microtechnologies in Medicine and Biology, • Poster award MATCH • MATCH Scholarship • Best Oral Presentation Award MATCH Symposium • Irving O Shoichet Graduate Scholarship • Heart and Stroke Richard Lewar Center of Excellence Graduate Scholarship • Irving O. Shoichet Graduate Scholarship • Edward Jarvis Tyrell Fellowship 	2009-2010 2010-2012 2011 2011 2011-2013 2011 2011 2011-2012 2012 2013-2014 2014-2015 2014-2015 2016

Katherine Chiang	<ul style="list-style-type: none"> Ontario Graduate Scholarship NSERC Postgraduate Scholarship D Student Session Co-Chairs at 2010 TERMIS-NA 	2009-2010 2010-2013 2010
Lewis Reis	<ul style="list-style-type: none"> Heart and Stroke Richard Lewar Centre of Excellence Queen Elizabeth II Graduate Scholarship NSERC Post-graduate Scholarship 	2010-2011 2011-2012 2012-2015
Boyang Zhang	<ul style="list-style-type: none"> MATCH Program Scholarship (NSERC CREATE) MATCH Program Scholarship (NSERC CREATE) Heart and Stroke Richard Lewar Center of Excellence Graduate Scholarship Irving O Shoichet Graduate Scholarship MATCH Travel Grant NSERC CREATE M3 Scholarship Centre for Microfluidic Systems in Chemistry and Biology Sales Pitch, 1st Prize SGS Travel grant NSERC CREATE M3 Scholarship Irving O Shoichet Graduate Scholarship Nature Publishing Group travel award Canadian Biomaterials Society Travel Award Canada's Distinguished Dissertation Award in the category of Engineering/Medical Science/Natural Science by Canadian Association of Graduate Studies 	2010-2011 2011-2012 2012-2013 2012-2013 2013 2013-2014 2013-2014 2014-2015 2014-2015 2014-2015 2014-2015 2014-2015 2016 2017
Yun Xiao	<ul style="list-style-type: none"> Chinese Government Post-graduate Scholarship SGS Conference Travel Grant MATCH Travel Grant MATCH Travel Grant Heart and Stroke Richard Lewar Center of Excellence Graduate Scholarship Irving O. Shoichet Graduate Scholarship Student Discovery Award 	2010-2014 2012 2013 2014 2014-2015 2014-2015 2015
Iran Rashedi	<ul style="list-style-type: none"> Stem Cell Network (SCN) bursary to participate in "Advanced Multi-colour Flow Cytometry" course 	2010
Mark Li	<ul style="list-style-type: none"> Restracomp, SickKids Hospital 	2011-2012
Jason Miklas	<ul style="list-style-type: none"> CIHR Masters Scholarship Queen Elizabeth II Graduate Scholarship (declined) NSERC Canada Graduate Scholarship SGS Conference Travel Grant 	2012-2013 2012-2013 2013-2014 2012
Miles Montgomery	<ul style="list-style-type: none"> Queen Elizabeth II Graduate Scholarship NSERC Post-Graduate Scholarship Irving O Shoichet Graduate Scholarship Centre for Microfluidic Systems in Chemistry and Biology Small Talks Competition, 1st Prize Vanier Canada Graduate Scholarship NSERC CREATE M3 Travel Award NSERC CREATE MATCH Travel Award SGS Travel Award Ontario Graduate Scholarship Ontario Graduate Scholarship (\$15,000 per annum) Ontario-on-a-chip 1st Place Student Entrepreneur Pitch Competition 	2012-2013 2013-2014 2012-2013 2013 2013-2017 2014-2015 2014-2105 2014-2015 2016-2017 2017-2018 2017 2017

	<ul style="list-style-type: none"> ● Ontario-on-a-chip Finalist, Best Student Presentation ● IBBME Annual Research Conference, Best Student Presentation ● McMaster University, Selected as Top 150 Engineering Alumni ● The Professor Douglas Reeve Leaders of Tomorrow Award (\$2,984) ● Ontario Graduate Scholarship ● NSERC TOeP best Pitch Award ● Ontario-on-a-Chip Best Podium Presentation 	2017 2017 2017 2017-2018 2017 2017
Aric Pahnke	<ul style="list-style-type: none"> ● MATCH Scholarship ● MATCH Scholarship ● MATCH Scholarship 	2012-2013 2013-2014 2014-2015
Yimu Zhao	<ul style="list-style-type: none"> ● Queen Elizabeth II Graduate Scholarship ● OGS ● NSERC Doctoral Scholarship ● Rogers PhD Studentship 	2012-2013 2013-2014 2014-2016 2016-2018
Genevieve Conant	<ul style="list-style-type: none"> ● CIHR Masters Scholarship ● Ontario Graduate Scholarship 	2014-2015 2015-2016
Locke Davenport-Huyer	<ul style="list-style-type: none"> ● CIHR CGSM Graduate Scholarship ● SGS Travel Grant ● Vanier Graduate Scholarship ● NSERC TOeP best Pitch Award ● Ontario-on-a-Chip Best Poster Award ● NSERC M3 Travel Award 	2015-2016 2016 2016-2019 2017 2017 2018-2019
Benjamin Fook Lai	<ul style="list-style-type: none"> ● OGS Graduate Scholarship ● NSERC Postgraduate Scholarship ● NSERC M3 Travel Award ● SGS Conference Grant 	2015-2016 2016-2019 2018-2019 2018-2019
Anastasia Korolj	<ul style="list-style-type: none"> ● NSERC CREATE M³ Graduate Scholarship ● NSERC Canada Graduate Scholarship ● NSERC TOeP best Pitch Award ● NSERC M3 Travel Award 	2015-2016 2016-2019 2017 2018-2019
Robert Civitarese	<ul style="list-style-type: none"> ● Ontario Graduate Scholarship ● Ontario Graduate Scholarship ● McLaughlin GSEF Award 	2016-2017 2017-2018 2017-2018
Erika Wang	<ul style="list-style-type: none"> ● Queen Elizabeth II Scholarship in Science and Technology ● Ontario Graduate Scholarship ● NSERC M3 Travel Award ● SGS Conference Grant 	2016-2017 2017-2018 2018-2019 2018-2019
Dawn Bannerman	<ul style="list-style-type: none"> ● NSERC M3 Scholarship ● NSERC Canada Graduate Scholarship ● Best Presentation Award in the Regenerative Medicine Symposium ● NSERC M3 Travel Award 	2016-2017 2017-2020 2018 2018-2019
Mohammad Hossein Mohammadi	<ul style="list-style-type: none"> ● NSERC M3 Scholarship ● NSERC Post-graduate scholarship ● NSERC M3 Travel Award 	2016-2017 2017-2020 2018-2019
Rick Lu	<ul style="list-style-type: none"> ● NSERC M3 Scholarship ● NSERC Post-graduate Scholarship D ● NSERC M3 Travel Award ● SGS Conference Grant 	2016-2017 2017-2020 2018-2019 2018-2019
Ruoxiao Xie	<ul style="list-style-type: none"> ● Chinese Government Post-graduate Scholarship 	2017-2018
Serena Mandla	<ul style="list-style-type: none"> ● NSERC M3 Graduate Scholarship 	2017-2018

	<ul style="list-style-type: none"> Ontario Graduate Scholarship 	2018-2019
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4.4.3 Undergraduate Students

Student name	Award	Year
Shahed Al-Haque	<ul style="list-style-type: none"> CIHR Banting and Best CGS-Masters (declined) 	2011
Yi-Hao Alex Shen	<ul style="list-style-type: none"> NSERC Undergraduate Summer Research Award (USRA) University of Toronto, Life Science Award 	2006 2006
Loraine Chiu	<ul style="list-style-type: none"> NSERC Undergraduate Summer Research Award (USRA) 	2006
Jane Chui	<ul style="list-style-type: none"> University of Toronto, Engineering Science Research Opportunity (ESROP) Award Undergraduate Engineering Research Day 1st Place 	2007 2007
Zane Chu	<ul style="list-style-type: none"> NSERC Undergraduate Summer Research Award (USRA) 	2007
Jason Miklas	<ul style="list-style-type: none"> NSERC Undergraduate Summer Research Award (USRA) Centennial Thesis Award The highest average in Department of Materials Science and Engineering 	2011 2011 2011
Yan Liang	<ul style="list-style-type: none"> Centennial Thesis Award 	2011
Lara Fu	<ul style="list-style-type: none"> NSERC USRA 	2012
Jesse Wang	<ul style="list-style-type: none"> Faculty of Medicine, summer UROP Award 	2014
Nathaniel Smith	<ul style="list-style-type: none"> NSERC USRA 	2016
Bess Ye	<ul style="list-style-type: none"> NSERC USRA NSERC USRA 	2016 2017
Charlie Seung	<ul style="list-style-type: none"> IBBME USRP 	2016
Claire Velikonja	<ul style="list-style-type: none"> Faculty of Medicine Undergraduate Research Opportunity Program (UROP) 	2017
Danica Jekic	<ul style="list-style-type: none"> NSERC USRA 	2018
Yufeng Wang	<ul style="list-style-type: none"> Chem Eng USRP 	2018