

**Fateme Rajabiyazdi**

Carleton University  
 Faculty of Engineering and Design  
 Department of Systems and Computer Engineering  
 Email: rajabiyazdi@sce.carleton.ca  
 Website: <https://carleton.ca/rajabiyazdi/>

**Work Experience**

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- Assistant Professor - Carleton University, Canada** Jan 2021–present  
*Department of Systems and Computer Engineering*
- Postdoctoral Fellow - McGill University, Canada** Jan 2019–Dec 2020  
*Supervisor: Dr. Julio Fiore Project Leader: Dr. Liane Feldman*
- Data Visualization Researcher - Alberta Health Services - W21C, Canada** 2015–2018  
*Project Leader: Dr. William Ghali*
- Researcher - Pain Studies Lab, School of Interactive Arts & Technology, Canada** 2014–2015  
*Supervisor: Dr. Diane Gromala*

**Education**

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- PhD in Computer Science - Information Visualization - University of Calgary** 2014–2018  
*Thesis: Exploring the Design of Visualizations to Facilitate Patient-Provider Communication (GPA: 4.0)*  
*Thesis Awards: Nominated for university-level and for the field-specific awards by committee*  
*Supervisors: Dr. Sheelagh Carpendale and Dr. Lora Oehlberg*  
*Committee: Dr. Charles Perin (University of Victoria) and Dr. Diane Gromala (Simon Fraser University)*
- Master in Computer Science - HCI - Australian National University** 2010–2012  
*Thesis: Design and Development of Interface for Different Tablet Sizes*  
*Supervisors: Dr. Tom Gedeon and Dr. Duncan Stevenson*
- Bachelor in Software Engineering - University of Tehran** 2006–2010

**Grants****Awarded - PI**

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- G7. Carleton University Experiential Learning Fund** 2022-2023  
*EXPeriential-learning for ANalyzing Data (EXPAND) Program: Analyzing real-world datasets & developing data-driven solutions with community or organization partner collaborations*  
 Role: Principal-Investigator, Total: \$6,000
- G6. NRC Aging in Place Challenge program** 2022-2025  
*Evaluation and Adaptation of Assistive Technologies for Older Adults*  
 Role: Principal-Investigator (Academic), NRC PI: Dr. H el ene Fournier, Total: \$90,000
- G5. NSERC Discovery Grants Program** 2021-2026  
*Title: Exploring the design and development of patient data visualizations on shared displays*  
 Role: Principal-Investigator, Total: \$132,500

- G4. NSERC Alliance Grants - OCE-VIP** 2021-2022  
*Qualitative Data Visualization Dashboard*  
 Role: Principal-Investigator, Total: \$60,000
- G3. Scholarship of Teaching and Learning (SoTL) Grant** 2021-2022  
*Critical Reflections on Teaching Data Visualizations to Students with Engineering Backgrounds*  
 Role: Principal-Investigator, Total: \$5,000
- G2. Career Ready Technation Canada** 2021  
*Design and Development of a Wearable Pain Tracker*  
 Role: Principal-Investigator, Total: \$5,900
- G1. Carleton University I-CUREUS Grant** 2021-2022  
*Summer 2021, Fall 2021, Winter 2022*  
 Role: Principal-Investigator, Total: \$3,375

#### Awarded - Collaborator

- CIHR Fall Project Grant** 2022  
*The OPERa Study: A Multicenter Observational Prospective Cohort Study to Evaluate Determinants of Long-Term Quality of Life following Restorative Proctectomy for Rectal Cancer Treatment*  
 Role: Co-PI, PI: Dr. Marylise Boutros (McGill University - Jewish General Hospital)
- CIHR Planning and Dissemination Grant** 2019  
*Transforming Post-Fracture Acute Pain Management in Older Men/Women through mHealth Application*  
 Role: Collaborator - PI: Dr. Suzanne Morin
- CIHR Project Grant Fall** 2019  
*Opioid versus opioid-free analgesia after surgical discharge: a systematic review and meta-analysis*  
 Role: Collaborator - PI: Dr. Julio Fiore

#### Under Review - PI

- Gx. NSERC Research Tools and Instruments** 2021  
*Multitouch Displays to Collaboratively Interact with Health Data*  
 Role: Principal-Investigator, Total request: \$140,000

#### Under Review - Co-PI

- Gx. NSERC Alliance Missions Grants** 2021  
*COVID-19 in the Urban Built Environment (CUBE) through Modeling, Simulation and Visualization*  
 Role: Co-PI, PI: Dr. Gabriel Wainer (Carleton University - Systems and Computer Engineering)
- Gx. American Society of Colorectal Surgeons** 2021  
*Consensus Development on the Definition, Grading and Reporting of Colorectal Anastomotic Leak*  
 Role: Co-PI, PI: Dr. Patricia Sylla (Icahn School of Medicine at Mount Sinai)

#### Not Granted

- Gx. NRC Aging in Place CIHR Institute of Aging program** 2021  
*Development of mobile health applications and visualizations for monitoring and communicating mental health conditions in older adults*  
 Role: Principal-Investigator (Academic), NRC PI: Dr. Hélène Fournier, Total request: \$492,400

## Scholarship and Awards

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<b>Individual Service Excellence Award Nomination</b> , Carleton University	2022
<b>Co-op Employer of the Year Nomination</b> , Carleton University	2021
<b>Postdoctoral Scholarship</b> , Fonds de la Recherche du Quebec Sante (FRQS), \$45,000	2020-2020
<b>Computer Science Department Research Award</b> , University of Calgary, \$11,000	2017-2018
<b>W21C Health Services Research Scholarship</b> , Alberta Health Services, \$30,000	2016-2017
<b>W21C Health Services Research Scholarship</b> , Alberta Health Services, \$30,000	2015-2016
<b>Computer Science Department Research Award</b> , University of Calgary, \$8,000	2016-2017
<b>Faculty of Graduate Studies Travel Award</b> , University of Calgary, \$1,000	2015
<b>Computer Science Department Research Award</b> , University of Calgary, \$2,000	2015-2016
<b>Computer Science Department Research Award</b> , University of Calgary, \$8,000	2014-2015

## Journal Publications (J)

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J6. **Fateme Rajabiyazdi**, Charles Perin, Lora Oehlberg, and Sheelagh Carpendale. Designing Patient Data Visualization: A Wicked Problem. *Computer Graphics and Applications* 2021.

J5. Charbel El-Kefraoui, **Fateme Rajabiyazdi**, Nicolò Pecorelli, Franco Carli, Lawrence Lee, Liane S Feldman, Julio F Fiore. Prognostic value of the Duke Activity Status Index (DASI) in patients undergoing colorectal surgery. *World Journal of Surgery* 2021, <https://doi.org/10.1007/s00268-021-06256-4>.

J4. **Fateme Rajabiyazdi**, Roshni Alam, Aditya Pal, Joel Montanez, Susan Law et al. What does ‘recovery’ mean to patients undergoing abdominal surgery? An international qualitative study. *JAMA Surgery* 2021, doi:10.1001/jamasurg.2021.1557

J3. Maryam Mozafarinia, **Fateme Rajabiyazdi**, Marie-Josée Brouillette, Lesley K. Fellows, and Nancy E. Mayo. Development and Usability of a Feedback Tool, “My Personal Brain Health Dashboard”, to Improve Setting of Self-Management Goals Among People Living with HIV in Canada. *Quality of Life Research Journal* 2020, <https://doi.org/10.1007/s11136-020-02555-w>.

J2. Maryam Mozafarinia, **Fateme Rajabiyazdi**, Marie-Josée Brouillette, Lesley Fellows, Bärbel Knäuper, and Nancy E. Mayo. Effectiveness of a Personalized Health Profile on Specificity of Self-Management Goals Among People Living with HIV in Canada: A Protocol for a Blinded Pragmatic Randomized Controlled Trial. *MNI Open Res* 2020, 4:1.

J1. Charbel El-Kefraoui, Ghadeer Olleik, Marc-Aurele Chay, Araz Kouyoumdjian, Philip Nguyen-Powanda, **Fateme Rajabiyazdi**, et al. Opioid Versus Opioid-free Analgesia after Surgical Discharge: Protocol for a Systematic Review and Meta-analysis. *BMJ Open* 2020, 10:e035443. doi: 10.1136/bmjopen-2019-035443.

## Submitted (J)

Jx. Uyen Do, Charbel El-Kefraoui, et al., **Fateme Rajabiyazdi**, Nadia Safa, Nawar Touma, Francine Tremblay. Opioid-free analgesia after outpatient general surgery: A pilot randomized controlled trial. *British Journal of Anaesthesia* (2022).

Jx. Maryam Mozafarinia, **Fateme Rajabiyazdi**, et al., Effectiveness of a Personalized Health Profile on Specificity of Self-Management Goals Among People Living with HIV in Canada Findings from a Blinded Pragmatic Randomized Controlled Trial. *British Journal of Health Psychology* (2021).

Jx. Natasha Caminsky, Jeongyoon Moon, Nancy Morin, Karim Alavi, Rebecca C Auer, Liliana G Bordeianou, Sami A Chadi, Sébastien Drolet, Amandeep Ghuman, Alexander Liberman, Tony MacLean, Ian Paquette, Jason Park, Sunil Patel, Scott Steele, Patricia Sylla, Steven Wexner, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. (2021). Patient and surgeon preferences for early ileostomy closure following restorative proctectomy for rectal cancer – why aren’t we doing it?. *Surgical Endoscopy*.

Jx. Vincent Brissette, Nasra Al Busaidi, Marie Demian, Carol-Ann Vasilevsky, Nancy Morin, **Fateme Rajabiyazdi**, Marylise Boutros. “Exploring Patients’ Information Needs and Expectations on Sexual Dysfunction After Rectal Cancer Treatment: A Qualitative Study” *Diseases of the Colon & Rectum*.

Jx. Julio F Fiore Jr., Charbel El-Kefraoui, Marc-Aurele Chay, Philip Nguyen-Powanda, Uyen Do, Ghadeer Olleik, **Fateme Rajabiyazdi**, et al. “Opioid versus opioid-free analgesia after surgical discharge: A systematic review and meta-analysis of randomised controlled trials” *Lancet*.

Jx. Olivia Monton, Allister Smith, Jeongyoon Moon, Marie Demian, Richard Garfinkle, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. “An Online Educational App for Rectal Cancer Survivors with Low Anterior Resection Syndrome: A Mixed Methods Pilot Study” *Diseases of the Colon & Rectum*.

Jx. Rachel Szwimer, Jeongyoon Moon, **Fateme Rajabiyazdi**, Marylise Boutros. Optimal Timing of Knowledge Dissemination on Bowel Dysfunction for Patients Undergoing Rectal Cancer Surgery.

## Conference Publications (C)

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C8. **Fateme Rajabiyazdi**, Charles Perin, Lora Oehlberg, and Sheelagh Carpendale. Exploring the Design of Patient-Generated Data Visualizations. In *Proceedings of the 46th Graphics Interface Conference, GI’20*, pages 362-373. ACM, 2020. [DOI](#)

C7. **Fateme Rajabiyazdi**, Charles Perin, Jo Vermeulen, Diane Gromala, and Sheelagh Carpendale. Differences That Matter: In-Clinic Communication Challenges. In *Proceedings of the 2017 Pervasive Computing Technologies for Healthcare*, pages 251-260. ACM, 2017. [DOI](#)

C6. **Fateme Rajabiyazdi**, Charles Perin, Lora Oehlberg, and Sheelagh Carpendale. The Challenges of Individuality to Technology Approaches to Personally Collected Health Data. In *Proceedings of the 2017 Pervasive Computing Technologies for Healthcare*, pages 448-451. ACM, 2017. [DOI](#)

C5. **Fateme Rajabiyazdi**. Designing and Developing Technologies to Facilitate Clinician-Patient Communication. In *Proceedings of the 2016 International Conference on Interactive Surfaces and Spaces*, pages 19-24. ACM, 2016. [DOI](#)

C4. Alice Thudt, Jagoda Walny, Charles Perin, **Fateme Rajabiyazdi**, Lindsay MacDonald, Riane Vardeleon, Saul Greenberg, and Sheelagh Carpendale. Assessing the Readability of Stacked Graphs. In *Proceedings of the 42nd Graphics Interface Conference, GI’16*, pages 167–174, 2016. [DOI](#)

C3. **Fateme Rajabiyazdi**, Jagoda Walny, Carrie Mah, John Brosz, and Sheelagh Carpendale. Understanding Researchers’ Use of a Large, High-Resolution Display Across Disciplines. In *Proceedings of the 2015 International Conference on Interactive Tabletops & Surfaces*, pages 107–116. ACM, 2015. [DOI](#)

C2. **Fateme Rajabiyazdi** and Tom Gedeon. Hand Grip Strength on a Large PDA: Holding While Reading Is Different from a Functional Task. In *Proceedings of the 2012 Sixth International Conference on Complex, Intelligent, and Software Intensive Systems*, pages 475–480, 2012. [DOI](#)

C1. **Fateme Rajabiyazdi** and Tom Gedeon. Comparing User Performance on an iPad to a 17-inch BackPad. In *Proceedings of the 2012 Sixth International Conference on Complex, Intelligent, and Software Intensive Systems*, pages 469–474, 2012. [DOI](#)

## Peer Reviewed Abstracts and Posters (AP)

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AP13. Yossef Levin, Nasra Al Busaidi, Marie Demian, Nancy Morin, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. Financial and Occupational Impact of Low Anterior Resection Syndrome: A Qualitative Study. American Society of Colon and Rectal Surgeons, 2021. (Poster).

AP12. Rachel Szwimer, Jeongyoon Moon, Marie Demian, Nancy Morin, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. Qualitative Study to Explore the Optimal Timing and Approach for the LARS discussion. Canadian Surgery Forum, 2021. (Poster).

AP11. Vincent Brissette, Nasra Al Busaidi, Marie Demian, Nancy Morin, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. "Let's talk about sex?" A Qualitative Study Exploring Patients' Needs and Expectations for Information on Sexual Dysfunction After Rectal Cancer Surgery. Canadian Surgery Forum, 2021. (Poster)

AP10. Olivia Monton, Allister Smith, Jeongyoon Moon, Marie Demian, Richard Garfinkle, Carol-Ann Vasilevsky, **Fateme Rajabiyazdi**, Marylise Boutros. An Online Educational App for Rectal Cancer Survivors with Low Anterior Resection Syndrome: A Pilot Study. Canadian Surgery Forum, 2021. (Podium).

AP9. **Fateme Rajabiyazdi**, Roshni Alam, Haley Montgomery, Charbel El Kefraoui, Lawrence Lee, Nancy Mayo, Liane Feldman, and Julio Fiore Jr. Item generation and cognitive interviewing for a patient-reported outcome measure of recovery after abdominal surgery. Poster presentation at International Society for Quality of Life research, 27th annual conference, S84-S85, Springer, 2020.

AP8. Maryam Mozafarina, **Fateme Rajabiyazdi**, Amanda Austin-Keiller, Marie-Josée Brouillette, Lesley Fellows, Nancy E Mayo. Goal quality, education, and cognition: preliminary analysis of self-management goals formulated by people living with HIV. Poster presentation at International Society for Quality of Life research, 27th annual conference, S106-S106, Springer, 2020.

AP7. **Fateme Rajabiyazdi**, Aditya Pal, Roshni Alam, Joel Montanez, Susan Law, Lawrence Lee, Nicolò Pecorelli, Watanabe Yusuke, Chiavegato D Luciana, Massimo Falconi, Hirano Satoshi, Nancy E Mayo, Liane S Feldman, and Julio F Fiore Jr. What Does 'Recovery' Mean To Patients Undergoing Abdominal Surgery? An International Qualitative Study. Poster presentation at the Society of American Gastrointestinal and Endoscopic Surgeons, Cleveland, OH, USA, 2020.

AP6. Charbel El-Kefraoui, Ghadeer Olleik, Marc-Aurele Chay, Araz Kouyoumdjian, Philip Nguyen-Powanda, **Fateme Rajabiyazdi**, Uyen Do, Alexa Derksen, Tara Landry, Alexandre Amar-Zifkin, Ramanakumar Agnihotram, Marc Martel, Gabriele Baldini, Liane S Feldman, and Julio F Fiore Jr. Opioid Versus Opioid-free Analgesia after Surgical Discharge: a Systematic Review and Meta-analysis. Poster presentation at Experimental Surgery Research Day, Montreal, Canada, 2019.

AP5. Seyedeh Maryam Mozafarina, **Fateme Rajabiyazdi**, and Nancy Mayo. Measuring quality of health outcome goals using text mining techniques. Poster presentation at International Society for Quality of Life research, 26th annual conference, San Diego, USA, S126-S126, Springer, 2019.

AP4. Seyedeh Maryam Mozafarina, **Fateme Rajabiyazdi**, and Nancy Mayo. Text mining application for measuring quality of health outcome goals. Poster presentation at Centre for Outcome Research & Evaluation Research Day, Montreal, Canada, 2019.

AP3. **Fateme Rajabiyazdi**, Charles Perin, Lora Oehlberg, and Sheelagh Carpendale. Personal Patient-Generated Data Visualizations for Diabetes Patients. Poster presentation at the *IEEE Information Visualization Conference*, Berlin, Germany, 2018. [Link](#).

AP2. Julie Babione, **Fateme Rajabiyazdi**, Charles Perin, Joseph Tropiano, Megan Cosby, Maria Santana, Jaime Kaufman, Sheelagh Carpendale, William Ghali, and Peter Sargious. Identifying Opportunities

for Innovation in Patient-Centred Care Plans Through User-Centred Design Research. Poster presentation at the *Patient Oriented Research Summer Institute Conference*, Canada, Calgary, 2016.

AP1. **Fateme Rajabiyazdi**, Charles Perin, and Sheelagh Carpendale. WEST: Visualizing non-Emergency Surgery Waiting Times. Poster presentation at the *IEEE Information Visualization Conference*, Chicago, USA, 2015. [Link](#)

## Peer Reviewed Workshop Papers (W)

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W3. **Fateme Rajabiyazdi**, Charles Perin, Julie Babione, Joseph Tropiano, Maria Santana, Jaime Kaufman, William Ghali, Peter Sargious, and Sheelagh Carpendale. Challenges Involving Patients in their Care Plan from Clinicians' Perspectives. In *Proceedings of the CHI Workshop on Interactive Systems in Healthcare (WISH'16)*, ACM, 2016. [Link](#)

W2. Xin Tong, Diane Gromala, Lyn Bartram, **Fateme Rajabiyazdi**, and Sheelagh Carpendale. Evaluating the Effectiveness of Three Physical Activity Visualizations - How People Perform vs. Perceive. In *eProceedings of the IEEE Information Visualization Conference*, 2015.

W1. Tamara Flemisch, **Fateme Rajabiyazdi**, Mona Hosseinkhani, and Sheelagh Carpendale. NeckLan: Language as Jeweller. In *eProceedings of the IEEE Information Visualization Conference*, 2015. [Link](#)

## Thesis (T)

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T3. **Fateme Rajabiyazdi**. Exploring the Design of Visualizations to Facilitate Patient-Provider Communication. *PhD Thesis, University of Calgary, 2018*. [Link](#)

T2. **Fateme Rajabiyazdi**. Design and Development of Interface for Different Tablet Sizes. *Master Thesis, School of Computer Science, Australian National University, 2012*. [Link](#)

T1. **Fateme Rajabiyazdi**. Finding Social Network Graphs in News Websites, *Bachelor Thesis (in Persian), School of Electrical and Computer Engineering, University of Tehran, 2010*.

## Teaching Experience

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### Instructor

**BIOM5403 Data Visualization** - Carleton University Winter 2022  
Enrollment: 20

**SYSC2006D Foundations of Imperative Programming** - Carleton University Winter 2021  
Enrollment: 120 students

### Guest Lecturer

**Observational Research Techniques** - McGill University Fall 2020

**Introduction to Information Visualization** - University of Calgary Fall 2017

**Visualization and Visual Analytics** - University of Calgary Fall 2016

### Teaching Assistant

**Thinking with Data** - University of Calgary Summer 2017

**Introduction to Information Visualization** - University of Calgary Fall 2017

**Visualization and Visual Analytics** - University of Calgary Fall 2016

**Human-Computer Interaction** - University of Calgary Winter 2015  
**Introduction to CS Application Software** - University of Calgary Winter 2014

## Supervision and Mentoring

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### Supervision

#### **Alicia Ouskine**

MASc-HCI, Carleton University Fall 2021-present  
Co-Supervisor: Adrian Chan  
Designing and Developing Data Visualization for Patients in Rehabilitation Centers

#### **Rebecca Langstone**

MASc-HCI, Carleton University Fall 2021-present  
Designing and Developing Patient Data Collection via Virtual Assistant AI Technology

#### **Rahel Gunaratne**

Bachelor Software Engineering  
I-CUREUS Undergraduate Student Researcher, Carleton University Summer 2021-present  
Project: Designing an Interactive Visualization System to Enhance Student Awareness on EDI

#### **Arsh Saleem**

Bachelor of Engineering Biomedical and Electrical  
CO-OP Program, Carleton University Summer 2021-present  
Project: Designing and Developing an Accessible Pain Tracker

### Co-Supervision

#### **Connor Harbel**

MASc, Carleton University Fall 2021-present  
Supervisor: Dr. Robert DeKemp  
Thesis: Cardiac Image Registration

#### **Elahe Khorasani**

Postdoctoral, McGill University Spring 2021-present  
Supervisor: Dr. Julio Fiore  
Project: Developing a patient-reported outcome measure to assess recovery after abdominal surgery

### Unofficial Co-Supervision

#### **Kevin Tran**

Research Associate, McGill University Spring 2021-present  
Supervisor: Dr. Suzanne Morin  
Project: Developing a Mobile app to Support Patients Manage Pain after a Bone Fracture

#### **Caroline Berger**

Research Associate, McGill University 2020-2021  
Supervisor: Dr. Suzanne Morin  
Project: Designing a Mobile app to Support Patients Manage Pain after a Bone Fracture

**Olivia Monton**  
Medical student, McGill University 2020-2021  
Supervisor: Dr. Marylise Boutros  
Project: eLARS Online Educational App Pilot Study

**Vincent Brissette**  
Medical student, McGill University 2020-2021  
Supervisor: Dr. Marylise Boutros  
Project: Sexual Dysfunction in Patients with LARS: A Qualitative Study

**Rachel Szwimer**  
Medical student, McGill University 2020-2021  
Supervisor: Dr. Marylise Boutros  
Project: Exploring the Optimal Timing for detailed LARS discussions

**Aditya Pal**  
Medical student, McGill University 2019-2020  
Supervisor: Dr. Julio Fiore  
Project: Understanding Patients' Perspectives who are Recovering from Abdominal Surgery

### Graduate Advisory - Committee Member

**Mohamed Gazarin**  
PhD student, Dept of Health Sciences Carleton University 2021-present  
Development of an Automated Vision-based Incident Analysis System for Indoor Falls

### Fourth-Year Undergraduate Engineering Projects

**Laura Reid, David Casciano, Alice Olorunnife** Fall 2021  
Visualizing Blood Pressure Data

**Jack Hendry, Justice Ayela, Haoyu Xu** Fall 2021  
Connecting Health Data from iPad to a Large Display

### Fourth-Year Undergraduate Engineering Projects - Second Reader

**Ghezel Al-Hakim, Ben Susilo, Firas Aboujamee** Winter 2021  
Supervisor: Dr. Adrian Chan  
Joint Angle Measurement Project

**Jake Bridge, Mackenzie Hoyle, David Neale, Daniel Neasmith, Thomas Sloan** Winter 2021  
Supervisor: Dr. Bruce Wallace  
Smart Pillbox for Persons with Dementia

### Mentorship

**Charbel El-Kefraoui**  
Master of Experimental Surgery McGill University 2019 - 2020

**Uyen Do**  
Master of Experimental Surgery McGill University 2020 - 2020

**Tharaniya Vallipuram**  
Medical Student McGill University 2019 - 2020

**Andrew Miller**  
Medical Student McGill University 2019 - 2020



## Invited Talks

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- Advancing New Canadian Women in Technology** January 2022  
*Title:* Data Visualization for health
- Nuclear Medicine Research Rounds - Ottawa Hospital** September 2021  
*Title:* Multi-person Interactions with Medical Data on Large Displays
- Carleton University Institute for Data Science - Seminar Series** April 2021  
*Title:* Exploring the Design and Development of Patient Health Data Visualizations - [Link](#)
- IEEE Ottawa Section: Engineering in Medicine and Biology Society** February 2021  
*Title:* Information Visualization to Support Patients' Medical Care Management - [Link](#)
- Department of Computer Science & Software Engineering, Concordia University** April 2020  
*Title:* Designing and developing information visualization tools to support patients with their medical care
- Minimally Invasive Surgery Research Day, McGill University Health Center** October 2019  
*Title:* What does 'recovery' mean to patients undergoing abdominal surgery?
- Human Factors Interest Group, University of Toronto** April 2018  
*Title:* Designing and Developing Tools to Enhance Patient-Physician Communication - [Link](#)
- Ward of the 21<sup>st</sup> Century Symposium, Alberta Health Services** October 2015  
*Title:* WEST: Visualizing non-Emergency Surgery Waiting Times

## Knowledge and Technology Transfer

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- PainApp** - under development 2020 - present  
PainApp is the first mobile application developed using user-center design approach to support older adults manage their pain after a fracture. I am the co-principal investigator in the project leading the design team.
- MyCareCompass** - under development [Link](#) 2018 - present  
MyCareCompass is the first platform designed for patients with chronic conditions in Alberta to manage their care. My Ph.D. reserach studies and my data visualization designs are incorporated into this platform.

## Software Development and Design

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- WEST: Visualizing Surgery Waiting Time** [Link](#) - [Video](#) 2015  
WEST is an interactive visualization tool displaying surgery waiting times across British Columbia. This project is motivated by the long waiting time for surgeries in BC.
- Leitner System App** [Link](#) 2014  
Leitner app is designed to help people memorize flashcards bearing information as words or numbers. This app employs the Leitner system, repetition, where cards are reviewed at the increasing interval.

## Collaborations

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### Canadian Governments and Healthcare organizations

- National Research Council Canada - Aging in Place Challenge program** 2021 - present  
Dr. Hélène Fournier, Research Officer Human-Computer Interaction Department

**Bruyère Research Institute, Canada, Ottawa** 2021 - present  
 Dr. Frank Knoefel, Chair in Primary Health Care Dementia Research, Bruyère Research Institute

**Winchester District Memorial Hospital** 2021 - present  
 Dr. Mohamed Gazarin, Chief Research Officer

## Industry

**Novacene AI, Canada, Ottawa** 2021 - present  
 Marcelo Bursztein, Company's founder and CEO Novacene AI Corp.

## International Collaborations

**Research Collaborator, University of Cincinnati, United States** 2022 - present  
 Dr. Jillian Aurisano Assistant Prof, University of Cincinnati Electrical Engineering & Computer Science.

**Research Collaborator, Oxford Brookes University, United Kingdom** 2019 - 2020  
 Centre for Movement, Occupational and Rehabilitation Science with Dr. Mansoubi and Dr. Shelly Coe.

**Research Collaborator, Indiana University, United States** 2015 - 2017  
 Dr. Haley Macleod.

## Academic Services

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### Program Committee

CHI Late-Breaking Work (LBW) Program Committee 2022  
 Graphics Interface Conference - Strategy Planning Committee 2020 - 2021  
 IEEE Information Visualization (InfoVis) Conference 2020, 2021 - Short Papers  
 McGill University Health Center Injury, Repair, Recovery Annual Research Day 2020 - Posters  
 McGill University Experimental Surgery Research Day 2019 - Best Poster Award  
 ACM Intelligent User Interfaces (IUI) Conference 2015, 2019 - 2021 - Poster, Short and Long Paper

### Conference Chair

Graphics Interface (GI) 2022 - Poster chair  
 ACM Interactive Surfaces and Spaces (ISS) Conference 2022 - Publicity Chair  
 ACM Interactive Surfaces and Spaces (ISS) Conference 2021 - Poster Chair  
 ACM Interactive Surfaces and Spaces (ISS) Conference 2019 - Video Preview Chair  
 ACM Interactive Surfaces and Spaces (ISS) Conference 2016 - Mobile App Chair

### Conference Paper Reviewer

UIST 2021, GI 2021, AMIA 2017 - 2021, DIS 2018 - 2019, CHI 2016 - 2020, TEI 2017& 2021, IUI 2016-2021

### Journal Paper Reviewer

Interactive, Mobile, Wearable and Ubiquitous Technologies (IMWUT) Journal (2 articles)

## Community Outreach

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**Carleton University Women in Science and Engineering Words Podcast** November 2021  
 Role: Podcast guest

**Carleton University SCETalk: What is Data Visualization** October 2021  
 Role: Speaker

**Passionate Minds Unit 101 Summer Webinar** August 2021  
 Role: Lecturer

**CU-WISE National Engineering Month Event Information** March 2021  
 Role: Panelist