

## MEng Project Opportunities

Project #2: Factors Contributing to 30-day Readmissions for Patients with Congestive Heart Failure (CHF)	
Project Description	Readmission rates are often used in health care to help identify areas where the health system can intervene to improve patient care and patient outcomes. A number of different factors can contribute to readmissions, including but not limited to patient demographics, comorbidities, access to care, and discharge planning. At SHN, 30-day readmission rates for congestive heart failure (CHF) remains the top most common condition for readmission, alongside chronic obstructive pulmonary disease, at 19.7% for fiscal year 2024/25. This rate has been trending upward over the past three years despite the interval implementation of an expanded Heart Function Clinic. The objective of this study is to understand the factors contributing to the high readmission rates for CHF patients in Scarborough. Findings from this study will help to inform additional interventions that can be implemented at SHN to support this patient population.
Desired Skills	<ul style="list-style-type: none"> <li>• Quantitative research skills</li> <li>• Strong data analysis skills</li> </ul>
Faculty advisor	Prof. Alfred
SHN Mentor(s)/ Project Lead(s)	Mishka White, Dr. Amir JanMohamed
Key Deliverables	<p><b>Milestone 1</b> – Complete literature review and REB application (Dec 2025)</p> <p><b>Milestone 2</b>– Conduct retrospective data analysis on CHF readmissions over the past 5 years; assess for trends/common contributing factors (May 2026)</p> <p><b>Milestone 3</b> – Finalize results and academic product. Present findings (August 2026)</p>
Grading distribution	Literature review and REB application (20%), data collection and analysis (40%), completion of project deliverables and academic product (30%), and participation in project and research meetings (10%)
Application	Please submit CV, unofficial transcript, and a single paragraph describing your interest in the project in one file in a single email to Prof. Alfred ( <a href="mailto:Myrtede.alfred@utoronto.ca">Myrtede.alfred@utoronto.ca</a> )
Expected start	Fall 2025