



## Applicant

Dr. Elham Rahme, Research Institute of the McGill University Health Centre

# E-mail Address

elham.rahme@mcgill.ca

### **Project Title**

Prediabetes in Canadians 45-85 years of age and predictors of 3-year progression to diabetes: a longitudinal examination using data from the Canadian Longitudinal Study on Aging

### **Project Summary**

Diabetes is a life-long disease that can cause major complications such as heart disease, kidney disease and blindness. Most individuals with diabetes go through a prediabetes state during which time progression to diabetes may be prevented through physical exercise and a healthy diet. CANRISK is a questionnaire based on information available through self-report such as age, sex, weight, height, waist circumference, physical activity, hypertension, diabetes in the family and ethnicity to determine the risk of having diabetes. CANRISK has not been used before to predict progression from prediabetes to diabetes. We will use data from the Canadian Longitudinal Study on Aging to determine among Canadians 45-85 years old, the ability of CANRISK to predict progression from prediabetes to diabetes at 3-years either independently or with other factors (genetic, glucose level, lifestyle and environmental).

### Keywords

Prediabetes, Diabetes, Risk, Machine learning