Funding News

Funding Competition: Canadian Institutes of Health Research, Fall 2021

Investigating the Psychological Profile and Intervention Needs of Patients with Spontaneous Coronary Artery Dissection

Edited by Wolfgang Linden, PhD (Vancouver)

Dr. Heather Tulloch
Director - Cardiovascular Health Psychology and Behavioural Medicine Laboratory
University of Ottawa Heart Institute

Principal Investigator: Dr. Heather Tulloch, C. Psych
Co-Investigators: Drs. Karen Bouchard, Thais Coutinho, Shuangbo Liu, Sharon Mulvagh, Christine Pacheco, Jennifer Reed, Jacqueline Saw, Derek So, Louise Sun, and George Wells

Spontaneous coronary artery dissection (SCAD) is a spontaneous separation of the coronary artery wall by intramural hemorrhage, which reduces or blocks blood flow to the heart muscle. SCAD is increasingly recognized as a cause of heart attack, particularly among women. Although the cause is unknown, it's thought that precipitating psychological stressors are common. High rates of recurrent cardiac events have been observed, and depression, anxiety, and traumatic stress are pervasive post-SCAD. Says Tulloch: "Many patients with SCAD are younger, have unremarkable medical histories, and feel that secondary prevention programs are not tailored to their unique needs. Patients grapple with a lot of uncertainty in the aftermath of SCAD, which can precipitate distress. SCAD experts have called for tailored psychological support for these patients in cardiac rehabilitation.

With this in mind, Dr. Tulloch and her team have focused their efforts on developing a new psychological intervention targeting SCAD patients. As a first step, they conducted two qualitative studies investigating the mental health and intervention needs of patients with SCAD. The next step, and aim of their proposed research, successfully funded by the CIHR in the Fall 2021 project grant competition, is to examine the psychological profile and intervention needs of a large sample of patients with SCAD at five hospital sites across Canada. Specifically, they will examine levels of distress, concerns, and intervention-component suggestions in this population as well as compare levels of psychological distress of patients with SCAD to age- and sex-matched patients with acute coronary syndrome but without SCAD. Finally, they will investigate the relationship between psychological distress and major adverse cardiovascular events such as stroke, heart attack, and death.

Long-term, this research will be used to develop patient-informed and accepted interventions for the treatment of psychological distress post-SCAD to reduce distress and improve quality of life and cardiac outcomes. A large definitive, multisite RCT assessing the efficacy of the intervention on psychological and clinical outcomes will be the next step. Says Dr. Tulloch: "If we can create an effective intervention for these patients, the next step will be to integrate it into cardiac rehabilitation programs across Canada. Ultimately, our goal is to better support patients managing SCAD by nurturing the mind and caring for the heart."