Post-Doctoral Associate Position modeling Connexin-linked disease using pluripotent stem cells and genome editing

A postdoctoral associate position is available immediately in the laboratory of Dr. Dean Betts, Department of Physiology and Pharmacology, Schulich School of Medicine & Dentistry at Western University. This position is funded through a 5-year CIHR project grant headed by Dr. Dale Laird, Department of Anatomy and Cell Biology (Western). The Laird lab has a long-standing interest in connexin mutations linked to human disease. The goal of this project is to examine the role of various Cx43 mutations in oculodentodigital dysplasia (ODDD), which leads individuals to suffer from bone and cartilage deformities in addition to multiple other developmental problems that often increase in severity with aging. In this study, ODDD patient cells and mutant mice that mimic ODDD will be used to investigate how Cx43 mutations cause disease in some tissues where Cx43 is found (e.g., bone) but not in others that also contain Cx43 (e.g., heart). Importantly we will use state-of-art cellular reprogramming and genome editing strategies to develop and utilize human stem cell models that carry the Cx43 mutations and repair the gene mutations prior to cells being specialized into cells of the skeleton. Qualified applicants for this position should have a PhD degree in Cell Biology or a related discipline, significant experience in techniques including molecular biology, gene cloning and expression, genetic analysis, biochemical and functional assays, pluripotent stem cell culture, viral transduction, and quantitative PCR analysis. Expertise/experience in cellular reprogramming and genome editing is a must. A competitive stipend will be paid commensurate with experience.

Please send a statement of interest, Curriculum Vitae, and the names of at least two references to Dean Betts, PhD., Department of Physiology and Pharmacology, Western University, London, Ontario, Canada N6A 5C1. Email: dean.betts@schulich.uwo.ca; Phone: (519) 661-2111, ext. 83786.

Applications will be reviewed as received until the position is filled.