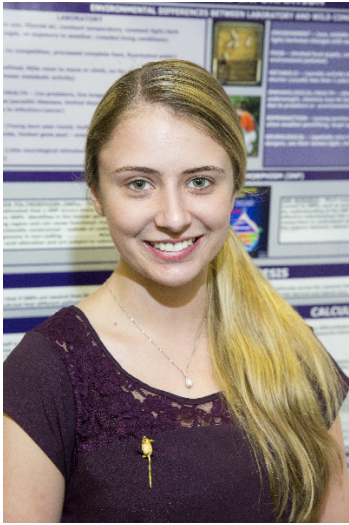


CWSF 2014 - Windsor, Ontario



Brynn Charron

Environmental Influences on the Mutational Landscape of the Mouse Genome

Challenge: Health

Category: Senior

Region: Windsor

City: Maidstone, ON

School: Massey S.S.

Abstract: The laboratory mouse is an invaluable resource in the exploration of the human genome; however the environment of the laboratory mouse is not representative of humans' environment. Whereas, the wild mouse and human environments share many commonalities. This study examines the selective pressures affecting the genome of laboratory and wild mice by analyzing Single Nucleotide Polymorphisms (SNPs) utilizing the Mouse Diversity Genotyping Array (MDGA).

Biography

I am 18 years old and I am enrolled in Grade 12 at Vincent Massey Secondary School in Windsor, Ontario. I have participated in the Windsor Regional Science Fair for the past eight years and have had the opportunity to represent the Windsor region at the Canada-Wide Science Fair on three previous occasions. I have also presented this research project at the Southwestern Ontario BioGENEius Challenge Competition. In addition to my research work, I enjoy competing in dressage horseback riding competitions in which my horse and I are currently the Junior Third Level Freestyle Provincial Champions. I am largely involved in the community through my volunteer work. I am a board member of the Cystic Fibrosis Windsor Chapter. As well I have enjoyed volunteering at the Windsor Essex Therapeutic Riding Association, helping people to overcome their physical and mental disabilities through their interactions with horses. I am looking forward to attending either the University of Windsor or the University of Western Ontario to study Biochemistry. My long-term goal is to study medicine or pursue a career in research.

Awards

Value

Excellence Award - Senior - Bronze Medal Sponsor: Nuclear Waste Management Organization	\$100
University of Ottawa Entrance Scholarship Senior Bronze Medallist - \$1000 Entrance Scholarship Sponsor: University of Ottawa	\$1 000
Western University Scholarship Bronze Medallist - \$1000 Entrance Scholarship Sponsor: Western University	\$1 000
Total	\$2 100