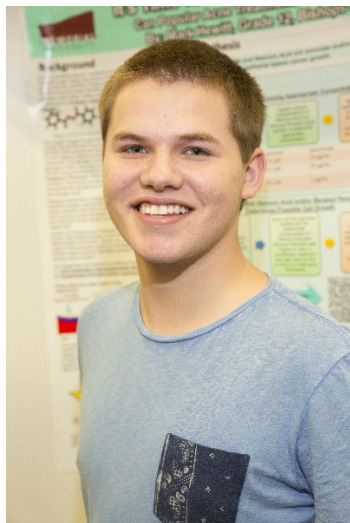


CWSF 2014 - Windsor, Ontario



Mark Hewitt

Can Popular Acne Treatments Stimulate or Exacerbate Cancer Growth?

Challenge: Health

Category: Senior

Region: Eastern Newfoundland

City: St. John's, NL

School: Bishops College

Abstract: Cancer is a huge public health problem. Benzoyl Peroxide and Retinoic Acid (compounds found in popular acne treatments) have shown to produce excessive oxygen species that interfere with cellular signalling, mutate cellular DNA and stimulate tumor growth. Upon measuring protein expression and cell proliferation, these two compounds have increased cell proliferation and invasiveness in multiple cancer cell lines in culture.

Biography

I'm Mark Hewitt, a grade 12 student at Bishops College High School in St. John's, Newfoundland. I hope to pursue a career in Medicine, in particular surgery, so working on projects through the Faculty of Medicine at Memorial University has been an amazing opportunity. I go to a great school where I'm on student and school council, am involved in a social justice group and am part of an organization that plans school activities. I am a RDC R.I.S.E scholarship holder, and like to take every opportunity to further my experiences through travel. Last summer, I attended the University of Toronto for six weeks, where I partook in research and lectures within the Faculty of Medicine there. At my regional science fair, I was awarded a gold medal in my region, the Memorial University award in Biology, Chemistry and Biomedical Sciences and was also awarded the first ever Eastern Newfoundland Science and Technology Scholarship, in which Memorial University of Newfoundland is taking care of my full tuition for my first year of University. I'm very excited to come to CWSF, and encourage other students to get involved, find good mentors (like mine!) and pursue science topics that excite them.

Awards

Value

Excellence Award - Senior - Silver Medal Sponsor: Youth Science Canada	\$300
Dalhousie University Faculty of Science Entrance Scholarship Senior Silver Medallist - \$2500 Entrance Scholarship Sponsor: Dalhousie University, Faculty of Science	\$2 500
UBC Science (Vancouver) Entrance Award Senior Silver Medallist - \$2000 Entrance Scholarship Sponsor: The University of British Columbia (Vancouver)	\$2 000
University of Ottawa Entrance Scholarship Senior Silver Medallist - \$2000 Entrance Scholarship Sponsor: University of Ottawa	\$2 000
Western University Scholarship Silver Medallist - \$2000 Entrance Scholarship Sponsor: Western University	\$2 000
Total	\$8 800