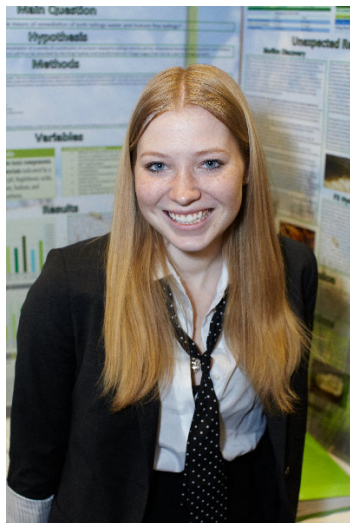


# CWSF 2012 - Charlottetown, Prince Edward Island



## Kelcie Miller-Anderson

### Mycoremediation of the Oil Sands

**Challenge:** Resources

**Category:** Senior

**Region:** Calgary Youth

**City:** Calgary, AB

**School:** Bishop Carroll High School

**Abstract:** Currently tailings ponds cover 170km<sup>2</sup> in Alberta, but an effective method of treatment has not yet been established. This project aimed to create a novel remediation method with the potential to treat both mature fine tailings and tailings water. Oyster Fungi was applied to both tailings water and mature fine tailings and its ability to remediate hydrocarbons, naphthenic acids, pH and salt concentrations was assessed.

#### Biography

My name is Kelcie Miller-Anderson and I'm currently a Grade 12 student at Bishop Carroll High School. This will be my fourth year participating at the CWSF and I am really looking forward to visiting PEI for my first time. This past summer I had the opportunity to volunteer in Spain with youth from around the world to be part of an English immersion for Spanish youth to help them develop their conversational English. Next year I plan on taking environmental sciences majoring in land reclamation.

#### Awards

#### Value

The Manning Innovation Achievement Award Sponsor: Ernest C. Manning Awards Foundation	\$500
The Manning Innovation Achievement Award and \$4000 Manning Young Canadian Innovation Award Sponsor: Ernest C. Manning Awards Foundation	\$4 000
Challenge Award - Resources - Senior Sponsor: Youth Science Canada	\$1 000
Excellence Award - Senior - Gold Medal Sponsor: Youth Science Canada	\$1 500
Dalhousie University Faculty of Science Entrance Scholarship Senior Gold Medallist - \$5000 Entrance Scholarship Sponsor: Dalhousie University, Faculty of Science	\$5 000
UBC Science (Vancouver) Entrance Award Senior Gold Medallist - \$4000 Entrance Scholarship Sponsor: The University of British Columbia (Vancouver)	\$4 000
University of Manitoba Entrance Scholarship Senior Gold Medallist - \$5000 Entrance Scholarship Sponsor: University of Manitoba	\$5 000
University of Ottawa Entrance Scholarship Senior Gold Medallist - \$4,000 Entrance Scholarship Sponsor: University of Ottawa	\$4 000
Western University Scholarship Gold Medallist - \$4000 Entrance Scholarship Sponsor: Western University	\$4 000
<b>Total</b>	<b>\$29 000</b>