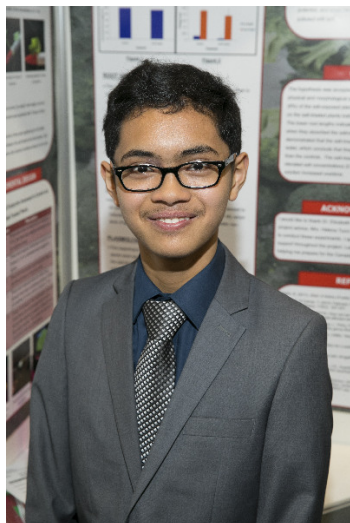


# CWSF 2017 - Regina, Saskatchewan



## Dylex Suan

### Ameliorating Salinity Tolerance in Broccoli Plants by Acclimation

**Challenge:** Environment

**Category:** Intermediate

**Region:** Bay Area

**City:** Burlington, ON

**School:** Corpus Christi Catholic Secondary School

**Abstract:** Domesticated, edible plants are cultivated mainly with fresh water, which imposes significant barriers to preserving fresh water for drinking. The majority of these plants are unfortunately glycophytes and are unable to tolerate salt water. This project investigates the amelioration of salinity tolerance as well as the physical and morphological effects on Everest broccoli plants by taking advantage of their phytoremediation properties and utilizing acclimation methods.

#### Biography

Hello, my name is Dylex Suan, and I am a Grade 9 student at Corpus Christi Secondary School. My project's name is called, "Phytoremediation: Investigating Plant Acclimation to Ameliorate Salinity Tolerance in Glycophytes". I had the idea of trying to investigate glycophytes when I realized that desalination was relatively expensive and not feasible for third-world countries. I had also discovered that up to about 600 billion litres of fresh water per day is being used for agriculture. As a result, I was compelled to take advantage of their phytoremediation properties and adaptation methods in order for them to tolerate salt. I plan to pursue this project by using different applicative stresses in order to simulate various conditions in nature. In my spare time, I love playing piano and I participate in Math, Science Fair and French speaking competitions. I volunteer at numerous places such as Burlington Public Library, Rotary International and as a volunteer for translating. I believe that if you genuinely desire to do a science fair project, then I would say to pursue whatever interests you! Explore any ideas that you may have and try to solve it, since it may turn out to be a reality!

#### Awards

#### Value

Excellence Award - Intermediate - Bronze Medal Sponsor: Youth Science Canada	
Western University Scholarship Bronze Medallist - \$1000 Entrance Scholarship Sponsor: Western University	\$1 000
Total	\$1 000