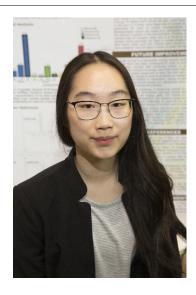




CWSF 2019 - Fredericton, New Brunswick



Jocelyn Pon

Production of Biofuel Using Crop Residues

Challenge: Energy
Category: Intermediate
Region: Saskatoon

City: Saskatoon, SK
School: Centennial Collegiate

Abstract: The objective of this project was to determine the amount of energy from

barley, canola, pea and wheat crop residue based on acid and enzyme hydrolysis. There is concern that future generations will encounter a fuel shortage as the world demand for fuel continues to increase. However, crop

residue could potentially become a major energy source due to the

renewable nature of the feedstock.

Biography

My name is Jocelyn Pon and I am currently a grade 10 student at Centennial Collegiate in Saskatoon, SK. I have a passion for science, and plan to further develop my knowledge on the scientific field through STEM based opportunities. In the future, I wish to pursue a career in the science field. My hobbies that I enjoy include playing musical instruments, baking, and reading. As extra-curricular activities, I participate in the U of S Karate Club, The Heritage Chinese Language School, and I am currently working towards completing my level 7 Royal Conservatory piano exam. I was inspired to solve for a renewable energy source through one of my science classes where we discussed renewable energy for the environment. I was concerned and was passionate to find a solution as it could impact future generations. From there, I encountered Dr. Reaney, my mentor and discussed potential methods to resolve the issue. For further research, I plan to use a small-scale fermentation to produce energy. My advice to students thinking about doing a project is to find a project that appeals to you. If you are passionate about your project, you are likely to be more engaged in the research.





