



CWSF 2013 - Lethbridge, Alberta



Lisa McQuarrie

Does Armouring Protect or Harm Our Beaches?

Challenge: Environment
Category: Intermediate
Region: Vancouver Island
City: Victoria, BC
School: St Margaret's

Abstract: Both a controlled model beach experiment and a full-scale beach experiment were conducted to determine the impacts of foreshore

armouring on a sandy beach near Victoria. The results show that foreshore erosion is a critical component of natural beach processes. Armouring the foreshore can remove the sand source and increase beach erosion. When coupled with climate change, implications on foreshore development can be

severe.

Biography

My name is Lisa McQuarrie. I attend St. Margaret's School in Victoria, and after graduation plan to study physical sciences or engineering. I enjoy running, cycling, soccer and field hockey. One of the most memorable experiences I have from last year is the week I spent with my school becoming a certified scuba diver, which was very challenging but still an amazing undertaking. For Science Fair, I wanted to do a project regarding the effects of climate change. Living on the coast of BC, rising sea levels could have a significant impact on our communities. I have worked on this project for two years, monitoring a popular Victoria beach with dynamic processes. Future investigations could be expanded to include other beaches to determine if results are similar. I would advise other students to start their projects early, in order to gather more results. Also, ensure your topic is something you are passionate about.





