

CWSF 2018 - Ottawa, Ontario



Margaret Kirke

A Gift from the Sea: Soothing Eczema with Seaweed

Challenge: Health

Category: Junior

Region: Ottawa

City: Ottawa, ON

School: Academie Jeanne D'Arc

Abstract: This project tests the potential of bladderwrack seaweed applied to cotton fabric as an eco-friendly low-cost way to reduce eczema symptoms. Methods used included pad cure, soaking, dyeing, and mordanting. Tests were conducted to assess whether fabrics with stronger expected molecular bonding with the seaweed and highest weight performed best in retaining moisture and reducing the growth of microbes.

Biography

My name is Margaret Kirke and I am in Grade 8. I love discovering new things and immersing myself in books. My favourite athletic activities are Irish dancing and soccer which I have been doing for several years. I have always been interested in the sea -- what it contains and how it can help us. Last year I had mild eczema on my wrist. After having eczema (and being very annoyed by it), I stumbled across an article on how seaweed can heal skin. I wondered if a seaweed-infused fabric could help relieve eczema symptoms. I ended up making different types of seaweed patches based on the idea that they could soothe eczema symptoms by being applied to skin. If I was to take this project further, I would test the seaweed patches on more people with varying frequency and severity of eczema symptoms. For other aspiring scientists my advice is to always find a project or subject that interests you, that you have a passion for. You will not only have tons of fun doing it, but you just may find some new scientific discoveries that you too can share with the world.

Awards

Value

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