

CWSF 2014 - Windsor, Ontario



Jessica Tonn

Up in Flames

Challenge: Energy

Category: Junior

Region: Northern Saskatchewan

City: La Ronge, SK

School: Churchill Composite H.S.

Abstract: Many people burn wood to heat their homes in Canada, so I thought to examine which type of wood burned the hottest. I tested controlled volumes of birch, jack pine, poplar, and spruce wood by burning them in a boiler and measuring the change in water temperature. The findings were that the spruce wood burned the hottest.

Biography

My name is Jessica Tonn and this is my first time participating in the Canada Wide Science Fair. Several of my achievements include the Northern Saskatchewan Achievement Award, five medals in Music Festival, gold and silver medals in the regional science fair, I have completed preliminary theory and currently play grade 4-5 in conservatory piano. I have many interests that include archery, math, reading, drawing, scrap booking, and running. I have no idea what occupation I will have, I just know that I would not enjoy one that included staring at a computer all day. I got the inspiration to do this project when my family was having a bonfire in the back. I noticed that the different woods would burn differently. Some would have huge flames, others had more ashes, made more smoke, or would, in this case, burn hotter. If I were to continue my project, I would do more trials, possibly different types of wood, alcohol solutions, different amounts of water and wood, etc. If students were interested in doing this project, I would recommend going over every variable to make sure there are no flaws that would interfere with their results.

Awards

Value

Excellence Award - Junior - Bronze Medal Sponsor: Nuclear Waste Management Organization	\$100
Western University Scholarship Bronze Medallist - \$1000 Entrance Scholarship Sponsor: Western University	\$1 000
Total	\$1 100