

# CWSF 2011 - Toronto, Ontario



## Keltie Murdoch

### Temper Trap 2: Tempering Air from Unconventional Sources

**Challenge:** Innovation

**Category:** Intermediate

**Region:** East Kootenay

**City:** Cranbrook, BC

**School:** Mount Baker Secondary

**Abstract:** Heat is being wasted in residential attic spaces. In my experiment, I coiled an HDPE pipe with a 30.5m length around my attic, under the insulation, and a 15.25m length pipe near the attic's peak. I then used a small fan to push air through these pipes, and measured exiting temperatures. I concluded that the wasted heat in an attic can be reused.

#### Biography

My name is Keltie Murdoch. I have various interests including music, sports, and of course, science. I play clarinet in my high school's concert band, as well as sing in the concert choir. I also enjoy playing piano on my own time. During the spring and fall, I am a soccer player, and referee. I participate on the high school team, as well as the regional house team. Finally, I have an interest in engineering sciences and design. I hope to pursue a career in a science or engineering related field once I graduate.

#### Awards

#### Value

Excellence Award - Intermediate - Bronze Medal Sponsor: Youth Science Canada	\$300
The University of Western Ontario Scholarship Bronze Medallist - \$1000 Entrance Scholarship Sponsor: University of Western Ontario	\$1 000
Total	\$1 300