

## CWSF 2016 - Montreal, Quebec



### Nick Muegge

#### The Movement Patterns Of The White-Tailed Deer

**Challenge:** Environment

**Category:** Junior

**Region:** Bluewater

**City:** Neustadt, ON, ON

**School:** Holy Family E.S.

**Abstract:** This project observed and analyzed the movement of white-tailed deer in WMU 84 over the past 365 days. Deer harvest numbers, deer sighting data, climate condition statistics, and predator population data were examined to determine if identifiable patterns existed within the movement times of white-tailed deer. The results revealed that the movement patterns depended greatly upon the rut and predation pressure along with climate conditions.

#### Biography

My name is Nick Muegge and I am a grade 8 student at Holy Family School in Hanover, Ontario. I enjoy hunting, fishing, hockey, volleyball, the outdoors, and interacting with nature. At my school, I am a member of the Student Council along with being actively involved with a program called the Mental Health Youth Champions. This is my third year competing in Science Fair and my first year competing at Canada-Wide Science Fair. In the other years, I've studied possible ways to further develop solar-powered stop signs. This year, my science fair project studied the average movement times of the white-tailed deer. To do so, I used several motion-activated trail cameras to capture photos and videos of the deer over the past year. I also studied trends to determine if patterns existed within my data. The data that was collected from the project is going to be an asset to hunters, to the Ministry of Natural Resources, to motor-vehicle operators and to the general public interested in learning more about the white-tailed deer. For future career options, I am considering the following: Farmer, Engineer or an Environmental Specialist.

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