



## CWSF 2012 - Charlottetown, Prince Edward Island



## Diba Shojaeigoradel

## Using High Voltage Source for Low Voltage Load

Challenge: Innovation
Category: Junior
Region: York

City: Thornhill, ON School: As-Sadiq Islamic

Abstract: In this project I used a high voltage source (12V) with a low voltage load

(3V light bulb), and used PWM algorithm to prevent my load from burning without using any resistors or transformers. This project can be used in variety of industries (military, aerospace, aviation, and robotics). The

benefits of this project are; 1. Saves energy (eco-friendly) 2. Saves space 3.

Saves weight

## Biography

Hi my name is Diba. I turned 14 years old on April 4. Ever since I was 8 years old I wanted to be a programmer. I have travelled to many places and had lived in Malaysia for 1 year and 6 months, when I was there I had attended in Fairview International School and had participated in an essay contest and had got second. I also predicated in their science fair and I had got first in the field of biotech. Outside of school I joined the Petronas robotic team, and our team had got first. Once I came back to Canada I went to As-Sadiq Islamic School and joined the math club, basketball and soccer team. At home I spend most of my time programming hardware's, programming software's, and working on my projects (like brakes for cars without brake pads). Now I want to use programming in our everyday life (programming machines). I want to become a computer software engineer and would like to study in the University of Stanford.

Awards	Value
Excellence Award - Junior - Bronze Medal	\$300
Sponsor: Nuclear Waste Management Organization	
Western University Scholarship	\$1 000
Bronze Medallist - \$1000 Entrance Scholarship	
Sponsor: Western University	
Total	\$1 300





