

# CWSF 2012 - Charlottetown, Prince Edward Island



## Sakeena Panju

### The Prick of a Finger

**Challenge:** Health

**Category:** Senior

**Region:** York

**City:** Richmond Hill, ON

**School:** Richmond Hill H.S.

**Abstract:** Salivary and blood glucose concentrations were determined at 10-minute intervals following meal consumption. Glucose in saliva was assayed using the glucose oxidase/peroxidase method, while blood glucose was tested using a glucose meter. A significant linear relationship ( $r=0.97$ ) between blood and salivary glucose was determined. The results support the possibility of saliva being used in the future as a non-invasive technique to indirectly monitor blood sugar.

### Biography

My name is Sakeena Panju and I am a grade 12 student attending Richmond Hill High School. My favourite subjects in school are math, biology and visual arts. I was inspired to pursue my project because of my personal connection with a young person with Type 1 Diabetes. After seeing the daily troubles of carb-counting and perpetual injections that people with diabetes endure, I was convinced that there must be some way I could help ease their task of monitoring themselves. My advice to anyone thinking of doing a science fair project is to make sure you study something that you're passionate about - something relevant to your life. That way, you won't be discouraged by all the work a science fair project entails - in fact, you'll be excited about it!

### Awards

### Value

Excellence Award - Senior - Bronze Medal Sponsor: Nuclear Waste Management Organization	\$300
University of Ottawa Entrance Scholarship Senior Bronze Medallist - \$1000 Entrance Scholarship Sponsor: University of Ottawa	\$1 000
Western University Scholarship Bronze Medallist - \$1000 Entrance Scholarship Sponsor: Western University	\$1 000
<b>Total</b>	<b>\$2 300</b>