

S.T.E.M. Competitions

Kid Wind Challenge

On October 30, 2013, Lawrence Middle School and Lawrence High School students competed in the Regional Kid Wind Competition at the Cradle of Aviation Museum in Garden City under the leadership of Ms. DePaola. Ms. Ubertini, Mr. Vasaturo, and Mr. Justiniano were advisors and coaches. For this competition, students had to create their own wind turbine and present their knowledge of wind energy and the engineering process of designing it. They were judged on the energy output level and their presentations from engineers and professionals in

the wind energy industry. Students had the opportunity to defend their presentations to Robert Keller, President of the National Grid Foundation. Students were immersed and engaged in science, technology, engineering, and mathematics (S.T.E.M.) while they were creating and adjusting their turbines to sustain the powerful wind created in a wind tunnel using recyclable materials to generate high energy outputs. Throughout the preparation process, the high school students served as mentors to the middle school students.

Participants and Results

LMS

The middle school participants were as follows:

Team Voltage (6th grade)

- Maria Flores
- Asma Rasheed
- Sabine Salnave
- Nicholas Prashad

LHS

The high school students placed 1st and 2nd place in the region.

The FANTastic Four (7th grade)

- Sunny Unger
- Brooke Kirchner
- Carl Roberts
- Tyler Ramsaran

Team V – unit (5th grade)

- Luke Kirchner
- Daniella Andrade
- Ian Geraghty
- Mia Pappas

First place

The FANatics

- Abdallah Sattar
- Ari Messer
- Ryan Bae

The Turbinizers

- Maxwell Lloyd
- Tyrone Moorman
- Kimberly Palacios
- Jacklyn Rodriguez

*The middle school students are looking forward to making changes in their designs and competing next year. They would also like to thank the high school students who served as their mentors.

Second Place

The TURBulators

- Lucia Malvoni
- Georgina Hudja
- Huda Quanungo
- Huma Quanungo



June Competition:

Nassau County Science Competition

June 8, 2014

3rd Place Winners:

Cielin Balberan, Fiza Khader, Nicholas Williams, and Ethan Breban

The 2014 Al Kalfus Long Island Math Fair

Lawrence Middle School students competed in the Preliminary Round of the Al Kalfus Long Island Math Fair at Hofstra University on February 28, 2014 against Nassau County schools. Students were coached and advised by Mr. Vanderbeck. In addition, Ms. DePaola, Ms. Ubertini, Mr. Gupta, Ms. Scarisbrick, and Ms. Sarceno accompanied the 22 students (7th and 8th graders). Students had to research a mathematical topic of their choice, develop an extensive research paper, create a presentation board, and execute a 10-15 minute presentation.



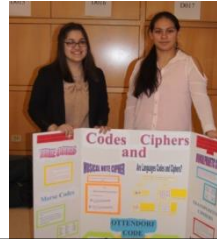
Middle School Participants:

Jece Abuan, Ethan Breban, Sayed Bukhari, Jacqueline Blyudoy, Kristen Dookie, Anoushka Guha, Fiza Khader, Zaiff Khan, Brooke Kirchner, Alex Koldy, Safa Ilyas, Ruby Levine, Stacy Portillo, Zoya Ramzan, Roshan Reddy, Daniel Rizzo, Kaitlyn Romaine, Susuan Sedhom, Ezgi Uygan, Perry Vacchio, Daniel Vasquez, and Nicholas Williams.

The projects represented the following mathematical concepts: the Fibonacci Sequence, Pascal's Triangle, Codes and Ciphers, Matrices, Pi, Abacus, the Golden Ratio, Math in Architecture, Fractals, and Math in the Stock Market.

All students created and presented exemplary works. They dedicated hours of hard work to produce exemplary projects. We are proud of their accomplishments and efforts.

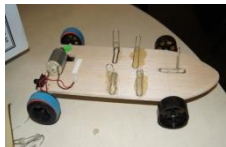
Congratulations to the following students who won the honor of advancing to the Final Round at Hofstra University on May 2, 2014:



**Stacy Portillo
and
Safa Ilyas
Bronze Winner**
(Codes and Ciphers)



**Ethan Breban
Silver Winner**
(Math in the Stock Market)



Department of Energy National Middle School Science Bowl

Lawrence Middle School students competed in the 13th annual Department of Energy National Middle School Science Bowl on March 1, 2014 at the Brookhaven Lab. The competition is comprised of two different contests, an academic competition and a lithium ion battery car competition.

The academic competition is a fast-paced question-and-answer contest where students answer questions about energy, earth science, physical science, life science, math, and general science. The model lithium ion battery powered car competition is a race involving the student-designed and built car. Our students put their best efforts forward and put up a good competition.

We are very proud of their accomplishments.



Team 1
-Jece Abuan
-Ethan Breban
-Roshan Reddy
-Daniel Rizzo
-Nicholas Williams



Team 2
-Dylan Finn
-Alexander Koldy
-Daniel Tzach
-Perry Vacchio

Team Advisors:
-Mr. Gupta
-Ms. DePaola



Long Island Science and Engineering Fair (LISEF)



LISEF Participants: Jece Abuan, Leslie Argueta, Heaven Arzu, Cielin Balberan, Ethan Breban, Fiza Khader, Brooke Kirchner, Lina Mavruk, Emily Prashad, Roshan Reddy, Daniel Rizzo, Sunny Unger, Nicholas Williams.

On Thursday, March 13, 2014, a group of enthusiastic and motivated seventh and eighth grade Science Club members represented Lawrence Middle School at the Long Island Science and Engineering Fair (LISEF) at the Crest Hollow Country Club in Woodbury.

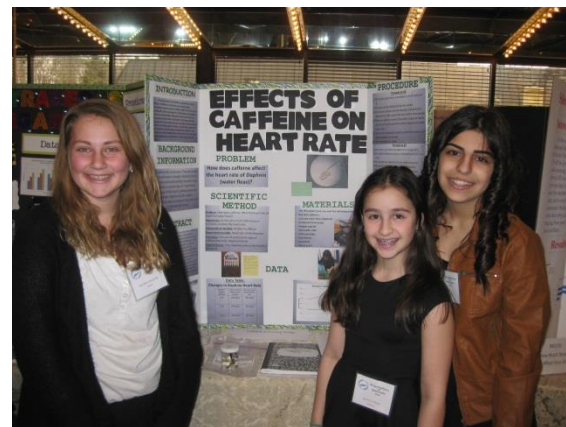
The students competed against other students from various districts throughout Nassau and Suffolk Counties. The students designed and performed experiments under the leadership of Mrs. Sarceno and Mrs. Ubertini, LMS Science Club Advisors. The students also received guidance and support from Ms. DePaola, Mr. Gupta, and Ms. DeVivo.

Students presented their topics and findings to three sets of judges. The topics included polymers, solar energy, the effects of caffeine on heart rate, wind turbines, the effect of fear on the pulse rate, and effectiveness of organic cleaners.

Congratulations to Brooke Kirchner, Lina Mavruk, and Sunny Unger for receiving a first place award for their project, which tested the effects of caffeine on the heart rate of water fleas. These students have been chosen to compete for semi-finalist spots for a national competition in Washington DC. They will be working hard to earn those spots. The results will be revealed in September 2014. Lawrence Middle School wishes them luck.

We are proud of all the participants' hard work, dedication, efforts, and accomplishments.

FIRST PLACE WINNERS



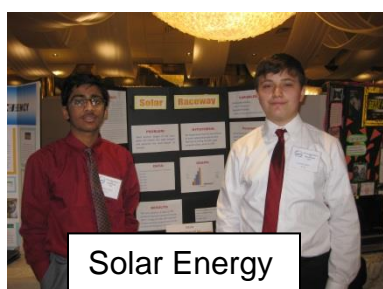
**CONGRATULATIONS
BROOKE KIRCHNER
SUNNY UNGER
LINA MAVRUK**



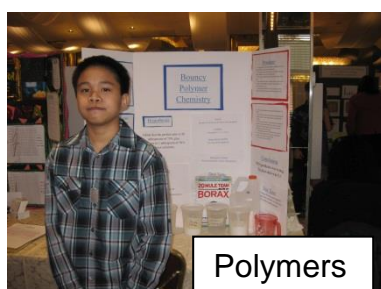
Outrageous Organics



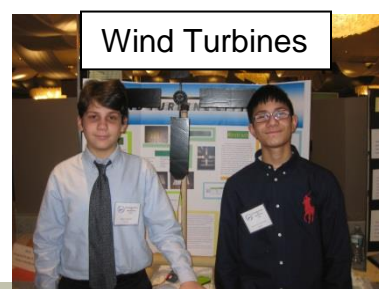
Fear Factor



Solar Energy



Polymers



Wind Turbines

NEWTON'S EGG DROP CHALLENGE



The Target

On March 14, 2014, Lawrence Middle School students competed at The Newton's Egg Drop Challenge at the Cradle of Aviation Museum in Garden City. Students had to design a device that would protect an egg from the impact of a two-story fall. Besides surviving the fall, the device had to land as close as possible to the center of a target. The device had to be less than 3 pounds and the maximum volume was one cubic foot.

The students had to then determine that the dimensions could not exceed 1ft x 1 ft x 1 ft. In addition, the device could not include liquids, bubble wrap, gases, and glass. Students were excited and became very creative in the engineering process to design and create the most protective device.

students' devices survived the fall.

Students were ecstatic that they were interviewed by Channel 12 News and appeared on that night's news. In addition, Lawrence Middle School students made Newsday the following day. Additional coverage, including more interviews, was placed on their internet site.

98 percent of the



Mia Pappas and Daniella Andrade on Channel 12 News



David Monroy and Solomon Mompelas with Mr. Vasaturo at the drop site.

STUDENT PARTICIPANTS

Aidan Adams
Joseph Amoroso
Daniella Andrade
Joseph Arce
Sharon Canales
Iliana Cervantes
Silvia Ciarlo
Elma Deljani
Steven Diaz,
Alicia Etwaru
Joceline Fernandez
Madelin Gomez
Lucy Lebowitz
James Kelly
Harrison Kim

Angie Melgar
Dylan Mendoza
Jennifer Miranda
Solomon Mompelas
David Monroy
Mia Pappas
Octavio Perez
Elsa Ana Reyes Lopez
Alberto Rodriguez
Lisbeth Rosales
Coandrea Steer
Janne Vanderhall
Yahsmeyk Williamson
Keith Woods

LONG ISLAND SCIENCE CONGRESS (LISC)



LISC Participants: Jece Abuan, Leslie Argueta, Heavan Arzu, Cielin Balberan, Jacqueline Blyudoy, Ethan Breban, Kalib DeNicolo, Christian Jaiyesimi, Fiza Khader, Emily Prashad, Roshan Reddy, Daniel Rizzo, Rhiannon Super, and Nicholas Williams.

On Thursday, March 20, 2014, a group of highly motivated seventh and eighth grade students from the Lawrence Middle School Science Club competed at the **Long Island Science Congress (LISC) Junior Division**, which is a science fair for middle school students. The fair took place at St. Joseph's College in Patchogue.

The students who represented Lawrence Middle School at the LISC competition demonstrated their love of science through their enthusiasm and dedication. They explored topics which sparked their curiosity, creativity, and ingenuity. Once they discovered their topic of choice, they conducted research, and then designed and performed innovative experiments using the scientific method. While carrying out their experiments, the students were able to apply a hands-on approach to problem-solving. After analyzing their results and forming conclusions, the students recorded their data on tables, charts, and graphs. Presentation boards were used to display their information. At the competition, the students presented their projects, boards, and scientific findings to the judges. This gave the students the chance to improve their public speaking skills.

The competition provided the students with a wonderful opportunity to integrate the areas of science, math, engineering, art, and technology while utilizing a constructivist methodology to problem-solving. Some of the project topics and titles included Solar Power, Outrageous Organics, Fear Factor, Science of Sports, Polymer Power, Antibacterial Cleaners, and a Wind Turbine.



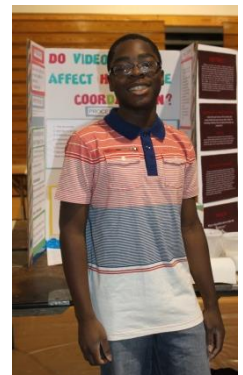
Meritorious Award



Achievement Award

The students designed and performed experiments under the leadership of Mrs. Sarceno and Mrs. Ubertini, LMS Science Club Advisors. The students also received guidance and support from Ms. DePaola, Mr. Gupta, and Ms. DeVivo. Mr. McQuillan and Mr. Makofske, two physical education teachers, provided time during their classes for one of the participants to conduct his experiment on the Science of Sports.

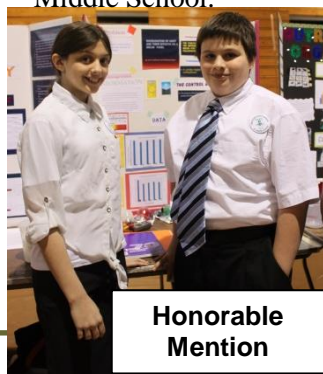
Jacqueline Blyudoy received the **Meritorious Award**. Roshan Reddy and Daniel Rizzo received the **Achievement Award**. Jece Abuan, Leslie Argueta, Heavan Arzu, Cielin Balberan, Kalib DeNicolo, Christian Jaiyesimi, Fiza Khader, Emily Prashad, and Rhiannon Super received **Honorable Mention Awards**.



Honorable Mention

Ethan Breban and Nicholas Williams received the **High Honors** award at a special ceremony at The Wheatley School on May 19, 2014.

We are proud of all the participants and their results. They proudly represented Lawrence Middle School.



Honorable Mention

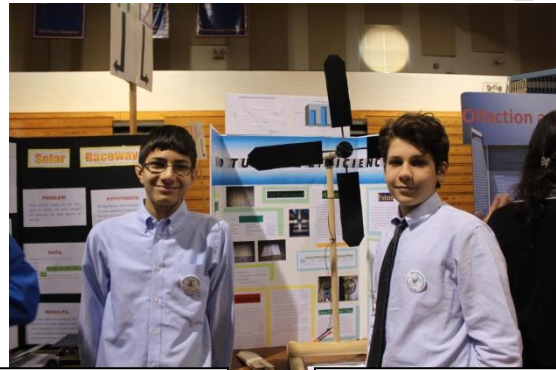


Honorable Mention

CONGRATULATIONS

LONG ISLAND SCIENCE CONGRESS (LISC)

High Honors Recipients



Wind Energy

Wind Turbines

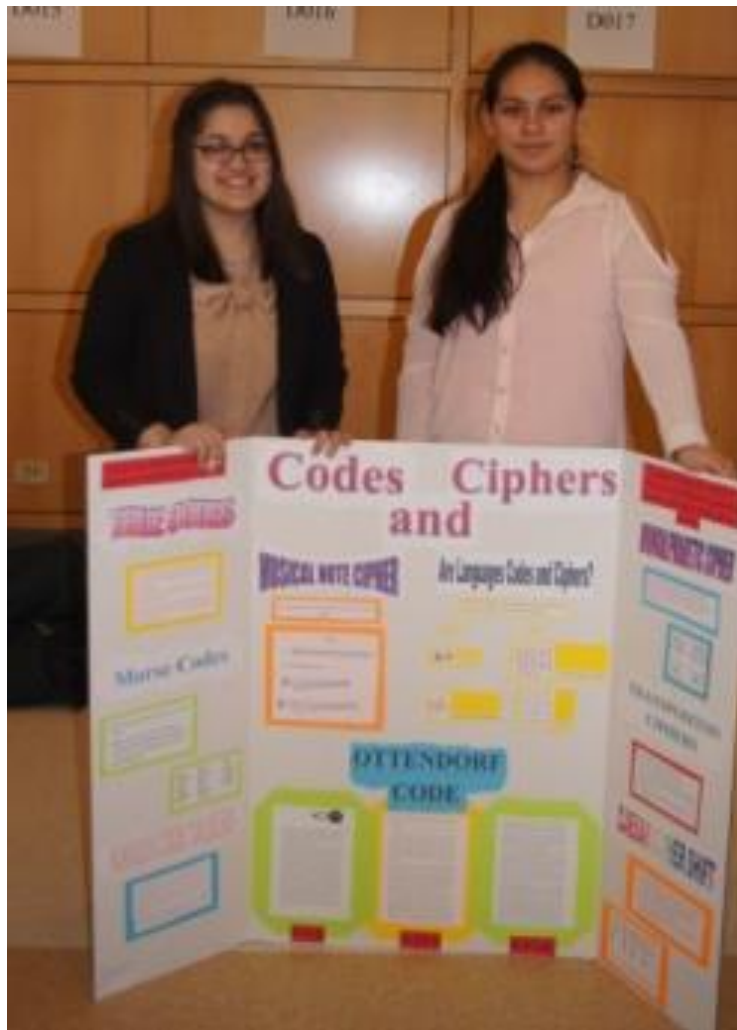


NICHOLAS WILLIAMS **ETHAN BREBAN**

CONGRATULATIONS

LONG ISLAND MATH FAIR

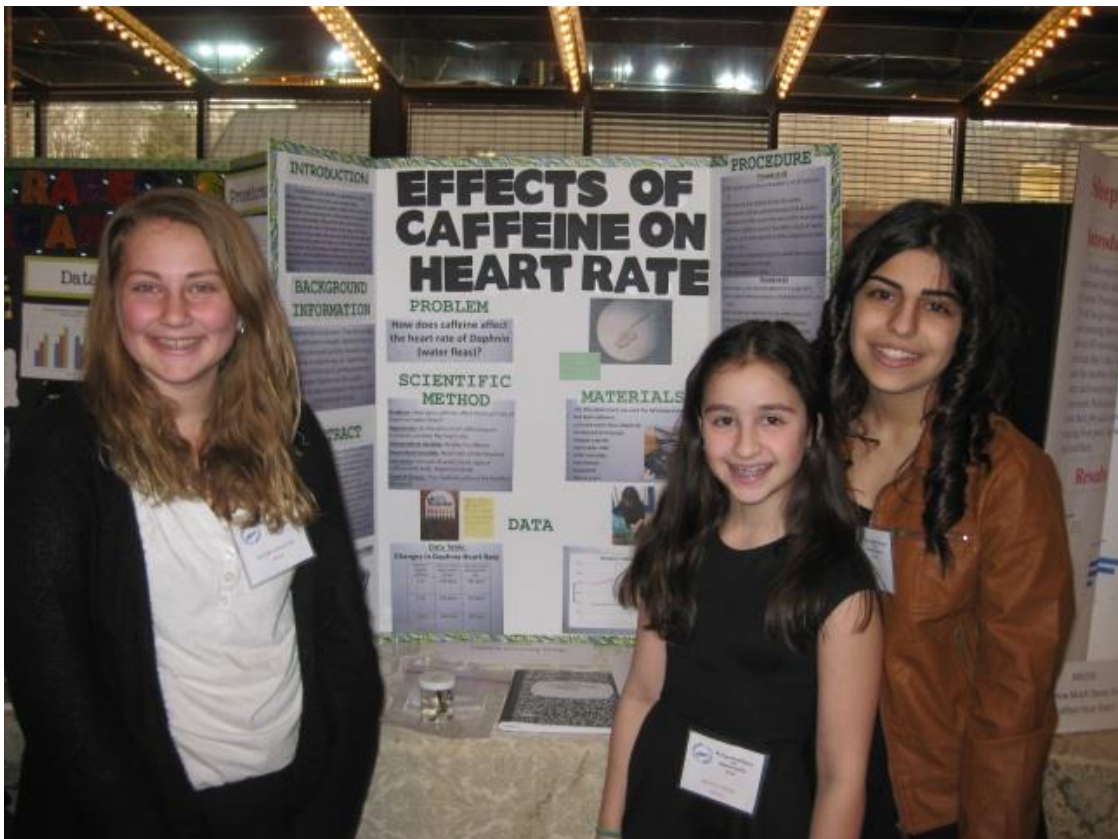
BRONZE RECIPIENTS



SAFA ILYAS

STACY PORTILLO

CONGRATULATIONS
LONG ISLAND
SCIENCE AND ENGINEERING FAIR
(LISEF)
FIRST PLACE WINNERS



SUNNY UNGER

BROOKE KIRCHNER

LINA MAVRUK

CONGRATULATIONS
LONG ISLAND MATH FAIR
SILVER RECIPIENT



ETHAN BREBAN
