Global Education Project

Global Education

Global Education Project is a newly formed non-profit organization aiming to bridge the divide between students and their access to quality STEM education. I came to the idea for the basis of GEP when I was reflecting on my years in the Herricks school district in New Hyde Park, NY. I was able to see both sides of the access to STEM education, as I had previously gone to school in Queens before my start at Herricks in the 8th grade. The differences between the standards of the two school districts were drastic, which made me realize that I had to be a part of the change that would allow students the ability to explore all their options.

GEP is an organization for students, run by students. As most of us are recent or soon to be high-school graduates, we know first-hand how the much the schools we go to influence the path we decide to embark on after we are done with the secondary education phase of our lives. Although we are a newly founded organization, the experiences of our members vastly outweigh their years. Through our own commitments to the STEM field, we have seen how much we have benefited from this beautiful field, and because of this we are aware of what needs to be done to ensure that all children have the same opportunities that we have had. We hope that in the coming years, you will embark on this journey with us of giving back to our community through the most powerful medium: education. Any questions can be directed to Lopa Shah.

Our founder Lopa Shah founded Global Education Project in the summer of 2015 as a response to the differences in education from her visit to her old elementary school in Queens to her high school in Long Island. GEP was founded as an intersection for Lopa's passion in the sciences and service and in hopes of revitalizing and empowering both the education system and the students, globally. Currently, as a sophomore at Stony Brook University, she continues her research in Translational Medicine, her academic pursuits in the biological sciences and her volunteer and advocacy work at hospitals and conferences. In the future, Lopa aspires for a career in the breadth of medicine and service and one day, inspire and become a role model for children across the the world.

Thank you,

Founder, Lopa Shah

Team

Executive Committee:

President- Kenny Shah, currently a junior in Herricks high school. Her persistent interest in exploring and learning new areas of math and science has urged her to become involved with Global Education Project. She has constantly taken rigorous courses in the fields of math and science and participated in fairs to pursue her interest in the STEM field. Her inspiration to help children internationally came from her one month trip to India alone, where she discovered the growing need of education for the youth. She continues to be an advocate by volunteering at Winthrop hospital since the age of 14 and participates in many school clubs to help the people around her.

Secretary- Amna, currently a Junior Biomedical Engineering major at Stony Brook University specializing in Bioelectricity and Bioimaging with a minor in Chemistry, as well as an undergraduate researcher in a musculoskeletal lab under Dr. Mei Lin Ete Chan and Dr. Clinton Rubin. While being an undergraduate researcher, Amna has presented her work at national conferences and symposiums, competed in a global medical device design competition, and has been a two time recipient of the PSEG Explorations in STEM Summer Research scholarship.

Secretary- Vyshnavi Kodali, a sophomore in the B.S./D.O. program at the New York Institute of Technology (NYIT). Not only does Vyshnavi have a passion for her future in medicine, but she also hopes to make a difference in the Spanish-speaking community, as she has a love for the language and the people who grew up speaking it.

Director of IT & Data Innovation- Deepen Goradia, a junior at South Brunswick High School in South Brunswick, NJ. He For years, Deepen has been a strong advocate for global educations and seeks to make a change in the global community by ensuring peoples of all demographics have resources to expand their knowledge and take advantages of the opportunities he has in the United States. To take steps closer to his goal, Deepen has founded the "Society of Young Innovators" and has become the president of his school's "She's The First" club. Both clubs have the main purpose of providing education to students who do not have the resources to do so effectively.

Public Relations Officer- Anika Khanderia, a junior at Singapore American School. She enjoys her math and science classes, and sees herself continuing to take courses in the STEM fields in the future. Always excited to explore new topics of interest, Anika found the perfect fit for her passions with Global Education Project Inc. - an organization that allows her to take her interest in the STEM field, and use it to help close the growing gap in education.

Overall Event Plan

Presentation Day

1. Set-Up Time: 20 Minutes
Necessary Materials: 3 Tables (one per station), at least 2 tables around each station (9 tables all together).

Setting up tables for students to conduct 3 experiments. Need three stations total, one for each experiment. Need one poster board set up on each table as well as volunteer stationed at each table. Preferably have tables surrounding each station so that children can work at each station.

2. Poster Borders: 7-10 Minutes depending on crowd (Lopa + Vysh + Kenny + Amna)

3. Experiment: Divide table into three stations (one per event, with rotations)
   1) DNA- 15-20 Minutes (Vysh)
   2)

4. Cleanup: 20 minutes
Necessary Materials: Heavy Duty Garbage Bags, Storage Containers

Clearing up the stations

Further Details

Advertising:

- ➔ Brochure, edit from the last brochure (Amna)
- ➔ Photography Waiver Form (Amna)

Volunteers:
Volunteer Clothes: Forest Green Shirt, Black Pants/ Leggings With sneaker- GEP (Vysh)

Event Experiments

1. DNA Modeling

SAMPLE:

Materials

1) Mini - Marshmallows (~2 Bags per 2-4 students)
2) Tookthpicks
3) Index Cards
4) Paper Plates
5) Sharpies
6) 3D printed mini - prizes

Procedure

1) Divide the students into groups of 2-4 by counting off A, T, G, C (rather than 1, 2, 3, 4) and have A's find T's and G's find C's.
2) Present a Powerpoint on what DNA is and how DNA can be used in science to discover different things (ex. forensics) and the structure of DNA. What is is made of? (Sugar, Phosphate and Base, in Double Helix Form).
3) Provide 1-2 bags of mini marshmallows and toothpicks.
4) Have an example DNA helical structure pre-created and have the students create their own helical structures.
5) Provide Sharpies and have the children label their model.
6) Ask questions about DNA Structure and uses of DNA, and give out mini prizes to those who answer correctly.

Not Models Procedure (Cheek DNA Extraction):
Linked Powerpoint:
https://docs.google.com/presentation/d/1wYvkqaTNRphFXvLtg9mCOHKXv2RwhNrbQ_oWFZu6ggc/edit?usp=sharing

2. Baking Soda Volcano

Materials

1. Baking Soda
2. Vinegar
3. Aluminum Container Trays
4. Warm Water
5. Small Water Bottles
6. Dishwasher Fluid
7. Food Coloring
8. Spoons

3. Glitter Explosion

Materials

1. Baking Soda
2. Vinegar
3. Aluminum Container Trays
4. Warm Water
5. Small Water Bottles
6. Plastic Vases/long cups
7. Food Coloring
8. Glitter and Spoons

4. Lava Lamp

Materials

1. Warm Water
2. Small Aluminum Container Trays
3. Kettle
4. Plastic Vases
5. Alka Seltzer
6. Food Coloring
7. Spoons

5. Blow Up Balloons

Materials

1. Sharpie
2. Balloons
3. Water Bottle

Participation Waiver For Parents

Global Education Project Inc.
15 Kent Street
New Hyde Park, NY, 11040

We at GEP would like to have the opportunity to help your kids discover the beauty of STEM through a science fair. After a thoughtful discussion about what would interest kids the most, we have decided to present the following projects to your kids:

(1) DNA Model Making

(2) Elephant Toothpaste Experiment/ CD Hovercraft/ Fizzing Colors

Our top priority is ensuring that your kids will have a safe environment in which they can absorb the most amount of knowledge from the experiments. At the actual event, we will have multiple volunteers ready to both explain the concepts to the kids and ensure that your kids are conducting the experiments safely.. The DNA model making experiment will be very safe, using only pipe cleaners and pom pom balls. The kids will be able to understand the flexibility and complementarity of a DNA model after the completion of this "experiment". The elephant toothpaste experiment will require the handling of chemicals, so a trained volunteer will be performing this as a demonstration. The kids will be asked to stand about 5 feet away to ensure their safety.

To maximize the learning experience, there will be presentations regarding the science behind the events at the beginning of the fair. We hope that at the conclusion of this event, you child will leave with a newfound curiosity for all things science and that they will always be questioning how their world works. If you have any questions, please feel free to contact Lopa Shah at: 718-312-9525

_____ _____ _____

Parent's Name (Print) Signature Date

Photography Waiver

Global Education Project Inc.
15 Kent Street
New Hyde Park, NY, 11040

Global Education Project Inc. (GEP) is a Non-Profit Organization that promotes the exposure of STEM learning to children in a fun and educational setting. In an effort to showcase our events to the public and reach out to other organizations we utilize photographs and social media to highlight our events and invite scientific communication.

By signing this waiver you are agreeing to allow Global Education Project Inc. to take photographs of you and/or your child as well as authorize the copyright and usage of said photographs in print and/or electronically. You are also agreeing to allow GEP to use the aforementioned photos for any lawful purpose including publicity, illustration, advertising and Web content.

We thank you for your cooperation.

I have read and understood the agreement above and grant Global Education Project Inc. and its members permission to take photographs of me and/or my child. I also agree that Global Education Project Inc. may use the aforementioned photos, with or without my name, for any lawful purpose including publicity, illustration, advertising and Web content.

Signature _____ Date _____

Printed Name _____

Signature, Parent or Guardian (if under age 18)

_____ Date _____