Greetings!

This edition of the JHU STEM Newsletter covers events and program deadlines from January through February. We invite Maryland K-12 students and educators to take advantage of these upcoming events and professional development opportunities.

Enjoy,

Center for Educational Outreach Team

Upcoming Programs

Maryland Science Olympiad

Science Olympiad is a national tournament program 'for teachers, by teachers'. Students from Middle School or High School prepare to compete at a tournament in their choice of science & engineering events such as building towers or gliders, solving chemistry forensics, or competing in anatomy or ecology. Activities include hands-on and math content to master skills. Your team can do one or all activities, it is very flexible. Up to 15 students per team. Teachers can decide to co-coach.

Registration Deadline: Friday, December 20, 2019

Contact MSO or click HERE to learn more.

The Ingenuity Project

The Ingenuity Project is an advanced math and science middle and high school program in Baltimore City Public Schools. Ingenuity is a good fit for students with a history of strong performance and interest in math and science. The program offers small math classes, experiential and rigorous science and engineering curriculum. Middle school students leave with a deep mastery of high school Algebra, and high school students are prepared for entrance to very competitive colleges across the country.

Application Deadline: 12:00 AM on Friday, December 20, 2019

Location: 1400 W. Cold Spring Lane, Baltimore, Maryland 21209

For more information contact Keyha Royster or click HERE to learn more.
**Women in Science and Engineering (WISE)**

We are now accepting applications for spring and summer 2020! Baltimore City public high school female juniors and seniors interested in pursuing STEM majors in college are urged to apply to the WISE program. WISE offers a unique opportunity to work one-on-one after school alongside a graduate mentor in a JHU engineering and research laboratory. Intent to apply should be submitted HERE prior to the application submission.

**Spring Application Deadline:** 11:59 PM on Sunday, January 12, 2020
**Spring Program Dates:** February 2020 - May 2020, 3 hrs/day, twice a week over 15 weeks

**Summer Early Application Deadline:** 11:59 PM on Sunday, March 15, 2020
**Summer Program Dates:** Approximately 4 weeks between June 2020 - August 2020, 6 hrs/day

**Location:** Homewood Campus, 3400 N. Charles Street, Baltimore, MD 21218

Click HERE or contact Ruby Holder for more information.

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**Tower of Power**

Join Johns Hopkins University's Whiting School of Engineering in celebrating National Engineers Week (February 16-22, 2020) by building a tower from spaghetti and marshmallows. The top five middle school teams that build the tallest freestanding tower win and will be invited to recreate their winning towers at the JHU Tower of Power event in February 2020!

**Location:** In your classroom!
**Intent to Participate:** Friday, January 17, 2020, 11:59 PM
**Entry Deadline:** Sunday, February 9, 2020, 11:59 PM

For more information click HERE or e-mail Ruby Holder to learn more.

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**North American Computational Linguistics Olympiad**

Come solve fun linguistics puzzles at Johns Hopkins, and learn about language and computer science in the process! No background in linguistics or computer science is necessary. A practice session will be held on Jan. 11. We can also come to your school to lead a puzzle session - contact us or visit our website for more details.

**Location:** Homewood Campus, 3400 N. Charles St. Baltimore, MD 21218.
**Contest Date:** Thursday, January 23, 2020

**Intent to Participate:** Friday, January 17, 2020, 11:59 PM
**Entry Deadline:** Sunday, February 9, 2020, 11:59 PM

For more information click HERE or e-mail NACLO to learn more.

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**Engineering Innovation - Johns Hopkins Summer Jobs Program**

Baltimore City Public School students can apply to participate in a summer program that will pay them to
Attend the four-week Engineering Innovation course followed by a four-week placement in a job on the JHU Homewood campus.

Location: Homewood Campus, 3400 N. Charles St. Baltimore, MD 21218.
JHSJP Deadline: Friday, February 14, 2020
Program Dates: Monday, June 22, 2020 - Friday, August 14, 2020

For more information click [HERE](#) or e-mail [EI](#) to learn more.

### ASPIRE High School Internships

The ASPIRE program at APL is a unique opportunity for high school juniors and seniors to experience and explore STEM careers before committing to an area of study in college. During the intensive summer session and the longer academic-year session, ASPIRE interns are paired with APL staff mentors to complete projects, solve problems, and learn and apply crucial technical and interpersonal skills in a hands-on, professional environment. During their internship, students also have access to many of APL’s considerable technical and professional resources. Application opens Wednesday, January 1, 2020.

Application Deadline: Saturday, February 15, 2020
Location: 11100 Johns Hopkins Rd., Laurel, MD 20723
When: Summer 2020 for 6 weeks, 25 hours per week

For more information click [HERE](#) or contact [ASPIRE](#) to learn more.

### Biomedical Engineering Innovation

Biomedical Engineering Innovation is an online course for high school students which introduces biomedical engineering by (1) modeling biological systems and designing experiments to test those models and (2) introducing engineering principles to solve design problems that are biological, physiological, and/or medical.

Location: Online
Application Deadlines: Click [HERE](#)
Dates: Monday, January 27, 2020 - Thursday, May 14, 2020

For more information click [HERE](#) or contact [BMEI](#) to learn more.

### Summer internships/apprenticeships at Johns Hopkins sponsored by AEOP

Internship opportunities for high school students to participate in research projects at Johns Hopkins University are available through the Army Educational Outreach Program (AEOP). Students will receive a $1,500 stipend for completing a 5 - 8 week internship and will receive one on one mentoring by a current university student and faculty member. Application portal opens Monday, December 16, 2019.

Location: Johns Hopkins University and locations across the United States

For more information click [HERE](#) or e-mail [Bess Bieluczyk](#) to learn more.
APL STEM Academy

APL's STEM Academy is a unique learning opportunity for middle and high school students (grades 8-12) to increase both their knowledge of and interest in STEM-related college majors and careers.

**Location:** 11100 Johns Hopkins Rd., Laurel MD 20723 and limited online offerings

**Dates:** Monday, February 24, 2020 - Friday, May 22, 2020

**Times:** 4:30 PM - 6:30 PM, one day per week depending on course

For more information click [HERE](#) or contact [APL STEM](#) to learn more.

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Get Involved

Village Learning Place LINK Program

The Village Learning Place is currently hiring for several program positions within the Let's Invest in Neighborhood Kids (LINK) program. Please take a look at [openings](#) and share with your network.

**Location:** 2521 Saint Paul Street, Baltimore, MD 21218

**Position Start Date:** Monday, January 13, 2019

For more information click [HERE](#) or contact [VLP](#).

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FIRST Competitions in Maryland

FIRST in Maryland will feature more than 40 robotics competitions around the state from December 2019 - March 2020. These competitions cover 4 different programs, targeting students from ages 6 through high school.

Sign up to volunteer! Some volunteer positions require technical skills, but many just require enthusiasm and willingness to help. All roles come with training and a supportive community. All FIRST events are free and open to the public.

**Location:** All over Maryland

**Dates:** December 2019 - March 2020

**Time:** 7:00 AM - 4:00 PM

For more information about volunteering, click [HERE](#) or contact [Jenny Beatty](#).

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Hopkins Robotics Cup Tournament

We are looking for volunteers for the 8th annual Hopkins Robotics Cup, presented by Northrop Grumman. We need volunteers for Saturday, January 25th as well as for setup on Friday, January 24th. There will be two divisions:

* VEX IQ Challenge (elementary/middle school students) - this year's VEX IQ Challenge is Squared Away
* VEX Robotics Competition (middle/high school students) - this year's VEX Robotics Competition game is Tower Takeover

If you are interested in volunteering, please fill out the Volunteer Form [HERE](#).
Location: JHU Newton White Athletic Center, 3400 N. Charles St. Baltimore, MD 21218.
Date: Saturday, January 25, 2020
Times: Specific volunteer shifts available. This is an all-day event.

For more information click HERE or e-mail Erin to learn more.