

January 2020

STEM News You Can Use. . .

VISIT THE DUPAGE ROE STEM WEBSITE AT http://stemdupage.com/



Keep STEM Learning Fresh

Sustaining an interest in STEM is as important as sparking an interest in STEM. <u>Here</u> are a few key elements that help keep STEM learning fresh for the students and teachers.



Nurturing Diversity in STEAM

Nurturing diverse voices and participation in STEAM means applying a few different approaches. Here are <u>some ideas</u> that have worked for one educator.



Integrating Argumentation from Evidence Practice into Engineering Design Projects

Consider these <u>strategies</u> to more effectively connect argumentation from evidence to the engineering design process.

STEM Mindset: Supporting Girls' Ongoing Engagement and Success in STEM

Supporting the development of a <u>STEM mindset</u> is increasingly important in developing our future citizenry and work forces, especially among underrepresented groups, including girls.

Upcoming Events and Opportunities

U.S. 5-Year STEM Strategic Plan Presentation and Illinois PAEMST - February 4 or 8, 2020

Curious about the U.S. 5-year STEM Strategic Plan? Or, perhaps you are interested in applying or recommending someone for the Presidential Award for Excellence in Mathematics and Science Teaching (PAEMST), which will honor K-6 and 7-12 teachers. Come to the Crouse Education Center (CEC) - Room B6 on Feb. 4, 2020 (3:30 pm - 5:00 pm) or Feb. 18, 2020 (4:30 pm - 6:00 pm) to learn more. Light refreshments will be served. Reserve your spot by January 21.

Small Group Math Instruction for Grade 6-8 Teachers - January 23, 2020

Register for the #ILMathCom session to examine the use of small group instruction, a form of differentiation where teachers use formative assessment data to inform the grouping of students.

Dolphin Training Institute Associate Degree Program

Considering a career in dolphin training? Wondering what the training experience is like? <u>Learn more</u> about this intensive learning opportunity. Applications are due February 28, 2020.

Toshiba/NSTA ExploraVision STEM Competition - Applications Due February 10, 2020

This <u>competition</u> for K-12 students is designed to inspire students to envision what technology might look like in the future, while researching science in an engaging, hands-on way.

Resources

Educators: Find Resources through DiscoverE

DiscoverE is the organization behind Engineers Week, Introduce a Girl to Engineering Day, World Engineering Day, and the Future City Competition. The <u>DiscoverE website</u> has a wealth of materials for teaching students about engineering.

A Smart School Building - Project Idea for Grades 6-12

This lesson explores the practical, scientific, ethical, and environmental issues that emerge in creating "smart" buildings.

Engineering Career Resources and More

The <u>website</u>, developed through a NSF and NBC partnership, offers short videos on various engineering fields. Also, view the links to STEM related features such as the science of sports, chemistry in everyday life, nanotechnology, and many more.

Reducing Waste

Use the Your Plant Google Tool to explore ways in which we can improve our impact on the environment.

Pi Dav Activity

Looking for a Pi Day lesson that involves middle grade students in a hands-on activity? The STEM Team has assembled a lesson and classroom materials for the first 10 teachers to email Mary Biniewicz at mbiniewicz@dupageroe.org.



