Science Resources PK-12

STEM Websites- Clickable Links

STEM in 30(aerospace)STEM in 30 is an Emmy-nominated program for middle school students produced by the Smithsonian's National Air and Space Museum. New episodes are released every month, followed by an Air and Space Live Chat, where you and your students can tune in live and ask our expert your questions.

BioInteractive(HHMI provides access to videos and worksheets on a variety of topics. Geared for High School, but can be used for middle school).

CK-12 K-12 interactive textbook, and interactives

Discovery Education $ PreK-12 Lessons, Activities, Interactives, Videos

Discover Space STEM Lessons - Lesson plans for K-5

Education.com lessons Lesson plans for PreK-6

Generation Genius $ Lesson plans for K-8

Legends of Learning Elementary and Middle School Science and Math games

Mystery Doug Lesson plans for K-5

Mystery Science Lesson plans for K-5

NASA K-12

NASA STEM Engagement- monthly resources for STEM engagement

PBS Learning PreK-12 Lessons, Activities, Interactives, Videos

PDE SAS - Lesson Plans PK-12 from the PA Department of Education

Pinterest PreK-12 Lessons, Activities, Interactives, Videos

Readworks - provides non-fiction, fiction, and poetry articles with assessments

Skype a Scientist - K-12 Skype a Scientist creates a database of thousands of scientists and helps them connect with teachers, classrooms, groups, and the public all over the globe. This gives students the opportunity to get to know a real scientist and get the answers to their questions straight from the source.

Space Place- explore Earth and Space

Teachers Pay Teachers - Resources for PK-12 including digital activities, digital resources, lesson plans, Google Apps, assessments, worksheets - some cost $

TeacherTube PreK-12 Videos

Tynker Code PreK- 9- learn to code projects.

Tinkercad 3D printing/paper design Grade 4-12

Organizations

Advancing Science

Email: advancingscience@gettysburg.edu
Website: **www.gettysburg.edu/offices/advancing-science/**

Pennsylvania Science Teachers Association - https://www.pascience.org/
National Science Teachers Association - www.nsta.org

Professional Development

Teaching Channel - PK - 12 teachers can watch, share, and learn new techniques to best teaching practices $

Tradebooks

National Science Teachers Association Outstanding Trade Books 2021

"Brilliant! 25 Catholic Scientists, Mathematicians, and Super Smart People"; By David Michael Warren (Pauline press or Word on Fire)

Apps

Google Expedition - Google Expeditions is an immersive learning and teaching tool that lets you go on VR trips or explore AR objects. Explore historical landmarks, go down to the atomic level, get up close with sharks, even visit outer space! This app is compatible with all of your devices.

In the classroom or with groups, Google Expeditions allows a teacher acting as a “guide” to lead classroom-sized groups of “explorers” through VR tours or show them AR objects. Guides can use a set of tools to point out interesting things along the way.

Users that are not in groups can also explore on their own either in VR or AR.

Features:
• **Explore** a world of places and things on your own with your phone, tablet, or VR device.
• **Guide** classroom-sized groups of locally connected users from your phone or tablet.
• **Join** a guide in immersive AR or VR and let them walk you through one of our hundreds of VR or AR Expeditions. VR mode can be used with a Google Cardboard or Daydream viewer.
• **Connect** devices over the same WiFi network - if the Guide has downloaded some Expeditions, there is no internet connectivity required to run the Expedition!
• **Choose** from a growing list of over 800 Expeditions - each one is a curated set of VR imagery or AR objects along with integrated descriptions, talking points and questions.

Google Moon - is a feature of Google Earth that shows satellite images and allows for the exploration of the Moon.The landing sites of each of the Apollo missions are shown on the satellite image, providing more information on each mission as the user zooms in.

Google Mars - a 3D mapping tool for the Red Planet, that shows regions, mountains, plains. spacecraft, canyons, ridges. stories, dunes, crater**s**