

THE CONNECTICUT BUILDING A PRESENCE FOR SCIENCE NETWORK IS SUSTAINED THROUGH THE ADVOCACY OF THE CCAT, CONNECTICUT SCIENCE SUPERVISORS ASSOCIATION, AND THE CONNECTICUT SCIENCE TEACHERS ASSOCIATION

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NAMES AND E-MAIL ADDRESSES OF OUR POINTS OF CONTACT AND KEY LEADERS ARE NOT SHARED WITH ANY OTHER ENTITY

Resources

NGSS adopted by Connecticut! Training begins in the spring of 2016 in your region. Watch for updates on the CSDE's science curriculum web site.

Visit the NGSS@NSTA Hub : IT now offers a dynamic version of the Next Generation Science Standards.. Nextgenscience.org

MARCH 17: CONNECTICUT SCIENCE SAFETY NETWORK CSSN 2015-16 WORKSHOP CALENDAR can be found at: [Science Safety Dates](#)

Subscribe to Green Teacher at <http://greenteacher.com/subscribe/>



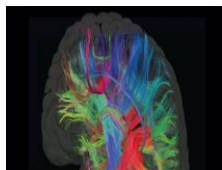
<Connecticut Green LEAF Schools> has great lesson ideas that link Common Core with the new Next Generation Science (and they're fun too!) More information about Connecticut Green LEAF Schools can be found at www.ctgreenleaf.org

Would you like a complete list of grants that has been provided by the National Science Teachers Association? NSTA has put these grant and their deadlines in an easy to follow calendar. It includes: deadline date, description, category, and grade level. To view this list, please visit:

<http://www.nsta.org/publications/calendar/>

PROFESSIONAL DEVELOPMENT

Mystic Seaport for Educators: Mystic Seaport hosts free monthly professional development workshops that provide teachers with "behind-the-scenes" tours and thematic workshops that correlate the Museum's vast collections with classroom curriculum. Workshops show teachers how to utilize the Museum and its collections in their classrooms through active participation and interaction with experts, primary source documents, and exhibition objects. Topics range from immigration, whaling, and life at sea, navigation and nautical instruments to the Civil War and World War II. Each session will also highlight our website for teachers.



The next session of Seminars on Science, the American Museum of Natural History's online professional development program for educators begins March 14th. Graduate credit is available from our university partners.

The 6-week online courses co-taught by world-class museum scientists and classroom educators include The Brain; Climate Change; Earth: Inside and Out; Evolution; Genetics, Genomics, Genethics; The Ocean System; Space, Time and Motion; Water and more. Get access to cutting-edge research, rich content, and powerful classroom resources. Sign up today and receive \$50 off your registration fee! Use code SCIENCEMATTERS. If you have any questions, send us an email at learn@amnh.org, or call us at 800-649-6715.

For more information about the program, check out Seminars on Science at <http://www.amnh.org/learn/>

SAVE THE DATE FOR The Connecticut Association of Biology Teachers Ideas and Innovations Professional Development Workshop! 8:30 am-3:30 pm April 9, 2016 Northwestern Connecticut Community College. Details and Registration forms will be posted on the CTABT website (<http://web.ccsu.edu/ctabt/>) in February.

CALL for WORKSHOP PROPOSALS! Would you like to share your favorite activity or lab exercise with other educators? Submit a proposal for the upcoming CTABT Ideas and Innovations Professional Development workshop at: <https://www.surveymonkey.com/r/TDJJN2L> or email Sharon Gusky, CTABT president at sgusky@nwcc.edu

Nominate an Outstanding Teacher : Every year, NABT and CTABT recognize an outstanding biology educator (grades 7-12 only) in Connecticut. Candidates for this award do not have to be CTABT or NABT members, but they must have at least three years of public, private, or parochial school teaching experience. A major portion of the nominee's career must have been devoted to the teaching of biology/life science. To nominate a candidate, go to <http://www.nabt.org/websites/institution/index.php?p=631>

LEADERSHIP AT SEA: PROFESSIONAL DEVELOPMENT FOR TEACHERS

Mystic Seaport and the schooner Victory Chimes are pleased to offer a special joint professional development program for teachers. This is a unique, multidisciplinary teaching and learning experience that is designed to share the



resources available to teachers at Mystic Seaport, and to provide an extraordinary environment for learning and connecting with others on board the schooner Victory Chimes, a national landmark vessel that represents our living heritage. This program can accommodate up to 24 teachers. Participating teachers will also learn how they can involve their school in the upcoming Leadership at Sea program for students in 2016-2017.

Shore Component: August 2-4, 2016 at Mystic Seaport

At Sea Component: August 18-22, 2016 on board the schooner Victory Chimes, sailing out of Rockland, ME. Cost: \$1,295/person, includes room and board for entire program (if housing is not needed for shore component, subtract \$80) Shore Component at Mystic Seaport (August 2-4, 2016), Mystic CT Sea Component on board Victory Chimes (August 18-22, 2016), Rockland, ME

Registration Information: Go [to this registration form](#) before **April 30, 2016** and let us know if you are paying with a purchase order. Please email registration form to: Kristi Otterbach, Breath Wind expressive arts and education. breathwind11@gmail.com

ETHNICALLY-DIVERSE CONNECTICUT TEACHERS!

Enhance your environmental education methods and knowledge. We are awarding SIX 80% Scholarships for summer 2016 WHAT: Sharing Nature: An Educators' Week Workshop WHERE: Hog Island Audubon Camp, Muscongus Bay, Maine

WHEN: JULY 17 - JULY 22, 2016

SCHOLARSHIP: \$900 towards \$1,095 registration fee (*Price includes program, lodging, boat travel, all meals*)

Features of Educators' Week:

- Designed for science and non-science educators to generate exciting ideas for creating and incorporating environmental education activities into your curriculum.
 - Inspiring and experienced instructors will share their favorite approaches, methods, and activities for engaging you, and your students, with nature.
 - Workshop presentations and guided field trips on the island share techniques in field biology, art, music, photography, theater, journaling, and other disciplines. Interactive workshop: "Increasing Diversity in Environmental Education" led by Chandra Taylor Smith, Ph.D. Vice President, Community Conservation and Education, National Audubon Society.
- TO APPLY: E-mail letter of interest and names & contact info. of 2 professional references to Camp Director Pete Salmansohn at psalmansohn@audubon.org. Awards given on a rolling basis, so early application is strongly suggested. For details, photos, videos about the camp visit: hogisland.audubon.org.

Hog Island Rainbow by Eric Snyder

New Women in STEM Resource Available
The Connecticut Women's Hall of Fame is pleased to announce the release of STEMfems: Women Transforming Our World, a new module in our award-winning DIY History series. Specifically designed to help educators bring women's perspectives into the classroom, STEMfems includes Common Core-aligned information and activities related to pioneering Connecticut women in diverse STEM fields from 3D printing and architecture to biology and astronomy. Training and support in how to incorporate STEMfems content into your existing lesson plans is also available from CWHF staff. Register and download STEMfems today by visiting www.cwhf.org/DIY! It's free! Contact Bambi Mroz, Director of Education, for more details or with any questions (203-392-9013 |).



5th Annual STEM Forum & Expo, hosted by NSTA IN Denver: July 27-29, 2016! STEM Forum & Expo hosted by NSTA, brings together educators and organizations who are actively implementing STEM programs in their schools or districts. Held in Denver next July 27-29, come prepared to learn tactics that work, build your professional learning network, connect with effective outreach programs and partnerships, discover new resources, and build a strong curriculum. Keynote Speaker: Derek Muller, Australian-Canadian science communicator, filmmaker, and television presenter created the leading science YouTube channel, Veritasium, that features experiments, expert interviews, cool demos, and discussions with the public about "everything science." Join the over 2 million subscribers and see him in person at the Expo! <https://www.youtube.com/user/1veritasium>

**NGSS-JASON SAMPLER FOR GRADES
6-8 THURSDAY, APRIL 7, 2016**

JASON Learning Professional Development Focused on NGSS: JASON Learning's comprehensive professional development program is designed to provide educators with the tools and strategies to implement student-driven, in-depth scientific exploration and inquiry. Each workshop is designed to increase educators' comfort and expertise with providing rich, STEM-based experiences that address State Standards, Next Generation Science Standards, and Common Core. Teachers will put on their "student" hats while experiencing a variety of lab activities, video resources, and digital simulations and learning games, and "teacher hats" while discussing pedagogy, best practices in curriculum integration and implementation, and differentiation for a variety of learners. Workshops also include a tutorial and hands-on practice with navigating the JASON Learning website and understanding how to access resources best directed at their grade specific scope and sequence.

Location: LEARN, Old Lyme, CT
Time: 8:30am-3:30pm
Cost: \$25.00
<http://www.jason.org/training> or
<http://www.jason.org/roll-outs/ct-statewide> Questions?
Contact: amy@jason.org

Free, Online Access to JASON Learning's Award-Winning Programs Available to Public School Educators in CT. Through generous support from the Connecticut Department of Economic and Community Development, JASON Learning is providing complimentary access to JASON's gated website to all public school educators in CT through August of 2017. Each comprehensive JASON program highlights a diverse group of STEM role models, their research and real-world phenomena

to engage students and motivate deeper interest in learning. JASON's online platform includes reading selections, hands-on labs and field assignments, videos, digital simulations and learning games for students; and lesson plans, implementation tips, and a powerful classroom management tool for educators. Live, interactive events throughout the year connect JASON participants with inspirational STEM role models. Educators will have access to a host of downloadable resources from all 7 JASON Learning curricula. Sign-up today by visiting www.jason.org : Logon and create teacher account.

LEARN MORE

**PlantingScience: Digging Deeper Together
A Model for Collaborative Teacher/Scientist
Professional Development**

BSCS, the Botanical Society of America, and the American Society of Plant Biologists are looking for high school life science teachers who are interested in participating in a unique professional development opportunity involving collaborations with research scientists, teachers, and students.

- Are you interested in collaborating with scientist mentors to help students learn how to conduct research on plants?
 - Are you interested in taking part in face-to-face and online professional development to help enhance your teaching practices?
 - Would you like to participate in a research project to find out how collaborations among teachers, research scientists, and students can lead to enhanced student learning?
 - Are you interested in having your students work more with plants?
- Digging Deeper is a professional development (PD) research project that builds on the success of PlantingScience, an online science mentoring community for high school biology students.

The Digging Deeper project will develop, implement, and test a professional development (PD) model whereby teachers and scientists work closely together over extended periods to guide students in authentic science investigations and then to reflect on instructional and mentoring strategies that are effective for enhancing student learning.



WHEN YOU WALK IN, THEY WILL SAY, "HERE COMES THE JUDGE!"

Which person are you? A HERO - You have already registered as a judge and the students thank you tremendously for your help and support. However, what we need you to do now is to pass this information along to your family, friends and co-workers. If it's good enough for you, won't they enjoy doing it too? In the end, they will thank you!

NOT QUITE YET - We know that you want to be a judge and you are planning to register, but just haven't done it yet. Why wait? You will have a great time. You will help the next generation grow and succeed in school and their careers beyond. You will end the day feeling good about what you've done. But before any of that can happen, you need to register!

NO EXPERIENCE NEEDED

New judges will be teamed with experienced partners

CLICK HERE TO REGISTER <http://www.cicregistration.org/judges/>



Learn How Your Students Can Design and Make Almost Anything!

"I have a great idea, but I don't know how to make it!" Have

you or one of your students ever said that? Fortunately, the technology is now available to enable anyone to design and make any part or component they might need for their inventions. * Join us for an exciting hands-on professional development day! Perfect for Elementary and Middle school classes NO prior experience necessary The PD session will be taught by an experienced Middle School teacher who has been using this technology successfully in her classroom. She'll share her invaluable tips, tricks, and secrets so that you can use this technology in your classroom too!

At this session, you will learn how to use: **TinkerCAD** – A free, easy to learn and use computer aided design program. Use simple geometric shapes to make anything. You don't even have to be able to draw.

3D Printers – These amazing devices, which can make an actual 3D plastic product from your design, now cost less than \$500. You will learn their features, capabilities and how to use them. **Project Ignite** – A no-cost, on-line classroom management system, which you can use to direct and monitor your students' work.

www.ctinventionconvention.org

ARE YOU FAMILIAR WITH UCAR?

One of the best resources having to do with Atmospheric Research. They provide K-12 educational resources and teacher professional development around atmospheric sciences. Web content, videos, games, simulations, and lessons on weather and climate. Visit <http://scied.ucar.edu/>

REAL WORLD SCIENCE—YESTERDAY, TODAY, AND TOMORROW

How Necessity Creates Innovation in Science and Technology
July 17-22, 2016 in New Orleans, LA

The National WWII Museum is excited to announce a week-long professional development opportunity to take place in the summer of 2016 for middle school science teachers. Twenty eight teachers from across the country will come to New Orleans to experience hands-on how necessity, knowledge, perseverance and skill lead to inventions, innovation, and careers in STEM (Science, Technology, Engineering, and Mathematics), just like in World War II.

WHO CAN PARTICIPATE: The seminar application is open to any science teacher (public, public charter, private, and parochial) with between 2 and 10 years of teaching experience in 5th-8th grade science, and who will be teaching a science course to students in the same age group in the 2016-2017 school year. Applications will be evaluated through a competitive process that will include information on teaching experience, a short written statement, and two letters of recommendation. Two spots will be reserved for qualifying Louisiana teachers.

COST: This seminar is supported by a grant from the Northrop Grumman Foundation. Teachers will receive free room and board in New Orleans, a travel stipend, and all seminar materials free of charge.

APPLY NOW

July 17-22, 2016 in New Orleans, LA

EQUIP

Designed to identify high-quality materials aligned to the Common Core State Standards (CCSS) and Next Generation Science Standards (NGSS)

A tool to review existing lessons and units, to determine what revisions are needed, and to help you develop new lessons and units!

Two Day Workshop

April 7 and 8 | CT Science Center | 8 am - 3:30 pm

\$165 CSTA/CSSA Members

\$195 Non-members

Includes 2 Day workshop, breakfast and lunch, parking both days

Non-member rate includes CSTA membership till Sept. 2017

Space is Limited! Register by April 1, 2016. Register online at www.csta-us.org.

Mail-in Registrations/PO accepted -- [CLICK HERE FOR BROCHURE AND FORM](#).

Questions? Contact Rachael Manzer at rmanzer@hotmail.com or Laurel Kohl at KOHLL@easternct.edu

Sponsored by Connecticut Science Teachers Association and Connecticut Science Supervisors Association

You might have attended our EQuIP Rubric workshop at the 2015 CT Science Education Conference in Hamden and had a "sample" of this great tool. Attend this workshop to get the full experience and be able to use the EQuIP tool with confidence to review existing lessons and units, to determine what revisions are needed, and to help you develop new lessons and units for your school and district! Two great ACHIEVE trainers with double the expertise....

Tricia Shelton Trainer and NGSS EQuIP Rubric National Trainer for Achieve. Jen Arnsward is the Director of Curriculum and Instruction at Ionia Public Schools in Michigan.

More about EQuIP at

<http://www.achieve.org/EQuIP> <http://www.achieve.org/EQuIP>

NSTA's National Conference in Nashville is the place to be to get hands-on learning on the Next Generation Science Standards (NGSS) and effective implementation strategies.

NSTA has an impressive line-up of NGSS-focused programs and events, including:

- NGSS-related short courses, such as Teaching NGSS in Elementary Grades and Building Better Lessons: NGSS Classroom Redesign
- A daylong NGSS@NSTA Forum comprised of five sessions given by NGSS writers and other education experts
- NGSS Share-a-thon providing tips and tools to implement three-dimensional standards
- Professional Learning institutes (PLIs) focused on three-dimensional learning
- Hundreds of sessions and workshops given by science educators, NGSS writers, and leaders from districts implementing the NGSS
- Inspiring and motivating speakers, including Peter McLaren from Achieve

Take a Deep Dive Into the NGSS in Nashville

March 31 – April 3

National Middle Level Science Teachers Association is holding a Share-a-Thon on April 2, 2016 as part of our Meet Me in the Middle Day at the NSTA Conference in Nashville.

Participate in the Share-a-Thon. I hope that you will be able to distribute it to your state networks. Last year in Chicago we had well over 700 attendees visit the Share-a-Thon. Also participants as well as attendees are eligible for some of the great door prizes we have to offer. Register for Sharathon You can get more information about Meet Me in the Middle day, by visiting our website:.

<http://nmlsta.ning.com/>



CALL FOR PRESENTERS FOR THE THIRD ANNUAL STEMFEST

Where: Mill River Park, Stamford/STEMford

When: Saturday, May 14, 2016

(Rain date will be Sunday, May 15, 2016)

Time: 10 AM – 4 PM

Stamford Public Schools is seeking presenters and volunteers for the third annual STEMfest; a day filled with activities focusing on STEM. Last year, we had over 100 activities for approximately 2,000 visitors. The deadline to submit an application to present at STEMfest is Pi Day, March 14th. To sign up to be a presenter or a volunteer at #STEMfest2016, please visit the website <http://www.stemfest.us/> stamfordstemfest@gmail.com

Visit STEMfest: Date: Saturday, May 14 (rain date Sunday, May 15)

Time: 10am-4pm

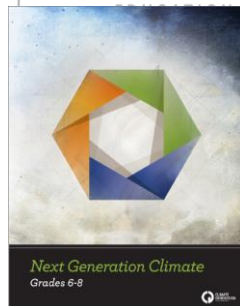
Location: Mill River Park, Stamford/STEMford, CT

Cost: Free

What: Activities and displays designed to give preK-12 students and their families a chance to experience STEM (Science, Technology, Engineering and Mathematics)

Purpose:

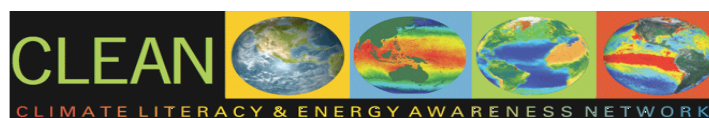
- 1) To help students and their families learn about what STEM is;
- 2) To show how much fun these disciplines can be;
- 3) To show how these disciplines are inherent in many of the things we do every day
- 4) To share future opportunities available through college and career paths in STEM



Give me an N! Give me a G! Ok, sorry! We are just really excited about the Next Generation Science Standards (NGSS) and the fact that

they include climate change. Our newest curriculum, Next Generation Climate for grades 6-8, supports NGSS and we want to help you incorporate both these new standards and climate change into your educational setting. Register today for our 11th annual Summer Institute for Climate Change Education to get hands-on training to teach climate change and network with other educators in a fantastic setting. See you in June!

<http://www.climategen.org/what-we-do/education/professional-development/summer-institute/summer-institute-2016/>



www.CLEANet.org has more than 640 units, lessons, videos, and diagrams While their focus is on Middle and High school, there are some middle school activities that would be appropriate for both.

<http://serc.carleton.edu/k12/index.html>

Are you a high school teacher looking to give your environmental class a great challenge? Check out the new Our Town Microgrid Challenge for great NGSS engineering connections beyond the usual “....compare and contrast renewables and nonrenewables....” Our Town Microgrid Challenge

What are microgrids and why would you want one? This unit leads students to understand and apply the answers to that question. The unit includes a multiple step process, with industry and policy readings, investigation of town maps and properties, consideration of emergency needs in the event that electric power is lost, and design of a system that will meet that need. Throughout the unit students hold a "public hearing" with their peers to discuss and fine-tune their ideas, and a capstone presentation to town leaders to discuss their solutions in a real-world context. The unit is supported with readings and background information, suggested "building" and energy "generator" cards, and a suggested process to lead students to an understanding of the unit question. This lesson is listed at CT Energy Education www.ctenergyeducation.com



JOIN CTABT Today
to connect with
fellow life science
educators

<http://web.ccsu.edu/ctabt/membership.html>



Lunar Workshops for Educators

June 27–July 1

NASA's Goddard Space Flight Center

NASA's Lunar Reconnaissance Orbiter (LRO) mission is sponsoring a pair of workshops for grade 6–9 science teachers.

Each workshop is a week full of lunar science and exploration, complete with tours, presentations and a lunch with NASA scientists, tons of hands-on activities, pedagogical discussions about how effectively to share lunar science with your students – and more!

The workshops are free, and we have a limited number of \$500 stipends for those who need financial assistance to participate (available on a first-come, first-served basis to those in need).

All pre-service and in-service grade 6–9 science teachers are encouraged to apply! More information about the workshops and a link to the applications are available here: <http://lro.gsfc.nasa.gov/lwe/index.html>

Citizen Science Professional Development for Educators : Are you a formal or informal educator interested in Citizen Science? Learn how to integrate real-life science into your instruction and earn continuing education credits, all from the comfort of your own home! NEON's Citizen Science Academy (CSA) offers online professional development courses for environmental science educators looking for out-of-the-box ways to teach scientific concepts by immersing your students in collecting, using and interpreting scientific data. By implementing citizen science projects, your students will contribute to research used by scientists all over the country. All CSA courses qualify for graduate-level continuing education credits from Colorado School of Mines.

Ready to learn how to incorporate citizen science projects into your classroom? Register for one of our courses starting **April 4th**. Learn more at <http://CitizenScienceAcademy.org/online-courses>. For more information contact: Dennis Ward, dward@neoninc.org, CSA | Course Administrator NEON | Instructional Designer Boulder, Colorado, <http://neoninc.org> <http://CitizenScienceAcademy.org>

Welcome to Research Quest! Developed as a powerful tool for teachers and serious fun for students, Research Quest is an exciting new program created by the Natural History Museum of Utah (NHMU) that leverages our museum's incredible research and collections with 3D and game technologies - every bit as cool as the newest smartphone apps – to support the development of the critical thinking, collaboration, and communication skills found throughout your core curriculum. <http://researchquests.org/> Join our Spring 2016 Pilot Program <http://researchquests.org/contact.shtml>.



A great place to hang out! Hubble Hangouts can also be found on HubbleSite:

http://hubblesite.org/get_involved/hubble_hangouts/

Read up ahead of time – see the News Release here:

<http://hubblesite.org/newscenter/archive/releases/2016/05/>

Can't join us live? View this Hangout and others archived on our YouTube channel: <https://www.youtube.com/user/HubbleSiteChannel>



You can find all our newsletters at the Just ASK a Teacher

website justaskateacher.com/ or you click [HERE](#) to download and print our March 2016 newsletter. We are sharing assessment items for lessons most used by K-6 teachers. Please share your own assessment items with us at matthewscc@umsl.edu and we will include them in our website and in future newsletters. We are especially interested in assessment items that relate to the Next Generation Science Standards. Our next newsletter will highlight assessment items for "Sound."

NGSS is excited to announce that the NGSS website, www.nextgenscience.org, has a brand new look and more levels of utility. The revamped website has a host of new features for parents, teachers, school administrators, and other advocates of the NGSS. To date, 17 states and the District of Columbia have adopted the NGSS as their state science standards. The previous site was created to share information with the public on how the new science standards were being developed.



Citizen Science Focus of Learning Exchange for Environmental Professionals and Educators
Sponsored by Connecticut Outdoor and Environmental Education Association, INC. (COEEA), the Learning Exchange scheduled for April 1 at Goodwin College will focus on The Power of involvement, Understanding Climate Change. Educators and professionals from all

levels and settings are invited to learn how integration of Citizen Science projects helps engage learners and builds understanding of science and conservation methods. A strong agenda of workshops has been developed to introduce, expand knowledge, help apply analysis skills, and set the stage for educators to seek out and use these projects in schools, and public education. We hope to increase not just awareness of the sciences, but engage learners in becoming part of the research teams needed to reduce our impact on living systems and conserve resources for the future.

The keynote speaker, Jennifer Lynn Shirk, is the Manager of CitizenScience.org, Cornell Lab of Ornithology's Department of Program Development and Evaluation. She has years of research experience studying the effects of Citizen Science projects and evaluation of the data. She is a strong promoter of involving the public, any age and ability, in science research and was a key person in the development of the new Citizen Science Tool Box offered by Cornell Ornithology. We are honored that she will be able to join us and hope you take advantage of this inspiring presentation.

Details, agenda and session information for the Learning Exchange may be found on the website for COEEA, www.coeea.org. Please contact susan.quincy@ct.gov 203-734-2513 for any questions or additional information.



PROJECT WET FOR THE YOUNG CHILD:

WHEN: March 28, 2016, 9:00 am – 2:00 pm

WHERE: EarthPlace, 10 Woodside Lane, Westport, CT 06881

USE THE SCIENCE OF WATER TO HELP THE YOUNG CHILD EXPLORE THEIR ENVIRONMENT. MATERIALS PROVIDED AND FEATURE EXTENSIONS FOR AGES 3-7. FOCUS ON SCIENCE, LANGUAGE ARTS

AND MATH SKILLS.

Fee: \$40.00/educator, \$30.00 if multiple registrations from the same center or school. Sponsors



Special musical Performance by Kevin Kopp-

"Water We Know"

Bring your own lunch

Registration required- follow this link

<https://coeearegistration.wufoo.com/forms/workshop-registration/>

Are you a STEM educator interested in plant biology?

Do you want your classroom to connect with world-class researchers?



Would you like to create curriculum based on the latest discoveries in life sciences? Join scientists and educators from across the nation to explore the connections among the plant sciences, agriculture, bioenergy, biotechnology, environment, genetics, and your classroom! The Boyce Thompson Institute's Curriculum Development Projects in Plant Biology program – a

weeklong intensive professional development opportunity for 7-12th grade and community college science teachers and informal science educators - will be held July 18-22, 2016 at BTI, located on Cornell University's campus in beautiful Ithaca, NY. Learn and design new plant-based curriculum that integrates into STEM courses and aligns with NGSS standards.

Curriculum Topics and Projects will include:

- Algae and Biodiesel
- Biotechnology and U.S. Agriculture
- Epigenetics

- Plant-Insect Interactions
- Virus Biology
- Research in the Classroom

Teachers interested in bringing scientific discovery and inquiry-based learning to the classroom are encouraged to apply. Selected teachers will receive access to BTI's Classroom Experiment Kits, Lesson Plans, and Faculty Expertise.

On-campus housing, some meals, a travel award, and stipend will be provided to teachers who successfully complete the program. Up to 70 professional development credit hours can be provided.

Learn more and apply today!
<http://bti.cornell.edu/teachers>

ATTENTION TEACHERS- SCHOOL GROUP VISITS

Friday, March 18, 9:00 am - 2:00 pm
 Tour the Science Fair and See Exciting Physics Demonstrations
 Recreation Center, Quinnipiac University, Hamden

School Groups: Register now at
www.ctsciencefair.org

Register your school for a group visit to the Connecticut State Science Fair on Friday, March 18.

Supplemental Science materials provided to all who register for use during the visit, activities and assessments that can be embedded into any existing curriculum.

Demos R Us physics concepts as well as scientific inquiry analysis and review in the Exhibit

Hall. Spark the 'scientist' in all and leave no-child behind.

- Thursday, 2:00 - 8:00 pm - Public Viewing
 - Friday, 9 am-2 pm, School Groups "A Learning Experience"
 - Friday, 10 and 11:30 am - Physics Demonstrations
 - Friday, 2-8 pm - Public Viewing
- Target grade 6th and higher.**

A limited number of mini-grants for transportation are available, with priority given to urban schools.

PROGRAMS FOR STUDENTS:

UConn's Natural Resources Conservation Academy (NRCA)
<http://nrca.uconn.edu/>). UConn's



NRCA is an exciting program that engages high school students (grades 9 to 11) in natural resource conservation in their local community that is meaningful for the student, complementary to existing science curriculum, and beneficial to our communities and environment. First, students attend a week-long field experience at UConn in July. Afterwards, each student conducts a conservation project under the mentorship of a local conservation leader. Projects culminate in March, when students present their work at the Connecticut Conference on Natural Resources and graduate as "Connecticut Conservation Ambassadors." To date, we have worked with 92 students and 51 community partners on 74 conservation projects. It has been an enriching experience for both students, their partners, and their communities. This year we will be inviting teachers with students attending our program to participate in one of the field experience days as well. If you are interested in sharing this experience with your students, I would love to give a brief presentation (5-8 minutes) and answer questions. If time permits, I can also share a brief activity that we conduct during the NRCA field experience. Please feel free to contact Laura Cisneros via email (laura.cisneros@uconn.edu) or phone (860-486-4917) to discuss the NRCA further.



Eversource and The United Illuminating Company, as partners of the Energize Connecticut initiative, are now accepting entries for the 12th annual eesmart's Student Contest. The contest encourages students to demonstrate their knowledge of energy efficiency, renewable energy and sustainability by responding to grade-specific prompts or assignments. The eesmart's Student Contest is open to Connecticut students in Grades K-12. Additionally, new to the program this year is a college level playwright category entitled "Wright the World," and a new separate 12th grade category. Finalists in all categories and grade levels will be honored at a special awards ceremony on April 29, 2016 at the State Capitol in Hartford. Visit www.eesmart's.com/contest for contest guidelines, contest prompts and submission instructions. Deadline: April 1, 2016

APPLICATION EXTENSION TO March 2, 2016: HIGH SCHOOL SENIORS SOUGHT FOR NATIONAL YOUTH SCIENCE CAMP® HONORS

2016 National Youth Science Camp® Operated by the National Youth Science Foundation® You are invited to nominate Connecticut high school seniors to compete for a full scholarship to attend the 2016 National Youth Science Camp (NYSC). NYSC is a summer residential science education program that creates opportunities for talented high school science students from all 50 states to exchange ideas with working scientists and other scholars from the STEM academic and corporate worlds. This month-long experience in Charleston, West Virginia, will include hands-on research projects with scientists from across the

nation, overnight camping trips to the Monongahela National Forest, and a visit to Washington D.C.! The NYSC experience is offered at no cost to participants since it is supported through contributions to the National Youth Science Foundation®. Educational and recreational programming, as well as meals, lodging, and round-trip air passage on scheduled airlines are provided free of charge to selected delegates.

The selected delegates must demonstrate academic achievement in science and show potential for thoughtful scientific leadership. Please see attached handout and visit www.nysc.org for more information.

Eligibility Requirements

- ☐ Must graduate from high school between July 1, 2015, and June 30, 2016;
- ☐ Must demonstrate superior academic proficiency, including recognition in mathematics and/or the sciences;
- ☐ Must demonstrate an application of leadership abilities and social maturity through involvement in both school and community activities;
- ☐ Must demonstrate skills and achievements outside the realm of science and outside the realm of academic pursuits; and
- ☐ Must demonstrate a curiosity and an eagerness to explore many and varied topics.
- ☐ MUST be able to attend the ENTIRE NYSC program, arriving in Charleston, West Virginia, on Wednesday, June 15, and departing on Sunday, July 10, 2016.

Applications:

- Application forms and additional information are available on the NYSC website at www.nysc.org.
- Completed applications must be received **by March 2, 2016 at 6:00 p.m. EST.**

- Application forms are available on the NYSC website at <http://apply.nysc.org>.

FOR MORE INFORMATION, CONTACT NYSC State Coordinator Dr. Terry Contant at 860-434-4800 ext. 172

Tulane University is pleased to invite bright current 10th and 11th (in addition to exceptional 9th) grade students to take 3-credit college courses during the summer with professors in the School of Science and Engineering. The Tulane Science Scholars Program (TSSP) is selective program for high school students who have exceptional talent in the sciences and mathematics. TSSP is a residential program and students will have the option to live on campus in a dormitory for an additional fee. This year's summer program includes EIGHT courses - Animal Behavior, Chemical Engineering, Computer Science, Computers and Musical Creativity, Electronics, Materials Science and Engineering, Neuroscience, and Psychology.

More detailed information about these courses and how to apply is available at <http://tssp.tulane.edu>. Each of the courses is offered for three hours of Tulane credit (may be transferable to another university) and has a \$1250 fee. Tuition waivers may be available for students demonstrating a high need. A separate additional application is required and will be sent upon request after the normal application has been submitted.

Please see this flyer [Tulane Flyer](#) for additional information. The deadline to apply is **April 1st, 2016** at noon, and students will be notified of acceptance by May 2nd, 2016. <http://tulane.edu/sse/outreach/k12-education.cfm>

I am currently deployed at Palmer Station, Antarctica and I want to invite you and your school (or institution) to follow our outreach website called A Fly on the Pole. Funded by the National Science Foundation, we are studying the largest land animal in Antarctica...any guesses? It's a wingless fly!

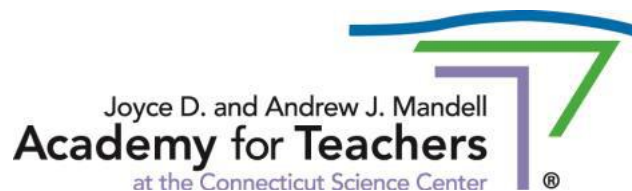


A Fly on the Pole: 2016 Antarctic Research Expedition: Antarctica is a tough place for any critter to make its living. The continent is one of the coldest, driest, and windiest places on Earth. But nestled among the moss and the rocks of the Antarctica Peninsula lives a tough little fly with amazing adaptations. We invite students, teachers, community members, and science

enthusiasts to join us as we travel to Palmer Station, Antarctica to learn more about how Belgica antarctica survives harsh polar conditions. As an educator, I am thrilled for the opportunity to help you and your students connect with this extraordinary experience! I will be updating the blog portion of the website daily - with breathtaking photos, movies, and personal accounts of our Antarctic expedition. There are also a variety of resources on the site for K-12 educators. Please leave a comment on the blog so I know you are following along! There is also a webpage for educators called "Get Connected" to receive "A Fly on the Pole" updates. <http://www.aflyonthepole.com> Natalie Harr Ylizarde, Doctoral Student Teaching, Learning, Policy, and Leadership (TLPL), ylizarde@umd.edu



The Connecticut State Department of Education and the
Connecticut Science Center Partner to Launch First Offerings in a
Next Generation Science Professional Learning System
A Web-Based Introduction to Next Generation Science
Made with CT educators, for CT educators



Next-Gen Science CT is a free, online, self-paced short course that provides K-12 educators with a comprehensive starting point for understanding A Framework for K-12 Science Education and the Next Generation Science Standards. This modular overview course will eventually consist of 15 modules, a total of 20 to 60 hours of professional learning, depending on how deeply PLCs engage with the "Think & Discuss" prompts.

Each module focuses on a specific aspect of Next Generation Science teaching and learning, engaging educators in guided reflection, classroom application, and transition planning. The Moodle-based platform provides opportunities for course takers from across the state to engage in discussion and share ideas and resources.

For the best results, schools and districts are encouraged to form Professional Learning Communities (PLCs) and identify individuals who can be effective facilitators (NGSS expertise is not required). An online matchmaking forum is available for educators seeking to join a "virtual" PLC. Successfully completing all modules will confer an emailed certificate of completion and an electronic badge.

Best for: Teachers of science, teachers of other subjects, school administrators, families, paraprofessionals, special educators and others with an interest in Next Generation science.

Cost: None

Learning hours: 20 to 60

Format: In-person and virtual study groups using web-based professional learning modules

Facilitation: District-selected facilitator(s)

For details and registration, visit the course website at <http://ngss.ccat.us>.


Questions? Contact Nick Balisciano at nbalisciano@ccat.us

NEW MATERIALS AND PROJECTS FROM NASA!

https://www.nasa.gov/audience/for_educators/index.html

HOW TO RECEIVE THIS NEWSLETTER BY BECOMING A POINT OF CONTACT.

We welcome new recipients to NSTA's Science Matters network! Please click on: <http://bap.nsta.org/> and sign up! You will receive information from NSTA and get this State newsletter each month. You can also email me at eloisef302@gmail.com so that I make sure you are on our mailing list. NSTA sends our newsletter to all the recipients on our State list of Points of Contact. Please join us!



What Is Science Matters? Science Matters is an initiative by the National Science Teachers Association (NSTA) to bring content, news, and information that supports quality science education to parents and teachers nationwide. Science Matters builds on the success of the Building a Presence for Science program, first launched in 1997 as an e-networking initiative to assist teachers of science with professional development opportunities. Building a Presence for Science—now Science Matters—reaches readers in 34 states and the District of Columbia. Why does Science Matter? Science is critical to understanding the world around us. Most Americans feel that they received a good education and that their children will as well. Unfortunately, not many are aware that international tests show that American students are simply not performing well in science when compared to students in other countries. Many students (and their parents!) believe that science is irrelevant to their lives. Innovation leads to new products and processes that sustain our economy, and this innovation depends on a solid knowledge base in science, math, and engineering. All jobs of the future will require a basic understanding of math and science. The most recent ten year employment projections by the U.S. Labor Department show that of the 20 fastest growing occupations projected for 2014, 15 of them require significant mathematics or science preparation to successfully compete for a job. This is why Science Matters. Quality learning experiences in the sciences—starting at an early age—are critical to science literacy and our future workforce. Feel free to publish this information in school newsletters and bulletins, and share it with other parents, teachers, and administrators.