



SCIENCE BYTES

MARCH 24, 2009 VOLUME 29

This is an information exchange that is available to all teachers in the Anchorage School District. Please read and then DO it!

In this Issue:

1. **For Your Calendar**
2. **Aviation Motivational Speaker**
3. **Earth Hour 2009 - Invitation**
4. **The Heat from Within**
5. **Science for Alaska Lecture**
6. **Come Test the Waters**
7. **Campbell Creek Nature Guide**
8. **2009 Workshop on Exploring & Using MISR Data**
9. **NASA Kepler Mission**
10. **Vernier Workshops- FREE & In Alaska**
11. **from ANROE Newsletter**
12. **2009 Summer Science Institute**
13. **Free Lancers Wanted to Write Popular EE Articles**
14. **Alaska Science & Engineering Fair Poster**

For your Calendar:

Science Fair 2008 - 2009

Alaska Science and Engineering Fair

March 27-29, 2008 @ [Begich Middle School](#) - Anchorage

Looking for volunteers for the SF Board.

Science Olympiad 2008-09

April 4, 2009 @ Begich Middle School - Anchorage

2009 - Alaska Math & Science Conference

INQUIRY - The Bridge to Understanding

October 14-17, 2009 Juneau, AK

NSTA Conferences 2009-2010

Aviation Motivational Speaker

Jamail Larkins is an Aviation Ambassador who goes to schools and civic groups to inspire young people

to consider careers in aviation. I am attaching a very brief description of Jamail's Dream Launch Tour. You can also visit his website:

<http://www.erau.edu/dreamlaunch/index.htm>

We have an opportunity to bring Jamail to Anchorage - perhaps in conjunction with the Alaska Airmens' Aviation Trade Show May 2-3, 2009. The only expense we have to cover is transportation reimbursement (airfare and lodging). I am putting out feelers to see if you think there would be opportunities for him to speak in your schools. (Scott, I know you are far, far away but if we could find a sponsor to help get him out to Kotzebue I'm sure the students would find him very interesting).

Please let me know as soon as possible if your would be interested in having Jamail speak to your students or group.

Angie Slingluff

Aviation and Space Education Coordinator

FAA Alaska Region AAL-30

907 271-5228

For more information about year-round education and outreach programs offered by the Astrophysics Science Division, visit

<http://astrophysics.gsfc.nasa.gov/outreach/>.

Earth Hour 2009 - Invitation

On Saturday, March 28, 2009, at 8:30 pm, I am taking part in Earth Hour - a global event in which millions of people will turn out their lights to make a statement of concern about our planet and climate change.

I want to invite you to join, too! Sponsored by World Wildlife Fund, Earth Hour got started just two years ago and is now the largest event of its kind in the world. Last year, more than 50 million participated and the lights went out at the Empire State Building, the Golden Gate Bridge, the Sydney Opera House and the Coliseum in Rome, just to name a few. Even Google's homepage went black for the day!

In Israel, President Shimon Peres personally turned off lights in Tel Aviv.

This year, Earth Hour will be even bigger - already 250 cities in 74 countries have agreed to take part including Atlanta, Chicago, Las Vegas, Los Angeles, Miami and Nashville with more signing up every day. Around the world, cities like Moscow, Hong Kong, Mumbai, Shanghai and Mexico City will turn out their lights.

But Earth Hour isn't just for big cities-anyone can participate. To get a better sense of the event, check out this video at

<http://www.youtube.com/watch?v=BjWD8pbK5t8>.

Participating in Earth Hour is easy, fun and free. I hope you will join me for this amazing event.

To sign up, visit <http://www.EarthHourUS.org> where you'll learn more including ways you can spread the word about Earth Hour, plus creative things to do when the lights go out in case you need inspiration!

Please pass this note along to anyone you think might want to take part. Let's all turn out and take action on March 28 at 8:30 pm. www.EarthHourUS.org

Thanks.

Louise Huffman

ANDRILL Coordinator of Education and Outreach

The Heat from Within

Earthly Insights into Planetary Volcanism

A NASA-sponsored field-based workshop, 12-19 July 2009 for intermediate grade level science teachers (other educators are invited)

Spend the week with planetary scientists investigating different types of volcanos in the Bend and Crater Lake regions of Oregon. Contrast these Earth-based analogs with volcanic features on Mars, the Moon, Venus, and even the moons of Jupiter, Saturn, and Neptune! From these field experiences and classroom exercises, participants will build an understanding of the planetary processes that produce volcanos, and the patterns of volcanism on planets in our solar system.

The experience will be divided between the field and lab, where participants work with classroom-tested, hands-on inquiry based activities and resources that can be used to enhance Earth and space science teaching in the classroom. Participants receive lesson plans, supporting resources, and presentations. A limited number of grants are available to cover registration.

Join us for hands-on, real-world experience to enhance your teaching about Earth and space science — and to make connections between these exciting fields of research!

For more information about costs and logistics, and to apply for the experience, please visit:

<http://www.lpi.usra.edu/education/fieldtrips/2009/>

[<http://www.lpi.usra.edu/education/fieldtrips/2009/>](http://www.lpi.usra.edu/education/fieldtrips/2009/)

(if link does not work, please copy and paste URL into your browser)

Applications are due April 7, 2009

Participants will be notified of their acceptance by April 14, 2009.

Science For Alaska Lecture

University of Alaska Fairbanks scientist Scott Rupp will speak March 17 at 7 p.m. at the Loussac Library in the Science for Alaska Lecture Series in Anchorage.

His lecture, "Our New Frontier--Exploring Climate Change," will focus on climate research in Alaska and its worldwide applications.

Science for Alaska lectures are free and open to the public. See <http://www.scienceforalaska.com> [<http://www.scienceforalaska.com/>](http://www.scienceforalaska.com) .

Come Test the Waters

Sign-up for the next CEMP Training!

AWC has a volunteer water quality monitoring program that is the main source for baseline water quality data on local creeks and streams and also serves as the eyes and ears of local waterways in response to pollution events. If you enjoy the outdoors and benefit from the waterways in Anchorage, consider giving back by joining our team of dedicated water quality monitors. Volunteers are an essential component of our program, so come and help us keep the data flowing! The Anchorage Waterways Council will be having a free, two part training session for new volunteers on Thursday April 2nd (5pm-9 pm) and Saturday April 4th (9am-5pm). Attendance on both days is necessary to complete the training and advance registration is required due to space limitations. Please call 27-CREEK and ask for Kate to receive more information or send an email to kate@anchoragecreeks.org.

Campbell Creek Nature Guide

CC Nature Guides are now available at REI. The map/guide is printed on water and tear-resistant paper--perfect for outdoors. It is 11" x 17" and folds down to easily fit into a pocket. The maps cost \$5 each and all proceeds go toward protecting our creeks.

2009 Workshop on Exploring and Using MISR Data

The NASA Langley Atmospheric Science Data Center is sponsoring a free workshop on exploring and using Multi-angle Imaging SpectroRadiometer data. The workshop will take place on April 17, 2009, at the University of Washington in Seattle.

The MISR instrument on NASA's Terra satellite measures aerosols, clouds and land surface characteristics. The workshop is intended for new and experienced MISR data users. Participants will learn about the scientific applications, calibration, geometry and analyses of the MISR measurements. This workshop will also focus on the available data products and tools to view and analyze the data, as well as how to obtain the products. Registration is required before April 2, 2009.

For more information, visit
http://eosweb.larc.nasa.gov/PRODOCS/misr/workshop/current_workshop.html.

Questions about this workshop should be e-mailed to
larc@eos.nasa.gov.

NASA Kepler Mission -- A Search for Habitable Planets Workshop

National Air and Space Museum, Washington, D.C., April 25, 2009

Join Kepler Mission program scientist Dr. Patricia Boyd for an exciting day of science and hands-on activities for middle and high school teachers. This event will take place on April 25, 2009, at the National Air and Space Museum in Washington, D.C. Dr. Boyd will discuss the science behind NASA's Kepler Mission. Participants will take part in standards-based, classroom-ready activities. Each participant will receive a complete transit model that includes a LEGO orrery, a Vernier light sensor, and interface and graphing software. A letter verifying eight hours of professional development can be provided.

Pre-registration is required. To learn more about this workshop, visit
<http://kepler.nasa.gov/ed/workshops.html>. If you have questions about this workshop, please contact Cynthia Ramseyer at cramseyer@seti.org.

Vernier Workshops - FREE & In Alaska

There are free, hands-on Vernier workshops coming to your area, and seats are still available. The workshops will be held at the following dates and times:

Juneau, Alaska Saturday, April 18, 2009
12:00 - 4:00 PM Westmark Baranof-Juneau
Register Online »

<<https://store.vernier.com/workshop/?id=2006>>

Anchorage, Alaska Monday, April 20, 2009
4:00 - 8:00 PM Westmark Anchorage
Register Online »

<<https://store.vernier.com/workshop/?id=2007>>

Fairbanks, Alaska Wednesday, April 22, 2009
4:00 - 8:00 PM Fairbanks Princess Riverside Lodge
Register Online »

<<https://store.vernier.com/workshop/?id=2010>>

Join us for four hours and learn how to integrate our data-collection technology into your chemistry, biology, physics, math, middle school science, physical science, and Earth science curriculum. You will have the opportunity to explore our award-winning sensor interface, the Vernier LabQuest. These free, 4-hour, hands-on workshops include a meal and lab handouts.

For more information and online registration, go to
www.vernier.com/workshop/evaluation.html
<<http://www.vernier.com/workshop/evaluation.html>> or
e-mail us at register@vernier.com.
Brooke Schmitt Workshop Coordinator Vernier Software
& Technology Measure. Analyze. Learn.
13979 SW Millikan Way Beaverton, OR 97005-2886 Toll
Free: (888) 837-6437 www.vernier.com
<<http://www.vernier.com>>

from ANROE Newsletter

Educator Resources:

Climate Change- Connections and Solutions curriculum
This is a two week interdisciplinary unit for grades 6-8.
The lessons build an understanding of climate change and helps students be able to communicate complex issues of climate change.

<http://www.facingthefuture.org/HOME/Curriculum>

Global Warming Resources at National Geographic-

Many global warming resources are featured at this site including some time lapse videos.

<http://www.ecoliteracy.org/programs/sbn/html>

<<http://www.ecoliteracy.org/programs/sbn/html>>

Opportunities:

April 12-18- National Environmental Education Week-
EE week is the largest organized Environmental Education event in the U.S. Register at: <http://eeweek.org/>
<<http://eeweek.org/>>, and receive a free promotional tool kit, monthly e-newsletter, and a coupon for \$10 off at Acorn Naturalists.

Programs:

March 21- Oil Spills, Oceans, and Otters- 20 Years After the Exxon Valdez Oil Spill - Anchorage
10 a.m. to 5 p.m. at the Alaska Zoo's New Gateway Facility. This will include hands-On activities and exhibits for all ages. There will also be a lecture and film series
11 a.m. and 1 p.m.: Lingerin Oil 20 Years After the Spill;
12 noon and 2 p.m.: Killer Whale Recovery; 3 p.m.: Bird Rehabilitation: Then and Now

For more information and the day's schedule, go to:
www.evostc.state.ak.us or call (907) 278- 8012

2009 Summer Science Institute

I am pleased to send to you our 2009 Summer Science Institute flyer and REGISTRATION form for your secondary science teachers. This science content-laden week, from June 15-19, here at the University of Alaska Southeast, will be packed with a wide array of purposeful

and intentional presentations and excursions designed to enhance both the breadth and depth of science knowledge of Alaska's secondary science teachers.

The presentations will be offered by our stellar UAS Science faculty, UAS Education faculty, Science practitioners (members and researchers with the National Weather Service, NOAA, Forest Service, Alaska Fish and Game, etc), Science Naturalists (Discovery Southeast-an outdoor science education organization) and members of the Alaska Department of Education and Early Development, among others.

Participants have an option of attending a two-day science content PRAXIS II "training camp" on the final two days of the Institute, or they can opt for the two days of outdoor science-focus excursions for additional intensive and hands on science studies.

We believe this Institute will provide essential, up to date skills and understanding for your science teachers (grades 8-12) which will rejuvenate and inspire them to bring exciting new information and strategies into your district's classrooms, benefiting all of your students!

Please send this information out to all of your secondary administrators and science teachers as soon as possible. We have received a high level of interest, and want to particularly encourage districts who may have secondary science teachers in need of becoming Highly Qualified, as noted by NCLB, to support their teachers in attending this UAS Summer Science Institute with us in June! We have worked diligently to keep our costs as low as possible to make this event accessible to all.

**Space is limited, so early registration is encouraged.

Questions can be sent to me at

diana.gifford@uas.alaska.edu

Regards,

Diana Gifford, Director
Professional Education Center
University of Alaska Southeast
11120 Glacier Highway
202 Hendrickson Building
Juneau, Alaska 99801
Phone: 907.796.6004
Fax: 907.796.6166

Free Lancers Wanted To Write Popular EE Articles

The Environmental Education and Training Partnership (EETAP) is seeking free lance writers with environmental education experience to write magazine style articles for publication on its web site. Each article will highlight an important area of EETAP's work and extend the storyline to similar efforts by other programs. The

intent of the articles is to inform about trends in environmental education and their significance for the field and its practitioners. The audiences for the articles are formal and non-formal educators who are working to improve learning and increase the environmental literacy of their students and program participants. EETAP will accept proposals for writing one or more articles through April 24, 2009. It's anticipated that contracts will be signed in May 2009 with work to be completed within three-months of the signing date. For additional information please request a complete description from Sharon Courtney (Sharon.Courtney@uwsp.edu).

Alaska Science & Engineering Fair



FULL STEAM AHEAD

Celebrating Science, Technology, Engineering, Aviation, and Math

Open to all Alaska Students K-12
Registration March 27, 2009
Judging and Open to Public March 28, 2009
Awards Ceremony March 29, 2009
Begich Middle School
Anchorage, Alaska

www.alaskasciencefair.org

bp