

NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION
INFORMATION EXCHANGE FOR MARINE EDUCATORS

SEPTEMBER 2011

This update is supported by NOAA's Ocean Exploration and Research Program and the National Marine Protected Areas Center, to share information pertinent to the marine educator community. It is intended to encourage exchange of information and programs. We hope that it will also promote collaboration among the different educators addressing similar issues in their programs.

Please share this email with your colleagues and constituents. If you request materials or respond to a request for information, please mention that you learned about it from NOAA's Information Exchange.

The information included here has been compiled from many different sources, including EE-NEWS@NAAEE, EEinGEORGIA, the Scout Report, scuttlebutt, NSTA Express, and others. We have verified web addresses, but make no guarantee that they will remain active. The Department of Commerce/NOAA does not necessarily endorse or promote the views or facts presented on these sites.

To subscribe to this distribution list, send a blank message to requests@willamette.nos.noaa.gov with "subscribe infoexchange" in the subject field. Similarly, to remove yourself from the list, send the subject "unsubscribe infoexchange".

Collected archives and issues of the newsletter, past and present, are available at <http://mpa.gov/resources/education/#exchange>. Contact the editor directly at phyllis.dermer@noaa.gov, or by phone at (865) 932-5074, to discuss further enhancements or to contribute information for future issues.

Notable Reference

Report on Caribbean MPA Capacity Assessment

The Caribbean Marine Protected Areas Management Network and Forum (CaMPAM) offers the downloadable Caribbean MPA Management Capacity Assessment, with the results of an assessment of management capacity at 27 MPA sites in 10 Caribbean countries and territories. The findings of the report are already forming the basis of a peer-to-peer summit.

<http://campam.gcfi.org/CapAssess/CapacityAssessmentReport2011/index.html>

Science-to-Action Guidebook

The Science-to-Action Guidebook includes two guides in one publication. One guide is intended for scientists, and the other for decision-makers, with practical tips on how to

best bring these worlds together. In doing so, this guidebook emphasizes the roles of facilitating, synthesizing, translating, and communicating science to inform conservation action.

http://www.science2action.org/index.php?option=com_content&view=article&id=159

APP OF THE MONTH

Cachalot iTunes App

Dive in with Duke University's Cachalot app, a free digital textbook designed for students enrolled in Duke's Marine Megafauna class, but free for everyone, everywhere. This mobile app lets anyone using an iPad tablet device access a vast virtual library of videos, photos, maps, audio, and descriptive text about some of the sea's most charismatic creatures. A new species profile will be released every week.

<http://itunes.apple.com/us/app/cachalot/id458866319?mt=8>

WEBSITE OF THE MONTH

Triton and Patterns Projects Webquests

San Diego City Schools developed inquiry-oriented, standards-based curriculum units based on the WebQuest model. The projects are categorized by Featured Projects, Grade-Level Projects, Literature-Based Projects and Ocean-Themed Projects. Each is further divided by grade level. Check out Dive Technology, Inc., Footprints in the Sand, and much more.

<http://projects.edtech.sandi.net/projects/>

REQUESTS

Seeking Contacts – Children of the Spills

Katie Gavenus is working on a project to share the stories of young people who grew up in communities and families affected by oil spills, both in coastal Alaska and the Gulf of Mexico. By empowering young people in oiled communities to share their memories, stories, and childhood artwork, this project strives to both broaden the public understanding of the long-term impacts of oil spills and to assist communities as they work to protect and support their children growing up in the wake of an oil spill. Please contact her if you are interested in learning more about the project, might have possible contacts in the Gulf Coast, or are otherwise interested in helping.

Contact Katie Gavenus at katie.aspen@gmail.com

Seeking Pilot Teachers

EduPERCS (Partnering Educators and Researchers in Collaborative Science) is looking for a few interested teachers to help pilot the EduPERCS initiative. The purpose of the initiative is to get cutting-edge, exciting science to traditionally underserved youth. They are partnering teachers with research scientists. The teams will maintain email contact through the school year, with the scientists sharing their research projects and the teachers sharing what they learn about the projects with their students. Hurry - only a few spots remain for this year.

<http://edupercs.weebly.com/>

Teacher Evaluators Wanted

Grade 9-12 science, technology, engineering, or mathematics (STEM) teachers are invited to participate in an opportunity to help evaluate the effectiveness of a new online graduate course, *Global Climate Change Education for High School*, by serving as a Control Teacher.

<http://gw.vtrenz.net/?STPSIO8WD4>

GRANTS AND OPPORTUNITIES

AFRI NIFA Fellowships Grant Program

The Agriculture and Food Research Initiative of the National Institute of Food and Agriculture Predoctoral and Postdoctoral Fellowship Grant Programs provide awards for outstanding, highly-motivated doctoral and postdoctoral research, education, and/or extension scholars to obtain training in agriculture and food systems, including aquaculture. The deadline for submission is October 5, 2011; see the website for complete details.

<http://www.csrees.usda.gov/fo/afrinifafellowshipsgrantprogram.cfm>

BEN Scholars Program

The National Science Digital Library Biological Sciences Pathway invites undergraduate faculty in the biological sciences to apply to become BiosciEdNet (BEN) Scholars. The goal of the BEN Scholars Program is to promote the use of digital library resources and student-centered teaching and learning methods in higher education, specifically in biological sciences lecture and laboratory courses, and in research training programs. The deadline for application is September 22, 2011.

<http://www.bioscienet.org/portal/about/benScholars.php>

California Whale Tail Grants

The California Coastal Commission's Whale Tail Grants Program is accepting proposals for coastal and marine education projects. The program funds projects that fall into any one of the following categories: Adopt-A-Beach programs; youth programs; or programs for the general public. Emphasis is on reaching underserved students or members of the public. The deadline for application is November 1, 2011.

<http://www.coastal.ca.gov/publiced/plate/plgrant.html>

C-DEBI Request for Education & Outreach Proposals

The Center for Dark Energy Biosphere Investigations (C-DEBI) offers grants to fund research or education and outreach projects on any area of marine deep biosphere topics. Their education and outreach goals include creating distinctive, targeted education programs and promoting increased public awareness about life below the seafloor. The deadline for application is October 31, 2011.

<http://www.darkenergybiosphere.org/education/proposals.html>

Connecting Math to Other Subjects Grants

This grant from the National Council of Teachers of Mathematics funds the creation of classroom materials or lessons connecting mathematics to other fields for grades 9-12. The deadline for application is November 11, 2011.

<http://www.nctm.org/resources/content.aspx?id=1328>

Coral Reef Grants

NOAA's Coral Reef Conservation Grant Program provides matching grants of financial assistance for international coral reef conservation cooperative agreements. The deadline for pre-application is November 18, 2011; final applications are by invitation only. The FY12 Coral Reef Conservation Program Domestic Coral Reef Conservation Grants is intended to support coral reef conservation projects in shallow water coral reef ecosystems, including reefs at mesophotic depths. The deadline for application is November 1, 2011. Check the full proposals for details.

<http://www.grants.gov/search/search.do;jsessionid=vjH0TvbMzRLKh7zNsgP2RmXVnS4rfJNSIX5xDgqvF1NQjymvnGJp!336881473>

Deep-Sea Coral and Sponge Ecosystem Research Initiative

The West Coast and Polar Regions Undersea Research Center and the Deep Sea Coral Research and Technology Program, are partnering to implement a deep-sea coral research initiative for the U.S. West Coast. Pre-proposals are invited for research on deep-sea coral and sponge ecosystems off California, Oregon, and Washington. The deadline for pre-proposals is due October 10, 2011.

http://www.westnurc.uaf.edu/dwnlds/West_Coast_DSC_RFP-Final.pdf

Earth Science Week Contests

The goal of Earth Science Week, October 9-15, 2011, conducted annually by the American Geological Institute in partnership with other sponsors, is to encourage students, educators, and the public to explore the natural world and learn about geosciences; this year's theme is *Our Ever-Changing Earth*. The Earth Science Week 2011 contests include a photography contest - A World of Change in My Community; a visual arts contest - Picturing Our Ever-Changing Earth; and an essay contest - How Change Shapes Our Planet. The deadlines for entry are October 14, 2011.

<http://www.earthsciweek.org/contests/>

EcoChallenge

The EcoChallenge is a Northwest Earth Institute event that demonstrates the collective impact of many people making sustainable changes in their everyday lives. From October 1-15, 2011, participants are challenged to change one habit for the Earth.

<http://www.ecochallenge.org/>

EcoFocus Film Festival Competition

The EcoFocus Film Festival is a celebration of environmental films. Its mission is to screen diverse, high-quality films that promote discussion and inspire audiences into awareness and action on behalf of the environment. Films may be any genre or style, but should somehow relate to the environment. Hurry - the final deadline for entries is September 23, 2011.

<http://www.ecofocusfilmfest.org/>

EPA Environmental Education Grants

EPA's Office of Environmental Education has announced a request for proposals for its 2011 Environmental Education Sub-grants Program with plans to award one agreement in each of its 10 regions. The application deadline is November 8, 2011. Check the website for scheduled conference calls.

<http://www.epa.gov/education/grants.html>

ExploraVision Contest

The Toshiba/NSTA ExploraVision Awards challenge students to use their imaginations and the tools of science to propose scientifically feasible technologies that could exist 20 years into the future. The program encourages K-12 students of all interest, skill, and ability levels to create and explore a vision of future technology by combining their imaginations with the tools of science. The deadline for submission is February 1, 2012.

<http://www.exploravision.org/>

Explore Fund

The North Face Explore Fund grant program supports organizations that encourage youth outdoor participation, focusing primarily on creating more connections between children and nature, increasing access to both front and back country recreation as well as providing education for both personal and environmental health. The deadline for application is October 5, 2011.

<http://www.explorefund.org/>

Gulf of Mexico B-WET Funding Opportunity

The National Marine Fisheries Service Southeast Region seeks proposals under the Gulf of Mexico NOAA Bay-Watershed Education and Training (B-WET) Program. The Gulf of Mexico B-WET program is an environmental education program that promotes locally relevant, experiential learning in the K-12 environment. Funded projects provide meaningful watershed educational experiences for students, related professional development for teachers, and help to support regional education and environmental priorities in the Gulf of Mexico. The deadline for application is October 14, 2011.

<http://sero.nmfs.noaa.gov/grants/B-Wet.htm>

International Photography Contest for Kids

The National Geographic International Photography Contest is accepting photos from kids between the ages of 6 and 14. The categories are: animals, scenery, people and humor. The deadline for entry is October 31, 2011 (Canada and U.S.) and December 22, 2011 (elsewhere – see website for details).

<http://kids.nationalgeographic.com/kids/contests/photo-contest-rules/>

John Muir Conservation Award

The John Muir Association is accepting applications for the John Muir Conservation Award in four categories: Conservationist of the Year, Environmental Education Conservation Award, Nonprofit or Public Agency Conservation Award, and the Business Conservation Award. The deadline for nominations is September 30, 2011.

<http://www.johnmuirassociation.org/php/conserv-award-submitnom.php>

Kids in Need Teacher Grants

Kids In Need Teacher Grants provide K-12 educators with funding to provide learning opportunities for their students through innovative projects. Projects qualify for funding if they make creative use of common teaching aids, approach the curriculum from an imaginative angle, or tie nontraditional concepts together for the purpose of illustrating commonalities. The deadline for application is September 30, 2011.

<http://www.kidsinneed.net/grants/>

Lawrence Foundation Grants

The Lawrence Foundation is a private charitable foundation focused on making charitable contributions and grants to support pressing educational, environmental,

health and other causes. The deadline for a letter of inquiry for the December grant cycle is November 5, 2011.

<http://www.thelawrencefoundation.org>

Marine Debris Funding Opportunity

NOAA's Marine Debris Program offers funding for the Community-based Marine Debris Prevention and Removal Grants Program, supporting locally driven, community-based marine debris prevention and removal projects that benefit coastal habitat, waterways, and wildlife including migratory fish. The deadline for application is November 1, 2011.

<http://www.habitat.noaa.gov/funding/marinedebris.html>

Melinda Gray Ardia Environmental Foundation Grants

K-12 teachers are invited to apply for grants to develop or implement environmental curricula that integrate hands-on ecology exercises into the classroom. To facilitate learning and student empowerment, environmental curricula should be holistic and strive to synthesize multiple levels of learning (facts, concepts, and principles), often including experiential integrated learning and problem solving. The deadline for pre-proposals is September 20, 2011.

<http://www.mgaef.org/grants.html>

Mickelson ExxonMobil Teachers Academy

Nominate a teacher for the 2012 Mickelson ExxonMobil Teachers Academy, an all-expenses-paid professional development program for teachers of grades 3-5, to be held in the summer of 2012 in Jersey City, New Jersey. Participants will learn interactive ways to inspire their students in math and science. The deadline for applications is Oct. 31, 2011.

<http://www.sendmyteacher.com/>

Neotropical Migratory Bird Conservation Grant

The U.S. Neotropical Migratory Bird Conservation Act established a competitive matching grants program to support public/private partnership projects that promote the conservation of neotropical migratory birds and their habitats in the United States, Canada, Latin America, or the Caribbean. Goals include perpetuating healthy populations of these birds, providing financial resources for bird conservation initiatives, and fostering international cooperation for such initiatives. The deadline for application is November 30, 2011.

<http://www.fws.gov/birdhabitat/Grants/NMBCA/index.shtm>

NERRS Graduate Research Fellowship

The National Estuarine Research Reserve System's Graduate Research Fellowship provides master's degree students and Ph.D. candidates with an opportunity to conduct research of local and national significance that focuses on enhancing coastal zone management. Fellows conduct their research within a reserve and gain hands-on experience by participating in their host reserve's research and monitoring programs. The deadline for application is November 1, 2011.

<http://www.nerrs.noaa.gov/Fellowship.aspx>

North American Wetlands Conservation Act Small Grants

The North American Wetlands Conservation Act provides matching small grants to organizations and individuals who have developed partnerships to carry out wetlands

conservation projects in the United States for the benefit of wetlands-associated migratory birds and other wildlife. The deadline for application is October 27, 2011.

<http://www.fws.gov/birdhabitat/Grants/NAWCA/Small/index.shtm>

Ocean in Focus Conservation Photography Contest

Submit your most compelling ocean conservation photos to Marine Photobank. The contest is open to photographers of all skill levels to compete and donate photos illustrating the many human impacts on marine life and marine ecosystems, as well as ways in which people are working to turn the tide on ocean degradation. The deadline for entry is September 30, 2011.

<http://www.marinephotobank.org/resources/OceaninFocusConservationPhotoContest2011.php>

Outdoor Nation Grants

Outdoor Nation is accepting applications from young people ages 18-28 who are interested in connecting other youth with America's natural and cultural heritage through outdoor experiences. The deadline for proposal is October 14, 2011.

<http://www.outdoornation.org/grants>

PolarTREC Researchers

PolarTREC (Teachers and Researchers Exploring and Collaborating) is currently accepting applications from researchers for the sixth year of teacher research experiences. Researchers are invited to submit an application to host a PolarTREC teacher during the 2012 (usually Arctic) or 2012-2013 (usually Antarctic) field seasons. The deadline for application is September 30, 2011.

<http://www.polartrec.com/researchers/application/2012>

PolarTREC Teachers

PolarTREC is accepting applications from teachers for the sixth year of teacher research experiences. Teachers are invited to submit an application to participate in field research learning experiences during the 2012 (usually Arctic) or 2012-2013 (usually Antarctic) field seasons. The deadline for application is September 30, 2011.

<http://www.polartrec.com/teachers/application/2012>

Power a Bright Future

The Clorox Company's Power a Bright Future school grant program gives kids the power to grow and transform through playing, creating, and exploring inside and outside the classroom. The deadline for nomination is October 17, 2011.

http://www.powerabrightfuture.com/?utm_source=Unknown&utm_medium=NSTA&utm_campaign=PABF11

Project Learning Tree Grants

Project Learning Tree is offering two grants, GreenWorks! Grants and GreenSchools! Action Project Grants, for a school/community native plant garden, forest improvement project, streamside restoration plan, recycling program, or energy conservation project for your students. The deadlines for applications are September 30, 2011.

<http://www.plt.org/applyforagrant>

Prudential Spirit of Community Awards

The Prudential Spirit of Community Awards honor young people in grades 5-12 for outstanding volunteer service to their communities. The deadline for application is November 1, 2011.

<http://spirit.prudential.com/view/page/soc>

Recycle-Bowl Competition

This national K-12 recycling competition aims to establish new school recycling programs, increase recycling rates in schools that currently recycle, and provide educational opportunities about recycling and waste reduction. Prizes are available for the school in each state that collects the most recyclable material per capita. The deadline for registration is October 10, 2011.

<http://recycle-bowl.org/>

River of Words Art and Poetry Contest

River of Words is an international environmental poetry and art contest on the theme of watersheds for ages 5-19. The contest is designed nurture respect and understanding of the natural world by helping youth explore the natural and cultural history of the place they live, and to express, through poetry and art, what they discover. The deadline for entry is December 1, 2011 for U.S. entries, and February 1, 2012 for international entries.

<http://www.riverofwords.org/contest.html>

Save the Frogs Art Contest

The Save the Frogs Art Contest invites participants to create cool frog artwork. The contest raises awareness of the amphibian extinction problem. The deadline for entry is October 15, 2011.

<http://www.savethefrogs.com/art/index.html>

Sea the Change Conservation Contest

PADI created the Sea the Change Conservation Contest to help protect the underwater world. This contest lets participants share what fellow ocean lovers are doing to help conserve the ocean by submitting a video, voting on their favorite videos, and sending video links to their friends. The deadline for submission is December 15, 2011.

<http://www.padi.com/scuba/special-offers/sea-the-change/>

Share the Experience Photo Contest

The 2011 Share the Experience photo contest encourages nature enthusiasts, amateur photographers, and others to explore federal recreational lands and share experiences through photos. The deadline for entry is December 31, 2011.

<http://www.sharetheexperience.org/>

Siemens Competition in Math, Science and Technology

This competition encourages students to undertake individual or team research projects that foster intensive research and improves their understanding of the value of scientific study and informs their consideration of future careers in these disciplines. The deadline for submission is October 3, 2011.

<http://siemens.collegeboard.org/>

State Farm Company Grants

State Farm awards grants for safety, community development, and education. The deadline for application is October 7, 2011.

<http://www.statefarm.com/aboutus/community/grants/company/company.asp>

SWS Diversity Program Undergraduate Mentoring Awards

In an effort to aid motivated students considering environmental careers, the Society of Wetland Scientists (SWS) provides NSF-funded opportunities for undergraduate students from underrepresented groups. Students can apply for an award to travel to the 2012 Meeting of the Society of Wetland Scientists at the INTECOL Wetlands Conference July 2-9, 2012 in Orlando, Florida. The deadline for application is November 15, 2011.

<http://www.sws.org/mentoring.mqi>

Target Field Trip Grants

The Target Field Trip Grants Program offers funds to allow teachers to offer valuable experiential learning gained from field trips to enhance students' classroom studies. Funds may be used to cover cost of transportation, entry fees, supplies and equipment, and resource materials. The deadline for application is September 30, 2011.

<http://sites.target.com/site/en/company/page.jsp?contentId=WCMP04-031880>

Travel Opportunities for Educators

A diverse selection of travel and learning opportunities for educators is available for educators. EEinGeorgia offers a short list of travel opportunities on this webpage, with some upcoming deadlines for application.

<http://eeinGeorgia.org/core/item/page.aspx?s=93272.0.0.4863>

CONFERENCES, WORKSHOPS, AND PROFESSIONAL DEVELOPMENT

Boston Harbor Educator's Conference - Massachusetts

The Massachusetts Marine Educators sponsors the Boston Harbor Educator's Conference, October 1, 2011 in Boston, Massachusetts. The conference will focus on how to make the islands an element in classroom lessons through its theme, *National Assets of Boston Harbor and its Islands for Teaching and Learning*.

<http://bostonharborislands.org/event-details?rid=1729>

Coastal Concerns Teacher Workshop - Georgia

Join scientists from Georgia Southern University, the University of Georgia, and the Sapelo Island National Estuarine Research Reserve, November 12, 2011 in Brunswick, Georgia. Learn about their current research relevant to how the Georgia Coast is responding to impacts from estuarine pollution, invasive species, and from rising temperatures and carbon levels in the atmosphere and in the ocean. The deadline for registration is October 25, 2011.

Contact Georgia Graves at georgiabeachwalk@bellsouth.net

Environmental Education Methods – Minnesota

The Prairie Wetlands Learning Center will host OUT8160: Environmental Education Methods, October 18 – 21, 2011 in Fergus Falls, Minnesota. Explore ways environmental education can support your site's mission and the *Connecting People with*

Nature and Youth in the Great Outdoors initiatives. Discover ways to work with the formal and informal education community including schools, youth groups, home-schoolers and more, and develop programs and materials to address resource management objectives and educational community needs.

Contact: Michelle Donlan at Michelle_Donlan@fws.gov

Florida Keys Sea Turtle Workshop - Florida

The Turtle Hospital is once again hosting the annual Florida Keys Sea Turtle Workshop, December 3-4, 2011 in Marathon, Florida. The workshop is open to professionals who work with sea turtles in the medical, rehabilitation, captive, and long term care fields. Registration is required.

Contact Sue Schaf at Turtlehosp@aol.com

Georgia Aquarium Workshops - Georgia

The Georgia Aquarium Education Staff and partners offer a variety of educator workshops. *Why Do We Explore?* will be held October 1, 2011; *Georgia Native Workshop* will be held October 7-8, 2011. The deadlines for registration are September 16 and 30, 2011, respectively (check for late registration possibility).

<http://www.georgiaaquarium.org/education/teachers/professional-development.aspx>

Georgia Shorebirds Conservation Teacher Workshop - Georgia

The Sapelo Island National Estuarine Research Reserve is hosting this teacher workshop December 1-4, 2011 on Sapelo Island, Georgia. The workshop is open to formal and informal educators of all grade levels. Participants will receive curriculum and resource materials. The deadline for registration is November 15, 2011.

<http://eeingeorgia.org/net/calendar/details.aspx?s=54703.0.68.4863&mode=p&c=3526135&p=6286>

International Coral Reef Symposium – Call for Abstracts

The International Coral Reef Symposium, July 9-13, 2012 in Cairns, Australia brings together coral reef scientists, resource managers, educators, and others. The deadline for abstracts is October 1, 2011.

<http://www.icrs2012.com/AbstractSubmission.htm>

Marine Recreation Community Workshop - Texas

National Geographic will offer a free Marine Recreation Community Workshop, November 2, 2011 in Galveston, Texas. One of the goals of National Geographic's Ocean Initiative is to engage and collaborate with the marine recreation community with a shared goal of raising public awareness and inspiring people to help protect the vital natural resources that the ocean provides. The deadline for registration is October 19, 2011. Participants will receive free resources and more.

RSVP with your name, your organization, your contact information, and the total number of people attending to NatGeoRSVPTexas@gmail.com

NAAEE Annual Conference

Register for the North American Association for Environmental Education Annual Conference 2011, *Branching to the Future, Rooted in Time*, October 12-15, 2011 in Raleigh-Durham, North Carolina. Join environmental educators from North America and abroad, take advantage of the field experiences offered, and check out the Research Symposium.

<http://www.naaee.org/conference/>

Reflecting on Practice Professional Development - California

This professional development program specifically designed for informal science educators, December 12-14, 2011 in Berkeley, California, is focused on connecting everyday practice to research and theory on learning and teaching science.

Contact Lynn Tran at lynn.tran@berkeley.edu

Science Education at Sea – New Jersey

This professional development workshop for teachers and environmental educators is presented by The Wetlands Institute and the New Jersey Marine Education Association, October 4, 2011 from Keyport, New Jersey. The workshop includes a boat trip and hands-on activities land activities. The deadline for registration is September 27, 2011.

<http://www.njmarineed.org/education/atsea.html>

STEM Forum & Expo – New Jersey

The first NSTA STEM Forum & Expo, May May 17–19, 2012 in Atlantic City, New Jersey, will bring together STEM experts, practitioners, and educators interested in learning about successful approaches and implementation of STEM education into our schools. Check the website for more information and the call for proposals.

<http://www.nsta.org/conferences/2012atl/?lid=exp>

WETMAAP Workshop -Texas

The University of Houston is hosting a WETMAAP (Wetland Education Through Maps and Aerial Photographs) Workshop, October 8, 2011 in Clear Lake, Texas. They are recruiting teachers who are interested in learning more about wetland changes near the Trinity River, part of the Galveston Bay watershed.

Contact Dr. Jessie Kastler at jessica.kastler@usm.edu

EDUCATIONAL RESOURCES

ARTStem

The focus of this website is on teaching and learning at the intersection of the ARTS, humanities, and the STEM disciplines. The ARTStem partnership was designed to bring together faculty from the University of North Carolina and public school educators to explore the relationship between learning and teaching in the arts and STEM fields.

<http://www.artstem.org/>

Coastal Geotools 2011

At the 2011 Coastal GeoTools conference, coastal professionals shared their geospatial knowledge and experience and developed new partnerships. Presentations are posted on the website.

<http://geotools.csc.noaa.gov/default.aspx>

Communicating Ocean Sciences

Check out this new online resource for scientists and educators committed to improving their knowledge about and ability to communicate science with the public. Information includes professional development opportunities, discussion groups, resources, and much more.

<http://cos-rop.net/>

Coral Connections in the Gulf

Scientists on board NOAA Ship *Nancy Foster* undertook a cruise to the Flower Garden Banks National Marine Sanctuary, August 21-September 2, 2011. Meet the scientists and read the archived logs.

<http://flowergarden.noaa.gov/science/fosterdailylogs2011.html>

Digital Coast Newsletter

NOAA's Digital Coast provides easy access to geospatial data, tools, training, and information used to address coastal resource management issues. Content continues to stream in from a variety of sources, including local, state, and Federal agencies. A quarterly newsletter is now available that provides users with updates on new content and notifications about upcoming webinars and other events. Join the Digital Coast mailing lists, Coastal Connections e-newsletter, and more.

<http://www.csc.noaa.gov/publications/subscriptions.html>

Earth Sciences Resources

Intute: Earth Sciences offers free access to Internet resources for students, researchers, and practitioners in the physical sciences, specifically in astronomy, chemistry, earth sciences, materials science, physics, and general science. Available information includes lecture notes, text book chapters, tutorials, and more. While the website is no longer being updated, it offers links to many useful resources. Categories include Oceanography, glaciology, and more.

<http://www.intute.ac.uk/earthsciences/>

Earth System Monitor

The National Oceanographic Data Center's (NODC) Earth System Monitor will now be published online semi-annually. The free publication reports on NOAA environmental data and information programs, projects, and activities. Visit the website to view online issues or to be automatically notified by RSS feed.

<http://www.nodc.noaa.gov/General/NODCPubs/ESM/esm.html>

Exploring the Hidden World of the Maritime Maya 2011 Expedition

NOAA's Office of Ocean Exploration and Research hosts the webpage, *Exploring the Hidden World of the Maritime Maya 2011 Expedition*. The posting includes daily logs, videos and images, an Ocean Explorer Expedition Education Module, lesson plans, and more. The expedition runs September 13-30, 2011.

<http://oceanexplorer.noaa.gov/explorations/11maya/welcome.html>

Florida Keys National Marine Sanctuary Website Update

The Florida Keys National Marine Sanctuary Website has unveiled a facelift with updated content, functioning links, and ease of navigation.

<http://floridakeys.noaa.gov/>

IOOS Wildlife Data

U.S. Integrated Ocean Observing System (IOOS) wildlife data is now available online, tracking monk seals and sharks. Users can plot monk seal locations, animate movement patterns, and explore how seal movement relates to their physical environment. Additionally, an international team of researchers, conservationists, commercial dive operators and government agencies have joined together to deploy and operate an array of acoustic devices to collect data on shark movement near Palau.

<http://www.soest.hawaii.edu/hioos/map/>

Lessons from the Bay

Lessons from the Bay helps Virginia school teachers of grades 3-6 incorporate into their classrooms a variety of activities and projects related to protecting and restoring the Chesapeake Bay watershed. The website includes a Project Action Guide, downloadable lesson plans, and more.

http://www.doe.virginia.gov/instruction/science/elementary/lessons_bay/index.shtml

Marine Life Encyclopedia

Oceana, the international ocean conversation organization, has launched a searchable marine life encyclopedia with information about more than 500 marine creatures. The content is licensed from an ocean encyclopedia by a leading educational publisher.

Click on the website to explore creatures, places, and science.

<http://na.oceana.org/en/explore>

Meaningful Watershed Educational Experience Resources

The Virginia Department of Environmental Quality hosts Virginia Naturally, with links to many K-12 education resources.

http://www.deq.state.va.us/vanaturally/mwee/mwee_curriculum.html

Mid-Cayman Rise Expedition 2011

The expedition of the NOAA Ship *Okeanos Explorer*, August 5-15, 2011 to the Mid-Cayman Rise south of Grand Cayman Island in the Caribbean highlighted a new model of telepresence-enabled ocean exploration. Most of the expedition scientists were on watch or on call ashore at a network of Exploration Command Centers connected to the ship's sensors, systems, and people in near-real time by satellite and high-speed Internet. Check out the education module, ship's logs, and more.

<http://oceanexplorer.noaa.gov/okeanos/explorations/ex1104/welcome.html>

Mindset List

The Mindset List was created at Beloit College in 1998 to reflect the world view of entering first year students. What started as a witty way of saying to faculty colleagues "watch your references," has turned into a guide to the adolescent consciousness.

Besides its usefulness for teachers needing to make sure they can connect with their students, we can all check this out when we need a reminder that we're getting old.

<http://www.beloit.edu/mindset/>

National Fossil Day Activities

National Fossil Day, October 12, 2011, is a celebration of the United States' rich paleontological resources. Learn about fossils with these activities developed by education specialists in the National Park Service, fossil sites, and various museums.

Check out the art and photo contest, local events, and more.

<http://nature.nps.gov/geology/nationalfossilday/activities.cfm>

<http://nature.nps.gov/geology/nationalfossilday/>

National Ocean Service RSS Feed Library

NOAA's National Ocean Service (NOS) offers a wide variety of RSS feed covering diverse topics. Feeds include news, in-dept overviews of topics ranging from oil spills to global positioning, images, and much more. Podcasts include *Diving Deeper*, *Making Waves*, and more. Check out the extensive list and sign up to get the latest content on subject of interest, and look through the archived information.

<http://oceanservice.noaa.gov/rss.html>

New Project WET Guide

A revised, updated, and expanded Project WET Curriculum and Activity Guide is being released. This revision is driven by emerging water issues, changing educational priorities and reform, new scientific discoveries and breakthroughs, and the availability of information technology and social connectivity. The new Project WET program encompasses the new guide, a portal, expanded resources, and networking opportunities.

<http://www.projectwet.org/>

<http://eeingeorgia.org/resource/about.aspx?s=97800.0.0.4863>

Open Spaces

The U.S. Fish & Wildlife Service has created the Open Spaces blog to showcase some of their wildlife refuges and to offer the general public an inside view of the day-to-day operations. Blog posts profile their work in the Everglades, migratory birds, and more. Entries link to additional materials, including lesson plans and more.

<http://www.fws.gov/news/blog/index.cfm>

PolarTREC Expeditions

Follow along with teachers on Arctic and Antarctic PolarTREC expeditions. The current expedition explores adaptations of marine worms with teacher Michael League from Delaware. Upcoming expeditions will explore winter sampling, human impacts, and much more. Be sure to check out the archives.

<http://www.polartrec.com/expeditions>

R.J. Dunlap Marine Conservation Program Learning Resources for Teachers

The mission of R.J. Dunlap Marine Conservation Program is to foster STEM literacy and advance marine conservation by conducting cutting edge scientific research and involving graduate, undergraduate, and high school students through hands-on field and virtual learning experiences. Resources include curriculum, a virtual expedition tagging expedition, shark tracking, a Digital Atlas of Marine Species & Locations, and more.

<http://www.rjd.miami.edu/learning-tools/>

ROVing the Gulf

Discovery Hall Programs is adding a new class activity to their field trip offerings. The new class, ROVing the Gulf, teaches middle and high school students about technology used by scientists to study the ocean, especially the deep sea. Remotely Operated Vehicles will have a large focus in the class. Students will learn about the physics of water and water movement, some basic design principles, and will then be given the opportunity to build their own ROV. Students will also learn about the Gulf of Mexico and its deepwater habitats, ocean bathymetry and mapping and many aspects of deepsea exploration and research.

<http://dhp.disl.org/k12academic.htm>

Sealtag.org

At Sealtag.org, researchers use high-tech electronic tracking technology for sea lion research. Students can learn more about marine mammals and use their detective skills through Alaska Crime Scene Investigations. Check back soon for a free companion science and engineering curriculum for grades 5-12.

<http://sealtag.org/>

The Scientist Is In – Washington, D.C.

Each week (generally on Wednesday), a marine scientist is stationed in the Sant Ocean Hall at Smithsonian's National Museum of Natural History in Washington, D.C. as part of the *Scientist Is In* program. The scientist-whose job may be to study coral reefs, track hurricanes, or delve into the deep past to understand how our planet's climate has changed over time-spends a couple of hours showing visitors specimens or artifacts and talking about field research, collecting specimens, new discoveries, favorite topics of study, and more. Check out the website for brief biographies of the visiting scientists.
<http://ocean.si.edu/ocean-news/scientist>

Skylight: eTLC Resource Project

This eTLC Resource Project at the University of British Columbia is designed for faculty members interested in improving their teaching. The resources include materials about teaching large classes, promoting feedback in the classroom, promoting cooperation among students, and more. Additional resources include help with eLearning, lesson plans, and suggestions of test and quiz design.
<http://www.skylight.science.ubc.ca/aboutetlc>

Virginia's Water Resources—A Tool for Teachers

This downloadable book offers information and activities for teachers to support interdisciplinary and problem-based teaching about watersheds, water quality, stewardship, and management issues.
<http://www.longwood.edu/cleanva/teachersvawatercurriculum.htm>

INITIATIVES, JOURNALS, and MORE

International Coastal Cleanup

The annual International Coastal Cleanup is September 17, 2011, but events are scheduled at different times in many locations. The largest volunteer effort for the ocean and waterways works towards global solutions through the cumulative efforts of volunteers around the world. Sign up, search for a cleanup near you, download debris reports, and more.
<http://www.oceanconservancy.org/our-work/marine-debris/international-coastal-cleanup-11.html>

National Estuaries Day

National Estuaries Day is September 24, 2011. In honor of the nationwide event, a multitude of activities are planned for the entire family at different National Estuarine Research Reserves, such as guided walks, boat tours, live animal presentations, touch tanks, and more.
<http://estuaries.gov/GetInvolved/Default.aspx?id=526>

Sea Stars

The Discovery Hall at the Dauphin Island Sea Lab offered Sea Stars, a free, three day buddy camp designed for students with special needs and their guardians to explore the Gulf of Mexico. While at the Sea Lab, students and their guardians explored the various coastal habitats of Alabama with marine educators. The weekend included a 2 hour cruise aboard the *RV Alabama Discovery*, the Sea Lab's education vessel.
<http://dhp.disl.org/seastars.html>

Teaching Science

The University of Florida will inaugurate a new online journal for K-12 science teachers in Fall 2011, called *Teaching Science*. The journal will be an open, peer reviewed, free online journal for K-12 teachers devoted to what works in the classroom. All teachers are encouraged to submit an article. Be sure to check the website for new issues.

<http://www.cpet.ufl.edu/TeachingScience/>