New Professional Development Web Offering Launched!

www.nwas.org/committees/professionaldevelopment/

Thanks to the hard work of several people on the National Weather Association Professional Development Committee (PDC), most notably Jordan Gerth, the PDC Web page has received a “make-over” and has recently been launched. Our goal is to make this site a premier stop for any professional development need of every NWA member. The page has been a valuable repository of professional development information, and we hope our efforts better serve NWA members and our customers.

Special attention has been given to bring the professional development Web page to the crisp standards of the remaining NWA web pages. Like the previous pages, the new one contains numerous links to professional development and training activities on a variety of topics for operational meteorologists and hydrologists; however, the new site incorporates a quick way to navigate to your topic of interest instead of merely scrolling down on a page until you find what you want.

On the upgraded pages, not only will you find the training and professional development links, you can find information about conferences, meetings, student presentation awards, and publication opportunities. This information will direct you to the proper NWA organization members to help you achieve your own goals. The main emphasis of the page is to provide a repository of information to help you meet your personal and professional development goals.

While the page received a much needed facelift, this transformation is merely the beginning. One of the PDC goals is to organize the current Web page for maximum usefulness of the NWA membership. We intend to meet this goal by continually updating and enhancing the new Web page by adding appropriate material on an ongoing basis.

Our committee has developed the first attempt at updating the professional development and training links for the NWA membership. We welcome and encourage any suggestions you might have for items to be added to the site. Please contact us directly at PDC@nwas.org. We hope you all make the maximum use of this, YOUR NWA professional development Web page.

Mark Fox
Professional Development Committee

Abstracts for the 34th NWA Meeting: Due June 1

To be considered for this year’s Annual Meeting, abstracts must be submitted to NWA by June 1. They should be sent via the online form on the NWA Web site at: www.nwas.org/2009abstracts.html.

If you are unable to submit your abstract online, contact the NWA headquarters at (919) 845-1546 or e-mail: exdir@nwas.org.
Undergraduate students are encouraged to submit an original paper on meteorological satellite applications. One author will be selected as the winner of a $500 grant and will be invited to present the paper at the 34th NWA Annual Meeting in October. (Award submissions due to NWA June 15.)

The Meteorological Satellite Applications Award Grant was established by the NWA in 1999 to stimulate interest and foster the study and use of satellite remote sensing data in weather analysis and forecasting. The award is sponsored by Frances Holt, a member of and past Chair of the Remote Sensing Committee. Undergraduate students are invited to write an original paper on meteorological satellite applications. Themes of the papers may include original research, case studies, or a survey of applications.

The recipient of the award will receive a grant of $500 and be invited to present their paper at the NWA Annual Meeting. The student must be enrolled as an undergraduate at the time the paper is written and be in good academic standing at the college or university attending. The student also must be a U.S. citizen or hold permanent resident status.

Submission of Papers:
Student papers should not exceed ten (10) pages including photographs and appendices.

Candidate authors should submit:

- Two printed copies of their paper and a copy on CD (preferably in Word with figures in JPEG, as appropriate)
- A letter of application with the paper title, university affiliation and contact information including mailing address, phone and e-mail address
- A letter from the recipient’s Department Head or other faculty member to confirm the student author was an undergraduate when the paper was written and that the student is in good academic standing at the college or university. Additionally, this letter should highlight the original research or contributions the student has made to this paper.

Submissions should be sent by June 15, 2009 to:
National Weather Association
Attn: MetSat Applications Award
3794 Cluny Point
PO Box 342B
Lakeville, NY 14480-0911

Award Flyer:
www.nwas.org/committees/rs/2009_NWA_MetSat_Award_Flyer.pdf

A formal announcement of the award recipient will be made in October at the NWA Annual Meeting in Norfolk, Va. (and earlier to the individual).

Award submissions due to NWA June 15

The NWA’s Three Rivers Chapter held numerous events during the last quarter of 2008. The chapter worked exceptionally hard to prepare for StormFest at the Carnegie Science Center in Pittsburgh, Penn., held January 30-31. For the months leading up to the event, the chapter collected sundry items along with plastic water bottles for use as teaching tools at the event. We also hosted several events in order to build a relationship between new members and old members. On Sept. 12-14, our group went camping in Ohiopyle, and in October a group of people attended Fright Night at Kennywood Park in West Mifflin. To expand our knowledge on internships, presentations have been given at the end of most meetings by students who completed an internship during the summer. Our Meteorology professors set up a Graduate School informational meeting for anyone who may be interested in attending Graduate School after college. Our chapter sponsored a group of students to attend the 2008 NWA Annual Meeting in Louisville, Ky. As a follow-up, student discussed their favorite talk from the meeting and what they learned.

The past few months have been geared to further educational outreach. Monessen Middle School, Neil Armstrong Middle School in Bethel Park and Bentworth Middle School where among some of the schools visited by our members. Caitlin Lawrence, Amber Hill, Lindsey Rice, Kaitlin Thomas, Matt Owens and Emily Zabkar have been largely responsible for the great amount of success that has been achieved these few months.

Our former president, Michael J. Allen, requested to be voted in as an honorary member; the motion passed. The Three Rivers Chapter has also been participating in “The Weather Challenge”, a forecasting competition across the country. This event has started and will be continuing for the rest of the year.

Due to our Historian Nicole Persons graduating at the end of this semester, elections to find a replacement were held, and Brittany Petrarca was elected. The chapter agreed to sponsor four people to attend the American Meteorological Society (AMS) conference in January. After going through an application process, those selected were Kyle Olmstead, Ryan LaQuay, Travis Michels and Brittany Petrarca, all who had a very positive experience and came back to share with the Chapter what they learned.

To end the semester, the annual winter banquet was held at Rye’s Restaurant. Everyone had a great experience, and it was great for the upper and underclassmen to start building close friendships. We said good-bye to our graduating seniors, Nicole Persons and former President Jonathan Jennings.
I had the opportunity and privilege to serve as team leader for the “Super Tuesday” Tornado Outbreak of February 5-6, 2008 Service Assessment (SA). Although I had been a member on three SA teams before, this was my first opportunity as team leader. There were ten other very talented individuals on the team that made the field work and subsequent report drafting process very productive. Service assessments are conducted by the National Weather Service (NWS) to evaluate performance and to ensure the effectiveness of its products and services. The goal is to improve the ability of the NWS to protect life and property through recommendations and best practices. This SA also examined the societal impacts (SI) as a primary focus given the 57 deaths that occurred.

The event was of historic proportions, consisting of 87 tornadoes across nine states (five rated EF-4 on the enhanced Fujita Scale) with tornado fatalities recorded in four states: Tennessee (31), Arkansas (14), Kentucky (7) and Alabama (5). This was the largest tornado outbreak in terms of death toll since the May 31, 1985, outbreak across the upper Ohio Valley. Overall, the services provided by the NWS were excellent. Sixteen recommendations were made based on the team’s findings and eight best practices identified. The full SA report can be found at:

www.weather.gov/os/assessments/index.shtml

I am using the rest of this article to address some concerns that were only reinforced after completing the investigation for this assessment. The southeast U.S. is extremely vulnerable to significant tornadoes despite being outside of what most would consider “tornado alley.” There is no well-defined tornado season in this part of the country with a threat beginning in the fall and continuing through the spring. This requires people to remain vigilant for an extended period of time. Tornadoes in the cool season often move very rapidly, and due to the higher moisture content in the Southeast, are at times embedded in rain. Further, the diurnal cycle of tornadoes is much less pronounced in the Southeast compared to the Plains with nighttime tornadoes relatively common. All of these factors contribute to a potentially deadly scenario, especially when one considers the nearly complete absence of below ground shelters and the poor construction quality of many homes in the Southeast.

The team’s societal impacts analysis revealed that over 80 percent of the victims in the Super Tuesday event did not have access to a below ground shelter or hardened safe room. The team also found evidence that people often sought additional sources of information when a warning was issued before seeking shelter, and some depersonalized the risk to themselves (i.e., it won’t happen to me). Obviously, this only increases the potential danger of significant tornado outbreaks.

With both the meteorological and societal impacts factors weighted toward a continuation of significant death tolls in tornado outbreaks across this part of the country, the meteorological community needs to rise to the occasion and find ways to help mitigate the risk. The NWA must play its part. We have taken our first step with the council approving a Societal Impacts Committee and Kevin Barjenbruch as the chair. The committee terms of reference document is as follows.

### NWA Committee on Societal Impacts of Weather and Climate

**Terms of Reference:**
2/18/2009

**Vision:**
Integrating the application of social science into operational meteorology where an enhanced understanding of the societal impacts of weather and climate facilitates improved decision making processes.

**Mission:**
- To advise and serve the NWA in matters related to societal impacts of weather and climate;
- To raise awareness, encourage and support efforts within the NWA relating to societal impacts of weather and climate;
- To support the application of social science principles into operational meteorology and decision support for hazardous weather and high impact events, as well as day-to-day forecasting and operations; and
- To develop and strengthen relationships between social scientists, operational meteorologists, and decision makers, particularly those responsible for public safety.

The Committee will achieve its mission by:
- Participating in the NWA Annual Meeting and other NWA sponsored or co-sponsored conferences and workshops to share recent research and applications and enhance dialogue about societal impacts of weather and climate.
- Engaging in educational activities concerning the societal impacts of weather and climate and its application to decision making processes.
- Interacting with and serving as a resource for other NWA Committees regarding activities and initiatives that involve societal impacts. For example, this could include: design, implementation and analysis of surveys; development of conference sessions, Web page content, and outreach projects and materials.
- Facilitating partnerships between the operational meteorology and social science communities (including multi-disciplinary groups such as WAS*IS) to advance applied research on the societal impacts of weather and climate and the application to hydrometeorological forecasting and decision support.
- Providing advice, information and policy statements to the NWA Council on matters concerning societal impacts of weather and climate.

I ask all of you to think about this problem over the coming months. If you have an idea on how the NWA may be an advocate for tornado safety please contact me at president@nwas.org, or submit an abstract for our upcoming annual meeting in Norfolk this October.

Next month I will revisit another historic event, the May 3, 1999 Oklahoma City area tornado. I will take you through some of my thoughts as I worked that night at the Storm Prediction Center and discuss some of the advancements we have made ten years later.

Michael Vescio
NWA President
Student Professional Development Needs

Seven years ago I was a high school senior finalizing my college decision. My plan was to follow my lifelong dream and become a meteorologist. I knew it would take a lot of hard work and many difficult classes. What I hadn’t thought about was how hard I would have to work both inside and outside the classroom to separate myself from others in the field. I figured things would just fall into place.

Believing things will fall into place is not a bad thing; however, you must also place yourself in a position to allow these opportunities to cross your path. “Positioning Yourself for Success” is the presentation title often used by Dr. Sundar Christopher (Professor at the University of Alabama in Huntsville, www.nwas.org/committees/professionaldevelopment/christopher_pyfs.pdf) for talks with students. By preparing yourself for your career, opportunities to further advance your knowledge and skill in your chosen specialty will begin to come your way.

As you begin your career, networking with those in the field is vital. Assuming you’re in a meteorology or related science field at a university, your first networking opportunity is probably with classmates and upperclassman. Getting involved with a local meteorology chapter is a great way to begin. It is also useful to get to know your faculty. Share your career goals with them; you never know when they may come across an opportunity that is right up your alley. Consider volunteering at the local emergency management office or Red Cross … consider joining Toastmasters to improve your communication skills.

The next step in networking is to get to know the meteorologists in the area; visit the local National Weather Service office, television station or private company; attend local or national conferences where there are meteorologists at various stages in their careers. Don’t hesitate to start a conversation with other students or professionals; you never know what could become of that small extra effort.

Having a mentor to guide, inspire, encourage and advise you is also beneficial. A mentor offers an outstanding resource for discussing career decisions: they have been in your position before and can provide valuable feedback and guidance.

Finally, the key to your professional development is your ability to effectively communicate. Whether writing an email or a journal article, written communication may often be the first impression you leave on others in the field. However, these skills go far beyond traditional written and verbal communication methods. It is estimated that over 70 percent of human interaction is through non-verbal communication cues, such as how you dress, whether or not you make eye contact, a firm handshake, or whether or not you project confidence with your posture, and such “intangible” communication skills, can be critical to your success.

Remember that professional development is an ongoing process throughout your career, and ultimately, it is up to you to take the initiative. When you land your dream job with the help of a contact you made or an opportunity you participated in, you can take pride in knowing that you pushed to go the extra mile.

Elise Johnson
Professional Development Committee

2008 Membership Survey Results

Compiled by Cynthia A. Nelson, Asst. Executive Director

Thanks to all of the members who participated in the 2008 survey. About 38 percent (1069 members) responded to the questions that were included in the annual dues statement.

Following are results of some of the questions. Other survey results were published in the February Newsletter.

SURVEY QUESTION: Help NWA plan/prioritize objectives for the next two years. Rate the importance of the following objectives on a scale of 1 (lowest) to 10 (highest):

1. Promote the benefits of quality and timely weather support services.
2. Champion partnerships between the public, academic and private sectors of the meteorological community.
3. Advocate for NOAA to be fully funded to insure the best possible data/information is available to support all users.
4. Promote the need for continual modernization of all weather equipment, products, data, and services.
5. Promote the need for more research.
6. Encourage faster transition of research results into operational use.
7. Underwrite more student scholarships.
8. Sponsor more teacher grants.
9. Increase membership from 3,000 to 4,000 by 2010.
10. Develop more advocacy statements on issues related to NWA mission and Objectives.
11. Increase the visibility and respectability of the NWA Broadcaster Seal of Approval.

The graph above shows the results of the survey for this question and were obtained by using a weighted average. The number of times each objective received a specific rating from 1 to 10 was multiplied by the specific rating score. Results were summed for each objective and dividing by 10 (total number of ratings). The weighted average of each objective was then used to prioritize the objectives from lowest (1) to highest (11) as displayed on the chart.

Elise Johnson
Professional Development Committee

NWA PRIORITY OF OBJECTIVES
TOTAL # RESPONSES = 7108

<table>
<thead>
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<th>OBJECTIVES (Refer to text)</th>
<th>11</th>
<th>10</th>
<th>9</th>
<th>8</th>
<th>7</th>
<th>6</th>
<th>5</th>
<th>4</th>
<th>3</th>
<th>2</th>
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<td>5</td>
<td>4</td>
<td>3</td>
<td>2</td>
<td>1</td>
</tr>
</tbody>
</table>

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The Sixth GOES Users’ Conference, “Bringing Environmental Benefits to a Society of Users,” will be held Nov. 3-5 at the Monona Terrace Convention Center in Madison, Wisc.

GOES-R, planned for launch in 2015, will provide critical atmospheric, oceanic, climatic, solar, and space data. The new satellites will provide the user community with significantly more data, with noteworthy improvements in temporal and spatial resolutions.

The focus of the first couple of GOES Users’ Conferences was on requirements for instruments and observational capabilities, which provided valuable feedback and significant improvements to the GOES-R instruments. Recent conferences have attracted around 350 participants from government, the private sector, academia and the international community, and the focus has shifted to ensuring user readiness for the substantial changes with the GOES-R Series. For this reason we are encouraging participation of operational weather forecasters, NWS Science and Operation Officers (SOO)s and others responsible for training operational forecasters.

To ensure user readiness, the recent GOES Users’ Conferences have provided recommendations on: 1) the use of proxy and simulated data sets to test and validate processing and distribution systems; 2) provision of test data sets well in advance of operations; 3) leveraging NPP and NPOESS synergy and experience; 4) need to develop new or improved products including decision aids before launch; 5) data and product archiving; 6) the critical need for user education; 7) development of a GOES-R Proving Ground to expose forecasters to GOES-R like products and to allow for user feedback; 8) keeping the lines of communication open between developers and the user communities.

Abstracts and corresponding posters are solicited for this conference on both current and future GOES. This includes topics pertaining to instruments, heritage instruments, products and applications and user readiness. Of special interest are posters describing examples of the links between research and operations. Submit your poster abstract electronically by Oct. 16, 2009.

As an added attraction for the GOES Conference, the 50 year anniversary of the first meteorological satellite experiment (on Explorer VII) will be commemorated on Monday November 2. The program will begin at 5 p.m. and will consist of presentations, followed by a reception at the Monona Terrace. The experiment, flown on Explorer VII, measured the radiative energy balance of Earth. The architects of the radiometer were the University of Wisconsin’s V. Suomi and R. Parent. There will also be opportunities for tours of the Space Sciences and Engineering Center at the University of Wisconsin and to get demonstrations on the capabilities of McIDAS V.

James Gurka of NOAA/NESDIS e-mail: james.gurka@noaa.gov

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SURVEY DEMOGRAPHICS

Gender numbers and trends, job demographics for members and the location of NWA members were derived from the 2008 membership database.

SURVEY QUESTION: Your Highest Level of Education Completed: High School, Associate’s, Bachelor’s, Master’s, Doctorate. Results at right.

Survey results continued on page 6

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EDUCATION LEVEL OF MEMBER RESPONDERS

(TOTAL RESPONDERS = 855)

<table>
<thead>
<tr>
<th>Education Level</th>
<th>Number of Respondents</th>
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</thead>
<tbody>
<tr>
<td>High School</td>
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<tr>
<td>Associate’s</td>
<td>150</td>
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<tr>
<td>Bachelor’s</td>
<td>200</td>
</tr>
<tr>
<td>Master’s</td>
<td>100</td>
</tr>
<tr>
<td>Doctorate</td>
<td>55</td>
</tr>
</tbody>
</table>
Survey results, continued from page 5

MEMBERSHIP INFORMATION:
Your Age:

- <20
- 20-29
- 30-39
- 40-49
- 50-59
- 60-69
- 70-79
- >80

Your Gender:
(Numbers as of December 2008)

- Male (2379)
- Female (543)

Your Current Primary Area(s) of Expertise: (please pick three or less)
1. Agricultural meteorology
2. Air quality meteorology
3. Aviation meteorology
4. Broadcast meteorology
5. Climatology
6. Consulting
7. Educating/Training
8. Engineering
9. Fire weather
10. Hydrology
11. Lightning
12. Management
13. Marketing products
14. Marine/Operational Oceanography
15. Numerical Weather Prediction
16. Radar meteorology
17. Research (basic or applied)
18. Road Weather Information Systems
19. Satellite meteorology
20. Severe local storms
21. Student services
22. Tropical meteorology
23. Weather analysis and forecasting
Expanding Knowledge on Low-Earth Orbit, GEO Satellites

The Cooperative Program for Operational Meteorology, Education and Training (COMET) has announced the publication of the Environmental Satellite Resource Center (ESRC) on the COMET/MetEd Web site. This new community-driven Web site helps users find trusted and pertinent satellite information via three different search options. The ESRC includes resources about low-Earth orbit (LEO) and geostationary Earth orbit (GEO) environmental satellites, satellite systems and applications, data products, cases and examples, and education and training resources. This site is designed to cover all levels of users, from the general public to technical experts. The initial release already contains many submissions, including access to both full COMET modules and individual learning objects for quick access. Additionally, if you are aware of a resource that is relevant to ESRC and you would like to make it more visible to a large audience; you can submit it by following the “submit a resource” tab on the Web site. We strongly encourage additional submissions so that the site’s utility can be fully realized. Please follow this link to start searching and/or to submit a resource: www.meted.ucar.edu/esrc.

The ESRC has been developed thanks to the support of NPOESS Integrated Program Office (IPO) and NOAA/NESDIS and is maintained by the COMET Program. ESRC is supported in the latest releases of Internet Explorer and Mozilla Firefox. We welcome any comments or questions you may have regarding the use of this site. Please e-mail your comments or questions to the ESRC team (esrc@comet.ucar.edu). For Technical Support for the ESRC Web site please e-mail: support@comet.ucar.edu.

Wendy Schreiber-Abshire
COMET Senior Project Manager and NWA Councilor

Professional Development Opportunities in 2009

23rd AMS Conference on Weather Analysis and Forecasting/19th AMS Conference on Numerical Weather Prediction: June 1 – 5
These will be held in Omaha, Neb., and are jointly sponsored by the AMS and the NWA, and organized by the AMS Committee on Weather Analysis and Forecasting with assistance from the NWA Committee on Weather Analysis and Forecasting. Visit www.ametsoc.org/MEET/ann/callforpapers.html for the Call for Papers.

Inland Impacts of Tropical Cyclones Conference: June 10 – 12
The Conference, hosted by the Metro Atlanta NWA/AMS Chapter, will be held at the Westin Peachtree Plaza in Atlanta, Ga. Oral presentations are solicited around the broad theme of the inland impacts of tropical cyclones. Please submit abstracts electronically to the science committee chairperson: Rob Handel at robert.handel@noaa.gov. For further information contact the program chairperson: Trisha Palmer (trisha.palmer@noaa.gov) or visit Web site for details: www.ametsoc.org/chapters/atlanta/iitc.htm.

34th NWA Annual Meeting: October 17 – 22 (see details to the right)

6th GOES Users’ Conference: November 3 – 5
“Bringing Environmental Benefits to a Society of Users” will be held Nov. 3 – 5 at the Monona Terrace Convention Center in Madison, Wis. Organized by NOAA with support from CIMSS at the University of Wisconsin-Madison. Details are online at: http://cimss.ssec.wisc.edu/goes_r/meetings/guc2009. Also see page 5 for more.
Attention Students: NWA Scholarships Deadline is Next Month

The application closing date for both the AccuWeather Undergraduate Scholarship and the Dr. Roderick A. Scofield Scholarship is May 15.

Log on to the NWA Website for details on all NWA scholarships.

www.nwas.org/committees/ed_comm/application/index.php

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University of Missouri AMS and NWA Meteorology Club Meeting

The University of Missouri AMS and NWA Meteorology Club meeting on March 4 began with Erin Little from KMBC-TV in Kansas City giving a presentation explaining how she started her career in broadcast meteorology. Officer reports were given after the presentation and officer applications for next year were handed out. Other topics discussed were the Severe Weather Workshop sponsored by the Campus Weather Service that is planned for the first week in April and the Annual Spring Swing softball tournament. Meteorology Club Banquet R.S.V.P. cards were handed out for the April 23 event. Students who have received internships and scholarships will be recognized at the banquet, and the new chapter officers will be announced. The meeting concluded with members voting for the Meteorology Club t-shirt design.

Natalie Walters
Meteorology Club Secretary

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Dates 2 Remember

May 15: Rod Scofield and AccuWeather Scholarship applications due (see above).

June 1: Deadline for October Annual Meeting abstracts


July 1: Deadline for NWA Annual Award nominations


See page 7 or www.nwas.org/events.php for details on these and additional Professional Development Opportunities!