



# UNITED STATES DEPARTMENT OF COMMERCE NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION NATIONAL WEATHER SERVICE Fort Worth, Texas

October 2006

# **SOUTHERN TOPICS**

Working Together To Save Lives

**Southern Region Home page Previous Topics** 

#### **RECOGNITION**

#### **Department of Commerce Gold Medal**

#### Weather Forecast Office Jackson, Mississippi

The NWS Forecast Office, Jackson, Mississippi, is recognized for issuing warnings an average of 25 minutes in advance for 14 tornadoes on April 6, 2005. The office used innovative technology such as instant messaging to enhance communication of critical weather data with the media and emergency management. The life-saving results were best seen at a school complex where an F3 tornado destroyed the second story and several portable classroom buildings. Advanced warning information enabled the school's staff to implement protective measures for the 700 people at the school, resulting in no injuries.

# Weather Forecast Office Baton Rouge/New Orleans, Louisiana Weather Forecast Office Mobile, Alabama Lower Mississippi River Forecast Center

The organizations are recognized for their high quality, timely, and definitive warnings during the approach and landfall of Hurricane Katrina. During the event, the staffs remained on duty issuing critical life saving services to emergency management, media, and the public while high winds, flooding, and damage were occurring in the vicinity of all three offices. During the recovery period, despite horrific damage to the area, and under tremendous personal stress to care for families and sometimes unlivable homes, staffs persevered in providing critical services for recovery efforts.



#### NATIONAL WEATHER ASSOCIATION ANNUAL AWARDS

# Operational Achievement Individual Award Robert Ricks, Weather Forecast Office Baton Rouge/New Orleans

"For issuing a warning with unprecedented catastrophic wording a day before devastating Hurricane Katrina made landfall; this warning was recognized worldwide and helped save untold lives."

# Operational Achievement Group Award Baton Rouge/New Orleans, Mobile, Birmingham, Jackson, and Huntsville Weather Forecast Offices; and the Regional Operations Center at Southern Region Headquarters in Fort Worth

"For providing outstanding weather services to the central Gulf region before, during, and after devastating Hurricane Katrina and its unprecedented challenges."

# Public Education Award Kandis Boyd, Dennis Cain, Steven Cooper, Hector Guerrero, Ron Trumbla, and Ben Weiger.

"For 'Turn Around Don't Drown'"

#### **Aviation Meteorology Award**

Newton Skiles, Chris Buoanano and Paul Iniguez, Weather Forecast Office Little Rock "Fostering improved aviation forecasting and services for the Arkansas aviation community by strengthening partnerships, providing weather safety education, and developing local applied research."

#### CLIMATE, WATER AND WEATHER DIVISION

#### METEOROLOGICAL SERVICES BRANCH

**Backup Reminder.** The Southern Region Backup Supplement has been reviewed and signed and is now available on the National Directives Website at this link:

http://www.nws.noaa.gov/directives/sym/pd01022001s012004curr.pdf

Backup may be one of the least glamorous topics there is. However, because it's infrequent and can occur during a critical weather situation, it's important that we ensure proper coverage in drills, SDM reviews, and AWIPS installs/backup operations. See more information on the SR Intranet Backup website: <a href="http://lucretia.srh.noaa.gov/srh/backup.html">http://lucretia.srh.noaa.gov/srh/backup.html</a>

**PMO** Helps Deploy Prototype Buoys in the Gulf. The Port Meteorological Officer out of the New Orleans WFO, Paula Campbell, had the opportunity to be part of an interagency collaborative effort between the National Data Buoy Center (NDBC), NOAA Fisheries Service, NOAA Marine and Aviation Operations, and the National Weather Service. Together, they joined forces to deploy two



prototype Tropical Atmosphere-Ocean (TAO) buoy array systems in the central Gulf of Mexico, about 60 miles south of the Alabama and Mississippi border.

The development of the Tropical Atmosphere-Ocean (TAO) buoy array was motivated by the 1982-1983 El Niño events. The events proved the need for real-time in-situ data from the tropical Pacific for monitoring, prediction, and improved understanding of El Niño. As much of the existing technology on the TAO is approaching 10 years of age, an increasing number of components are no longer manufactured or supported. To ensure ongoing continuity of the TAO array in the near term, it was decided to "refresh" the TAO system by replacing the obsolete components. The buoys that were deployed in the Gulf of Mexico are prototypes.

The crew of the NOAA Ship *Gordon Gunter*, under the command of Commander James Meigs, NOAA Corps, and Paula Campbell helped with the deployment of the two TAO buoys. By the mid-afternoon on the 29th, both TAO buoys were successfully deployed, in working condition and properly transmitting data!

**Sept 10, 2006 Earthquake Summary.** A 5.9 magnitude earthquake occurred on Sept 10, 2006 in the Gulf of Mexico. Numerous people felt the earthquake from Florida, Alabama, Georgia and South Carolina. Read a summary of the WFO services here:

http://lucretia.srh.noaa.gov/srh/marine/Sept10 2006GulfEarthquakeEmail.html

**Persistence Pays Off for Pecos**. Since September 4, 2001, WFO Midland and the Reeves County Office of Emergency Management have partnered to establish an NWR station at Pecos in far west Texas. Nestled in Reeves County, the small community of Saragosa, Texas was devastated by a violent multiple-vortex tornado on May 22, 1987. Of the 183 inhabitants who lived there at the time, 30 were killed and 121 injured. In April 2004, the city of Pecos was the site of massive floods where parts of Interstate 20 were washed out and a number of fatalities occurred.

Motivated by these devastating events, MIC Ray Fagen, WCM Pat Vesper, and Emergency Manager Ricky Herrera have made great strides to increase weather awareness in this rural part of west Texas. Their team effort to obtain grant funds from the USDA – Rural Utilities Service and their support of the logistical requirements to establish a NOAA Weather Radio All Hazards (NWR) station have borne fruit. On October 3rd, Regional Maintenance Specialist Phil Shideler brought the 1000 watt NWR station WNG-695 to the air waves. It now provides Reeves and surrounding counties with broadcast audio of warning, forecasts and statements originating from WFO Midland on a frequency of 162.450 mHz.

**Deer Hunters Tune to New Antlers NWR station.** All outdoor enthusiasts and residents of Pushmataha and surrounding counties in southeast Oklahoma can now tune to the Antlers, Oklahoma NWR station KJY-77. Since September 6, 2001, the city of Antlers Emergency Manager Don Talley, City Manager Joel Taylor, MIC Steve Piltz, and WFO Tulsa WCM Ed Calianese have anticipated the arrival of grant funds from the USDA – Rural Utilities Service to establish this new NWR station. The city of Antlers graciously provided both antenna tower space and floor space in a building they erected. The 300 watt station was brought on-air by Regional Maintenance Specialist Jim McDaniel on September 26th and it will operate on a frequency of 162.400 mHz with broadcast audio originating from WFO Tulsa.



Eight Times A Charm for LCRA. The Lower Colorado River Authority (LCRA) has now partnered with the NWS for the 8th time to establish an NWR station at one of its tower sites in the state of Texas. New Taiton, Texas station KJY-79, located in southeast Texas, joins a family of NWR stations already established at LCRA tower facilities located at Bay City, Gonzales, Kerrville, Kingsbury, LaGrange, Llano, and Richland Springs. This 1000 watt station was brought on-air October 5th by Regional Maintenance Specialist Terry Hempen and will operate on a frequency of 162.450 mHz. Broadcast audio of WFO Houston, TX statements and warnings will emphasize impacts on Wharton and surrounding counties in southeast Texas.

KICK Provides Winning Goal for Mississippi Radio Expansion. A special Media Day event has been scheduled by the Leake County, Mississippi Emergency Management and WFO Jackson to commemorate the unveiling of a NOAA Weather Radio All Hazards station at the Boswell Media KICK FM 98 tower in Carthage, Mississippi. MIC Alan Gerard and former WCM Jim Butch supported Leake County Emergency Management Director Tommy Malone's appeal for federal assistance through Senator Thad Cochran, Chairman Senate Committee on Appropriations, for this project. NWR station KJY-83, brought on-air by Regional Maintenance Specialist Larry Tennison, enables citizens in Attala, Holmes, Leake, Madison, Neshoba, and northeast Rankin to receive weather alerts in a previously void area of central Mississippi. This dual 1000 watt station will operate on a frequency of 162.500 mHz with broadcast audio originating from WFO Jackson, Mississippi.

Meteorology 101 for Broadcasters. WFO Austin San Antonio WCM Larry Eblen recently took part in a "Weather and Electricity: Do They Mix?" workshop at the Texas Association of Broadcasters / Society of Broadcast Engineers State Conference. Larry began the workshop with an overview of the most common weather hazards in Texas - heat waves, floods, tornadoes and severe storms, lightning, winter storms, and tropical storms. He discussed the annual/diurnal variation and typical life cycle of each threat and suggested ways to be better prepared for the hazard. The second part of his talk centered on short-term and long-term weather planning, emphasizing the high resolution NWS digital products as well as outlook products by NCDC, NCEP and CPC. His co-presenter, Kent Saathoff of the Electric Reliability Council of Texas (ERCOT), took the background on weather and showed how this information is used to determine daily energy generation figures.

Lubbock Collaborates with Multi-Agency Partners to Benefit Students. WFO Lubbock participated in the 2006 South Plains Tech Prep Career Expo at the Lubbock Civic Center on October 11, 2006. The Tech Prep is a college preparatory program of study that provides high school students a jump-start on a career by earning college credit toward an associates degree or certificate. The South Plains Tech Prep Career Expo is a fun event for regional partners to work side-by-side in challenging students to plan for their future.

As one of over 150 exhibitors from across the region, Lubbock Senior Forecaster Jody James, Meteorologist Intern Felecia Bowser, and WCM Brian LaMarre interacted with students from 52 high schools across west Texas – covering the majority of the Lubbock CWA. A total of 3,504 students attended the event to learn of diverse career opportunities available to them and network with exhibitors from both the public and private sectors. The Career Expo afforded the WFO a unique blend of interactions, said WFO Lubbock WCM Brian LaMarre, "not only were we able to ignite the interest of many future NWS employees, but we were also able to have a strong presence in the local community and interact with partners and customers of our own services."





WFO Lubbock Senior Forecaster Jody James and Meteorologist Intern Felecia Bowser interact with a student interested in weather and educational requirements for career opportunities with the NWS. (Photograph by Brian LaMarre, WFO Lubbock Warning Coordination Meteorologist).

WFO Nashville Helps Out at Legislators' Convention. WFO Nashville WCM Jerry Orchanian helped staff a NOAA booth at the National Association of State Legislatures Convention, held recently in suburban Nashville. Approximately 150 people stopped by the booth, which was also staffed by Les Adams and Caren Madsen from NOAA Headquarters, and Drs. Tim Wilson and LaToya Myles from the NOAA Atmospheric Turbulence and Diffusion Division at Oak Ridge, Tennessee. Most of the public officials who stopped by the booth were familiar with NOAA and the NWS. Many of them stated that they used our website and/or NOAA Weather Radio for their daily forecasts, and to "keep up the good work". One Wyoming state legislature stated that because of an accurate NWS Fire Weather Forecast in his area last year, 20 lives (who were his friends) were saved on a fire line.

**WFO Tallahassee Thunderstorm Danger Level Workshop.** On August 15, Tallahassee WCM Bob Goree and Forecaster Kelly Godsey led a workshop to explore the potential use of a thunderstorm danger level scale. Over 30 people attended and served as a focus group for the concept. The attendees included broadcast meteorologists from five TV stations, county emergency managers from 3 states, state of Florida DEM personnel and FSU meteorology professors. Participants were given 27 storm descriptions and were asked to rate each on a proposed scale of 1 to 6. Lively discussion followed and comments were solicited and received.

WFO Amarillo Presents Award for Excellence. In a surprise presentation, WFO Amarillo MIC Jose Garcia and WCM Steve Drillette recently presented Mrs. Juannah Brice with a Special Service Award for her many years of voluntary service as a HAMS Skywarn spotter and net control operator. Mrs. Brice, a science teacher at Highland Park High School, has served as the primary HAMS net control operator at the Amarillo NWS office since 1999, and is often dispatched from work when storm spotter activation is required. MIC Jose Garcia gave credit to the Highland Park Administration: "We really appreciate the administration and staff at Highland Park for allowing Juannah to leave her teaching duties to respond to this critical and potentially life-saving service".



Amarillo Celebrates Volunteer Appreciation Day. WFO Amarillo held its 6th annual Spotter & Cooperative Observer Appreciation Day at the NWS Office on August 12th. Approximately 130 people attended the event, including spotters, observers, emergency managers, various NWS partners, and Amarillo NWS staff. Appreciation Day is just one way WFO Amarillo thanks all of their volunteers, partners, and valued customers for their role in meeting the NWS mission of protecting life and property. Wal-Mart of Amarillo and Canyon once again sponsored the event (as they have for the past 4 years), and donated all of the food and most of the door prizes for the event.

Morristown Hosts Eastern Tennessee AMS Event. The September meeting of the Smoky Mountain AMS Chapter was held at WFO Morristown on the 18th. Around 20 members met at the NWS office for a presentation by MRX SOO David Hotz. David discussed the processes for issuing forecasts and warnings, and used the Warning Event Simulator (WES) to relive two events in east Tennessee: the November 10, 2002 tornado outbreak and the May 20, 2006 large hail event. Attendees included representatives from the University of Tennessee Environmental Sciences Department, NOAA Air Resources Lab in Oak Ridge the Tennessee Valley Authority (River Scheduling), and the Knoxville TV media. David received very positive feedback from the TV representatives concerning warning and forecast services, and the whole group found it enlightening how NWS personnel diagnose the threat of individual storms.

Brownsville Staff Span the Border! WFO Brownsville WCM Jesus Haro, SOO Kurt Vanspeybroeck, and MIC Andy Patrick recently attended a forum dedicated to environmental, health, and safety issues conducted by the RAMAC (Reynosa Asociacion de Maquiladoras) in Reynosa, Tamaulipas, Mexico. This association represents a significant number of primarily American companies with factories in Reynosa. The forum was the 15th dedicated to these issues, and the first to which the National Weather Service in Brownsville has been invited to speak. Jesus Haro provided a Hurricane Awareness presentation to the heavily-bilingual audience of approximately 200 employees and managers, and expounded on the variety of weather threats possible in this important region. The WFO also offered its future support to the association with regard to weather briefings.

Arkansas' First Lady Visits WFO Little Rock. Janet Huckabee, wife of Arkansas Governor Mike Huckabee, visited WFO Little Rock on September 21st for a tour conducted by MIC Renee Fair and WCM John Robinson. Arkansas' First Lady was most interested in the forecast process, how warnings are issued, and the upper air program. On the following day, Mrs. Huckabee returned to the office and observed a special upper air release. She indicated that she would like to come to the office sometime during a severe weather outbreak to watch the forecasters issue warnings. Aside from her personal interest in the weather, Mrs. Huckabee now has a professional interest as well. She is the Program Manager, State Emergency Management Relations, for the American Red Cross in Arkansas.

New Local 3-month Temperature Outlook to Make Debut. On January 18, 2007, the NWS Climate Service Division will launch the new Local 3-Month Temperature Outlook (L3MTO) product officially for the continental US and Alaska. The experimental product is currently available on the climate home page of each WFO under the "Climate Prediction" tab.

The L3MTO extends the Climate Prediction Centers national 3-month Temperature Outlook to specific local sites, providing downscaled probabilistic local forecasts for the 3 month average daily mean temperature for 13 consecutive 3 month periods (i.e. Jan-Feb-March, Feb-March-April, etc.). The local long lead forecasts will be available for nearly 1150 sites nationwide on the third Thursday of every month.



Threadex Project Continues. In collaboration with the Regional Climate Centers (RCC) and NCDC, SR WFOs continue to provide updated local climate information for Local Climate Data (LCD) sites. Heretofore, many WFOs had local climate databases which extended back in time much further than the database which resided at NCDC. Oftentimes the data from a few locations in a city could be "threaded" together to lengthen the historical climate database for that city when the sites were climatologically compatible. Using data provided by the WFOs via the Threadex Project, the RCCs and NCDC are keypunching and digitizing this data to standardize all NOAA climate databases and to improve the ability of WFOs to access the data using the XM-ACIS system. For example, historical daily precipitation data from Tulsa, OK is now available in digital form back to 1893. Many SR WFOs continue to work with the Northeast RCC to update and lengthen the digital NOAA Climate Record for LCD sites within their County Warning Area.

**Nowdata Available.** Each WFO has a "Nowdata" tab on their local WFO climate home page. "Nowdata" provides customers with access to climate data from first order stations, ASOS sites, and Co-Operative Observer volunteer sites. Many customers have commented on how easy it now is to access historical climate data now from all these new locations. WFOs are encouraged to ensure that only Co-Op sites where the volunteer observers report their data daily in an electronic manner are made available on this page. This should serve as a further inducement for all WFOs to attempt to have as many Co-Op locations as possible use either the WxCoder or the IV-ROCS electronic data dissemination systems.

San Angelo Develops Web-based Winter Seasonal Outlook. Using commercially available software and a PowerPoint presentation, WFO San Angelo has created visual links with a WFO-developed narrative detailing the NWS Winter Outlook for local customers. In addition, the WFO included specific local temperature information available via the L3MTO product plus some local composite studies comparing weak to moderate El Nino rainfall totals for the cold season as opposed to ENSO neutral years. Congratulations to the entire staff of WFO SJT for collaboratively using innovative software technology to "get the word out" to their customers on perceived high impact climate events. They intend to update the product as necessary as the El Nino event unfolds. It can be viewed here:

#### http://www.srh.noaa.gov/sjt/brief/winteroutlook.html

As per Patrick McCullough of WFO SJT, "One of the nice things about having this on the website is that we were able to drop the link in an e-mail and send it out to our Emergency Managers, City and County officials, LCRA folks, and anyone else we thought might be interested. I know that it spread through the TFMA (Texas Flood Plains Managers) folks within a few days."

**WFO Melbourne Updates Experimental Dry Season Forecast for Florida.** With weekly sea surface temperature (SST) anomalies in the equatorial Pacific Ocean approaching +1.0 deg. C. from the Dateline all the way east to the South American coast, WFO Melbourne has updated their Experimental Dry Season forecast for Florida to reflect the expected weak to moderate El Nino conditions. This forecast can be viewed at the following link:

#### http://www.srh.noaa.gov/mlb/enso/mlbnino.html

Probabilities of above average storminess and rainfall are greatly increased for the Nov.1-Apr. 30 cold season, as is the probability of below normal temperatures. Preliminary plans are underway for WFOs across Florida to issue Public Information Statements concerning the impacts of the El Nino later this month. The goal will be to assist and alert decision makers on the above conditions and to allow



interested parties such agriculture and livestock entities to prepare accordingly.

El Nino Already Making its Presence Felt in Southeast Texas? The Metropolitan Houston area has received over 13" of rainfall during the first 20 days of the month, making this already the 4th wettest October on record, dating back to 1900. WFO Houston has done a great job of using its climate database and search engine tools to keep its customers informed of what is transpiring with the issuance of timely Public Information Statements. Here's an example of a recent PNS:

http://www.srh.noaa.gov/hgx/climate/reviews/102006pns.txt

Customers have commented on the value of using real-time electronic reports from Co-Op observers, not just those for which routine Climate products are issued.

#### SCIENTIFIC SERVICES DIVISION

**November Visit Teletraining Calendar.** The Virtual Institute for Satellite Integration Training (VISIT) calendars for November is available. A one-page printable planning version of the calendar is available at: <a href="http://rammb.cira.colostate.edu/visit/planning.html?10">http://rammb.cira.colostate.edu/visit/planning.html?10</a>. The teletraining calendar is available at: <a href="http://rammb.cira.colostate.edu/visit/ecal.asp">http://rammb.cira.colostate.edu/visit/ecal.asp</a>

Offices can register for the teletraining sessions by sending email to: visit@comet.ucar.edu

The sessions planned for last week of October through November are (DLOC sessions not included here):

- \* Water Vapor Channel Satellite Imagery (Basic, Oct 24, Nov 6, 15)
- \* Using GOES to Forecast Winter Storms, Part I (Intermediate, Oct 25, Nov 14)
- \* Using GOES to Forecast Winter Storms, Part II (Intermediate, Oct 26, Nov 15)
- \* Gridded MOS (Basic, Oct 25 [full], 27, Nov 1, 3, 7, 9, 14, 16, 28, 30)
- \* Lake Effect Snow 2 (Advanced, Nov 2)
- \* Cyclogenesis (Basic, Nov 7, 29)
- \* MODIS Products in AWIPS (Nov 20)
- \* GOES High Density Winds (Nov 28)

Recorded VISIT sessions are available through the NWS Learning Management System catalog at: <a href="http://e-learning.doc.gov/coursecatalog/index.cfm">http://e-learning.doc.gov/coursecatalog/index.cfm</a> (Select National Weather Service Courses, then search for the term VISIT.) All previous teletraining sessions, including those with recorded instructor audio and annotations, are available at: <a href="http://rammb.cira.colostate.edu/visit/ts.html">http://rammb.cira.colostate.edu/visit/ts.html</a>

**New FX-NET Servers.** The Technology Infusion Branch (TIB) with the help of Global Systems Divisions' Jebb Stewart installed new FX-NET Servers at Southern Region Headquarters in October. FX-NET is a meteorological PC workstation that provides access to the basic display capability of an AWIPS workstation via the Internet. The AWIPS workstation user interface is emulated very closely. The servers provide the data source for the workstations. NWS Incident Meteorologists have used this system to provide remote support to wildfires and other hazardous events since 2003. The new servers should boost the capability of Southern Region to provide on-site support.

**New MYSQL Database Cluster Installed.** The TIB has completed the transition to the new MYSQL database cluster with the help of Central Region Headquarters' Dan Arnold. This



improvement should help to partially solve some of the recent web performance issues. Access to the development database clusters may occur as soon as the first of November.

**National Weather Association Annual Meeting.** More than twenty Southern Region representatives attended the 31<sup>st</sup> NWA Annual Meeting in Cleveland, Ohio, October 14-19. The attendees ranged from award recipients, to Committee Chairs and Members, to presenters. Twenty six presentations included regional representatives as authors or co-authors. A list can be found at the end of the Topics.

#### NWA Annual Meeting Presentations Involving Southern Region Participation.

Improving Partnerships Through Training: An Interactive Web-supported Training Exercise for Decision-makers. Jason Johnson, Jonathan Brazzell, Derek Deroche, Scott Overpeck, Seth Nagle, Julie States, Hector Guerrero and Amy McCullough, NOAA/NWS San Angelo, TX.

Instant Messaging, Then and Now. Faith Borden and Darone Jones, NOAA/NWS Birmingham, AL and Daryl Herzmann, Iowa State University, Ames, IA

*Impact Weather Communications.* Mark Fox and Tom Bradshaw, NOAA/NWS Southern Region Headquarters, Fort Worth, TX.

The WEBCEM- An Automated Dissemination Method for Issuing Non-Weather Related Hazardous Warnings via the Web. Brian C. Carcione, Timothy W. Troutman, John Mike Coyne and Jason E. Burks, NOAA/NWS Huntsville, AL.

Using Ensemble Model Output Statistics to Improve 12-Hour Probability of Precipitation Forecasts. John P. Gagan, NOAA/NWS Springfield, MO and Chad Entremont, NOAA/NWS Jackson, MS.

A Proposal for a Threat Level Scale for National Weather Service Severe Thunderstorm Warnings. Kelly G. Godsey, Robert C. Goree and Andrew I. Watson, NOAA/NWS Tallahassee, FL.

The 11-13 March 2006 Mid-South Tornado Outbreak - Why it Never Occurred. Dan Valle, NOAA/NWS Memphis, TN.

Turn Around Don't Drown: A Campaign Built on Partnerships. Hector Guerrero, (NWA Councilor) NOAA/NWS San Angelo, TX, Leslie Chapman-Henderson, Federal Alliance for Safe Homes, Tallahassee, FL, Roy Sedwick, Texas Flood Plain Management, Austin, TX, Larry Wenzel, NOAA/NWS, Silver Spring, MD and Kandis Boyd, NOAA/NWS Southern Region, Fort Worth, TX.

Timmy The Twister: Raising Daily Community Severe Weather Awareness. Dan Valle, Jim Belles and Rich Okulski, NOAA/NWS Memphis, TN

Leveraging Community Organizations to Accomplish Public All-Hazards Awareness: The West Central Texas All Hazards Preparedness Campaign. Carl Wright, NOAA/NWS San Angelo, TX, Nicole Gonzales, Citizens Corps., Kent Brown, Boy Scouts of America, Marissa Swank, Concho Valley Electric Coop., and Rosendo Velez, New York Critical Response Medical Services.

RIDGE - Radar Integrated Display with Geospatial Elements. Planned Updates and Enhancements to the NWS New Radar Webpage. Keith Stellman and Paul Kirkwood, NOAA/NWS Southern Region, Fort Worth, TX, Jason Burks, NOAA/NWS Huntsville, AL, Tim Brice, NOAA/NWS El Paso, TX. and Ken Pavelle, NOAA/NWS Silver Spring, MD.



Model Flip-Flops and Forecast Opportunities. Bernard N. Meisner, NOAA/NWS Southern Region, Fort Worth, TX.

High-Resolution Analysis Products to Support Severe Weather and Cloud-to-Ground Lightning Threat Assessments over Florida. Jonathan Case, ENSCO Inc., Cocoa Beach, FL and Scott Spratt and David Sharp, NOAA/NWS Melbourne, FL.

An Operational Configuration of the ARPS Data Analysis System to Initialize WRF in the NWS Environmental Modeling System. Jonathan Case, ENSCO Inc., Cocoa Beach, FL, Peter Blottman, NOAA/NWS Melbourne, FL, Timothy Oram and Brian Hoeth, NOAA/NWS Spaceflight Meteorology Group (SMG) Johnson Space Center, TX.

An Operational Forecast Office Perspective of the National Weather Service Hydrologic Distributed Modeling System (HDMS). Diane Cooper, NOAA/NWS ABRFC, Tulsa, OK.

Probabilistic Forecasts - Baseline Products for Advanced Hydrologic Prediction Services. David B. Reed, NOAA/NWS LMRFC Slidell, LA.

An Informal Look at Some Tornado Related Statistical Trends. Alan E. Gerard, (NWA President-elect and Co-chair of Publications Committee) NOAA/NWS Jackson, MS.

Hurricane Katrina - Backup Operations by the Lower Mississippi River Forecast Center. David B. Reed, NOAA/NWS LMRFC Slidell, LA.

Analysis of Rapidly Developing Low Cloud Ceilings in a Stable Environment. William H. Bauman III, Joe H. Barrett III, Jonathan L. Case and Mark M. Wheeler, ENSCO, Inc/Applied Meteorology Unit, Cocoa Beach, FL, and G. Wayne Baggett, NOAA/NWS Spaceflight Meteorology Group, Johnson Space Center, TX.

A Thermodynamic Comparison of Two November Tornado Outbreaks in Alabama. Kristin Scotten, Michael Scotten and Mark W. Rose, NOAA/NWS Birmingham, AL

Inland Lake Surges Associated with Hurricanes Katrina and Rita. Lance Wood, Dave Schwertz, and Bill Read NOAA/NWS Houston, TX and Marty Pope, NOAA/NWS Jackson, MS.

Graphically Depicting the Hazardous Weather in Southern Middle Tennessee and North Alabama. Brian C. Carcione, Christopher P. Darden, John Mike Coyne, Timothy W. Troutman and Jason E. Burks NOAA/NWS Huntsville, AL.

A Thermodynamic Investigation of the Early Afternoon Wet Microburst Pre-Storm Environment over Southern Alabama and the Western Florida Panhandle. Jeffrey M. Medlin and Jack Cullen, NOAA/NWS Mobile, AL.

Using Flow Regime Lightning and Sounding Climatologies to Initialize Gridded Lightning Threat Forecasts for East-Central Florida. Winifred Lambert and David Short, ENSCO, Inc., Cocoa Beach, FL and Matthew Volkmer, David Sharp and Scott Spratt, NOAA/NWS Melbourne, FL

Hurricane Rita Tornado Outbreak. Dan Byrd and Greg Garrett, NOAA/NWS Jackson, MS.



A Case Study of the April 2, 2006 Killer Mid-South Tornado Outbreak. Jonathan L. Howell and Jason F. Beaman, NOAA/NWS Memphis, TN

### ADMINISTRATIVE MANAGEMENT DIVISION

#### DIVERSITY/EEO AND COMMUNITY OUTREACH ACTIVITIES

Brownsville Staff Participate in Career Day in Deep South Texas. WFO Brownsville DAPM Jim Campbell, WCM Jesus Haro, and HMT Alfredo Vega represented the NWS at the "Building a Bright Future Career Day" hosted at the Brownsville Events Center. Approximately 500 5th–graders from Aiken, Champion, El Jardin, Morningside, Paredes, and Vermillion Elementary schools attended. Jim, Jesus, and Alfredo spoke with the students in English and Spanish about weather safety, careers in the NWS, and the NWS mission.

University of Puerto Rico Students Visit WFO San Juan. A group of 25 students from the Natural Science Department general meteorology course visited WFO San Juan for a half-day workshop organized by Senior Forecaster Hector Rivera. Some of the students will likely pursue a career in meteorology, while others are engaged in environmental science and medically related fields. On-shift forecasters Walter Snell, Orlando Bermudez and Felix Castro assisted with the tours and presentation. Hector discussed local climatology, NWS operations, and all related office programs.

