Weather Service School Newsletter

National Weather Service, Detroit/Pontiac Michigan

2012-2013 School Year November 2012

Special points of interest:

- **weather.gov/detroit**
- Winter Starts: December 21 at 6:12 a.m. EST
- Severe Weather Awareness Posters due: Friday, February 8
- Spring Starts: March 20 at 7:02 a.m. EDT
- Severe Weather Awareness Week is April 7 to 13
- Statewide Tornado Drill is Wednesday, April 10 at 1 p.m.
- Contact: Rich Pollman at Richard.pollman@noaa.gov or 248-625-3309 x726

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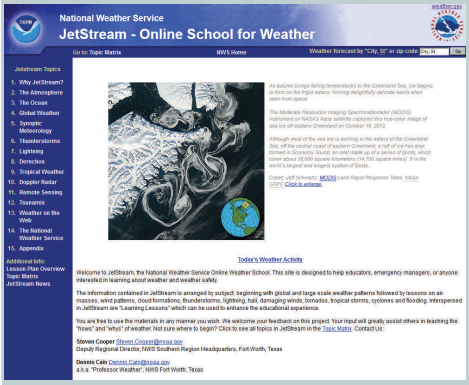
Internet Weather Education Resources



An image of the JetStream Weather School

The internet is a wonderful tool to learn about all different aspects of weather and weather safety. There are a many weather education and safety resources available. We have combined a few of the best that NOAA and the NWS have to offer:

- JetStream Weather School - http://www.srh.noaa.gov/srh/jetstream/
- Young Meteorologist Program - http://www.youngmeteorologist.org/
- Young Meteorologist Game - http://www.youngmeteorologist.org/game/index.html
- NOAA Teaches Weather in Second Life - http://www.spacetoday.org/NOAA/SecondLife/NOAA_SecondLife.html
- NWS You Tube Channel - http://www.youtube.com/user/usweathergov?feature=watch
- Water Cycle You Tube Video - http://www.youtube.com/watch?v=ZzY5-NZSzVw&feature=relmfu
- Weather Education Online Weather Resources - http://www.weather.gov/education
- NWS Detroit/Pontiac Preparedness Web Page - http://www.crh.noaa.gov/dtx/?n=preparedness
- Owlie Skywarn Safety and Coloring Book - http://www.nws.noaa.gov/os/brochures/OwlieSkywarnBrochure.pdf
- Cloud Chart - http://www.nws.noaa.gov/os/brochures/cloudchart.pdf
- Local Brochure on Meteorology Careers - http://www.crh.noaa.gov/images/dtx/preparedness/careersLocal.pdf

NWS Tours and Weather Presentations

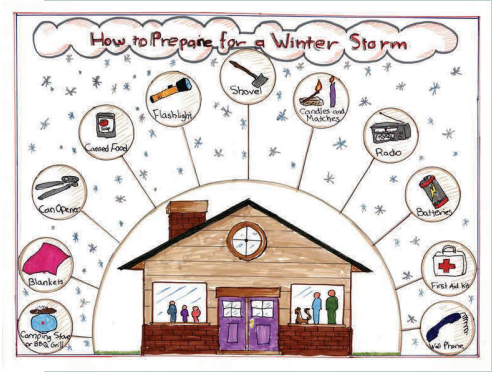
The National Weather Service Detroit/Pontiac office in White Lake, Michigan will continue to offer opportunities for meteorologist to speak with students and teachers. However, there are limitations to our availability.

Tours can be conducted at the NWS office during day time hours or in the evening, Monday through Friday subject to NWS staff availability. The evening tour features the weather balloon release. Tours are limited to 25 people and must be scheduled at least 4 weeks in advance. The tours are free and last just over one hour.

School weather presentations can be tailored to all age groups. The weather presentation will only be 30 minutes for the youngest grades, about 45 minutes for the middle grades, and about one hour for middle and high school. Scheduling of talks will be on a first-come, first-serve basis throughout the year. Weather talks are free as well, but due budgetary issues, they will be scheduled on a limited basis for 2012-2013.

For more information please contact, Rich Pollman at either 248-625-3309 x726 or Richard.pollman@noaa.gov

2013 Poster Contest and other Michigan Committee for Severe Weather Awareness Resources



1st Place winner from 2012

Michigan experiences an average of 16 tornadoes each year, causing millions in damages and threatening the lives of residents. To encourage students to think about the importance of being prepared in the event of severe weather, the Michigan Committee for Severe Weather Awareness is sponsoring its annual Severe Weather Awareness Poster Contest. There is a flyer on the Committee's web site, http://www.mcswa.com/ ContestRules2013.pdf , which can be reproduced and distributed to the appropriate classroom and art instructions at your school.

The contest is open to students in fourth or fifth grades. Prizes will be awarded for first, second and third place, as well as an honorable mention.

Each year, winners of the poster contest are recognized and presented their awards at a ceremony held in the State Capitol in Lansing during Severe Weather Awareness Week, April 7 to 13, 2013.

Last year's winning posters may be viewed on the committee's website, www.mcswa.com.

The Michigan Committee for Severe Weather Awareness was formed in 1991 to promote safety awareness regarding tornadoes, floods and winter storms. The Committee includes representatives from the National Weather Service, Michigan Department of State Police, Insurance Institute of Michigan, Michigan Emergency Management Association, Michigan Department of Environmental Quality, WDIV-TV, State Farm Insurance, Michigan Earth Science Teachers Association, Consumers Energy, Michigan Department of Community Health and Michigan Sheriffs' Association.

National Weather Service and Social Media

The White Lake National Weather Service is now on Facebook and Twitter!

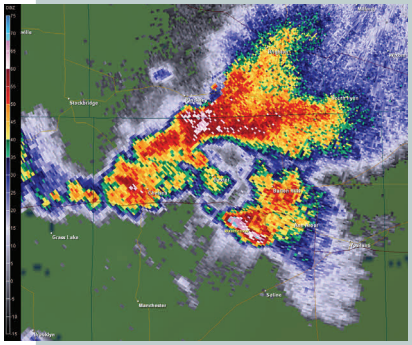
You can follow us on Twitter at : https://twitter.com/NWSDetroit

You can like us on Facebook at : http://www.facebook.com/ US.NationalWeatherService.Detroit.gov

Both Facebook and Twitter are a good way to stay up to date on all the important weather information in Southeast Michigan! They are also a great place to post weather related questions, photos of weather damage or weather phenomenon, and report your local storm reports during severe weather and snowfall observations during the wintertime!

The Dexter Michigan Tornado

Picture by Scott Erdman just northwest of Dexter



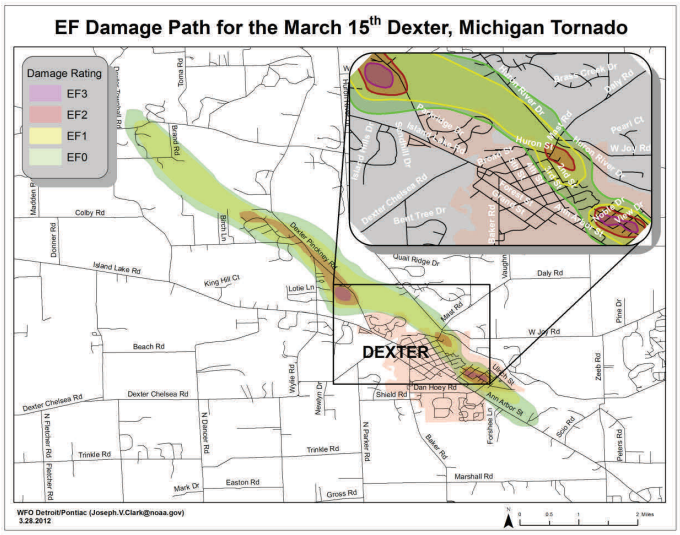
Radar image of tornadic producing thunderstorm

An amplified upper level weather pattern allowed for an unseasonably warm and humid air mass to infiltrate the southern Great Lakes region in March. Highly anomalous for the month of March, surface dew points climbed into the lower 60 degree range across much of Southeastern Michigan. This rich moisture combined with upper level disturbances tracking northward through Lower Michigan on both March 12 and March 15. These conditions fueled severe thunderstorms in Midland and Bay Counties on March 12 and then the long duration severe thunderstorm event across Southeastern Michigan on March 15. The primary severe weather type observed with these storms was very large hail, along with a few tornadoes.

Four tornadoes occurred this past March. On March 12th, an EF1 hit just south of Coleman in northwest Midland County. On March 15th, an EF0 hit near Ida in Monroe County, an EF1 touched down near Columbiaville in Lapeer County and an EF3 hit Dexter in Washtenaw County.

March tornados in Southeast Michigan are rare. Prior to the Coleman tornado on March 12, just 9 tornadoes had been recorded before April 1 in Southeast Michigan (the 17 counties that represent the NWS Detroit/Pontiac area of responsibility). Tornado statistics go back to 1950. In March 2012, there were 4 tornadoes in Southeast Michigan. The Coleman and Columbiaville tornadoes were the first to occur north of Interstate 69 in the month of March. The March 12 date also marks a tie for the second earliest tornado in Southeast Michigan and the March 15 date marks the fourth earliest tornado in Southeast Michigan since 1950.

The most destructive of the tornadoes was the EF3 which hit Dexter. A National Weather Service Storm Survey confirmed an EF-3 tornado touched down near Dexter, MI with maximum wind speeds of 135-140 mph. The path length was 7.6 miles with an average width of 400 yards and a maximum width of 800 yards. The tornado touched down at 5:18pm just northeast of the intersection of N Territorial and Dexter Townhall Rd. The tornado moved southeast and produced EF-1 damage with winds estimated at 100 mph. Damage was limited to uprooted and snapped trees as well as minor roof damage. The tornado strengthened as it hit the Horseshoe Bend Subdivision with winds estimated at 120 mph and structural damage to the outside of homes. The tornado then continued to track southeast alongside Dexter-Pinckney Rd. and produced EF-3 damage at 5:31pm. Winds estimated at 135-140 mph destroyed one home northwest of Dexter. The tornado was nearly stationary and wobbled around for nearly 5 minutes just northwest of the village of Dexter before turning left, paralleling the Huron River and producing EF-2 damage on the north side of Dexter. The tornado then produced EF-3 damage again at 5:49pm in the Huron Farms Subdivision with winds estimated at 135-140 mph. One home was destroyed and another house had only interior rooms left standing. The tornado then weakened as it moved southeast and lifted at 5:56pm near the intersection of Zeeb Rd. and Ann Arbor-Dexter Rd.



Calling All Schools to Join the CoCoRaHS Network!

Weather affects all of us and can vary greatly even over short distances. In an effort to increase the density of rainfall observations over the United States, a fast-growing, volunteer program needs weather observers in Michigan. This program is called the **Co**mmunity **Co**llaborative **Ra**in, **H**ail, and **S**now Network (CoCoRaHS) and is a nationwide network of volunteers who measure and report precipitation. The network is made up weather enthusiasts of all ages and backgrounds who send in daily observations from their homes, schools, and businesses.

The goals of the program are to:

- Provide accurate high-quality precipitation data for our many users on a timely basis
- Increase the density of precipitation data available throughout the country
- Encourage citizens to have fun participating in meteorological science and heighten their awareness about weather
- Provide enrichment activities in water and weather resources for teachers, educators and the community

The Michigan State Climate Office and the National Weather Service encourage schools to participate in the Michigan CoCoRaHS Network. Your students will enjoy taking measurements of rain and snow at their own school and seeing their reports appear on national and state maps! Students will be able to compare their precipitation to others in their community, county and state! The CoCoRaHS website also contains lesson plans and activities on a variety of weather topics.

Participation is easy and only takes about 5 minutes each day! Observations are typically made daily, however schools may choose to enter a weekend total each Monday. Summer observations are not required. To join the CoCoRaHS network, your school will need a head observer (preferably a staff member) who completes a 90-minute training session, an official 4" diameter rain gauge, and an internet or phone connection.

To join, complete the online training, order your rain gauge, or view the data please visit www.cocorahs.org.