

On 5/21/2015 we conducted a meeting of emergency responders at the Bates County Emergency Management Office to review the multiagency responses to the Tornado that occurred on May 16<sup>th</sup>, just west of Adrian.

The purpose of the meeting was to review the responses of each agency involved and to get a collective idea of any changes, if any, necessary so that all future responses put the needs of our community first. At the meeting, members of the Adrian Fire Department, Butler Fire Department, Bates County Sheriff's Office, Butler Police Department, National Weather Service, Emergency Management Office, Bates County Commissioners Office and Emergency Dispatchers from both Butler Police Department and Bates County Sheriff's Office were present.

A Warning Coordination Meteorologist from the National Weather Service was also present and gave a presentation as to the response of the National Weather Service and how this particular storm appeared for such a short time and created damage prior to any warning system being activated. (Attached you will find a letter from the Meteorologist). The important thing was that emergency responders were not aware that this event was a tornado until several days later.

During the meeting we discussed how the environment did not allow the responders on the ground to identify the amount of damage that was done by the storm. The storm struck during the night and with the heavy rain, damage to the area was not obvious to responders. Only one call of damage was received to either dispatch center from the public. We identified that we rely on our partners, the citizens, to help report damage to us even if they do not require a response from the emergency personnel. This will allow an Incident Commander to get an overall picture of a damage path thus giving him/her the ability to direct responders in the area for those that aren't able to call for help.

Another topic discussed was the ability to communicate with each agency and a place to funnel all the information to one location. Being able to have interagency communication is essential for an efficient and fast response as well as the need to have a central place for that information gathered to be given to so that someone can get an overview of the situation. Communication needs of the agencies were discussed along with the lack of funding to address those needs. At the conclusion of the meeting each agency agreed that the needs of our citizens are our first priorities. Each agency was able to identify things that they

felt they could make changes to, so they could serve the community better in the future.

The fact that each agency has a tremendous ability to work together, like on May 16<sup>th</sup>, still can't accomplish what we can when the citizens and those agencies work together. So we ask that you take a few minutes and prepare a storm/disaster readiness plan for your household. We ask that when an event happens please reach out to us and let us know what you are seeing (we don't encourage you to place yourself or others at harm to get information). Having 1000 pair of eyes is better than a few dozen.

If you have any questions, information you would like to add, or help preparing a disaster readiness plan please feel free to contact any of the above mentioned agencies. We are here to serve you.

Letter from the Warning Coordination Meteorologist out of Pleasant Hill.

I understand that many in Adrian were not happy with how the tornado was handled around midnight Saturday night May 16. I'm sure the lack of sirens was upsetting. I want to use this space to explain how the event unfolded, as well as to set expectations for similar events like this in the future.

First, local officials did nothing wrong when they didn't sound the sirens. Most locations, including Adrian, sound sirens when a tornado is sighted, or a tornado warning is issued by my office, the National Weather Service in Pleasant Hill. Neither of these two things happened on May 16th.

Spotters would not have been able to see the tornado as it was wrapped by rain, and given the late hour, it was obviously dark. You may then want to point the finger at National Weather Service meteorologists who did not issue a tornado warning for the storm. Unfortunately, it is a very little known fact about Doppler radar with small tornadoes like this, they generally don't show up in radar data. The larger scale circulation may be apparent, but these larger scale circulations often outnumber actual tornadoes by about a 10 to 1 ratio.

Lacking a clear radar signature and reports from spotters, there really isn't anything available to make the decision to issue a warning in events such as May 16th. Don't get me wrong, Doppler radar has been an incredible advancement over the last few decades. It has helped save countless lives. Unfortunately, it has limitations, and it won't detect everything.

Additionally, I would strongly urge you not to rely solely on storm sirens as your alert to decide to seek shelter. Storm sirens are meant to be heard outdoors. In fact, often the noise from a storm will make the sirens hard or impossible to hear indoors. There are numerous other ways to receive warning information. This includes things like NOAA Weather Radio, dozens of smartphone apps (like the free Red Cross tornado app), wireless emergency alerts on newer cell phones as well as a variety of other services supplied by counties and cities with names such as textcaster and nixle. In reality you should have 2 or 3 different ways to receive a warning in case the storm knocks out power or phone signals.

I haven't written the above to make excuses for lack of warning. Rather I want to add some fact to the discussion in hopes of providing more understanding. The forecasters at the National Weather Service are extraordinarily dedicated and take their jobs very seriously and will strive to continue issuing the very best severe weather warnings possible.

Andy Bailey  
Warning Coordination Meteorologist  
National Weather Service  
Pleasant Hill, MO