



MIAMI-SOUTH FLORIDA

National Weather Service Forecast Office

http://www.weather.gov/miami



Tornado in Everglades of Collier County on June 24th, 2012 (courtesy Dan Floyd)

2019 Severe Weather Awareness Week

Wednesday, January 16th is Tornado and Thunderstorm Awareness Day

Tornado Drill at 10 AM EST

Tornadoes and severe thunderstorms are more frequent in South Florida than some people realize. Since 1996, South Florida has averaged 11 reported tornadoes per year, and since 1950 a total of 154 tornadoes of EF-1 or EF-2 intensity on the Enhanced Fujita Scale (winds greater than 85 mph) have occurred. South Florida tornadoes occur with a variety of weather systems: from strong winter/spring cold fronts; waterspouts moving onshore; and tornadoes embedded in the outer rain bands of tropical storms and hurricanes.

A total of 11 tornadoes were reported in South Florida in 2018. Over 90% of South Florida tornadoes fall in the EFO and EF1 category, which translates to winds less than 110 mph. Impacts from these tornadoes typically include: significant damage to mobile homes, uprooted trees/broken tree branches, downed power lines, minor structural/roof damage to buildings, and patio/pool screen enclosures. Since 2015, 6 people in South Florida have been injured by tornadoes, a sign that ANY tornado is dangerous.

Even waterspouts (tornadic circulation on water) can be dangerous to boaters as well as to those at the beach. On May 25th, 2015, a waterspout moved onshore Fort Lauderdale Beach and flipped a bounce house in the air about 30 feet, injuring four children who were in the bounce house at the time.



NWS Storm Survey picture from Miami Springs on January 23rd, 2017

Tornadoes have occurred in every month in South Florida, but occur mostly from May to August when thunderstorms are most frequent (see graph below). Most South Florida tornadoes are relatively small and short-lived. This means that it is often very difficult to give plenty of advance warning. In many cases, only a few minutes of warning are given between the time a warning is issued by the National Weather Service and the tornado touchdown. Nevertheless, even a few minutes of warning can make the difference between life and death. Having a NOAA Weather Radio is a critical component of the warning system. Having a weather radio available to alert of an approaching tornado has proven to save lives, especially for nighttime tornadoes when people are normally asleep and otherwise wouldn't receive alerts. Local media will also relay tornado warnings via the Emergency Alert System (EAS).

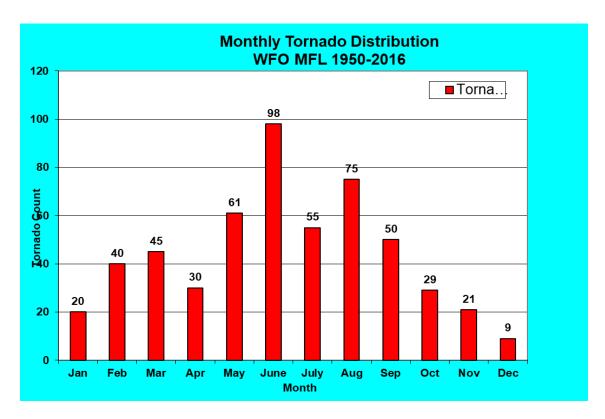
There are also many mobile services available to alert of tornadoes, including <u>Wireless</u> <u>Emergency Alerts</u> (WEA) which allows people who own wireless smartphones and other enabled mobile devices to receive geographically-targeted, text-like messages alerting them of imminent threats to safety in their immediate area.

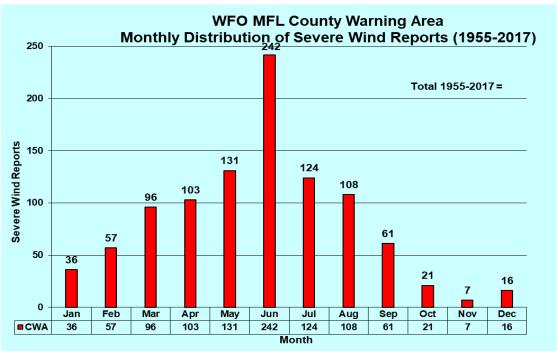
It is important to understand the meaning of the terminology meteorologists use to assess the threat of tornadoes in your community. A **Tornado Watch** means that atmospheric conditions are conducive for tornadoes. Remain alert for approaching storms. A **Tornado Warning** means that a tornado has been sighted by a weather spotter or member of the public, or indicated by weather radar.

IMPORTANT TORNADO SAFETY TIP: when a tornado warning is issued for your area, **move immediately to your pre-designated place of safety** which should be an interior room or hallway on the lowest floor away from windows, or underneath a desk or table if a windowless room is not available. In a multi-story building, go to the lowest floor.

TORNADO DRILL INFORMATION

On the morning of the drill, all participants should consider themselves under a Tornado Watch. A Watch means you should monitor the weather and be prepared to go to a safe place in the event of a Warning. At approximately 10:00 a.m. EST, the National Weather Service will issue a practice Tornado Warning. The warning will be broadcast on NOAA Alert Radios as a **weekly test message** (**NOT** a live warning). Everyone is encouraged to participate in the drill by activating their tornado safety plan at 10 AM. This is especially encouraged at schools, businesses and hospitals. The tornado drill will last until 1030 AM EST when the test tornado warning will be cancelled.





Graphs showing historical monthly distribution of severe thunderstorms and tornadoes in southern Florida from 1955-2017

Severe thunderstorms are also fairly common in South Florida. These are defined as thunderstorms containing wind speeds of at least 58 mph and/or large hail of at least one inch in diameter. Severe thunderstorms can occur year-round but are most common from March to August. Winds in excess of 58 mph can cause damage to trees,

cause signs to fly through the air, knock down power lines, and even cause structural damage to buildings. Large hail, although usually not damaging in South Florida, can still pose a threat, especially in urban areas where vehicles can suffer damage. Large hail can also damage crops.

Tornado and severe thunderstorm warnings are normally issued within 30 minutes of an expected impact, and people are urged to take immediate protective action due to the imminent nature of the threat.

For more information on tornadoes and thunderstorms, including safety information, visit the <u>National Weather Service Tornado website</u> and the <u>National Weather Service</u> Severe Thunderstorm website.

Make sure to visit our website at <u>weather.gov/southflorida</u> for the latest weather information, <u>including information on potential tornado and thunderstorm threats</u>, watches and warnings. Also monitor NOAA Weather Radio and local media, particularly during potentially threatening weather days.