CoCoRaHS History

CoCoRaHS, or Community Collaborative Rain, Hail and Snow network, is a volunteer weather observing network that anyone can join. The network was started out of the Colorado Climate Center at Colorado State University in 1998. The driving force for the creation of CoCoRaHS was a flood in Fort Collins in 1997. Originally, only Colorado was involved in the program, until Wyoming joined in 2003. Since then the network has spread to all 50 states, including Washington D.C. In 2005, Indiana was the 10th state overall to join. CoCoRaHS is now also available in 8 provinces across Canada, as well as Puerto Rico. The network has joined forces with partners such as the National Oceanic and Atmospheric Administration (NOAA), the National Weather Service (NWS), the National Science Foundation (NSF) and many others. All you need to start is a little training, some equipment, and an interest in the weather. After the cost of the equipment, this network is completely free to participate in. For more information on equipment that you would need, please visit the CoCoRaHS store here.

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CoCoRaHS data supports many agencies and initiatives. From farming, to weather forecasting, to post storm mitigation, to flooding. Reports received from trained observers are invaluable. Since data is instantly available within 24 hours of an event ending, this makes CoCoRaHS and excellent source as a starting point for many people who want/need instantaneous information.

Some people who may use your data:
- Meteorologists
- Hydrologists
- City managers
- Utility companies
- USDA
- Insurance adjusters
- Farmers/ranchers
- Conservationists
- Outdoor and Recreation
- Engineers

Daily reports as of 9:09 AM on Tuesday, September 30, 2014. Click on the map to access the CoCoRaHS maps page for more information and detail.
Interview conducted with Al Shipe, Service Hydrologist at NWS Indianapolis. How often do you look at CoCoRaHS? Several times every day. What are you looking for? Largest rainfall amounts, locations of rain and their proximity to drought areas or flood prone areas. In the monthly reports, I’m looking for the Max/Min reports, but I need reports for every day in order for that to be worth while. You can’t assume there was a 0.00 unless that’s what was actually reported. How do you use the data? To highlight flooding and on the reverse side, to highlight drought. I use the monthly data to assess the above/below trends for climatology. I will definitely read comments to gauge the severity of an event. Those people that leave comments are going the extra step to help us out. Where do you feel we need more observers? Definitely in rural areas. If you get reports from 1% of the population in urban areas, that’s a lot of reports. But 1% in rural areas is whole lot less data. Hopefully those in rural areas who are most affected by the weather will report. How would your job be affected if there was no CoCoRaHS? We wouldn’t be as confident in our warning/products because we wouldn’t know what is really going on out in the field unless there is a person dedicated to making calls for verification purposes.

Weather In Review

Taken from the NWS Indianapolis Summer 2014 Climate summary. The summer of 2014 ended up as one of the coolest in recent years, with many locations across central Indiana experiencing a monthly average temperature below 70 degrees. This came just two years after Indianapolis recorded their warmest July ever in the blistering hot summer of 2012. Even more impressive, average temperatures this July were 12 to 14 degrees cooler than in July 2012.

July was the coolest in recorded history at Indianapolis, with most locations across central Indiana experiencing a monthly average temperature below 70 degrees. This came just two years after Indianapolis recorded their warmest July ever in the blistering hot summer of 2012. Even more impressive, average temperatures this July were 12 to 14 degrees cooler than in July 2012.

Unsettled weather with rain and thunderstorms, especially during much of June and the second half of August, ensured a wetter than normal summer for many. Indianapolis received over half of their accumulated summer season rainfall in June, when 7.04 inches fell, good for the 13th wettest June on record.

Observations Last Quarter

For the July 1, 2014 through September 30, 2014 quarter, there were 33215 daily precipitation reports. With 92 days in that quarter, that averages out to 361 reports/day.

Currently, there are 1480 active observers in the state of Indiana. This means that we have only about a 24% report rate on any given day.

A summary of other notable reports last quarter include, 56 significant weather reports, 510 multiday precipitation reports, 1514 evapotranspiration reports, 574 hail reports (with 15 including pictures of hail pads), and a total of 4474 reports included comments. Seeing statistics like these are encouraging, please continue to send in your reports.

If you have never sent in any reports other than daily precipitation and are wondering where to report this information, the different forms are listed in the left had menu on the “My Data” page when you log in.

Let’s see if we can work together as a team to boost our daily reporting percentage in the coming quarter.
**Seasonal Preview**

Written by Lead Forecaster and Climate Focal Point Mike Ryan. So what can Hoosiers expect for the upcoming winter? Many locations experienced their coldest winter since the late 1970s, with well above average snowfall totals for the season last winter. This winter, conditions and long range model trends favor colder and snowier conditions for the Hoosier state. The likelihood of seeing a repeat of the persistent, brutal conditions experienced in the 2013-14 winter however are low.

Recent trends also suggest drier than normal conditions in Indiana are more likely this winter. Less precipitation doesn’t always mean less snow, as the main storm track focuses south of the Ohio Valley. In the colder airmass north of the storm track, Alberta clippers and upper level disturbances tracking through the region end up being largely responsible for occasional light snows.

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**Social Media and Smart Phone Apps**

Did you know that CoCoRaHS is on social media? There are several ways to keep updated on both the local and national level. Here is a list to get you started.

- CoCoRaHS HQ Facebook
- CoCoRaHS Indiana Facebook
- CoCoRaHS HQ Twitter

Do you have a smartphone? CoCoRaHS apps are now available for free on both Android and Apple products. Just search for CoCoRaHS Observer in either the Google Play Store or the Apple iTunes store.

The app is a great solution for those who check their gauge on the run or those to get up just to take their observation and want to go back to bed on their days off. The easy log on allows you to put your observations in without having to boot up a computer. The app has most of the functionality of the website with regard to normal daily precipitation reporting for rainfall, snowfall, snow depth, snow cores, flooding, and observation notes.

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**Training Videos and Sessions**

Training to be a CoCoRaHS observer can be completed one of several way. The first option is through slideshows available on the CoCoRaHS website located here.

The second method is to view videos uploaded to the CoCoRaHS HQ Youtube Channel, which can be found here. By accessing the training videos via the Youtube channel, you will also be able to view past Wx Talk Webinars that CoCoRaHS has hosted.

The third and most variable training option is on site training sessions conducted by the local coordinators. Sessions like this are ideal for bigger groups and will need to be requested. These will be dependent on coordinator availability and budgetary concerns.

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“Awesome, makes me want to go out and do a rain dance just to measure and post some precipitation.”

—Youtube commenter
Want to have an interview segment in an upcoming issue of the Counting Drops Newsletter?

If you are interested, send an e-mail to indiana.cocorahs@gmail.com with “CoCoRaHS Sound Off” in the subject line.

Include in the body of the e-mail your station number (ex. IN-MR-200), your name, and a quick description of why you would like to be interviewed. This may be a short story about a significant event that has occurred since you have been an observer, why you got involved, or how you use the data if you do something special with it.

One observer will be selected per quarter.

Who Can Help Me?

As your state and local coordinators, we are here to help you with any and all CoCoRaHS related questions or issues.

Local coordinators are based out of the National Weather Service Forecast Offices. This map shows which office services each of the counties in Indiana. This is also a good indicator of where your weather forecasts come from.

Those individuals marked by a red star are the overall state coordinators and are available to every county.

Please do not hesitate to get in contact with anyone if you need help. Happy Observing!