



*Under the Big Sky e-letter
October 19, 2009*

Montana Winter Weather Awareness Week: It's Montana's Winter Weather Awareness Week. Governor Schweitzer even recognized this week officially! That is the first time a Governor has ever done this in Montana. Please make sure you take the time to put winter survival gear in your vehicle, especially if you are going on a trip that is more than just around town. We've had people stranded in blizzards just trying to return home from the grocery store with supplies! The photo above is Highway 191 south of Malta after a major blizzard in early 2004. Besides the stranded travelers, there were also snow plows that went off the road going to rescue the travelers. Let's hope we don't see much of this in the upcoming winter. ☺

In the past ten years, we've had events that numbered in the dozens of major storms throughout the season, to one year (2007-2008) where we only had four counties out of our twelve that had any kind of heavy snow or blizzard conditions. For more information on being prepared at home and on the road this winter, please visit:

<http://www.wrh.noaa.gov/byz/winter/index.php?wfo=ggw>

Montana Survival Guide:

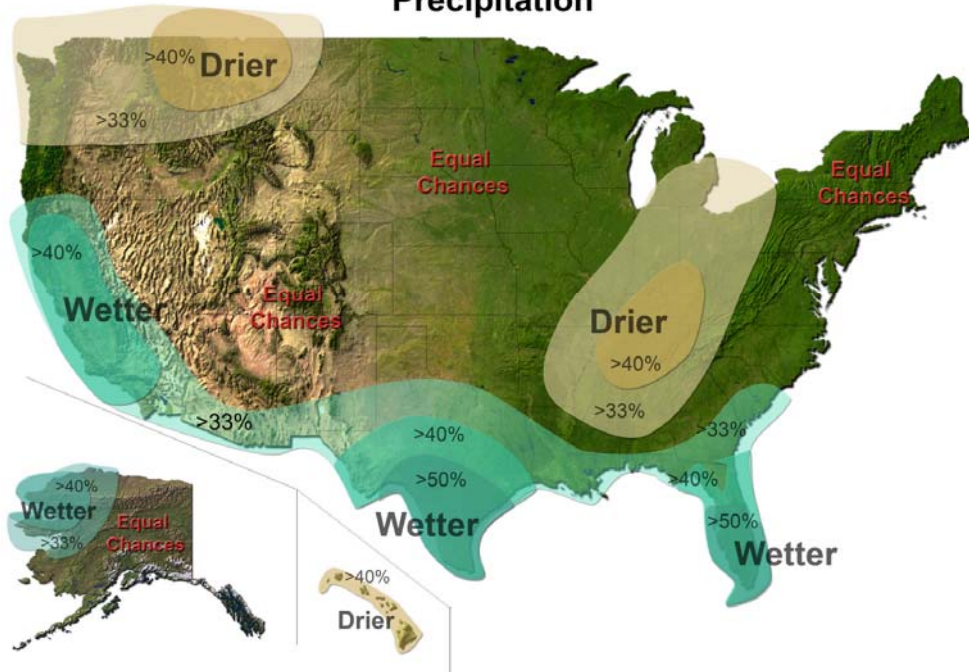
http://www.mdt.mt.gov/publications/docs/brochures/winter_maint/winter_survival.pdf

Vehicle Winter Supply Kit Items:

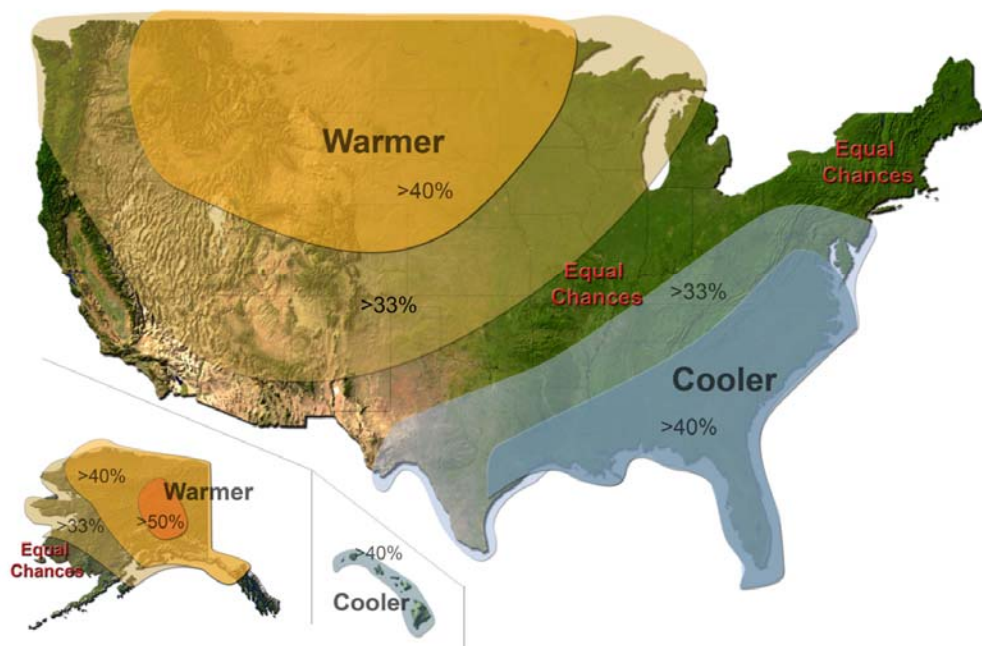
Cell Phone	Flashlight (extra batteries)	First Aid Kit
Blankets/Extra clothing	Whistle to signal for help	Moist Towelettes
Basic Tool Kit/Knife	Portable Shovel	Garbage Bags/Plastic Ties
Axe or Saw	Tow Chain/Straps	Spare Tire
Starter Fluid/Oil/De-icer	Flares	Cat Litter or Sand
Booster Cables	Water	Non-perishable food
GPS	Portable Radio/Weather	Fire Extinguisher
Prescription Medications	Radio	

Winter Weather Outlook: The 2009-2010 Winter Weather Outlook (Dec-Jan-Feb) was released last Thursday. Below are the graphics and this link will provide you the discussion: http://www.noaanews.noaa.gov/stories2009/20091015_winteroutlook.html

U.S. Winter Outlook Precipitation



U.S. Winter Outlook Temperature



CoCoRaHS: One in each county! Let's see if we can get a few more people in northeast Montana to join the program. We have several counties without a CoCoRaHS observer in it, including: **Petroleum, Garfield, McCone, Prairie and Wibaux!** We really do need your valuable precipitation observations. You can find a lot of information on precipitation in Montana on this site: <http://www.cocorahs.org/>

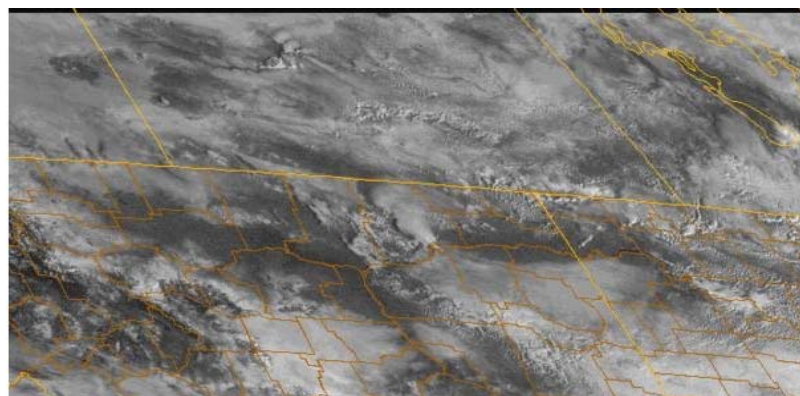
You can also contact me if you would like to sign up and be a CoCoRaHS observer. (tanja.fransen@noaa.gov or 406-228-2850)

Also, new from the CoCoRaHS Headquarters in Fort Collins, CO: There is an in-depth snowfall measurement training now available. It's a good time to review before the big snow hits! <http://www.cocorahs.org/media/docs/Measuring%20Snow-National-Training%201.1.pdf>

Climate Change: Natural Variations are being looked at by scientists. The majority of scientists agree that increased greenhouse gases are causing the rise in global temperatures, but they are also trying to look at how much natural variability plays into the equation as well. The article discusses the periods of cooling or no warming that we've experienced in the past 30 years as well.

<http://climate.nasa.gov/news/index.cfm?FuseAction=ShowNews&NewsID=175>

Lake Effect Snow: Fort Peck recently had 4-7 inches of snow caused by Lake Effect Snow from Fort Peck Lake. Here are a few images from the event, one from the webcam, the other from Visible Satellite showing the cloud plume from the lake going north. (Thanks for sending them Jim Rea!)



Traveling: I've had a few trips in the past few weeks. The first was a meeting in Wolf Point to discuss the Montana Strategic Plan for Homeland Security. A friend asked me, "What does the NWS have to do with that?" and my answer was: "The main concerns in the Montana Strategic Plan are:

1. Wildfires
2. Winter storms
3. Drought
4. Floods
5. Transportation and Industrial events/accidents
6. Threats to Agriculture from disease

In four of the six of these, the NWS has it in our mission statement to assist, and the other two may require emergency messages to be transmitted through the Emergency Alert System, a system run by the four National Weather Service offices in the state. So, while the top 18 US National Priorities for Homeland Security only include one weather event in them (major hurricane coming inland), the State of Montana recognizes that weather is a significant threat to our economy and resources. "

Also, Lewistown recently hosted the Montana Association of Disaster and Emergency Services workshop in which the NWS gave presentations on new dissemination services and a look at how El Nino impacts Montana. My counterparts from Billings and Great Falls attended the conference as well.

The last trip was last week and I got to visit Grand Forks, ND for the first time. The NWS office in Grand Forks hosted a two day leadership and diversity summit, and I was one of the guest speakers. It was great to meet and mingle with our counterparts to our east, and we had attendees from the Dakotas, Minnesota, Michigan, Wisconsin and Iowa attending. Our intern, Amy Schnetzler was able to attend the workshop with me. While the weather was typical for a winter weather event, and didn't even hit warning criteria, the first storm of the year causing a mix of rain and snow was a significant impact statewide and caused several travel nightmares in ND, with at least four deaths, and dozens of accidents around the state.

NWS Glasgow News: Our new administrative assistant Jeanie Anthony started last week. Her head is still spinning from all the acronyms, but she's figuring it all out quickly. If you stop by the office, please make sure to introduce yourself to her!

NOAA in the News:

September was a warm one in the United States, and Globally:

US: http://www.noaanews.noaa.gov/stories2009/20091007_septusstats.html

Global: http://www.noaanews.noaa.gov/stories2009/20091015_sepglobalstats.html

Looking at the past to predict the future: NOAA Scientists have been looking at the dust bowl years and again the 1950's to look at what triggers drought. These two events are the largest droughts on record in the last century, and scientists have long been interested in what caused them. http://www.noaaneews.noaa.gov/stories2009/20091013_drought.html

Weather Around the Globe:

The Phillipines are about to get hit with their third Typhoon in a month: While the death toll from previous typhoons in near 1,000, and areas and many people are still displaced, another Typhoon (Lupit) is about to hit the island.

<http://www.cnn.com/2009/WORLD/weather/10/19/philippines.storms/index.html#cnnSTCText>

Drought Stricken California hit with flooding: California has had significant drought impacts in the past year, and is one of the few places we had major wildfire issues this season. The burn areas are the ones most impacted by mudslides as scorched earth cannot absorb the 5-10 inches of rainfall that came down.

<http://www.cnn.com/2009/US/weather/10/13/california.rain/index.html#cnnSTCText>

Moscow's Mayor promises no snow this winter: I was a bit shocked at this article I read in Time Magazine, in which the mayor has declared they will use cloud seeding to stop major snow storms in Moscow. The cost is expected to be much less than snow removal, but I know there are people who appreciate the big snow storms out there, and the precipitation losses could cause other environmental impacts.

<http://www.time.com/time/world/article/0,8599,1930822,00.html>

http://www.msnbc.msn.com/id/33347542/ns/world_news-europe/

Weather Humor

No funny cartoons this week, but after the beautiful weekend, I thought I would point out that we have decided to switch the seasons this year. It now goes Summer, Winter, and then Fall!