

ZUMWALT PRAIRIE WEATHER 2012

A summary based on data from the Zumwalt Weather Station

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The Zumwalt Prairie Weather Station (ZumWxStn; Lat 45.577745 N, Long 116.971754) had another successful year of operation and complete data for 2012 have just become available. Comparisons data from 2012 from those of previous years (2006-2011), indicate that overall temperatures for 2012 were slightly warmer than average (43.3 F, 6.3 C; Figure 1) and precipitation was marginally lower than average (13.2 in, 35.1 cm; Figure 2). The low temperature of the year was -2 F (-19 C) on December 9th, considerably higher than the record of -20 F (-29 C) recorded on February 2, 2011. The warmest day of 2012 fell on August 7 when the mercury hit 93 F (34 C) which approached the record set on July 7 of 2006 (95 F, 35 C). There were 29 days having at least 0.2 inches (0.5 cm) of precipitation with the largest event occurring the morning of June 26 when 0.6 inches (1.4 cm) of rain fell over the course of five hours.

The year started off cold and wet and precipitation continued above average through March. Unseasonably warm weather (42.3 F, 5.7 C) in April was followed by more typical temperatures but very low precipitation in May and June which limited grass growth. Rains were abundant in early July; storms on the 7th, 13th and 14th each resulted in more than 1/4 in (0.5 cm) of precipitation. After a small amount of rain fell on July 16, no significant precipitation fell again until October 13th (0.1 in, 0.3 cm). Clear summer skies were also accompanied by warm weather with July, August, and September all having temperatures slightly above normal. October had abundant rainfall (1.9 in, 4.9 cm) and was cool. The first significant snowfall on the prairie occurred in early November (the 8th) which was followed by warm temperatures and a mix of rain and snow. The year finished off with seasonally cold temperatures in mid- to late-December and very little snow dashing hopes for a white Christmas.

Summary data tables have been included a the end of this report (see "Tables"). A detailed description of the ZumWxStn can be found in (Hansen et al. 2010) and a summary of long-term climate of the Zumwalt Prairie and nearby areas is provided in (Hansen et al. 2011).

You can learn more about the ZumWxStn, obtain other weather and climate summaries, and download data on the web at:

http://conserveonline.org/workspaces/ZumwaltPrairieWorkspace/documents/weather-station

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Acknowledgments

This data summary would not have been possible without the valiant efforts of our very own J Jones who braved the snow and cold and skied to Summer Camp to download the data. Thank you Justin!

References

- Hansen, J. D., V. S. Jansen, and R. V. Taylor. 2010. Zumwalt Weather and Climate Annual Report (2006-2009). The Nature Conservancy, Enterprise, OR.
- Hansen, J. D., R. V. Taylor, and H. J. Schmalz. 2011. Climate of the Zumwalt Prairie Of Northeastern Oregon from 1930 to Present. The Nature Conservancy, Enterprise, OR.

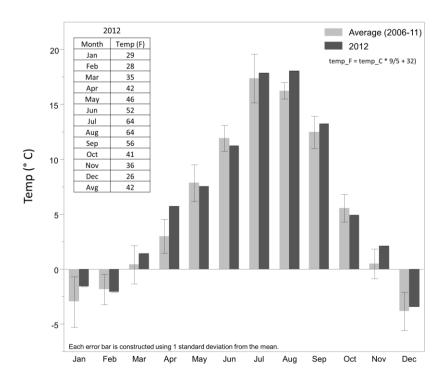


Figure 1. Monthly temperatures at the Zumwalt Weather Station, 2006-2012.

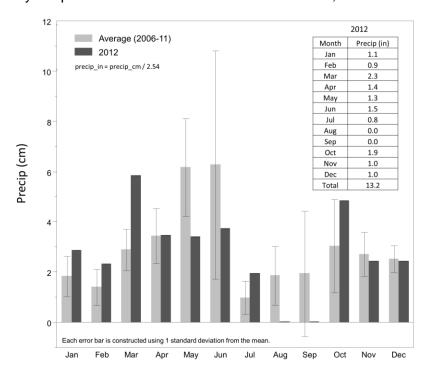


Figure 2. Monthly Precipitation at the Zumwalt Weather Station, 2006-2012.

Table 1. Average Daily Mean Temperature, 2006-2012

	2012		2006-2011		2006-2012	
Month	Avg Temp C	Avg Temp F	Avg Temp C	Avg Temp F	Avg Temp C	Avg Temp F
Jan	-1.6	29.2	-3.0	26.7	-2.8	27.0
Feb	-2.1	28.2	-1.8	28.7	-1.9	28.6
Mar	1.4	34.6	0.4	32.8	0.6	33.0
Apr	5.7	42.3	3.0	37.4	3.4	38.1
May	7.5	45.6	7.9	46.1	7.8	46.1
Jun	11.3	52.3	11.9	53.5	11.8	53.3
Jul	17.9	64.1	17.4	63.3	17.5	63.4
Aug	18.0	64.5	16.3	61.3	16.5	61.8
Sep	13.3	55.9	12.5	54.5	12.6	54.7
Oct	4.9	40.9	5.6	42.0	5.5	41.9
Nov	2.1	35.8	0.5	32.9	0.7	33.3
Dec	-3.5	25.8	-3.8	25.1	-3.8	25.2
Average	6.3	43.3	5.6	42.0	5.7	42.2

Table 2. Average Total Precipitation, 2006-2012

	2012		2006-2011		2006-2012	
Month	Avg Temp C	Avg Temp F	Avg Temp C	Avg Temp F	Avg Temp C	Avg Temp F
Jan	-1.6	29.2	-3.0	26.7	-2.8	27.0
Feb	-2.1	28.2	-1.8	28.7	-1.9	28.6
Mar	1.4	34.6	0.4	32.8	0.6	33.0
Apr	5.7	42.3	3.0	37.4	3.4	38.1
May	7.5	45.6	7.9	46.1	7.8	46.1
Jun	11.3	52.3	11.9	53.5	11.8	53.3
Jul	17.9	64.1	17.4	63.3	17.5	63.4
Aug	18.0	64.5	16.3	61.3	16.5	61.8
Sep	13.3	55.9	12.5	54.5	12.6	54.7
Oct	4.9	40.9	5.6	42.0	5.5	41.9
Nov	2.1	35.8	0.5	32.9	0.7	33.3
Dec	-3.5	25.8	-3.8	25.1	-3.8	25.2
Average	6.3	43.3	5.6	42.0	<i>5.7</i>	42.2