



**'23-'24**  
**Winter**  
**Outlook**

Juan Hernandez – Meteorologist  
NWS Fort Worth

# EL Niño Returns

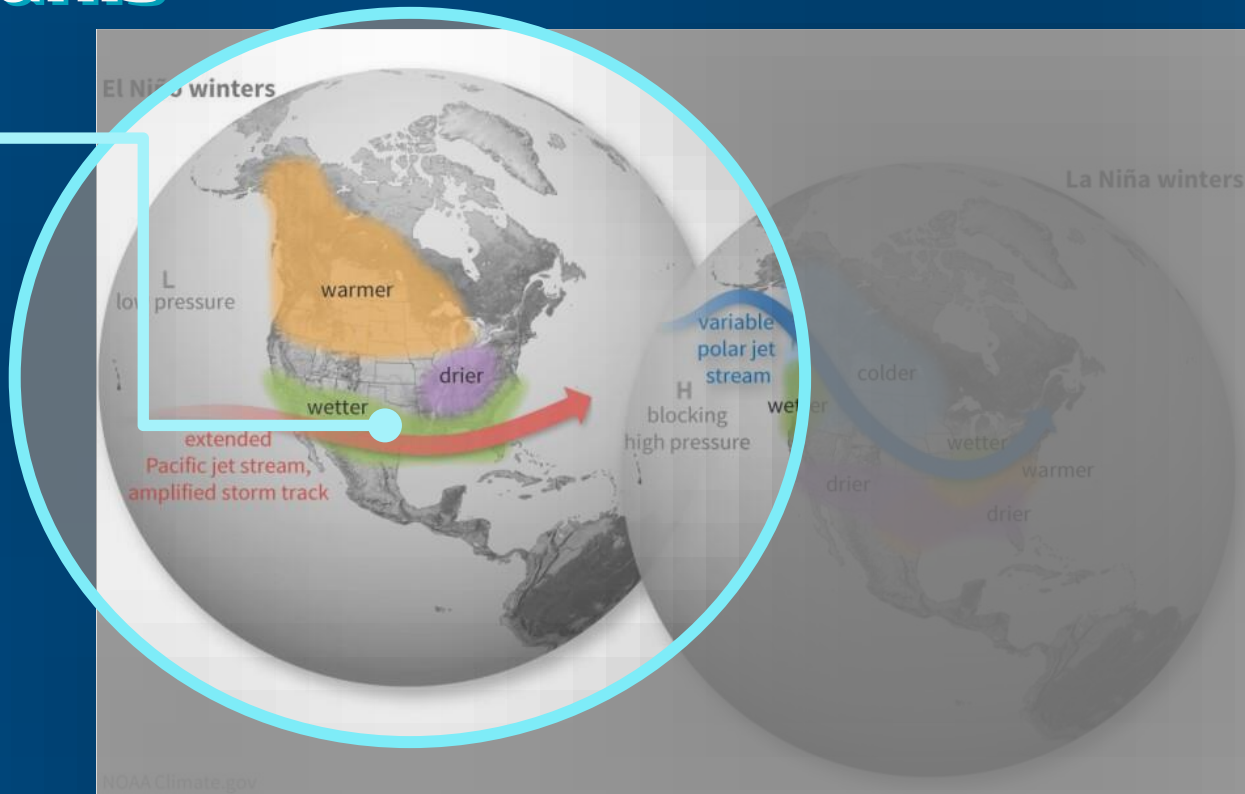


# The Niño Returns



# El Niño Returns

**Wetter  
Than  
Normal**



# What Is An Outlook?



...it doesn't  
attempt to  
predict the  
weather



...provides the  
likelihood of  
above/below  
normal  
precipitation or  
temperatures



...cannot predict  
season snowfall  
amounts



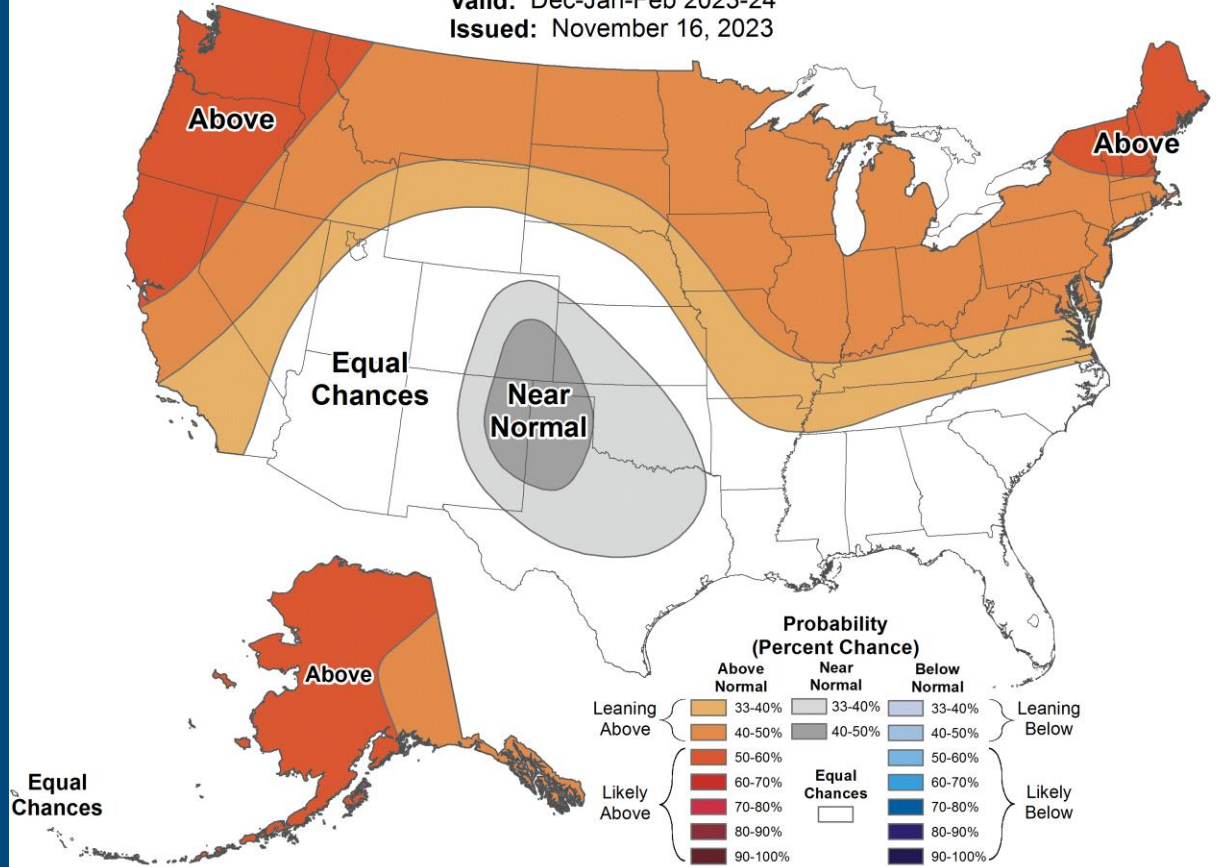
# Winter Outlook - Temperature



## Seasonal Temperature Outlook



Valid: Dec-Jan-Feb 2023-24  
Issued: November 16, 2023



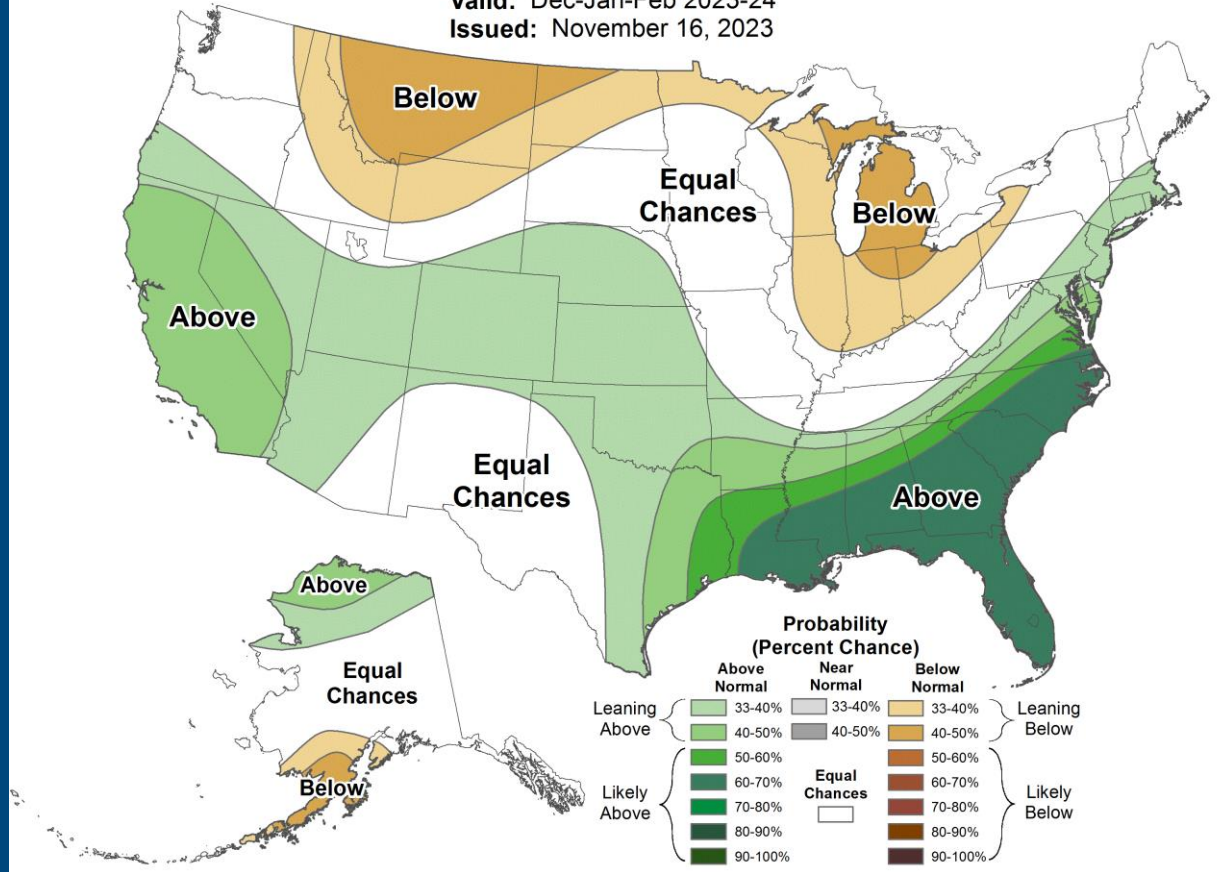
# Winter Outlook - Precipitation



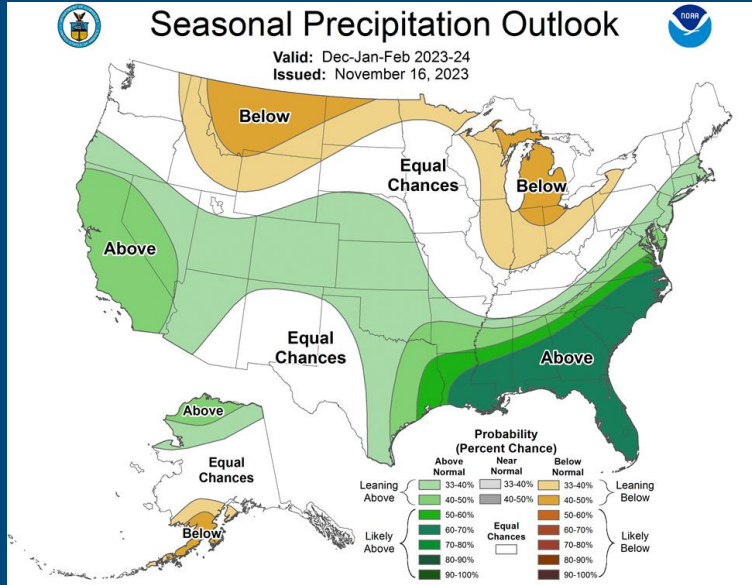
## Seasonal Precipitation Outlook



Valid: Dec-Jan-Feb 2023-24  
 Issued: November 16, 2023



# Winter Outlook - Precipitation



- Does NOT indicate number of winter weather events.
- Winter weather threats assessed daily.

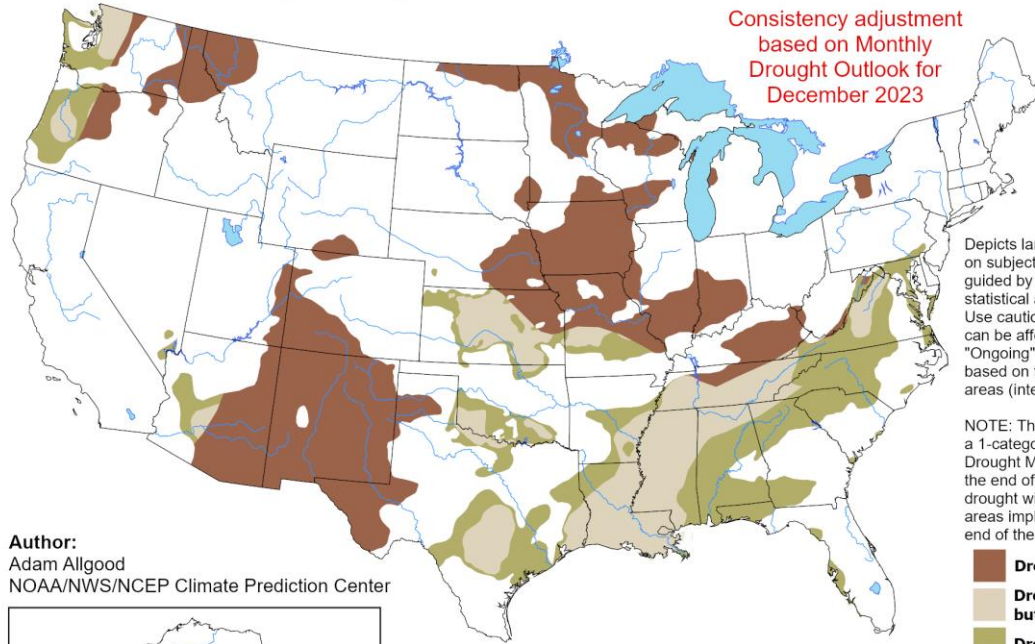


# Winter Outlook - Drought

## U.S. Seasonal Drought Outlook Drought Tendency During the Valid Period

Valid for December 1, 2023 - February 29, 2024  
Released November 30, 2023

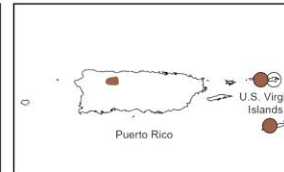
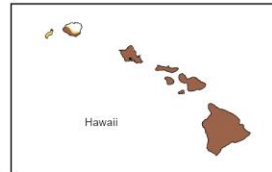
Consistency adjustment  
based on Monthly  
Drought Outlook for  
December 2023



Depicts large-scale trends based on subjectively derived probabilities guided by short- and long-range statistical and dynamical forecasts. Use caution for applications that can be affected by short lived events. "Ongoing" drought areas are based on the U.S. Drought Monitor areas (intensities of D1 to D4).

NOTE: The tan areas imply at least a 1-category improvement in the Drought Monitor intensity levels by the end of the period, although drought will remain. The green areas imply drought removal by the end of the period (D0 or none).

Author:  
Adam Allgood  
NOAA/NWS/NCEP Climate Prediction Center



- Drought persists
- Drought remains, but improves
- Drought removal likely
- Drought development likely
- No drought



<https://go.usa.gov/3eZ73>

# So, what does that mean?

**Mostly This...**



**...but some of this too.**



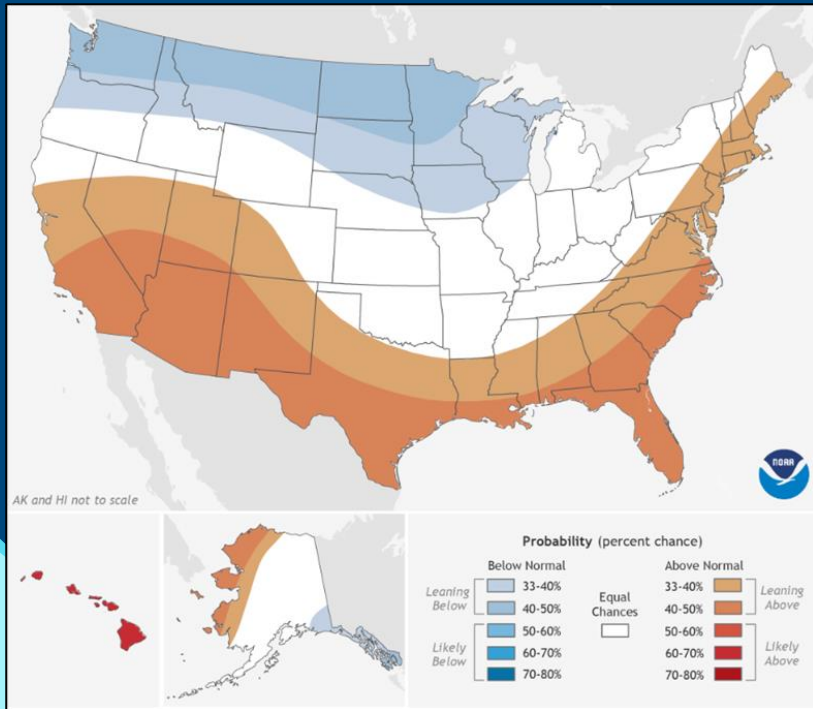


**'22-'23**

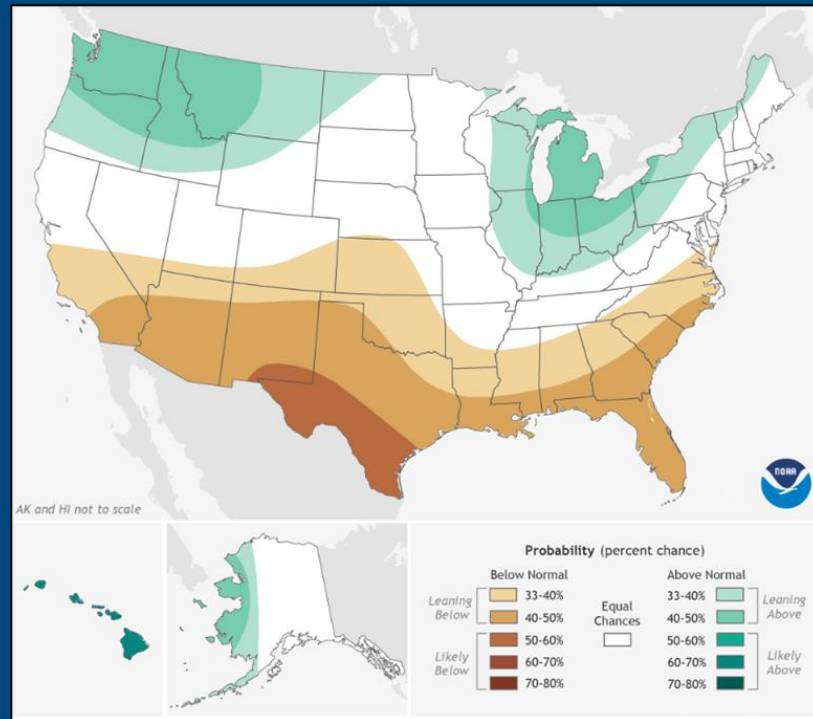
**Review**

# 2022-2023 Review

## Temperature



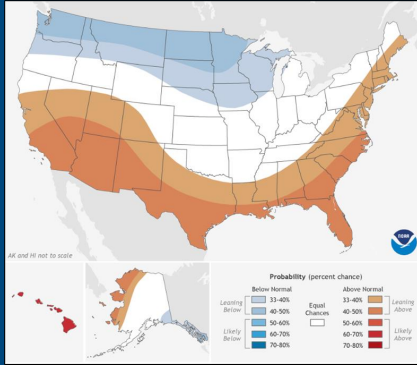
## Precipitation



# 2022-2023 Review

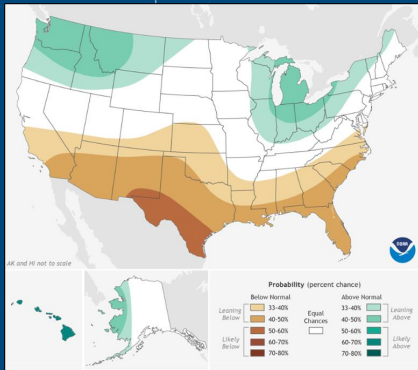


## Temperature



Average:  $51.6^{\circ}$  (+ $3.4^{\circ}$ )  
Average High:  $62.2^{\circ}$  (+ $3.8^{\circ}$ )  
Average Low:  $41.3^{\circ}$  (+ $3.1^{\circ}$ )

## Precipitation



Precipitation:  $7.74''$  (- $.39''$ )  
Snowfall:  $1.3''$  (0)



# Let's Look At The Past

The last “strong” El Niño was 2015-2016.

- Seasonal averages were similar to 2021-2022 (La Niña)
- Slightly below normal precipitation

Don't assume “strong” El Niño means much colder and more wintry precipitation...there's still a lot of variability!

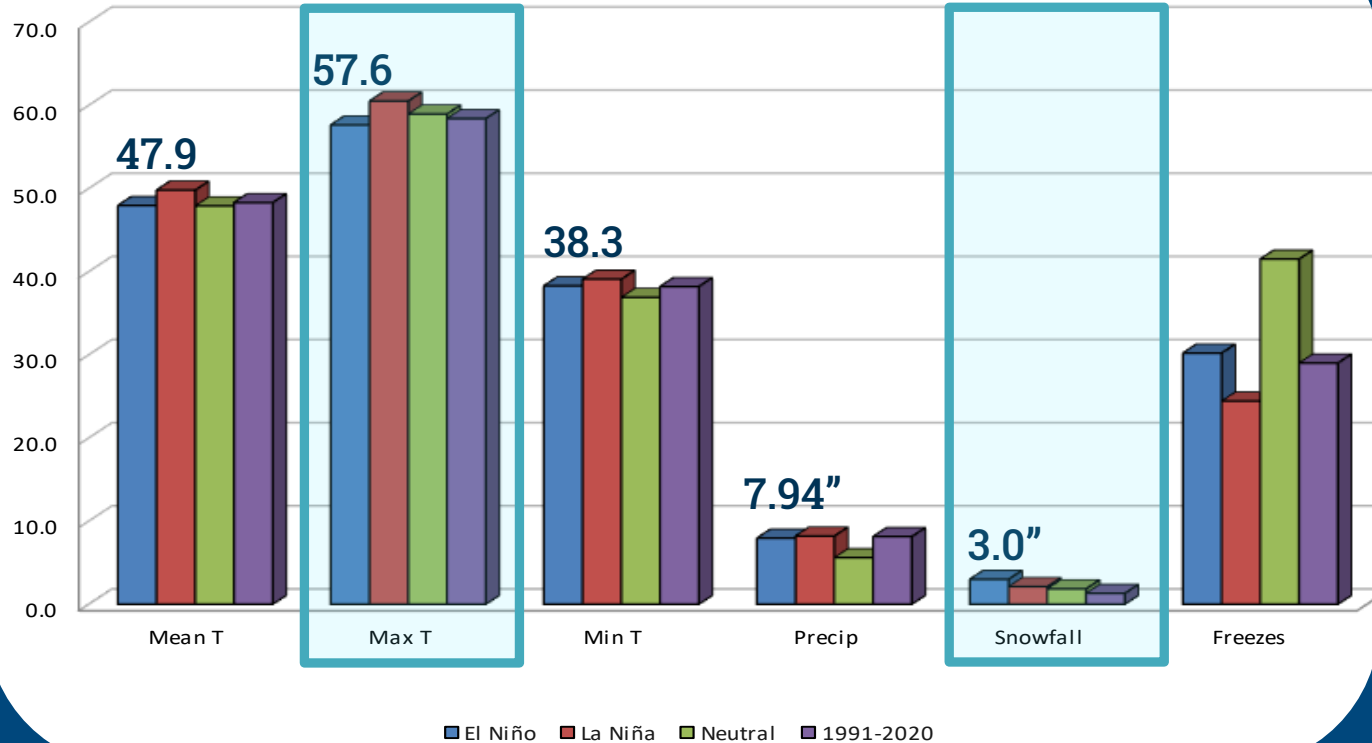


# Climate Statistics

5 El Niño Winters Since 2010

\*Snow stats do not include the near-record 17.1" snowfall in the El Niño winter of 2009-2010

## Winter 2009-2023 Comparisons (Averages): DFW





**Climate  
Highlights**

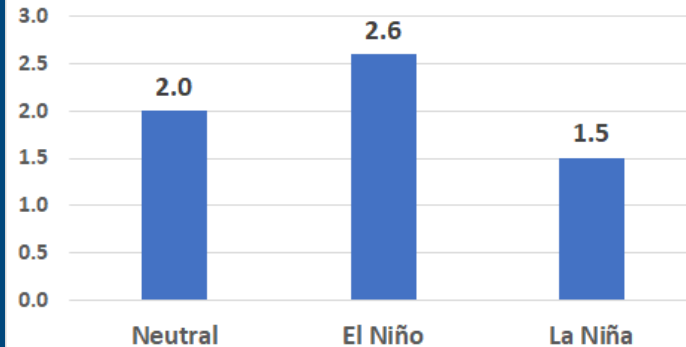




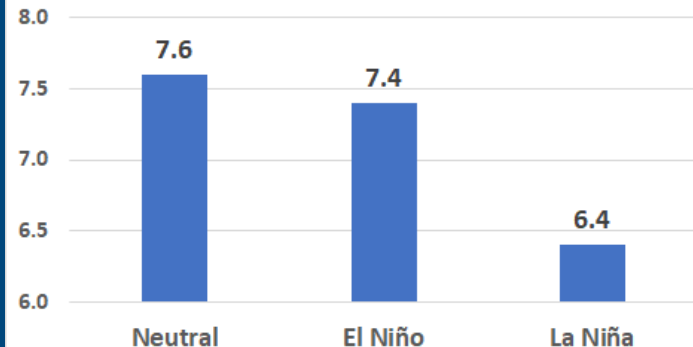
# Climate Highlights: Wintry Precipitation

Since the late 1800, the DFW Metroplex has received some type of wintry precipitation EVERY YEAR!

DFW - Days with Measurable Snowfall

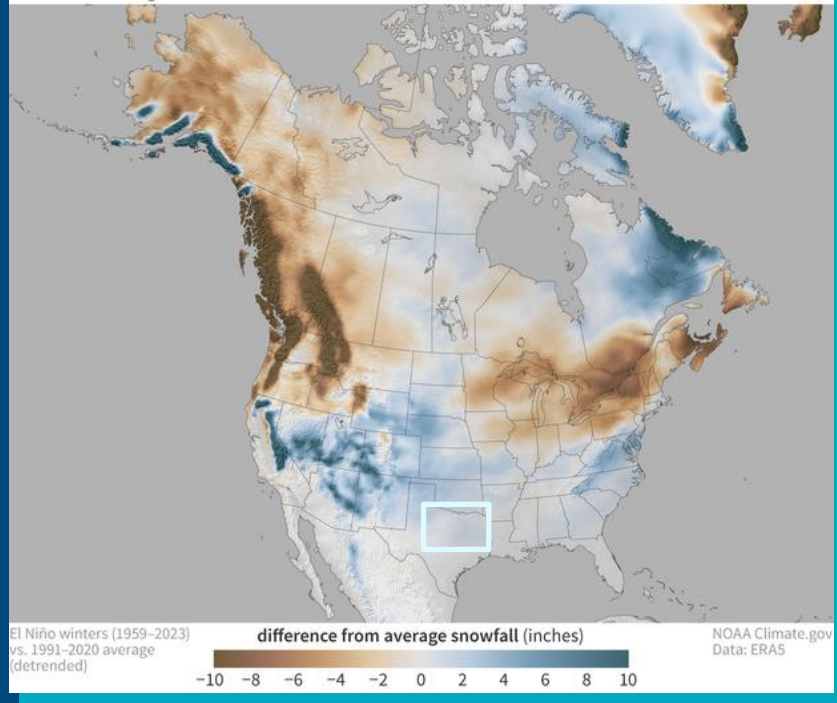


DFW - Days with Any Wintry Precipitation



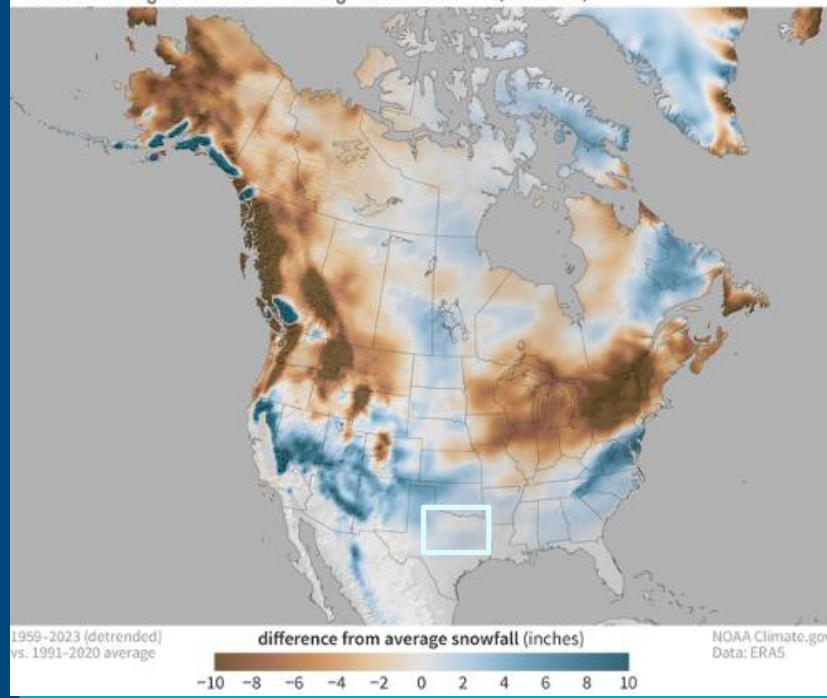
# Snowfall – All El Niño Years

Snowfall during all El Niño winters (Jan-Mar)



# Snowfall – Moderate to Strong El Niño Years

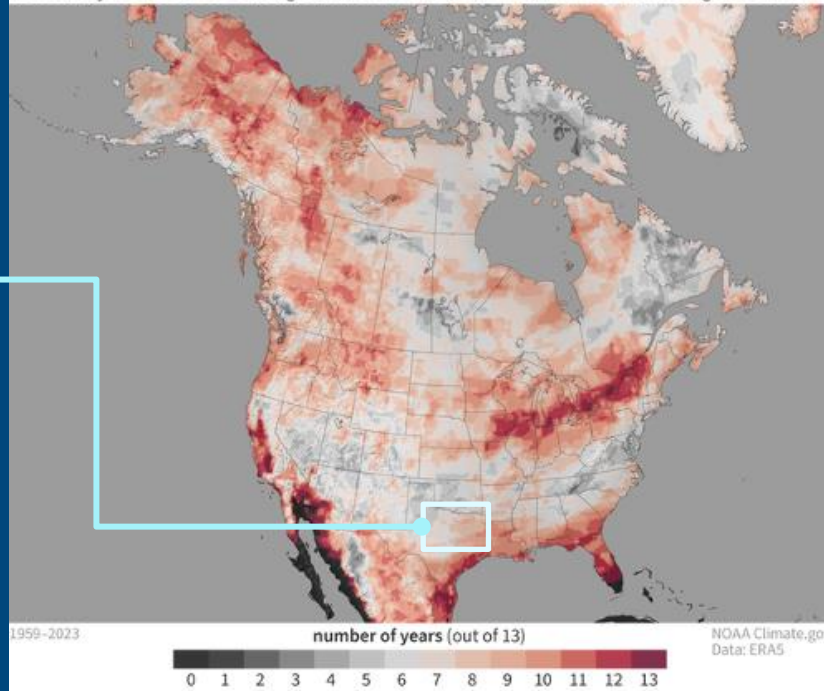
Snowfall during moderate-to-strong El Niño winters (Jan-Mar)



# Snow Is Flakey!

7+ of the last 13 moderate – strong El Niño years have had below average snowfall.

How many moderate-to-strong El Niño winters (Jan-Mar) had below-average snowfall?



# Snow Is Flakey!

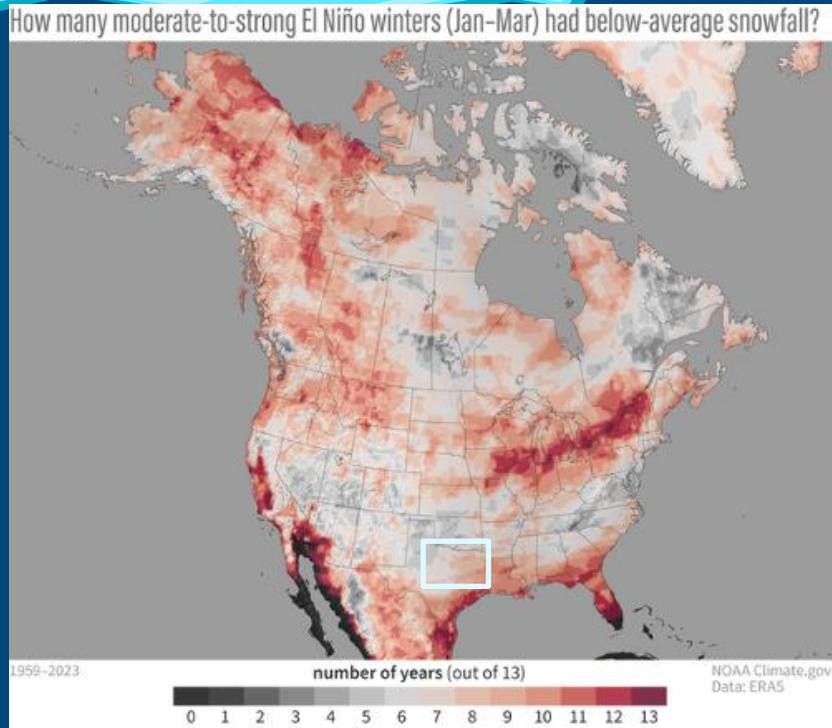
Other factors and global patterns affect the more immediate forecast.

## Arctic Oscillation

- Can result in cold air deliveries into the Southern Plains.

## Pacific Decadal Oscillation

- Can offset the influence of ENSO depending on phase.





# '23-'24 Winter Outlook

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[Juan.Hernandez@noaa.gov](mailto:Juan.Hernandez@noaa.gov)



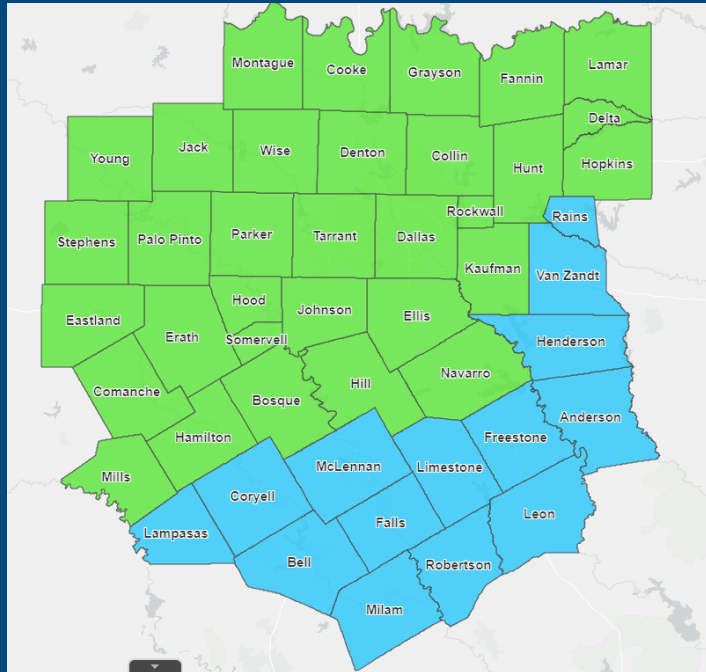
**REMINDERS**



**Winter Storm  
Watch/Warning  
Criteria**



# Winter Storm Watch/Warning Criteria



## Watch/Warning Criteria

- ❄️ Snow – 3 inches or more
- ❄️ Ice – ¼ inch or more
- ❄️ Sleet – ½ inch or more
- ❄️ Impacts pose a significant threat to society

# Ice Storm Warning

## Criteria



- ❄ Significant impacts to power infrastructure are expected due to ice weighing down trees and powerlines.
- ❄  $\frac{1}{2}$ " or more and light winds
- ❄  $\frac{1}{4}$ " or more with sustained winds  $>15$  mph



**New  
Email  
Address**



**nws.fortworth@noaa.gov**



# **nws.fortworth@noaa.gov**


- All mass communication emails will be sent from [nws.fortworth@noaa.gov](mailto:nws.fortworth@noaa.gov)
- Need any changes or have questions; reply to sender -- [nws.fortworth@noaa.gov](mailto:nws.fortworth@noaa.gov)



# Email Formatting

- New email address was used last week (Wed. 11/29)
- Formatting Issues?

## What We See



**Weather Forecast Office  
Fort Worth, TX**


**Bottom Line**  
A few strong to severe thunderstorms will be possible late Thursday morning through Thursday afternoon, primarily along/east of I-35 and south of Highway 84 (south and east of an Athens-Mexia-Temple line). Isolated tornadoes will be the primary hazard.

**Overview**

- The environment will support a few strong to severe storms across portions of eastern Central Texas and the Brazos Valley.
  - Isolated tornadoes will be the primary concern, but damaging wind gusts and marginally severe hail will be possible as well.
  - Main time frame of concern is 11 AM - 6 PM Thursday.
- There is a low threat for isolated severe hail across North Texas.
- Scattered showers, possibly a few thunderstorms, will develop primarily along/east of I-35 late tonight into early Thursday morning.
- More widespread showers and thunderstorms are expected to develop late Thursday morning through Thursday afternoon.
- Precipitation will exit to the east late Thursday evening.
- Areas along/east of I-35 will likely see 0.5-1.5" of rainfall through Thursday evening with localized 2"+ totals possible, especially across our far eastern zones.

**Areas of Concern and Impacts**

## What You See?



**Weather Forecast Office  
Fort Worth, TX**

**Bottom Line**  
A few strong to severe thunderstorms will be possible late this morning through this afternoon across eastern North and Central Texas. There is a low chance for hail up to 1" in diameter primarily east of I-35 and a low chance for isolated tornadoes and damaging wind gusts across the Brazos Valley.

**What has Changed Since The Last Email:**  
Not very much but the best severe and tornado threat has pushed a little farther south and more out of our area.

**Overview**

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# Email Formatting

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Fort Worth, TX

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Fort Worth, TX

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How are you viewing your email?

Gmail – Outlook – Microsoft – Apple



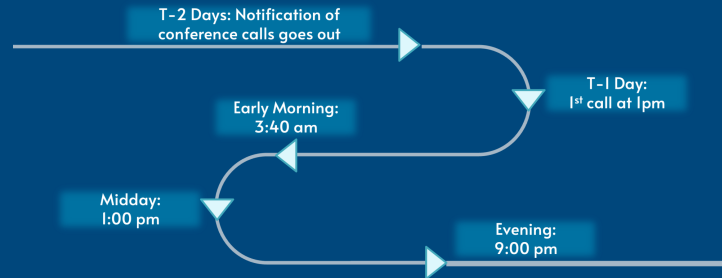
**Winter Weather  
Conference  
Calls**





# Winter Weather Conference Calls Timeline

No changes to the conference call rhythm





# Winter Weather Conference Calls Timeline

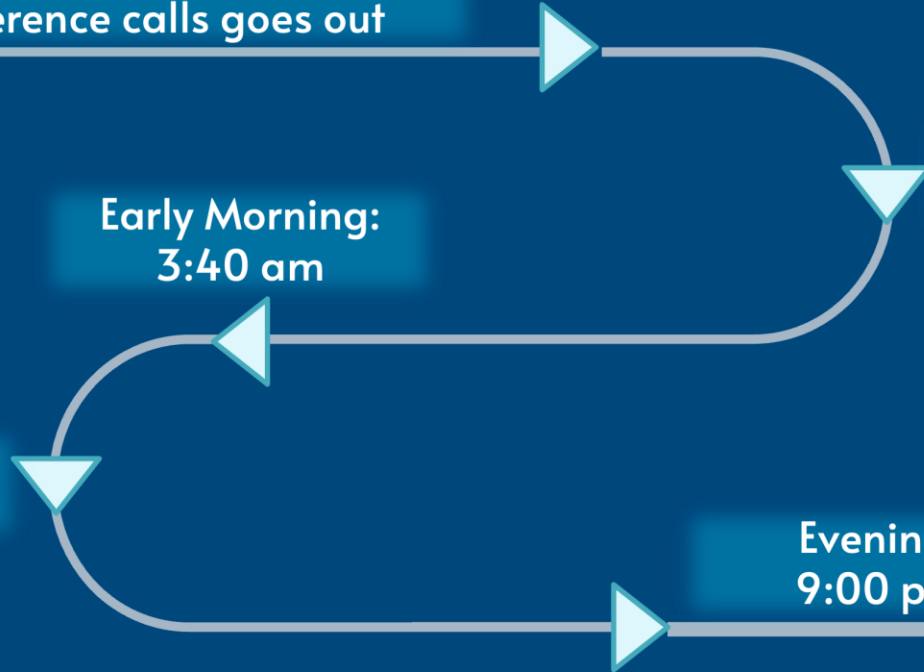
T-2 Days: Notification of  
conference calls goes out

T-1 Day:  
1<sup>st</sup> call at 1pm

Early Morning:  
3:40 am

Midday:  
1:00 pm

Evening:  
9:00 pm



# Winter Weather Dashboard

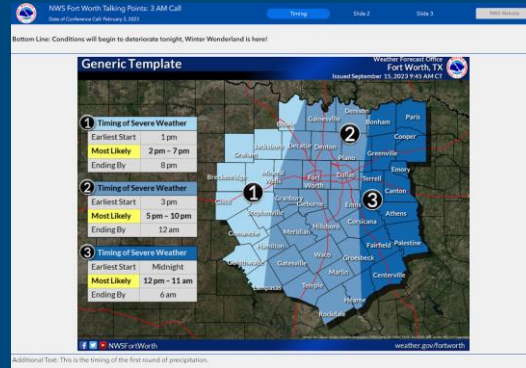


## Conference Calls Scheduled

Updated: November 5, 2023 8:00 PM CT

## Conference Call Times

Date	Time
11/13/2023	1:00 PM
11/13/2023	7:00 PM
11/14/2023	3:00 AM





**Partner  
Website**





**Meteorological  
Winter Is Upon  
Us**



**Good Luck!**



**Thank You!**

**Juan Hernandez**  
**[juan.Hernandez@noaa.gov](mailto:juan.Hernandez@noaa.gov)**