



# TROPICAL UPDATE

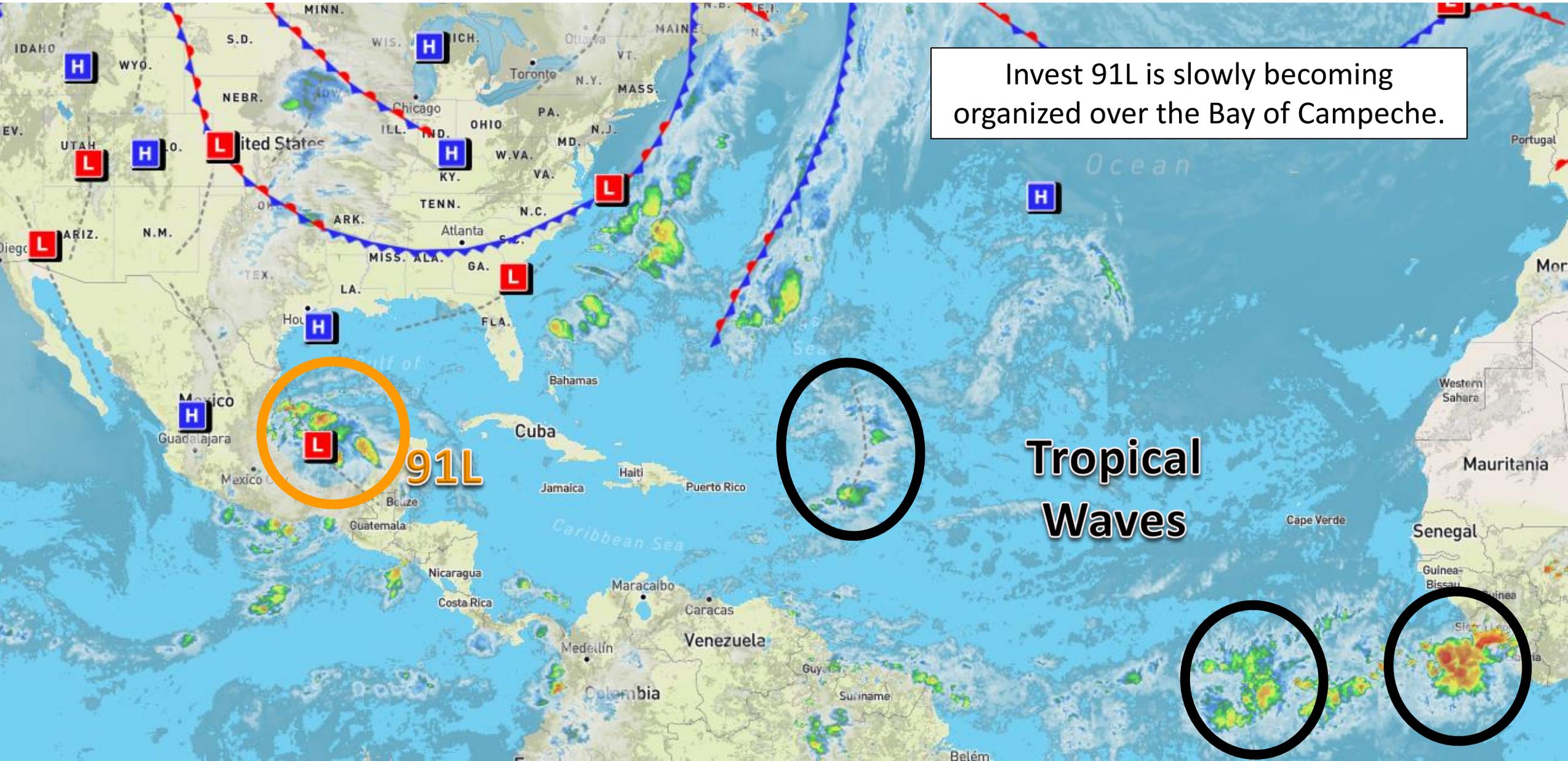
2 PM EDT

Monday, June 3, 2019

Invest 91L (60%)

This update is intended for government and emergency response officials, and is provided for informational and situational awareness purposes only. Forecast conditions are subject to change based on a variety of environmental factors. For additional information, or for any life safety concerns with an active weather event please contact your County Emergency Management or Public Safety Office, local National Weather Service forecast office or visit the National Hurricane Center website at [www.nhc.noaa.gov](http://www.nhc.noaa.gov).

# Atlantic Basin Satellite Image



Invest 91L is slowly becoming organized over the Bay of Campeche.

91L

Tropical Waves

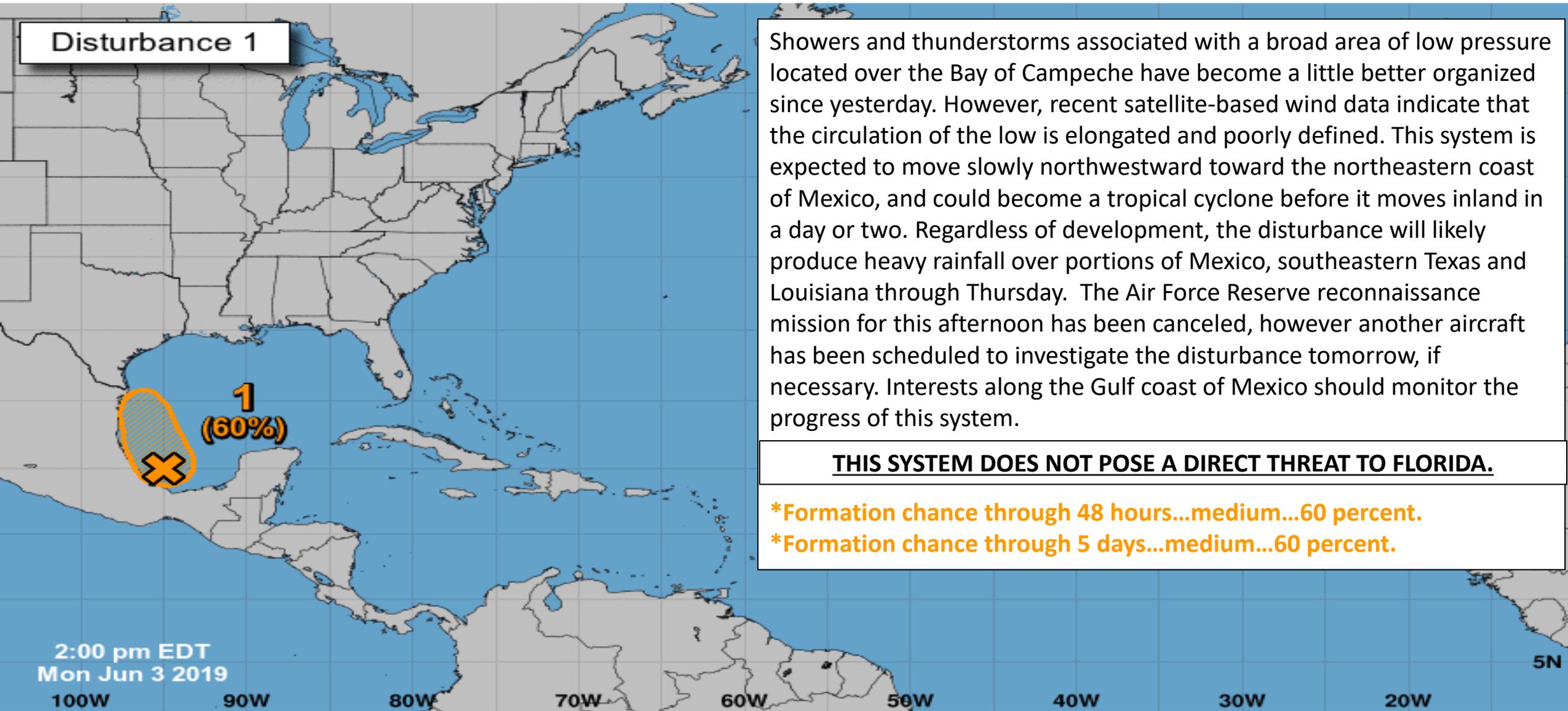


# Five-Day Graphical Tropical Weather Outlook

National Hurricane Center Miami, Florida



Disturbance 1



2:00 pm EDT  
Mon Jun 3 2019

100W 90W 80W 70W 60W 50W 40W 30W 20W 5N

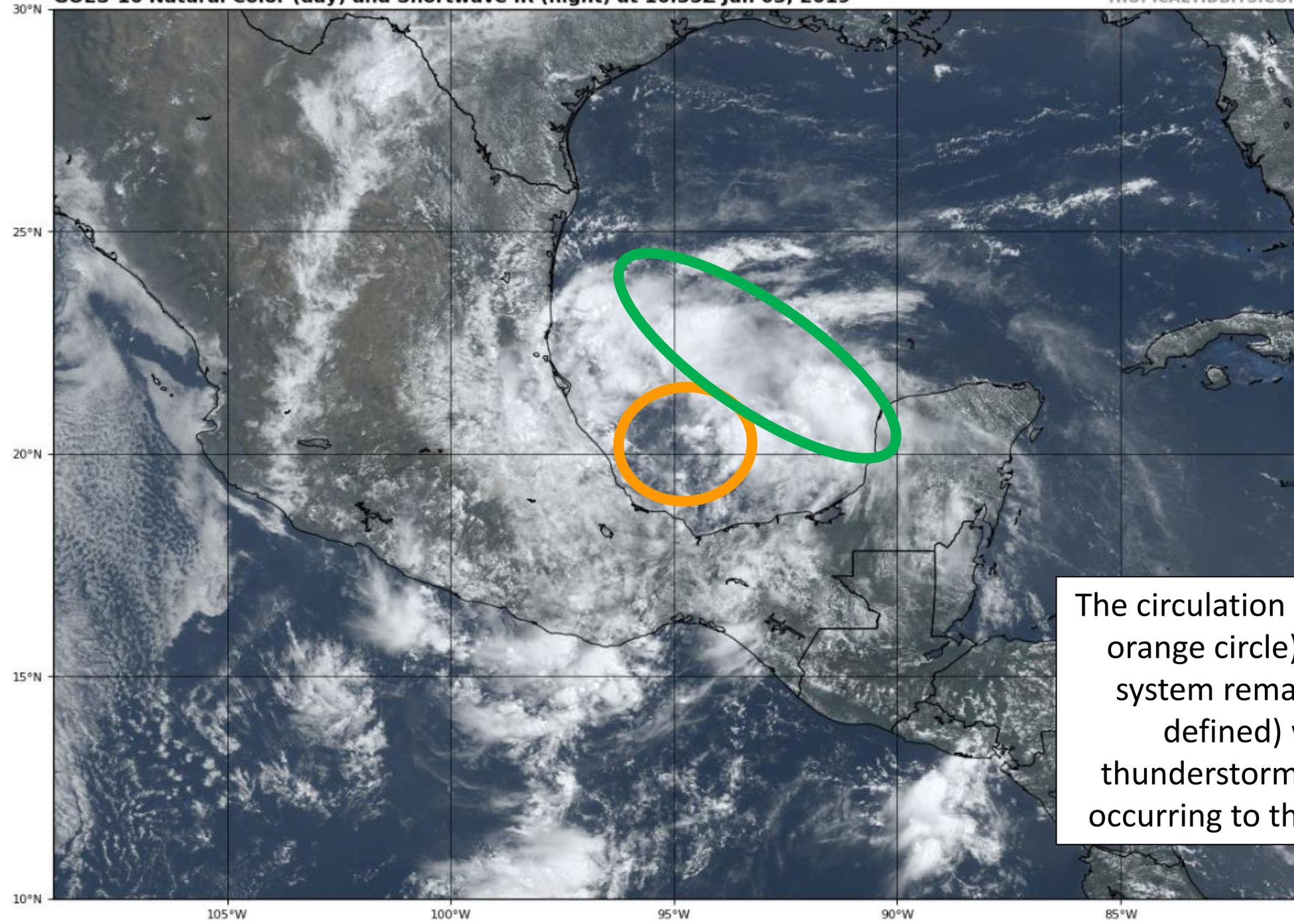
Showers and thunderstorms associated with a broad area of low pressure located over the Bay of Campeche have become a little better organized since yesterday. However, recent satellite-based wind data indicate that the circulation of the low is elongated and poorly defined. This system is expected to move slowly northwestward toward the northeastern coast of Mexico, and could become a tropical cyclone before it moves inland in a day or two. Regardless of development, the disturbance will likely produce heavy rainfall over portions of Mexico, southeastern Texas and Louisiana through Thursday. The Air Force Reserve reconnaissance mission for this afternoon has been canceled, however another aircraft has been scheduled to investigate the disturbance tomorrow, if necessary. Interests along the Gulf coast of Mexico should monitor the progress of this system.

**THIS SYSTEM DOES NOT POSE A DIRECT THREAT TO FLORIDA.**

\*Formation chance through 48 hours...medium...60 percent.  
\*Formation chance through 5 days...medium...60 percent.

Current Disturbances and Five-Day Cyclone Formation Chance: < 40% 40-60% > 60%  
Tropical or Sub-Tropical Cyclone: Depression Storm Hurricane  
 Post-Tropical Cyclone or Remnants

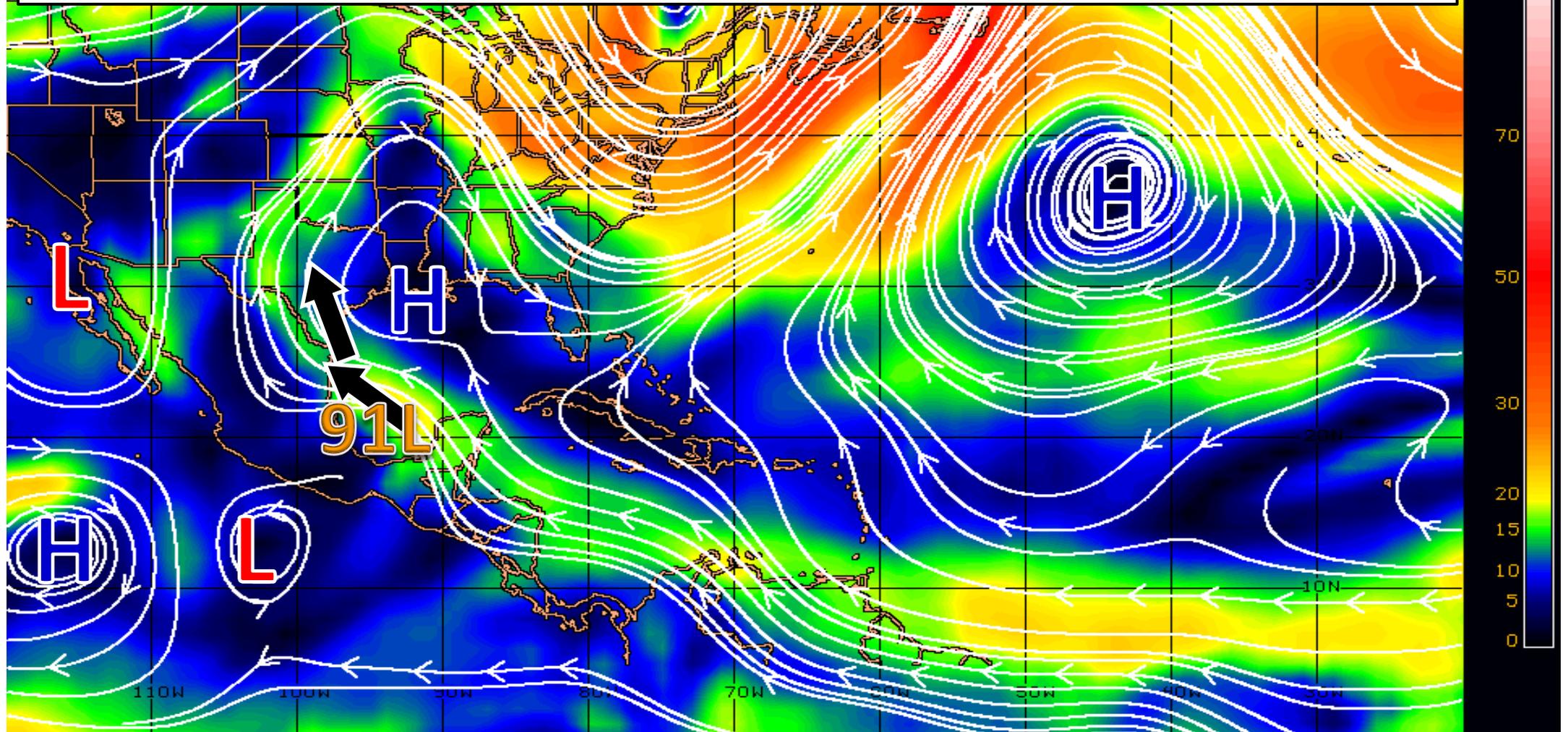
# 91L Satellite Image



The circulation (approximate center is orange circle) of the low pressure system remains broad (not well-defined) with most of the thunderstorm activity (green oval) occurring to the north of the center.

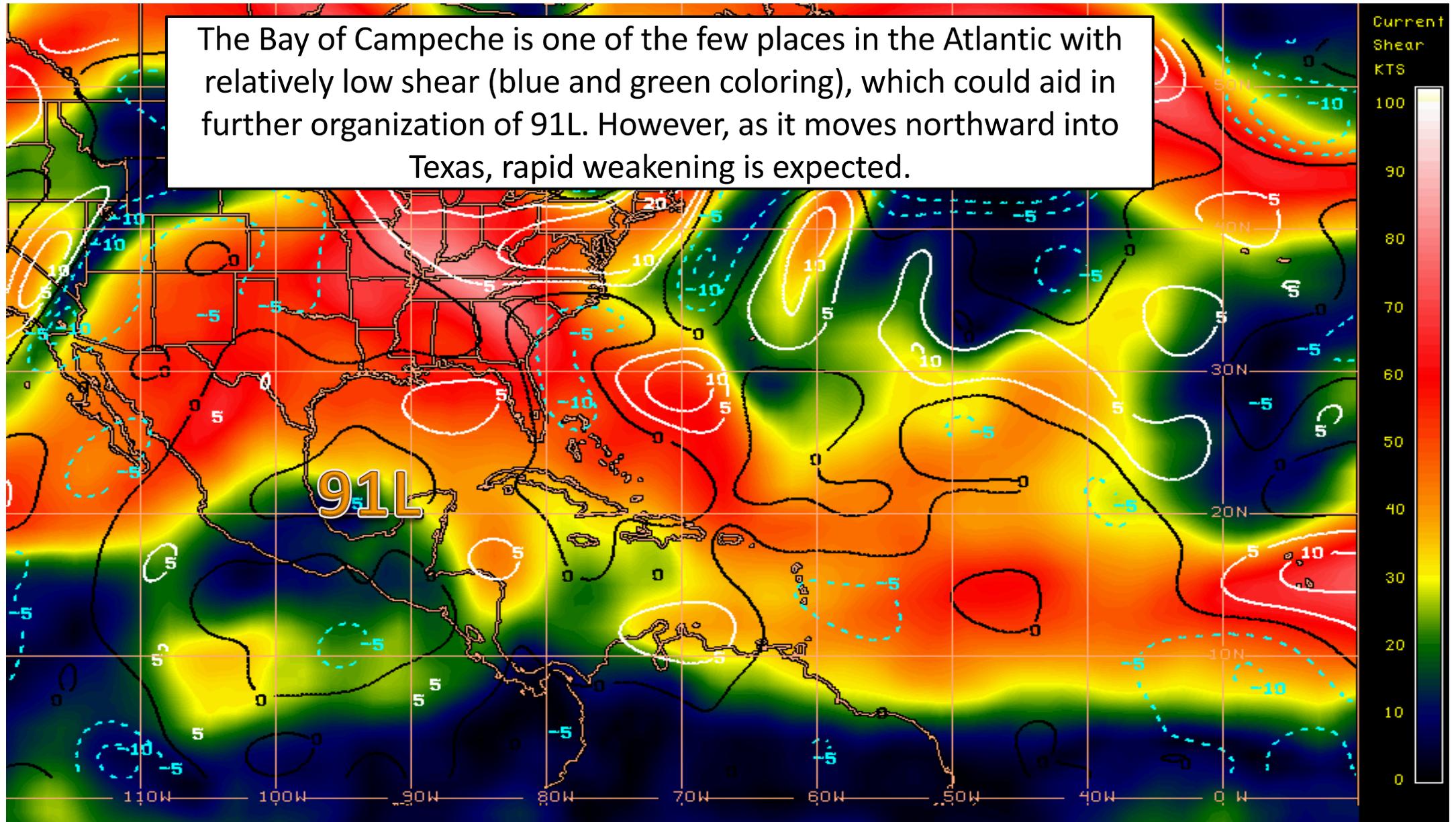
# Steering Currents

A strong high pressure system over much of the Atlantic extends into the Gulf of Mexico. This same high that is bringing the heat to Florida will keep 91L on its northwestward track towards northeastern Mexico and southeastern Texas. An area of low pressure near southern California will bring the remnants moisture from 91L northward into the Southern Plains later this week.



# Wind Shear (shaded) and Wind Shear Tendencies (contoured)

The Bay of Campeche is one of the few places in the Atlantic with relatively low shear (blue and green coloring), which could aid in further organization of 91L. However, as it moves northward into Texas, rapid weakening is expected.



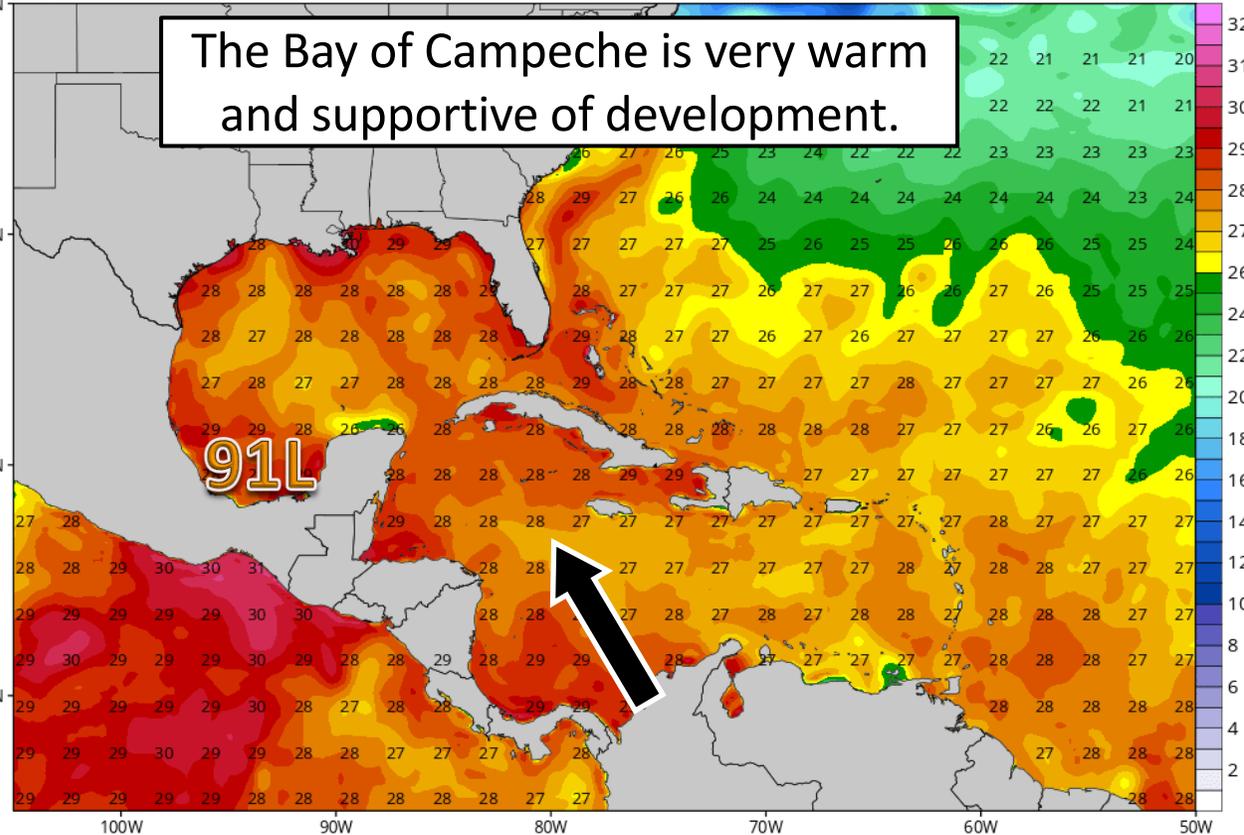
Shear Tendency (KTS) Over Past 24 Hours: Increasing — Decreasing - - - -

# Current Sea Surface Temperatures

CDAS Sea Surface Temperature (°C)

Analysis Time: 06z Jun 03 2019

TROPICALTIDBITS.COM



The Bay of Campeche is very warm and supportive of development.

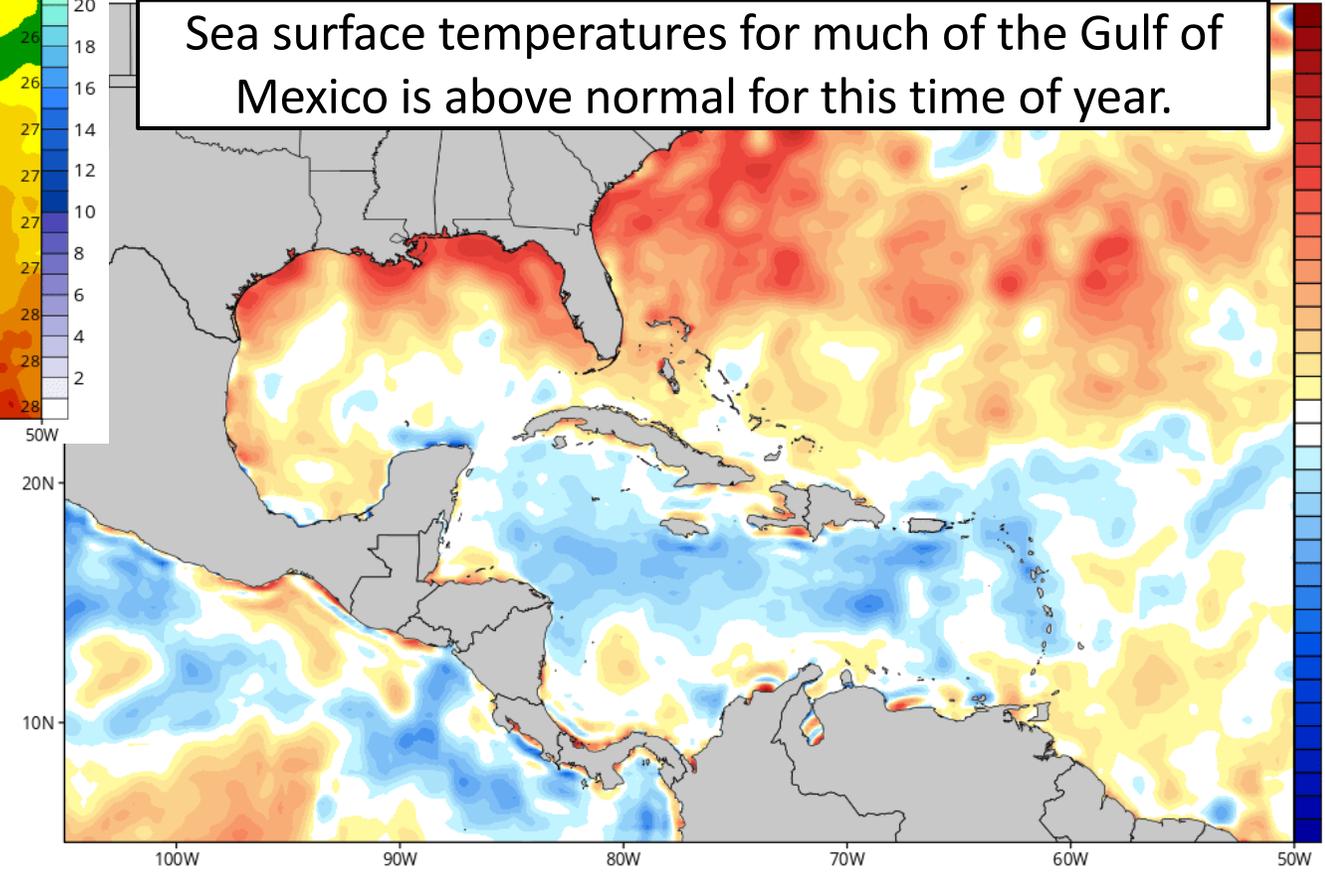
91L



S Sea Surface Temperature Anomaly (°C) (based on CFSR 1981-2010 Climatology)

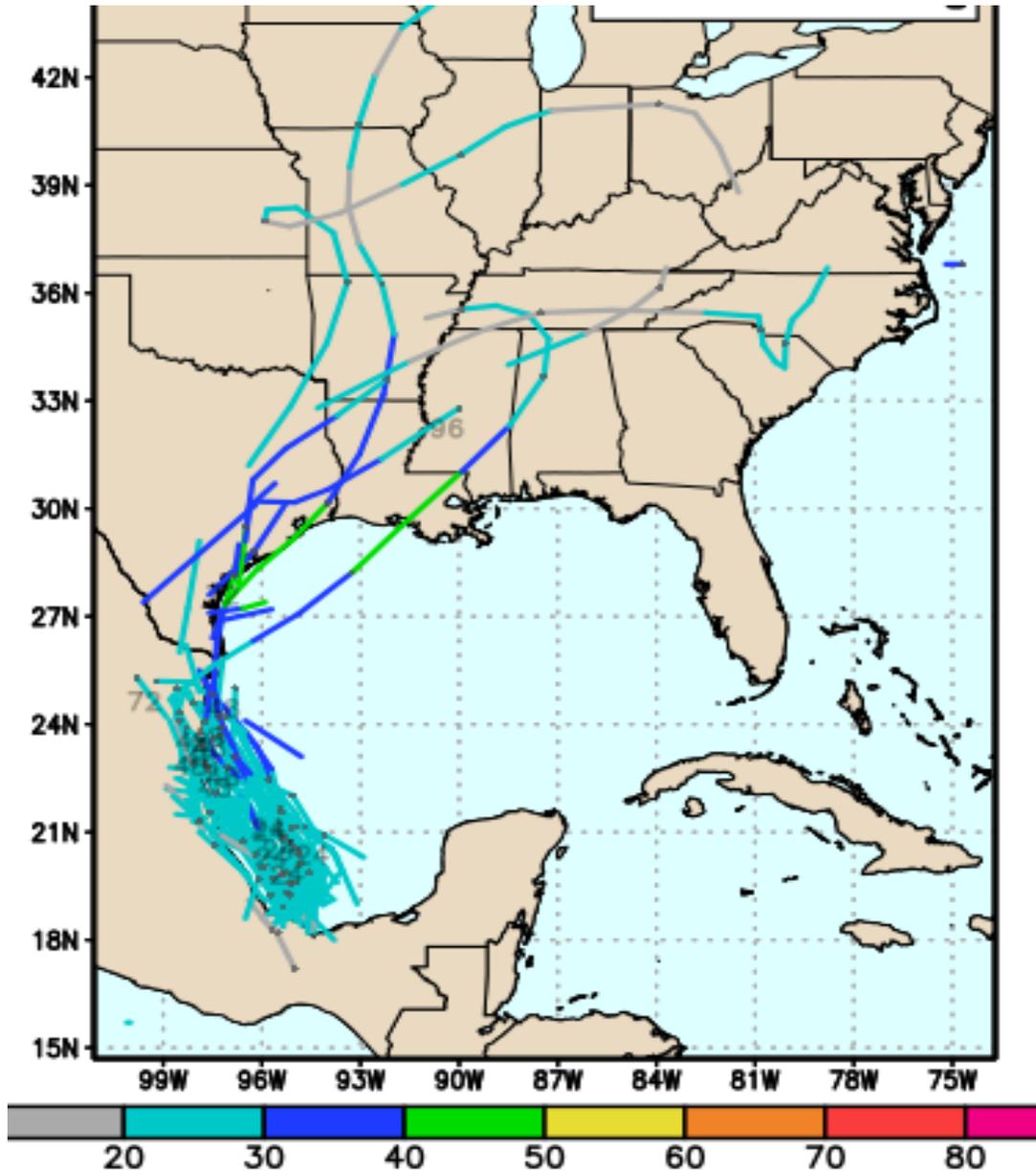
Analysis Time: 06z Jun 03 2019

TROPICALTIDBITS.COM



Sea surface temperatures for much of the Gulf of Mexico is above normal for this time of year.

# Current Forecast Ensemble Model Guidance



The vast majority of available computer models keep this system near the Mexican East Coast and dissipating as it moves inland near the Texas/Mexico border in 48-72 hours.

However, there is a small chance the system stays offshore until reaching Texas, which would allow more organization or it could be pulled more northeast into Louisiana.

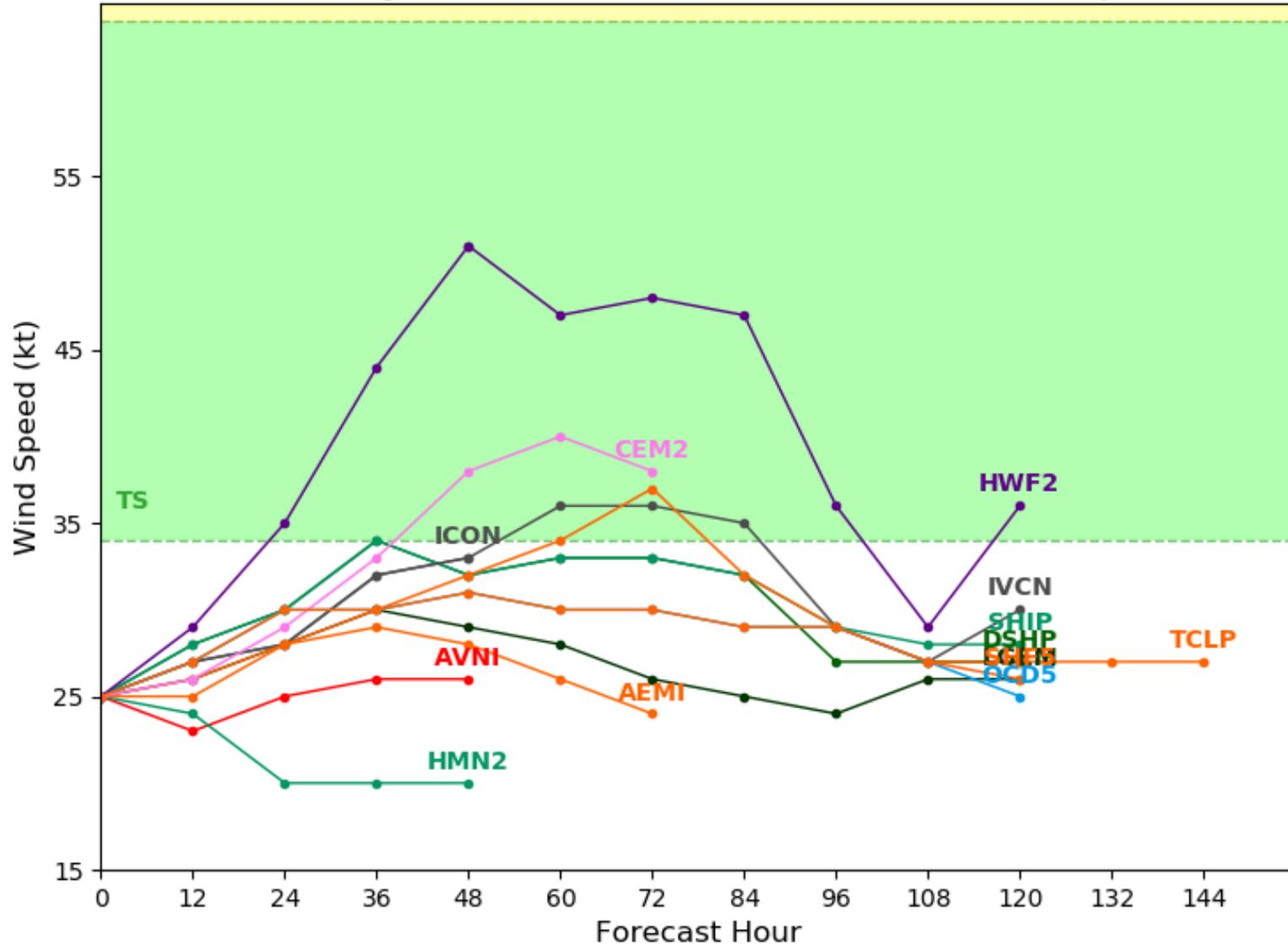
According to the current guidance, if the system stays weak or takes longer to organize, it is more likely to move into Mexico or southern Texas and dissipate. If the system were to organize rapidly, a more northward movement towards the western U.S. Gulf Coast (TX/LA) would be possible.

# Current Model Intensity Forecast

## Invest 91L Model Intensity Guidance

Initialized at 12z Jun 03 2019

Levi Cowan - tropicaltidbits.com



Most of these models keep it below tropical storm strength at this time due to the close proximity to land and short duration over water. If the system stays offshore longer and approaches Texas it will be stronger (like the purple model shows).

# Summary

- Invest 91L is located over the Bay of Campeche and is producing disorganized showers and thunderstorms. While the system is slightly more organized than yesterday, the system still lacks a defined center of circulation.
- As a result, the Hurricane Hunter reconnaissance flight for today was canceled, but another flight is scheduled for tomorrow if the system continues to organize.
- There remains a **60% (medium) chance** that this system could become a depression or storm within the next 5 days due to favorable atmospheric and oceanic conditions. The system will only be over water for the next 2 or 3 days before moving inland.
- If this system reaches tropical storm intensity, the next name on the list is Barry. Otherwise it will be Tropical Depression #2.
- 91L is expected to move northwest over the next couple days along the east coast of Mexico and move inland near the Texas/Mexico border in 48-72 hours. However, the system could get pulled more north-northeastward toward eastern Texas or southwest Louisiana.

## Florida Outlook:

- **No direct impacts to Florida are expected at this time.**
- If the system were to move closer to Louisiana, remnant moisture could bring beneficial rain to portions of the Southeast U.S. this weekend as well as increase in rip currents.
- There are no other areas of possible development in the Atlantic Basin for at least the next five days.

The next briefing packet will be issued Tuesday afternoon. For the latest information on the tropics, please visit the National Hurricane Center website at [www.hurricanes.gov](http://www.hurricanes.gov).



# TROPICAL UPDATE

Created by:

Amy Godsey, Chief State Meteorologist

[Amy.Godsey@em.myflorida.com](mailto:Amy.Godsey@em.myflorida.com)

State Meteorological Support Unit

Florida Division of Emergency Management

Users wishing to subscribe (approval pending) to this distribution list, register at [https://public.govdelivery.com/accounts/FLDEM/subscriber/new?topic\\_id=SERT\\_Met\\_Tropics](https://public.govdelivery.com/accounts/FLDEM/subscriber/new?topic_id=SERT_Met_Tropics).

Other reports available for subscription are available at <https://public.govdelivery.com/accounts/FLDEM/subscriber/new?preferences=true>