

GUIDE TO ARTIS ATLANTIC BASIN SUMMARY REPORTS

Summary of Basin Activity

Top-level summary of Atlantic basin seasonal activity to date.

Basin Counts

Time series showing seasonal evolution of tropical storms, hurricanes and major hurricanes.

Count	Description
Tropical storms	Named tropical cyclones with max winds of at least 39 mph .
Hurricanes	Named storms with winds that have further strengthened to reach or exceed 74 mph .
Major Hurricanes	Intense hurricanes with winds at or exceeding 111 mph , rating CAT3 to CAT5 on the Saffir-Simpson scale.

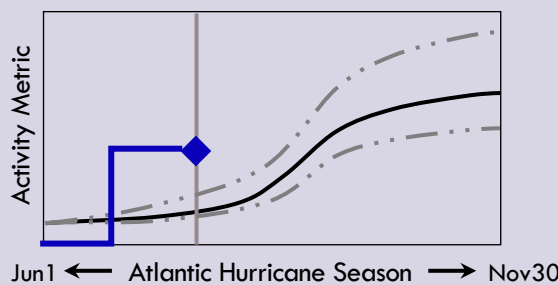
Accumulated Cyclone Energy

Accumulated cyclone energy (ACE) measures total wind energy produced over the life cycle of a tropical cyclone. Seasonal ACE measures the combined ACE of all storms observed so far this season. Impact ACE (ACE-I) measures ACE that has come within 150 miles of the U.S. coastline.

Rapid Intensification Frequency

Rapid Intensification Frequency (RIF) sums total occurrences of RI episodes across all named storms. RI is defined as an increase in max winds of 35 mph or more within a 24-hour period.

Key to Time Series Graphs



- ◆ Latest observed value
- Observed since June 1st
- | Current Day in Season
- Long-term average value
- NOAA seasonal forecast range

ARTIS Atlantic Basin Summary Report

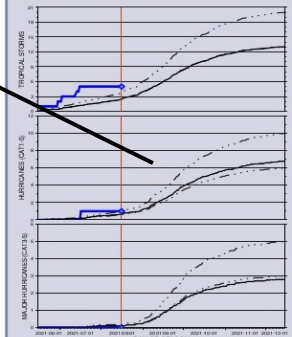
Basin Activity and Short-Range Outlook
 Aeolus Real-Time Information Service
 Report Generated: Sat 26 Jun 2021 04:00:25 PM EDT



Summary of Basin Activity

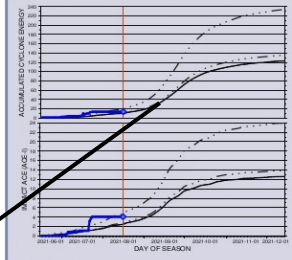
The Atlantic Hurricane Season officially kicked off on June 1st, 2021 and is currently underway with a total of 5 tropical storms and one hurricane so far this season.
 There are currently no tropical systems threatening the U.S. with landfall over the next five days.

Basin Counts



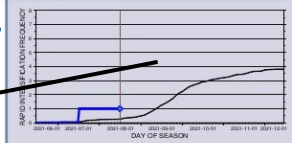
So far this season, there have been 5 tropical storms (top), one hurricane (middle) and no major hurricanes (bottom). Graphs compare observed counts (blue) to seasonal averages of 2.46 tropical storms, 0.88 hurricanes and 0.10 major hurricanes (black). Graphs also show the NOAA seasonal forecast range (dotted).

Accumulated Cyclone Energy (ACE)



Accumulated Cyclone Energy (ACE) totals $13.41 \times 10^8 \text{ ft}^2$ for all named systems (blue), as compared to the long-term average of $10.28 \times 10^8 \text{ ft}^2$ expected at this point in the season (black). Impact ACE (bottom) totals $4.08 \times 10^8 \text{ ft}^2$, compared to the long-term average of $2.52 \times 10^8 \text{ ft}^2$.

Rapid Intensification (RI) Frequency



There has been one rapid intensification (RI) episode amongst all named storms in 2021 (blue). This compares to the long-term average of 0.27 episodes (black) expected at this point in the Atlantic season.

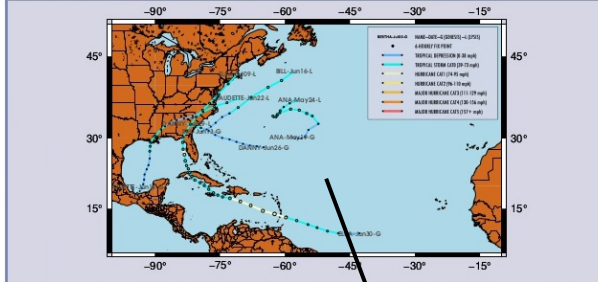
2021 Atlantic Hurricane Season Scorecard

Storm Name	CAT	ACE	ACE-I	Storm Name	CAT	ACE	ACE-I	Storm Name	CAT	ACE	ACE-I
ANA	S0	1.01	0.00	Hanni				Quinta			
BILL	S0	1.08	0.09	Isla				Rita			
CLAUDETTE	S0	1.28	0.76	Julian				Rita			
DANNY	S0	0.34	0.24	Kate				Sam			
ELSA	H1	9.61	2.98	Larry				Tanya			
Fred				Mindy				Victor			
Grove				Nicholas				Wanda			

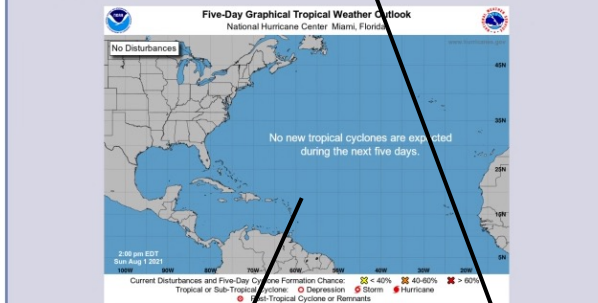
The chart below compares current activity to the average as of this day in the Atlantic season. The first three columns show counts of tropical storms, hurricanes and major hurricanes, followed by RI frequency, seasonal ACE, and seasonal ACE-I. ACE-I denotes the portion of wind energy produced within 150 miles of the U.S. coastline. The first column shows observed values as of 01 Aug. The second and third columns show the long-term average and the standard deviation from average. The next column shows the number of standard deviations from average. Values more than one standard deviation above or below the average are shown in red and blue respectively, excluding averages < 1. The Pace column designates the day of season corresponding to the current pace of activity.

Activity Metric	As of 01 Aug	Average 01 Aug	Deviation From Avg	Standard Deviations	Pace by Climatology	Seasonal Average
Tropical Storms	5	2.46	+2.54	+1.05	2.5 Aug	13.1
Hurricanes	1	0.88	+0.32	+0.47	1.5 Aug	6.8
Major Hurricanes	0	0.10	-0.10	NA	NA	2.8
RI Frequency	1	0.27	+0.73	+1.01	28 Aug	3.8
Seasonal ACE	13.41	10.28	+3.13	+0.24	08 Aug	123.0
Seasonal ACE-I	4.08	2.52	+1.56	+0.64	21 Aug	12.6

Seasonal Track Map and 5-Day Outlook



The map above shows tropical cyclone tracks and intensities for storms named so far in the 2021 Atlantic Hurricane Season. Tracks are labeled with storm name followed by the date of genesis (starting) point labeled -G and lysis (terminating) point labeled -L. An active storm's current position is labeled with -L.



The map above shows potential TC development based on conditions expected over the next 5 days. Regions highlighted in red indicate development potential is less than 40%, in orange between 40-60% and in yellow over 60%. (Source: rhc.noaa.gov)

Short-Range Outlook

Map showing NHC's 5-day outlook for tropical conditions in the Atlantic. Active storms and hurricanes are shown along with areas of disturbed weather showing signs of development. Disturbances with high probability of development (>60%) highlighted in red, moderate probability (40-60%) in orange, low probability (<40%) in yellow.

Seasonal Track Map

The seasonal track map shows tracks and intensities of all storms, active and inactive, observed so far this season. 6-hourly 'fix points' are colored based on maximum wind intensity at that location. Tracks are labeled with the storm's name, at the beginning of the track (the 'genesis point') with the date of genesis (such as -25Jun-G) and at the end of the track (the 'lysis point') with the date of dissipation (such as -02-Jul-L). Active storms indicated in the outlook map below will show an end-point at the storm's last observed position.

Season Scorecard

Named storms and hurricanes observed so far this season with comparisons to long-term averages. Includes ACE and RIF activity metrics.

Observed Named Storms	Event Name	CAT	ACE	ACE-I
	ANA	S0	1.01	0.00
	BILL	S0	1.58	0.09
Future Storm Names	Claudette			

Maximum Category Achieved
 S0 = CAT0/Tropical Storm
 H1 = CAT1/Hurricane
 H2 = CAT2/Hurricane
 H3 = CAT3/Major Hurricane
 H4 = CAT4/Major Hurricane
 H5 = CAT5/Major Hurricane

ACE Value for this Event
 ACE Impact Value for this Event

Metric	Description
As of Date	Observed value of activity metric as of reporting date
Average 'As of' Date	Long-term average value of activity metric as of this day in season
Deviation from Average	Difference between observed and average value as of this day
Standard Deviations	Number of standard deviations from average value as of this day. NA for counts less than 1.0.
Pace by Climatology	Pace of current metric according to climatology (day on which one expects this metric value)
Seasonal Average	Average metric value expected as of November 30 (end of season)