

## **Launch Mission Execution Forecast**

Mission: Falcon 9 Starlink 6-5

**Issued**: 9 July 2023 / 0845L (1245Z)

**Valid**: 9 July 2023 / 2016 – 10/0019L (10/0016 – 0419Z)



**Forecast Discussion**: It's a quieter start to the morning across Central Florida, but it will not remain that way for long under abundant sunshine. In a familiar pattern from this week, storms will fire up along the Gulf coast and push eastwards into the Spaceport by early afternoon along with any locally developing activity. Like the past few days, a few strong storms are not out of the question along with heavy rain. With the later start to activity, some showers and storms may still be ongoing in the vicinity as the primary launch window opens this evening around sunset. Convection will end or push offshore shortly thereafter, leaving leftover clouds that will dissipate through the late evening launch window with improving weather conditions.

An upper-level disturbance will swing through the area on Monday, also bringing a weak surface front into North Florida. While timing of showers and storms won't be too dissimilar to today, the infusion of a little more energy to the atmosphere brings a few more stronger storms and keeps activity going later into the evening. This will lead to better chances for weather violations as the backup window opens Monday evening. Conditions will slowly improve through the window, though likely not as quickly as on Sunday.

	Probability of Violating Weather Constraints <sup>1</sup>							
Day	<b>50%</b> → <b>10%</b>	Primary Concerns: Anvil Cloud Rules, Surface Electric Fields Rule, Cumulus Cloud Rule						
Launch	Weather Conditions						Additional Risk Criteria <sup>2</sup>	
	Weather/Visibility:	Isold Storms / 7 mi.	Туре	Clouds Coverage	Base (ft)	Tops (ft)	Upper-Level Wind Shear:	Low
	Temp/Humidity:	81°F / 88%	Cumulus	Scattered	3,000	9,000	Booster Recovery Weather:	Low
	Liftoff Winds (200'):	220° 7 - 12 mph	Cirrostratus	Broken	18,000	25,000	Solar Activity:	Low
,	Probability of Violating Weather Constraints							
Delay	75%→20% Primary Concerns: Anvil Cloud Rules, Surface Electric Fields Rule, Cumulus Cloud Rule							
	Weather Conditions						Additional Risk Criteria	
-Hour	Weather/Visibility:	Sct Storms / 7 mi.	Туре	Clouds Coverage	Base (ft)	Tops (ft)	Upper-Level Wind Shear:	Low
24	Temp/Humidity:	83°F / 78%	Cumulus	Scattered	3,500	12,000	Booster Recovery Weather:	Low
	Liftoff Winds (200'):	240° 10 - 15 mph	Cirrostratus	Broken	20,000	27,000	Solar Activity:	Low
Notes	1. The Probability of Violation (PoV) is the chance of a local safety or customer constraint violation occurring any random time during the launch windo 2. Additional Risk Criteria, which are not included in the PoV, are mission-specific constraints that may not include all phenomena within each risk factors.							
ž	See <a href="https://www.patrick.spaceforce.mil/Portals/14/Weather/LaunchFAQ.pdf">https://www.patrick.spaceforce.mil/Portals/14/Weather/LaunchFAQ.pdf</a> for more information							
Next Forecast Will Be Issued As Needed								_