



Launch Mission Execution Forecast



Mission: Falcon 9 Turksat-6A

Issued: 7 Jul 2024 / 0930L (1330Z)

Valid: 8 Jul 2024 / 1720 – 2114L (2120 – 09/0114Z)

Forecast Discussion: Weak ridging over the spaceport will bring muggy conditions and below normal precipitation chances on Sunday. For both Monday and Tuesday, the ridge is expected to shift south of the spaceport, bringing weak southwesterly winds and coastal afternoon thunderstorms to the Cape. Some of these storms may produce 40 mph or greater winds. Convective activity should taper off after sunset, but steering winds are expected to be weak, possibly extending any weather violations that occur. Conditions are expected to be similar for the backup day. The Cumulus Cloud, both Anvil Cloud, and Surface Electric Fields are the most likely rules to violate on both the primary and backup days.

Launch Day		Probability of Violating Weather Constraints ¹				
Launch Day	70%	Primary Concerns: Cumulus Cloud Rule, Anvil Cloud Rules, Surface Electric Fields Rule				
	Weather Conditions			Additional Risk Criteria ²		
	Weather/Visibility: Sct TS / 7 mi.	Clouds			Upper-Level Wind Shear: Low	
	Temp/Humidity: 83°F / 80%	Type	Coverage	Base (ft)	Tops (ft)	Booster Recovery Weather: Low
Liftoff Winds (200'): 190° 8 - 13 mph	Cumulus	Scattered	3,000	15,000	Solar Activity: Low	
	Cirrus	Broken	25,000	29,000		
24-Hour Delay		Probability of Violating Weather Constraints				
24-Hour Delay	70%	Primary Concerns: Cumulus Cloud Rule, Anvil Cloud Rules, Surface Electric Fields Rule				
	Weather Conditions			Additional Risk Criteria		
	Weather/Visibility: Sct TS / 7 mi.	Clouds			Upper-Level Wind Shear: Low	
	Temp/Humidity: 82°F / 80%	Type	Coverage	Base (ft)	Tops (ft)	Booster Recovery Weather: Low
Liftoff Winds (200'): 220° 9 - 14 mph	Cumulus	Scattered	3,000	16,000	Solar Activity: Low	
	Cirrus	Broken	25,000	29,000		
Notes	<ol style="list-style-type: none"> The Probability of Violation (PoV) is the chance of a local safety or customer constraint violation occurring any random time during the launch window. Additional Risk Criteria, which are not included in the PoV, are mission-specific constraints that may not include all phenomena within each risk factor. 					
	See https://www.patrick.spaceforce.mil/Portals/14/Weather/LaunchFAQ.pdf for more information					
Next Forecast Will Be Issued		AS REQUIRED				