Summary of Launch Weather Rules for Ares I-X

Do not launch if the wind at the launch pad exceeds 20 knots.

Do not launch if the temperature at the launch pad exceeds 95 degrees F, or is below 36 degrees F.

Do not launch through precipitation, or clouds containing precipitation.

Do not launch through upperlevel conditions containing wind shear that may lead to vehicle control problems.

Do not launch through or within five nautical miles of a cloud layer greater than 4,500 feet thick that extends into freezing temperatures, unless other specified criteria have been met.

Do not launch through or within five nautical miles of cumulus clouds with tops that extend into freezing temperatures, unless specified conditions and distances can be met.

Do not launch within 10 nautical miles of the edge of a thunderstorm that is producing lightning strikes for 30 minutes after the final lightning strike has been observed.

Do not launch for 30 minutes after lightning is observed within 10 nautical miles of the launch pad or the flight path, unless specified conditions can be met.



NASA/Kim Shiflett

The Ares I-X rocket is stacked in the Vehicle Assembly Building at NASA's Kennedy Space Center.

Do not launch if field mill instrument readings within five nautical miles of the launch pad or the flight path exceed +/- 1,500 volts per meter for 15 minutes after they occur, or +/- 1,000 volts per meter if specified criteria can be met.

Do not launch through a thunderstorm anvil cloud. If the cloud is within 10 nautical miles of the flight path, do not launch for 30 minutes after the last lightning strike has been observed.

Do not launch through thunderstorm detached anvil clouds or debris clouds for up to three hours, unless specified field mill measurements and radar requirements are met.

Do not launch within 10 nautical miles for 30 minutes after anvil detachment has occurred, or after the last lightning strike has been observed in the detached anvil.

Do not launch through disturbed weather with clouds

that extend into freezing temperatures and contain moderate or greater precipitation.

Do not launch within five nautical miles of disturbed weather within the flight path, unless specified criteria can be met.

Do not launch through clouds formed as the result of or directly attached to a smoke plume.