

Go For Launch: Lift Off in California

Chris Shieff

22 February, 2022



On February 25, Space X is planning to launch its Falcon 9 rocket from Vandenberg Space Force Base - 100nm (ish) north of Los Angeles.

It will carry no less than fifty satellites (yes fifty) into Earth's lower orbit. As a result, **three aircraft hazard areas** will be established which may affect oceanic traffic in the **Eastern Pacific**, along with some of the **Pacific Organised Track System (PACOTS)**. Here's a brief rundown of the potential impact.

Primary and Back Up Launch Days

Lift-off is planned for Feb 25. However, the period of Feb 26 - Mar 1 is also designated as a back-up.

While the launch itself will be short-lived, the window for each attempt is quite long - almost five hours. The exact timings vary each day, but will extend from early morning until early afternoon (Pacific Standard Time).

Here's a rundown of the airspace to look out for.

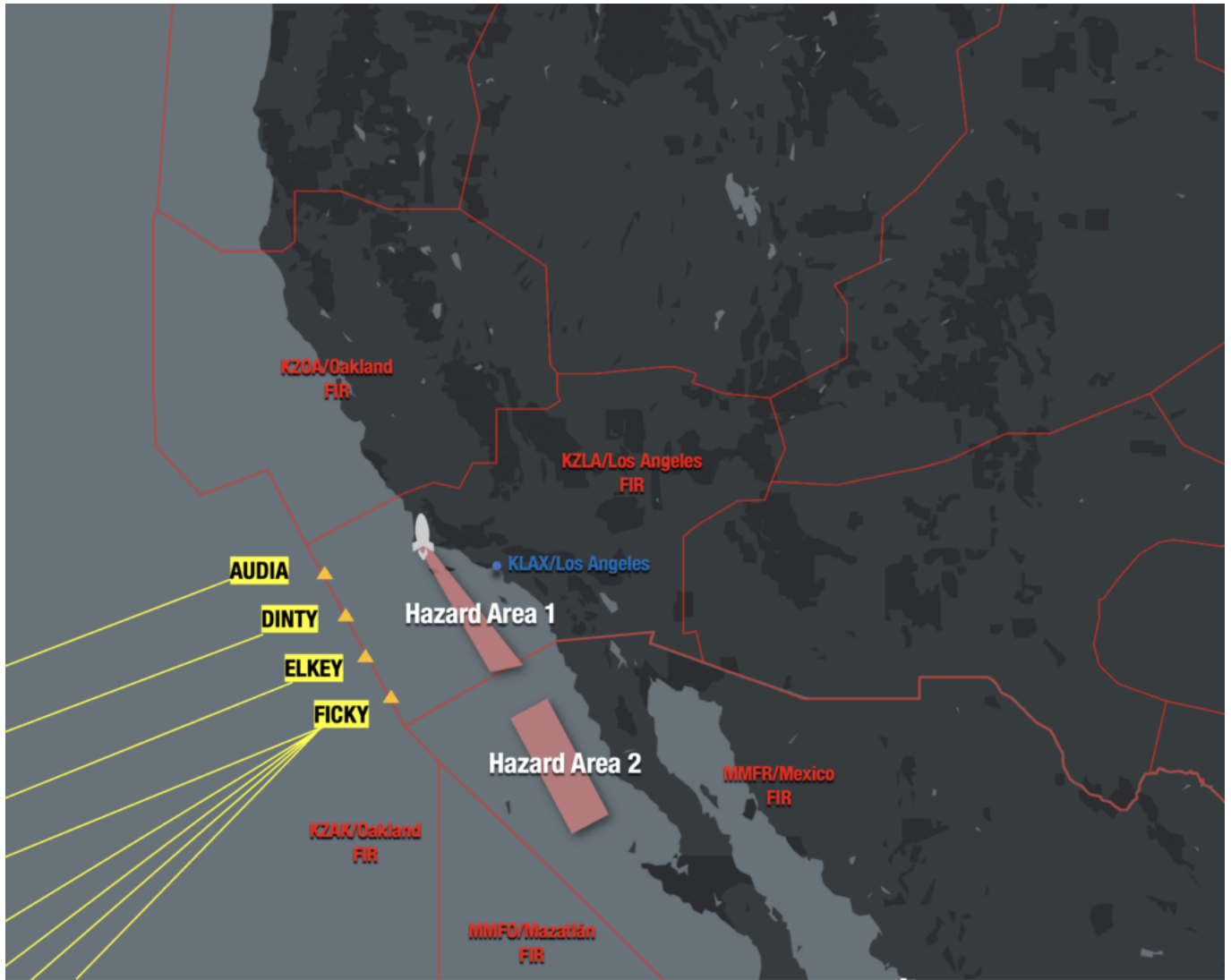
Los Angeles FIR

A small hazard area will exist from the launch site to approximately 125nm south, off the Californian coastline. Aircraft transiting via oceanic transitions FICKY, ELKEY, DINTY and AUDIA may all be impacted. This includes several airways linking Hawaii to the US mainland.

The Mexico FIR

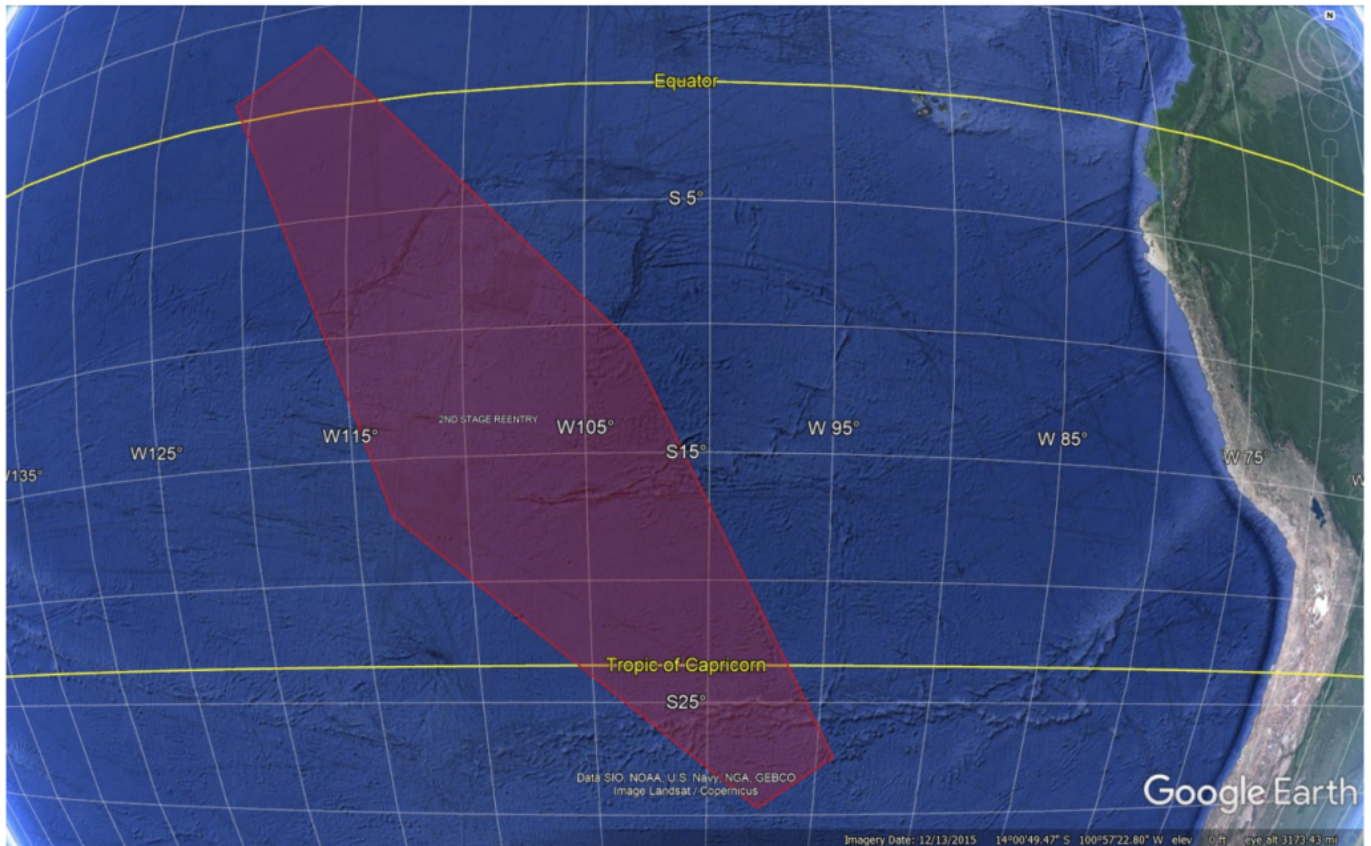
A second hazard area will exist further south, off the Baja California Peninsula and is unlikely to cause any significant impact.

Here's a picture of both:



South of the Equator

A large and remote section of airspace in the South-Eastern Pacific will be affected - 1300nm off the coast of South America. It occupies both part of the NO FIR zone (XX01) and the SCIZ/Isla de Pascua FIR. This is because the second stage (or piece) of the rocket will splash down in this area.



The Impact

Essentially, delays. But the good news is that they're **expected to be only minor**. ATC may reroute aircraft to protect the hazard areas, or apply mile-in-trail restrictions. In all cases they don't expect to hold aircraft up by more than a few minutes.

However, be on the lookout for unusual or unexpected changes to your clearance - if you're wondering why, the launch is likely the reason.

Commercial Aviation vs Space Flight

The impact of commercial space operations on the world's airspace is becoming a problematic issue. And in one way or another both the aviation and space industries will need to find better, or more efficient ways to share. This launch shows we're not there just yet. If you'd like to read more about this particular conundrum - check out our recent article [here](#).