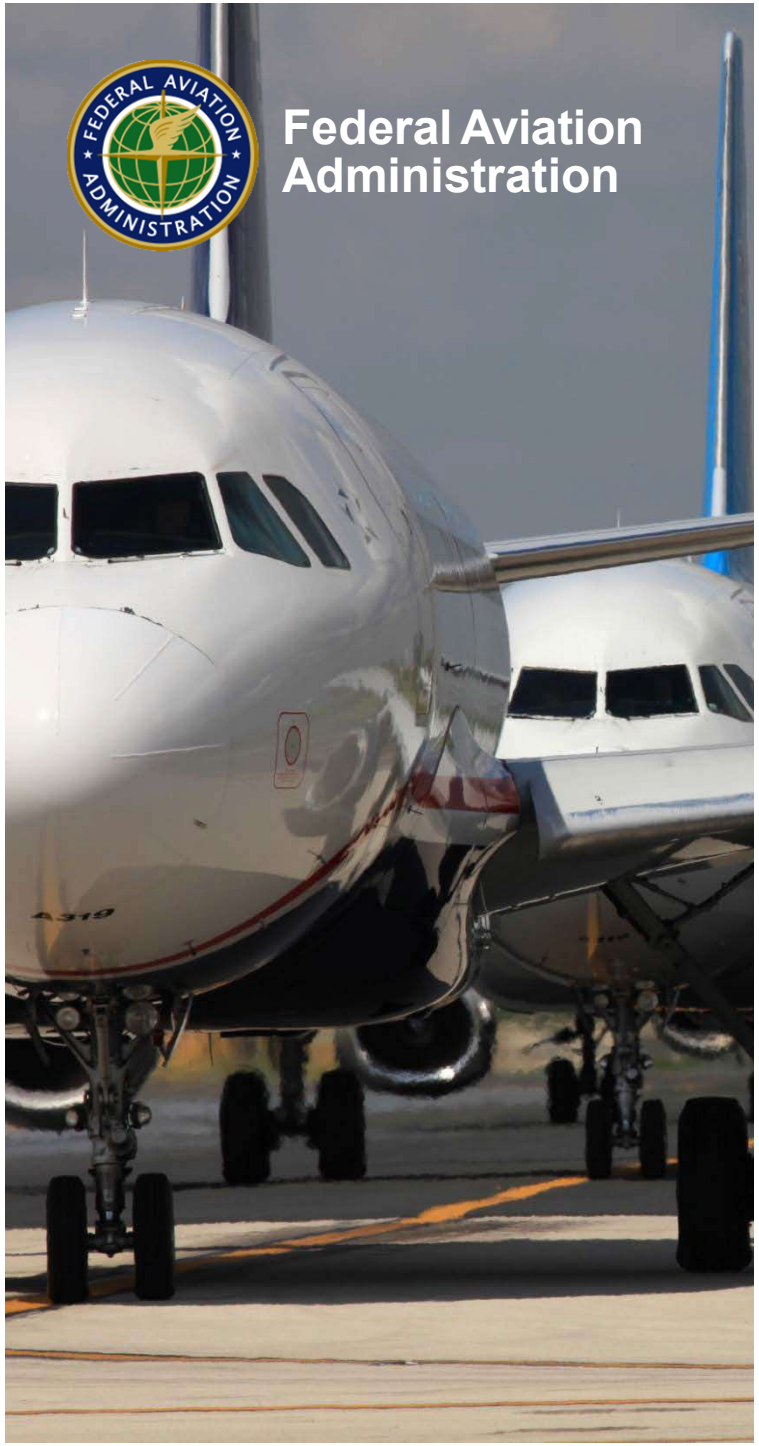
SJC North and South Flow

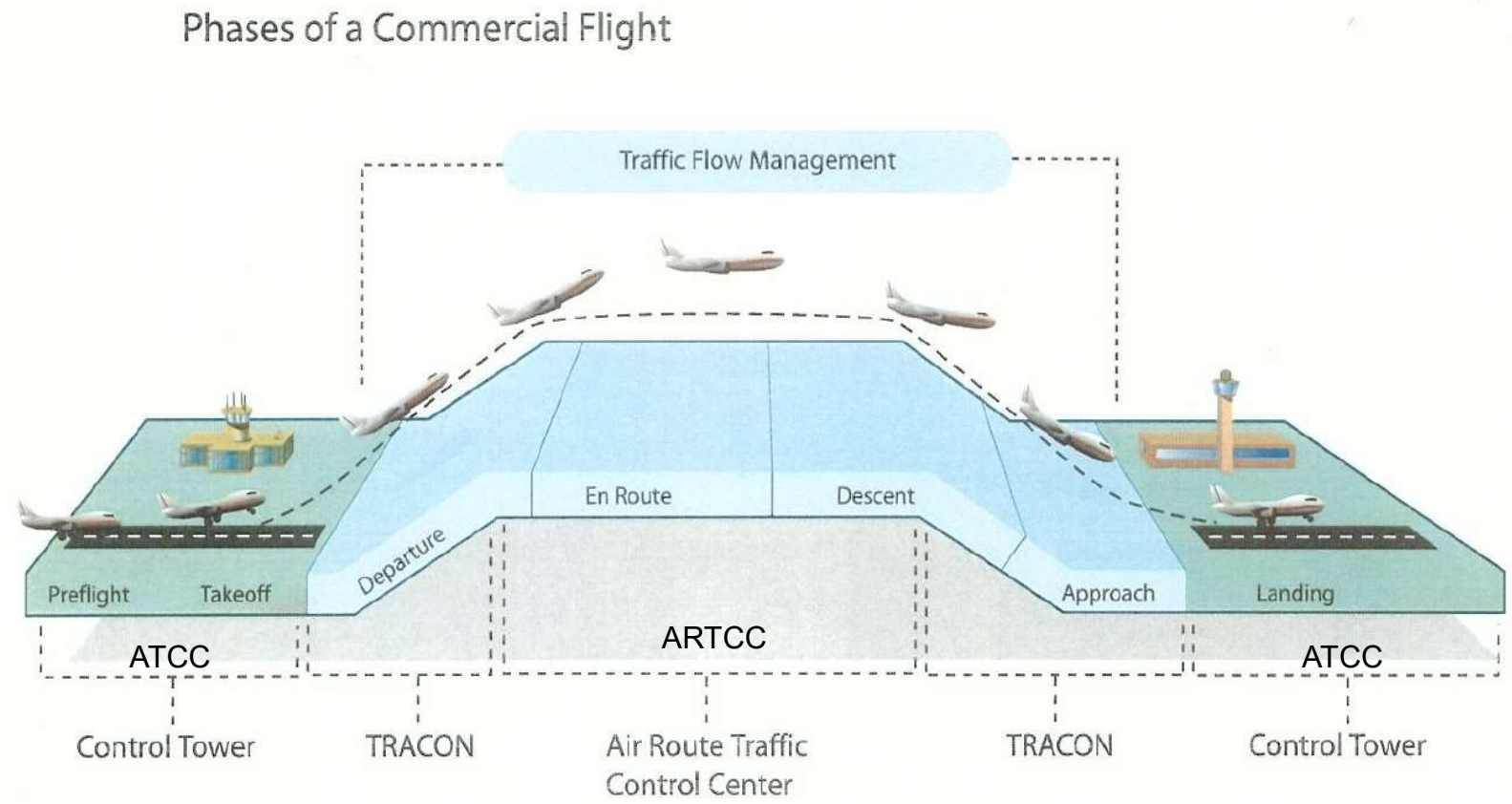
Pre and Post OAPM

Date: January 2018



Phases of Flight

FAA
Air Traffic Organization



AviationTerms

VFR- Visual Flight Rules. Pilots must maneuver to avoid clouds and are responsible for their own terrain separation.

IFR- Instrument Flight Rules. Air Traffic is responsible for both plane to plane and plane to terrain separation.

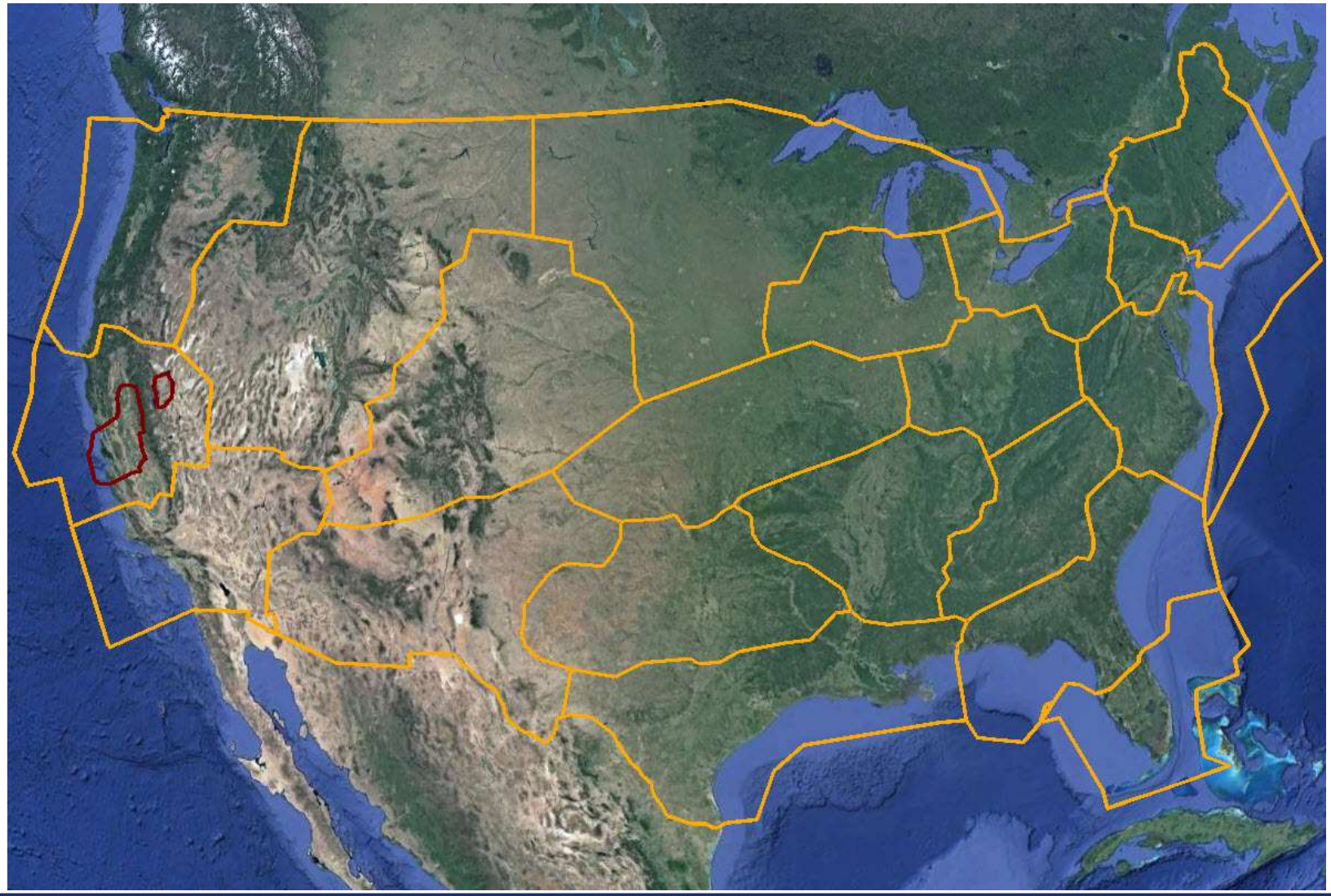
VMC- Visual meteorological conditions. Weather conditions that allow for VFR Flight.

IMC- Instrument meteorological conditions. Weather conditions that do not allow for VFR Flight.

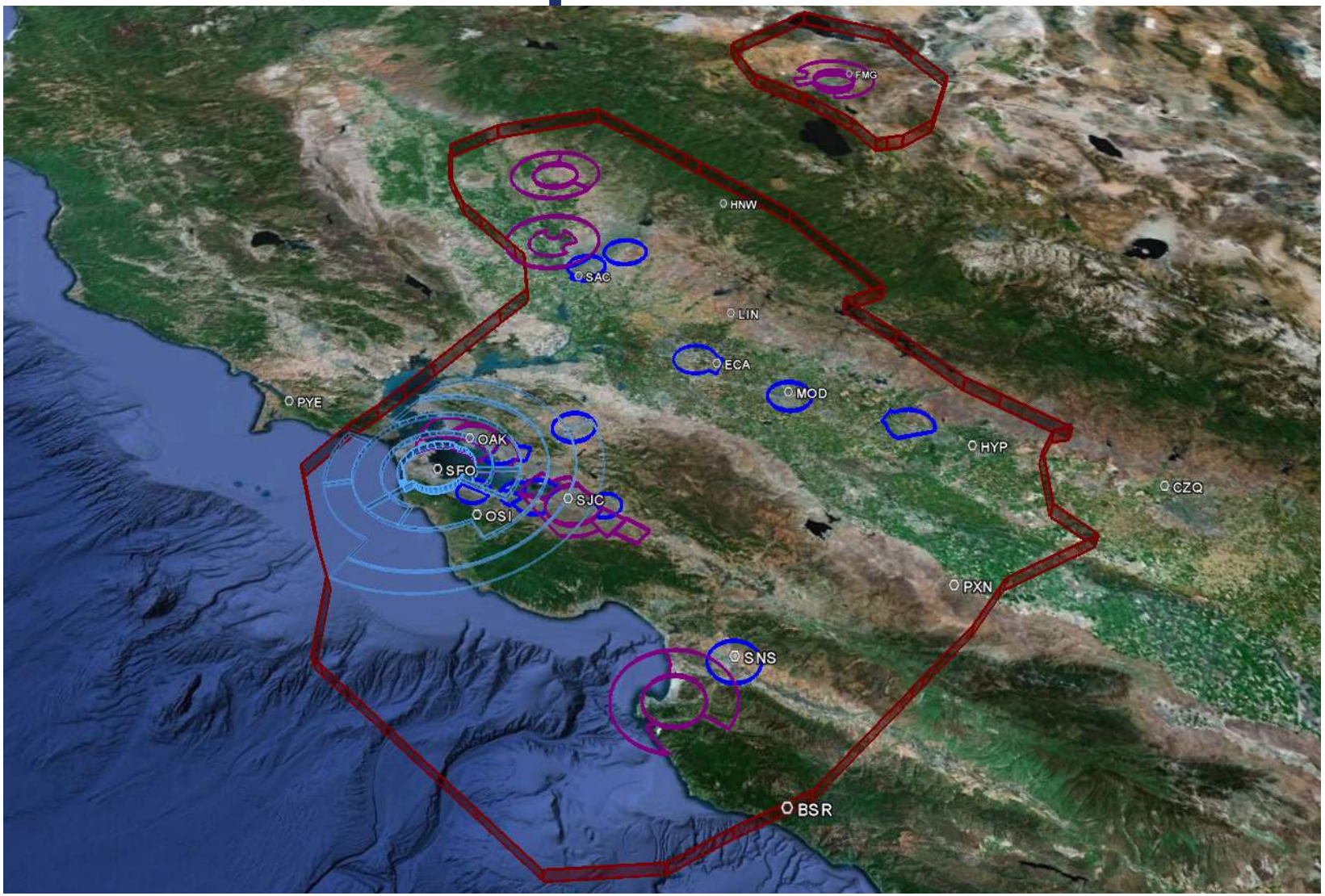
Instrument Approach – An IFR flight path that utilizes navigational aids to provide lateral and vertical guidance to the runway.

Charted Visual Approach – An IFR flight path that is made up of visual land markers and is hand flown by the pilot to the runway.

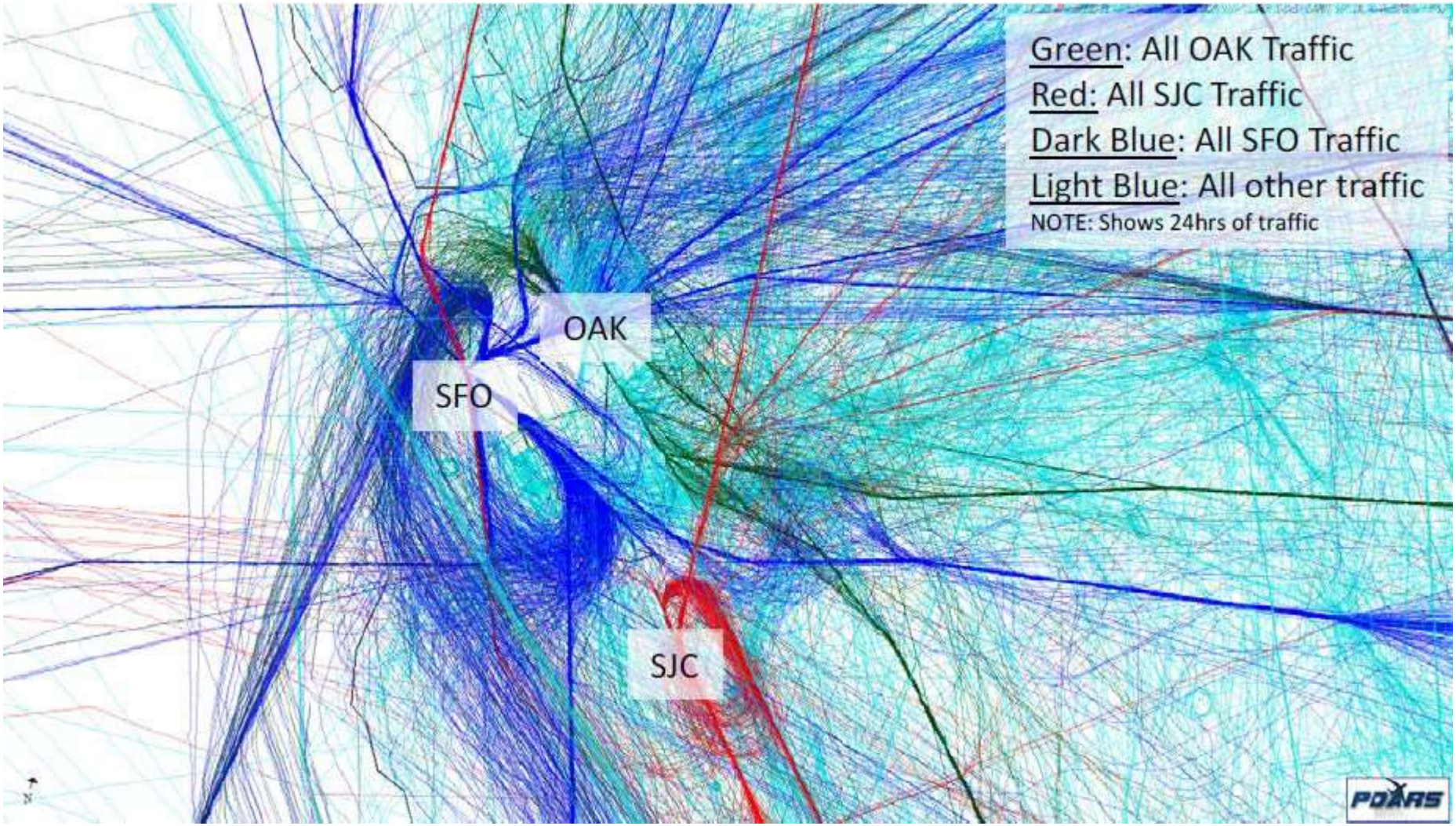
ARTCCs & NCT airspace



Over 200 Airports within NCT

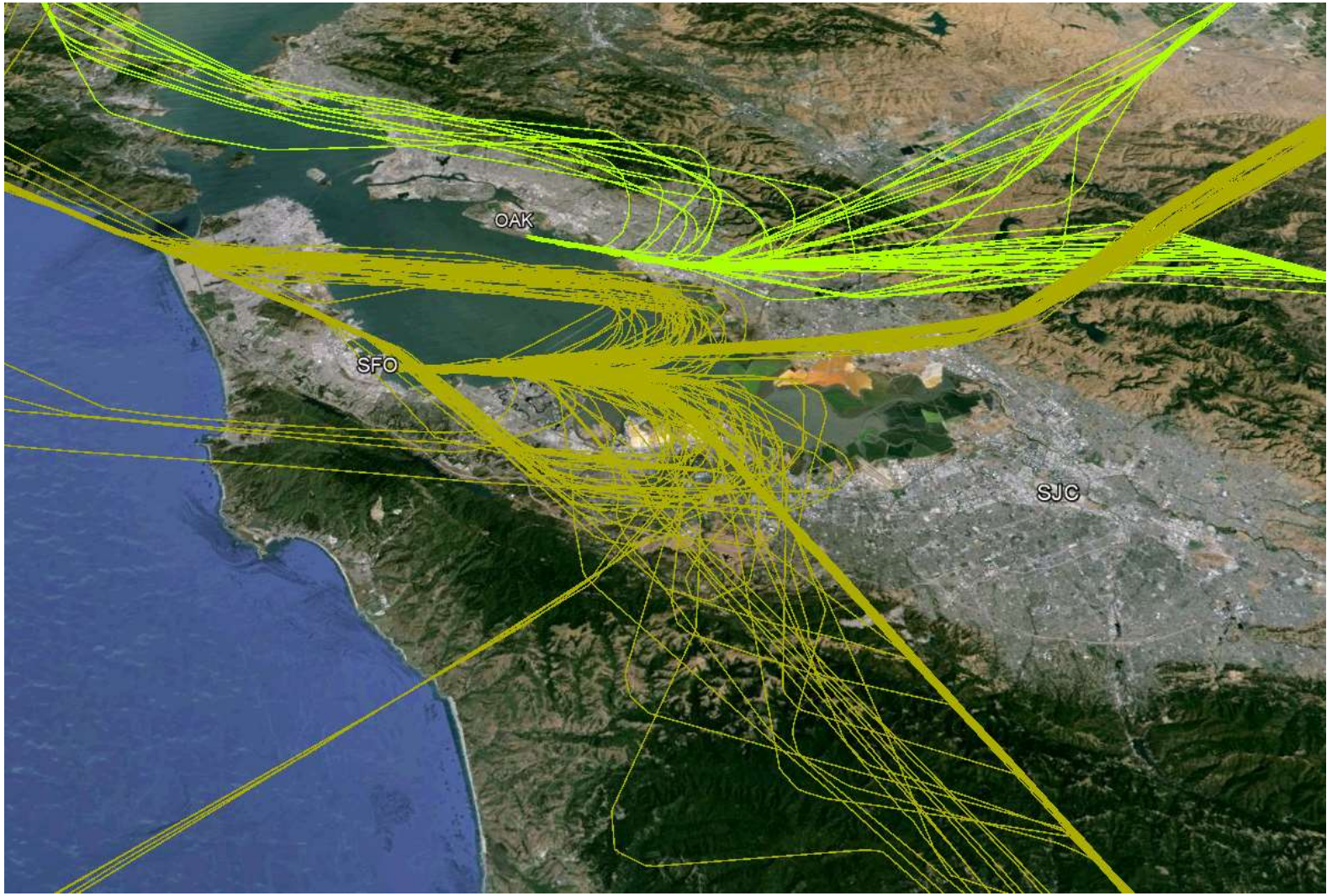


NCT Traffic – 24 Hours

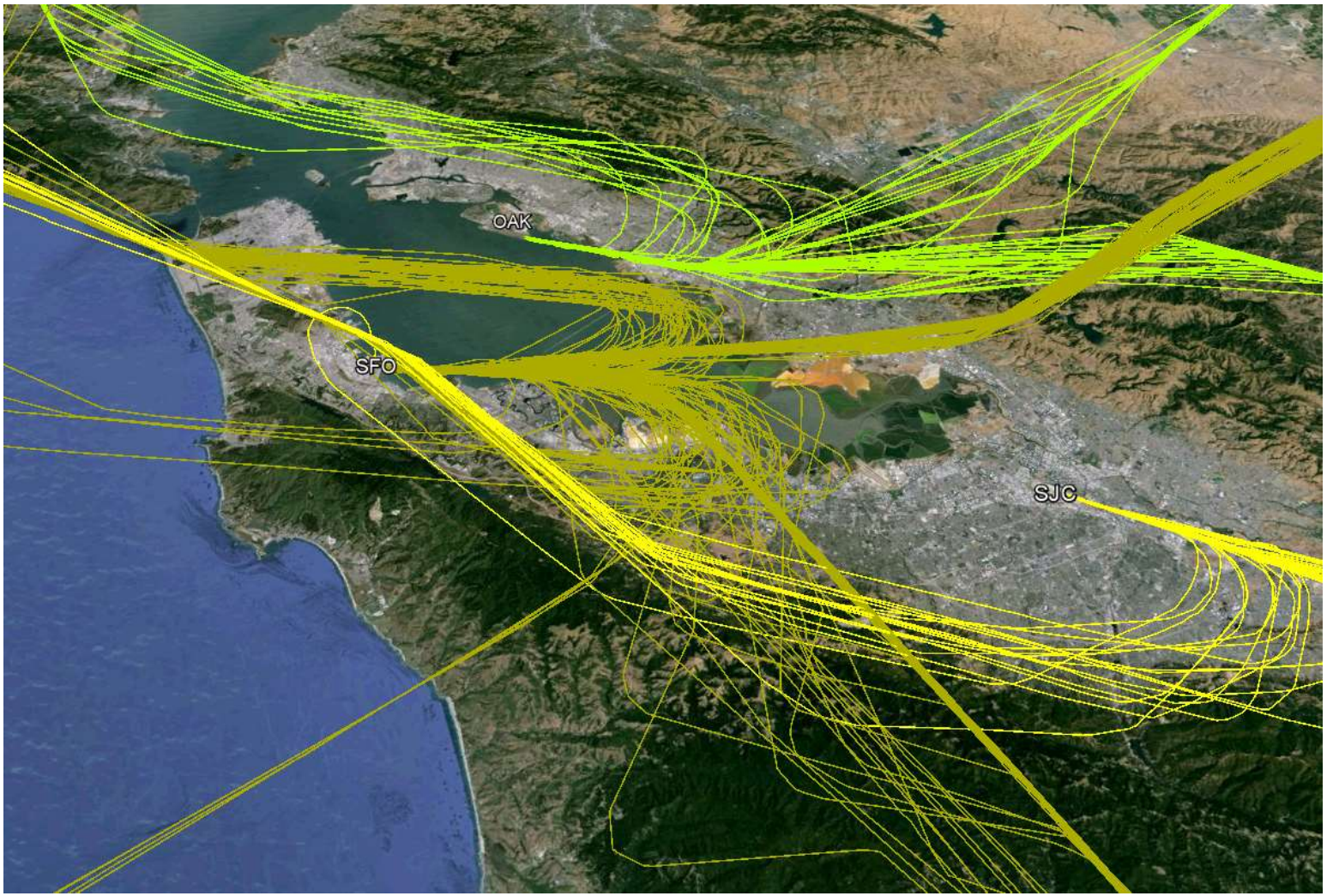


SFO Arrivals - Gold

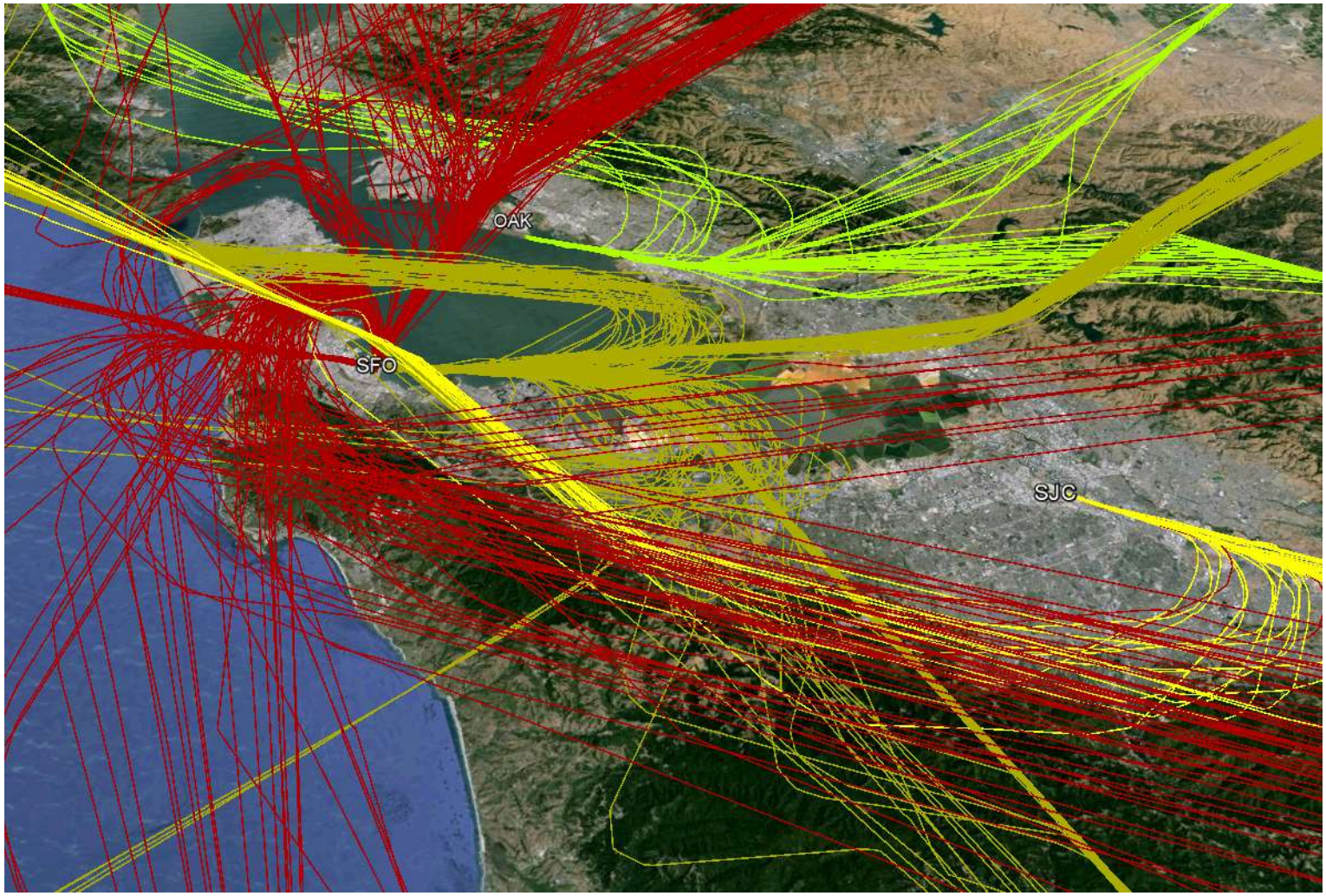
OAK Arrivals - Green



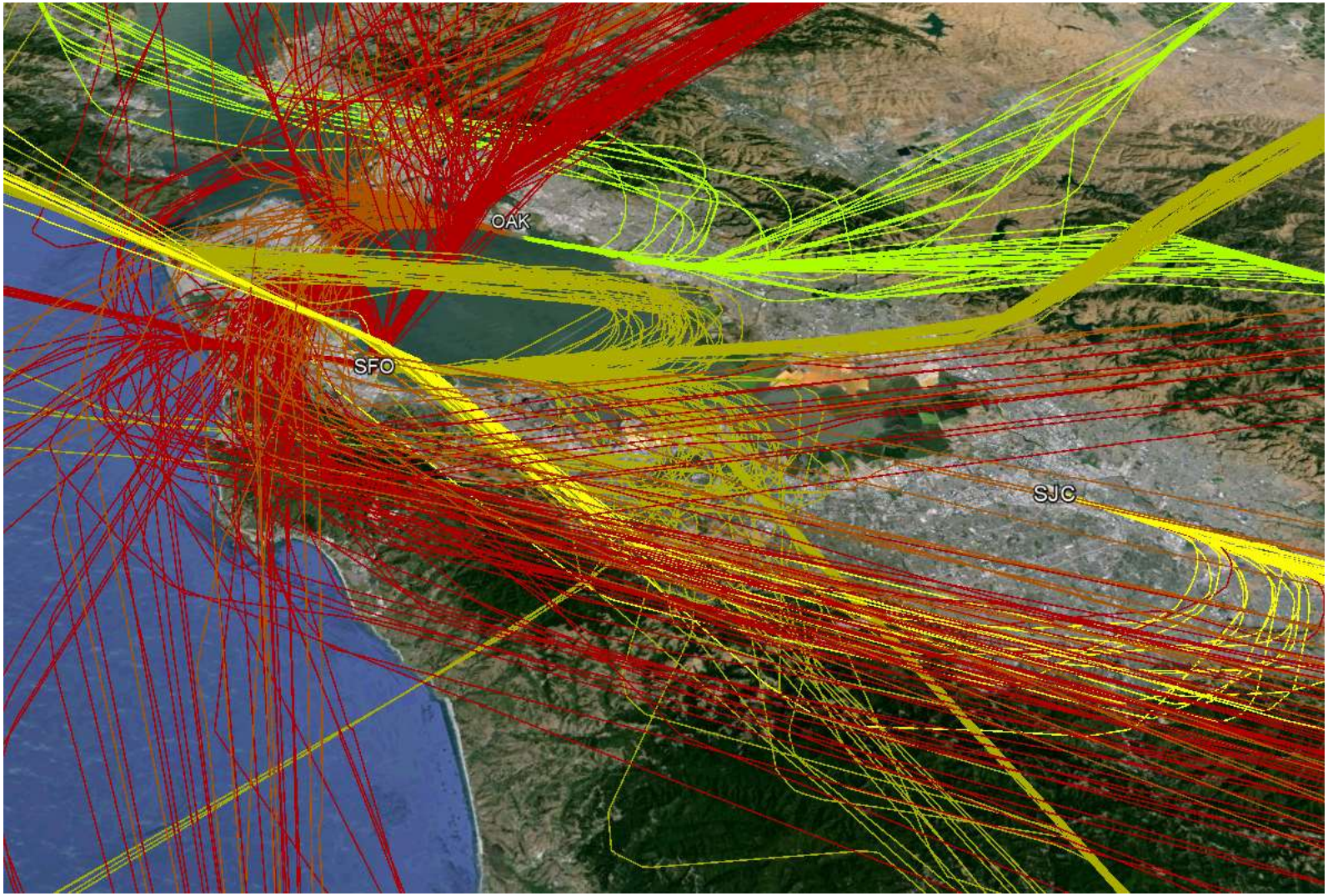
SJC Arrivals - Yellow



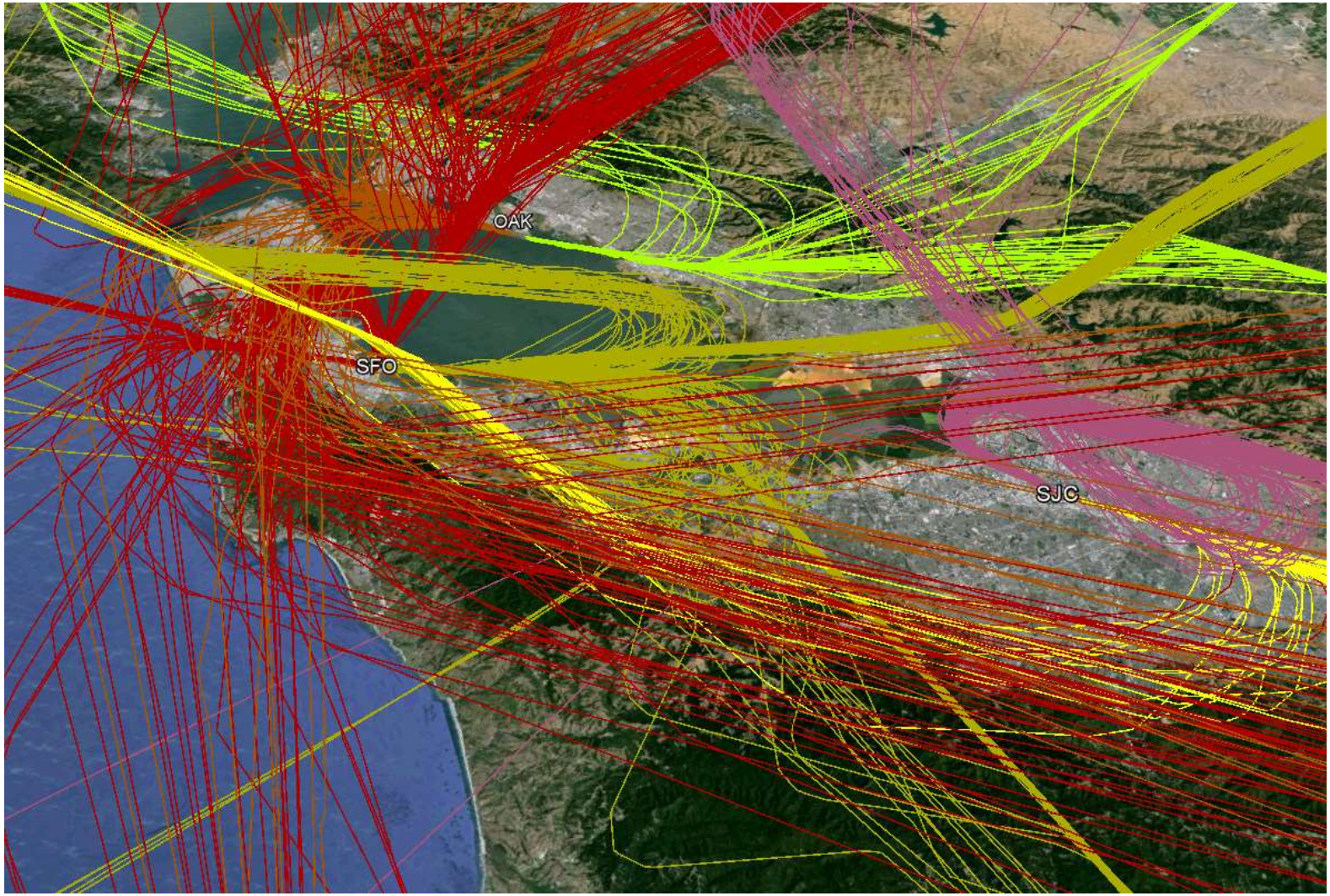
SFO Departures - Red



OAK Departures - Orange



SJC Departures - Pink



Data Analysis : Dates Utilized

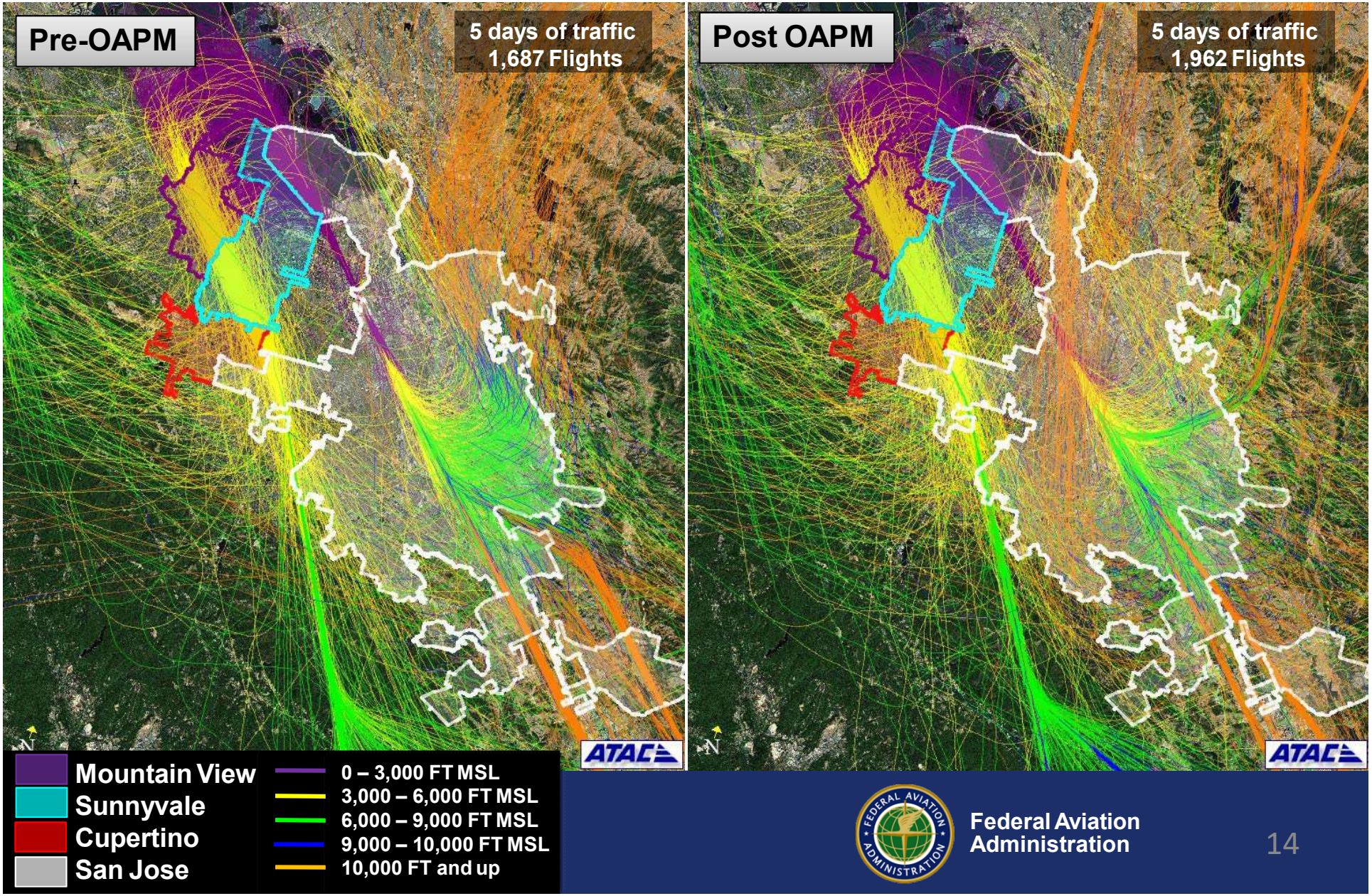
Pre-OAPM Dates

- **North Flow**
  - 2/23/2014
  - 2/21/2014
  - 2/20/2014
  - 2/19/2014
  - 2/17/2014
- **South Flow**
  - 2/8/2014
  - 2/9/2014
  - 2/26/2014
  - 2/27/2014
  - 2/28/2014

Post OAPM Dates

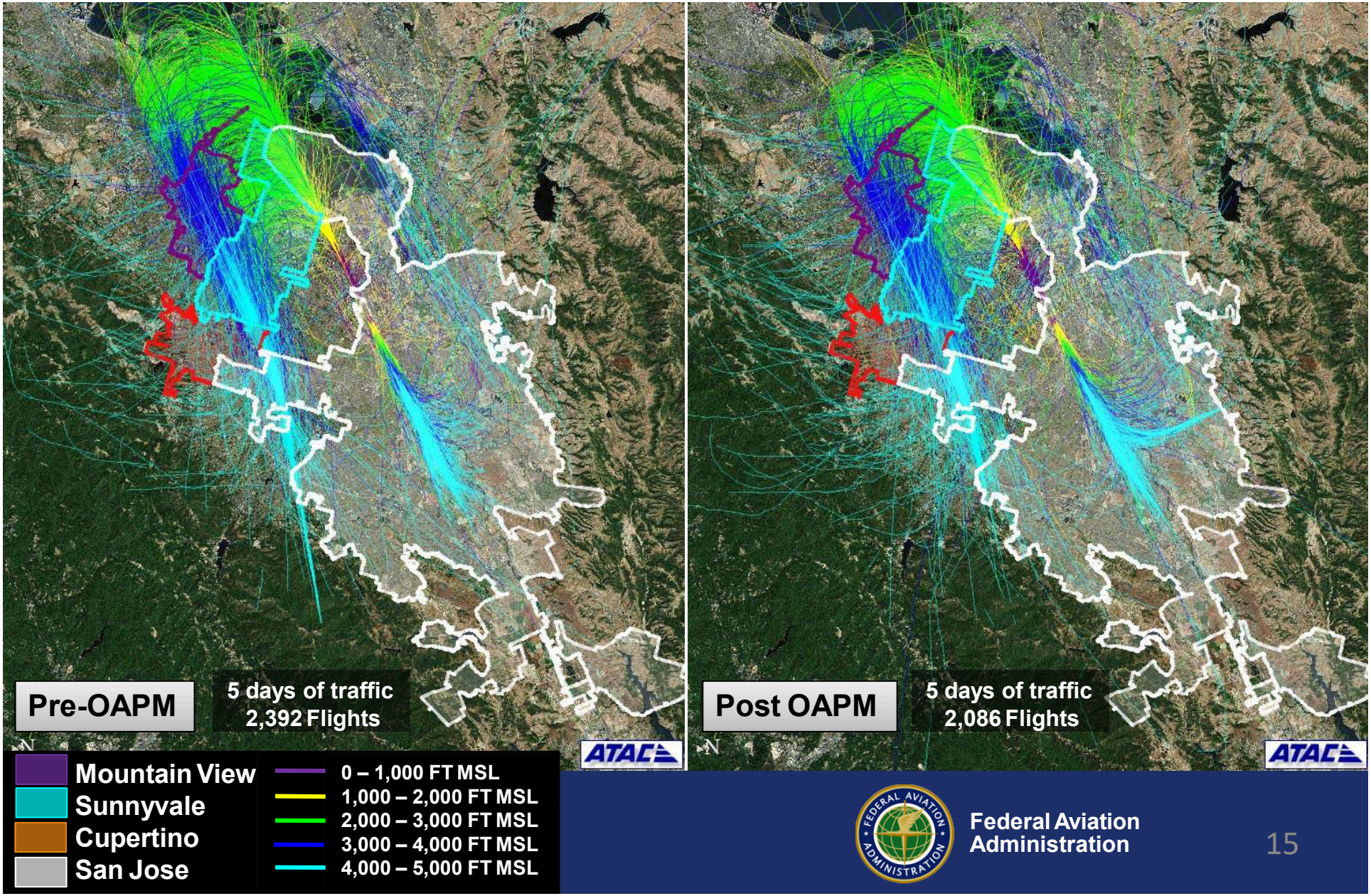
- **North Flow**
  - 11/24/2016
  - 11/29/2016
  - 12/01/2016
  - 12/02/2016
  - 12/29/2016
- **South Flow**
  - 1/6/2016
  - 1/17/2016
  - 3/10/2016
  - 10/16/2016
  - 10/25/2016

South Flow SJC Traffic



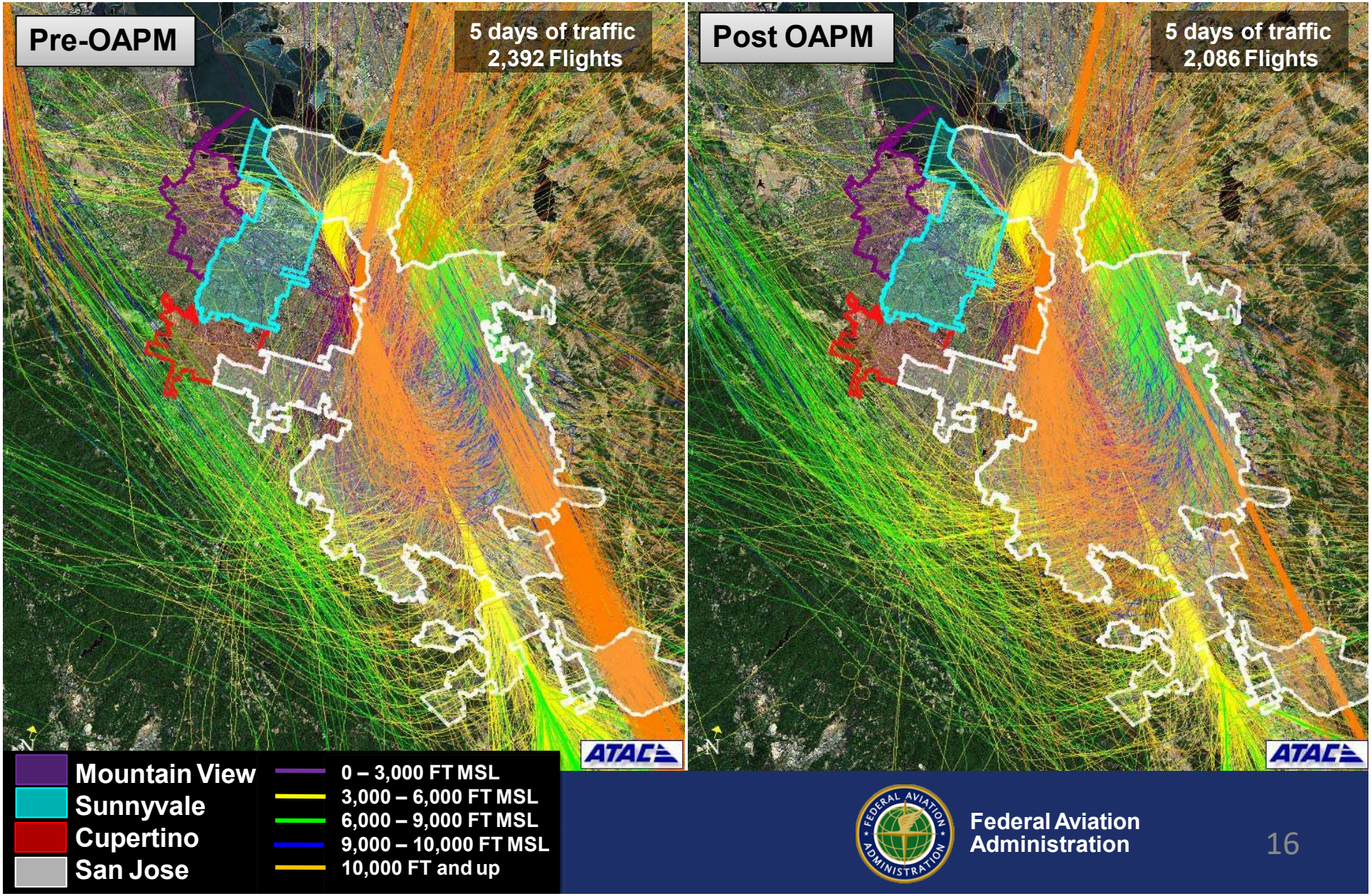
Federal Aviation Administration

South Flow SJC Traffic below 5,000 FT MSL



Federal Aviation Administration

North Flow SJC Traffic



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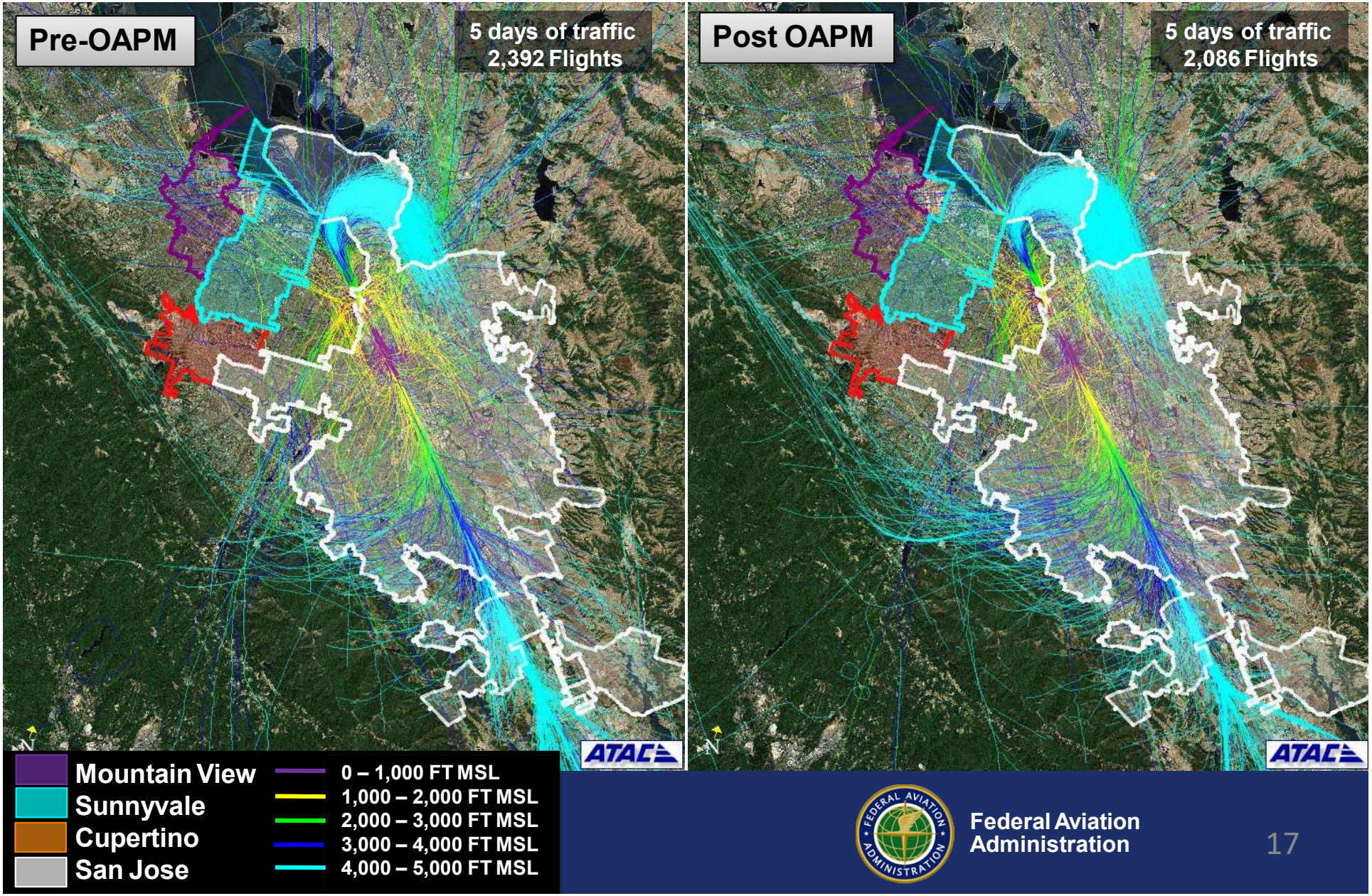
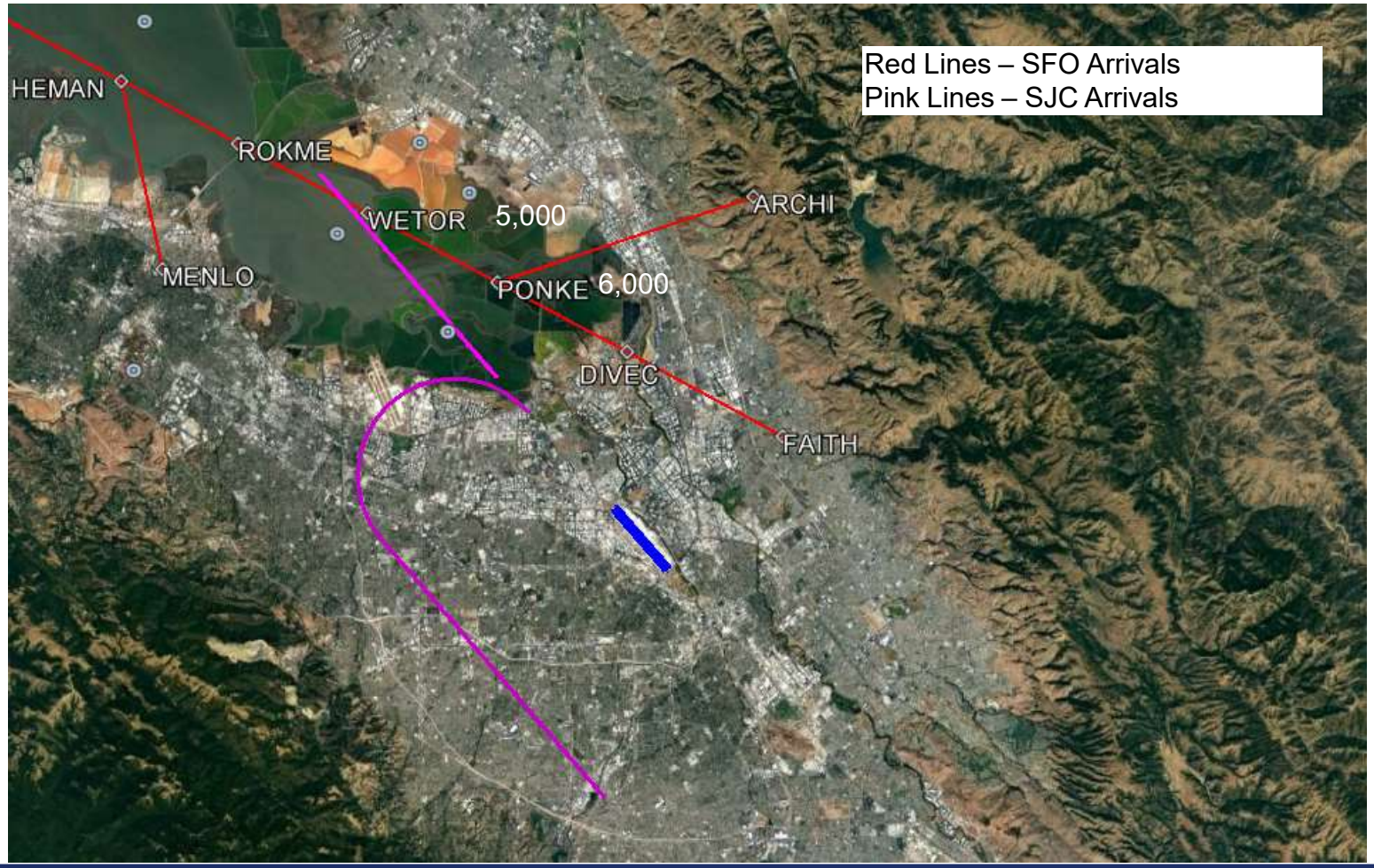


Federal Aviation Administration

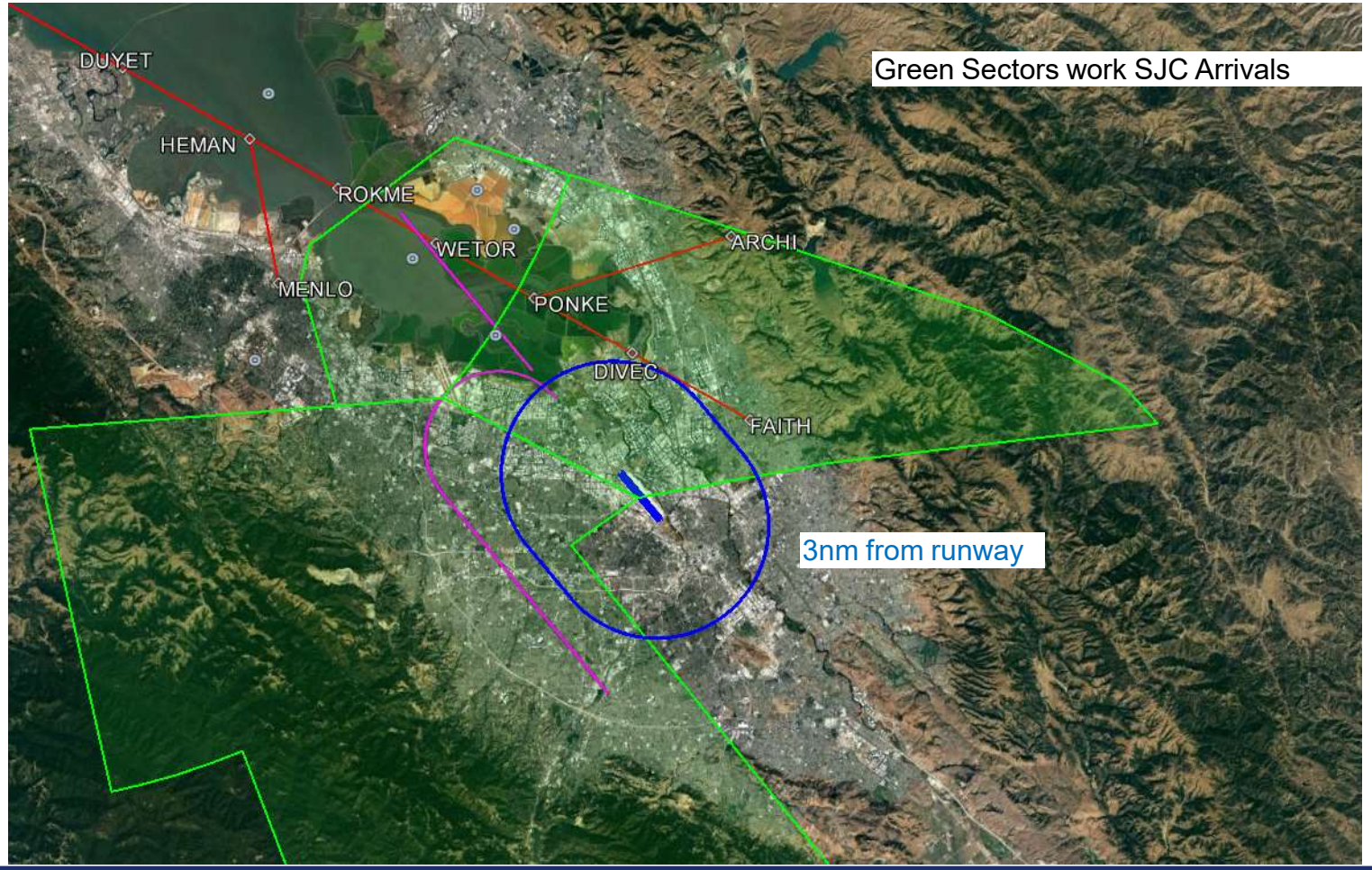
South Flow Airspace/Traffic Constraints

1. SJC is on South flow when SFO is on a West flow more than 95% of the time.
2. SJC arrivals must be kept below the SFO arrivals and inside of ROKME.



South Flow Airspace/Traffic Constraints

3. Traffic must remain 3nm from runways while on downwind
4. NCT sector airspace is designed around the procedures that the controller works. Aircraft must be kept within the airspace to protect it from aircraft that other controllers are working.



South Flow Airspace/Traffic Constraints

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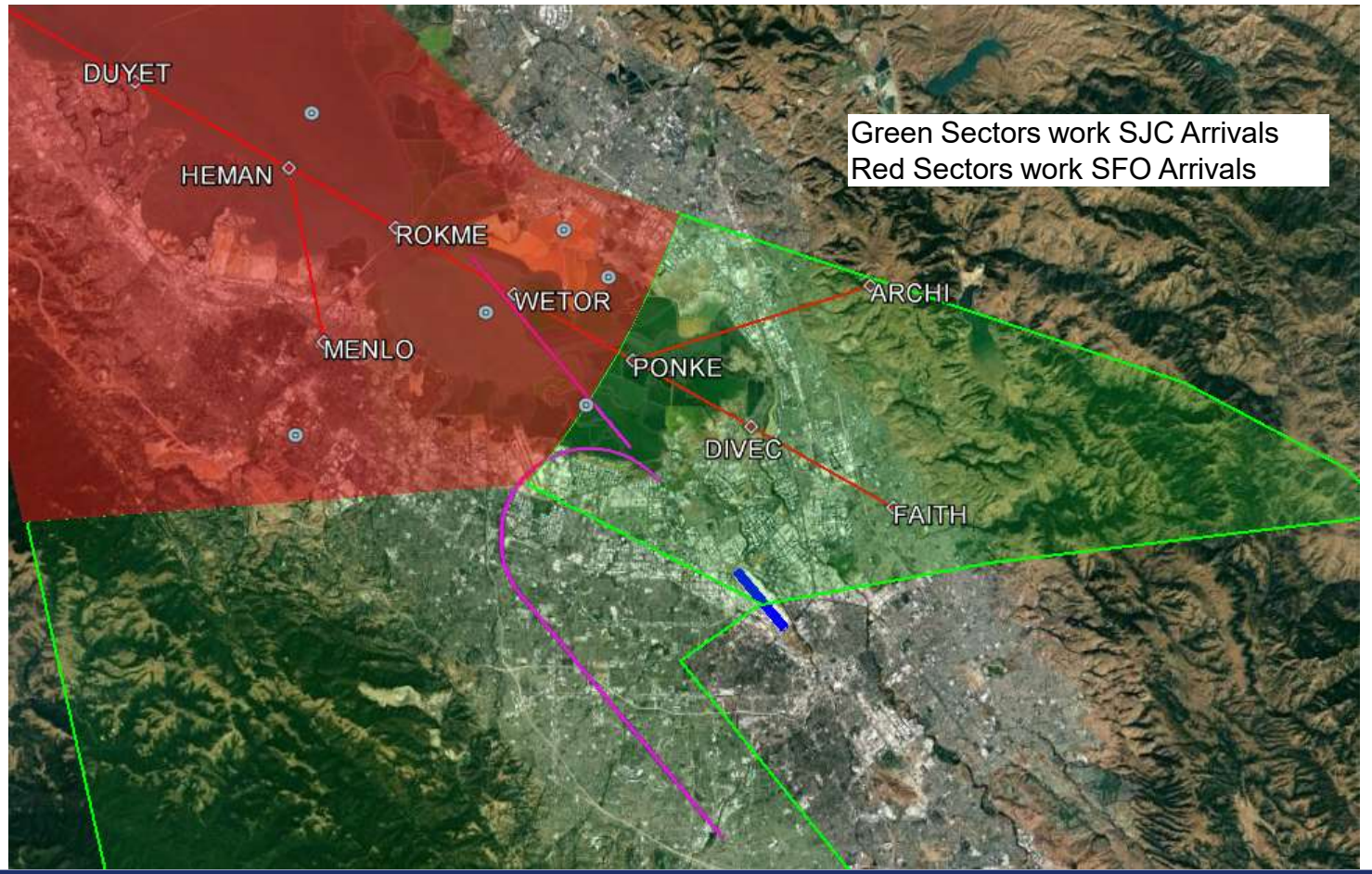
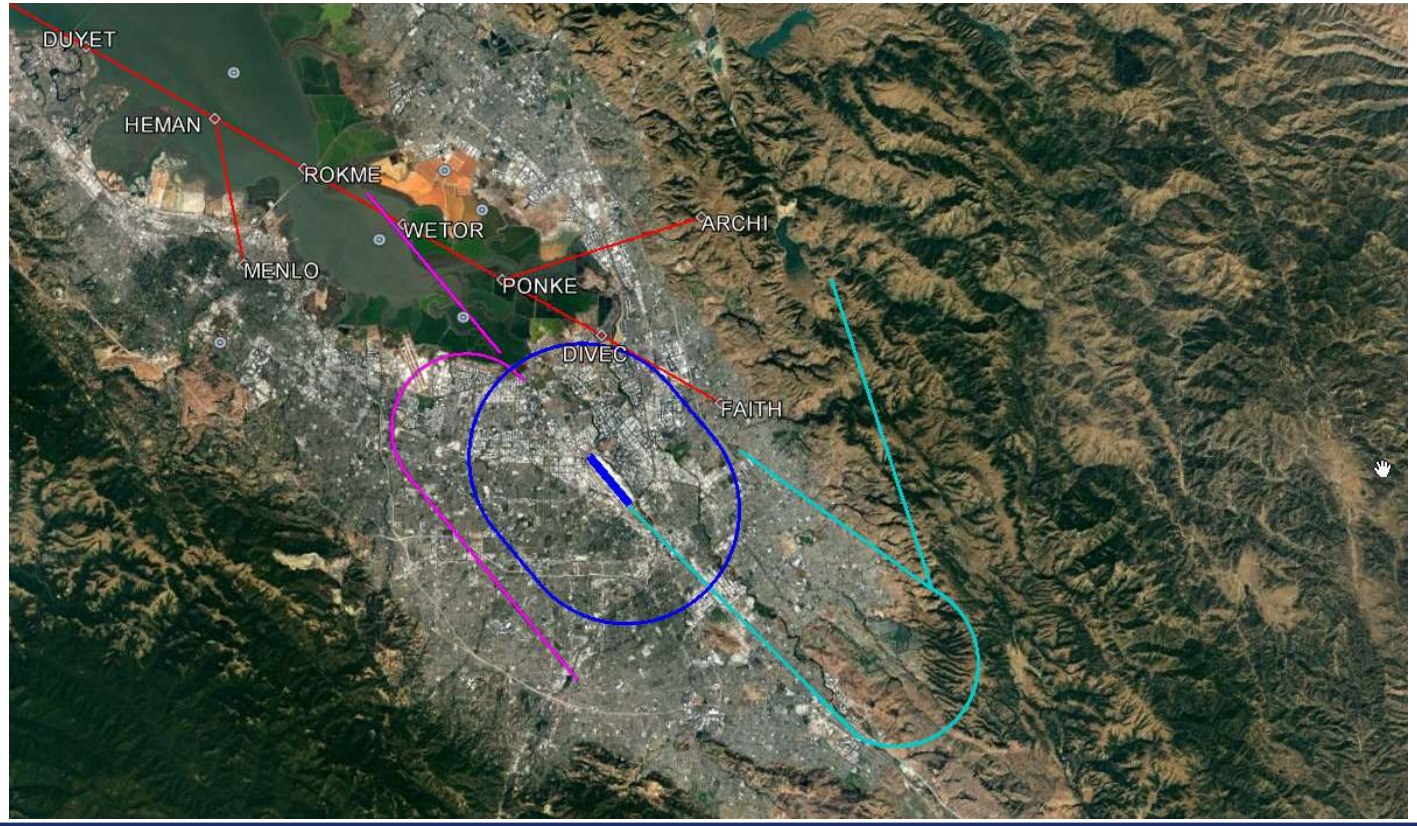
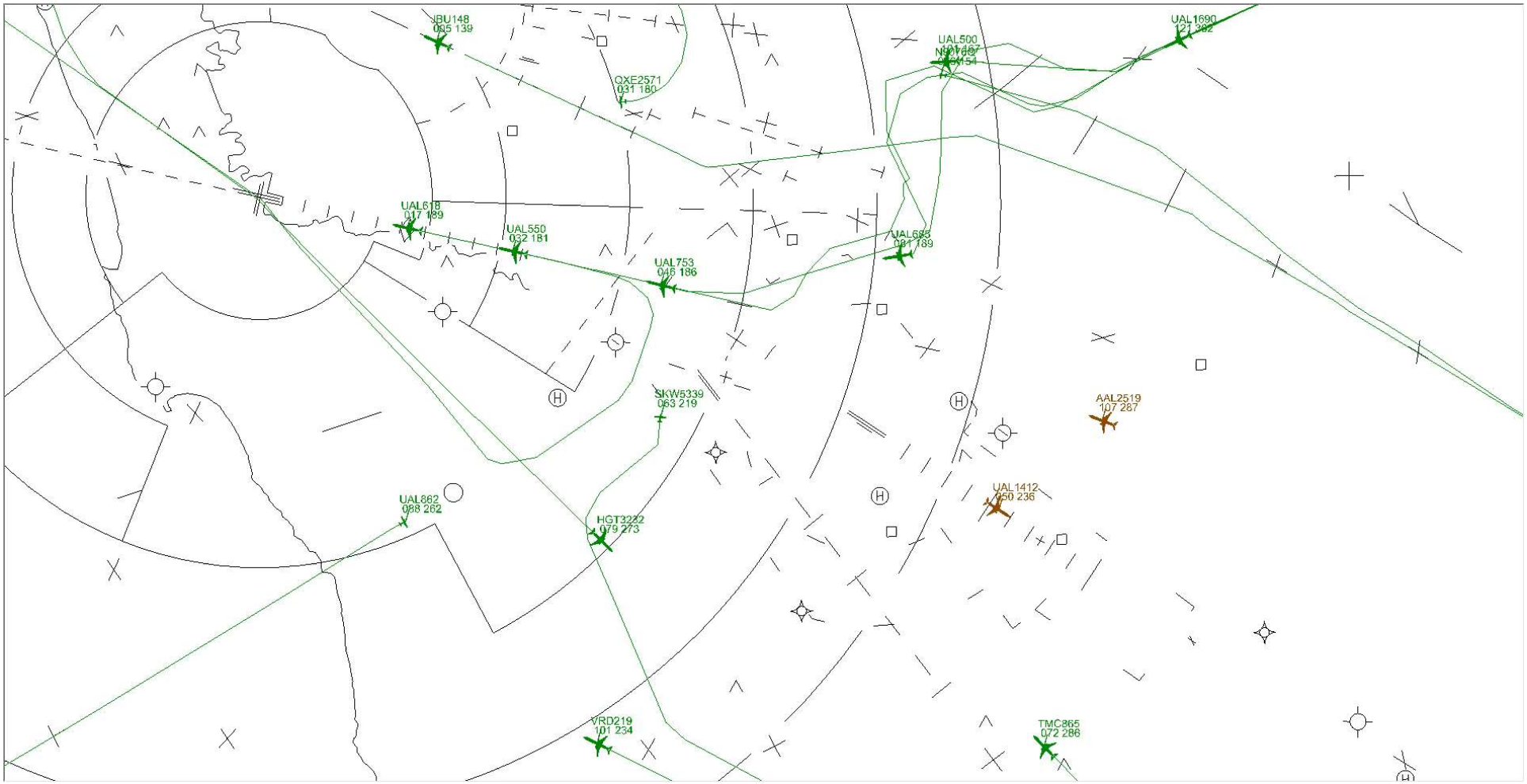


Constraints on an East Downwind

1. Traffic must remain 3nm from runways while on downwind
2. SJC is on South Flow when SFO is on a West Flow more than 95% of the time.
3. The SFO West final approach course is on the east side of SJC.
4. The mountains east of SJC force the aircraft to be higher.
5. Northbound SJC departures utilize the east side of the airport.
6. SJC Arrivals must be below SFO arrivals and below SJC Departures

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SKW5339
063 219
AAL2519
107 287
UAL1412
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079 273
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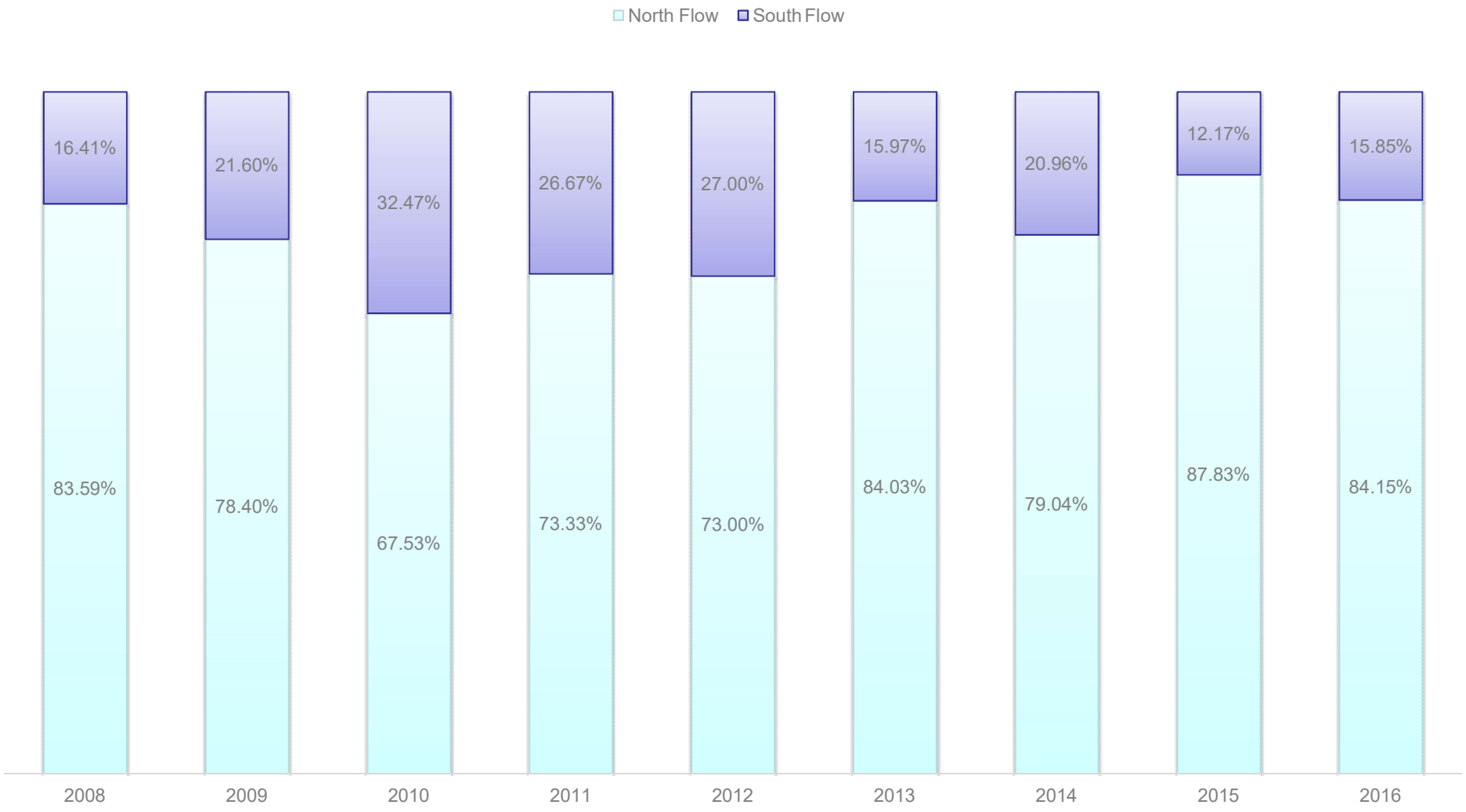
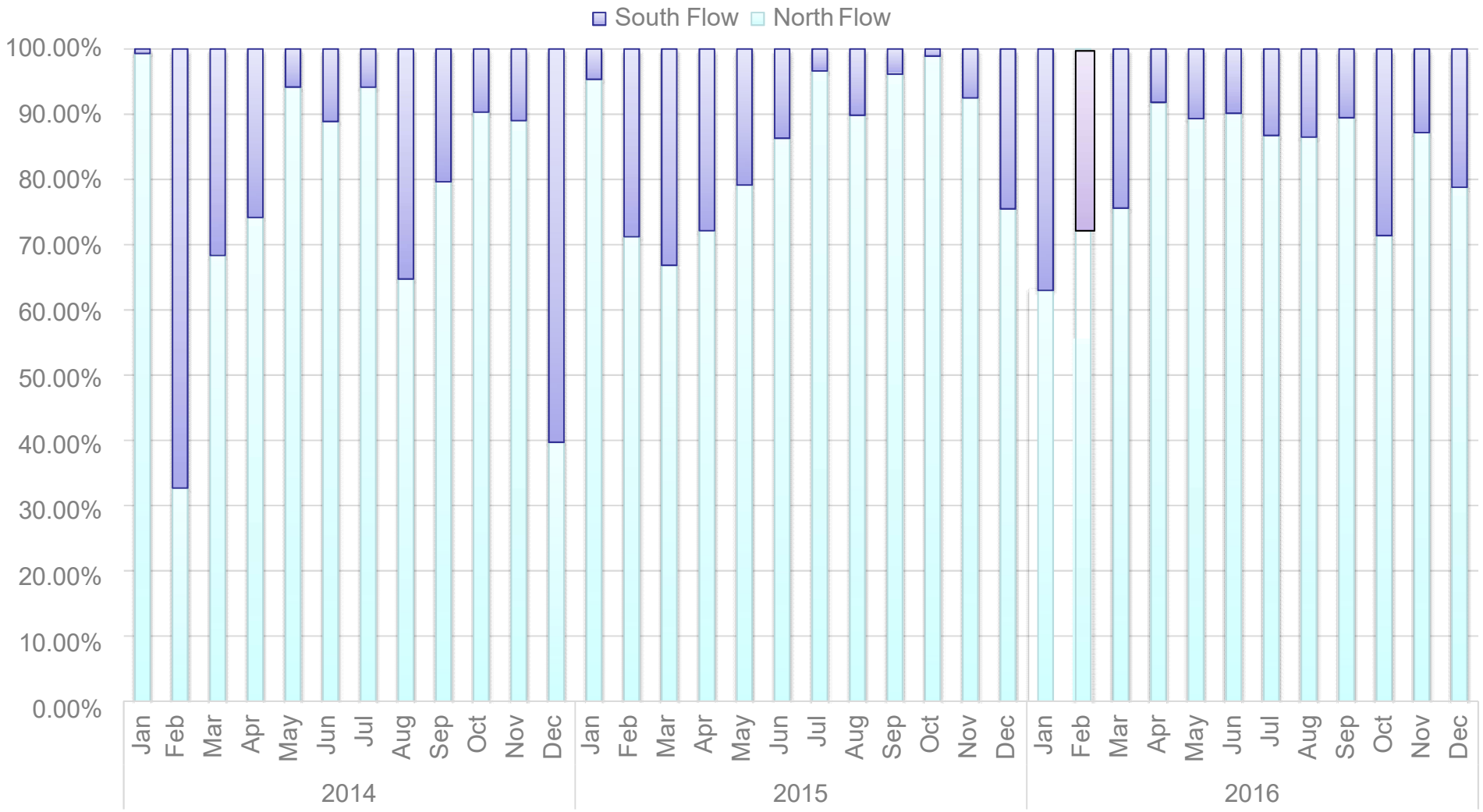
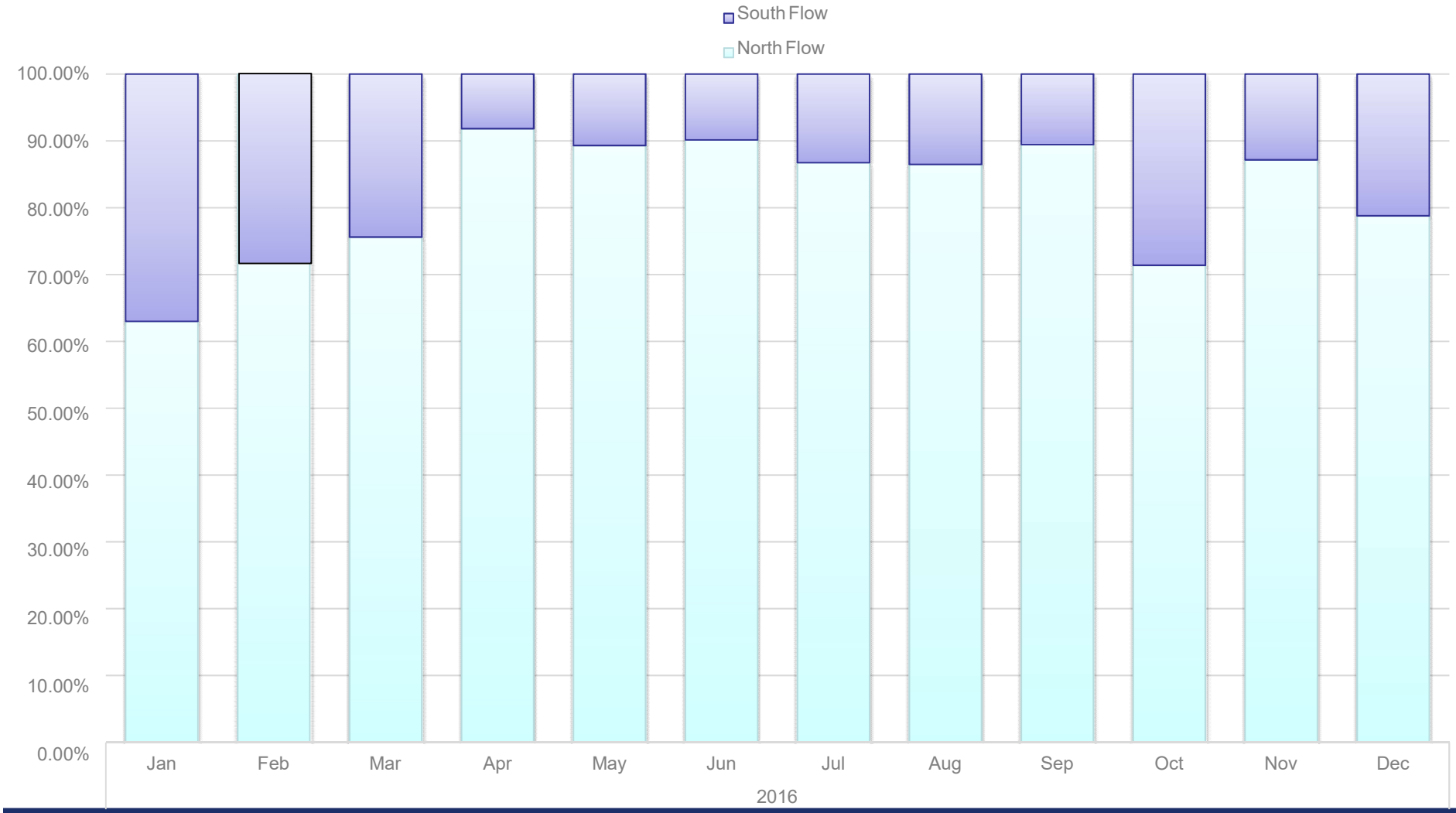
072 286

SJC Runway Usage 2008 - 2016



SJC Runway Usage 2014 - 2016



SJC Runway Usage - 2016