



McClellan-Palomar Airport

Master Plan Update



Public Meeting #5

Master Plan Update and
Draft EIR Overview

January, 30 2018



Agenda

1. Staff Presentation
 - a. Project Background
 - b. Master Plan overview
 - c. Draft Program Environmental Impact Report (EIR) findings
2. 30-minute question & answer
3. Break out into open house stations
4. Adjourn at 8:30 pm



Photo from Public Meeting #3 on April 30, 2015.



Overview

Master Plan

Forecast

Design

Alternatives

Program EIR

Overview

- FAA recommends a Master Plan be updated routinely
- Proposal stays within the existing fence line
- Proposes safety improvements
- Continued use of existing airline terminal
- Keeps airport parking area the same size
- Balanced proposed forecasts

Airport History

Airport Built in 1959



Airport Today



- Aviation gateway to and from San Diego's North County
- Economic driver for vibrant business community
- County of San Diego owns and operates the public airport
- Provides corporate, commercial, and private services for the region

Public-Use Airport

FAA Definition:

Public Use Airport - available to general public without need for approval from County as owner/operator.

Services:

- Air Traffic Control Tower, operated by FAA
- Commercial Airline Service
- Aviation Businesses Provide Charter, Corporate Services, & Flight Training
- Emergency Medical Airlifts
- Military & Law Enforcement
- Aircraft Sales, Maintenance & Repair
- Car Rental Companies
- TSA & U.S. Customs and Border Protection



Regional Economic Benefit



Projected by 2030

- 4,615 jobs supported
- \$155.2 million in personal income
- \$560.8 million in business revenue
- \$33.4 million in state and local tax revenue

Source: 2009 Economic Vitality Analysis Study, Kimley-Horn





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Master Plan Update Process



1

Conduct Facilities Inventory, Forecasts of Aviation Demand & Begin Stakeholder Outreach in Early 2014

2

Identify Facility Needs and Develop/ Study Development Alternatives (FAA Standards)

3

Draft Master Plan and Study Environmental Impacts

4

We Are Here

Conduct Draft Program Environmental Impact Report (EIR) Public Outreach in Early 2018

5

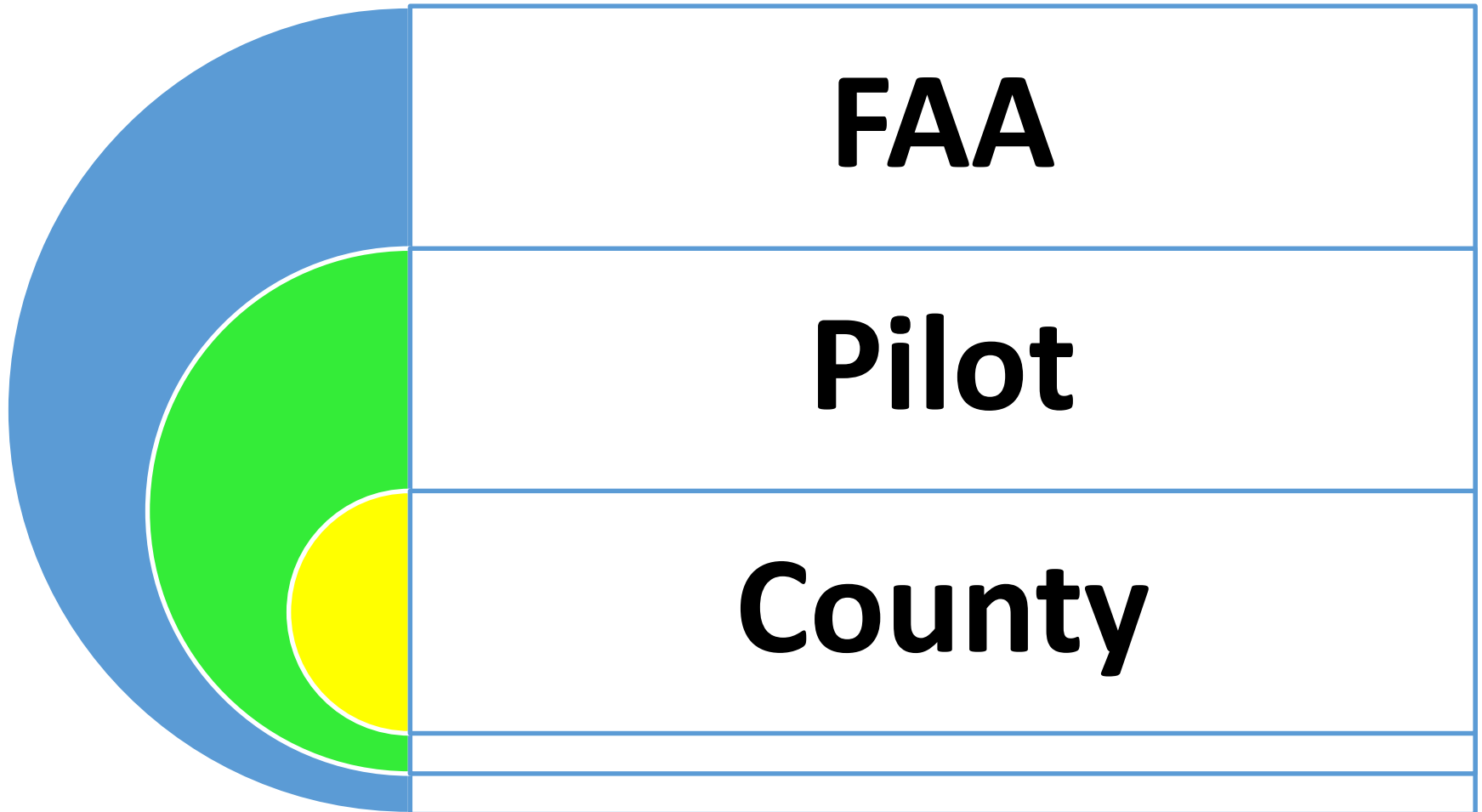
Respond to Public Comment and Finalize Master Plan and Program EIR

6

Present Alternatives at Board of Supervisors Hearing in Mid-2018



Roles & Responsibilities



Why is a Master Plan Needed?



Master Plan: 20-Year Planning Document

- Forecast of aviation demand
- Determine FAA-defined facility requirements
- Financial, and Phased Implementation Plans
- Environmental review

Establishing the Airport Layout Plan (ALP Map)

- County obligated to maintain updated ALP
- ALP is illustrated map of current and proposed plans
- FAA reviews for compliance with standards
- Required to apply for federal funding for projects

Master Plan Objectives



- Enhance Safety
- Remain on-Airport Property
- Financial Feasibility
- Avoid Impacts to Airport Businesses
- Accommodate Existing and Future Demand
- Minimize Environmental & Offsite Impacts
- Adhere to FAA Design Standards



Overview

Master Plan

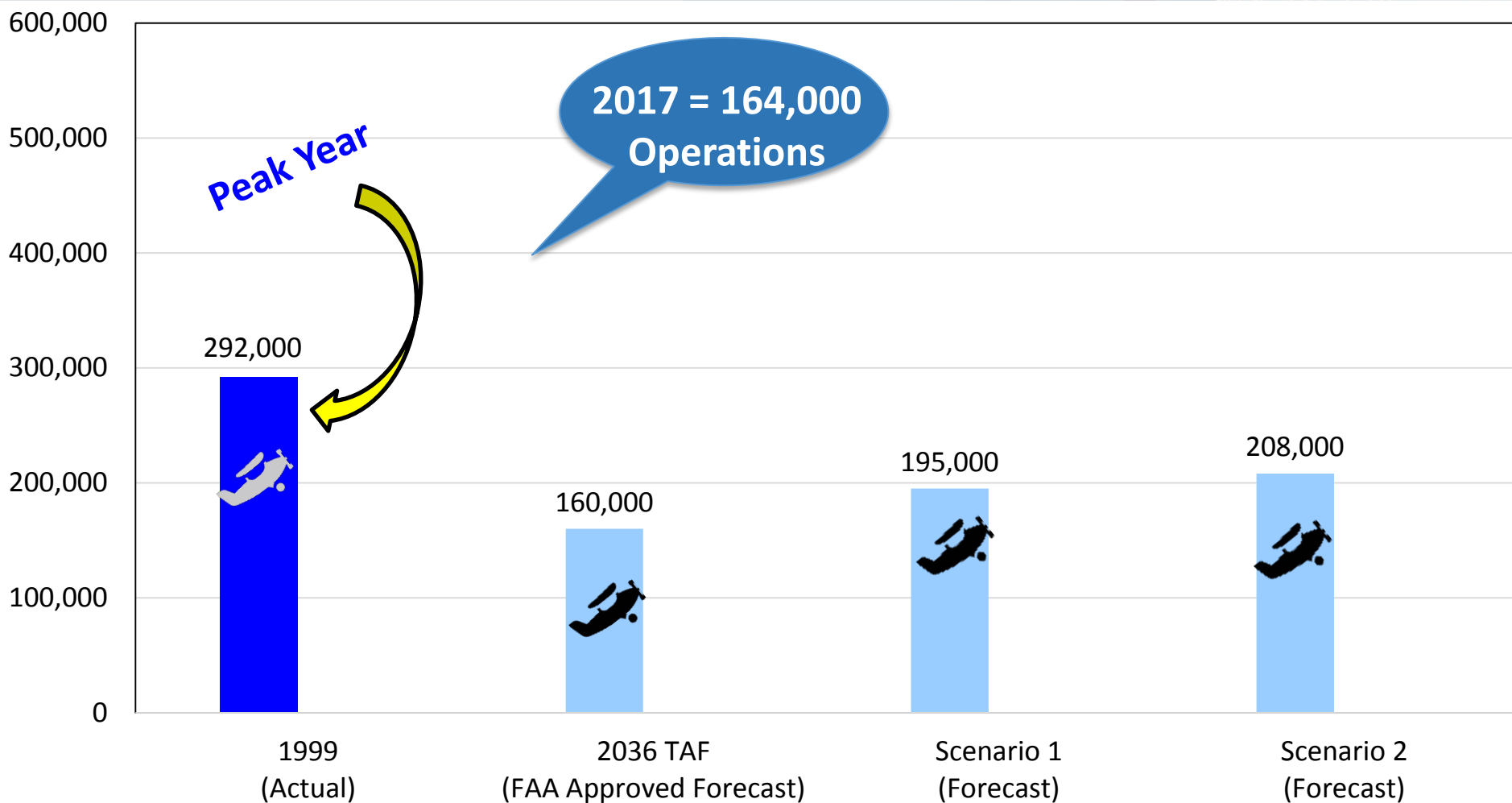
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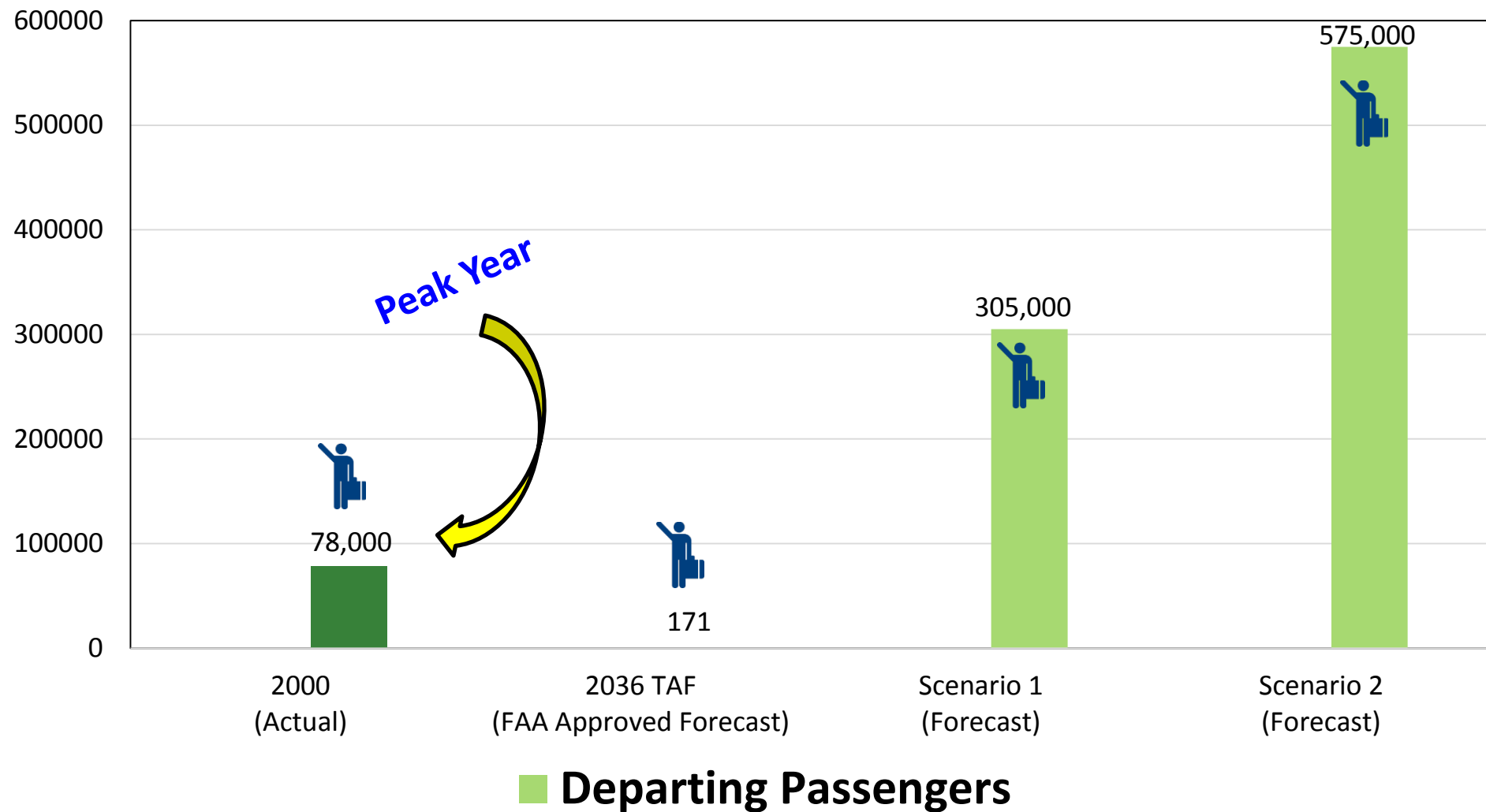
Program EIR

Historical & 2036 Forecast Operations

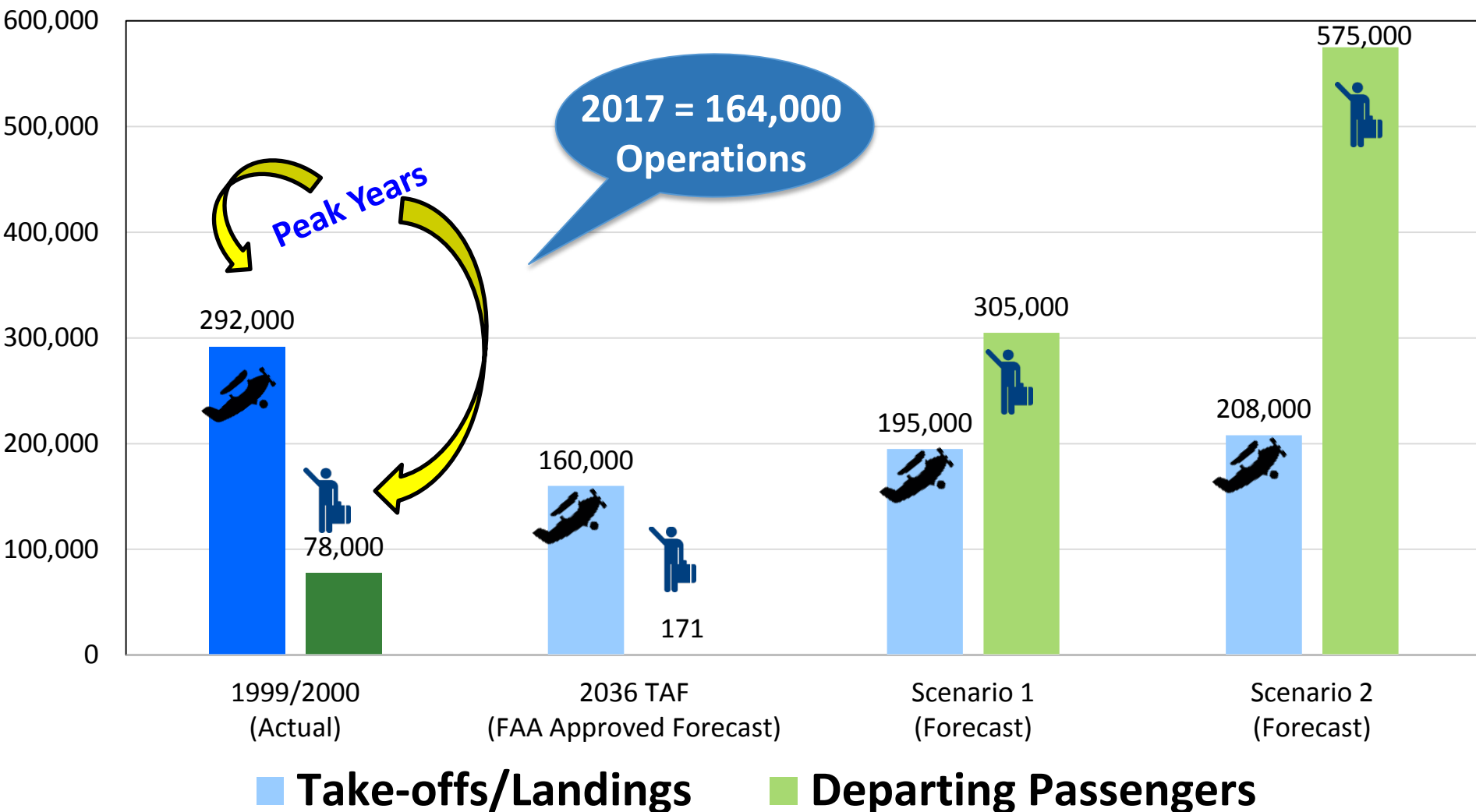


■ Take-offs/Landings = Operations

Historical & 2036 Forecast Passengers

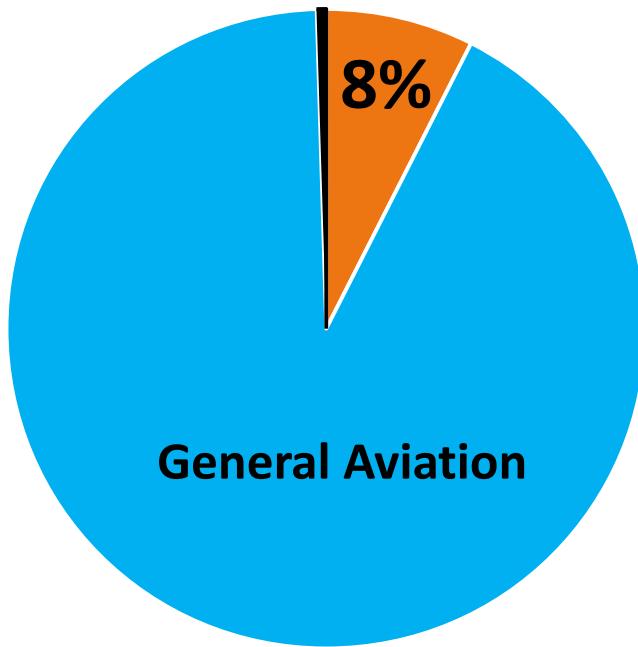


Historical & 2036 Forecast Passengers & Operations Totals

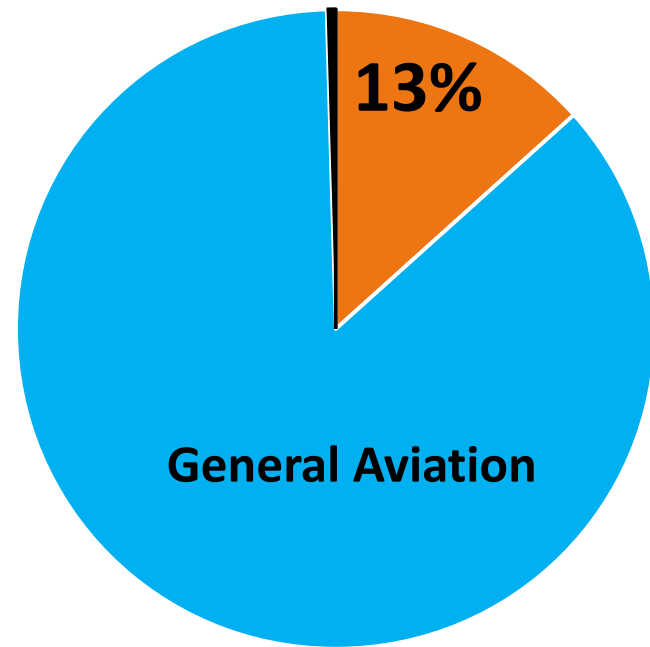


Total Operations in 2036

Scenario 1 – 195,000 Operations
with 305,000 Outbound Passengers



Scenario 2 – 208,000 Operations
with 575,000 Outbound Passengers



■ Commercial ■ General Aviation ■ Military



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Program EIR

Airport Design

- Reflect types of airplanes using the airport
- Utilize FAA Guidance on airport design
- Determine “Critical Aircraft”
 - defined as the most demanding aircraft with over 500 annual operations during the planning cycle

Aircraft Design Criteria

Primary Characteristics:

- Approach Speed
- Wingspan
- Weight

Approach Speed:

Aircraft Approach Category	Approach Speed (knots)
A	Less than 91
B	91 to 120
C	121 to 140
D	141 to 165
E (military only)	166 or Greater

Evolving Capabilities:

- Quicker landing and takeoff ability
- Longer range
- Better fuel efficiency

Wingspan:

Airplane Design Group	Wingspan (feet)
I	Less than 49
II	49 to 78
III	79 to 117
IV	118 to 170
V	171 to 213
VI	214 up to but less than 262

Airplane Design Examples

A-I Aircraft:



- Cessna 172 – Wingspan 36 ft.



- Beech Bonanza – Wingspan 33.4 ft.

B-II Aircraft:



- Falcon 2000 – Wingspan 63.5 ft.



- EMB-120 – Wingspan 65 ft.

Airplane Design Examples

C-II Aircraft:



- Challenger 600 – Wingspan 61.8 ft.



- CRJ-700 – Wingspan 76 ft
- Operated by Cal Jet by Elite Airways

C-III Aircraft:



- G-550 – Wingspan 93.5 ft.



- Global 7000 – Wingspan 104 ft.

D-III Aircraft:



- G-650 – Wingspan 100 ft.

Critical Design Aircraft changing from B-II to D-III



Falcon 2000 – B-II Current Critical Design Aircraft



B-II Aircraft – Current Design Standard

- Wingspans up to 79 feet long
- Approach Speed up to 121 knots

Gulfstream G650 – D-III Future Critical Design Aircraft



D-III Aircraft – Future Design Standard

- Wingspans up to 118 feet long
- Approach Speed up to 166 knots



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Reviewing Alternatives

BALANCE:

- Safety
- Community
- Stakeholders
- Environmental
- FAA Guidance
- Objectives
- Forecast
- Demand
- Critical Aircraft



Potential Alternatives



Alt 1 = Stay B-II

Enhance Safety

Alt 6 = C-III

Change to III Design for Separation
Distance & Safety, Monitor Operations

Preferred

Alt 5 = D-III

Change to III Design for Separation
Distances & Safety

B-II Enhanced Safety Alternative



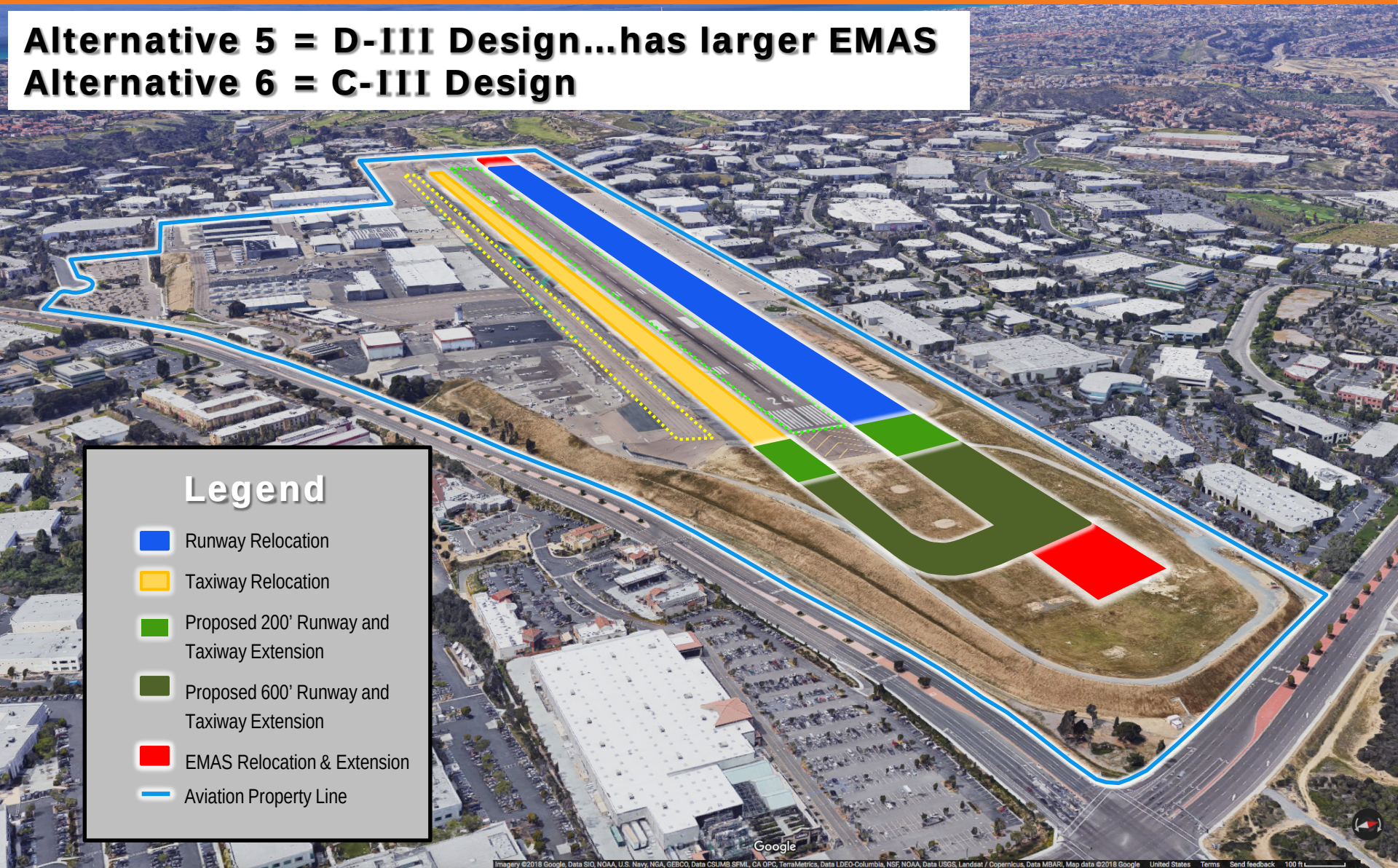
Alternative 1 = B-II Design



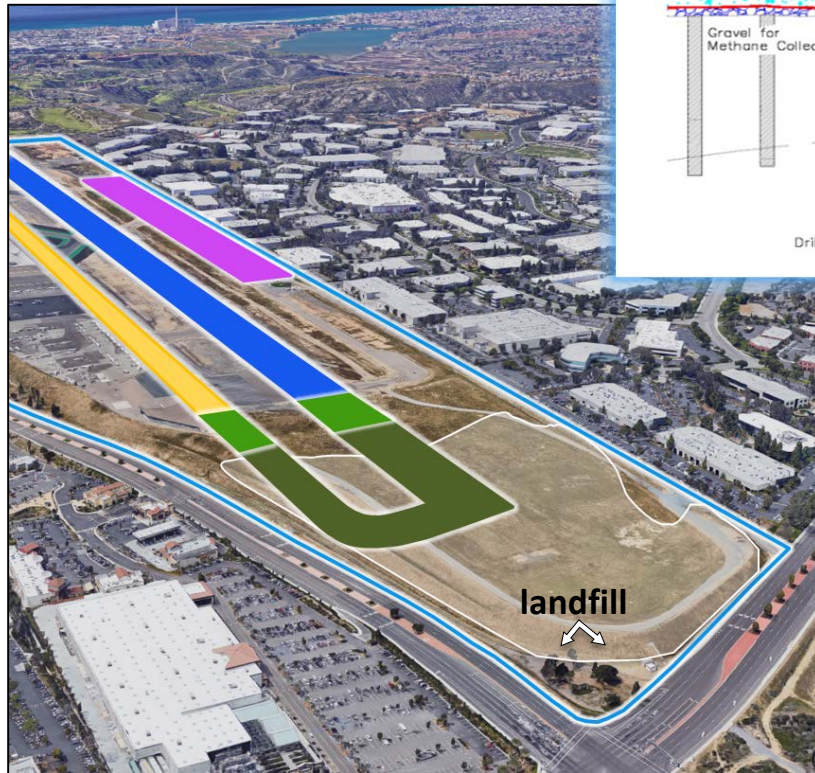
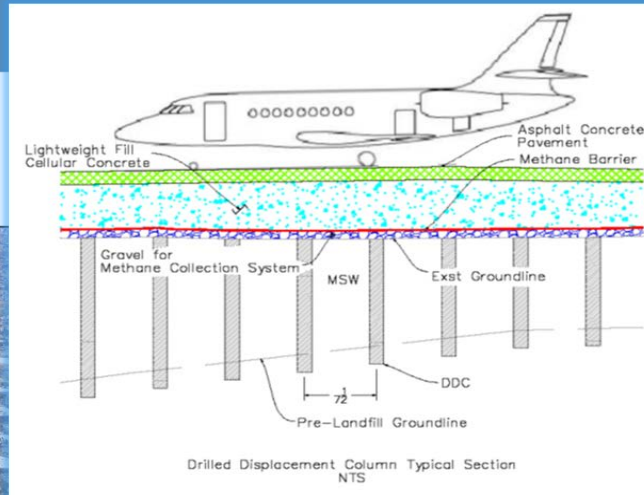
C-III (Alt. 6) & D-III (Alt. 5) Alternatives



Alternative 5 = D-III Design...has larger EMAS
Alternative 6 = C-III Design



Runway Extensions & Landfill



B-II Safety Enhanced Design
200' and 700' Extensions



C-III & D-III Modified Standards Compliance
Design with 200' and 600' Extensions

EMAS Safety Improvement

Engineered Materials Arresting System (EMAS):

- Safely Stops Planes & Prevents Runway Overruns
- Crushable Concrete
- FAA Approved



EMAS System

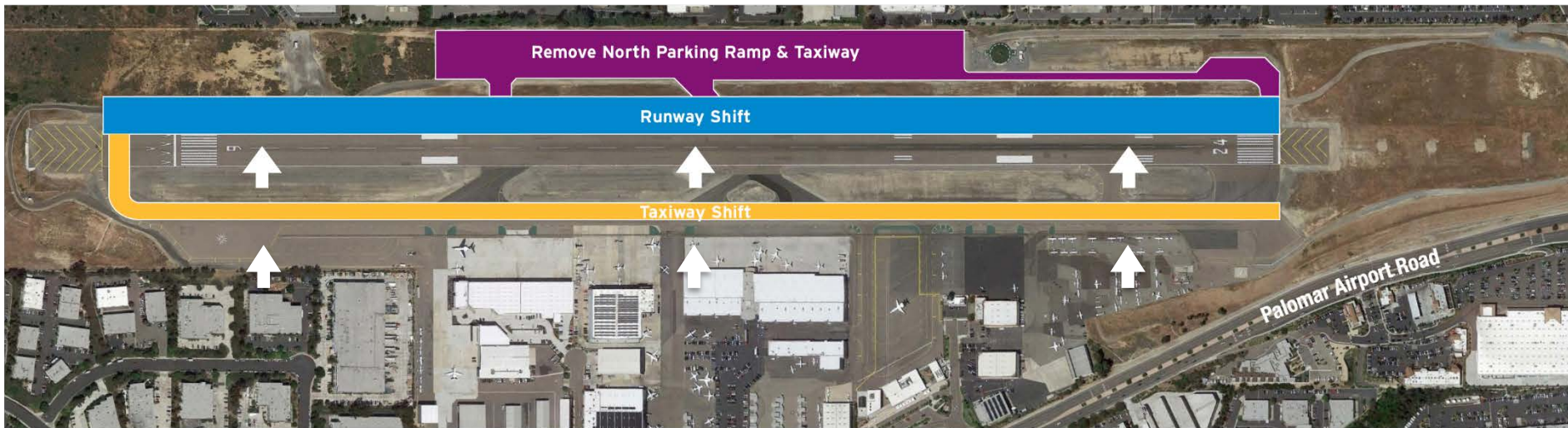
Alt. 5 (D-III Design) Install EMAS



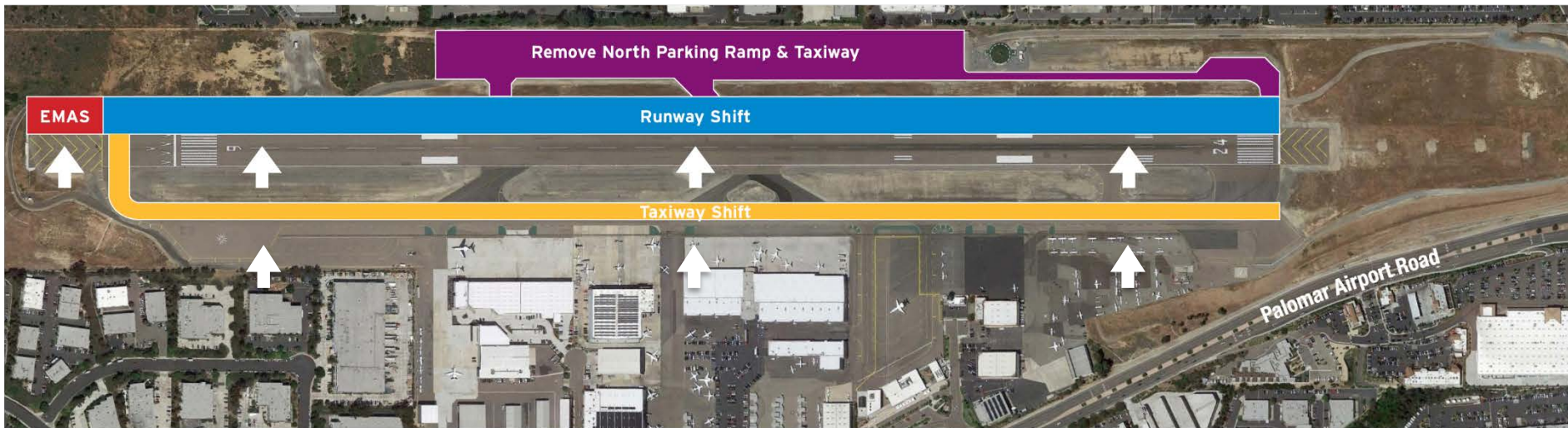
Remove North Parking Ramp & Taxiway



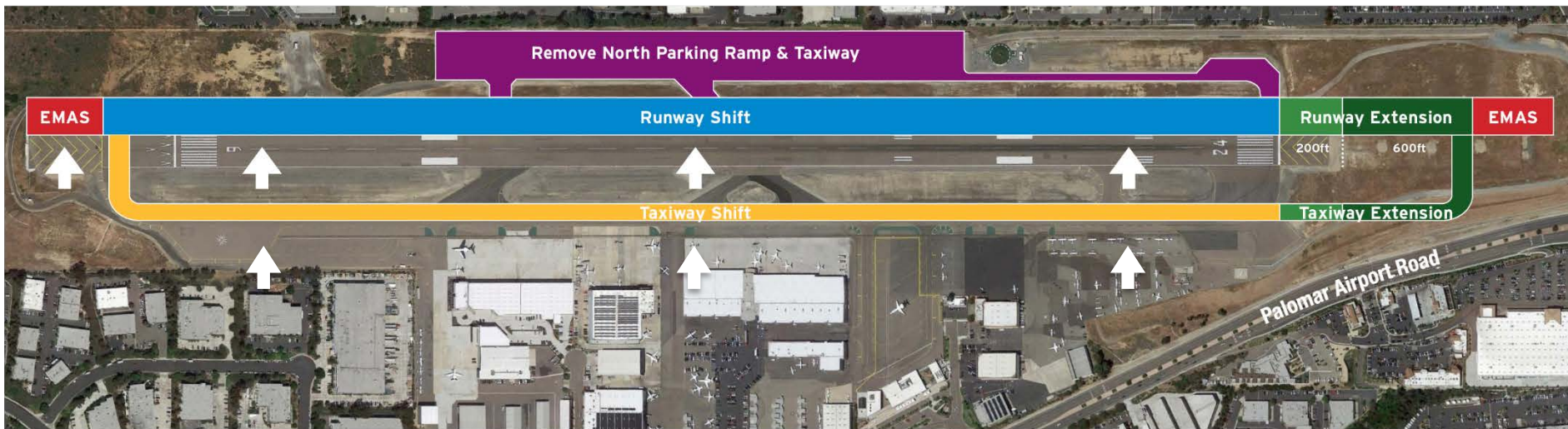
Shift Runway & Taxiway North to Improve Safety



Shift EMAS North



Extend Runway & Taxiway; Add East EMAS



Alternative Comparison Chart



	#1 B-II Alternative	#6 C-III Alternative	#5 (Preferred) D-III Alternative
Design Meets FAA Guidance throughout 20-year Planning Period			
Enhances Safety for Existing Wide-Winged Airplanes			
No Expansion Outside Fence Line			
No Impact to Aviation Business Leaseholds			
Includes Option to Install EMAS			
Includes Options to Extend Runway			

Existing Footprints

— = 500'



McClellan-Palomar Airport



John Wayne Airport



Palomar vs. John Wayne Airport

Terminal has 26 gates

John Wayne Airport
Terminal and Parking Apron



John Wayne Airport

Terminal has 1 gate

Palomar Airport
Terminal and Parking
Apron



Palomar Airport



Palomar vs. John Wayne Airport Comparison of Commercial Areas



Terminal has 26 gates



Terminal has 1 gate



John Wayne Airport

Palomar Airport





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Master Plan Draft Program EIR – Environmental Review Approach



Master Plan Process
consists of two main
elements:

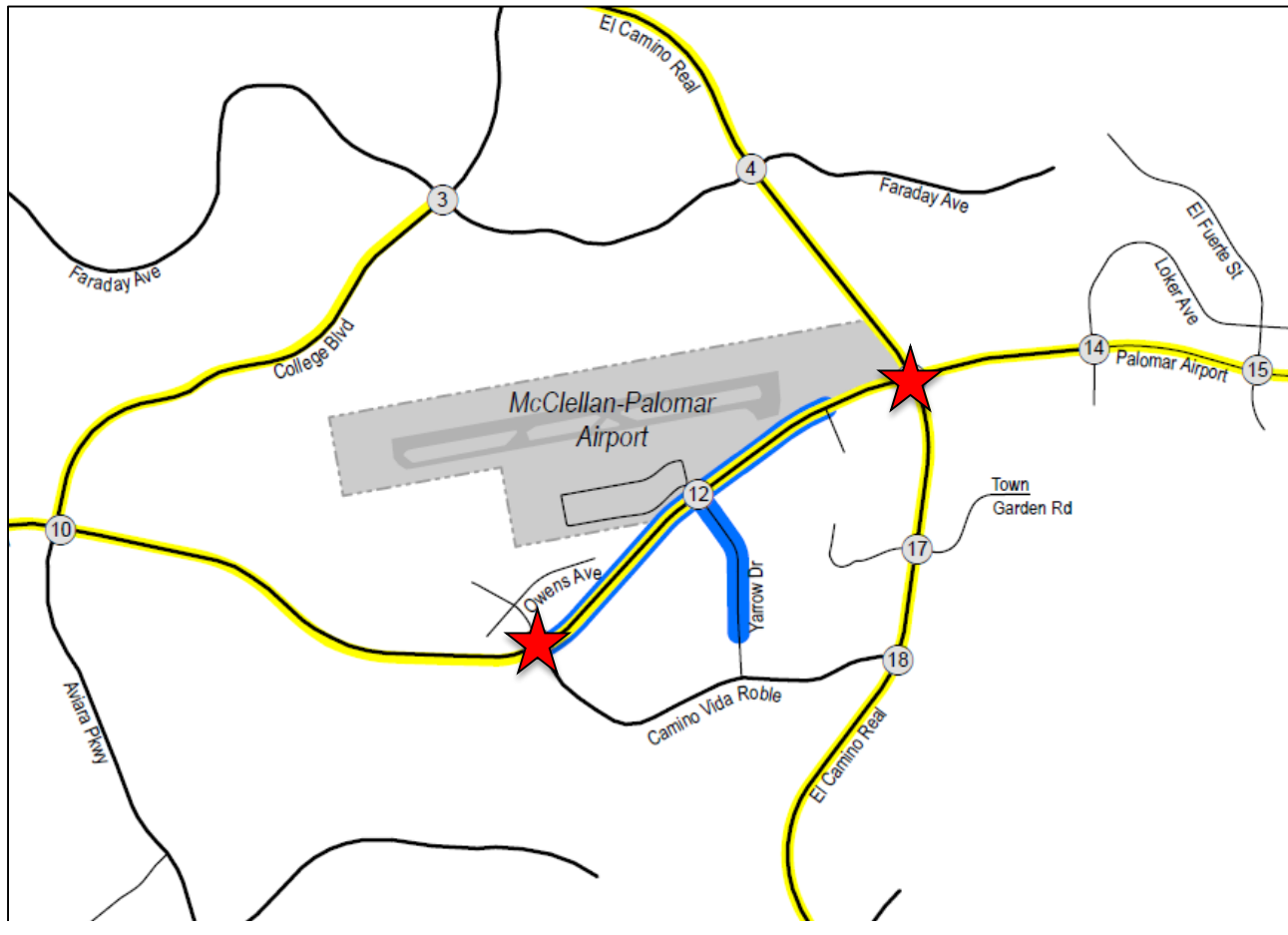
**Facility Improvement
Alternatives**

Engineering-based, Airport layout

Environmental Review

Existing environmental setting
Conceptual project footprints

Traffic



Increased commercial passengers may cause an impact to traffic. Mitigation is proposed.

Measuring Aircraft Noise



Factors for determining aircraft noise:

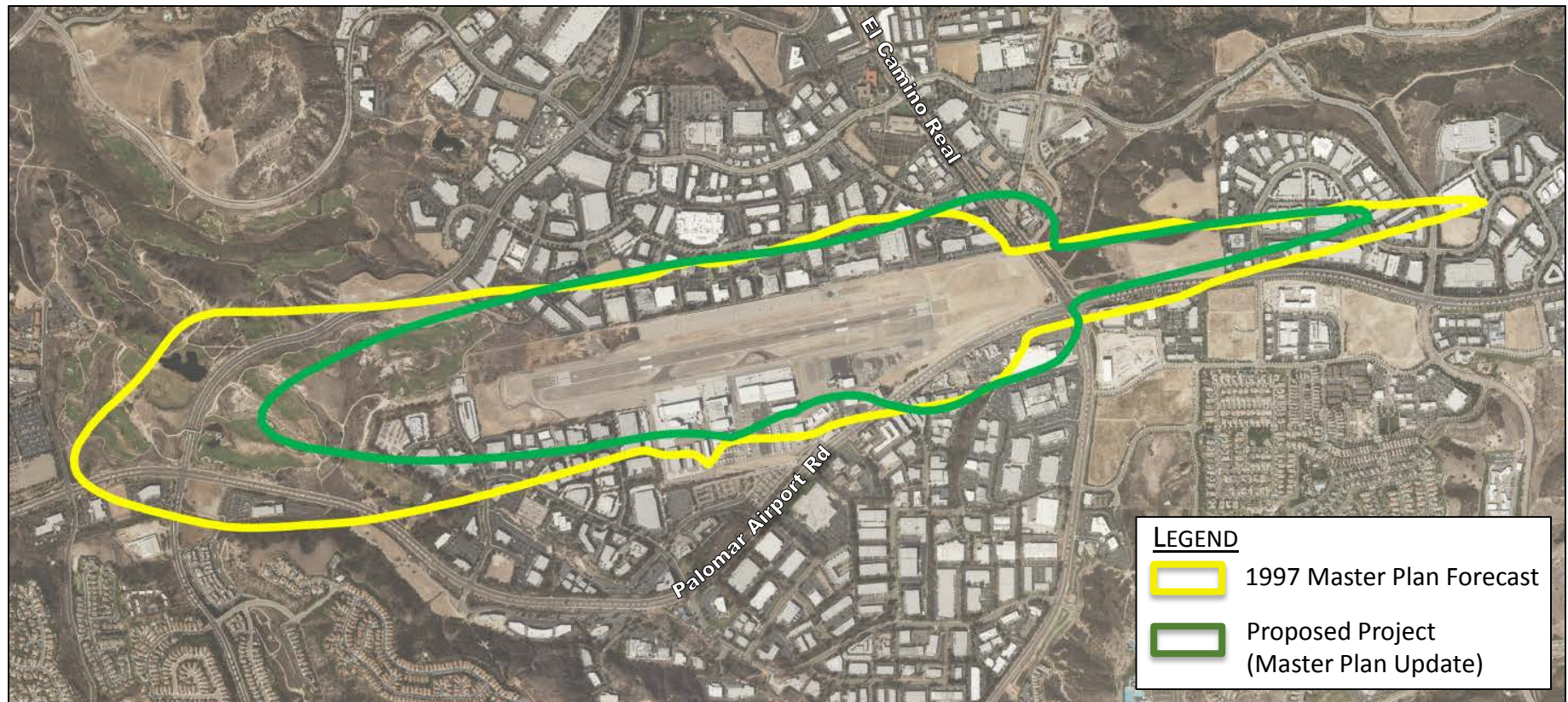
- Flight tracks
- Type of airplanes
- Number of operations

Community Noise Equivalent Level (CNEL):

- 24 hour average measurement
- 65 CNEL is the reference level for noise impacts and land use compatibility

If residential areas are at or above 65 CNEL, additional analysis is needed.

Noise



Current & Long-Term Aviation Noise: No Significant Impact

All residential areas are outside the 65 CNEL boundary

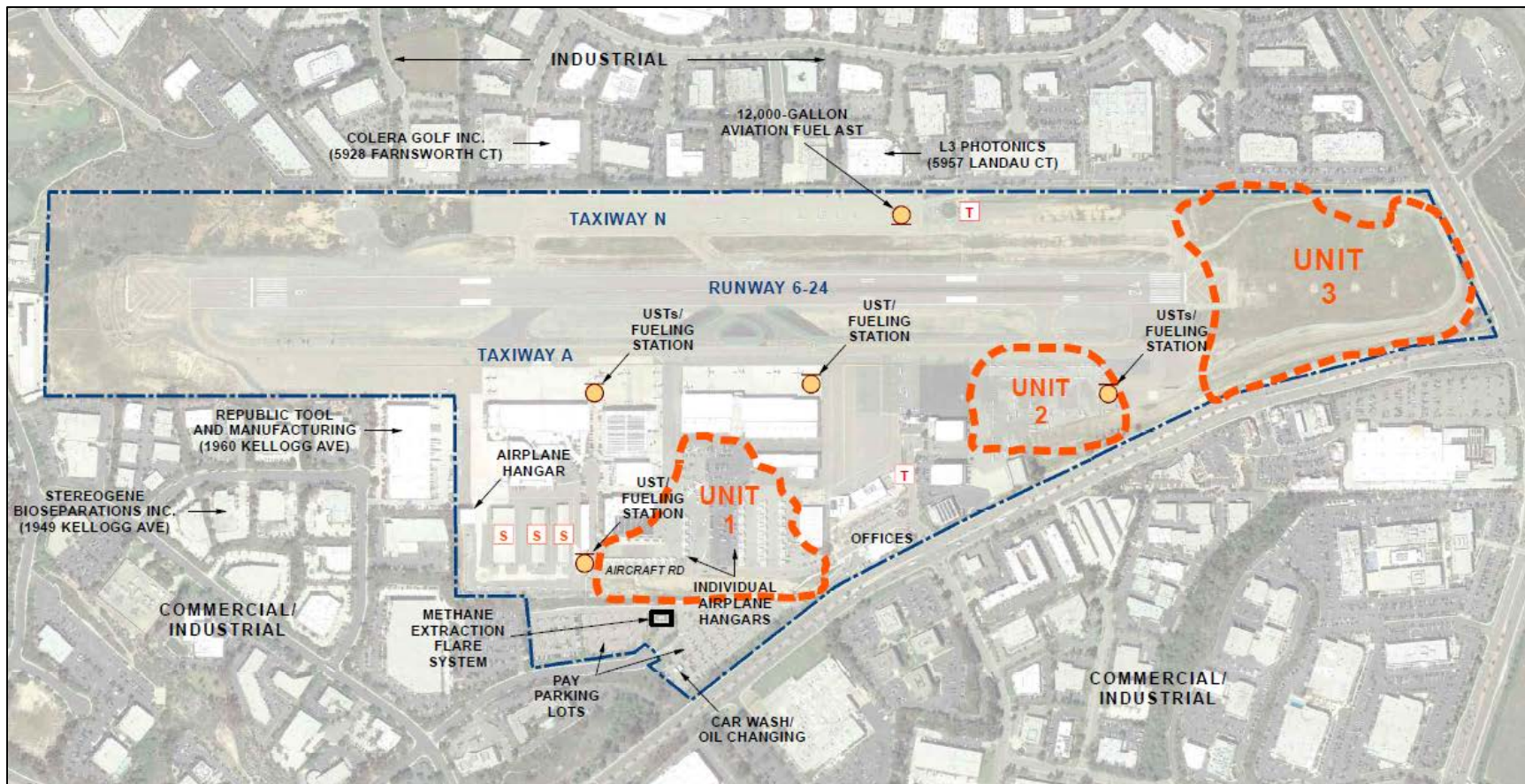
Aesthetics



Motorists passing through the area may notice a change if a retaining wall is placed along Palomar Airport Road to support an east end EMAS.

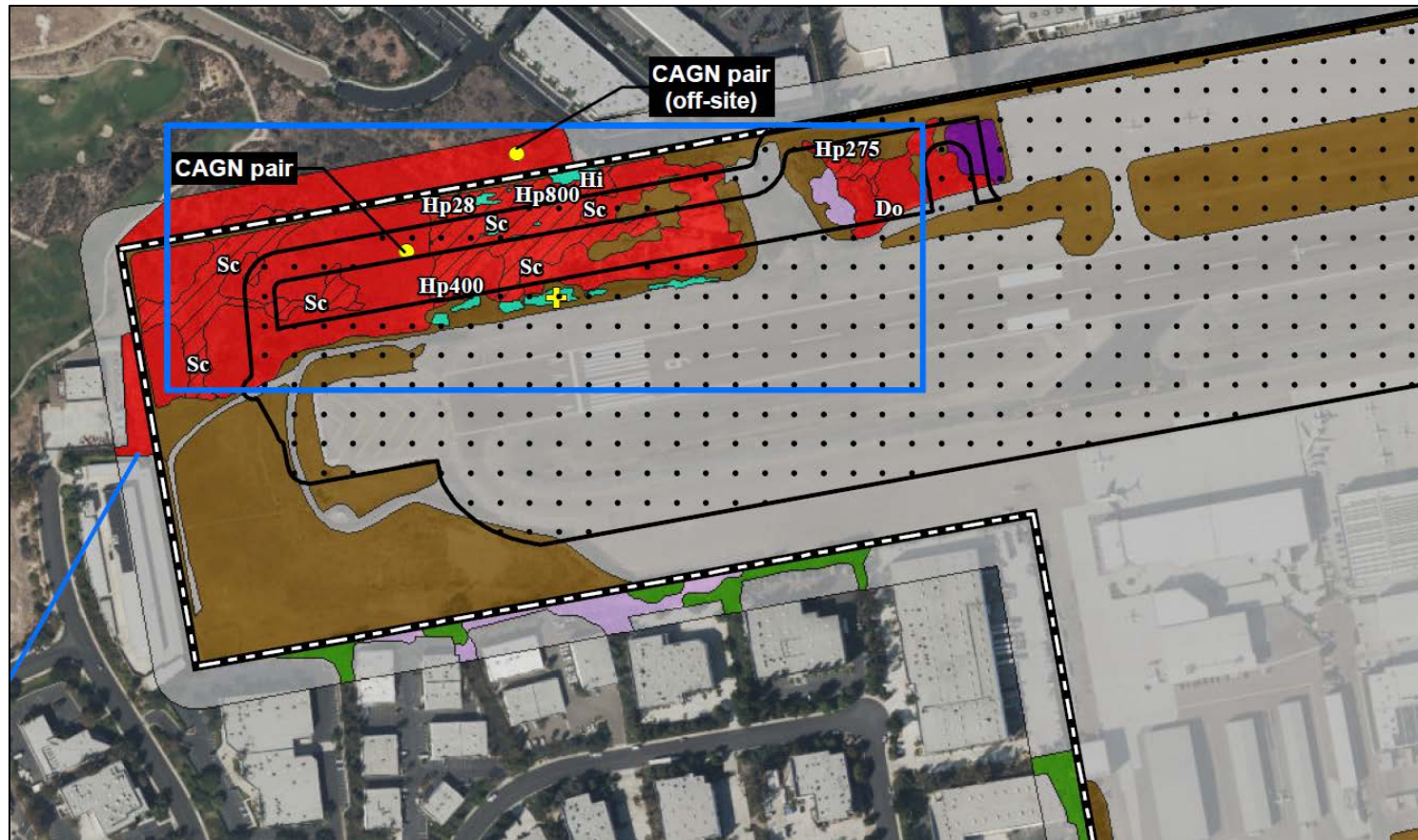


Hazardous Materials



Earthwork in the inactive landfill units requires construction remediation plans in order to mitigate contaminant exposure.

Biological Resources



Removal of native habitat and impacts to birds are a significant impact and will be fully mitigated prior to construction in those areas.

Other Environmental Resource Areas



Draft Master Plan & Program EIR– 60-day Public Review



Documents available at:
www.PalomarAirportMP.com

Public Review Period:
January 18-March 19, 2018

Comment Submittal:

County of San Diego
Attn: Cynthia Curtis
5510 Overland Avenue, Suite 410
San Diego, CA 92123

PalomarMP@sdcounty.ca.gov



Next Steps



1. Develop written responses to Public Review comments on the Draft Program EIR
2. County Board of Supervisors hearing to consider Master Plan and Program EIR

If approved, airport improvements will occur over time if and when construction funding is identified.

Future Open House and Workshop

Palomar Open House – Feb. 7th

Public Workshop – Feb. 13th

Recap

- FAA recommends a Master Plan be updated routinely
- Proposal stays within the existing fence line
- Focus on safety improvements
 - Increase distance between taxiway and runway
 - Add EMAS
- Option to extend runway
- Continued use of existing airline terminal

Question & Answer



- One question per person
- Respect others and different opinions
- No disruptive behavior or talking over others
- Consider asking in-depth technical questions at stations

Note – Verbal questions are not considered official comments. All Draft Master Plan and Program EIR comments must be in writing.

Questions & Discussion

Thank you

