WELCOME

Please Sign In

Project Contact: Wayne Reiter

Airports Division Program Manager

(858) 573-1436 | WReiter@sandiego.gov

SD Airports

For more information, please visit

www.SDAirportPlans.com

Meeting Format

Project Team Introductions

Presentation Overview

1. Master Plan Overview, Purpose and Schedule
2. Noise / Air Quality Overview
3. Economic Impact Analysis
4. Introduction toDraft Alternatives
    1. Airside
    2. Landside
5. Next Steps

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1. Master Plan Overview, Purpose and Schedule

What is a Master Plan

"...a comprehensive study of an airport [that] usually describes the short-, medium-, and long-term development plans to meet future aviation demand."

- FAA Advisory Circular 150/5070-6B, Airport Master Plans

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Why now?

- Last City adopted Master Plan was completed in 1980
- Recommended in City Performance Audit
- New FAA Design Standards
- Transformational changes in aviation
- Updated and approved Airport Layout Plan required for FAA funding

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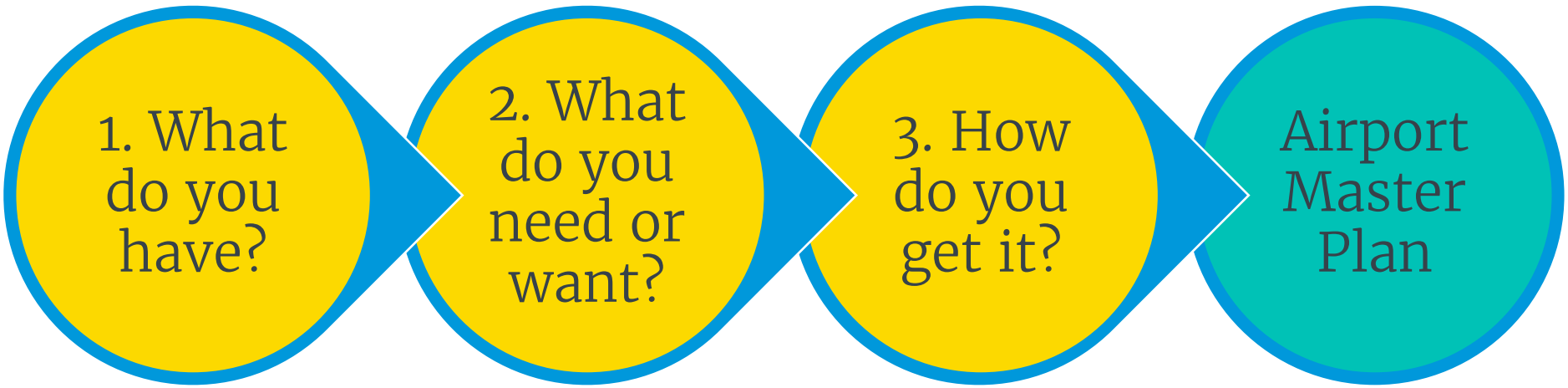
Master Plan Objectives



- Existing conditions
- Inventory of assets
- Obtain stakeholder input

- Aviation forecasts (FAA reviews and approves)
- Demand and capacity analysis
- Obtain stakeholder and public input

- Determine alternatives
- Select the best alternative
- Prepare an implementation plan
- Obtain stakeholder and public input

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Master Plan Steps

1. Data Collection

- Airport inventory
- Environmental setting
- Related studies
- Historical activity review

2. Forecast

- Aircraft operations
- Fleet mix/based aircraft
- Peaking characteristics
- FAA approval

3. Facility Requirements

- Airfield design
- Landside development/support

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Master Plan Steps

4. Alternatives

Reasonable and practical

Formulate evaluation criteria

Matrix evaluation

5. Preferred alternative /CEQA analysis

City selects preferred alternative

Conduct CEQA analysis

Financial plan

Master plan adoption and ALP approval

City adopts the plan

FAA approves Airport Layout Plan

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Roles and Responsibilities

City of San Diego	FAA
Airport Sponsor	Provides Grant Funding
Provides Historical Data	Gives Technical Guidance
Converges Community Input	Approves the Forecast
CEQA Lead Agency	Reviews Work Product
Adopts Master Plan	Approves Airport Layout Plan

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Roles and Responsibilities

Community

- Shares Ideas
- Reviews Work Product
- Offers Recommendations and Suggestions

Advisory Committee

- Advise Study Team
- Promote Planning Process to Others
- Collaborate on Key Issues
- Reviews Work Product

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2. Noise / Air Quality Overview

Outline

- Modeling Approach
- Noise Metric Definitions
- Noise Results
  - Annual Average Day Operations
  - CNEL 2017 Baseline Noise Contours
- Air Quality Results

Modeling Approach

- Noise and air quality modeled using Aviation Environmental Design Tool
- Required Modeling Inputs
  - Airport Configuration
  - Fleet Mix and Operations
  - Runway Use
  - Model Flight Tracks
  - Flight Track Use
  - Meteorological Conditions
  - Terrain

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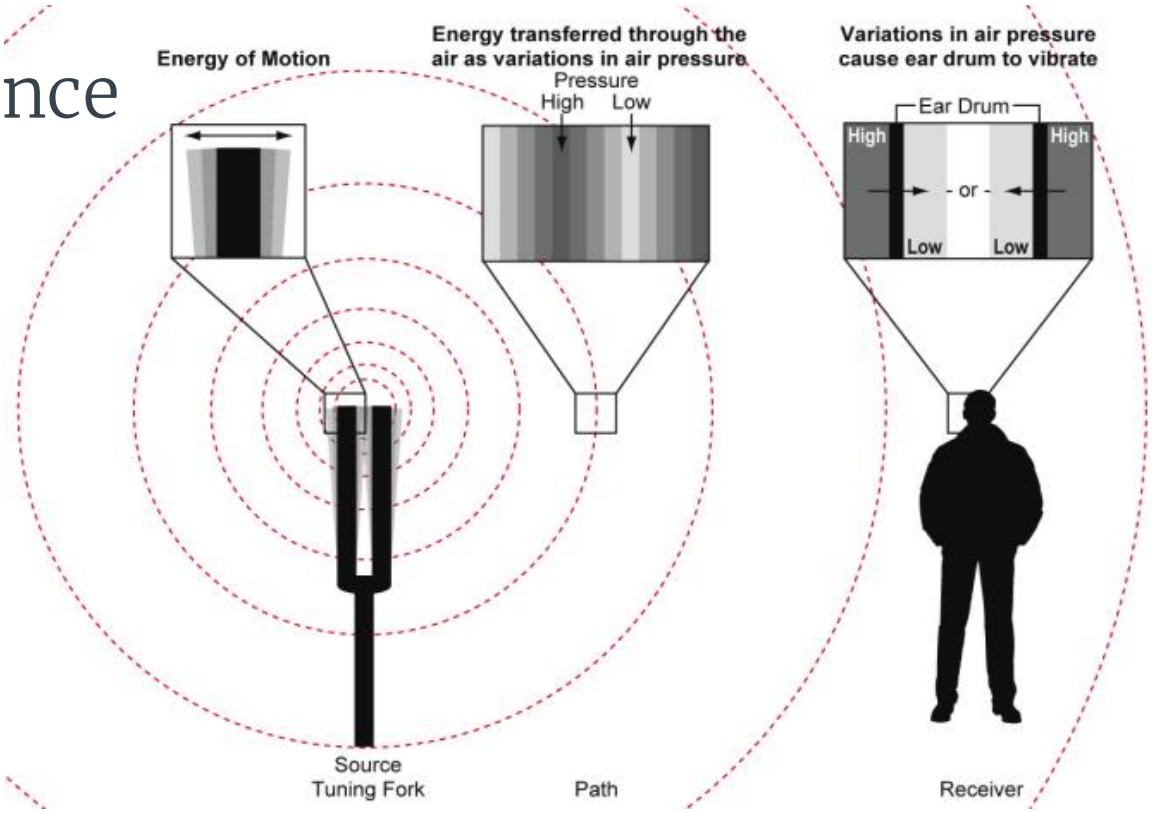
Noise Metric Definitions

- Sound is pressure variation our ears can detect
  - An objective quantity
- Noise is “unwanted sound”
  - A subjective quantity
- We relate sound and noise by considering effects
  - Annoyance
  - Speech interference
  - Sleep disruption



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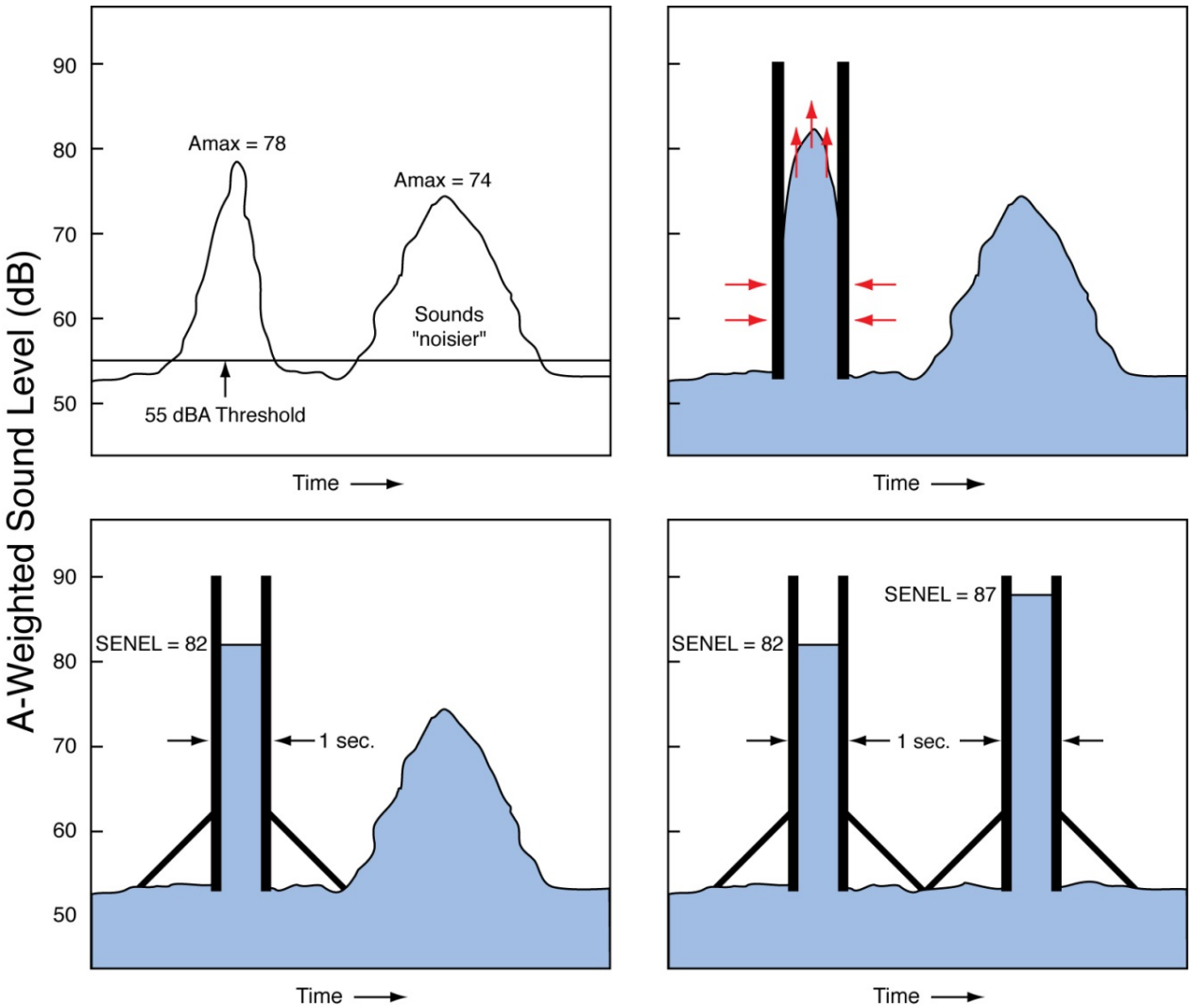
Noise Metric Definitions

- We use a logarithmic scale – decibels, or dB to express sound levels and noise levels
- Our ear is not equally sensitive to all frequencies
  - A-weighted decibels (dB) measure sound the way we "hear" it
- The simplest way to describe a noise "event" is its maximum sound level, Lmax
- A longer event may seem "noisier," even if it has a lower or equal maximum level

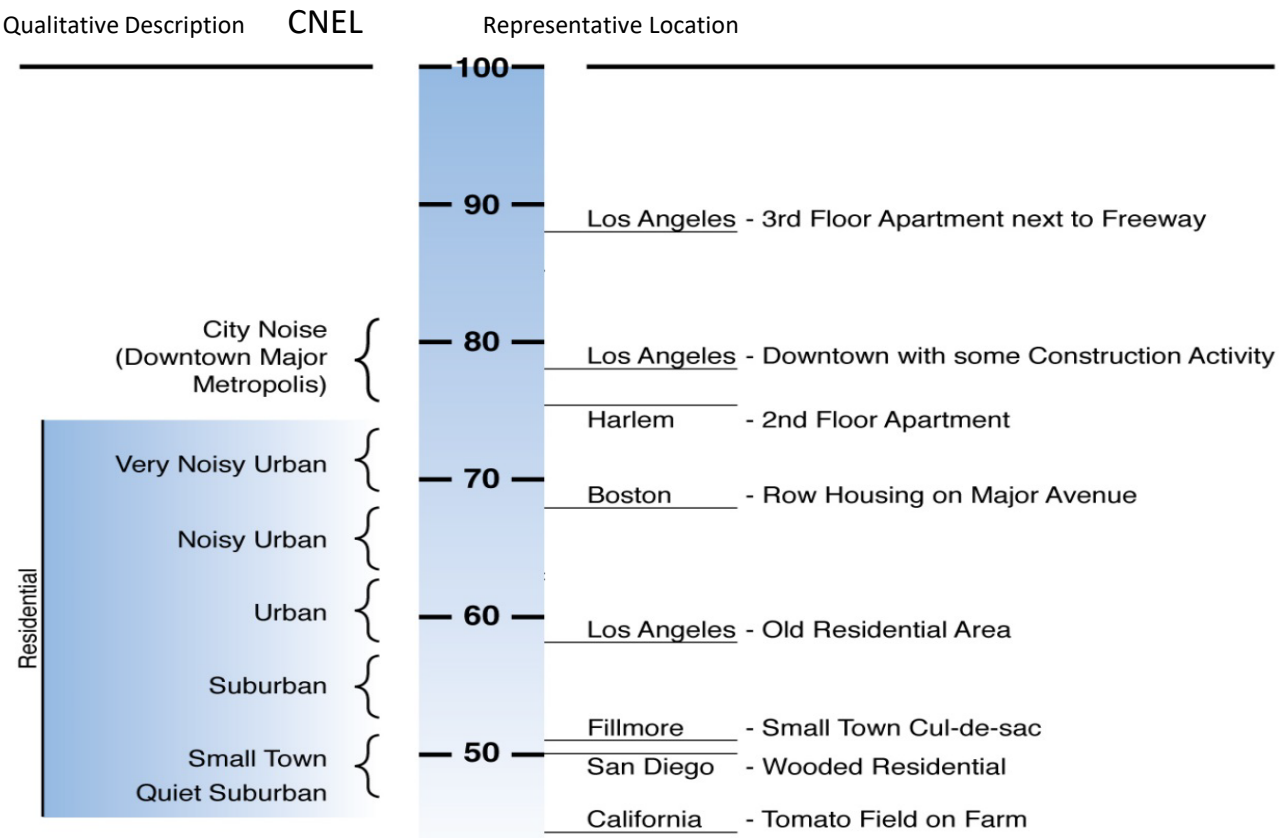
Noise Metric Definitions

- SEL measures the total "noisiness" of an event by taking duration into account



Noise Metric Definitions

- Community Noise Equivalent Level (CNEL)
  - Describes 24-hour noise exposure
  - Noise from 7 PM – 10 PM is factored up by 4.77 dB
  - Noise from 10 PM – 7 AM is factored up by 10 dB
    - This "penalty" is equal to counting each night aircraft 10 times



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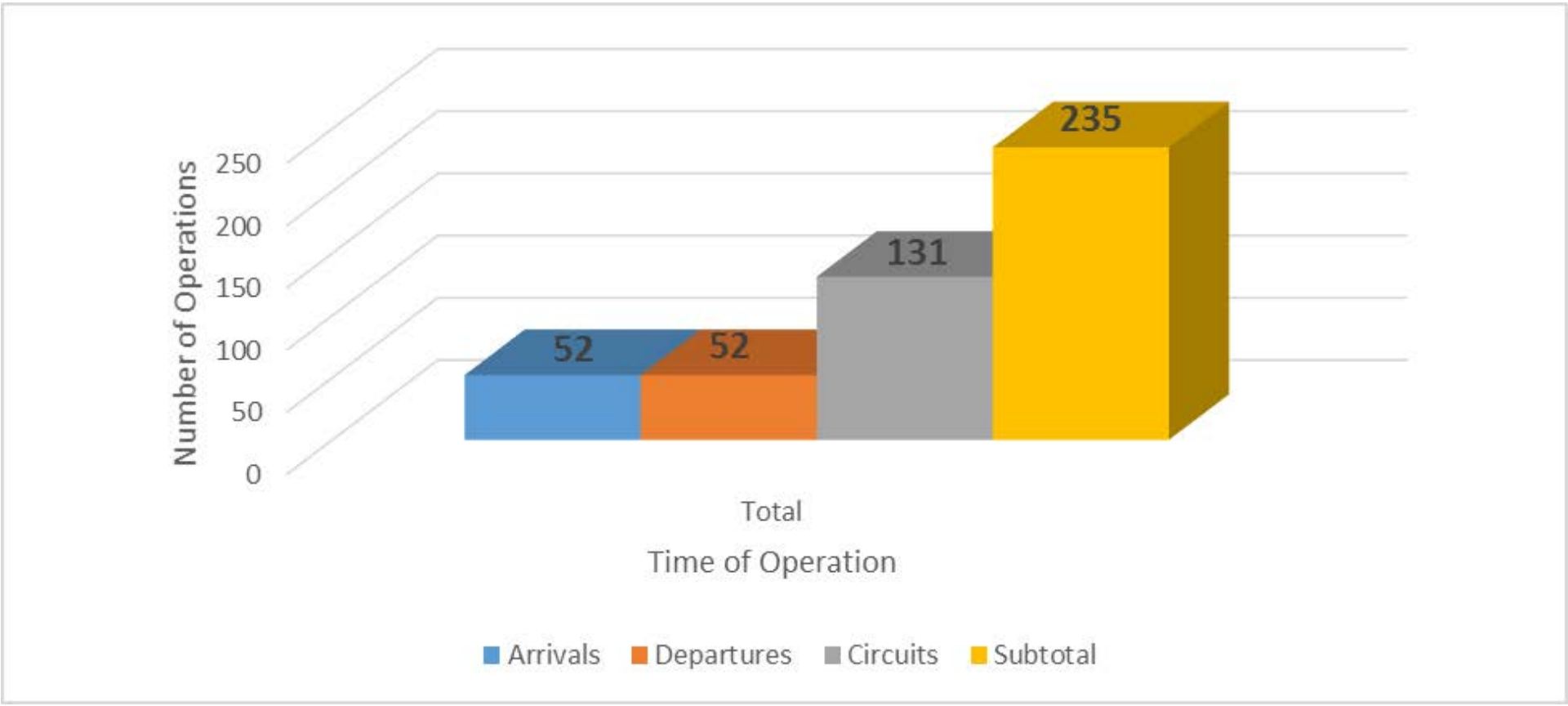
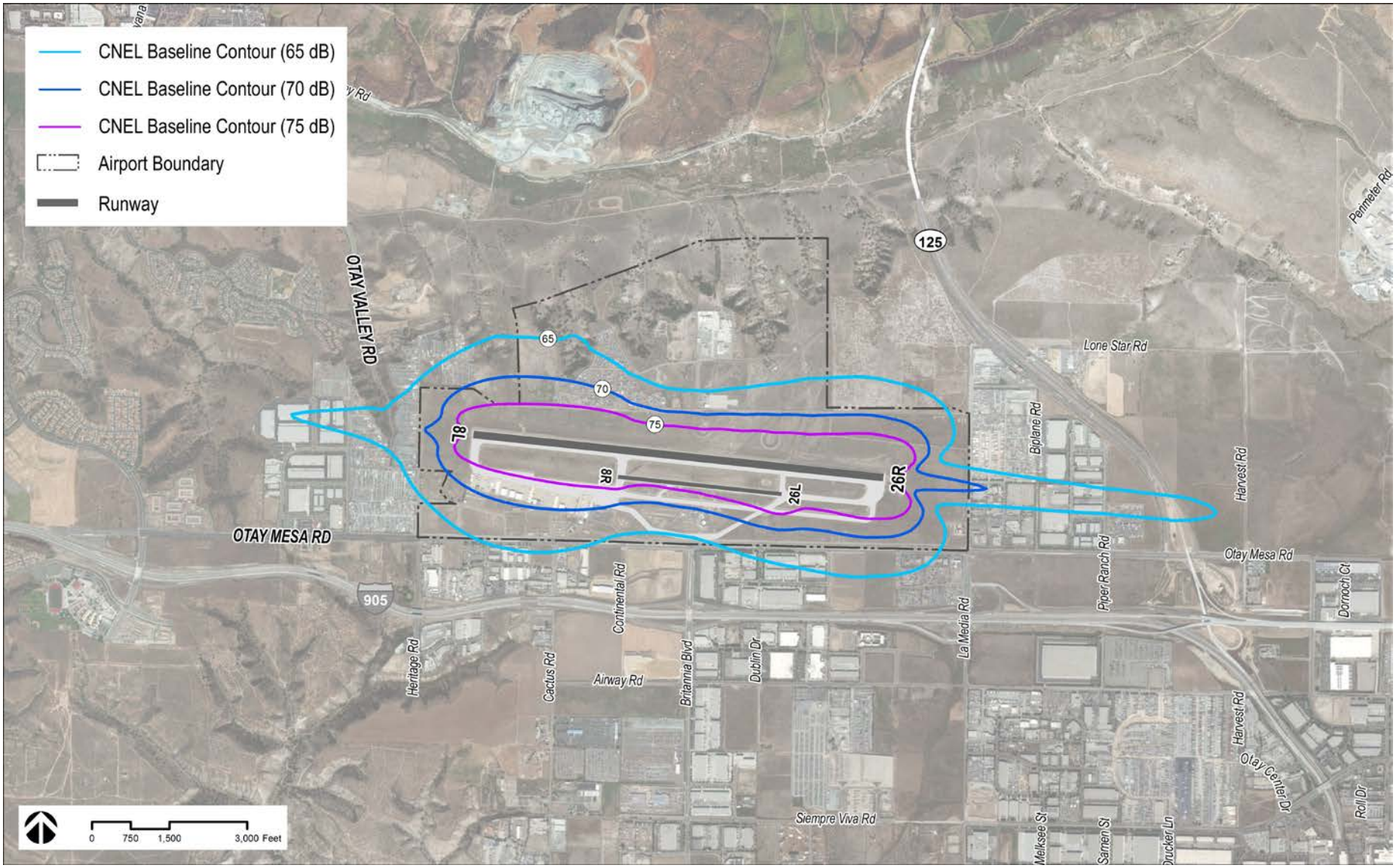
Average Annual Day Operations



2017 Baseline CNEL Noise Contour



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Air Quality: Overview

- The EPA has also identified Criteria Pollutants to be part of the National Ambient Air Quality Standards (NAAQS), which are protective of human health.
- Each state or region can specify their own pollutant levels (that may be more stringent) with mandated levels set by EPA as minimum requirements.
- De minimus levels define threshold of increased pollutants indicating impacts in nonattainment areas.1
  - Typically 100 tons per year

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Air Quality Results

- Criteria Air Pollutants
  - Carbon monoxide (CO)
  - Nitrogen dioxide (NO2)
  - Particulate matter (PM10)
  - Particulate matter (PM2.5)
  - Sulfur dioxide (SO2)
  - Lead (Pb)
  - Ozone (O3)

Note: Ozone is an indirect or secondary pollutant that occurs due to chemical reactions primarily between NO2 and volatile organic compounds (VOCs). As a result, volatile organic compounds (VOCs) and NO2, the primary precursors to ozone formation, provide surrogate information for assessing ozone levels.

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Air Quality Results

- Compared to EPA de minimis levels, SDM emissions fall well below the limits for the baseline; impacts are considered insignificant.

Airport	Co	No_x	PM10	PM2.5	SO_2	VOC	Lead (Pb)	CO_2
SDM Aircraft – Total	1.537	0.018	0.002	0.002	0.004	0.049	0.572	11.240

Notes:
1. Results expressed in metric tons.
2. Carbon dioxide (CO_2) emissions as a greenhouse gas, though this estimation does not account for the varying greenhouse gases and their associated emissions factors in comparison to CO_2.

3. Economic Impact Analysis

Economic Impact Analysis

- Airport and Tenant Operations
- Multipliers: On-Site Activity -> Off-Site Activity
  - Local effect (MYF) leads to regional effect (SD County)
- Methodology
  - Input-Output Modeling
  - Primary and Secondary Data
  - Site Visits

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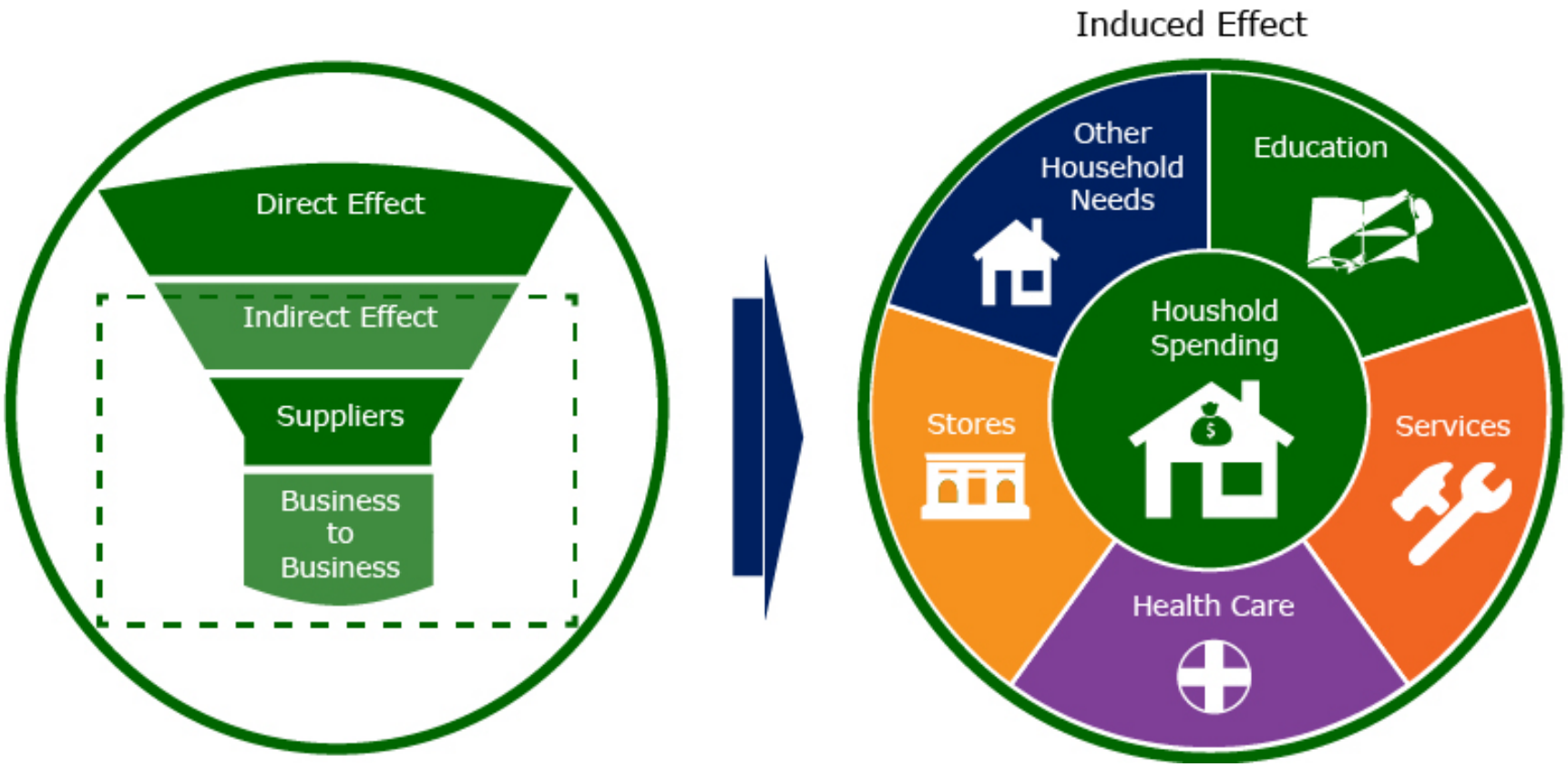
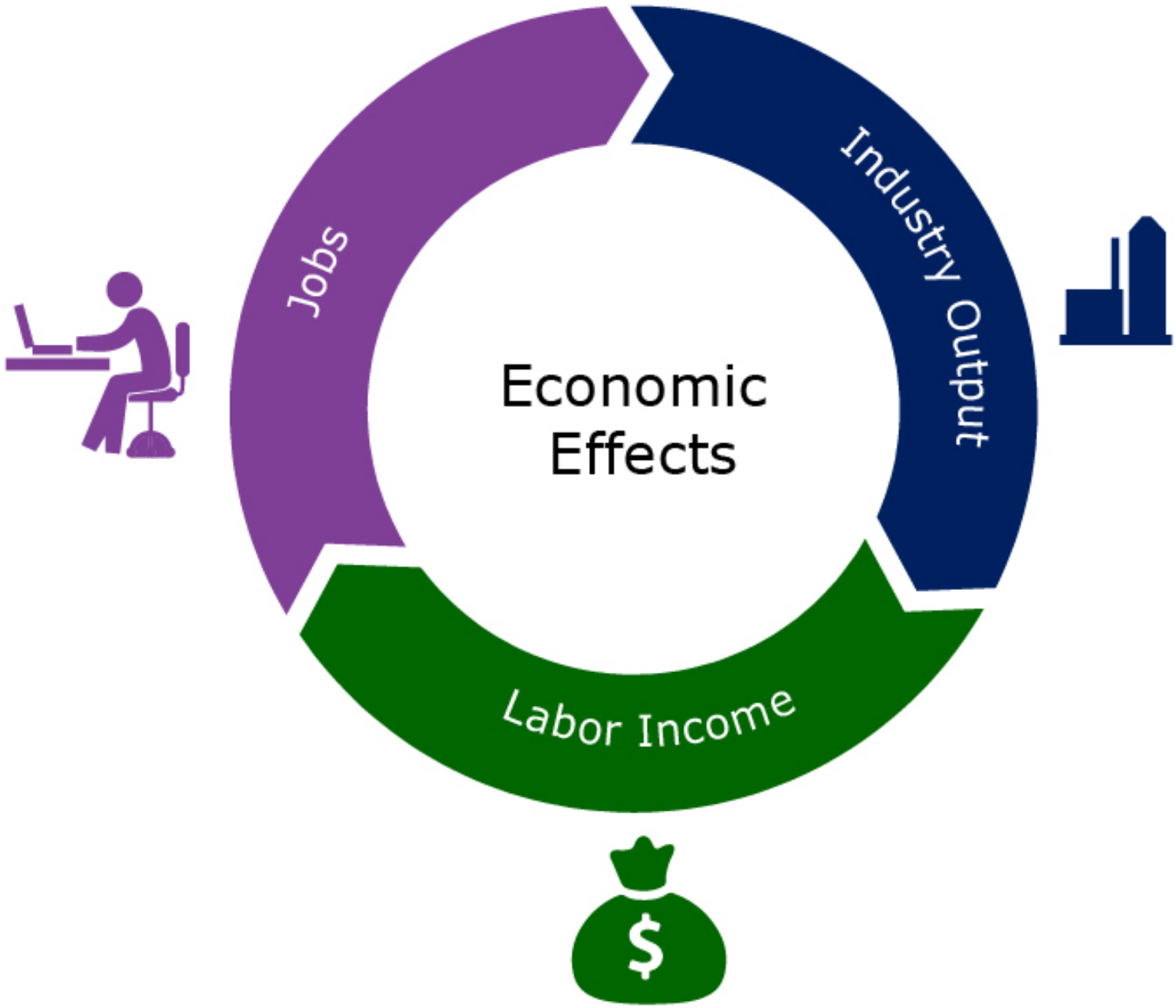
Multiplier Effects



Economic Measures



Airport Operations

- 25 On-Site Jobs
- Industry Output: $4.3 million
- Labor Income: $1.5 million

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Airport Operations

- 25 On-Site Jobs = 60.1 Total Jobs
- Output: $4.3M On-Site = $9.4M Total
- Income: $1.5M On-Site = $3.6M Total

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Tenant Operations

- 35 On-Site Jobs
- Industry Output: $4.8 million
- Labor Income: $1.9 million

Tenant Operations

- 35 On-Site Jobs = 74 Total Jobs
- Output: $4.8M On-Site = $10.5M Total
- Income: $1.9M On-Site = $4.2M Total

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Overall Operations

- 60 On-Site Jobs, 134 Total Jobs
- Output: $9.2M On-Site, $19.8M Total
- Income: $3.4M On-Site, $7.7M Total

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Largest Secondary Effects

- Public Sector
- Transportation and Warehousing
- Health Care
- Retail Trade
- Professional Services
- Hospitality (Accommodation and Food Service)

Next Steps

- Future Impacts
- Fiscal Impact Analysis

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4. Introduction to Alternatives

Alternatives Analysis

Evaluation

- Identifies best options to meet existing and forecast aviation activity

Sources

- Working Papers 2 and 3 – Forecast of Aviation Demand and Facility Requirements

Elements

- Airside and Landside Considerations

Application

- Preferred Alternative Selection

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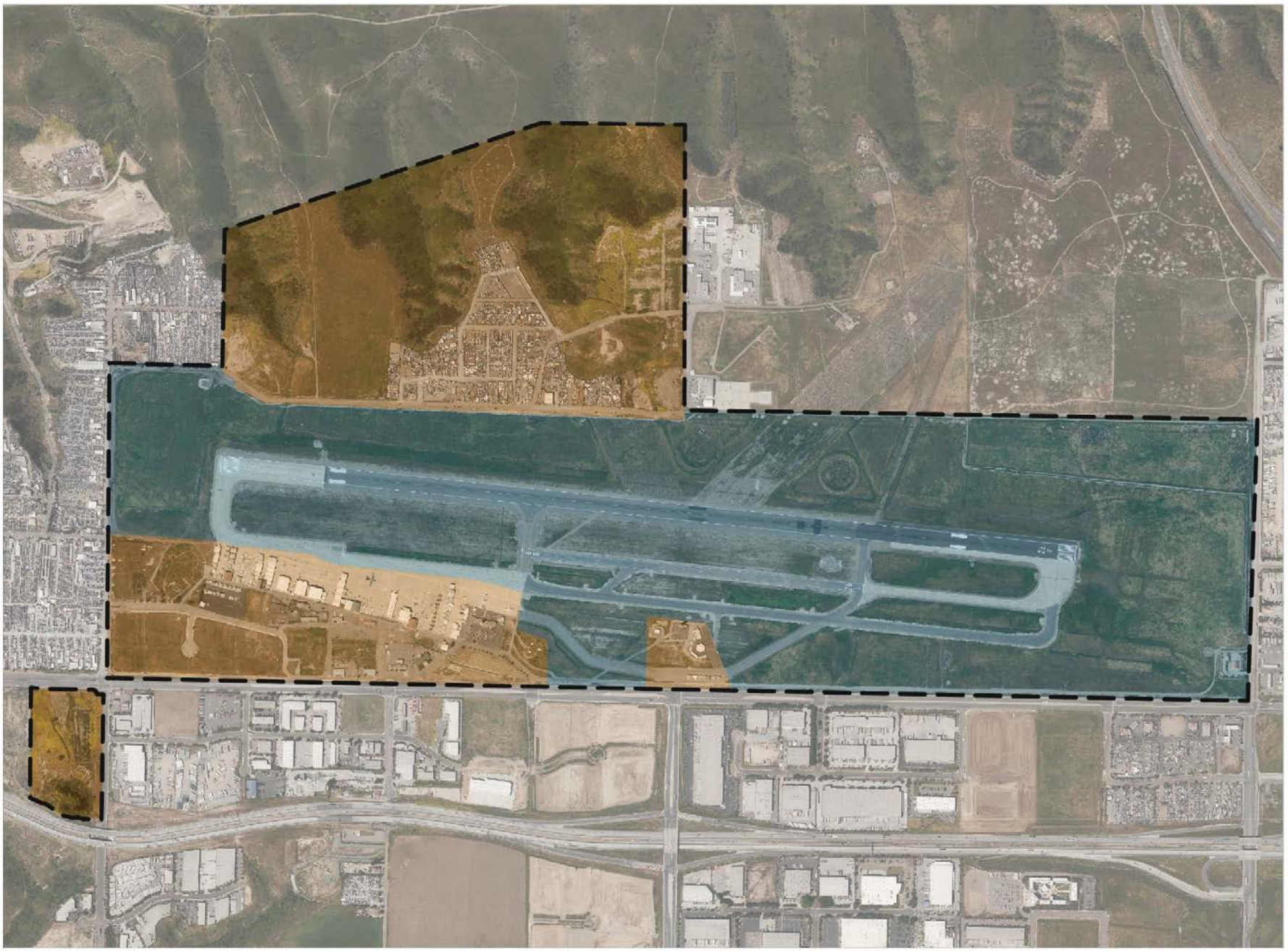
Airside vs. Landside



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Airside Draft Alternatives

ATKINS
Member of the SNC-Lavalin Group

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Alternative #1
No Action

ATKINS
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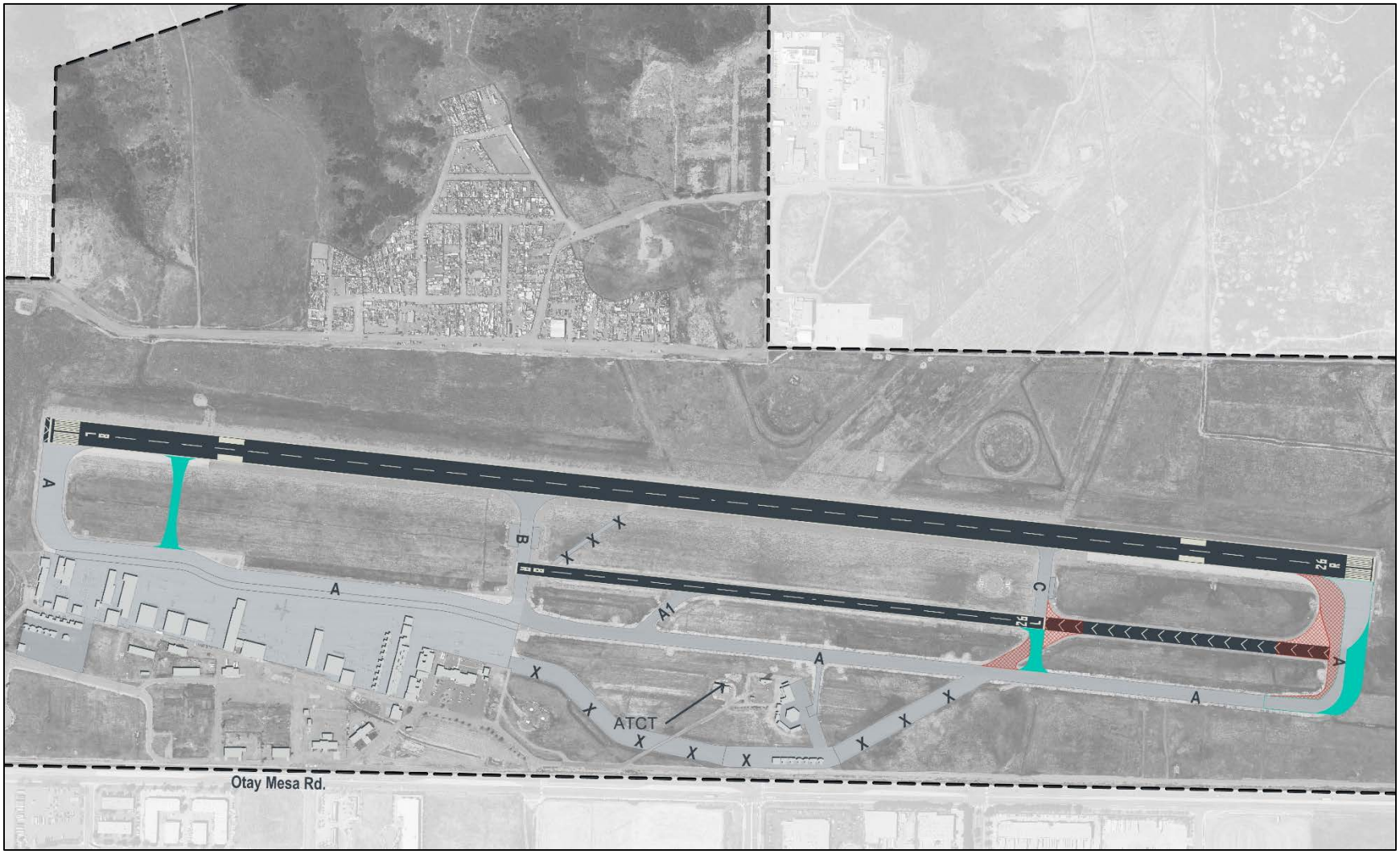
DRAFT
Alternative #2



ATKINS
Member of the SNC-Lavalin Group

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DRAFT
Alternative #3

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Landside Draft Alternatives

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Alternative #1
No Action

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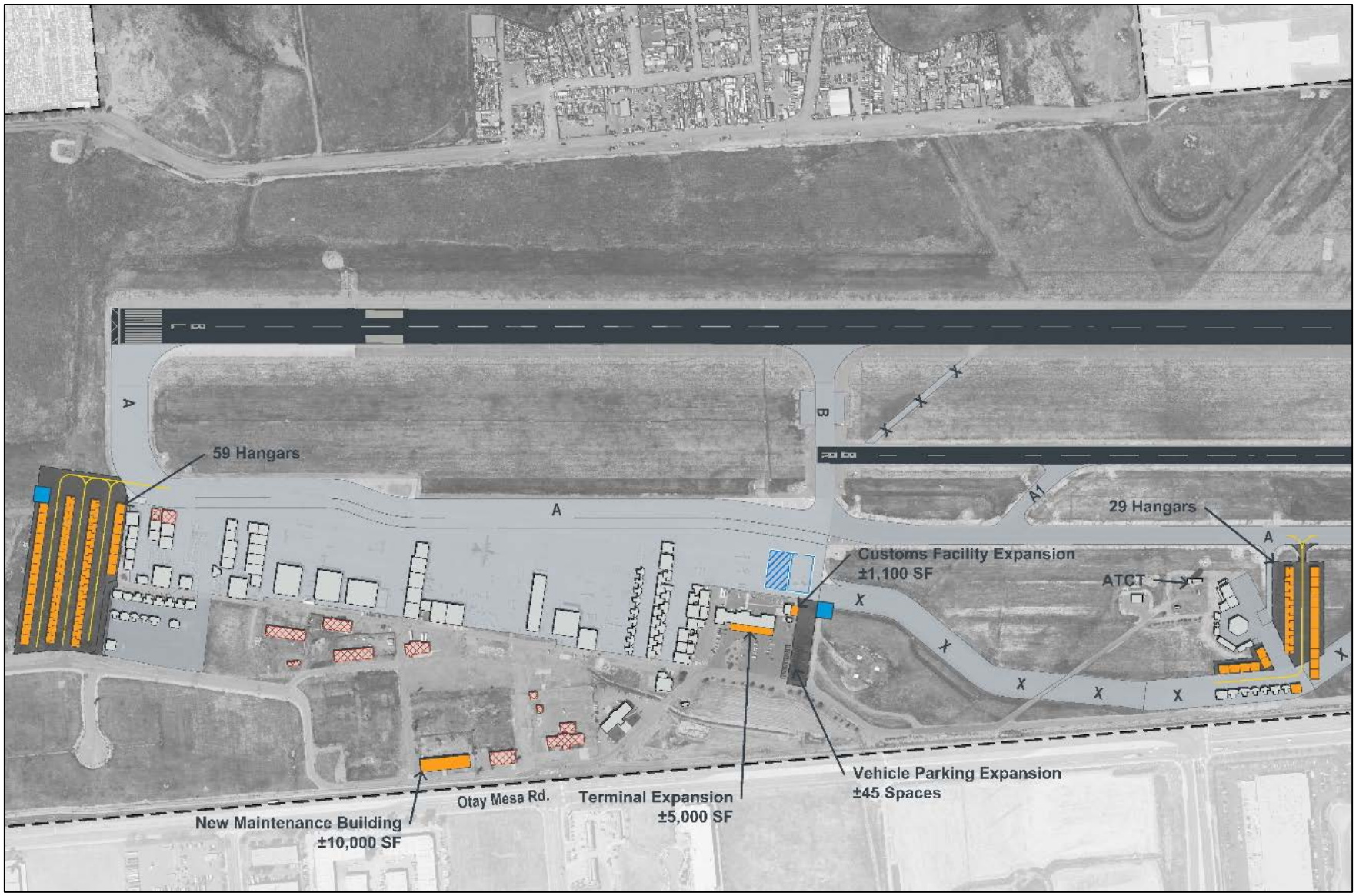
DRAFT
Alternative #2



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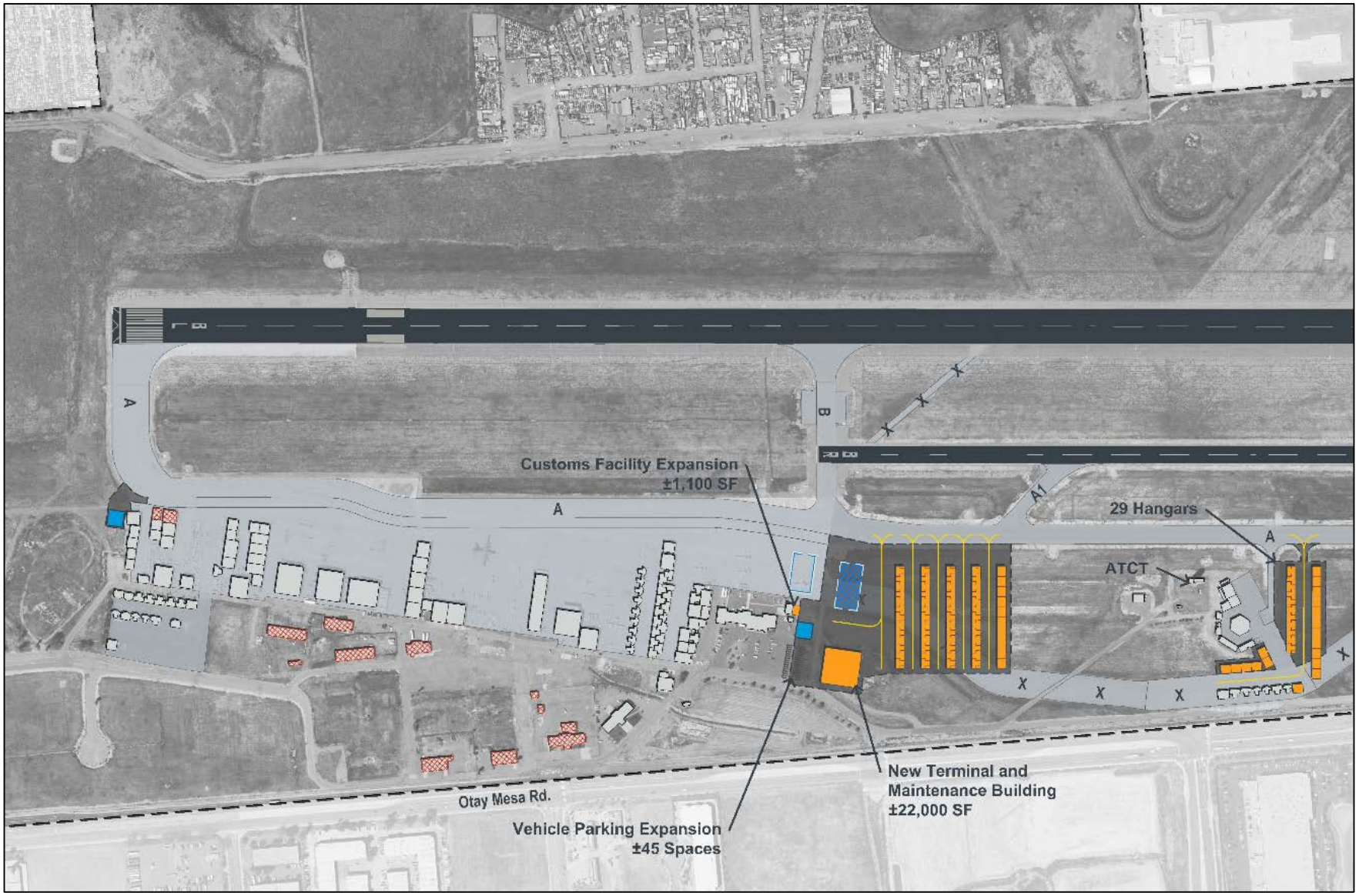
Alternative #3



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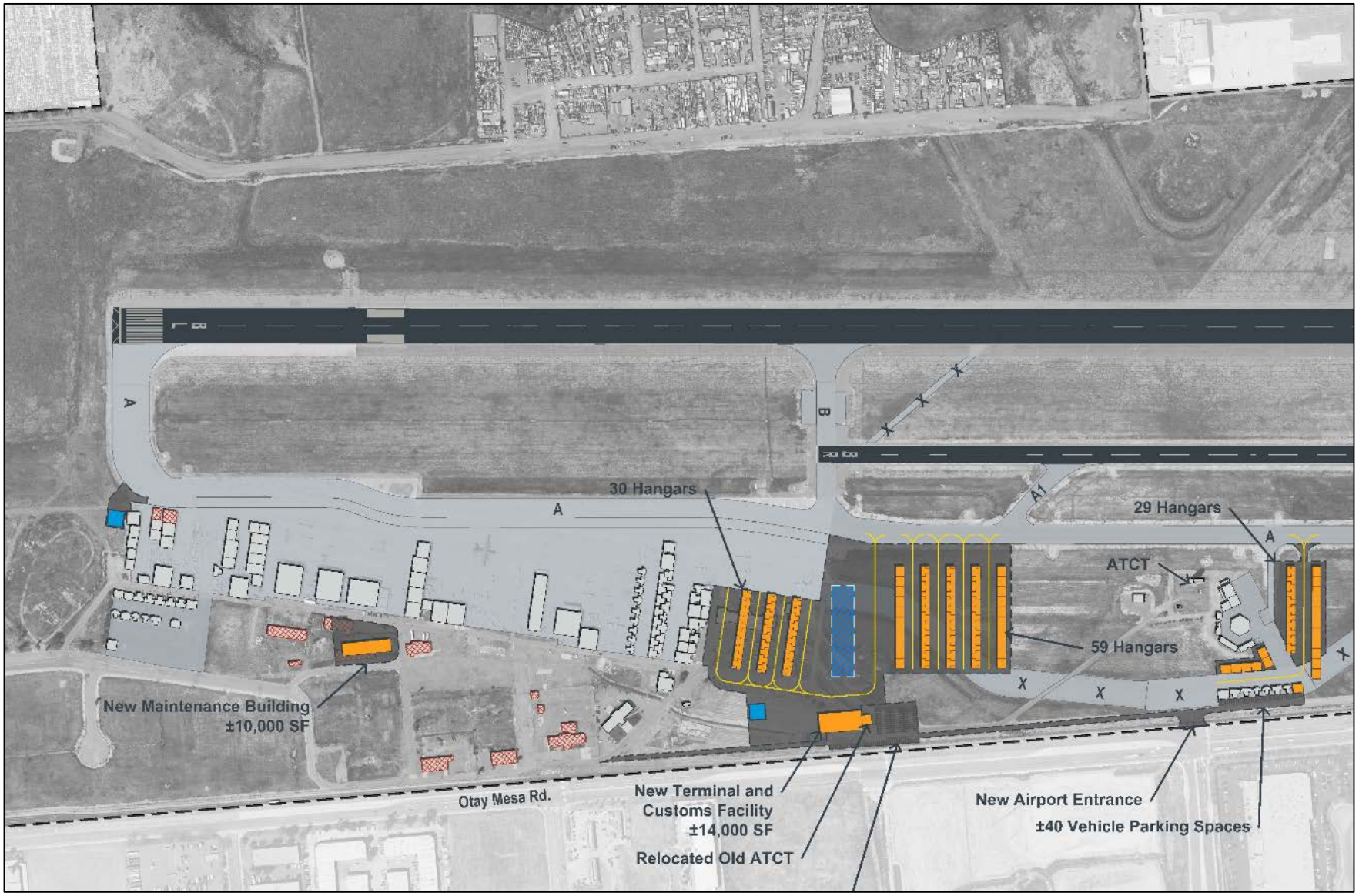
Alternative #4



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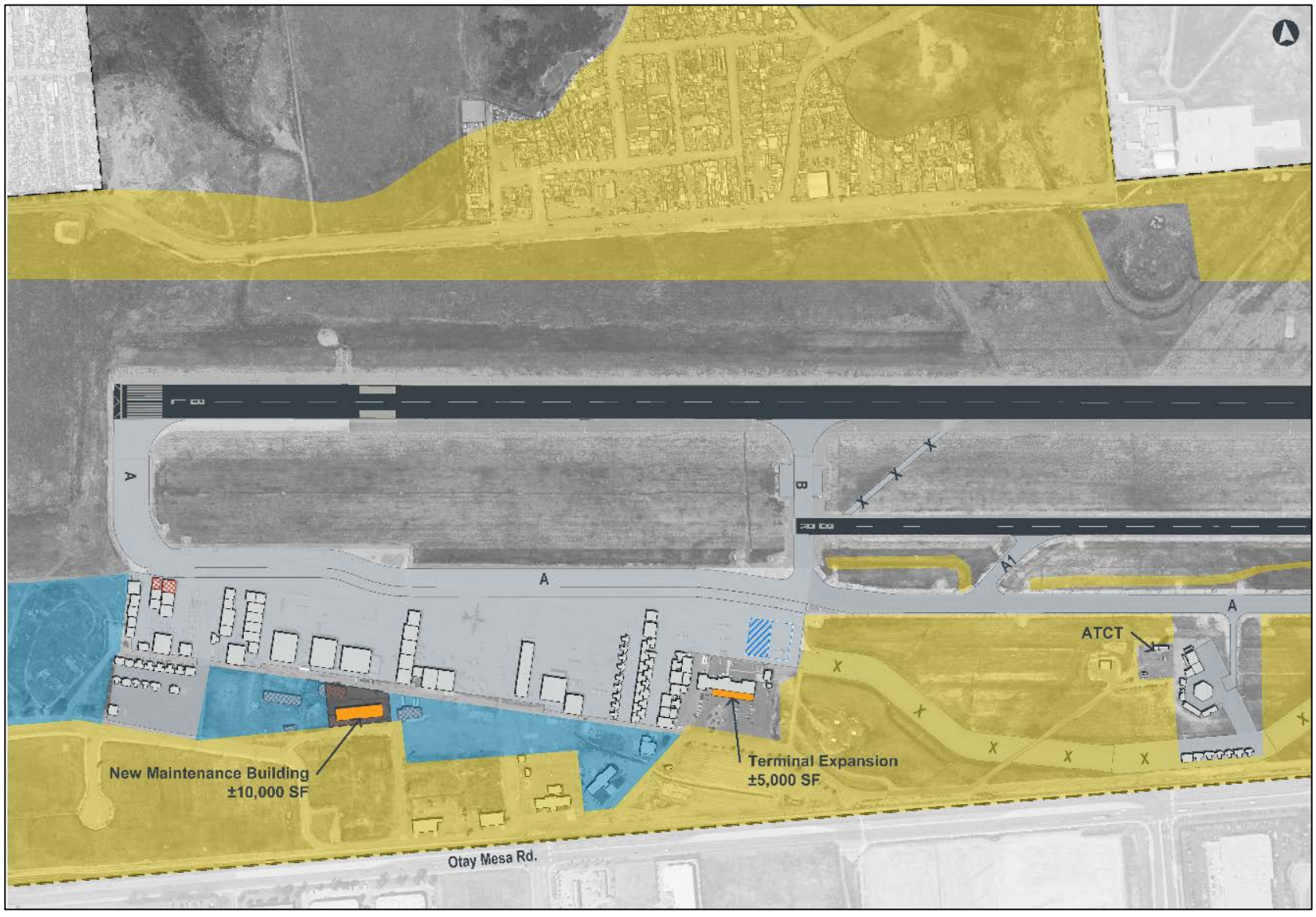
DRAFT
MAP Alternative



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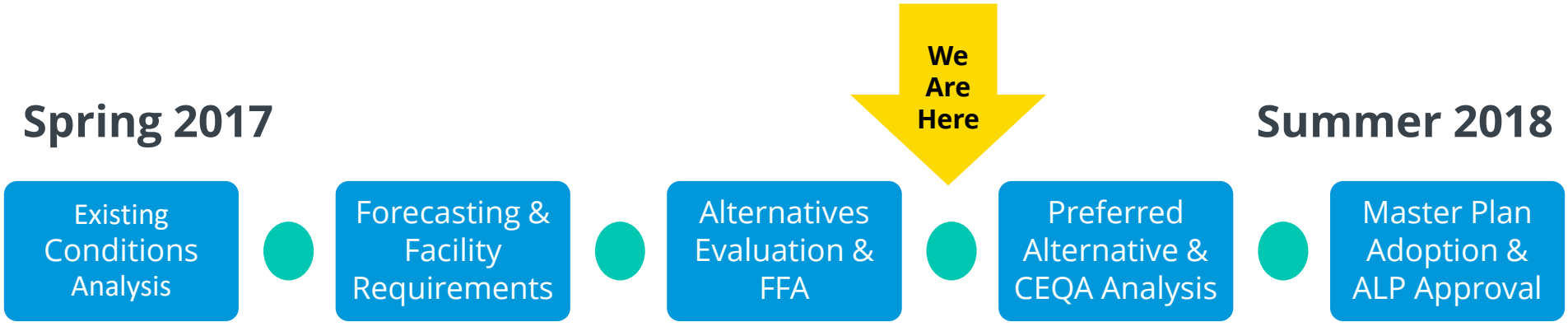
5. Next Steps

Next Steps



Ongoing Public Outreach

ALP – Airport Layout Plan
CEQA – California Environmental Quality Act
FFA – Financial Feasibility Analysis

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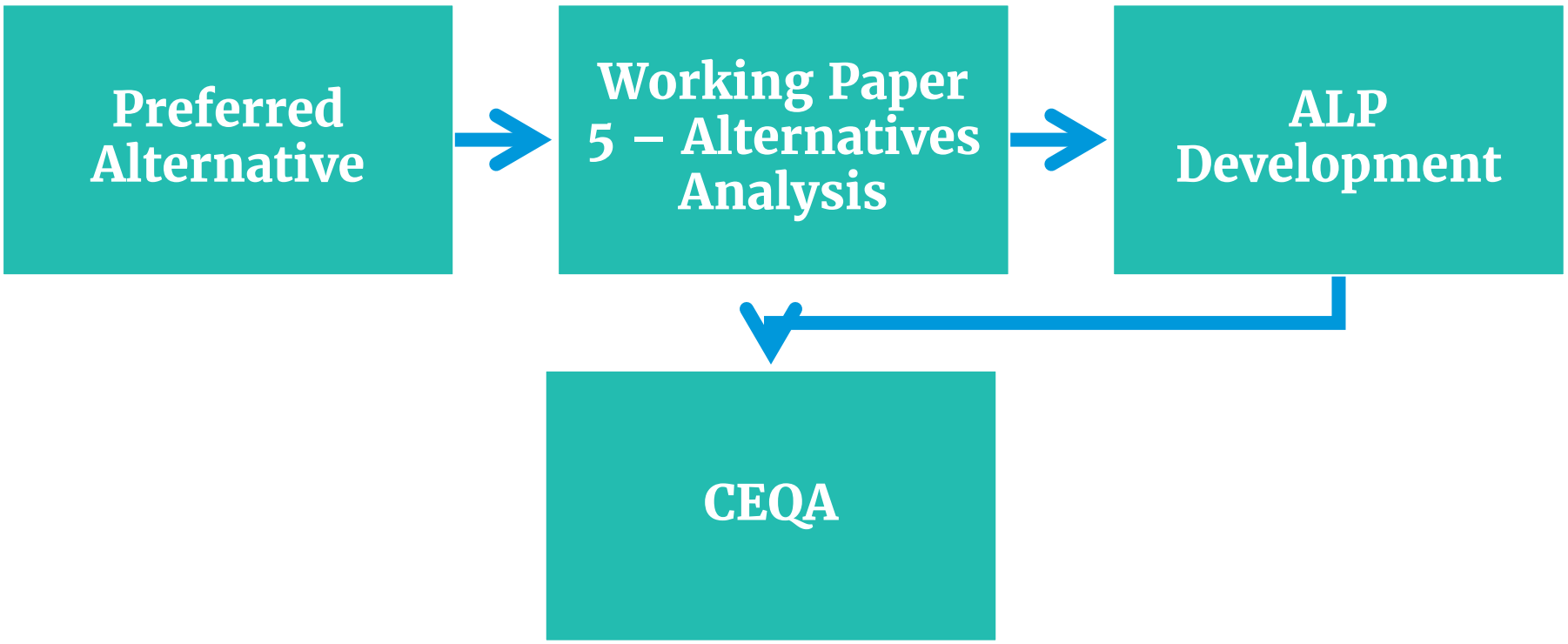
Next Steps


Preferred Alternative
Working Paper 5 – Alternatives Analysis
ALP Development
CEQA

Q&A

Ground Rules

- Speak Clearly and Slowly
- State Your Name and Association
- One Question Per Person
- Help Us Stay on Track
- Focus on New Input

Verbal comments and questions are *not* being recorded. Please provide your comments in writing for consideration and evaluation by the project team.