



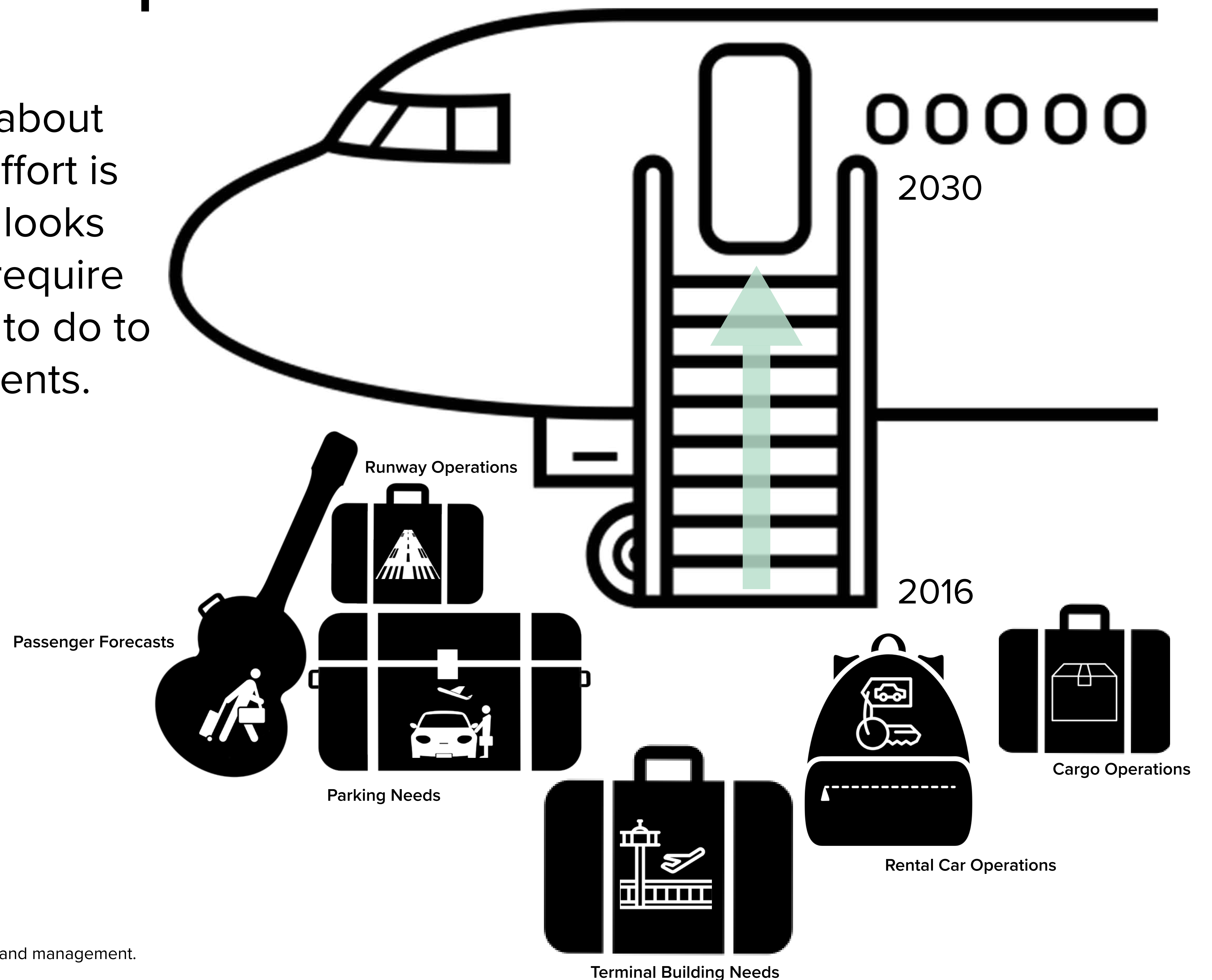
# **Welcome to the Boise Airport Master Plan Update Open House**

Get the facts and sign up for the Master Plan Update newsletter at  
<http://www.iflyboise.com/about-boi/master-plan/>

### What does the Master Plan Update do?

The Master Plan Update is all about preparing for the future. The effort is essentially a gap analysis that looks at what future operations will require and what the airport will need to do to accommodate those requirements.

The gap analysis looks at:



## What decisions are being made?

The Master Plan Update is a planning document. While no concrete decisions are made, the plan establishes a conceptual framework and guidelines for future development goals.

*The Master Plan Update does not determine or influence Idaho Air National Guard basing decisions about future flying missions. Those decisions are made by the United States Air Force.*

## Who are the decision-makers?

The FAA requires and approves the Master Plan Update. The City of Boise owns and operates the Boise Airport. The mayor and city council will provide input into strategic goals of the Master Plan Update.

## Economic Impact of the Boise Airport?

Business within the Boise Airport Master Plan area support more than 15,000 employees and generate \$510.7 million in payroll.

An economic impact study released in 2011 put the total economic activity of the Boise Airport at \$1.3 billion and growing.



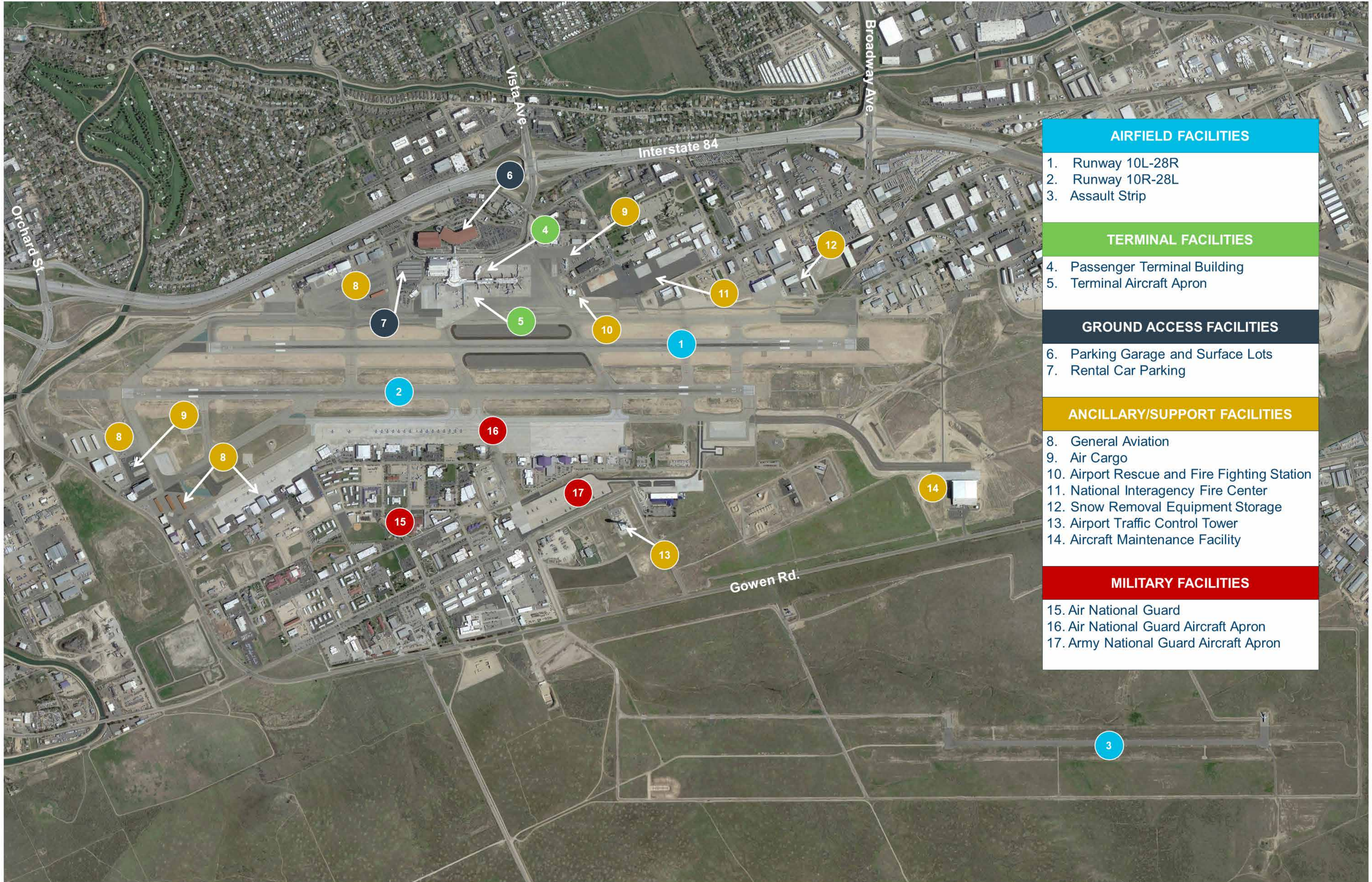
## Technical Advisory Committee (TAC)

Each TAC member has a direct professional connection or economic responsibility related to airport operations and will provide feedback on how the plan could affect and influence the services they provide. The TAC is made up of representatives of:

- Airlines, including passenger and cargo
- Rental car companies
- Food and retail concessionaires
- Military
- General aviation
- Fixed-base operators (flight service and support)
- Federal Aviation Administration (FAA) Control Tower and Airports District Office
- Transportation Security Administration (TSA) & Customs and Borders Patrol (CBP)
- Idaho State Division of Aeronautics
- Boise City and Ada County Planning Departments
- Boise City Council Liaison

The TAC will meet four times over the course of the Master Plan Update

# Boise Airport Layout and Major Facilities



## AIRFIELD FACILITIES

1. Runway 10L-28R
2. Runway 10R-28L
3. Assault Strip

## TERMINAL FACILITIES

4. Passenger Terminal Building
5. Terminal Aircraft Apron

## GROUND ACCESS FACILITIES

6. Parking Garage and Surface Lots
7. Rental Car Parking

## ANCILLARY/SUPPORT FACILITIES

8. General Aviation
9. Air Cargo
10. Airport Rescue and Fire Fighting Station
11. National Interagency Fire Center
12. Snow Removal Equipment Storage
13. Airport Traffic Control Tower
14. Aircraft Maintenance Facility

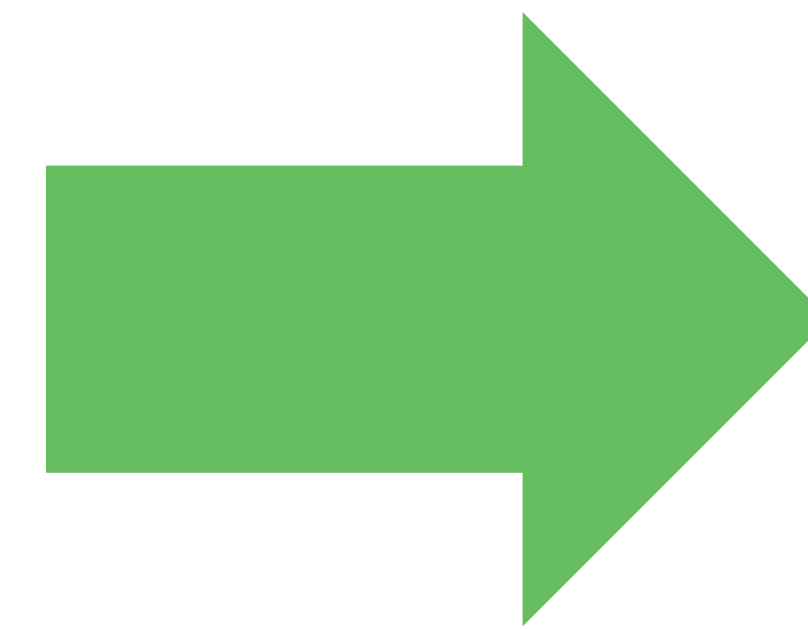
## MILITARY FACILITIES

15. Air National Guard
16. Air National Guard Aircraft Apron
17. Army National Guard Aircraft Apron

# Inventory of Existing Conditions

## Purpose of Identifying Existing Conditions

- Inventory BOI's current state of conditions as the basis for potential future development
- Collect data/information needed for technical elements of the master plan update, including:
  - Aviation activity forecasts
  - Facility requirements
  - Alternatives development and evaluation
  - Implementation/financial planning



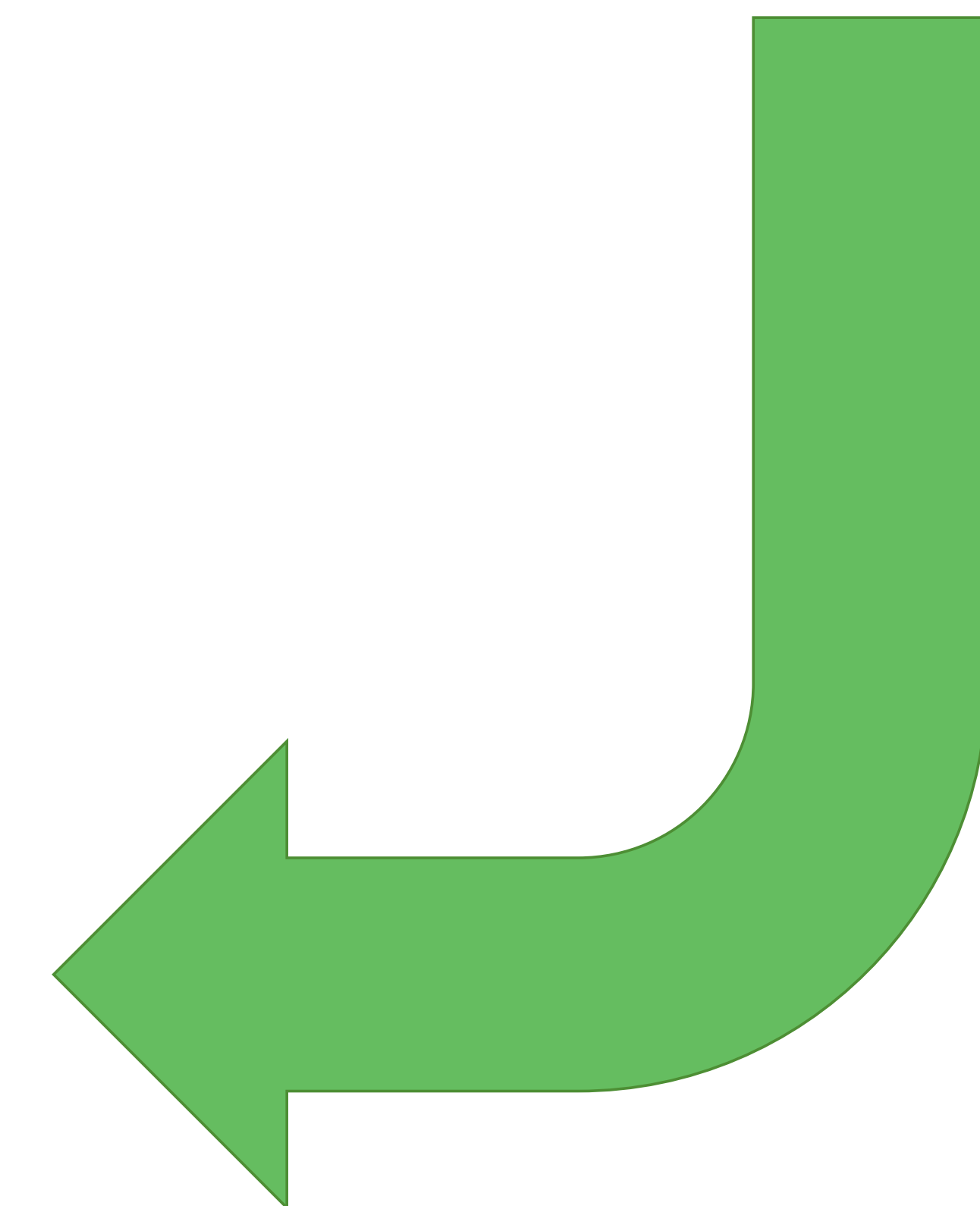
## Approach for Identifying Existing Conditions

- Data/information has been gathered from interviews with and/or data requests made to:
  - BOI Staff
  - Fixed Base Operators
  - Cargo operators
  - Military (Air/Army Guard)
  - National Interagency Fire Center
  - FAA Airport Traffic Control Tower
- Types of data obtained include:
  - Prior airport studies/reports
  - Airfield pavement condition data
  - Tenant facilities and lease records
  - Aviation activity data and vehicle parking data
  - Environmental and sustainability information

## Existing Conditions Elements

- Inventory data is organized into the following categories for documentation purposes:
 

<ul style="list-style-type: none"> <li>◦ Airfield facilities</li> <li>◦ Passenger terminal facilities</li> <li>◦ Support/ancillary facilities</li> <li>◦ Ground access and parking facilities</li> <li>◦ Utilities and stormwater drainage</li> <li>◦ Airspace and air traffic control procedures</li> <li>◦ Environmental inventory</li> </ul>	<ul style="list-style-type: none"> <li>◦ Regional setting and land use</li> <li>◦ Nonaeronautical land/compatible land use planning</li> <li>◦ Socioeconomic data</li> <li>◦ Meteorological data</li> <li>◦ Aviation activity statistics</li> <li>◦ Financial data</li> </ul>
---	---



# Aircraft Operations Forecast Methodology

## Passenger Airline Operations Forecast

- Average seats per departure changed according to fleet mix projections
  - Aircraft orders
  - Operating characteristics of airlines serving the airport
  - National trends favoring larger aircraft
  - Aviation activity forecasts
- Used historical trends to estimate completion factor of scheduled operations
- Assumed average load factor would remain relatively consistent throughout the forecast period

## All-Cargo Operations Forecast

- Conducted socioeconomic regression analysis at the local and national levels to identify relationships between socioeconomic variable and total cargo volumes
- Used forecast socioeconomic variables and their relationship with total cargo volumes to project cargo volumes
- Used the historical relationship between total cargo volumes and all-cargo operations to forecast all-cargo operations

## General Aviation and Other Air Taxi Operations Forecast

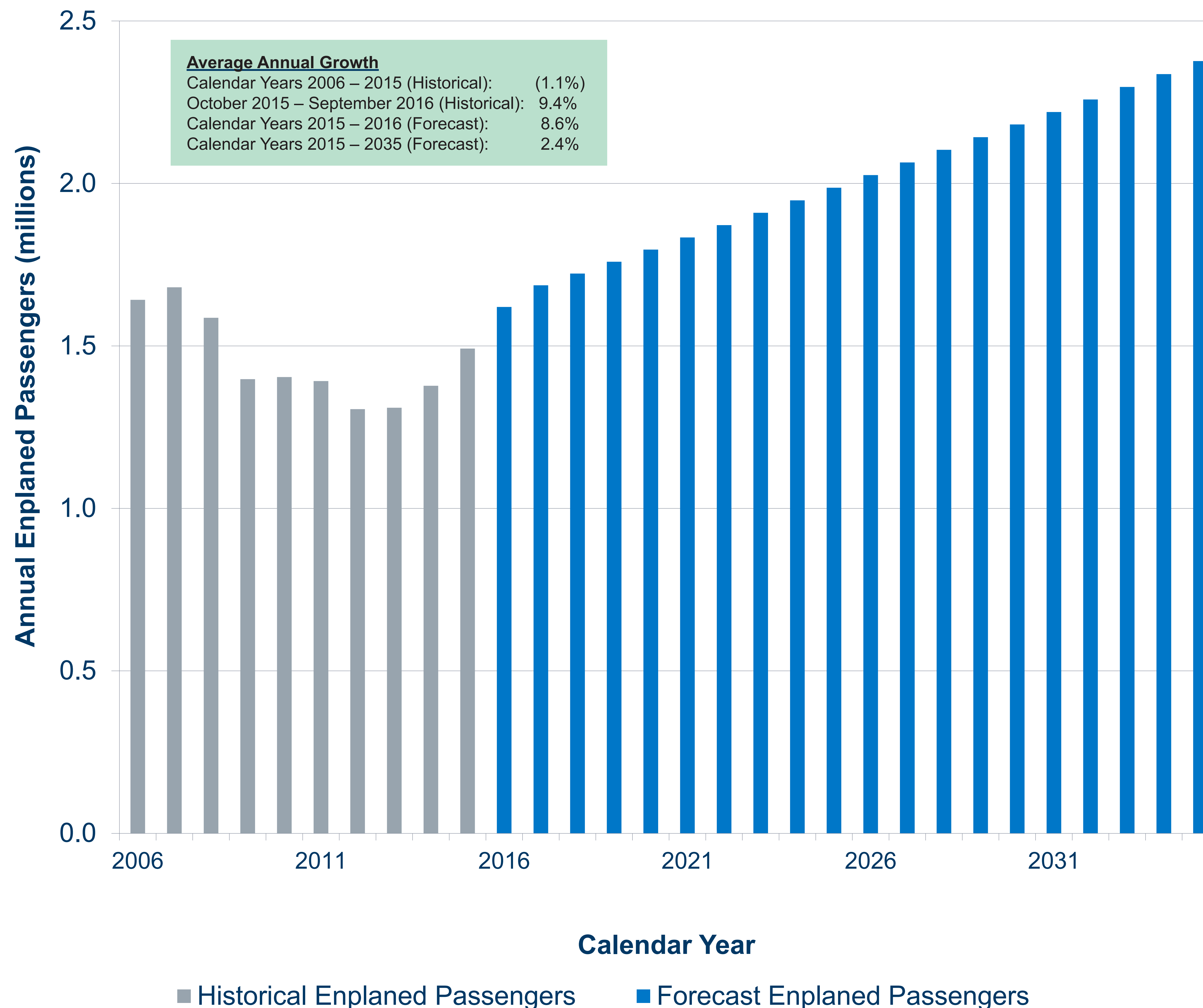
- Analyzed historical relationship between national and local general aviation activity
- Used the historical relationship and projected growth in general aviation hours flown in the FAA Aerospace Forecast to forecast operations by aircraft type
  - Piston
  - Turbine
  - Jet
  - Other

## Military Operations Forecast

- The FAA Terminal Area Forecast (TAF) holds military aircraft operations for BOI constant with the last historical year of operations (2014 in the current TAF)
- There is no indication that current military operation at BOI will change and therefore no justification for increasing or decreasing the number or type of future military aircraft operations for purposes of this forecast
- Consistent with the methodology used in the FAA TAF, this forecast holds military aircraft operations constant at historical 2015 levels through the forecast period



# Enplaned Passenger Forecast



**Enplaned Passenger** = A passenger boarding a flight and departing from BOI

## Enplaned Passenger Forecast Methodology

- **Short-Term (2016):** Conducted analysis of published schedules, carrier announcements, and recent performance of carriers serving the airport. Incorporated socioeconomic analysis to project underlying demand.
- **Medium- to Long-Term (2017-2035):** Conducted various socioeconomic analyses at the local and national levels to identify longer-term demand growth at the airport. Resulting demand growth estimates were applied to estimate enplaned passengers.
- **Overall:** Assumed no additional industry “shocks” such as:
  - Airline consolidation
  - Fuel spikes
  - Economic recession

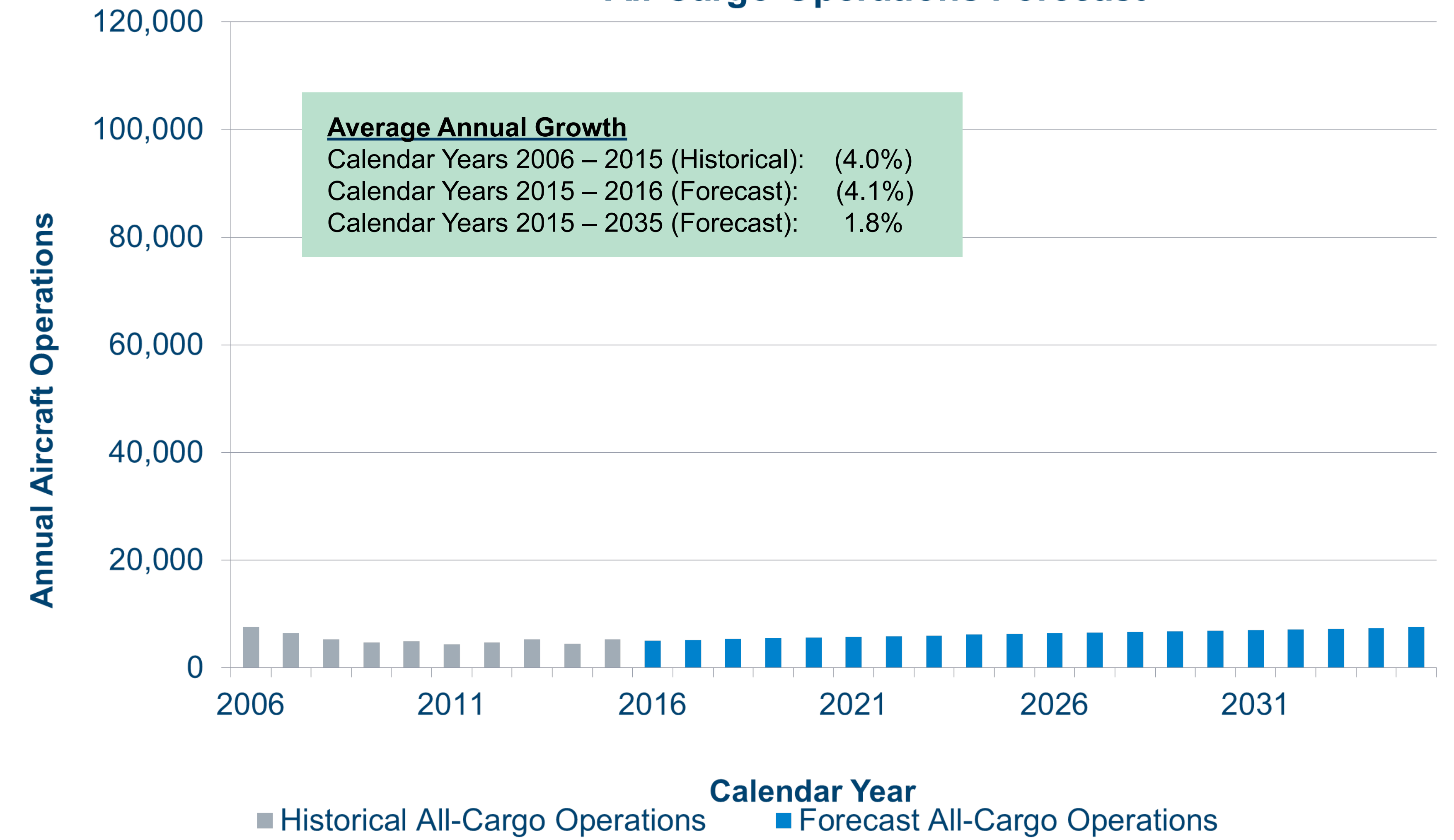
Preliminary Draft BOI Forecast Results – SUBJECT TO CHANGE

# Aircraft Operations Forecast

## Passenger Airline Operations Forecast



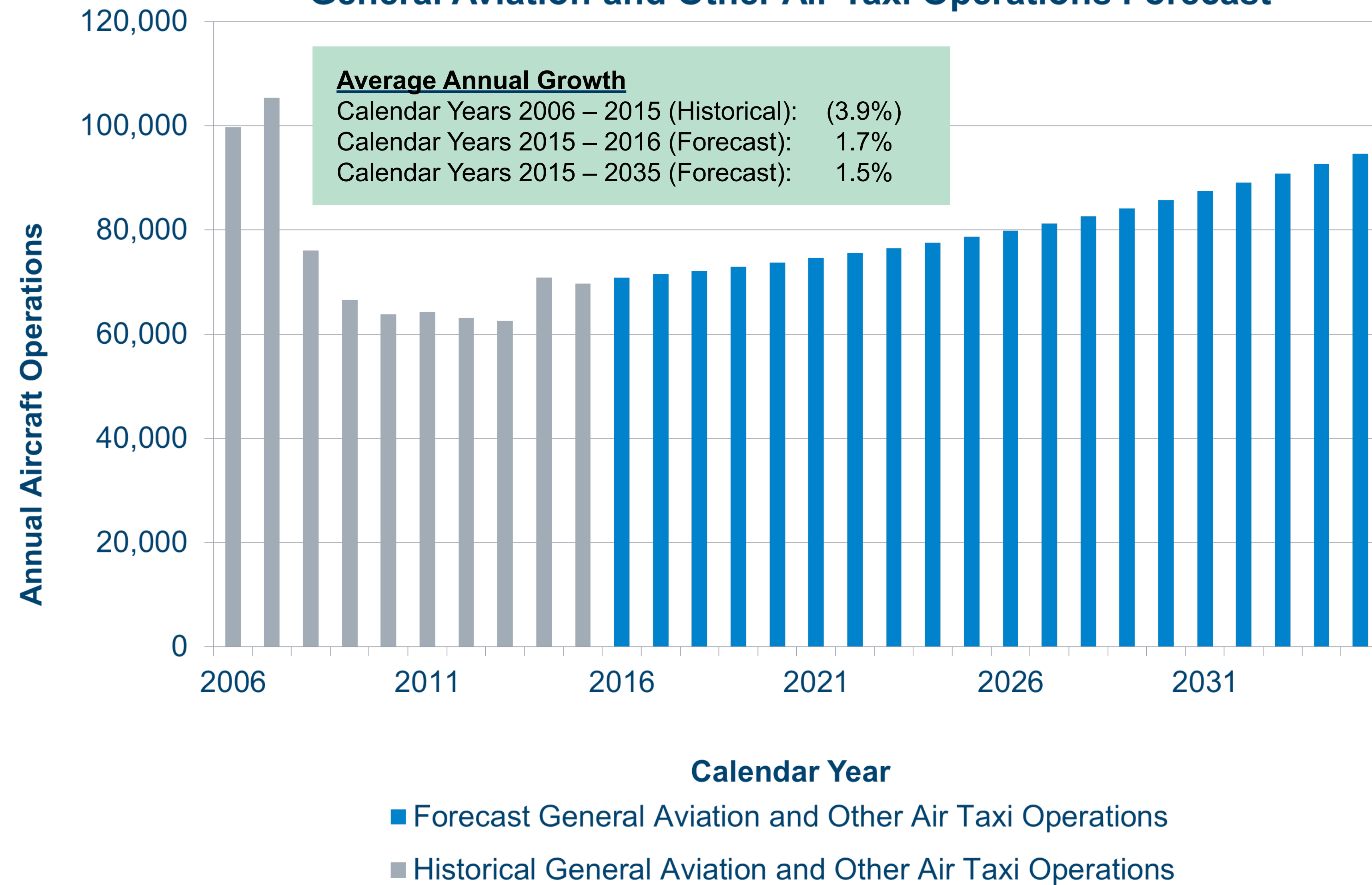
## All-Cargo Operations Forecast



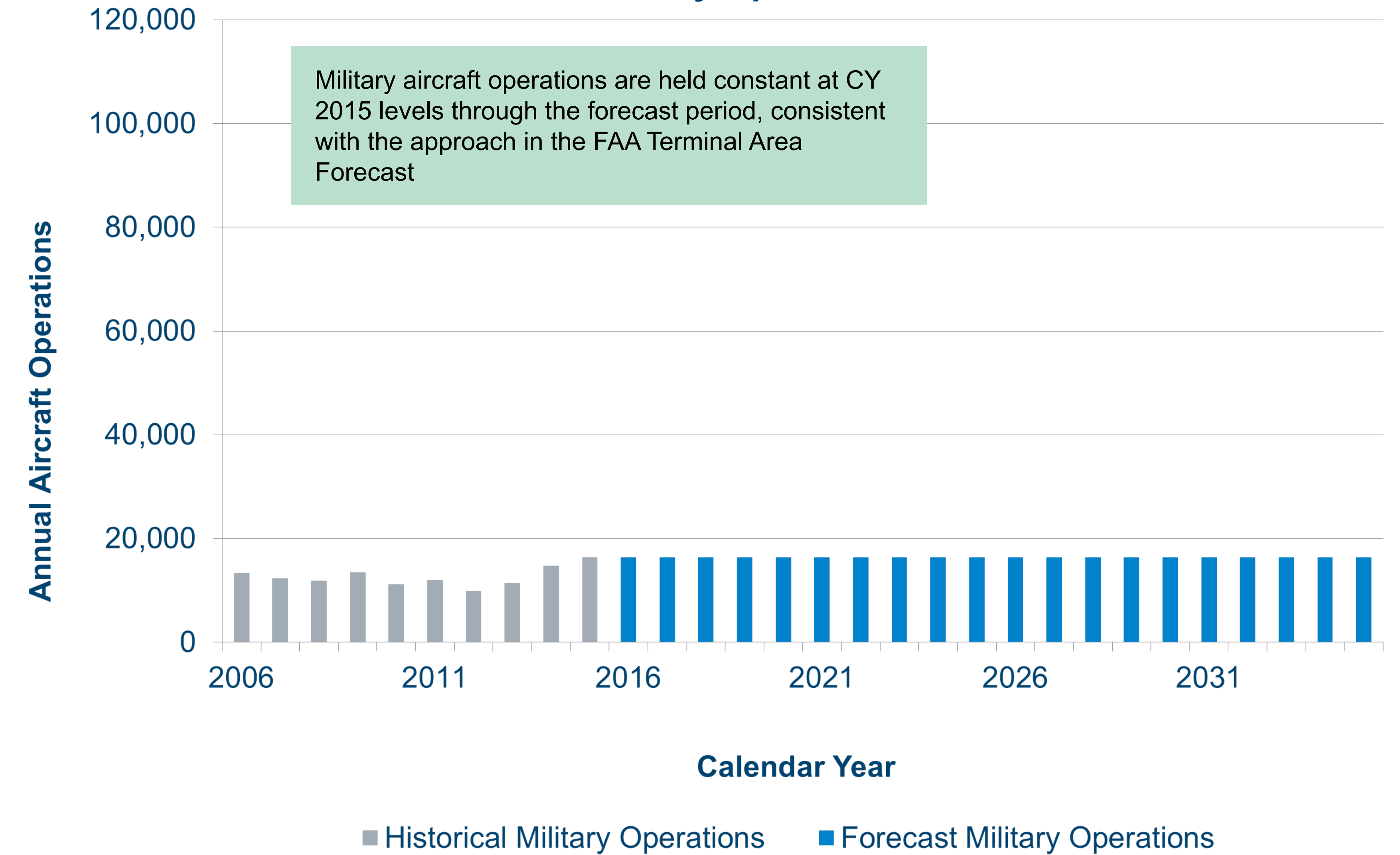
SOURCES: City of Boise, Aviation Department, Traffic Reports, November 2016; U.S. DOT, Form T-100, November 2016; Innovata, November 2016; Ricondo & Associates, Inc., November 2016 (forecast).

SOURCES: City of Boise, Aviation Department, Traffic Reports, November 2016; U.S. DOT, Form T-100, November 2016; Ricondo & Associates, Inc., November 2016 (forecast).

## General Aviation and Other Air Taxi Operations Forecast



## Military Operations Forecast

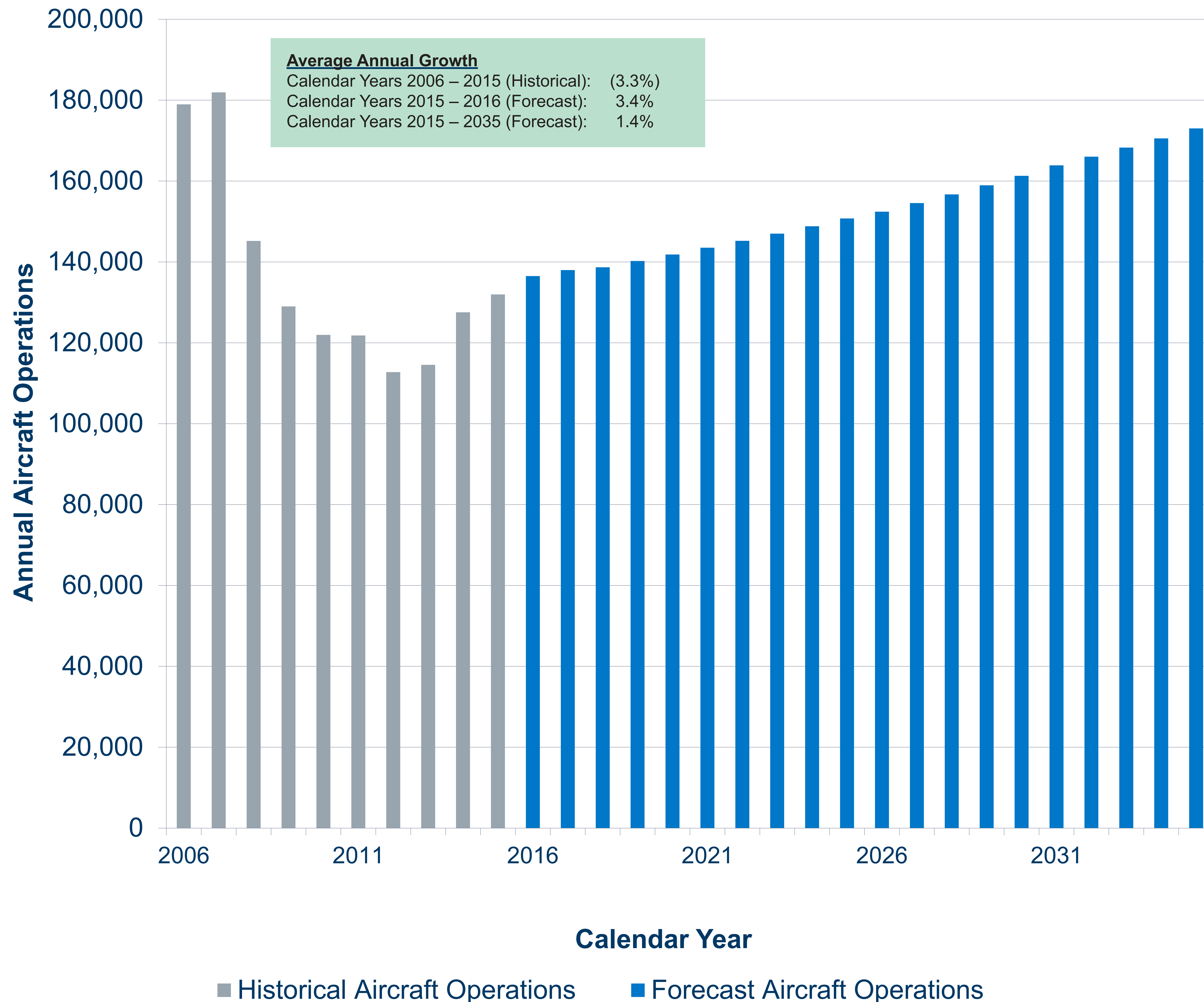


SOURCES: FAA, OPSNET, November 2016; FAA, Traffic Flow Management System Counts (TFMSC), November 2016; FAA, FAA Aerospace Forecast: Fiscal Years 2016-2036, November 2016; Ricondo & Associates, Inc., November 2016 (forecast).

SOURCES: FAA OPSNET, November 2016; Ricondo & Associates, Inc., November 2016 (forecast).

# Aircraft Operations Forecast

**Aircraft Operation** = An aircraft taking off from or landing at BOI



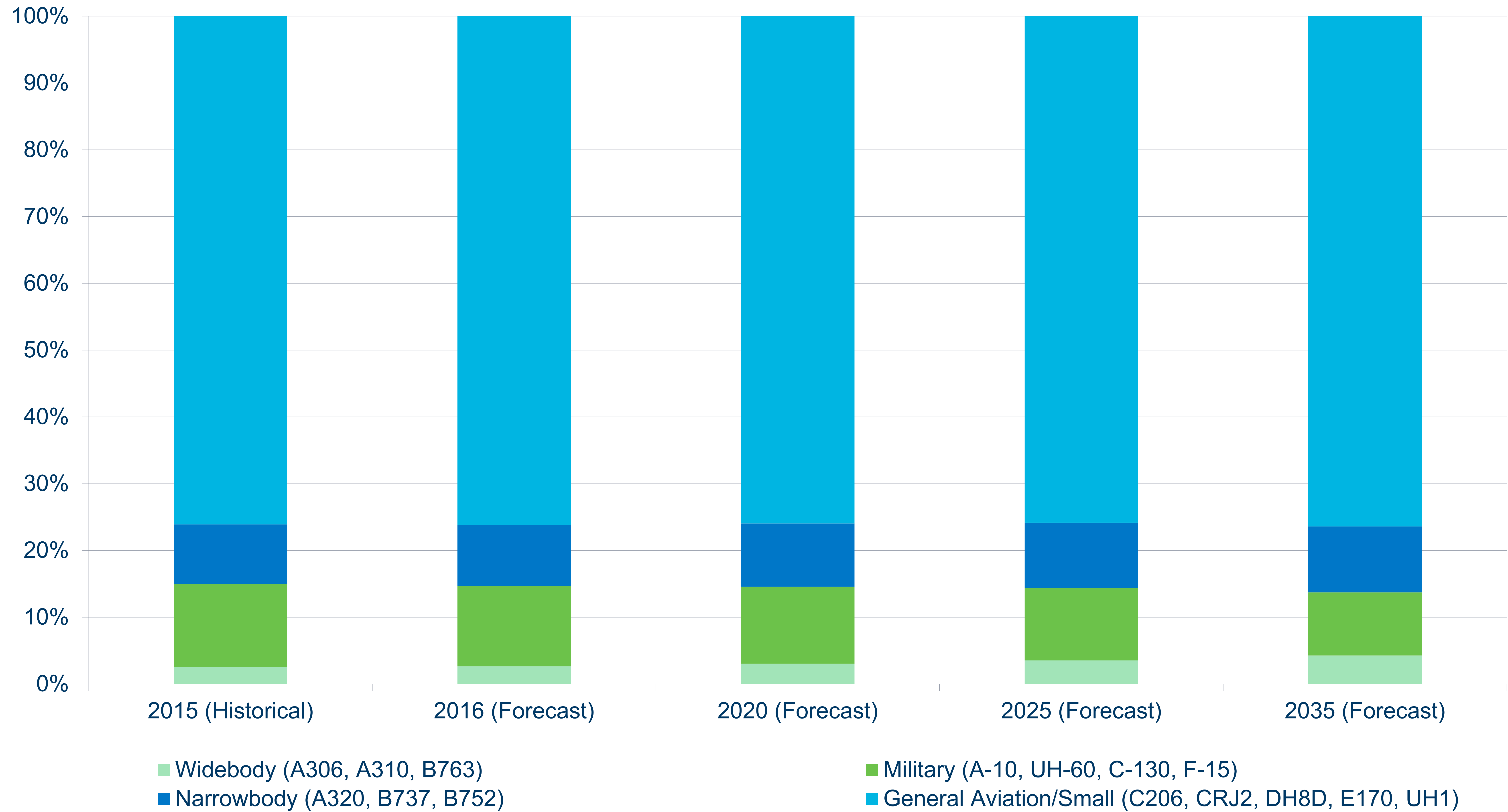
## Types of Aircraft Operations at BOI include:

- **Passenger Airlines:** Aircraft operated by scheduled airlines
- **All-Cargo:** Freighter aircraft operated by cargo airlines, such as UPS and FedEx
- **General Aviation and Other Air Taxi:** Aircraft operated for leisure, business, commercial/charter, or government purposes
- **Military:** Aircraft operated by locally based Idaho National Guard detachments and transient aircraft from other military bases

Type of Organization	2006 (Historical)	2015 (Historical)	2035 (Forecast)
Passenger Airlines	33%	31%	32%
All-Cargo	4%	4%	4%
General Aviation and Other Air Taxi	56%	53%	55%
Military	7%	12%	9%

Preliminary Draft BOI Forecast Results – SUBJECT TO CHANGE

# Airport Total Fleet Mix Forecast



**Preliminary Draft BOI Forecast Results – SUBJECT TO CHANGE**

NOTE: The representative aircraft indicated are not exhaustive and do not imply any particular aircraft will operate at the Airport in the future. They are provided as a comparison to aircraft seen operating at BOI in 2015.

SOURCES: City of Boise, Aviation Department, Traffic Reports, November 2016; U.S. DOT, Form T-100, November 2016; FAA, OPSNET, November 2016; Ricondo & Associates, Inc., November 2016 (forecast).