Introduction

The 2016 Connecticut Statewide Airport System Plan (CSASP) examines aviation infrastructure, activity, and trends from a statewide perspective for the purposes of allocating resources and guiding policy decisions. This plan is intended to be an update to the 2006 plan, which will serve as a baseline, and is not intended to be a comprehensive reinvestigation. As such, the update was developed as a top-down research effort compiling available reports and industry experience to form the basis of the plan recommendations. The planning included collaboration with a Study Advisory Committee of regional planners and aviation practitioners. The primary objective is to identify and address critical issues influencing aviation's contribution to the statewide economy and to prioritize and align resources accordingly. While this system plan update identifies specific projects that would support this overall objective, such inclusion is not to be interpreted as an endorsement to proceed with a project and does not represent funding availability or commitment by any party. Detailed project assessments are typically documented in an airport's master plan and subsequent environmental reports. This study focuses primarily on 20 public-use airports within the state excluding heliports, seaports, military facilities, and private-use airports. Those 20 focus airports vary by ownership and functional classification.

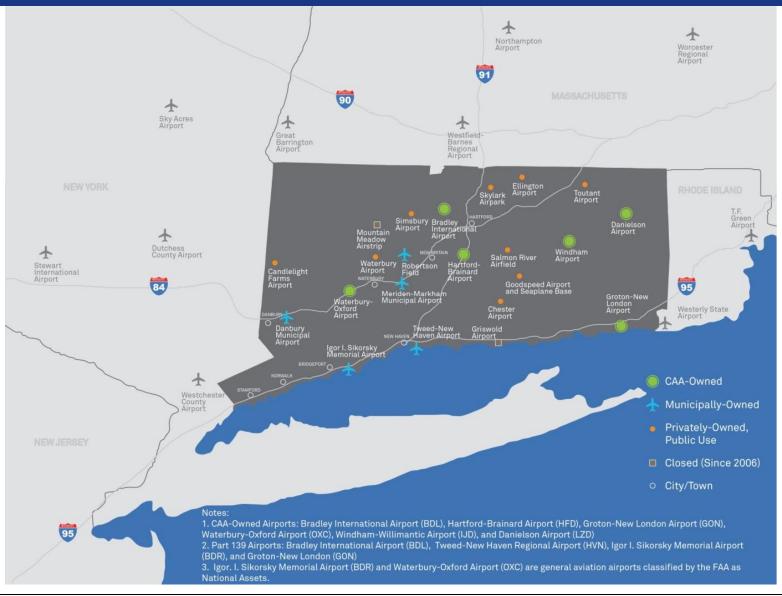


Significant change and directional shifts have occurred since 2006 that necessitated a reassessment of the planning outlook. Nationally, the economic conditions have varied significantly and the industry has seen the mergers of major carriers to produce mega-carriers. Major trends associated with general aviation (GA) have continued with growth limited to business jets and turbo-props, while airport infrastructure funding has continued to decline in real terms. At the state level, the State of Connecticut transferred its transportation oversight of aviation to the Connecticut Airport Authority (CAA) in 2011, which has the added responsibilities of operating state-owned airports and facilitating economic growth. Meanwhile, aviation development within Connecticut has been hampered by regulatory and environmental restrictions, community resistance, ownership/operating struggles, and cost sharing. Two airports have closed and the pressure to retain and attract business has increased considerably.

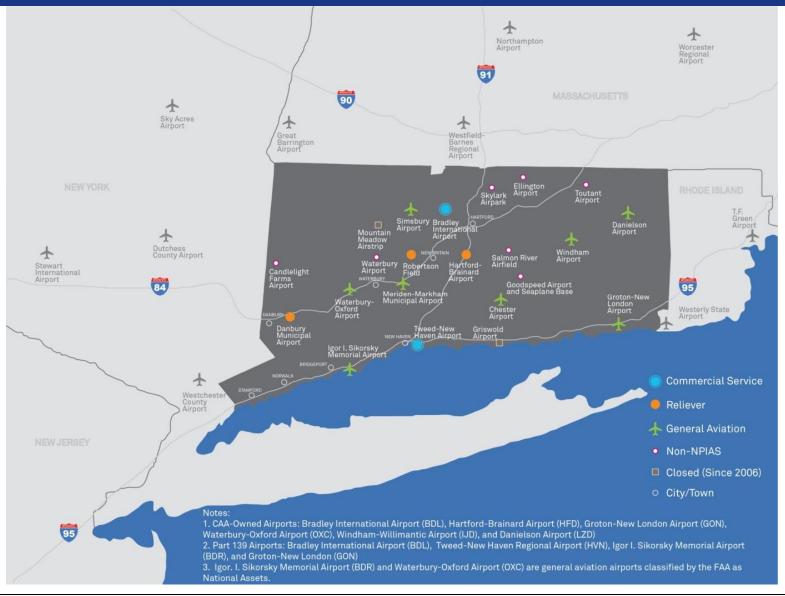
GOALS OF THE CONNECTICUT STATEWIDE AIRPORT SYSTEM PLAN (CSASP)

- ✤ Identify changes since 2006 that have impacted Connecticut airports.
- → Gain an understanding of the current aviation system and identify the major trends and influences that should guide policy and resource allocations.
- ✤ Evaluate the role and future of the four Part 139 airports.
- ✤ Identify strategies for CAA to better serve residents and businesses, and that support statewide efforts to enhance economic growth and vitality.

The Connecticut Airport System – By Ownership



The Connecticut Airport System – By NPIAS Classification



Statewide Forecasts

Aviation forecasts included in the CSASP Update represent a compilation of existing published forecasts in lieu of an independent analysis. The primary forecasting source is the Federal Aviation Administration (FAA) Terminal Area Forecast (TAF, February 2014), which is an annual 20-year projection of aviation activity for passenger enplanements (passenger boardings), aircraft operations, and based aircraft. In cases where an airport recently completed a master plan where aviation forecasts were approved by the FAA, those projections were interpolated and extended to be consistent with this system plan's 20-year outlook and used in place of the TAF. The compiled forecasts reveal an expectation for moderate growth.

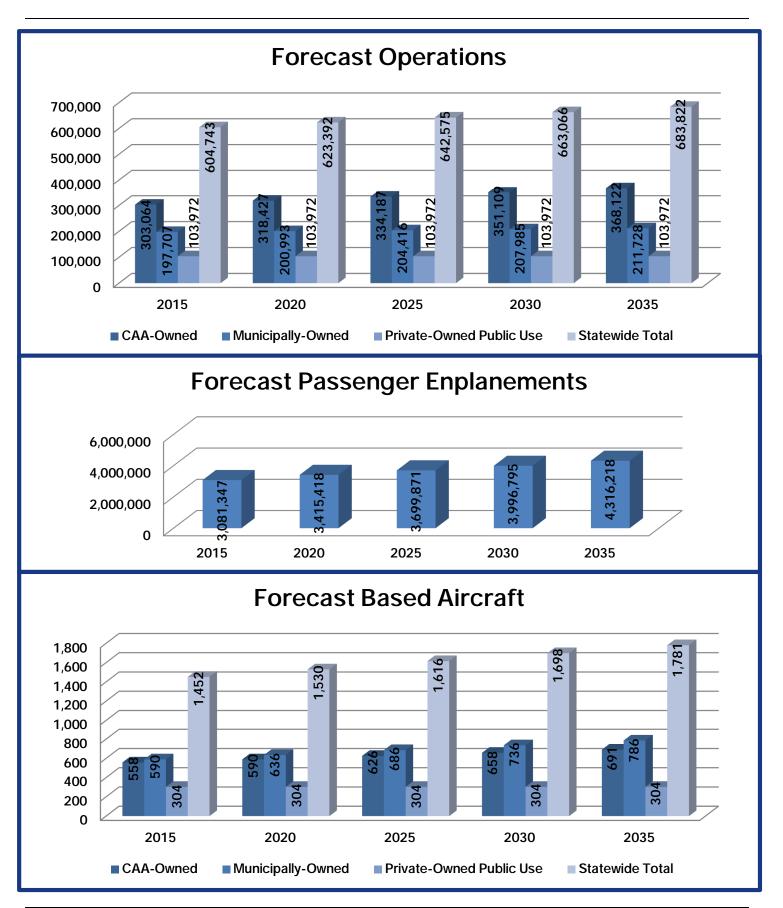
STATEWIDE FORECAST FINDINGS

- → Total operations are forecast to grow from 604,743 in 2015 to 683,822 in 2035 for an Average Annual Growth Rate of 0.62%.
- → Total passenger enplanements are forecast to grow from 3,081,347 in 2015 to 4,316,218 in 2035 for an Average Annual Growth Rate of 1.70%.
- → Total based aircraft are forecast to grow from 1,452 in 2015 to 1,781 in 2035 for an Average Annual Growth Rate of 1.03%.

The preparation of a comprehensive plan for the public-use airports in the Connecticut airport system requires a general understanding of recent and forecast trends in the aviation industry as a whole. National, regional, and statewide trends provide insights into the development of the aviation demand forecasts for the public-use airports in the Connecticut airport system. A review of the industry trends for the commercial service and general aviation are of primary importance for the Connecticut airport system. Industry trends and factors affecting future demand at Connecticut airports include the following:

- → Economic conditions, employment/unemployment, and income/debt levels
- → Changes in population
- → Changes in air service patterns due to consolidation
- → Aviation fuel prices
- → Changes in airline and general aviation fleets
- → Competing services in nearby states
- → Fares and the cost of inputs
- → Corporate profits

The graphs on the following page show the statewide forecast findings for operations, passenger enplanements, and based aircraft.



System Challenges & Needs Assessment

The CSASP identifies four distinctly different groups of influences. These groups were assessed within the context of the CAA's chartered goal of proactively fostering in-state economic growth that is consistent with statewide strategy. It is also understood that challenges and needs pertaining to aviation safety, compliance with design standards, and ongoing maintenance receive primary focus related to CAA's chartered goals transferred from the Connecticut Department of Transportation, which are continuous rather than strategic. In this update, it is expected that changes to the design standards affecting taxiway geometry will receive significant focus from the FAA and the individual airports. Primary enhancements needed to maintain the system's effectiveness as both a coordinated aviation system and an economic driver are identified, while challenges that cause constraints to the system are addressed as well.



SYSTEM NEEDS

- Air Service Market Coordination Strategy BDL, HVN, BDR, and GON
- → Increased runway length HVN, GON, BDR, and HFD
- Prepare contingency plans HVN, BDR, and GON (Air Service and GA)
- → Passenger terminal evaluation and improvements HVN
- ✤ Improved roadway access HVN
- → Phased implementation of future terminal BDL
- Customs processing services and facilities BDL and OXC
- → High-end GA hangar facilities OXC, HFD, BDL, HVN, BDR, and GON

OTHER ISSUES

- → Obstruction clearance
- → NAVAIDs
- → Compliance with FAA standards
- Streamline environmental permitting (esp. Coastal Zone)
- Zoning guidelines
- Resolve governance / cost structures
- → Evaluation of funding

Funding

CT AIRPORT FUNDING SOURCES

Airport Name	Airport Improvement Program (AIP) Grants	AIP State Apportionment	Passenger Facility Charge (PFC)	State & Local Grants	Earnings Retained by the Airport ²
CAA-Owned Airports					
Bradley International (BDL)	Х	-	Х	-	Х
Groton-New London (GON)	Х	Х	-	Х	Х
Hartford-Brainard (HFD)	Х	Х	-	Х	Х
Waterbury-Oxford (OXC)	Х	Х	-	Х	Х
Windham (IJD)	Х	Х	-	Х	Х
Danielson (LZD)	Х	Х	-	Х	Х
Municipally-Owned Airports					
Tweed-New Haven (HVN)	Х	-	Х	Х ¹	Х
lgor I. Sikorsky Memorial (BDR)	Х	Х	-	Х	Х
Danbury Municipal (DXR)	Х	Х	-	Х	Х
Robertson Field (4B8)	Х	Х	-	Х	Х
Meriden-Markham Municipal (MMK)	Х	Х	-	Х	Х
Privately-Owned Airports Open for Pub	lic Use				
Chester (SNC)	-	-	-	Х	Х
Simsbury (4B9)	-	-	-	Х	Х
Goodspeed Airport and Seaplane Base (42B)	-	-	-	Х	х
Ellington (7B9)	-	-	-	Х	Х
Skylark Airpark (7B6)	-	-	-	Х	Х
Waterbury-Plymouth (N41)	-	-	-	Х	Х
Toutant (C44)	-	-	-	Х	Х
Candlelight Farms (11N)	-	-	-	Х	Х
Salmon River Airfield (9B8)	-	-	-	Х	Х

¹ As part of the State's annual General Fund appropriations, HVN has received an Airport Grant of \$1,500,000 each fiscal year to subsidize operating costs for the airport. ² Includes revenue from fees, rentals, parking, fuel sales, concessions, etc.

FUNDING PRIORITIES & CHALLENGES

- + Continued focus on BDL to serve all commercial service needs of CT and western MA
- + Facility improvements associated with retaining and expanding air service at HVN and attracting high-end business operators.
- Improve in-state passenger and revenue retention through statewide coordination, intermodal surface enhancements, and passenger convenience enhancements.
- + Concentrated support at facilities capable to support high-end business aircraft
- ✤ Market research and business development enhancements
- Improve education and outreach efforts at state level to inform legislative actions and at local level to improve community support for High End airport activity and development

State of the Airport System in Connecticut

BDL

- Primary commercial service airport for CT
- Significant catchment area overlap both in and out of state
- ✤ Comparable service offerings with PVD and HPN
- Constant attention and innovation required to maintain and extend market capture
- → <u>STRATEGY</u>:
 - New city markets, international service and facilities
 - Improved in-state connectivity to reduce leakage
 - Statewide market coordination to improve leverage and extend overall in-state capture and air service availability
 - Continued convenience improvements and expansion preparation

GA AIRPORTS

- Provide aircraft storage, facilities, and services for high-end aircraft
- Focus high-end support at OXC, HFD, BDL, HVD, GON, and BDR
- → Enhance legislative, environmental, promotional, land use, and community support
- Seek opportunities to enhance and diversify revenue
- Anticipate airport closures and related shift in based aircraft
- Discontinue Part 139 certification at GON and BDR if a coordinated air service niche cannot be identified and service re-acquired

HVN

- ↔ Challenging airline market conditions
- Airline challenges complicated by conversion to larger, more demanding aircraft
- Larger airline aircraft will increase pressure on runway length and terminal building facilities

→ <u>STRATEGY</u>:

- Focus on maintaining scheduled service
- Increased airline communications
- Develop and provide airline with market information
- Pursue runway length improvements
- Increased coordination with CAA
- Enhanced community, agency, and regulatory communications
- Develop contingency plan for airline service disruption/cessation
- Eliminate policy restrictions on activity
- Assess potential terminal and access enhancements

BDL, HVN, BDR, & GON OUTLOOK

- Coordinated air service platform to maximize air service and reduce out of state leakage
- Identify potentially supportable markets for each; avoid in-state service overlap
- ↔ Coordinate efforts to market new airline service
- Identify improvements to airfield, runways, terminal, and landside facilities

Recommendations

COMMERCIAL AIR SERVICE

Improve in-state passenger retention.

- → Coordinate services to increase negotiating leverage and identify optimal service by airport: BDL, HVN, BDR, and GON
- ✤ Maintain low cost and high traveler convenience
- ✤ Enhance in-state intermodal connectivity
- → Improve marketing and community understanding
- → Continued work to meet FAA standards, ideal runway length, terminal building upgrades, and landside access

PART 139 AIRPORTS

Consider reduction or elimination of Part 139 Certification if air service cannot be attained at BDR and GON.

- → BDL and HVN required to maintain Part 139 certification as commercial service airports
- → BDR and GON not required to maintain Part 139 certification, but continue to maintain while coordinated airline discussions are under consideration or are ongoing.

GENERAL AVIATION

Attract the high-end operator growth market that help to drive economic development and enhance the State's competitive position.

- → Undertake long-term efforts to reduce airport development constraints: legislative, environmental, physical, and community
- → Support development and expansion of economic incentive zones near airports and establish airport land use compatibility guidelines
- → Pursue runway extensions to achieve more than 5,000 feet takeoff length
- → Prepare hangar and service development areas at target high-end airports
- → Undertake pavement and improvements to comply with FAA design standards
- → Advocacy and aviation technical contribution