

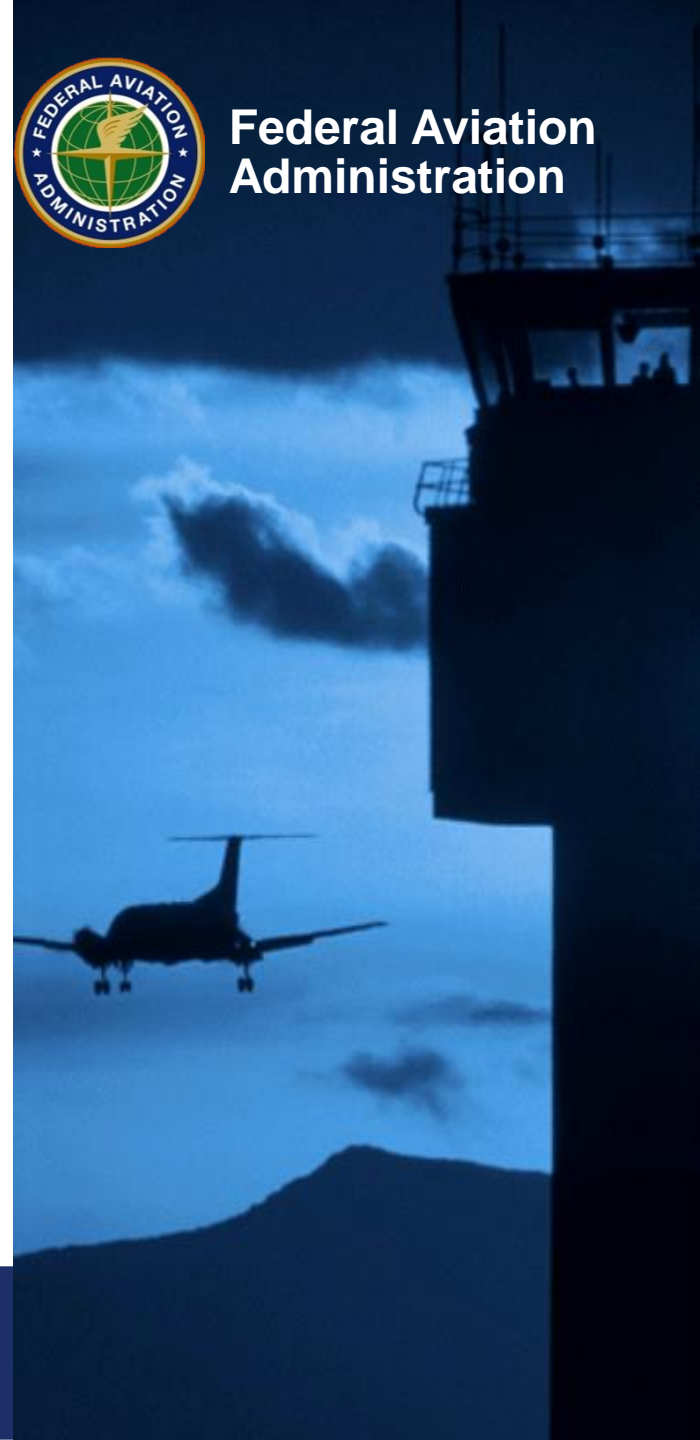


**Federal Aviation  
Administration**

# **Airport Sustainability Initiatives and Mandates**

Federal Aviation Administration  
Office of Airports

**Airports Going Green  
November 12, 2013**



# Energy Efficiency of Airport Power Sources

- Authorized in Section 512 of our latest Congressional Reauthorization, our program increases support for comprehensive assessments of an airport's energy requirements
  - heating and cooling
  - base load
  - back-up power
  - power for on-road airport vehicles and ground support equipment
- Those assessments will identify Energy Conservation Measures (ECMs) that will reduce airport energy usage. These include renewable energy projects like solar



# Energy Efficiency of Airport Power Sources

## Advisory Circular on Airport Energy Efficiency

- Closely follows ASHRAE's *Procedures for Commercial Building Energy Audits*
- Establishes four levels of energy assessment:
  - Preliminary Evaluation: Can be completed by airport personnel
  - Level 1 Assessment: Can be completed by airport personnel with specialized training and tools, or energy assessors
  - Level 2 and 3 Assessments: Completed by energy assessors
- Includes an energy project cost estimating tool
- Includes information on tools and agreements that can reduce the time and cost of an energy assessment



# Energy Efficiency of Airport Power Sources

## AIP-Eligibility for Energy Assessments

- A Level 1 Assessment will satisfy the requirements of Section 512
- Some facilities may require Level 2 assessment – case-by-case determination
- For vehicles, detailed assessment will not be required. An ECM for vehicle conversion will help airports determine the benefits of upgrading vehicle fleets
- A Level 1 Assessment will be eligible for AIP grant funding. Level 2 assessment of certain facilities will be evaluated on a case-by-case basis

## AIP-Eligibility for Energy Projects

- Funded through AIP entitlements or discretionary grants
- 3-4 categories of projects will be eligible. This includes renewable energy projects like solar. Other projects can be funded through other AIP initiatives
- AIP-eligibility will be published with the new Advisory Circular this Fiscal Year

# Climate Adaptation and Infrastructure Resilience

## Executive Order: Preparing the United States for the Impacts of Climate Change (November 1, 2013)

- Departments and agencies of the Federal Government must:
  - Modernize programs to support climate-resilient investments
  - Provide the information, data, and tools that state, local, and private-sector leaders need to make decisions that improve preparedness and resilience

## FAA Airport Organization's Climate Resilience Initiatives

- Fiscal Years 2009 – 2013: Airport Sustainability Planning
- Fiscal Year 2014: FAA will prepare a report on activities undertaken by airports to increase infrastructure resilience. This includes AIP-funded activities
- Fiscal Year 2015: Detailed guidance on climate adaptation and infrastructure resilience

# Airport Sustainability Planning

Airport	State	Airport	State
Huntsville Int'l – Carl Jones Field	AL	Juneau	AK
Flagstaff Pulliam	AZ	Fort Lauderdale Executive	FL
Vero Beach Municipal	FL	Honolulu International	HI
Coeur D'Alene-Pappy Boyington	ID	Portland International Jetport	ME
Minneapolis-St. Paul Int'l	MN	Akron-Canton Regional	OH
Dayton-Wright Brothers	OH	Kent State University	OH
Redmond – Roberts Field	OR	Latrobe – Arnold Palmer	PA
George Bush Intercontinental	TX	Houston – William P. Hobby	TX
Virginia Statewide GA Airports	VA	Huntington Tri-State	WV
Charleston - Yeager	WV	Cheyenne – Jerry Olsen Field	WY



# Airport Sustainability Planning

**How do we define sustainability?**



# Airport Sustainability Planning

## The Sustainability Vision Statement

- In our sustainability plans, specific and localized vision statements work best:
  - Local goals
  - Local challenges
  - Articulating a sustainable end-state for specific facilities, communities, and specific aspects of airport operations
- Well-articulated airport sustainability vision statements establish the framework for AIP-funded plans

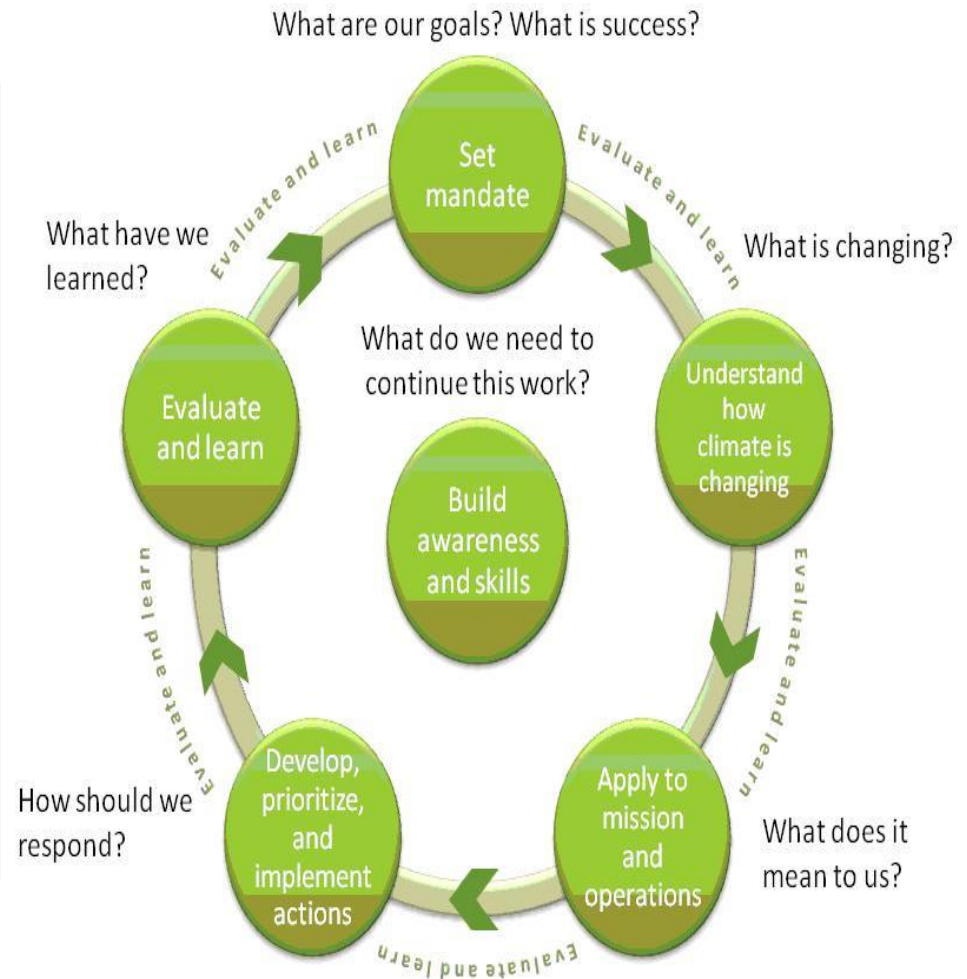




# Airport Sustainability Planning

## Tracking Sustainability Commitments

- A sustainability “champion” is key
- Implementation plans and tracking mechanisms should be developed within the plan framework
- A process to reexamine commitments and evaluate implementation should also be established



# Airport Sustainability Planning

## Evaluation of Comprehensive Sustainability Plans

- The FAA has issued 45 grants for sustainability plans. This represents over \$15M in AIP funding
- What are the successes of comprehensive plans? How are they being implemented? How do they compare with project-specific initiatives?
- *ACRP Study: Lessons Learned from Airport Sustainability Master Planning Programs*
  - The FAA has proposed a cooperative research project that will evaluate the effectiveness of sustainability plans and collect useful case studies
  - Research will compare the benefits of comprehensive planning with ad-hoc project planning
  - The study will cover FAA and airport-funded plans
  - Research will begin this fiscal year

