

# FAA AIP PROJECTS FROM PLANNING TO BIDDING

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Airport Engineers Training Session  
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# Agenda

- Airport/Sponsor Requirements
- Airport Capital Improvement Plans (ACIP)
- General Funding Guidelines
- Project Funding Requirements
- Project Scoping and Grant Application Phase
- FAA Requirements During Pre-Design/Design
- DBE Requirements
- FAA Standards Requirements
- Bidding Phase



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# Airport/Sponsor Requirements

- Airport must be a public-use airport in the current National Plan of Integrated Airport Systems (NPIAS).
- Sponsor must be able to finance their share of the grant
- Sponsor must have good title for maneuvering areas.
- Current approved Exhibit A on file.
- Sponsor must have an approved DBE Program for AIP funding >\$250,000 per fiscal year
- Sponsor must have current Unique Entity ID (Formerly known as DUNS number)
- Others per the AIP Handbook, Tables 2-9 through 2-11.



# Airport Capital Improvement Plans (ACIP)

- ACIPs are the FAA's primary tool for project formulation
- ACIPs are typically borne from the master planning process or from needs identified after the master plan:
  - Aviation demand
  - Airport inspections
  - Pavement condition analysis
  - Safety/security recommendations
- ACIPs should include separate line items for:
  - EA or EIS, if anticipated
  - Updating ALP, if project is not currently on ALP
  - Land acquisition and updating of Exhibit A, if project is not on airport-owned land



# Airport Capital Improvement Plans (ACIP)

- FAA evaluates each project for:
  - Eligibility
  - Justification
  - Reasonableness of cost
  - Priority assessment
  - Reasonableness of project schedule
  - Available funding

# Airport Capital Improvement Plans (ACIP)

- Fall CIP Update
  - Review the previous year's CIP and evaluate the airport's current needs
  - Update CIP with any revisions based on the internal evaluation
    - No changes within the first two years on the CIP
    - Update Drawings, Cost Estimates, Project Description, and Project Justification
  - Schedule meeting with FAA, State, Sponsor, and Consultant to review current CIP vs. proposed CIP
  - Finalize CIP documents and submit to FAA and State DOT for review
- Spring CIP Update
  - Review current CIP from FAA and State and budget accordingly.



# General Funding Guidelines

- High Priority Projects (Ideally, apply for discretionary funds)
  - Safety/ security (Part 139 ARFF vehicle, security fencing, RSA improvements, obstruction removal)
  - Hot spots
  - Pavement rehabilitation of runways and the primary taxiway system
- Lower Priority Projects (Ideally, save entitlements for these projects)
  - New pavements not required for safety, capacity, or efficiency
  - Aprons
  - Terminal and other buildings
  - Access roads
  - Fuel farms
  - Land acquisition



# Project Funding Requirements

- Is the project eligible? (refer to AIP Handbook appendices)
- Is the project justified? (see table 3-4)
- Is the project on airport property (with good title) or on a property easement?
- Is the project on the approved ALP?
  - What if it's not exactly as laid out on the ALP?
- Has the project been identified on the airport's ACIP and coordinated through the respective state?
- Has the FAA completed an environmental finding for the project?
- Must meet FAA standards, unless a modification to standard has been approved





# Project Scoping and Grant Application Phase

- Beginning of FAA fiscal year: Pre-design meeting with FAA, \*State DOT, Sponsor, Engineer
  - Federal Fiscal Year (FFY) is October 1st – September 30th
  - Follow Regional Guidance “Standard Handout for Predesign Conference Agendas”
- Scope approval: Sponsor, FAA, and \*State DOT
- Independent Fee Estimate (IFE) and Record of Negotiation
  - IFE always required; level of detail can vary; AIP eligible expense
  - For estimated fees >\$100,000, a detailed fee/cost analysis is required
- January 15 deadline: Environmental documentation approved
  - Determine in the Pre-Design which type of environmental approval will be required for the project (CATEX, FAA internal CATEX Memo, EA, etc.)
  - Allow 30-60 days for FAA’s review and approval of CATEX
- January 15 deadline: Completed grant application (budgetary numbers)

\*If applicable



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# FAA Requirements During Pre-Design/Design

- Start FAA ATO/Tech Ops coordination ASAP, if required (runway closure, navaid shutdowns)
- Submit 7460 and CSPP to OE/AAA web page ASAP
  - CSPP must be approved by FAA ADO per Handbook paragraph 5-29
  - Estimate a 60 to 90-day review time
  - Approved CSPP must be incorporated into the plans and specifications.
- Safety Risk Management (SRM) process (applies to small, medium, large hub airports only)
- AGIS survey, before and after construction, if required
- Design Report
- Design Review Meetings: 30%, 60%, 90% (typical)



# AGIS Requirements

- A design/as-built project is triggered whenever a runway's length is changing.
  - If the runway is not changing, then a Non-Safety Critical Project can be completed. This type does not need an airspace analysis, whereas the former one requires one.
- Guidance can be found under: [AC 150/5300-18B – General Guidance and Specifications for Submission of Aeronautical Surveys to NGS: Field Data Collection and Geographic Information System \(GIS\) Standards Document Information](#)



# DBE Requirements

- DBE Goal; turnaround varies depending on FAA's workload, 1 week to several months
- Include goal in bid documents
- Reporting requirements:
  - All airports: follow the 3-year overall DBE schedule
  - Primary airports: Also follow the 3-year overall ACDBE schedule

## DBE and ACDBE Reporting Requirements For Airport Grant Recipients

**49 CFR Part 26 All Airports -- 3-Year Overall DBE Goals DUE: AUGUST 1**

Airport Type	Region	Due	Period Covered	Next Goal Due
Large and Medium Hub Primary	All	2019	(2020/2021/2022)	2022 (2023/2024/2025)
Small Hub Primary	All	2020	(2021/2022/2023)	2023 (2024/2025/2026)
Non-Hub Primary	All	2018	(2019/2020/2021)	2021 (2022/2023/2024)
Non-Primary including GAs, Relievers, and State DOTs	Alaskan, Eastern, and Great Lakes	2019	(2020/2021/2022)	2022 (2023/2024/2025)
Non-Primary including GAs, Relievers, and State DOTs	New England, Northwest Mountain, and Southern	2020	(2021/2022/2023)	2023 (2024/2025/2026)
Non-Primary including GAs, Relievers, and State DOTs	Central, Southwest, and Western-Pacific	2018	(2019/2020/2021)	2021 (2022/2023/2024)

**DUE DECEMBER 1, ANNUALLY:**

- Uniform Report of DBE Awards or Commitments and Payments

**49 CFR Part 23 Primary Airports -- 3-Year Overall ACDBE Goals DUE: OCTOBER 1**

Airport Size	Region	Due	Period Covered	Next Goal Due
Large/Medium Hubs	All	2020	(2021/2022/2023)	2023 (2024/2025/2026)
Small Hubs	All	2018	(2019/2020/2021)	2021 (2022/2023/2024)
Non-Hubs	All	2019	(2020/2021/2022)	2022 (2023/2024/2025)

**DUE MARCH 1, ANNUALLY**

- Uniform Report of ACDBE Participation

# FAA Standards Requirements

- Timing of Advisory Circular changes: Per the Handbook, the new AC must be met if project has not been bid. In practice, the FAA ADO PM will make the decision on a case-by-case basis.
- Modification to FAA standards or specifications – generally not allowed; difficult and time-consuming process
- Exceeding FAA standards – typically the extra cost is not eligible
- Approval and use of state standards
- FAA review of sponsor's plans, specs and design report is for the benefit of the FAA
  - FAA does not approve these documents, but FAA acceptance is required in order to go to bid.



# Bidding Phase

- Bid documents: include current Federal Contract Provisions, Federal Wage Rates, and Buy American Provisions
- Projects expecting discretionary funding should be ready to bid by April 1st
- All other AIP projects should be ready to bid no later than May 15<sup>th</sup>
- Important to call contractors prior to bidding and draw interest to the project, discuss market pricing and supply constraints
- Important to follow up with contractors regarding their intent to bid
- Pre-bid conference is optional



# Bidding Phase

- Bid analysis/bid tabulation
- Sole bidder issues
- Bids higher than budget? Options
- Recommendation to Award
- FAA concurrence required before issuing Notice of Award and contract to Contractor
- FAA grant required before issuing Notice to Proceed



Questions?

Thank you!



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**Table 2-1. Survey Requirements Matrix**

This table is designed for use in two ways. First, it defines in a general fashion the task required to meet a specific objective. Each task listed is generalized and the process to complete it many contain many other pieces. Users should refer to the text of the referenced AC to ensure that all the required subtasks are completed. The second way to use this matrix is as a checklist to ensure all the required data is collected either before leaving the field or before submitting the data to the FAA.

Intended End Use of the Data ➤	AC Reference	Category II or III Operations	Navigational Aid Siting			Airport Layout Plan (ALP)	Airport Obstruction Chart	Construction		Instrument Procedure Development	Pavement Design, Construction, Rehabilitation or Roughness	Airport Mapping Database
			Non-Precision	Precision	Visual			Airside	Landside			
Required Tasks ▼												
Provide a Survey and Quality Control Plan	150/5300-16/17/18	•	•	•	•	•	•	•	•	•	•	•
Establish or validate Airport Geodetic Control	150/5300-16	•	•	•		•	•	•		•	•	•
Perform, document and report the tie to National Spatial Reference System (NSRS)	150/5300-16	•	•	•	•	•	•			•		•
Survey runway end(s)/threshold(s)	150/5300-18	•		•	•	•	•	• <sup>1</sup>		•	•	•
Monument runway end(s)/threshold(s)	150/5300-18	•		•	•	•	•	• <sup>1</sup>		•	•	•
Document runway end(s)/threshold location(s)	150/5300-18	•		•	•	•	•	• <sup>1</sup>	• <sup>1</sup>	•	• <sup>1</sup>	•
Identify and survey any displaced threshold(s)	150/5300-18	•		•	•	•	•	• <sup>1</sup>		•	•	•
Monument displaced threshold(s)	150/5300-18	•		•	•	• <sup>1</sup>	• <sup>1</sup>	• <sup>1</sup>		•		•
Document displaced threshold(s) location	150/5300-18	•		•	•	•	•	• <sup>1</sup>		•	•	•
Determine or validate runway length	150/5300-18	•				•	•	• <sup>1</sup>		•	•	•
Determine or validate runway width	150/5300-18	•				•	•	• <sup>1</sup>		•	•	•
Determine runway profile using 50 foot stations	150/5300-18			• <sup>2</sup>		• <sup>2</sup>	• <sup>2</sup>	• <sup>1</sup>		•	• <sup>2</sup>	•
Determine runway profile using 10 foot stations	150/5300-18	•		• <sup>2</sup>		• <sup>2</sup>	• <sup>2</sup>	• <sup>1</sup>		•	• <sup>2</sup>	• <sup>2</sup>
Determine the touchdown zone elevation (TDZE)	150/5300-18	•		•		•	•			•	•	
Determine and document the intersection point of all specially prepared hard surface (SPHS) runways	150/5300-18	•				•	•					•
Determine and document the horizontal extents of any Stopways	150/5300-18	•				•	•			•		•
Determine any Stopway profiles	150/5300-18	•				•	•			•		•
Determine if the runway has an associated clearway	150/5300-18	•				•	•					
Survey clearway to determine objects penetrating the slope	150/5300-18	•				•	•			•		•
Determine and document the taxiway intersection to threshold distance	150/5300-18					•						
Determine runway true azimuth	150/5300-18	•		•		•	•			•		•
Determine or validate and document the position of navigational aids	150/5300-18	•	•	•	•	•	•			•		
Determine or validate and document the position of runway abeam points of navigational aids	150/5300-18	•		•	•		•			•		
Determine potential navigational aid screening objects	150/5300-18		•	•	•							
Collect and document VOR receiver checkpoint location and associated data	150/5300-18		•								•	
Perform or validate and document an airport airspace analysis	150/5300-18	•	•	•	•	•	•	• <sup>1</sup>		•		
Collect and document helicopter touchdown lift off area (TLOF)	150/5300-18				•	•	•	•		•	•	•
Collect and document helicopter final approach and takeoff area (FATO)	150/5300-18				•	•	•	•		•	•	•
Collect or validate and document airport planimetric data	150/5300-18					•	•	•	•			•
Determine or validate the elevation of the Air Traffic Control Tower Cab Floor (if one is on the airport)	150/5300-18	•				•	•	•	•			•

<sup>1</sup> Only when runway construction is involved.

<sup>2</sup> All 14 CFR Part 139 airports require 10 foot stations. At all other airports the distance between stations is between 10 and 50 feet to meet local requirements

# AGIS Requirements Continued

Intended End Use of the Data ➤	AC Reference	Category II or III Operations	Navigational Aid Siting			Airport Layout Plan (ALP)	Airport Obstruction Chart	Construction		Instrument Procedure Development	Pavement Design, Construction, Rehabilitation or Roughness	Airport Mapping Database
			Non-Precision	Precision	Visual			Airside	Landside			
Required Tasks ▼												
Perform or validate a topographic survey	150/5300-18	• <sup>3</sup>	•	•		•		•	•	• <sup>4</sup>		
Collect and document runway and taxiway lighting	150/5300-18	•				•						•
Collect and document parking stand coordinates	150/5300-18											•
Collect cultural and natural features of landmark value	150/5300-18					•	•					•
Determine elevation of roadways at the intersecting point of the Runway Protection Zone (RPZ) or the runway centerline extended	150/5300-18	•				•						
Determine all Land Use to 65 DNL contour	150/5300-18					•						
Document features requiring digital photographs	150/5300-18	•	•	•	•	•		•		•		
Document features requiring sketches	150/5300-18	•	•	•	•	•		•		•		•
Collect position and type of runway markings	150/5300-18	•				•						•
Collect position and type taxiway markings	150/5300-18											•
Locate, collect, and document photo ID points	150/5300-17						•					
Identify collect, and document wetlands or environmentally sensitive areas	150/5300-18					•						
Collect imagery	150/5300-17	•				•	•			•		•
Provide a final Project Report	150/5300-16/18	•	•	•	•	•	•	•	•	•	•	•







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