

Advisory Circular

Subject: Airport Data and Information Program

Date: Draft Initiated By: AAS-100 AC No: 150/5300-19 Change:

1. Purpose.

This advisory circular (AC) provides general guidance and information for airport owners and operators in the collection, submission and management of data describing the physical infrastructure, characteristics, and services of their airport. This data is source material for the Federal Aviation Administration (FAA)'s aeronautical information databases, for use in the dissemination of aviation information to the public, preparation of government and private industry aeronautical charts, and related flight information publications as required by Title 49 United States Code 44721, 49 U.S.C. 47130, and the planning and programming of various programs within the FAA. This AC also describes the schedule, frequency and standards for airport inspections. These inspections ensure conformance with standards including the applicability and currency of the published information.

2. **Distribution.**

This AC is distributed to FAA Washington DC headquarters, director level, and the regional offices and field offices of Airports, Air Traffic Organization (ATO), Office of Aviation Safety (AVS) and airports.

3. Cancellation.

This AC cancels AC 150/5200-35A, Submitting the Airport Master Record in Order to Activate a New Airport, dated May 2, 2004.

4. Effective date.

The effective date of this AC is September 30, 2015.

5. **Principal changes.**

This AC provides new standards, recommended practices, and automation capabilities for airport owners and operators to manage their data within the Airports Geographic Information System (Airports GIS) application to communicate changes to the FAA's Airport Authoritative Source. The Authoritative Source is the designated repository for authoritative data or information provided by the steward. These new standards and capabilities allow airport operators to easily manage their airport data and share it with the FAA and the aviation community. The implementation of this program provides a new direction for the airport community toward computer-based, airport-centric data management and sharing. These standards also provide new capabilities and tools supporting the inspection of airports at all levels. This AC implements new standards and tools for airport inspection personnel to use in completing, documenting, and following up on identified airport inspection data discrepancies. All information for completing the Airport Master Record is maintained within the Airport Authoritative Source. The printing of the forms for use is still an option however, maintaining the data is now accomplished using automation within Airports GIS.

6. **Objectives.**

The goals and objectives of the FAA's Airport Data and Information Program are as follows:

- To promote and encourage airport safety through direct contact with airport management and application of methods and techniques to improve safety conditions at airports
- To provide a means of visualizing conditions at airports in an accurate and timely manner, bringing attention to unsafe conditions and motivating airport management to correct deficiencies
- To collect and maintain a comprehensive, single-agency airport data repository
- To ensure data is promulgated with a degree of accuracy and frequency consistent with the exercise of FAA responsibilities, (See <u>Appendix A</u>)
- To eliminate redundant collection and dissemination processes
- To provide an efficient means for producing both recurring and one-time reports needed for management direction, program planning, and statistical analysis
- To provide airport information to the public
- To provide standards based, independently validated and verified data meeting the data quality and integrity requirements of the FAA and the public

7. **Comments or suggestions.**

If you have suggestions for improving this AC, you may use the <u>Advisory Circular</u> <u>Feedback form</u> at the end of this AC.

8. **Copies of this AC.**

This and other FAA ACs are available online at http://www.faa.gov/airports/resources/advisory_circulars/.

Michael J. O'Donnell Director of Airport Safety and Standards

CONTENTS

СНАРТ	ER 1. Airport Data	7
1.1	The Airport Data and Information Program	7
1.2	The Airport Master Record	7
1.3	What data am I required to report to the FAA?	8
	1.3.1 What data management criteria apply to my airport?	8
	1.3.2 Airport Administrative and Logistical Data	8
	1.3.3 Changes requiring validation or approval of the Airports Regional or Local	
	Airports District Office	8
	1.3.4 Changes requiring an aeronautical study by the FAA prior to publication	9
1.4	Is there a timetable for my data submission?	9
1.5	What supporting document am I required to provide to the FAA?	9
1.6	How do I activate or deactivate an airport?	10
	1.6.1 Activation of new public use landing areas	10
	1.6.2 Activation of new private use landing areas	11
1.7	What are airport Site Numbers and how are they assigned?	11
	1.7.1 Change in the associated city	12
	1.7.2 How are site numbers cancelled?	12
1.8	Data reporting matrix	12
1.9	What are some references I can use to help me understand data submission to the FA	AA?12
	1.9.1 Online references:	12
CUADT	FD 9 Aliment Date Calledian Matheda	15
	ER 2. Altport Data Collection Methods	15
2.1	How do you handle changes made using a web form?	15
2.2	How do you handle changes using maps or aerial imagery?	15
2.3	How do Lupload the required documentation?	15
2.4	Changes requiring submission of data files	10
2.5	2.5.1 Overview	17
	2.5.1 Overview	17
	2.5.2 Now do you concer the data:	10
	2.5.4 Data collection at all other airports	20
	2.5.4 Data concerton at an other an ports	20
	2.5.5 Data accuracy	20
CHAPT	ER 3. Airport Inspections	23
3.1	Purpose of these inspections	23
	3.1.1 Who will inspect my airport?	23
	3.1.2 How will I know when I am about to be inspected?	23
	3.1.3 What will happen at my airport inspection?	24
	3.1.4 What kind of unsafe conditions will the inspector report?	24
	3.1.5 Besides annual inspections, when else can I be inspected?	24
3.2	Instructions for location sketch and layout drawing	25
	3.2.1 Mandatory items to include on location sketch and layout:	25
	3.2.2 Optional location sketch and layout items include:	26
		• 6
Appendi	x A. Data element requirements	29

A.1	Public airports with Federal agreements	29
A.2	Public airports without federal agreements	38
A.3	Private-use airports	47
Appendi	x B. Glossary of terms	51

LIST OF FIGURES

Figure 2-1 illustrates a typical file upload dialog box	. 16
Figure 2-2 illustrates the upload dialog box after selection of the appropriate file	. 16
Figure 2-3 illustrates the upload confirmation page	. 17
Figure 3-1 is an example of the Airport Location Sketch and Layout drawing	. 27

LIST OF TABLES

Table 1-1. Determining IFR service criteria	8
Table A-1. Public airports with federal agreements: General airport information	. 29
Table A-2. Public airports with Federal agreements: Airport administration	. 30
Table A-3. Public airports with Federal agreements: Airport Operations (12 month count of ta	ke-
off or landing	. 31
Table A-4. Public airports with Federal agreements: Airport services	. 32
Table A-5. Public airports with Federal agreements: Apron/Parking services	. 33
Table A-6. Public airports with Federal agreements: Heliport/Helipads	. 33
Table A-7. Public airports with Federal agreements: Navigational aids	. 34
Table A-8. Public airports with Federal agreements: Obstacles	. 34
Table A-9. Public airports with Federal agreements: Runway	. 35
Table A-10. Public airports with Federal agreements: Runway (continued)	. 35
Table A-11. Public airports with Federal agreements: Runway (continued)	. 37
Table A-12. Public airports with Federal agreements: Taxiways	. 37
Table A-13. Public airports without Federal agreements: General airport information	. 38
Table A-14. Public airports without Federal agreements: Airport administration	. 39
Table A-15. Public airports without Federal agreements: Airport Operations (12 month count	of
take-off or landing	. 40
Table A-16. Public airports without Federal agreements: Airport services	. 41
Table A-17. Public airports without Federal agreements: Apron/Parking services	. 41
Table A-18. Public airports without Federal agreements: Heliport/Helipads	. 42
Table A-19. Public airports without Federal agreements: Navigational aids	. 42
Table A-20. Public airports without Federal agreements: Obstacles	. 43
Table A-21. Public airports without Federal agreements: Runway	. 43
Table A-22. Public airports without Federal agreements: Runway (continued)	. 44
Table A-23. Public airports without Federal agreements: Runway (continued)	. 45
Table A-24. Public airports without Federal agreements: Taxiways	. 46
Table A-25. Private-use airports: General airport information	. 47
Table A-26. Private-use airports: Airport administration	. 48
Table A-27. Private-use airports: Heliport/Helipads	. 49
Table A-28. Private-use airports: Navigational aids	. 49

Table A-29.	Private-use airports: Obstacles	. 50
Table A-30.	Private-use airports: Runway	. 50

Page Intentionally Blank

CHAPTER 1. AIRPORT DATA

Title 14 CFR Part 157, Notice of Construction, Alteration, Activation, and Deactivation of Airports, requires you, the owner or operator of a public or private airport to notify us, the FAA, when you plan to construct, alter, activate, or deactivate a civil or joint-use (civil/military) airport or to alter the status or use of the airport. When used within this AC, the term Airport means an area of land or water that is used or intended to be used for the landing and takeoff of aircraft, and includes its building and facilities, if any. We provide a secure internet-based application called Airports GIS for your use in notifying the FAA about changes involving your airport. Using this system, you can identify changes to your airport and maintain the data describing the physical infrastructure, characteristics and services of your airport. In addition to meeting the requirements of Part 157, the FAA uses this data to perform other studies or analyses necessary to ensure the safety and efficiency of the National Airspace System (NAS), including studying proposals for construction of objects on or surrounding airports (Title 14 CFR Part 77, Safe, Efficient Use, and Preservation of the Navigable Airspace), developing instrument procedures, and disseminating the data to NAS users through flight information publications and aircraft navigation databases. Please note that certain block grant states share airport data responsibilities with the FAA.

9 1.1 The Airport Data and Information Program

The primary purpose of the Airport Data and Information Program is to provide you with guidance regarding the collection, submission and management of airport data and information and a means to perform the necessary data management functions. This system allows you to manage and update your information through the internet ensuring we and users of the NAS have the most current information available. This allows us to meet our primary objective of providing standards based digital, independently validated and verified data ensuring the airport, aircraft, and air traffic control are using the same information regarding the airport. It is also the intent of the program to have an Airport Master Record for all airports and heliports within the U.S. and its territories necessary for us to provide regulatory and support services.

1.2

The Airport Master Record

The Airport Master Record describes the basic operational and services data of the airport. The primary purpose of the Airport Master Record is to identify the minimum data and information about the physical infrastructure, characteristics, services, operations, and status of all airports (public and private) comprising the NAS. We use Airport Master Record data in flight information publications, navigation databases, and to complete analyses. We provide Airport Master Record data and information internally and externally for dissemination to pilots and other interested parties of as part our aeronautical information solution and services. Not all airports have submitted an Airport Master Record or a complete AMR.

40 **1.3** What data am I required to report to the FAA?

41 1.3.1 <u>What data management criteria apply to my airport?</u>

The basis for determining your airport's data management criteria is the type of Instrument Flight Rules (IFR) approaches serving your airport. The data management criterion applying to the collection and management of data describing the physical infrastructure, characteristics, services, and status of the airport, has three levels:

46

	IFR Servi	ce Availability	Criteria to	
Type of IFR Service	Currently	Planned (0 – 5 years)	Apply	
Vertically guided instrument approaches (ILS, LPV, RNP, TLS, PAR etc.)	~	\checkmark	AC 150/5300-18	
Non-Precision, Non-vertically guided, instrument approaches (VOR, VOR/DME, GPS, NDB, TACAN, LOC etc.)	✓	\checkmark	AC 150/5300-19	
All other airports	\checkmark	\checkmark	AC 150/5300-19	

Table A. Determining IFR service criteria

1.3.1.1 How much information am I required to submit?

The amount of information we require you to submit and maintain differs by airport and current or planned instrument approaches. In general, to perform our regulatory and support activities such as performing aeronautical studies, we require all airports to provide certain data; comprising the Airport Master Record. At airports with nonprecision non-vertically guided instrument approaches we require you to provide the data necessary to support the development and maintenance of the approaches and to ensure the safety, efficiency, and utilization of these airports. At airports with vertically guided instrument approaches we require you to provide the most comprehensive data set. Refer to <u>Appendix A</u> for a complete listing of data element requirements.

7 1.3.2 <u>Airport Administrative and Logistical Data</u>

Airport Administrative and Logistical data describes the information about the airport such as the city and state, the airport owner and operator, the airport attendance schedule, the contact information for the airport manager, and other general information. A change to this type of data is accepted by us after you certify the changes as being current. However, at Public Use airports with Federal obligations the acceptance requires review by us for compliance with your federal obligations.

1.3.3Changes requiring validation or approval of the Airports Regional or Local Airports55District Office

In some cases, the data about the airport requires our review to determine the effect of the changes on the safety, utilization, or efficiency of a public use airport (or private use airport with a published instrument approach) or compliance with your federal obligations. In these cases, once you request a change, we initiate a study to determine the effect of the change on the airport and issue a determination. After completing the study, we will advise you (airport owner, operator, or sponsor) of our determination and publish the change.

731.3.4Changes requiring an aeronautical study by the FAA prior to publication74When a change has the potential to affect the NAS or neighboring airports, we will75perform an aeronautical study. If the proposed change could affect the NAS, the76regional or local Airports District Office will address these changes through their77respective Regional Airspace Procedures Team (RAPT) for coordination and analysis.78The coordination of these changes through this cross functional team allows all of our79respective staff offices and functions the opportunity to address the change80appropriately and determine the potential affect the change could have on the NAS and81plan or initiate any necessary adjustments.

1.4 Is there a timetable for my data submission?

A critical element in keeping your data current is ensuring you publish the change in the right timeframe. Provide change requests early enough to ensure adequate time is available for the completion of any studies, analysis, or coordination before their acceptance into the NAS. Depending on the type of change, you should allow for a considerable amount of time when the change affects an instrument flight procedure (about 180 days) or requires contracting for engineering and surveying services. Planning is important to ensure the collection, validation, and verification of the data is complete prior to the publication effective date. This publication interval is based on the international standard Aeronautical Information Regulation and Control (AIRAC) cycle. The effective date for commissioning, decommissioning, or altering a component of the NAS (in this case an airport) the Instrument Flight Rules (IFR) system must coincide with one of the pre-established international AIRAC charting dates. Generally, the cutoff for all airport data is 43 working days prior to the publication effective date.

- For more information on publication cycles, refer to the inside cover of any Airport/Facility Directory. This information may also be found at <u>http://www.faa.gov/air_traffic/flight_info/aeronav/</u>. Through appropriate planning and close coordination with your Regional Airports Office or Airports District office, you can ensure the completion of the necessary studies and coordination ensuring your data is correct, complete, and ready for operational use in the appropriate timeframe.
- 1.5 What supporting document am I required to provide to the FAA?
- In order for us to study and coordinate the proposed change to your airport's data, certain supporting documentation is necessary. The level of this documentation varies according to the type of change but generally falls within one of the following classifications:
 - The collection and submission of the data in the correct format according to the following standards

109 110 111	 AC 150/5300-16, <u>General Guidance and Specifications for Aeronautical</u> <u>Surveys: Establishment of Geodetic Control and Submission to the National</u> <u>Geodetic Survey</u>,
112 113	 AC 150/5300-17, <u>Standards for Using Remote Sensing Technologies in Airport</u> <u>Surveys</u>,
114 115	 AC 150/5300-18, <u>Survey and Data Standards for Submission of Aeronautical</u> <u>Data using Airports GIS</u>, or AC 150/5300-19.
116 117 118 119	• An airport official responsible for the data reads, understands, and certifies a system-generated certification statement. In these cases the certification is electronically signed by the airport official submitting the change using their individual password.
120 121	• A scanned, signed, certified letter provided by the airport owner or operator identifying their agreement with the proposed change.
122 123 124	These supporting documentation levels are the minimum requirements. We encourage the submission of as much supporting documentation as possible to support the change. This assists us in making an appropriate decision in a timely manner.

1.6 How do I activate or deactivate an airport?

26 1.6.1 <u>Activation of new public use landing areas</u>

If you are proposing a new public-use airport, you must provide the necessary information through Airports GIS for us to complete any required study, analysis or coordination. Airports GIS will provide the information and supporting documentation to the appropriate Regional Airports Division or Airports District Office for review, coordination, and study of the proposal. This may be the first information available to us regarding proposals for new general aviation public-use airports. When we receive the information supporting the proposal, we initiate an aeronautical study. After we complete the aeronautical study, we issue an airspace determination letter to you as either:

- no objection
 - no objection with conditions
- objectionable

If the aeronautical study results are "no objection with conditions" or "objectionable,"
the letter sent to you will identify the next actions you must complete. When the airport
becomes operational, the airport is inspected and we will advise you of any additional
information or corrections to the original data submission is necessary. With the
inspection complete and any new information provided to Airports GIS, the system
validates the data, assigns the airport a Site Number, and advises our other
organizations of the availability of data for a new airport. If a Regional Airports
Division, Airports District Office, State, or contractor personnel are unable to physically
inspect a new public-use airport they will review the data and advise you of any

- additional information necessary to enter into Airports GIS. You should contact the
 State Aviation Agency for guidance regarding individual State aviation requirements.
- 150 1.6.2 <u>Activation of new private use landing areas</u>

If you are proposing a new private-use airport, you should submit the information regarding the airport to Airports GIS. This is usually the first information available to us regarding proposals for new private-use airports. Once the necessary information is entered into Airports GIS, we initiate an aeronautical study. When we complete the aeronautical study, we issue you an airspace determination letter of either:

- no objection
 - no objection with conditions
 - objectionable

This letter notifies you of the results of our aeronautical study and includes instructions for providing any additional information we may require through Airports GIS. The letter also instructs you to advise us when the airport becomes operational. When notified the airport became operational, Airports GIS validates the data, assigns the airport a Site Number, and provides the information about the airport to our other organizations.

5 **1.7** What are airport Site Numbers and how are they assigned?

The Site Number is an eight digit sequential number we assign to the airport according to the State and Associated City. We use the Site Number primarily to perform computer searches, such as identifying all heliports. The Site number has a one-letter suffix identifying the primary use of the airport. The suffixes identifying the primary use of the airport are:

- A = Airport
 - B = Balloonport
 - C = Seaplane Base
 - G = Gliderport
 - H = Heliport
- U = Ultralight Flightpark

Because of the number of airports in the system, we reuse Site Numbers when the number is not assigned to an airport. When a new or proposed location is recommended for inclusion in the National Plan of Integrated Airport System (NPIAS), Airports GIS will assign a Site Number for the Airport as long as the airport proposal is included in the subsequent NPIAS or until the selection of a site for the construction of a new airport is complete. When a proposed public use airport receives a favorable airspace determination, Airports GIS will assign the Site Number to the airport. If we receive notice of a new airport or notice of one not previously reported, we gather information about the new airport and Airports GIS assigns a Site Number. When a previously

186 187 188		abandoned airport is "reactivated," Airports GIS will attempt to reassign the same Site Number to the airport. If the previously assigned number is currently assigned to another airport, Airports GIS will assign the airport a new Site Number. Airports GIS
189		assigns Site Numbers to all Military Airports who do not have one when the appropriate
190		information regarding the military airport is input into Airports GIS.
191	1.7.1	Change in the associated city
192		Since Airports GIS uses the associated city to make Site Number assignments, any
193 194		change in the airport's associated city usually requires a new Site Number. Requesting changes to the associated city in Airports GIS will generate a new Site Number for the
195		airport once you request the change and provide the appropriate documentation.
196	1.7.2	How are site numbers cancelled?
197		Due to the ever-increasing number of airports in the nation, it is not feasible to retain
198 199		Site Numbers for locations indefinitely. Airports GIS will without notice or intervention by a user cancel Site Numbers meeting any of the following criteria:
200 201		• Except for airports with Federal agreements, when an airport is abandoned for three years or more
202		• When a proposed airport location recommended in the NPIAS is deleted
203		• When a "reserved" Site Number assigned for development is cancelled
204		• At an airport where there is a change in associated city
205		• When a Site Number is erroneously assigned to a duplicate record
206	1.8	Data reporting matrix
207		Appendix A identifies the data requirements for different data elements according to the
208		type of airport (public, private, etc.), specific data element change, and supporting
209		documentation.
210	1.9	What are some references I can use to help me understand data submission to
211		the FAA?
212		The following publications are available from the FAA at:
213		<u>http://www.raa.gov/anpons_antranc/anpons/</u> or <u>http://www.raa.gov/atpubs</u> .
214	1.9.1	Online references:
215		1.9.1.1 AC 150/5300-18, Survey and Data Standards for Submission of
216		Aeronautical Data using Airports GIS
217 218		I have a provides the standards for the collection of airport and aeronautical data through field and office methodologies in support of the Federal
219		Aviation Administration (FAA). It also explains how to submit data to the
220		FAA, who will forward the safety critical data for independent verification
221		and validation. The primary purpose of these standards is to inform

	6/1/2015	DRAFT	AC 150/5300-19
222 223 224		industry on the requirements for data collection efforts in support of the FAA Airport Surveying – Geographic (GIS) Program.	conducted at airports Information System
225 226 227 228 229 230	1.9.1.2	AC 150/5370-2, Operational Safety on Airports during This AC sets forth guidelines for operational safety on construction. It contains major changes to the followin Safety Area," "Taxiway Safety Areas/Object-Free Are "Marking Guidelines for Temporary Threshold," and " Lighting."	g Construction airports during g areas: "Runway as," "Overview," 'Hazard Marking and
231 232	1.9.1.3	Obstruction Evaluation Airport Airspace Analysis (OE <u>http://oeaaa.faa.gov</u> .	Z/AAA) website,
233 234 235 236	1.9.1.4	Title 14 CFR Part 157, <u>http://ecfr.gpoaccess.gov/cgi/t/tidx?c=ecfr&tpl=%2Findex.tpl</u> This CFR provides regulations on how to give notice of alteration, activation, and deactivation of airports.	text/text- of construction,
237 238 239	1.9.1.5	Aeronautical Information Services (AIS) website, http://www.faa.gov/about/office_org/headquarters_offic/systemops/aaim/organizations/aeronautical_im/aero_i	ices/ato/service_units nfo_svcs/
240	1.9.1.6	National Flight Data Center, http://nfdc.faa.gov/index.	jsp
241 242 243	1.9.1.7	Pilot Controller Glossary (PCG) website, http://www.faa.gov/airports_airtraffic/air_traffic/public ndex.htm	cations/atpubs/PCG/i
244 245	1.9.1.8	Title 14 CFR Part 77, http://www.ecfr.gov/cgi-bin/text idx?c=ecfr&SID=61302bd90d79271a583474ad2f9dcd	- 7e&rgn
246 247 248 249	1.9.1.9	150/5335-5 Standardized Method of Reporting Airport PCN, http://www.faa.gov/airports/resources/advisory_circula ument.list	t Pavement Strength – ars/index.cfm/go/doc
250 251 252	1.9.1.10	150/5370-2 Operational Safety on Airports During Con http://www.faa.gov/airports/resources/advisory_circula ument.list	nstruction, ars/index.cfm/go/doc
253 254 255	1.9.1.11	FAA Form 5100-1, Airport Pavement Design, https://www.faa.gov/forms/index.cfm/go/document.inf D/180703	formation/documentI
256 257	1.9.1.12	FAA Form 7460-1, Notice of Proposed Construction o https://www.faa.gov/airports/engineering/#airspace	r Alteration,

6/1/2015

258 259	1.9.1.13	FAA Form 7480-1, Notice of Landing Area Proposal, https://www.faa.gov/airports/engineering/#airspace
260		
261		

CHAPTER 2. AIRPORT DATA COLLECTION METHODS

2.1 Methodologies

Submit all changes describing the physical infrastructure, characteristics, status, or services of an airport to us through the Airports GIS web application at <u>https://airports-gis.faa.gov/public/</u>. This internet application provides you the necessary tools to submit and manage data while ensuring the completion of any necessary coordination processes. There are three basic methods of submitting data:

- Completing an online web form
 - Identifying features using a map or aerial imagery of the area
 - Submitting data files with the necessary information in the appropriate format.

72 **2.2** How do you handle changes made using a web form?

Airports GIS uses an intuitive web form interface for managing your data. Once you log in to the system using your Airports GIS username and password, the system checks your credentials against its role-based access control database to ensure you have the appropriate level of authority to make changes to the airport's data. Once the user authentication is complete, the system provides you with a series of web pages containing the data about the airport. After you select the data element you want to change, you can enter the new information or upload geospatial vector files of the data. In some cases, the system prompts you to select a set of values. Once you change the value or upload a file, the system validates the data and then prompts you to provide the necessary supporting documentation (if necessary).

Some changes require you to digitally sign (using your system password) an online certification statement while others require you to submit supporting documentation as a file in portable document format (PDF). If the change does not require action by anyone other than the authorized airport official submitting the change, the system makes the change within the Airports GIS database and notifies other FAA systems of the change. If the change requires us to take action, the system holds the change in a pending status, notifies our appropriate staff offices and/or lines of business who must act on the change. After the completion of necessary reviews, studies, or coordination, Airports GIS stores the change and advises our other systems.

2.3 How do you handle changes using maps or aerial imagery?

In some cases, the system may require or allow you to identify changes using geographically referenced maps or aerial imagery. In these cases, the system will display the map or imagery for the area around the airport. The National Map is a service of the U.S. Geological Survey providing high resolution orthoimagery combining the visual attributes of aerial photography with the spatial accuracy and reliability of a planimetric map. The resolution of these products may vary from 6 inches to 3 feet ensuring enough precision to provide quality, consistent data. Usually, the system identifies the appropriate area using the airport location identifier tied to your account. If you have multiple airports assigned, or the system doesn't have the information, you will be prompted to identify the area through another means, generally by the physical airport location zip code or other geographical items such as the City. Once the system identifies the appropriate area, it displays the map or imagery you will need to provide the information. The system will then allow you to point to locations on the map to identify changes or submit new data about the airport. The definition of features using this method results in an estimated value for the geographic position of features at the airport. The ground elevation is also estimated according to the underlying digital terrain model the system uses. Though the accuracy of the image, map, and digital terrain model are known, your ability to pinpoint exact features on your screen is less accurate. This data collection process supports our low resolution accuracy requirements, so estimated values are acceptable.

How do I upload the required documentation?

When the change requires the submission of a file (submitted in PDF format) the system provides a standard WindowsTM interface allowing you to upload the necessary file(s). To upload a file, select the "Browse" button to navigate to the file to upload (See <u>Figure</u> <u>2-1</u>).

318

Figure 2-1 illustrates a typical file upload dialog box



dd required d	ocumentation:	
Category:	Final Report	
• File:		Browse
Description:		
	Submit Cancel	

319

Select the file (see <u>Figure 2-2</u>), and click the Submit button. The file is uploaded and the system provides upload confirmation (<u>Figure 2-3</u>).

Figure 2-2 illustrates the upload dialog box after selection of the appropriate file

Action: Upload Final Report

Add required d	ocumentation:	
Category:	Final Report	
• File:	C:\Users\Desktop\FAA SOftware Standards\FAA-ST	Browse
Description:	The file selected to upload	
	Submit Cancel	

323

The upload confirmation page allows you to submit additional documents using the "+Upload Document" link or to add further clarifying comments and information. The file size limit is 500 megabytes. To enter these additional documents and comments you must click the Submit button.

Figure 2-3 illustrates the upload confirmation page

D-t-					
Date	Added By	Category	File Name	Actio	n Description
1/14/2010 03:33 PM	Roy Toth	Final Report	FAA-STD-060B_DATA_STANDARD.pdf (0.	.1MB) delet	The file selected to upload
Add Document	1			'	1
Once you have	e uploaded all	of your docur	nent(s), please click the Submit button to co	omplete this act	ion.
omments: (optional)					

329

330	2.5	Changes requiring submission of data files
331	2.5.1	Overview
332 333 334		The collection of geospatial data describing certain airport features is necessary for us to facilitate the safe operation of the NAS. Capture or identify the following features for all airports:
335		• Runway ends (Thresholds)
336		Displaced thresholds
337		• Stopway ends
338		Heliport data
339		• Navigation aids (NAVAIDS)
340 341		• All objects exceeding 15 feet above ground level, within the boundaries of the airport property.
342		You can collect certain points on the airport using various methods as we outline in the
343		following paragraphs. In general, a Differential grade or better GPS receiver is
344		necessary to achieve the accuracies necessary to support the development and
345		maintenance of non-precision, non-vertically guided instrument flight procedures.
340 377		complete the online Airports GIS Integrated Distance Integrated Distance Learning
348		Environment (IDLE) training describing the appropriate methods and techniques to
349		collect the information. Airports GIS processes the data and posts the final data to the

350 351		spatial database. A portable document format (PDF) file with the data dictionary definitions is available at <u>https://airports-gis.faa.gov/public/</u> .
352 353		The online training and User Guide available at the Airports GIS website provides more detailed information regarding the data collection at these airports.
354	2.5.2	How do you collect the data?
355 356 357		Depending on the IFR instrument approaches at the airport (see paragraph 1.1 and Table 1-1), the collection of safety critical data requires specialized tools and training. For airports with non-precision non-vertically guided instrument approaches we allow the
358		use of hand held GPS receivers meeting certain standards (see paragraph 2.5.2.3) and
359		following defined processes outlined in this AC and in the online training. Data
360		collection at airports with any type of vertically guided instrument approach requires
361		professional engineering and surveying services to collect and format the data (See AC
362		Planning Consultant Services for Airport Grant Projects)
000		r humming Consultant Services for r inport Grant (16jeets).
364	2.5.3	Safety critical data
365		Some data elements require submitting a geospatial data file to support the change. The
366		type of data required varies according to the requested change. The system evaluates the
367 368		request and prompts you to submit data based on your request. Generally, the geospatial data is data we deem as safety critical ¹ . We deem but do not limit safety critical data to
369		the following identification of or changes to:
370		• the location or elevation of the runway threshold or displaced threshold
371		• the runway end location or elevation
372		• the location and dimensions of Runway Safety Areas (RSA)
373		• taxiway centerline points
374		• the geometric center of a heliport/helipad Touchdown Lift Off Area (TLOF) or the
375		Final Approach and Takeoff Area (FATO) area
376		• the airport/heliport elevation
377		• the threshold crossing height for a runway
378		• objects ² in the approach and departure areas
379		• the location or reference elevation(s) of navigational aids located on the airport

¹Title 14 CFR Part 401 defines safety critical as "essential to safe performance or operation. A **safety critical** system, subsystem, component, condition, event, operation, process, or item is one whose proper recognition, control, performance, or tolerance is essential to ensuring public safety. Something that is **safety critical** creates a safety hazard or provides protection from a safety hazard."

²Object. Includes, but is not limited to above-ground structures, NAVAIDs, people, equipment, vehicles, natural growth, terrain, and parked aircraft.

6/1/2015

380	• the ru	nway or FATO length, width or TLOF dimensions						
381	• the St	copway length						
382	• the de	eclared distances for the airport such as landing distance available, takeoff run						
383	availa	ble, takeoff distance available, or accelerate stop distance available						
384	• The F	• The FAA may deem other data or categories of data as safety critical when they are						
385	part o	f a published procedure or chart such as a Low Visibility Operations/Surface						
386	Move	ment Guidance and Control System (LVO/SMGCS) chart or procedure.						
387 388	For a com refer to A	plete listing of safety critical data, requirements, and associated accuracies .C 150/5300-18.						
389	When req	juesting changes to safety critical data the FAA requires the submission of the						
390	change in	a geospatial data format and the collection of the data is generally from an						
391	airport su	rvey or other approved collection method as outlined in the following						
392	paragraph	15.						
393	2.5.3.1	Data collection at airports with vertically guided instrument approaches						
394		Airports with vertically guided instrument approaches require the strictest						
395		level of geospatial data collection. The accuracy required will vary						
396		depending on the specific item or facility surveyed. Refer to AC 150/5300-						
397		18 for information, accuracy requirements, data formats, and other						
398		requirements for surveying these airports.						
399 400	2.5.3.2	Data collection at airports with non-precision non-vertically guided instrument approaches						
401		The data defining the physical airport infrastructure supporting an airport's						
402		non-precision non-vertically guided instrument procedures requires a more						
403		rigorous data collection process than airports with no instrument						
404		approaches. The Airport Data and Information program provides two						
403		acceptable methods for you to use in concerning this data.						
406	2.5.3.2.1	Commercial Grade GPS Receivers						
407		Commercial grade receivers provide a reasonable level of accuracy						
408		supporting data collection efforts at airports. These receivers generally cost						
409		less than \$600 and are capable of providing horizontal accuracies of ± 3 maters (10 feet) if the unit is capable of receiving and incorporating signals						
410 411		form the FAA Wide Area Augmentation (WAAS) satellites Without this						
412		capability, the accuracy of this type of receivers is approximately 10 meters						
413		(30 feet) horizontally. The vertical accuracy of these receivers is poor and						
414		should be used with caution, though the results are acceptable for very						
415		coarse geographic location collection.						
416	2.5.3.2.2	Differential Grade GPS Receivers						
417		Differential receivers provide higher accuracy, but have an additional cost						
418		for the equipment and any post processing software. Better differential						
419		receivers can use secondary positioning information sources like WAAS,						

EGNOS, or the USCG Differential GPS signal. If the airport sponsor wants to collect their own data using a differential GPS, the FAA recommends post processing using the NGS CORS system. There are some commercial services providing differential corrections as well as some States and localities providing independent networks for differential corrections. In general, units in this category range from \$500 to \$10,000 with software.

- When using these systems, most achieve their improved accuracy through either post processing of the data using a system such as the National Geodetic Survey's Continuously Operating Reference System (CORS) or by using a differential correction system, such as those offered by commercially available systems. In some areas of the United States, users may also be able to use Differential GPS beacons available from the United States Coast Guard. Users can determine the availability of coverage of these beacons at the following internet site:
- 434 <u>http://www.navcen.uscg.gov/dgps/coverage/Default.htm</u>.
- The accuracy of this type of receivers can vary based on the type of differential correction used. We recommend you post process the data using the NGS CORS system rather than using a real time or near real-time correction service to achieve high quality and consistent results. Postprocessing data using the NGS CORS requires the use of a dual channel receiver. Airports GIS application provides a link to the NGS CORS site to post-process your data. When properly collected and post processed differential grade receivers are capable of achieving the medium level accuracies necessary to support the development of instrument procedures.

4 2.5.4 <u>Data collection at all other airports</u>

For these airports, Airports GIS provides online tools and processes to capture the location and enter the necessary attribution describing the characteristics of the features. Airports GIS provides users the ability to identify, select, and characterize information using maps and imagery. With these tools, the user selects locations for features (such as a runway end) on the screen and completes the information by typing information into a dialog box. Users can identify features using a point, line, or polygon as required by the specific feature. For instance defining the runway end would be a point feature while defining the runway would require collection as a polygon. In all cases, the geographic information for the feature using this method will be indicated as an estimated value. Though the values are estimated, they do support general location identification for airports without instrument approaches or with only Circling Approaches. The design of the application walks you through the steps to complete the data capture. Before beginning data collection at these airports, users must successfully complete the online training describing the appropriate methods and techniques you need to collect the information.

460 2.5.5 <u>Data accuracy</u>

The accuracy of features collected using Airports GIS capabilities is a function of the positional accuracy of the base data set (imagery or map) and associated processes.

463	Accuracy of information using this method will always be an estimated value. Accuracy
464	of features at airports with non-precision non-vertically guided instrument approaches is
465	a combination of the Airports GIS automation and a function of the post processing of
466	the data to achieve a horizontal position accuracy of 5 feet relative to the North
467	American Datum of 1983 (NAD 83). Data providers must use latitude and longitude as
468	the unit of measurement. The vertical position (elevation) requirement is 10 feet relative
469	to the North American Vertical Datum of 1988 (NAVD 88) with a unit of measurement
470	of feet. AC 150/5300-18 contains the accuracy requirements for airports with vertically
471	guided instrument approaches.
	•

Page Intentionally Blank

473			CHAPTER 3. AIRPORT INSPECTIONS						
474 475 476 477		It is the rephysical i personnel the United	esponsibility of the airport operator to manage the information describing the nfrastructure and services of their airport. The FAA, State, or contractor perform standardization inspections of all public use airports and heliports in d States and its territories as part of the Airport Data and Information Program.						
478	3.1	Purpos	e of these inspections						
479 480		The purpo current ar	ose of these inspections is to ensure data on public use landing facilities is ad provides the information necessary for flight planning and operations.						
481	3.1.1	Who will	inspect my airport?						
482 483 484 485 486		The regio commerci personnel is the resp heliports	The regional Airports Certification Safety Inspectors conduct airport inspections for all commercial service airports. Authorized regional Airports, State, or contractor personnel accomplish inspections on other public use and certain private use airports. It is the responsibility of the local Flight Standards District Office (FSDO) to inspect heliports upon activation only.						
487 488 489 490 491 492 493	3.1.2	How will If possible airport ma chairman generally discuss in telephone	<u>I know when I am about to be inspected?</u> e, before conducting an airport inspection, the airport inspector will contact anagement or a local person(s) closely associated with the airport (i.e., the of the airport board, city official, etc.) to schedule the inspection. Inspectors request someone familiar with the operations of the airport be available to spection findings. This contact can be either in person or by e-mail, letter, or						
494		3.1.2.1	Inspected PERIODICALLY by FAA personnel						
495			• Air carrier airports certificated under part 139						
496 497			• All other commuter-served airports and obligated NPIAS commuter, reliever, and satellite airports						
498			• Non-obligated NPIAS commuter, reliever, and satellite airports						
499 500		3.1.2.2	Inspected ANNUALLY to TRIENNIALLY by FAA, State, or contractor personnel						
501			General aviation obligated airports						
502			General aviation NPIAS airports						
503			• All other general aviation airports						
504 505 506 507			Unique situations may dictate inspection of certain civil private use airports, such as those airports served exclusively by a commuter. The regional Airports Division is responsible for assigning an appropriate inspection priority based on the individual airport's use.						

3.1.3	What will	happen	at my	airpoi	rt ins	pection?	

During the inspection of an airport, inspectors use the latest information in Airports GIS to validate or identify data describing the physical infrastructure and services of the airport requiring a change. If the inspector finds a discrepancy or difference between the published information and their observations, the inspector will discuss the item with the responsible airport official or designated representative. The physical inspection of an airport affords us an opportunity to foster aviation safety and development; thus, the inspector must use a cooperative and thorough approach in the discussion of items with local contacts. Upon completion of the inspection, the inspector will enter inspection findings into the Airport Inspection module of Airports GIS. This module provides the inspector tools to note necessary changes to the airport's data, note the physical inspection of the airport, and note whether the results of the inspection of the airport represents actual conditions at the airport on the date of inspection. Once the inspector identifies the necessary changes, the system will require you to certify the change. If the inspection results require you to update changes in your airports data, you must sign into Airports GIS to make the necessary changes and provide any supporting documentation within 45 days from the date of the inspection. Airports GIS will tie these changes to the inspection module and annotate completion of the necessary changes.

3.1.4 <u>What kind of unsafe conditions will the inspector report?</u>

- Inspectors look for and report all items on the airport with the potential to present a hazard to safe operations. Examples of these conditions include, but are not limited to, the following:
- Unmarked obstructions
- Deteriorating or cracked runways or taxiways
- Stored materials
 - Parked aircraft near runways or taxiways
 - Landfills and unlicensed garbage dumps with the potential to attract wildlife
 - Objects in the safety areas
 - Other potential safety hazards on or near the runway(s)
 - Uneven or soft grounds and areas of ponding or inadequate drainage
- The inspector will identify and discuss these unsafe airport conditions with you before leaving the airport and will advise you these will be listed as unsafe conditions in the Airport/Facility Directory for use by the flying public until rectified. In addition, the inspector must discuss your responsibility in promptly notifying airmen about any condition affecting future aeronautical use of the airport by issuing a Notice to Airmen (NOTAM) through the local Flight Service Station (FSS).
- 545 3.1.5 <u>Besides annual inspections, when else can I be inspected?</u>
- 546Between annual inspections, regional Airports personnel may conduct a special547inspection, such as at the completion of a construction project. The inspector may

548 549 550 551		decide t accomp date of 1 informa	to complete a full inspection for the airport. If a full inspection is not lished and only certain items are validated, the inspector should not change the last inspection. Submit the date of the additional inspection as "additional ition" within the Airports GIS inspection module.
552	3.2	Instru	uctions for location sketch and layout drawing
553 554 555		Using the subject use in v	he drawing tools available within Airports GIS, airport owners and operators to inspection must develop and submit a location sketch and layout drawing for arious ways including on the reverse side of the printed Airport Master Record.
557		drawing	gs at their discretion.
558 559 560		The star location layout d	ndard layout size before reduction is 8.5 by 11 inches. The drawing comprises a sketch, which serves to locate the airport relative to its associated city, and a lrawing portraying the essential features of the airport. In order to assure
561 562		uniform on all sl	a sketches nationally, all of the items in this section must be, if possible, included ketches. Optional items are so indicated. Include additional items you feel
563		appropr	iate, however these should be kept to a minimum to preclude needless detail,
564		clutter,	and not advertise any specific company or service.
565	3.2.1	Mandat	ory items to include on location sketch and layout:
566 567 568		• Run epoo Run	ways, complete with magnetic headings (including the magnetic variation and ch year, if available), and identifiers; runway end coordinates; and elevations. ways under construction will also be shown.
569		• Ope	erational Data Requirements:
570		0	Runway dimensions-length and width, threshold to threshold
571		0	Displaced Threshold(s), including coordinates and elevations when available
572		0	Runway surface composition
573		0	Runway magnetic heading
574		0	Runway identifiers
575		0	Runways under construction
576 577		0	Weight-bearing capacity (landing gear configuration or PCN number when available)
578		0	Runway end elevations
579		0	Land and Hold Short (LAHSO) lines
580		0	Instrument Landing System (ILS) hold lines
581		0	Localizer/Glideslope Critical Areas
582 583		0	Dimensions of turnaround areas adjacent to runway thresholds where operational taxiways do not exist
584		0	Dimensions of overruns and blast pads

6/	1/20)15
0,		

585 586		 Location of Hotspot(s) on movement areas with a description of the potential safety problem(s) that exist
587		• Taxiways, with identifiers
		Taxiways under construction
589		• Parking areas, run-up mats, alert areas, landing pads, ramps and hold pads
590		• Turnarounds
591		• Large tanks
592		Control Towers (including tower height)
593		Airport beacons
594		Helicopter pads/alighting areas
595		Highest obstruction within diagram area
		• Fueling area
597		Terminal/Administration Building and Base Operations
		• Other unique structures or features, clearly labeled
599		• Engineered Materials Arrestor System (EMAS) and dimensions
600	3.2.2	Optional location sketch and layout items include:
601		Radar reflectors
602		• Fire Station
603 604 605 606		• Military/Government hangars (numbered). Identify the branch of service or agency to which it belongs when other than airport operator. Acronyms and/or abbreviations may be used; e.g., ANG (Air National Guard), USCG (United States Coast Guard), FAA, etc.
607		• Parking areas and ramps; e.g., south, ANG, USN, etc.
		Hot cargo ramps
609		• Automated Flight Service Station (AFSS), National Weather Service (NWS)
610		• US Customs
611		• Flight Standards District Office (FSDO)
612		Security Identification Display Area



Figure 3-1 is an example of the Airport Location Sketch and Layout drawing



Page Intentionally Blank

APPENDIX A. DATA ELEMENT REQUIREMENTS

618Use the tables in this appendix to identify the data requirements for different data619elements according to the type of airport (public, private, etc.), specific data element620change, and supporting documentation.

A.1 Public airports with Federal agreements

Table A-1. Public airports with federal agreements: General airport information

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The status of your airport from IFR (Instrument Flight Rules) to VFR (Visual Flight Rules) or VFR to IFR			~		~	
Your Airport Reference Point			~	~		
The status of airport from private use to public use or from public use to private use.			~			~
The Airport Elevation for your airport			~	~		
The Traffic Pattern for your airport			~		~	
The FAA assigned Airport Magnetic Variation for your airport		~			~	
The information regarding the VOR Receiver Checkpoint at your airport		~			~	
The information regarding the Rotating Beacon (geographic coordinates, elevation, schedule, or color) at your airport		~		~		
The Airport Acreage of your airport		~			~	
The information regarding IFR Procedure availability at your airport			~		~	
The information regarding the Lighting system (control or frequency) of your airport			~		~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Communication frequencies in use for your airport			\checkmark		\checkmark	
The Airport Rescue Firefighting (ARFF) Index for your airport		~			~	
If you are requesting to establish your airport as part of the NPIAS program		~			~	
The Non-Commercial Landing Fee for your airport	~				~	
The information regarding Airport of Entry, Landing Rights, or User fee for your airport	~				✓	

Table A-2. Public airports with Federal agreements: Airport administration

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Airport Attendance Schedule for your airport		~			~	
The Contact Information (name, mailing address, phone, e- mail) for the Airport Manager of your airport	~					~
The Contact Information (name, mailing address, phone, e- mail) for the Airport Authority for your airport		~				~
The Physical address for your airport		~			~	
The Airport Ownership (private, public, Air Force, Army, Navy, other) for your airport		~				~
The Airport Licensing of your airport		~			~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The distance and direction to the Center Business District for your airport	~				~	
Non-commercial usage		✓				~

Table A-3. Public airports with Federal agreements: Airport Operations (12 month count of take-off or landing

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The number of Air Carrier operations for your airport	~				\checkmark	
The number of Air Taxi operations for your airport	~				✓	
The number of Commercial operations for your airport	~				~	
The number of local General Aviation operations for your airport	~				~	
The number of itinerant General Aviation operations for your airport	~				√	
The number of Military operation for your airport	~				~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The number of Based Aircraft ³ for your airport	~				~	

Table A-4. Public airports with Federal agreements: Airport services

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Type(s) of Fuel available at your airport	✓				✓	
The type of Airframe Repair service available at your airport	✓				\checkmark	
The type of Power Plant Repair services available at your airport	~				~	
The availability of Bottle Oxygen at your airport	~				~	
The availability of Bulk Oxygen at your airport	✓				~	

³ The airport official should provide any additional supporting documentation they feel is required to support this data element (such as the number of single engines, multi engines, jets, helicopters, gliders, ultra-lights, commuters, air taxis, etc.)

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Aircraft Parking Positions (standpoints) for your airport	~			~		
The information regarding Inertial Navigation System Checkpoints at your airport		~		~		
The information regarding the Weight Bearing Capacity of Aprons and Parking Areas at your airport		~			~	
The Pavement Classification Number (PCN) for Aprons or Parking Areas at your airport		~			~	

Table A-5. Public airports with Federal agreements: Apron/Parking services

628

Table A-6. Public airports with Federal agreements: Heliport/Helipads

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the Final Approach Takeoff Area (FATO) including length, width, type (ingress or egress), bearing, or geometric center coordinates, or elevation for your heliport/helipad			~	~		
The Touchdown Liftoff Area (TLOF) including length, width and geometric center coordinates and elevation information for your heliport/helipad			~	~		
The type of Lighting available at your heliport/helipad		~			✓	
The information regarding the Marking of your heliport/helipad		~			✓	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Electronic Navigational Aids at your airport			~	~		
The information regarding the Visual Navigational Aids (threshold crossing height, glideslope angle, distance from serviced runway end, runway reference point elevation, or identified runway side) for your airport			~	~		

Table A-7. Public airports with Federal agreements: Navigational aids

630

Table A-8. Public airports with Federal agreements: Obstacles

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding an Obstacle on or surrounding your airport			~	\checkmark		
The information regarding the Obstacle Free Zones or Areas associated with your airport		✓		~		

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Runway Identifier(s) (Number) for your airport		~			✓	
The Runway Length of any runway at your airport		~	~	~		
The Runway Width of any runway at your airport		✓	✓	~		
The Declared Distances information for your airport		✓	~		✓	
The type of Runway Surface information for your airport		✓			✓	
The Pavement Classification Number for any runway at your airport		~			~	
The Weight Bearing Capacity information for any runway at your airport		~			~	
The information regarding the Markings (type or condition) at your airport		~			~	
The information about the Lighting (including approach lighting, REILs, edge lights) at your airport			~		~	

Table A-9. Public airports with Federal agreements: Runway

632

Table A-10. Public airports with Federal agreements: Runway (continued)

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the availability of Centerline lighting at your airport		~		~		
The availability of Touchdown Zone lighting at your airport		~		✓		
The information regarding the Approach light plane at your airport		~			~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
Engineered Arresting Material System (length, width, geographic position, elevation, or material)		~		~		
Runway threshold (geographic position or elevation)			✓	~		
The information regarding any Displaced threshold(s) (geographic position, elevation or distance to runway end) at your airport			~	~		
The information regarding Land and Hold Short Operations (LASHO) including distance to runway end at your airport		~		~		
Runway Design Code (RDC)		~				
Runway Reference Code (RRC)		~				
The information regarding Runway Visual Range (RVR) ⁴ at your airport		~			~	
The information regarding the Runway Visual Value (RVV) ⁵ at your airport		~			~	

⁴ Runway Visual Range (RVR) - An instrumentally derived value, based on standard calibrations, that represents the horizontal distance a pilot will see down the runway from the approach end. This value is based on the sighting of either high intensity runway lights or on the visual contrast of other targets, whichever yields the greater visual range. RVR, in contrast to prevailing or runway visibility, is based on what a pilot in a moving aircraft should see looking down the runway. RVR is horizontal visual range, not slant visual range. It is based on the measurement of a transmissometer made near the touchdown point of the instrument runway and is reported in hundreds of feet. RVR is used in lieu of RVV and/or prevailing visibility in determining minimums for a particular runway.

^{1. &}lt;u>Touchdown RVR</u>- The RVR visibility readout values obtained from RVR equipment serving the runway touchdown zone.

^{2. &}lt;u>Mid-RVR</u>- The RVR readout values obtained from RVR equipment located midfield of the runway.

^{3.} <u>Rollout RVR</u>- The RVR readout values obtained from RVR equipment located nearest the rollout end of the runway.

⁵ Runway Visibility Value (RVV) - The visibility determined for a particular runway by a transmissometer. A meter provides a continuous indication of the visibility (reported in miles or fractions of miles) for the runway. RVV is used in lieu of prevailing visibility in determining minimums for a particular runway.

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the availability of a Stopway or its dimensions at your airport		~		~		
The information regarding Clearway (length or width) at your airport		~		~		
The information regarding arresting systems available at your airport			~	~		
The Pavement Classification Number for any runway at your airport		~			~	

Table A-11. Public airports with Federal agreements: Runway (continued)

Table A-12. Public airports with Federal agreements: Taxiways

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding taxiway identifiers at your airport		\checkmark			\checkmark	
The width of any taxiway at your airport		✓		✓		
The information regarding the Centerline Points (including geographic coordinates) for taxiways at your airport		~		~		
The Pavement Classification Number for any taxiway at your airport		~			~	

635

A.2 Public airports without federal agreements

	. /

Table A-13. Public airports without Federal agreements: General airport information

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web-based certification	Submit board or airport authority certified letter
The status of your airport from IFR (Instrument Flight Rules) to VFR (Visual Flight Rules) or VFR to IFR			~		~	
Your Airport Reference Point			~	~		
The status of airport from private use to public use or from public use to private use.			~			~
The Airport Elevation for your airport			~		~	
The Traffic Pattern for your airport			~		~	
The FAA assigned Airport Magnetic Variation for your airport		~			✓	
The information regarding the VOR Receiver Checkpoint at your airport		~			~	
The information regarding the Rotating Beacon (geographic coordinates, elevation, schedule, or color) at your airport		\checkmark		\checkmark		
The Airport Acreage of your airport		~			✓	
The information regarding IFR Procedure availability at your airport			~		~	
The information regarding the Lighting system (control or frequency) of your airport			~		~	
The Communication frequencies in use for your airport			~		~	
The Airport Rescue Firefighting (ARFF) Index for your airport		~			✓	
If you are requesting to establish your airport as part of the NPIAS program		~			~	
The Non-Commercial Landing Fee for your airport	\checkmark				\checkmark	
The information regarding Airport of Entry, Landing Rights, or User fee for your airport	~				✓	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Airport Attendance Schedule for your airport	✓				✓	
The Contact Information (name, mailing address, phone, e- mail) for the Airport Manager of your airport	~				~	
The Contact Information (name, mailing address, phone, e- mail) for the Airport Authority for your airport	~				~	
The Physical address for your airport	✓				✓	
The Airport Ownership (private, public, Air Force, Army, Navy, other) for your airport	~				~	
The Airport Licensing of your airport		~			✓	
The distance and direction to the Center Business District for your airport	~				~	
Non-Commercial usage		~			~	

Table A-14. Public airports without Federal agreements: Airport administration

		9	
	Л	\cap	

Table A-15. Public airports without Federal agreements: Airport Operations(12 month count of take-off or landing

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The number of Air Carrier operations for your airport	✓				✓	
The number of Air Taxi operations for your airport	✓				~	
The number of Commercial operations for your airport	✓				~	
The number of local General Aviation operations for your airport	~				~	
The number of itinerant General Aviation operations for your airport	~				~	
The number of Military operation for your airport	✓				✓	
The number of Based Aircraft ⁶ for your airport	✓				✓	

⁶ The airport official should provide any additional supporting documentation they feel is required to support this data element (such as the number of single engines, multi engines, jets, helicopters, gliders, ultra-lights, commuters, air taxis, etc.).

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Type(s) of Fuel available at your airport	✓				\checkmark	
The type of Airframe Repair service available at your airport	✓				\checkmark	
The type of Power Plant Repair services available at your airport	~				~	
The availability of Bottle Oxygen at your airport	~				~	
The availability of Bulk Oxygen at your airport	~				~	

Table A-16. Public airports without Federal agreements: Airport services

642

Table A-17. Public airports without Federal agreements: Apron/Parking services

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Aircraft Parking Positions (standpoints) for your airport	~			~		
The information regarding Inertial Navigation System Checkpoints at your airport		~		~		
The information regarding the Weight Bearing Capacity of Aprons or Parking areas of your airport		~			~	
The Pavement Classification Number (PCN) for Aprons or Parking areas at your airport		~			~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the Final Approach Takeoff Area (FATO) including length, width, type (ingress or egress), bearing, or geometric center coordinates, or elevation for your heliport/helipad			~		~	
The Touchdown Liftoff Area (TLOF) including length, width and geometric center coordinates and elevation information for your heliport/helipad			~		~	
The type of Lighting available at your heliport/helipad		~			~	
The information regarding the Marking of your heliport/helipad		~			✓	

Table A-18. Public airports without Federal agreements: Heliport/Helipads

644

Table A-19. Public airports without Federal agreements: Navigational aids

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Electronic Navigational Aids at your airport			~	~		
The information regarding the Visual Navigational Aids (threshold crossing height, glideslope angle, distance from serviced runway end, runway reference point elevation, or identified runway side) for your airport			~	✓		

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding an Obstacle on or surrounding your airport			~	~		
The information regarding the Obstacle Free Zones or Areas associated with your airport		~		~		
Runway Design Code (RDC)		✓				
Runway Reference Code (RRC)		✓				

646

Table A-21. Public airports without Federal agreements: Runway

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Runway Identifier(s) (Number) for your airport		\checkmark			✓	
The Runway Length of any runway at your airport			~	✓		
The Runway Width of any runway at your airport			✓	✓		
The Declared Distances information for your airport			~		~	
The type of Runway Surface information for your airport		~	~		~	
The Pavement Classification Number for any runway at your airport		~			~	
The Weight Bearing Capacity information for any runway at your airport		~			~	
The information regarding the Markings (type or condition) at your airport		~			~	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information about the Lighting (including approach lighting, REILs, edge lights) at your airport			~		~	
The information regarding the availability of Centerline lighting at your airport		\checkmark		~		

Table A-22. Public airports without Federal agreements: Runway (continued)

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The availability of Touchdown zone lighting at your airport		~		✓		
The information regarding the Approach light plane at your airport		~			~	
Engineered Arresting Material System (length, width, geographic position, elevation, or material)		~		~		
Runway threshold (geographic position or elevation)			~	~		
The information regarding any Displaced threshold(s) (geographic position, elevation or distance to runway end) at your airport			~	~		
The information regarding Land and Hold Short Operations (LASHO) including distance to runway end at your airport		~		~		

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Runway Visual Range (RVR) ⁷ at your airport		\checkmark			~	
The information regarding the Runway Visual Value (RVV) ⁸ at your airport		\checkmark			~	

Table A-23. Public air	ports without Federal	agreements: Runy	way (continued)
	porto without reactar	agreements. Run	ay (commucu)

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
-------------------------------------	---	--------------------------	------------------------	------------------------------	---	---

2. <u>Mid-RVR</u>- The RVR readout values obtained from RVR equipment located midfield of the runway.

⁷ Runway Visual Range (RVR) - An instrumentally derived value, based on standard calibrations, that represents the horizontal distance a pilot will see down the runway from the approach end. This value is based on the sighting of either high intensity runway lights or on the visual contrast of other targets, whichever yields the greater visual range. RVR, in contrast to prevailing or runway visibility, is based on what a pilot in a moving aircraft should see looking down the runway. RVR is horizontal visual range, not slant visual range. It is based on the measurement of a transmissometer made near the touchdown point of the instrument runway and is reported in hundreds of feet. RVR is used in lieu of RVV and/or prevailing visibility in determining minimums for a particular runway.

^{1. &}lt;u>Touchdown RVR</u>- The RVR visibility readout values obtained from RVR equipment serving the runway touchdown zone.

^{3.} <u>Rollout RVR</u>- The RVR readout values obtained from RVR equipment located nearest the rollout end of the runway.

⁸ Runway Visibility Value (RVV) - The visibility determined for a particular runway by a transmissometer. A meter provides a continuous indication of the visibility (reported in miles or fractions of miles) for the runway. RVV is used in lieu of prevailing visibility in determining minimums for a particular runway.

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the availability of a Stopway or its dimensions at your airport		~		~		
The information regarding Clearway (length or width) at your airport		~		~		
The information regarding arresting systems available at your airport			~	~		
The Pavement Classification Number for any runway at your airport		~			~	

Table A-24. Public airports without Federal agreements: Taxiways

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding taxiway identifiers at your airport		\checkmark			✓	
The width of any taxiway at your airport		✓		✓		
The information regarding the Centerline Points (including geographic coordinates) for taxiways at your airport		~		~		
The Pavement Classification Number for any taxiway at your airport		~			~	

650

A.3 Private-use airports

652

Table A-25. Private-use airports: General airport information

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web-based certification	Submit board or airport authority certified letter
The status of your airport from IFR (Instrument Flight Rules) to VFR (Visual Flight Rules) or VFR to IFR			~		~	
Your Airport Reference Point			✓		✓	
The status of airport from private use to public use or from public use to private use.			~			~
The Airport Elevation for your airport			~		~	
The Traffic Pattern for your airport			~		~	
The FAA assigned Airport Magnetic Variation for your airport	✓				✓	
The information regarding the VOR Receiver Checkpoint at your airport	~				~	
The information regarding the Rotating Beacon (geographic coordinates, elevation, schedule, or color) at your airport	~				~	
The Airport Acreage of your airport	~				~	
The information regarding IFR Procedure availability at your airport			~		~	
The information regarding the Lighting system (control or frequency) of your airport	~				~	
The Communication frequencies in use for your airport			~		✓	
The Airport Rescue Firefighting (ARFF) Index for your airport	\checkmark				~	
The Non-Commercial Landing Fee for your airport	~				~	
The information regarding Airport of Entry, Landing Rights, or User fee for your airport	✓				✓	

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Airport Attendance Schedule for your airport	~				~	
The Contact Information (name, mailing address, phone, e- mail) for the Airport Manager of your airport	~				~	
The Contact Information (name, mailing address, phone, e- mail) for the Airport Authority for your airport	~				~	
The Physical address for your airport	~				✓	
The Airport Ownership (private, public, Air Force, Army, Navy, other) for your airport	~				~	
The Airport Licensing of your airport	~				~	
The distance and direction to the Center Business District for your airport	~				~	
Non-Commercial usage	✓				~	

Table A-26. Private-use airports: Airport administration

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding the Final Approach Takeoff Area (FATO) including length, width, type (ingress or egress), bearing, or geometric center coordinates, or elevation for your heliport/helipad			~		~	
The Touchdown Liftoff Area (TLOF) including length, width and geometric center coordinates and elevation information for your heliport/helipad			~		~	
The type of Lighting available at your heliport/helipad	✓				✓	
The information regarding the Marking of your heliport/helipad	✓				✓	

Table A-27. Private-use airports: Heliport/Helipads

Table A-28. Private-use airports: Navigational aids

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding Electronic Navigational Aids at your airport	~				~	
The information regarding the Visual Navigational Aids (threshold crossing height, glideslope angle, distance from serviced runway end, runway reference point elevation, or identified runway side) for your airport	~				~	

Table A-29. Private-use airports: Obstacles

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The information regarding an Obstacle on or surrounding your airport	✓				~	

657

Table A-30. Private-use airports: Runway

Data Element to change or establish	Airport Administrative and logistical data	RO or local ADO approval	FAA aeronautical study	Collect data to AC standards	Complete and sign web- based certification	Submit board or airport authority certified letter
The Runway Identifier(s) (Number) for your airport	✓				✓	
The Runway Length of any runway at your airport			\checkmark		\checkmark	
The Runway Width of any runway at your airport			~		~	
The type of Runway Surface information for your airport	✓		✓		✓	
The information regarding the Markings (type or condition) at your airport	~				~	
Runway threshold (geographic position or elevation)			~	~		
The information regarding any Displaced threshold(s) (geographic position, elevation or distance to runway end) at your airport			~	~		
The information regarding arresting systems available at your airport			~	~		
The Pavement Classification Number for any runway at your airport		~			~	

APPENDIX B. GLOSSARY OF TERMS

659	Abandoned airport is an airport that is permanently closed.
660	Accuracy is the degree of conformity with a standard, or a value accepted as correct.
661	Precision is the degree of uniformity of repeated measurements or events. For example,
662	repeat measurements of the distance between two points may exhibit a high degree of
663	precision by virtue of the relative uniformity of the measurements. However, if a
664	"short" tape were used in the measurements, accuracy would be poor in that the
665	measured distance would not conform to the true distance between the points.
666	Surveying and mapping accuracy standards should include three elements: (1) a stated
667	variation from a true value or a value accepted as correct, (2) the point to which the new
668	value is relative, and (3) the probability that the new value will be within the stated
670	Continuously Operating Reference Station (CORS) at the 95 percent confidence level."
671 672	Aeronautical Information Regulation and Control (AIRAC) is a series of common dates for the publication of airport and aeronautical data
012	
673	Aeronautical Information Services (AJV-5) is an office within the FAA Headquarters
674	Air Traffic Organization (ATO). They are the FAA's official stewards for aeronautical
675	information.
676 677	Airport is an area of land or water that is used or intended to be used for the landing and takeoff of aircraft and includes its buildings and facilities, if any.
678 679	Airport closed indefinitely is an airport where all flying activities have ceased indefinitely; however, the intent remains to reopen the airport at an unspecified time.
680 681	Airport closed temporarily is an airport closed to aircraft operations for a short duration due to maintenance, construction, weather, or some other purpose while the
682	operator is still in business.
683	Airport Data Information Program Administrator is the office in the FAA with
684	primary responsibility for collecting, administrating, and disseminating non-safety of
685	flight critical data for the Airport Safety Data Program via an electronic medium
686	acceptable to the FAA.
687	Airport Authority is the person or organization responsible for the operation of the
688	airport. The airport authority could be a private or government organization. The term
689	Airport Sponsor relates only to NPIAS airports and includes certain statutory and legal
690	requirements.
691	Airport Elevation is the highest point of an airport's usable runways measured in feet
692	from mean sea level (technically, from the vertical datum).
693	Airport Engineering Division (AAS-100) is a headquarters division within the Office
694	of Airport Safety and Standards.
695	Airport Lighting. Various lighting aids that may be installed on an airport. Types of
696	airport lighting include:

Airport Rotating Beacon (APBN) is a visual navigational aid operated at many airports. At civil airports, alternating white and green flashes indicate the location of the airport. At military airports, the beacons flash alternately white and green, but are differentiated from civil beacons by dual-peaked (two quick) white flashes between the green flashes. Approach Light System (ALS) is an airport lighting facility which provides visual guidance to landing aircraft by radiating light beams in a directional pattern by which the pilot aligns the aircraft with the extended centerline of the runway on his final approach for landing. Condenser-Discharge Sequential Flashing Lights/Sequenced Flashing Lights may be installed in conjunction with the ALS at some airports. **Omnidirectional Approach Light System** (ODALS) are seven omnidirectional flashing lights located in the approach area of a nonprecision approach. Five lights are located on the runway centerline extended with the first light located 300 feet from the threshold and extending at equal intervals up to 1,500 feet from the threshold. The other two lights are located, one on each side of the runway threshold, at a lateral distance of 40 feet from the runway edge or 75 feet from the runway edge when installed on a runway equipped with a VASI. **Precision Approach Path Indicator** (PAPI) is a visual approach slope indicator normally consisting of light units similar to the VASI but in a single row of either two or four light units set perpendicular to the runway centerline. The row of light units is normally installed on the left side of the runway. Indications are as follows: Below glide path – all lights red; Slightly below glide path – three lights closest to runway red, other light white; On glide path – two lights closest to runway red, other two lights white; Slightly above glide path – light closest to runway red, other three lights white: Above glide path – all lights white. Pulsating Visual Approach Slope Indicator (PVASI) is a pulsating visual approach slope indicator normally consists of a single light unit projecting a twocolor visual approach path into the final approach area of the runway upon which the indicator is installed. The on glide path indication is a steady white light. The slightly below glide path indication is a steady red light. If the aircraft descends further below the glide path, the red light starts to pulsate. The above glide path indication is a pulsating white light. The pulsating rate increases as the aircraft gets further above or below the desired glide slope. Runway Alignment Indicator Lights (RAIL) are sequenced Flashing Lights (SFLs) which are installed only in combination with other light systems. Runway End Identifier Lights (REIL) are two synchronized flashing lights, one on each side of the runway threshold, which provide rapid and positive identification of the approach end of a particular runway. **Threshold Lights** are fixed green lights arranged symmetrically left and right of the runway centerline identifying the runway end. When all light units are located outside the runway edge or runway edge extended, the runway end lights are

considered to be "outboard." If any light unit is located inside the runway edge or runway edge extended, the lights are considered to be "inboard." Tri-Color Visual Approach Slope Indicator (TRVC) is a visual approach slope indicator normally consisting of a single light unit projecting a three-color visual approach path into the final approach area of the runway upon which the indicator is installed. The below glide path indication is red; the above glide path indication is amber; and the on glide path indication is green. Visual Approach Slope Indicator (VASI) is an airport lighting facility providing vertical visual approach slope guidance to aircraft during approach to landing by radiating a directional pattern of high intensity red and white focused light beams which indicate to the pilot is "on path" if he sees red/white, "above path" if white/white, and "below path" if red/red. Some airports serving large aircraft have three-bar VASIs which provide two visual glide paths to the same runway. Airport Management includes the airport owner, operator, manager, or sponsor (for NPIAS airports) unless a distinction is made in the text. Airport Master Record (FAA Form 5010) describes the basic operational and services data of the airport. Airport Reference Point (ARP) is the approximate geometric center of all usable runways. ARP is not monumented, therefore not recoverable on the ground. Airport Safety and Operations Division (AAS-300) is a headquarters division within the Office of Airport Safety and Standards. **Airport Sketch** is a sketch of the movement areas, facilities, and equipment on the airport and contains a small location diagram showing the airport in relation to its associated city. Airports District Office (ADO) is a subdivision of a regional Airports Division's geographic boundaries. Apron is a defined area on an airport or heliport intended to accommodate aircraft for purposes of loading or unloading passengers or cargo, refueling, parking, or maintenance. With regard to seaplanes, a ramp is used for access to the apron from the water. Attributes or Attribute Data is alphabetical and/or numeric information that describes particular characteristics of a geospatial feature, such as type, dimensions, usage, occupancy, etc. Authoritative Source is the designated repository for authoritative data or information provided by the steward. The application used to populate the authoritative source for airport data describing • the physical infrastructure, characteristics, services, and operational environment of the nation's airports is the Airports Geographic Information System (Airports GIS).

• The application used to populate the authoritative source for planning data and information, including financial information relating to grants or the Passenger Facility Charge (PFC) program is the System of Airports Reporting II (SOAR II).

Azimuth

- Astronomic Azimuth At the point of observation, the angle measured from the vertical plane through the celestial pole and the vertical plane through the observed object. The astronomic azimuth is established directly from observations on a celestial body and is measured in the plane of the horizon. Astronomic azimuths differ from geodetic azimuths because of the deflection of the vertical which can be greater than one minute of arc in extreme cases. Astronomic azimuths may be reckoned clockwise or counter-clockwise, from either north or south, as established by convention.
- **Geodetic** The angle at point A between the tangent to the meridian at A and the tangent to the geodesic from A to B whose geodetic azimuth is wanted. It may be reckoned clockwise from either geodetic north or south as established by convention. Because of earth curvature, the geodetic azimuth from A to B (forward azimuth) differs from the geodetic azimuth from B to A (back azimuth) by other than 180 degrees, except where A and B have the same geodetic longitude or where the geodetic latitude of both points is zero. The "geodesic line "is the shortest surface distance between two points on the reference ellipsoid. A "geodetic meridian" is a line on the reference ellipsoid defined by the intersection of the reference ellipsoid and a plane containing the minor axis of that ellipsoid.
- **Grid** The angle in the plane of projection between a straight line and the central meridian of a plane-rectangular coordinate system. Grid azimuths may be reckoned clockwise from either geodetic north or south as established by convention.
- Magnetic At the point of observation, the angle between the vertical plane through the observed object and the vertical plane in which a freely suspended symmetrically magnetized needle, influenced by no transient artificial magnetic disturbance, will come to rest. Magnetic azimuths are reckoned clockwise from magnetic north.
- **Blast Pad** is a specially prepared surface placed adjacent to the ends of runways to eliminate the erosive effect of the high wind forces produced by airplanes at the beginning of their takeoff rolls.
- Clearway is an area beyond the takeoff runway under the control of airport authorities within which terrain or fixed obstacles may not extend above specified limits. These areas may be required for certain turbine-powered operations and the size and upward slope of the clearway will differ depending on when the aircraft was certificated.
- **Collection** is any combination of data submitted by a provider at a given time.
- **Data integrity** is the degree of assurance that aeronautical data and its value has not been lost nor altered since the data's origination or authorized amendment.
- **Data quality** is the degree or level of confidence that the data provided meets the requirements of the data user in terms of accuracy, resolution, and integrity.

Datum is, in general, a point, line, surface, or set of values used as a reference. A "geodetic datum" is a set of constants specifying the coordinate system and reference used for geodetic control (refer to Control Station), i.e. for calculating coordinates of points on the earth. At least eight constants are needed to form a complete datum: three to specify the location of the origin of the coordinate system; three to specify the orientation of the coordinate system; and two to specify the dimensions of the reference ellipsoid. Any point has a unique X, Y, Z datum coordinate which can be transformed into latitude, longitude, and ellipsoid height (height relative to the ellipsoid). A "horizontal control datum" is a geodetic datum specified by two coordinates (latitude and longitude) on the ellipsoid surface, to which horizontal control points are referenced. A "vertical datum" is a theoretical equipotential surface with an assigned value of zero to which elevations are referenced. (Refer to GEOID.) Displaced Threshold (DTHLD) is a threshold that is located at a point on the runway other than the designated runway end. The displaced area is available for takeoff or rollout of aircraft, but not for landing. A displaced threshold does not mark the end of a runway. Distance Measuring Equipment (DME) is equipment (airborne and ground) used to measure the slant range distance of an aircraft from the DME navigational aid in nautical miles. DME is usually frequency paired with other navigational aids such as a VOR or localizer. Feature is a manmade or natural object that appears in the real world such as a building, runway, navigational aid or river. **Feature Type** is a collection of all features of a given type such as all runways or all buildings. Feature Types are analogous to layers in many GIS applications and are also referred to as Entity Types and Feature Classes in other standards. **Flight Path** is a line, course, or track along which an aircraft is flying or intended to be flown. Flight Service Station (FSS) is an Air Traffic field facility. Geospatial Data, Geospatially-Referenced Data or Geospatial Vector Data is data that identifies the geographic location (2D or 3D coordinates) and characteristics (feature attributes) of natural or constructed features and boundaries on the earth. This information may be derived from remote sensing and surveying technologies. The features are represented by a point, line, or polygon. The position of a point feature is described by a single coordinate pair (or triplet for three dimensional data). The spatial extent of a line feature is described by a string of coordinates of points lying along the line, while the extent of a polygon feature is described by treating its boundary as a line feature. Vector data may be stored in a sequential, a chain node, or a topological data structure. Global Positioning System (GPS) is space-based radio-positioning, navigation, and time-transfer system. The system provides highly accurate position and velocity information and precise time on a continuous global basis, to an unlimited number of properly equipped users.

Heliport is the area of land, water or a structure used or intended to be used for the
 landing and takeoff of helicopters or other rotary wing type aircraft capable of vertical
 takeoff and landing profiles.

Instrument Flight Rules (IFR) is a set of rules governing the conduct of flight under instrument meteorological conditions.

Instrument Landing System (ILS) is a precision instrument approach system which normally consists of the following electronic components and visual aids: Localizer, Middle Marker, Glide Slope, Approach Lighting, and Outer Marker.

- Landing Area is any locality used or intended to be used for the landing and takeoff of aircraft. The locality may be on land, water, or structure including airports/heliports, and intermediate landing fields whether or not facilities are provided for shelter, servicing, or for receiving or discharging passengers or cargo.
- **Localizer** (LOC) is the component of an ILS which provides course guidance to the runway.
- Minimums are weather condition requirements established for a particular operation or type of operation; e.g., IFR takeoff or landing, alternate airport for IFR flight plans, VFR flight etc.
- Movement Area are the runways, taxiways, and other areas of an airport/heliport which are utilized for taxiing/hover taxiing, air taxiing, takeoff, and landing of aircraft, exclusive of loading ramps and parking areas. At those airports/heliports with a tower, specific approval for entry onto the movement area must be obtained from ATC.
- National Airspace System (NAS) is the common network of U.S. airspace air
 navigation facilities, equipment and services, airports or landing areas; aeronautical
 charts, information and services; rules, regulations, and procedures, technical
 information, and manpower and material. Included are system components shared
 jointly with the military.
- 887 **National Airspace System Resources (NASR) Database** contains the official FAA 888 record of aeronautical information for each of the Nation's public use airports.
- National Flight Data Digest (NFDD) is a daily (except weekends and Federal
 holidays) publication of flight information related to aeronautical charts, aeronautical
 publications, Notices to Airmen, or other media serving the purpose of providing
 operational flight data essential to safe and efficient aircraft operations.
- National Plan of Integrated Airport System (NPIAS) identifies nearly 3,400 existing
 and proposed airports that are significant to national air transportation and thus eligible
 to receive Federal grants under the <u>Airport Improvement Program (AIP)</u>. It also
 includes estimates of the amount of AIP money needed to fund infrastructure
 development projects that will bring these airports up to current design standards and
 add capacity to congested airports.
- Navigational Aid (NAVAID) is any visual or electronic device airborne or on the
 surface which provides point-to-point guidance information or position data to aircraft
 in flight. (Refer to Air Navigation Facility).

Nondirectional Beacon (NDB) is an L/MF or UHF radio beacon transmitting nondirectional signals whereby the pilot of an aircraft equipped with direction finding equipment can determine his bearing to or from the radio beacon and "home" or track to or from the station. When the NDB is installed in conjunction with an Instrument Landing System marker, it is normally called a Compass Locator. **Non-Safety of Flight Critical Data** is routine data (integrity level 1×10^{-3}), where there is a very low probability that when using corrupted routine data the continued safe flight and landing of an aircraft would be severely at risk with the potential for catastrophe. Notice to Airmen (NOTAM) is a notice containing information (not known sufficiently in advance to publicize by other means) concerning the establishment, condition, or change in any component (facility, service, or procedure of, or hazard in the National Airspace System) the timely knowledge of which is essential to personnel concerned with flight operations. Obstacle is any object that has a vertical element to it and may or may not penetrate an obstruction identification surface. **Obstruction** is any object that penetrates an obstruction identification surface. **Obstruction Identification Surface** (OIS) is any imaginary surface authorized by the FAA to identify obstructions. Any object that penetrates an OIS is an obstruction, by definition. **Specified OIS** – Any OIS other than a supplemental OIS. Supplemental OIS – An OIS designated by appropriate FAA authorities as a supplemental OIS. A supplemental OIS, when implemented, will normally lie below a specified OIS and is intended to provide additional obstruction information. An object that penetrates a supplemental OIS only is a supplemental obstruction. **Office of Airport Safety and Standards** (AAS) is a headquarters office that reports to the Associate Administrator for Airports. **Overrun Area** is that area, in military aviation exclusively, beyond the end of the designated runway with a stabilized surface of the same width as the runway and centered on the extended runway centerline. This is not included in the runway length and is considered unusable. **Positional Accuracy** is the difference between a geospatial feature's displayed position and its actual position. Absolute positional accuracy is the difference between a geospatial feature's displayed position and its actual position on the face of the earth. Relative positional accuracy is the difference between a geospatial feature's displayed position and that of other geospatial features in the same data set. **Precision** is the smallest separation that can be represented by the method employed to make the positional statement which is the number of units or digits to which a measured or calculated value is expressed and used. Private Use: Available for use by the owner only or by the owner and other persons authorized by the owner.

- Private Use of Public Lands: The landing and takeoff area of the proposed airport is
 publicly owned and the proponent is a non-government entity, regardless of whether
 that landing and takeoff area is on land or on water and whether the controlling entity be
 local, State, or Federal Government.
- **Public Use:** Available for use by the general public without a requirement for prior approval of the owner or operator.
- **Regional Airports personnel** are personnel of a regional Airports Division and may include personnel located in an Airport District Office and Airport Field Office.
- **Resolution** is the smallest spacing between two display elements expressed as dots per inch, pixels per line, or lines per millimeter.
- **Runway** is a defined rectangular area prepared for the landing and takeoff run of aircraft along its length in a land airport. Being exactly rectangular, it excludes narrow, rounded, deteriorated, and irregular ends that are not as wide as the general or overall width of the runway. The runway width is the physical width that extends over the entire length of the rectangle. The runway length does not include blast pad, clearway, or stopway surfaces. Displaced thresholds are included in the physical length. Runways are normally numbered in relation to their magnetic direction rounded off to the nearest 10 degrees: e.g., Runway 10, Runway 25.
- **Runway Centerline** is a line connecting the two opposite runway end points. The line may be physically marked on the surface of the runway.
- **Runway Design Code** consist of aircraft approach category (AAC), aircraft design group (ADG) and approach visibility minimum for a runway.
- **Runway End Point** is the point at the runway end halfway between the edges of the runway.
- **Runway Length** is the straight line distance between runway end points. This line does
 not account for surface undulations between points. Official runway lengths are
 normally computed from runway end coordinates and elevations.
- **Runway Reference Code** consists of aircraft approach category (AAC), aircraft design group (ADG) for runway, the taxiway design group (TOG) for the associated taxiways, if present and approach visibility minimum for a runway.
- Runway Safety Area is a defined surface surrounding the runway prepared or suitable
 for reducing the risk of damage to airplanes in the event of an undershoot, overshoot, or
 excursion from the runway. In addition, it provides greater accessibility for firefighting
 and rescue equipment during such an incident.
- **Safety of Flight Critical Data** has an integrity level of 1×10^{-8} where there is a high probability that when using corrupted critical data, the continued safe flight and landing of an aircraft would be severely at risk with the potential for catastrophe; or essential data, (integrity level 1×10^{-5}): there is a low probability when using corrupted essential data that the continued safe flight and landing of an aircraft would be severely at risk with the potential for catastrophe.

Satellite airport is any other airport within the Class C or D airspace area. Simplified Directional Facility (SDF) is a navigational aid used for nonprecision instrument approaches. The final approach course is similar to that of an ILS localizer except that the SDF course may be offset from the runway, generally not more than 3 degrees, and the course may be wider than the localizer, resulting in a lower degree of accuracy. **Spatial Data** is data that depicts a real world feature such as a road, building or runway on a map. The most basic types of spatial data are points, lines and polygons but spatial data can also include orthophotos and other more complex forms of locational information. Steward is the designated organization that originates and is accountable for quality and timeliness of data and information. AAS-1 is the steward for airport data describing the physical infrastructure, • characteristics, services, and operational environment of the nation's airports. Because the true steward of an airport's data is external to the FAA, AAS-1 assumes the role of steward of this data for the FAA. APP-1 is the steward for the management of an airport's planning, environmental and financial data with respect to the Airport Improvement Program (AIP) or PFC program. **Stopway** is an area beyond the takeoff runway which is able to support the airplane during an aborted takeoff without causing structural damage to the airplane. It is centered upon the extended centerline of the runway, not narrower than the runway, and designated by the airport authorities for use in decelerating the airplane during an aborted takeoff. **Tactical Air Navigation** (TACAN) is an ultra-high frequency electronic rho-theta air navigational aid which provides suitably equipped aircraft a continuous indication of bearing and distance to the TACAN station. **Taxiway** is a defined path established for the taxiing of aircraft from one part of an airport to another. **Threshold** (**THLD**) is the beginning of that portion of the runway available for landing. A displaced threshold (**DTHLD**) is a threshold that is located at a point on the runway other than the designated beginning of the runway. **Traffic pattern** is the traffic flow that is prescribed for aircraft landing at, taxiing on, or taking off from an airport. The components of a typical traffic pattern are upwind leg, crosswind leg, downwind leg, base leg, and final approach. Very High Frequency Omnidirectional Range Station (VOR) is a ground-based electronic navigation aid transmitting very high frequency navigation signals, 360 degrees in azimuth, referenced from magnetic north. Very High Frequency Omnidirectional Range/Tactical Air Navigation (VORTAC) - A navigation aid providing VOR azimuth, TACAN azimuth, and TACAN distance measuring equipment (DME) at one site.

1025Visual Approach is an approach conducted on an instrument flight rules (IFR) flight1026plan which authorizes the pilot to proceed visually to the airport. The pilot must have1027either the airport or preceding aircraft in sight at all times.

Note: Advisory Circular Feedback

If you find an error in this AC, have recommendations for improving it, or have suggestions for new items/subjects to be added, you may let us know by (1) emailing this form to [insert email address] or (2) faxing it to the attention of the [insert office] at (XXX) XXX-XXXX.

Note: Subject: [AC 150/5300-19, Airport Data and Information Program] Date: Draft

Please check all appropriate line items:

- An error (procedural or typographical) has been noted in paragraph Click here to enter text. on page Click here to enter text.
- □ Recommend paragraph Click here to enter text. on page Click here to enter text. be changed as follows:

Click here to enter text.

□ In a future change to this AC, please cover the following subject: (*Briefly describe what you want added.*)

Click here to enter text.

 \Box Other comments:

Click here to enter text.

 \Box I would like to discuss the above. Please contact me.

Submitted by: _____

Date: _____