
Table of Contents

	Page
1.0 Introduction	1-1
1.1 Plan Overview	1-1
1.1.1 Plan Purpose and Objectives	1-1
1.1.2 Plan Value	1-2
1.2 Plan Method and Process	1-2
1.2.2 Public Participation.....	1-3
1.3 Wisconsin Airport System Vision	1-3
1.4 System Goals	1-4
2.0 Classification Review and Update.....	2-1
2.1 Purpose of the Classification Review and Update 2011.....	2-1
2.2 Tasks Involved in the Review and Update	2-2
2.3 Background	2-2
2.3.1 Wisconsin SASP Classification Review and Update 2010.....	2-2
2.3.2 Analysis of Demographic Trends.....	2-3
2.3.2.1 Population.....	2-3
2.3.2.2 Employment.....	2-4
2.3.2.3 Per Capita Income	2-5
2.3.3 Evaluation of Existing System	2-5
2.3.3.1 Adjustments to the Classification Process.....	2-6
2.3.3.2 Updated Role Classification Process	2-7
2.3.3.2.1 Activity	2-7
2.3.3.2.2 Economics	2-8
2.3.3.2.3 Facilities.....	2-8
2.3.3.2.4 Accessibility	2-8
2.4 Classification of the Wisconsin System of Airports	2-9
2.4.1 Data Anomalies.....	2-9
2.4.2 Existing Classification Results.....	2-9
2.5 Future Role Evaluation	2-13
2.5.1 Current Coverage	2-14
2.5.2 Projected State Population Growth	2-21
2.5.3 Future System Role Recommendations	2-24
2.6 Conclusion	2-30
3.0 Airport Inventory.....	3-1
3.1 Wisconsin Airport Locations, Ownership and Classifications	3-1
3.1.1 Location and Ownership	3-1
3.1.2 SASP Airport Classification	3-1
3.1.3 2011-2015 NPIAS Airport Service Levels.....	3-2
3.1.4 Part 139 Certification/Airport Operating Certificates	3-4
3.2 Airside	3-4



Table of Contents (Continued)

3.2.1	Airport Reference Code	3-4
3.2.2	Pavement Condition Index	3-6
3.2.3	Runway Safety Areas.....	3-6
3.2.4	Runway Protection Zone	3-6
3.2.5	Approach Surface	3-6
3.2.6	Runway Facilities	3-6
3.2.6.1	Length and Width.....	3-6
3.2.6.2	Surface Type	3-7
3.2.6.3	Lighting.....	3-7
3.2.6.4	Runway Visual Aids	3-7
3.2.7	Instrument Approaches	3-7
3.2.8	Taxiway Facilities.....	3-8
3.2.9	Helicopter Facilities	3-8
3.2.10	Apron Facilities	3-8
3.2.11	Airport Visual Aids, Communications and Weather Reporting	3-8
3.3	Landside.....	3-9
3.3.1	General Aviation Terminal.....	3-9
3.3.2	Automobile Parking	3-9
3.3.3	Hangars	3-10
3.3.4	Security.....	3-10
3.4	Activity.....	3-10
3.4.1	Main Airport Uses	3-10
3.4.2	Based Aircraft	3-10
3.4.3	Annual Operations	3-11
3.4.4	Enplanements	3-12
3.4.5	Air Cargo.....	3-13
3.4.6	Visitors and Passengers	3-13
3.5	Services	3-13
3.5.1	Airport Attendance and Snow Removal.....	3-13
3.5.2	Aviation Fuel	3-14
3.5.3	Fixed Based Operators (FBO) and FBO Services	3-14
3.5.4	Ground Transportation	3-14
3.6	Administrative.....	3-14
3.6.1	Maps and Documents	3-14
3.6.2	Property and Land Use	3-17
4.0	Forecasts	4-1
4.1	Introduction	4-1
4.2	Socio-economic Context for Aviation in Wisconsin	4-2
4.3	Commercial Air Service	4-6
4.3.1	Overview of Commercial Air Service	4-6
4.3.2	Enplaned Passenger Trends.....	4-9
4.3.3	Airlines, Aircraft, and Capacity Serving Wisconsin	4-13



Table of Contents (Continued)

4.3.4	Commercial Service Forecasts.....	4-16
4.3.4.1	Approach and Methodology	4-16
4.3.4.2	Forecasts of Enplaned Passengers	4-17
4.3.4.3	Commercial Operations Forecasts.....	4-19
4.4	General Aviation.....	4-21
4.4.1	Overview.....	4-21
4.4.2	Based Aircraft	4-23
4.4.2.1	Fleet Mix	4-23
4.4.2.2	Forecasts of Based Aircraft.....	4-24
4.4.3	General Aviation and Air Taxi Operations	4-28
4.4.3.1	Trends in General Aviation and Air Taxi Operations.....	4-28
4.4.3.2	Forecasts of General Aviation and Air Taxi Operations.....	4-30
4.5	Air Cargo	4-34
4.5.1	Overview of Air Cargo	4-34
4.5.2	Air Cargo Data	4-35
4.5.3	Wisconsin Air Cargo Trends.....	4-35
4.5.3.1	Air Freight and Mail Volumes	4-35
4.5.3.2	Air Cargo Carrier Trends	4-37
4.5.3.3	Airport Trends	4-39
4.5.4	Forecasts of Air Cargo Volumes.....	4-40
4.5.5	Forecasts of Dedicated Air Cargo Operations	4-42
4.6	Military Operations	4-43
4.7	Total Operations.....	4-48
4.8	Summary and Conclusions.....	4-52

5.0 Performance Analysis of Typical Facility and Service Attributes 5-1

5.1	Overview	5-1
5.2	Airside Facilities	5-6
5.2.1	Airport Reference Code (ARC).....	5-6
5.2.1.1	Commercial Service Airports.....	5-6
5.2.1.2	Large General Aviation (GA) Airports.....	5-7
5.2.1.3	Medium GA Airports.....	5-7
5.2.1.4	Small GA Airports	5-7
5.2.1.5	System Performance – ARC	5-8
5.2.2	Primary Runway Length.....	5-8
5.2.2.1	System Performance – Primary Runway Length.....	5-9
5.2.3	Primary Runway Width.....	5-11
5.2.3.1	System Performance – Primary Runway Width.....	5-12
5.2.4	Taxiway Type	5-13
5.2.4.1	System Performance – Taxiway Type.....	5-14
5.2.5	Pavement Condition	5-15
5.2.5.1	System Performance – Pavement Condition.....	5-16
5.2.6	Runway and Taxiway Edge Lighting	5-17



Table of Contents (Continued)

5.2.6.1	System Performance – Runway and Taxiway Lighting.....	5-18
5.2.7	Visual Aids and Approach Lighting Configuration.....	5-20
5.2.7.1	System Performance – Visual Aids and Approach Lighting Configuration	5-21
5.2.8	Approach Capability	5-26
5.2.8.1	System Performance – Approach Capability	5-26
5.2.9	Weather Reporting	5-29
5.2.9.1	System Performance – Weather Reporting.....	5-29
5.3	Landside Facilities and Services	5-30
5.3.1	Fixed Base Operator (FBO)	5-30
5.3.1.1	System Performance – Fixed Base Operator.....	5-31
5.3.2	Maintenance	5-32
5.3.2.1	System Performance – Maintenance	5-33
5.3.3	Fuel.....	5-34
5.3.3.1	System Performance – Fuel.....	5-35
5.3.4	GA Terminal/Administrative Building	5-36
5.3.4.1	System Performance – GA Terminal/Administrative Building	5-37
5.3.5	GA Terminal Building Services.....	5-38
5.3.5.1	System Performance – GA Terminal Building Services.....	5-39
5.3.6	Ground Transportation	5-41
5.3.6.1	System Performance – Ground Transportation	5-41
5.3.7	Auto Parking	5-43
5.3.7.1	System Performance – Auto Parking	5-44
5.3.8	Ramp Space	5-45
5.3.8.1	System Performance – Ramp Space	5-45
5.3.9	Operations/Maintenance Building.....	5-46
5.3.9.1	System Performance – Operations/Maintenance Building	5-47
5.3.10	Snow Removal and Deicing	5-48
5.3.10.1	System Performance – Snow Removal and Deicing	5-49
5.3.11	Security.....	5-50
5.3.11.1	System Performance – Security.....	5-50
5.4	Administrative.....	5-51
5.4.1	Land Use Zoning Ordinance	5-51
5.4.1.1	System Performance – Land Use Zoning Ordinance	5-52
5.4.2	Height Limitation Zoning Ordinance	5-55
5.4.2.1	System Performance – Height Limitation Zoning Ordinance	5-55
5.4.3	Vehicle Pedestrian Ordinance	5-56
5.4.3.1	System Performance – Vehicle Pedestrian Ordinance	5-57
5.4.4	Wildlife Hazard Assessment.....	5-59
5.4.4.1	System Performance – Wildlife Hazard Assessment.....	5-60
5.4.5	Stormwater Management Plan.....	5-63
5.4.5.1	System Performance – Stormwater Management Plan.....	5-64
5.4.6	Fee/Easement Ownership of Existing Runway Protection Zones	5-66



Table of Contents (Continued)

5.4.6.1	System Performance – Fee/Easement Ownership of Existing Runway Protection Zones.....	5-67
5.5	Combined System Performance.....	5-70
6.0	System Goals Evaluation	6-1
6.1	Goal: Provide a Safe and Secure Aviation System for Users and the General Public.....	6-1
6.1.1	Measure: Percent of Airports With a Standard RSA	6-2
6.1.2	Measure: Percent of Airports Meeting the Security FSA.....	6-2
6.1.3	Measure: Percent of Airports with a Clear FAR Part 77 Approach Surface	6-3
6.1.4	Measure: Percent of Airports Meeting the Runway and Taxiway Lighting FSA.....	6-3
6.1.5	Measure: Percent of airports meeting the taxiway type FSA	6-4
6.1.6	Measure: Percent of Commercial Service and Large GA Airports Meeting the RPZ Ownership FSA	6-5
6.1.7	Measure: Percent of Airports Meeting the Visual Aids and Approach Lighting Configuration FSA	6-5
6.1.8	Measure: Percent of Airports with a Vehicle Pedestrian Ordinance	6-6
6.2	Goal: Support a System of Airports that is Readily Accessible from the Ground and the Air	6-7
6.2.1	Measure: Percent of Wisconsin Population Served by Commercial Air Service.....	6-7
6.2.2	Measure: Percent of Airports Meeting the Approach Capability FSA	6-10
6.2.3	Measure: Percent of Airports Meeting the Ground Transportation FSA.....	6-10
6.2.4	Measure: Percent of Airports Meeting the Weather Reporting FSA.....	6-11
6.3	Goal: Provide Airport Infrastructure to Attract Business Supporting Economic Growth	6-12
6.3.1	Measure: Percent of Commercial Service, Large GA and Medium GA Airports with Jet A fuel.....	6-12
6.3.2	Measure: Percent of Airports Meeting the GA Terminal Building Services FSA.....	6-13
6.3.3	Measure: Percent of Airports With Transient Aircraft Storage	6-14
6.3.4	Measure: Percent of Airports Meeting the Runway Length & Width FSAs....	6-15
6.3.5	Measure: Percent of Commercial Service and Large GA Airports Meeting the Ground Transportation FSA.....	6-15
6.4	Goal: Provide a System of Airports That Meets Existing and Future Needs.....	6-16
6.4.1	Measure: Percent of Airports Meeting All FSAs.....	6-16
6.4.2	Measure: Percent of Airports Meeting the Pavement Condition FSA.....	6-17
6.5	Goal: Provide a System of Airports That Addresses Community and Environmental Compatibility	6-18
6.5.1	Measure: Percent of Airports With a Land Use Zoning Ordinance.....	6-18
6.5.2	Measure: Percent of Airports With a Height Limitation Zoning Ordinance	6-19
6.5.3	Measure: Percent of Airports Meeting the Wildlife Hazard Assessment FSA	6-19
6.5.4	Measure: Percent of Airports With a Stormwater Management Plan	6-20



Table of Contents (Continued)

7.0 System Plan Investment Recommendations	7-1
7.1 Funding Sources	7-1
7.1.1 Federal Funding.....	7-2
7.1.2 Federal Priority System.....	7-2
7.1.3 State Funding.....	7-2
7.1.3.1 Wisconsin Airport Capital Improvement Program (ACIP) Needs	7-3
7.1.3.2 Wisconsin's Funding Priority System	7-3
7.1.4 Local Funding	7-4
7.1.5 Historic Funding Levels.....	7-5
7.2 SPIR Cost Estimates.....	7-6
7.2.1 Airside.....	7-6
7.2.1.1 Airport Reference Code (ARC)	7-6
7.2.1.2 Runway Length.....	7-7
7.2.1.3 Runway Width.....	7-7
7.2.1.4 Taxiway Type.....	7-7
7.2.1.5 Pavement Condition Index (PCI).....	7-8
7.2.1.6 Runway and Taxiway Lighting	7-8
7.2.1.7 Visual Aids and Approach Lighting.....	7-8
7.2.1.8 Approach Capability.....	7-8
7.2.1.9 Weather Reporting.....	7-8
7.2.1.10 Runway Safety Area	7-9
7.2.1.11 FAR Part 77 Approach Surface.....	7-9
7.2.2 Landside Facilities and Services	7-9
7.2.2.1 Fixed Base Operator (FBO)	7-9
7.2.2.2 Maintenance	7-9
7.2.2.3 Fuel	7-9
7.2.2.4 GA Terminal/Administration Building and Associated Services	7-9
7.2.2.5 Ground Transportation.....	7-10
7.2.2.6 Auto Parking	7-10
7.2.2.7 Ramp Space	7-10
7.2.2.8 Operations/Maintenance Building	7-10
7.2.2.9 Snow Removal and Deicing Equipment.....	7-10
7.2.2.10 Security.....	7-10
7.2.2.11 Transient Aircraft Storage	7-10
7.2.3 Administrative	7-10
7.2.3.1 Airport Layout Plan and Approach Survey	7-10
7.2.3.2 Environmental Assessments.....	7-10
7.2.3.3 Land Use Zoning Ordinance and Height Limitation Zoning Ordinance	7-11
7.2.3.4 Vehicle Pedestrian Ordinance.....	7-11
7.2.3.5 Wildlife Hazard Assessment	7-11
7.2.3.6 Stormwater Management Plan.....	7-11
7.2.3.7 Wisconsin Airport Security Plan	7-11



Table of Contents (Continued)

7.2.3.8	Runway Protection Zone Ownership.....	7-11
7.3	Detailed SPIR Summary.....	7-12
7.3.2	Airside.....	7-14
7.3.3	Landside Facilities and Services	7-15
7.3.4	Administrative	7-16
7.4	SPIR.....	7-16
8.0	Environmental Justice.....	8-1
8.1	Chapter Purpose and Content.....	8-1
8.2	Environmental Justice Overview.....	8-1
8.3	Summary of Wisconsin's Environmental Justice Populations	8-2
8.4	Establishing Environmental Justice Population Thresholds	8-8
8.4.1	Census Block Group and Census Tract Observations.....	8-8
8.4.2	Census Data Limitations	8-19
8.5	Assessment of Potential Impacts to Environmental Justice Populations Resulting from the SASP	8-20
8.5.1	Sequencing/Mitigation.....	8-22
8.6	Next Steps.....	8-23
8.6.1	Public Outreach Activities.....	8-23
9.0	System-Plan Environmental Evaluation (SEE).....	9-1
9.1	Comparison of the No Action and Proposed Action	9-1
9.1.1	Proposed Action – Adoption of SASP Update	9-1
9.1.2	No Action – Continued use of unrevised SASP	9-2
9.2	Qualitative Assessment of Impacts.....	9-3
9.2.1	Air Quality	9-3
9.2.2	Community.....	9-4
9.2.2.1	Ground and Air Traffic Congestion effects for Green Bay, Madison and Milwaukee	9-4
9.2.2.2	Regional Development Plans.....	9-4
9.2.2.2.1	Southeastern Wisconsin Regional Planning Commission	9-6
9.2.2.2.2	Capital Area Regional Planning Commission	9-6
9.2.2.2.3	East Central Wisconsin Regional Planning Commission .	9-7
9.2.2.2.4	Northwest Regional Planning Commission.....	9-7
9.2.2.2.5	Bay-Lake Regional Planning Commission.....	9-8
9.2.2.2.6	Mississippi River Regional Planning Commission	9-8
9.2.2.2.7	West Central Wisconsin Regional Planning Commission	9-8
9.2.2.2.8	North Central Wisconsin Regional Planning Commission	9-8
9.2.2.2.9	Southwestern Wisconsin Regional Planning Commission	9-9
9.2.2.2.10	Summary	9-9
9.2.3	Energy	9-9
9.2.4	Economic Growth.....	9-9
9.2.5	Farmlands.....	9-10



Table of Contents (Continued)

9.2.6	Historical and Archeological Resources	9-11
9.2.7	Noise.....	9-11
9.2.8	Sensitive Land and Water Resources	9-12
9.2.8.1	Water Quality	9-12
9.2.8.2	Wetlands & Surface Water Resources.....	9-13
9.2.8.3	Habitat	9-14
9.2.8.4	Threatened and Endangered Species.....	9-14
9.2.8.5	Public Lands	9-15
9.2.9	Indirect Effects	9-15
9.2.10	Cumulative Effects	9-16
9.3	Selected Alternative	9-16

List of Tables

Table 2-1	Wisconsin Counties with Highest Projected Population Growth, 2010 2035	2-4
Table 2-2	Wisconsin Counties with Highest Projected Employment Growth, 2010 2035 ...	2-4
Table 2-3	Wisconsin Counties with Highest Projected Per Capita Income Growth, 2010 2035	2-5
Table 2-4	2010 Classification Evaluation Process	2-6
Table 2-5	Updated Evaluation Process.....	2-7
Table 2-6	Existing Airport Role Classifications.....	2-11
Table 2-7	Out-of-State Airports Serving Wisconsin.....	2-19
Table 2-8	Population Coverage by Existing Airport Role	2-21
Table 2-9	Land Area Coverage by Existing Airport Role	2-21
Table 2-10	Future Airport Role Classifications.....	2-26
Table 3-1	General Airport Data.....	3-18
Table 3-2	Airport Design, Pavements, Approach Surfaces, Runway Safety Areas and RPZ Ownership	3-21
Table 3-3	Runways.....	3-24
Table 3-4	Instrument Approaches.....	3-28
Table 3-5	Taxiways	3-31
Table 3-6	Miscellaneous Airside Facilities	3-34
Table 3-7	GA Terminal and Automobile Parking.....	3-37
Table 3-8	Buildings and Airport Security.....	3-40
Table 3-9	Airport Uses.....	3-43
Table 3-10	Based Aircraft.....	3-46
Table 3-11	Operations and Enplanements	3-49
Table 3-12	Air Cargo	3-52
Table 3-13	Average Daily Airport Activity.....	3-55
Table 3-14	Airport Attendance and Snow Removal	3-58
Table 3-15	Airport Services	3-61
Table 3-16	Ground Transportation.....	3-64
Table 3-17	Ordinances and Documents	3-67
Table 3-18	Environmental and Security Documents	3-70



Table of Contents (Continued)

Table 3-19 Airport Property and Land Use	3-73
Table 4-1 Population in Wisconsin and Neighboring MSAs, 2010.....	4-3
Table 4-2 Economic Measures of the Wisconsin Economy.....	4-4
Table 4-3 2010 Summary of Wisconsin Aviation Activity	4-5
Table 4-4 Driving Distances Between Commercial Service Airports (in miles)	4-8
Table 4-5 Average Fares	4-8
Table 4-6 Changes in U.S. Scheduled Flights by Flight Distance, June 2007 vs. June 2012.....	4-12
Table 4-7 Enplaned Passengers at Wisconsin Airports, 2000-2011.....	4-13
Table 4-8 Annual Operations by Airport and Aircraft Type Group (CY 2000 CY 2010, YTD July 2010)	4-14
Table 4-9 Annual Seats at Wisconsin Commercial Service Airports	4-15
Table 4-10 Average Seats per Operation	4-15
Table 4-11 Enplaned Passenger Load Factor.....	4-16
Table 4-12 Statewide Forecasts of Enplaned Passengers.....	4-18
Table 4-13 Individual Airport Forecasts of Enplaned Passengers.....	4-19
Table 4-14 Summary of Statewide Forecasts of Commercial Operations	4-20
Table 4-15 Individual Airport Forecasts of Commercial Operations	4-21
Table 4-16 Based Aircraft by Airport Classification	4-23
Table 4-17 FAA Forecast of General Aviation and Air Taxi Aircraft.....	4-24
Table 4-18 Statewide Forecast of Based Aircraft.....	4-25
Table 4-19 Individual Forecasts of Based Aircraft.....	4-25
Table 4-20 Statewide Forecasts of General Aviation and Air Taxi Operations	4-30
Table 4-21 Individual Airport Forecasts of General Aviation and Air Taxi Operations	4-31
Table 4-22 Enplaned/Deplaned Air Freight and Mail at Commercial Service Airports 2003 2011.....	4-36
Table 4-23 Statewide Forecasts of Air Cargo Volumes.....	4-41
Table 4-24 Individual Airport Forecasts of Air Cargo Volumes.....	4-41
Table 4-25 Statewide Forecasts of Dedicated Air Cargo Operations	4-42
Table 4-26 Individual Airport Forecasts of Dedicated Air Cargo Operations	4-43
Table 4-27 Statewide Historical and Forecast of Military Operations	4-45
Table 4-28 Individual Airport Forecasts of Military Operations	4-45
Table 4-29 Statewide Forecasts of Total Operations	4-48
Table 4-30 Individual Airport Forecasts of Total Operations	4-49
Table 4-31 Summary of System Plan Forecasts.....	4-53
Table 5-1 Commercial Service Airports - Typical Facility and Service Attributes.....	5-2
Table 5-2 Large General Aviation Airports - Typical Facility and Service Attributes	5-3
Table 5-3 Medium General Aviation Airports - Typical Facility and Service Attributes.....	5-4
Table 5-4 Small General Aviation Airports - Typical Facility and Service Attributes	5-5
Table 5-5 2011 Primary Commercial Service Aircraft Operating in Wisconsin	5-6
Table 5-6 Airport Reference Code FSA	5-7
Table 5-7 Primary Runway Length FSA.....	5-9
Table 5-8 Primary Runway Length FSA - Airports Not Meeting FSA	5-10
Table 5-9 Primary Runway Width FSA	5-11



Table of Contents (Continued)

Table 5-10 Primary Runway Width FSA - Airports Not Meeting FSA	5-12
Table 5-11 Taxiway Type FSA	5-13
Table 5-12 Taxiway Type FSA - Airports Not Meeting FSA	5-14
Table 5-13 Pavement Condition FSA	5-16
Table 5-14 Pavement Condition - Airports Not Meeting FSA	5-16
Table 5-15 Runway and Taxiway Edge Lighting FSA	5-18
Table 5-16 Runway and Taxiway Lighting - Airports Not Meeting FSA	5-19
Table 5-17 Visual Aids and Approach Lighting Configuration FSA.....	5-21
Table 5-18 Visual Aids and Approach Lighting - Airports Not Meeting FSA	5-21
Table 5-19 Approach Capability FSA.....	5-26
Table 5-20 Approach Capability - Airports Not Meeting FSA	5-26
Table 5-21 Weather Reporting FSA.....	5-29
Table 5-22 Weather Reporting - Airports Not Meeting FSA	5-29
Table 5-23 Fixed Base Operator FSA.....	5-31
Table 5-24 FBO - Airports Not Meeting FSA.....	5-31
Table 5-25 Maintenance FSA.....	5-32
Table 5-26 Maintenance - Airports Not Meeting FSA.....	5-33
Table 5-27 Fuel FSA	5-34
Table 5-28 Fuel - Airports Not Meeting FSA	5-35
Table 5-29 GA Terminal/Administrative Building FSA.....	5-36
Table 5-30 GA Terminal/Administrative Building - Airports Not Meeting FSA.....	5-37
Table 5-31 GA Terminal Building Services FSA	5-38
Table 5-32 GA Terminal Building Services - Airports Not Meeting FSA	5-39
Table 5-33 Ground Transportation FSA.....	5-41
Table 5-34 Ground Transportation - Airports Not Meeting FSA	5-42
Table 5-35 Auto Parking FSA	5-43
Table 5-36 Auto Parking - Airports Not Meeting FSA	5-44
Table 5-37 Ramp Space FSA.....	5-45
Table 5-38 Ramp Space - Airports Not Meeting FSA.....	5-45
Table 5-39 Operations/Maintenance Building FSA	5-47
Table 5-40 Operations/Maintenance Building - Airports Not Meeting FSA.....	5-47
Table 5-41 Snow Removal and Deicing FSA.....	5-49
Table 5-42 Snow Removal and Deicing - Airports Not Meeting FSA.....	5-49
Table 5-43 Security FSA	5-50
Table 5-44 Security - Airports Not Meeting FSA	5-50
Table 5-45 Land Use Zoning Ordinance FSA	5-51
Table 5-46 Land Use Zoning Ordinance - Airports Not Meeting FSA.....	5-52
Table 5-47 Height Limitation Zoning Ordinance FSA	5-55
Table 5-48 Height Limitation Zoning Ordinance - Airports Not Meeting FSA.....	5-55
Table 5-49 Vehicle Pedestrian Ordinance FSA.....	5-56
Table 5-50 Vehicle Pedestrian Ordinance - Airports Not Meeting FSA	5-57
Table 5-51 Wildlife Hazard Assessment FAA Proposed Investment Schedule	5-60
Table 5-52 Wildlife Hazard Assessment FSA	5-60



Table of Contents (Continued)

Table 5-53 Wildlife Hazard Assessment - Airports Not Meeting FSA	5-60
Table 5-54 Stormwater Management Plan FSA.....	5-64
Table 5-55 Stormwater Management Plan - Airports Not Meeting FSA	5-64
Table 5-56 Fee/Easement Ownership of Existing Runway Protection Zones FSA.....	5-66
Table 5-57 Fee/Easement Ownership of Existing Runway Protection Zones - Airports Not Meeting FSA	5-67
Table 6-1 System Performance - Goal: Provide a Safe and Secure Aviation System for Users and the General Public	6-1
Table 6-2 RSA - System/Target Performance.....	6-2
Table 6-3 Security - System/Target Performance	6-3
Table 6-4 Approach Surface - System/Target Performance.....	6-3
Table 6-5 Runway and Taxiway Lighting - System/Target Performance	6-4
Table 6-6 Taxiway Type - System/Target Performance	6-4
Table 6-7 RPZ Ownership - System/Target Performance	6-5
Table 6-8 Visual Aids and Approach Lighting - System/Target Performance	6-6
Table 6-9 Vehicle Pedestrian Ordinance - System/Target Performance	6-6
Table 6-10 System Performance - Goal: Support a System of Airports that is Readily Accessible from the Ground and the Air	6-7
Table 6-11 Commercial Service Airport Accessibility - System/Target Performance.....	6-8
Table 6-12 Approach Capability - System/Target Performance	6-10
Table 6-13 Ground Transportation - System/Target Performance	6-11
Table 6-14 Weather Reporting - System/Target Performance	6-11
Table 6-15 System Performance - Goal: Provide Airport Infrastructure to Attract Business Supporting Economic Growth.....	6-12
Table 6-16 Jet A Fuel - System/Target Performance	6-13
Table 6-17 GA Terminal Building - System/Target Performance.....	6-14
Table 6-18 Transient Aircraft Storage - System/Target Performance.....	6-14
Table 6-19 Runway Width and Length - System/Target Performance	6-15
Table 6-20 Ground Transportation - System/Target Performance	6-16
Table 6-21 System Performance - Goal: A System of Airports That Meets Existing and Future Needs.....	6-16
Table 6-22 Airports Meeting All FSAs - System/Target Performance.....	6-17
Table 6-23 PCI - System/Target Performance	6-17
Table 6-24 System Performance - Goal: Provide a System of that Addresses Community and Environmental Compatibility	6-18
Table 6-25 Land Use Zoning Ordinance - System/Target Performance.....	6-18
Table 6-26 Height Limitation Zoning Ordinance - System/Target Performance.....	6-19
Table 6-27 Wildlife Hazard Assessment - System/Target Performance	6-19
Table 6-28 Stormwater Management Plan - System/Target Performance	6-20
Table 7-1 Historic (2011 and 2012) Funding by Project Type	7-6
Table 7-2 SPIR - Costs Summary.....	7-12
Table 8-1 Wisconsin Demographics, 2010	8-3
Table 8-2 Racial Populations Within Each WisDOT Region (2010)	8-6
Table 8-3 Persons Age 17 and Under and Age 65 and Older	8-6



Table of Contents (Continued)

Table 8-4 Persons Below the Poverty Level	8-7
Table 8-5 Households with Zero Vehicles.....	8-7
Table 9-1 Wisconsin State Airport System Plan 2020 Recommended Airport Development	9-2
Table 9-2 Comprehensive Economic Development Strategy Projects	9-7

List of Figures

Figure 2-1 – Existing Wisconsin Airport Classifications.....	2-10
Figure 2-2 – Wisconsin Population Within 60 Minutes of a Commercial Service Airport	2-15
Figure 2-3 – Wisconsin Population Within 60 Minutes of a Commercial Service Airport or 45 Minutes of a Large GA Airport	2-16
Figure 2-4 – Wisconsin Population Within 60 Minutes of a Commercial Service Airport, 45 Minutes of a Large GA Airport, or 30 Minutes of a Medium GA Airport	2-17
Figure 2-5 – Wisconsin Population Within 60 Minutes of a Commercial Service Airport, 45 Minutes of a Large GA Airport, or 30 Minutes of a Medium GA or Small GA Airport.....	2-18
Figure 2-6 – Wisconsin Population Within 60 Minutes of a Commercial Service Airport, 45 Minutes of a Large GA Airport, or 30 Minutes of a Medium, Small, or Out-of-State GA.....	2-20
Figure 2-7 – Population Growth Areas.....	2-22
Figure 2-8 – Coverage of Population Growth Areas - Commercial Service and Large GA Airports	2-23
Figure 2-9 – Future Wisconsin Airport Classifications.....	2-25
Figure 2-10 – Wisconsin Population Within 60 Minutes of Future Commercial Service Airport, 45 Minutes of Future Large GA Airport, or 30 Minutes of a Future Medium, Future Small, or Out-of-State GA.....	2-29
Figure 3-1 – FAA Aircraft Approach Category.....	3-4
Figure 3-2 – FAA Airplane Design Group	3-4
Figure 3-3 – ARCs and Representative Aircraft	3-5
Figure 3-4 – Scheduled Train and Drive Bus Service to Commercial Service Airports....	3-15
Figure 4-1 – Commercial Service Airports	4-7
Figure 4-2 – Overview of Air Cargo	4-34
Figure 5-1 – Taxiway Types	5-13
Figure 6-1 – Commercial Service Airport Accessibility	6-9
Figure 8-1 – Base Map	8-5
Figure 8-2 – Census Block Groups that Exceed the Blacks Threshold	8-9
Figure 8-3 – Census Block Groups that Exceed the American Indian Threshold	8-10
Figure 8-4 – Census Block Groups that Exceed the Asian Threshold.....	8-11
Figure 8-5 – Census Block Groups the Exceed Hispanic Threshold	8-12
Figure 8-6 – Census Block Groups that Exceed <18 Age Threshold	8-13
Figure 8-7 – Census Block Groups that Exceed >65 Age Threshold	8-14
Figure 8-8 – Census Tracts that Exceed the Poverty Threshold	8-15
Figure 8-9 – Census Tracts that Exceed the 0 Vehicles Threshold.....	8-16



Table of Contents (Continued)

Figure 8-10 – Census Block Groups or Tracks With Any Environmental Justice Population Above the Region Threshold.....	8-17
Figure 9-1 – Wisconsin Regional Planning Commissions	9-5

List of Charts

Chart 1-1 Plan Process	1-3
Chart 3-1 Based Aircraft by Classification.....	3-11
Chart 3-2 Operations by Classification.....	3-12
Chart 3-3 Enplanements by Airport.....	3-13
Chart 4-1 Airport Shares of Wisconsin Enplaned Passengers, 2001	4-9
Chart 4-2 Airport Shares of Wisconsin Enplaned Passengers, 2011	4-10
Chart 4-3 Enplaned Passenger Trends at Wisconsin Airports, 2000-2011.....	4-11
Chart 4-4 Statewide Forecast of Enplaned Passengers.....	4-18
Chart 4-5 Statewide Forecasts of Commercial Operations	4-20
Chart 4-6 Wisconsin Based Aircraft Fleet - 2010	4-23
Chart 4-7 Total Operations at Commercial Service Airports with Air Traffic Control Towers	4-29
Chart 4-8 Total Operations at General Aviation Airports with Air Traffic Control Towers ..	4-29
Chart 4-9 Enplaned/Deplaned Air Freight and Air Mail at Commercial Service Airports 2003 2011.....	4-36
Chart 4-10 Enplaned/Deplaned Mail at Wisconsin Commercial Service Airports, 2003-2011	4-37
Chart 4-11 Air Carrier Market Share, 2003	4-38
Chart 4-12 Air Carrier Cargo Market Share, 2007.....	4-38
Chart 4-13 Air Carrier Cargo Market Share, 2011.....	4-39
Chart 4-14 Enplaned and Deplaned Freight and Mail at Wisconsin Commercial Service Airports	4-40
Chart 4-15 Military Operations, 2002	4-44
Chart 4-16 Military Operations, 2010	4-44
Chart 5-1 System Performance - Airport Reference Code	5-8
Chart 5-2 System Performance - Primary Runway Length.....	5-11
Chart 5-3 System Performance - Primary Runway Width	5-12
Chart 5-4 System Performance - Taxiway Type	5-15
Chart 5-5 System Performance - Pavement Condition	5-17
Chart 5-6 System Performance - Runway and Taxiway Lighting	5-20
Chart 5-7 System Performance - Visual Aids and Approach Lighting	5-25
Chart 5-8 System Performance - Approach Capability.....	5-28
Chart 5-9 System Performance - Weather Reporting.....	5-30
Chart 5-10 System Performance - FBO	5-32
Chart 5-11 System Performance - Maintenance	5-34
Chart 5-12 System Performance - Fuel	5-36
Chart 5-13 System Performance - GA Terminal/Administrative Building	5-38
Chart 5-14 System Performance - GA Terminal Building Services	5-40
Chart 5-15 System Performance - Ground Transportation.....	5-43



Table of Contents (Continued)

Chart 5-16 System Performance - Auto Parking	5-44
Chart 5-17 System Performance - Ramp Space.....	5-46
Chart 5-18 System Performance - Operations/Maintenance Building	5-48
Chart 5-19 System Performance - Snow Removal and Deicing.....	5-49
Chart 5-20 System Performance - Security	5-51
Chart 5-21 System Performance - Land Use Zoning Ordinance	5-54
Chart 5-22 System Performance - Height Limitation Zoning Ordinance	5-56
Chart 5-23 System Performance - Vehicle Pedestrian Ordinance.....	5-59
Chart 5-24 System Performance - Wildlife Hazard Assessment	5-63
Chart 5-25 System Performance - Stormwater Management Plan.....	5-66
Chart 5-26 System Performance - Fee/Easement Ownership of Existing Runway Protection Zones	5-70
Chart 5-27 Overall System Performance	5-71
Chart 5-28 Commercial Service Airports Performance	5-72
Chart 5-29 Large GA Airports Performance	5-73
Chart 5-30 Medium GA Airports Performance	5-74
Chart 5-31 Small GA Airports Performance	5-75
Chart 7-1 Historic Funding Levels (2011 and 2012).....	7-5
Chart 7-2 SPIR - Costs by Classification	7-13
Chart 7-3 SPIR - Costs by Project Type	7-13
Chart 7-4 SPIR - Airside Costs	7-14
Chart 7-5 SPIR - Landside Facilities and Services Costs	7-15
Chart 7-6 SPIR - Administrative Costs.....	7-16
Chart 8-1 Wisconsin Demographics, 2010.....	8-3

List of Appendices

Appendix A	Public Participation
Appendix B	Classification Review Data
Appendix C	NAVAIDS Plan
Appendix D	Unit Costs
Appendix E	Abbreviations & Acronyms
Appendix F	Terminal Area Forecasts Comparison

