

MnSASP Elements of Phase II

The Minnesota Department of Transportation (MnDOT) Office of Aeronautics (Office) has completed Phase I of the Minnesota State Aviation System Plan (MnSASP, SASP) update. Phase I included an extensive Public Involvement Plan and tasks that resulted in a number of recommendations to carry into the Phase II effort. Phase I built the framework upon which the MnSASP would be built. This framework sets the stage for a continuous SASP which strives to keep data current at all times to better track performance metrics and share progress towards those metrics with aviation stakeholders.

This document is intended to begin a conversation with aviation stakeholders about what additional elements should be included in Phase II and ultimately, what will be included in the plan. It is not a scope of work, and it is not final. It is closer to a public brainstorming exercise. The Office is seeking feedback on this document as part of the SASP Phase I Public Comment Period.

1: Validating Recommendations and Deliverables from Phase I

This plan element will review the recommendations, public comment record and all deliverables developed in Phase I and provide a valuable 2nd opinion on moving forward. These recommendations will be subject to a “stress test” to avoid unintended consequences. This exercise will brainstorm scenarios that would result in negative outcomes for the system and make changes to the recommendations to avoid those negative outcomes. In addition, the public comment record and all deliverables will be reviewed for project understanding and validation.

2: Policy Issues to Analyze

There are a number of issues for which the Office of Aeronautics has no policy or well-defined systems to process. These issues continue to vex the Office whenever they surface. This task will analyze these issues and provide recommendations for policy and processes so the Office is able to provide timely recommendations to customers. These recommendations could also suggest the Office conduct rule-making or initiate a process to change statutes.

Operations Counting and Forecasting

Obtaining an accurate count of the operations at General Aviation airports has long been difficult. MnDOT has experimented in the past with various means of estimating traffic levels. The Office desires a systematic method to generate a planning-level estimate of operations numbers at non-towered airports.

Further, it is difficult to forecast activity levels when data on historic and current levels are suspect. Once a systematic method is developed for determining a planning-level estimate of operations is determined, a further effort would estimate how those levels are likely to change in the future.

Residential Through the Fence

Residential Through-the-Fence operations, commonly referred to as “airparks” are perennially proposed to the Office. Historically, the Office has been opposed to these developments, but we lack clear articulable rules and reasons for this opposition. Since publishing the last SASP, the FAA has changed position on access of this type to public airports and has developed the Residential Through-the-Fence Access Toolkit. The analysis will develop pros/cons for such access and recommendations for policy on this issue.

Hangar Availability and Funding Participation

Phase I of the SASP identified hangar availability as an issue at many of the airports in the state. The hangar loan program has been improved and has resulted in demand for these funds outstripping supply. FAA grant assurances requires airports to strive for self-sufficiency, yet FAA and State programs fund “revenue generating” projects with poor participation rates. This analysis will evaluate the pros/cons of further improving the hangar loan program, improving participation rates, and exploring other ways to help airport cash flow hangar improvements, provide needed aircraft storage, and become more self-sufficient.

Airport Closures

Some airport communities no longer find investment in the airport worthwhile and request to close. The Office has difficulty balancing our mission of promoting aviation with “right sizing” the system. While the Office has procedures assisting communities in closing their airports, the process could be improved to aid in decision making. This analysis will develop recommendations to revise airport closure procedures to meet statutory requirements, make the process more transparent and responsive, and analyze impacts to the system so that the Office can make better informed dispassionate decisions.

Crosswind Runway Analysis

The FAA has changed funding justification criteria for crosswind runways so that it is nearly impossible to justify a crosswind runway. Communities are increasingly turning to the state to fund crosswind runways that are needed, but not fundable through FAA. This analysis will result in a better decision making model that will take into account local wind coverage needs as well as system needs that will aid the Office in decision making with regards to eligibility and justification for state-funded crosswinds.

Clear Zone Policy and Ownership Analysis

The Office has long had a Clear Zone Policy. Despite this policy’s longevity, there is continued confusion to the requirements of the policy, how it is used in practice, and the level of conformance to the policy. This analysis will develop guidance on the policy to increase office consistency on the state’s clear zone. It will also include and analysis to the level of conformance to the policy with respect to ownership of the clear zone and type of ownership (fee, easement).

Airport Zoning Analysis and Prioritization

Airports in the State of Minnesota must be zoned to receive funding. Minnesota administrative rules proscribe minimum standards that this zoning must meet. The strictest interpretation of these rules puts compliance by

municipalities at around 50%. This analysis will help the Office define levels of compliance with the Commissioner's Standards and prioritize zoning projects to increase zoning standards compliance.

Drones

Drones, also known as Unmanned Aerial Systems (UAS), Remotely Piloted Vehicles, and others, have been an emerging topic since the 2012 SASP was published. There is intense interest in how the next SASP will include drones, and how drones will ultimately be incorporated in to the National Airspace System.

Last Mile Connection Opportunity (courtesy car analysis)

Airports are seldom the final destination for users of the airport. It is vitally important for pilots and passengers to access the community for their ultimate purpose. Access to ground transportation via a courtesy car is a preferred method for accessing communities from airports. This analysis will determine the level of community access through courtesy car and develop recommendations for increasing connections including exploring options of funding courtesy cars, state purchase of vehicles, and best practices from other states.

3: Validate and Modify Phase I Data Acquisition Plan

Data acquisition is costly and time consuming. It is critical to collect only data that is needed and to ensure that all data that is needed is collected. This task requires examination of the Data Acquisition Plan developed through the Phase I effort. The Data Acquisition Plan may need to be updated to reflect any changes from the validation of recommendations in element 1. There may also be data requirements to properly perform the analyses of issues in element 2.

4: Acquire data

This task involves executing the Data Acquisition Plan developed through element 3.

5: Develop Data Management Plan

Keeping data current is vital to ensure it can be used for decision making. This task involves developing a Data Management Plan that identifies the official source of each data point, who is charged with collecting the data, and how often each data point should be refreshed.

6: Database System and Display Dashboard

The Office of Aeronautics holds accountability as a core value. Accountability is achieved through transparency and sharing of information. To fully realize the benefits of the new continuous SASP concept, data must be accessible by all stakeholders. A database system that is capable of displaying performance metrics in an easy to understand format is critical. The Phase I effort identified a number of features desirable of a display dashboard:

- Multiple modules to provide different functions including: CIP, ALP review, Performance Metric visualization, airport project prioritization, etc.
- Remote log-in infrastructure capable of assigning access levels to various modules
- End-user manipulation so the Office is able to make changes to data and data display

7: Public Involvement

Phase I included extensive public involvement. This was designed to collect the public's needs in order to develop the framework for Phase II. Phase II will largely consist of executing the plans developed as part of Phase I. Therefore, public involvement will look very different from Phase I. At a minimum, formal adoption of the SASP requires a public comment period so that the public may weigh in on the State's Vision for aviation. This task involves supporting the Office with statutory and agency requirements for a public comment period and hearings.

8: Publish document

Ultimately, the MnSASP is a document. The document will live online, and must be easily consumable by the public and other stakeholders. The information relevant to a stakeholder must be easily found without being diluted by irrelevant messages. Essential themes of the SASP should be communicated by graphics, charts, and tables whenever possible.

9: Develop implementation plan

The implementation plan is how the MnSASP is transformed from a concept on a shelf into a future that is different from the status quo of today. The implementation plan should encompass a number of parts including:

Investment Plan

An Investment Plan will ensure that the objectives and strategies identified in the plan will be achieved through targeted investment in airport infrastructure.

Policy Plan

The Policy Plan identifies a number of policies that MnDOT should update or develop to more fully realize the goals of transparency and accountability. The policies may be needed as a result of issues that were studied through the project or to communicate current practice in a more transparent way.

Action (Work) Plan

The Action Plan identifies other work items for the Office and stakeholders that will work to achieve the objectives and strategies of the plan. It could identify additional items that would improve system performance on measures or other means of increasing the Office's response to customer needs.