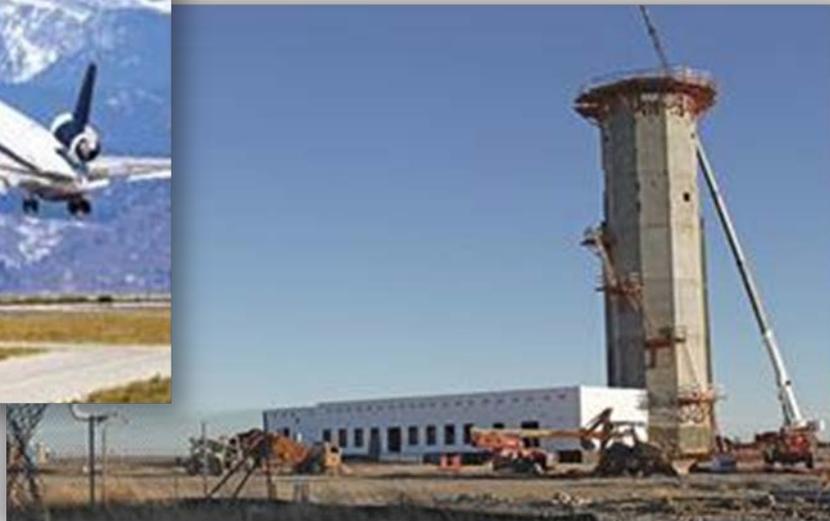




**Federal Aviation
Administration**

NextGen National Environmental Policy Act (“NEPA”) Plan



**Department of Transportation
Federal Aviation Administration**

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Foreword

This plan was prepared by the FAA Office of Environment and Energy (AEE) in collaboration with relevant FAA offices that have NEPA and NextGen responsibilities. It serves as a high level guide to improvements in the way the FAA implements NEPA, consistent with federal law and regulations issued by the President's Council on Environmental Quality. The goal of improvements described in the plan is to ensure timely, effective, and efficient environmental reviews of proposed NextGen improvements. The AEE Policy and Operations Division (AEE-400) will monitor and facilitate implementation of the NEPA plan, in collaboration with relevant FAA offices. For additional information, contact Thomas Cuddy, Environmental Protection Specialist, AEE-400, 202-493-4018.

Introduction

The Next Generation Air Transportation System (NextGen) involves operational and infrastructure improvements that require the FAA's environmental review in accordance with the National Environmental Policy Act (NEPA). The FAA's goal is to ensure timely, effective and efficient environmental reviews of proposed NextGen improvements. The purpose of this NEPA Plan is to lay out planned improvements in the way the FAA implements NEPA, consistent with federal law and regulations issued by the President's Council on Environmental Quality (CEQ). This Plan categorizes NEPA improvements under four key focus areas:

- *Policy and Guidance*
- *Best Practices*
- *Consultation and Coordination*
- *Resources and Training*

While the focus for these improvements is NextGen, the FAA will apply the improvements to its other actions and decisions where appropriate.

Background and Context

NEPA is a national charter to protect the environment. The basic framework of NEPA is for all Federal agencies, to the fullest extent possible, to interpret and administer their responsibilities in accordance with national environmental policies. NEPA procedures ensure that accurate and high quality environmental information is available to public officials and citizens before Federal decisions are made or actions are taken that may affect the environment. Each Federal agency is charged with developing methods and procedures, in consultation with CEQ, to give environmental values appropriate consideration in agency decisions along with economic and technical values.

CEQ provides Federal leadership on the implementation of NEPA through regulations (40 CFR 1500-1508) and guidance applicable across the Federal government.¹ The NEPA guidance of each Federal department and agency must be consistent with the CEQ regulations and must have concurrence by CEQ. FAA Order 1050.1E, *Environmental Impacts: Policies and Procedures* is the FAA's guidance for complying with NEPA and other special purpose environmental laws and regulations (e.g., Clean Air Act, Clean Water Act, Endangered Species Act).² Consistent with this Order, the FAA is responsible for conducting an environmental review under NEPA for all proposed actions and decisions within its purview that affect the environment. FAA actions and decisions include but are not limited to the implementation of air traffic procedures, airspace redesign, navigational aid (NAVAID) installation, facility construction, regulations, approval of airport layout plans, grants for airport development, permits, licenses, and certifications. NextGen implementing actions are subject to NEPA, just as other FAA actions are.

NEPA reviews have been identified by the FAA as a high level strategic issue for NextGen, and addressed in NextGen planning documents. NextGen is far reaching in scope and scale. The

¹ CEQ Regulations and Guidance for Implementing NEPA, http://ceq.hss.doe.gov/ceq_regulations/regulations.html

² FAA Order 1050.1E Environmental Impacts: Policies and Procedures
http://www.faa.gov/documentLibrary/media/order/energy_orders/1050-1E.pdf

volume of the FAA's NEPA reviews will increase under NextGen. New capabilities require thoughtful environmental consideration. FAA and industry interest in accelerating NextGen implementation for earlier realization of benefits places additional emphasis on timely completion of environmental reviews. In short, the FAA's implementation of NextGen must include effective and efficient NEPA reviews.

The RTCA Task Force 5 Report³ and other stakeholders have offered specific recommendations to streamline NextGen NEPA reviews. In addition, the FAA has undertaken a series of internal evaluations.⁴ The FAA NAV-Lean evaluation included recommendations on the environmental review process. A NextGen NEPA Study for Air Traffic Management evaluated approaches and improvements for managing the NEPA process for air traffic actions. A Back to Basics NEPA review compared the FAA's NEPA implementation to basic NEPA requirements to help identify areas to improve and streamline. A Workgroup under Mission Support Services has focused on ways to re-engineer the NEPA process for RNAV/RNP projects improve NEPA reviews for performance based navigation (PBN), and plan for the Optimization of Airspace and Procedures in the Metroplex (OAPM) initiative.

There are common threads and recommendations running through these reviews that form the basis for developing this NEPA Plan. Proposed improvements and efficiencies are outlined in FAA NextGen planning documents and described in the following sections under four key headings: Policy and Guidance, Best Practices, Consultation and Coordination, and Resources and Training. Some portions of the plan require the accomplishment of specific tasks that are identified within associated time frames between 2011 and 2015, and many are associated with NextGen Operational Improvements (OIs). Other measures are ongoing.

³ RTCA Task Force 5 Report.

⁴ *NAV-Lean: Instrument Flight Procedures, Navigation Procedures Project Final Report*, prepared by FAA, September 2010. *NEPA: Back to Basics, Improving FAA's Environmental Reviews for NextGen*. Prepared by URS Corporation. September 2010. *NextGen NEPA Review and Planning for Air Traffic Management (ATM)*, prepared by MITRE CAASD, September 2010. *Civilian Air Traffic Procedures Environmental Analysis Process Improvement*, prepared by Mission Support Services, March 2011.

Policy and Guidance

All agencies of the Federal Government must comply with CEQ regulations for implementing NEPA. Each agency also adopts its own procedures, within flexibility provided by CEQ, to supplement CEQ regulations to reflect its particular programs. FAA Order 1050.1E, *Environmental Impacts: Policies and Procedures*, sets forth policy and procedures for the FAA's NEPA compliance. This order is periodically updated in consultation with CEQ, and an update is currently underway incorporating recommendations derived from the above NEPA evaluations. In addition, the FAA is providing guidance on how to interpret some specific aspects of the current order where additional clarity is requested and helpful, in part in response to recommendations of the NAV-Lean effort to streamline instrument flight procedure design and approval. To complement these agency-wide efforts, there are activities specific to the lines of business (LOBs). For example the FAA Air Traffic Organization (ATO) is in the process of re-engineering their NEPA review process to integrate recommendations of the NAV-Lean report and ensure consistent application of environmental laws and policies in developing instrument flight procedures.

Policy and Guidance updates and improvements include the following considerations:

- Incorporation of NEPA reviews into NextGen implementation planning
- Updates of resource topics subject to environmental review
- Justification of Categorical Exclusions as appropriate for NextGen actions/decisions
- Use of concise, focused, and timely Environmental Assessments
- Streamlining of documentation and analyses in FAA's Environmental Assessments and Environmental Impact Statements consistent with CEQ's guidance on reducing paperwork and delay
- Guidance memos to assist with improved application of NEPA and facilitate NextGen implementation
- Enhanced integration of NEPA process within the Acquisition Management System (AMS) to facilitate process efficiencies

Tasks:

Task Name	OPR	Supporting Office	Time Frame
Update FAA NEPA Order (1050.1E) and supporting Desk Reference – Agency-wide policies and procedures for compliance with the National Environmental Policy Act (NEPA). It is being revised to include emerging environmental issues and NextGen considerations.	AEE		2009 - 2013
Issue FAA NEPA Guidance memos			As Needed
<u>Focused EA memo</u> – Guidance on the preparation of focused, concise, and timely Environmental Assessments for FAA actions.	AEE		<i>Completed</i>
<u>Radar Tracks memo</u> – Guidance on consistent interpretation of Categorical Exclusions 311g and 311i in Order 1050.1E.	AEE		<i>Completed</i>
<u>Noise focusing white paper</u> – Guidance on applying Categorical Exclusions to flight procedures and when noise screening is needed.	AJV		<i>Completed</i>

<u>NEPA GHG Memo</u> – Guidance concerning the consideration and evaluation of greenhouse gases (GHGs) and climate change under NEPA.	AEE		2012
Reengineer Air Traffic Organization NEPA Process and Guidance			2011 – 2012
<u>Reengineering Workgroup</u> – Reengineer the Environmental Analysis process applied to the design (and redesign) of Air Traffic Procedures. Effort will analyze the current process and develop recommendations for process standardization and improvement.	AJV	AJG	<i>Completed</i>
<u>Implementation Plan</u> – A plan of work activities to implement improved and streamlined, re-engineered environmental analysis of civilian airspace and air traffic procedures.	AJV	AJG	2012
<u>Update environmental guidance in ATO Airspace and Procedures Order</u> – Revision of Order 7400.2G chapter 32, to ensure consistency with proposed process improvements.	AJV		2012
<u>Develop ATO NEPA Order</u> – Develop separate ATO order providing policies and procedures for compliance with NEPA.	AJV		2013
<u>Update Airports NEPA Order (5050.4B) and supporting Desk Reference</u>			
<u>Office of Airports Guidance</u> - Policies and procedures for compliance with NEPA. To be revised for consistency with Order 1050.1E update and emerging environmental issues.	ARP	AEE	2013-2014

Best Practices

Best practices are often the bridge between policies and actions. Best practices can make a substantial contribution to effective, efficient, and timely environmental reviews. An Environmental Management System (EMS) framework is a key management technique and a NextGen Operational Improvement that is being used to improve the integration of environmental performance into the planning, decision-making and operation of NextGen to achieve environmental protection that allows sustained aviation growth. EMS provides the foundation for improving NextGen’s environmental performance and NEPA reviews, as well as data management. CEQ has recognized the benefits of aligning the complementary processes of EMS and NEPA, and has issued guidance encouraging Federal agencies to do so.⁵

Best Practices include the following considerations:

- Effective use of EMS
- Integration of NextGen planning and NEPA processes to avoid inconsistencies between timelines
- Innovative approaches to accelerate environmental reviews, consistent with law and regulations governing NEPA
- Improvements in data management, tracking, and sharing
- Use of a team approach on complex projects.

Tasks:

Task Name	OPR	Supporting Office	Time Frame
Develop and Implement NextGen EMS			2010 - 2015
<u>Conduct Initial NextGen EMS Pilot Studies</u> – Studies at several airports to develop approaches for identifying environmental constraints as well as plans to manage the constraints.	AEE		2010 - 2011
<u>Conduct Second Phase of NextGen EMS Pilot Studies</u> – Multi-stakeholder studies to evaluate synergies and potential collaboration to address NextGen environmental impacts.	AEE		2011 - 2012
<u>Environmental Evaluation of NextGen Capabilities</u> – As part of NextGen EMS effort to integrate environment into decision-making and facilitate improved NEPA compliance, this is an evaluation of NextGen capabilities and their potential environmental and NEPA implications.	AEE		2011 - 2015
<u>Update FAA EMS Order</u> – The Order establishes an agency network of EMS experts and will be updated to reflect NextGen.	AEE		2011-2012
<u>Integrate NextGen Environmental Objectives and Targets into FAA EMS</u> – Work with FAA EMS coordinators to integrate aviation environmental goals into existing Environmental Management Plans.	AEE		2011-2012

⁵ *Aligning National Environmental Policy Act Processes with Environmental Management Systems: A Guide for NEPA and EMS Practitioners*, Council on Environmental Quality, April 2007.

Improve Data Management, Tracking, Sharing			2011 - 2015
<u>FAA NEPA Practitioner Website</u> – Develop an employee website to facilitate improved data reporting and information exchange, and provide links to NEPA resources.	AEE		2011 - 2012
<u>NextGen EMS Data Management Approach to Enhance Environmental Planning</u> – This will identify data, information requirements, and distribution protocols to support the NextGen EMS.	AEE		2011 - 2015
<u>NextGen EMS Portal</u> – A website will be developed for stakeholders to exchange information and access environmental data.	AEE		2011 - 2015
<u>Best Practices Guidance</u>			2012 - 2015
<u>Guidance Memos</u> – FAA will prepare guidance memos on emerging topics or where additional clarification is needed to facilitate efficient NEPA compliance.	AEE		As needed
<u>Airports Best Management Practices</u> – ARP will revise and keep up to date its current listing of Best Practices for Environmental Impact Statement (EIS) Management to facilitate efficient NEPA compliance, and expand best practices to address management of environmental assessments.	ARP		2012 and as needed thereafter

Consultation and Coordination

Effective communications and coordination of intertwined responsibilities among all parties involved in NextGen are vital to success. This is true for environmental reviews as well. The focus of the NEPA plan in this area is on both internal and external coordination. Internally, the intent is to improve and facilitate consultation and coordination across FAA organizations having NEPA responsibilities associated with NextGen, including policy, operational, and legal responsibilities. Externally, communications and coordination will be addressed with NextGen stakeholders who submit proposed actions to the FAA which require NEPA review, who may also engage in providing environmental information or environmental assessments to the FAA, who have an interest in actions proposed by FAA, and who depend on efficient and timely FAA environmental reviews to take actions of their own.

Consultation and Coordination improvements include the following considerations:

- Improvements in processes and efficiencies across FAA as a high level NextGen strategic issue
- Improved coordination among NextGen planners and decision makers and NEPA staff
- Communication and consultation improvements among NEPA managers and staff, using the FAA Environmental Network and other mechanisms
- Systematic approach to disseminating guidance and best practice information
- Greater emphasis on NextGen stakeholder communications and coordination for common understanding of NEPA requirements and efficient approaches to environmental reviews

Tasks:

Task Name	OPR	Supporting Office	Time Frame
Consultation & Coordination			2010 - 2015
<u>Develop Standard NextGen EMS Collaboration Approaches with FAA Organizations</u> – As part of the NextGen EMS framework, develop protocols for collaboration on environmental issues to facilitate and improve NEPA compliance.	AEE		2010 - 2015
<u>Implement NextGen EMS Communications Strategy</u> – As part of the NextGen EMS framework, develop internal and external communications strategies to facilitate and improve NEPA compliance.	AEE		2010 - 2015
<u>Optimization of Airspace and Procedures in the Metroplex (OAPM) Project</u> – OAPM is an expedited approach, involving coordination with both internal and external stakeholders, for integrated airspace and procedures efforts. These reviews consider environmental impacts and NEPA review requirements throughout the planning process.	ATO		2010 - 2015
<u>NAV-Lean</u> – A plan developed by a cross agency workgroup for improving and streamlining the implementation of Instrument Flight Procedures (IFPs). It has identified 21 recommendations, several of which relate to improving the environmental review of IFPs which are incorporated into this plan.	ATO & AVS		2011 - 2015

Strengthen FAA Environmental Network			2011 - 2012
<u>FAA NEPA Practitioner Website</u> – Website will have multiple capabilities including a NEPA document archive for information coordination and access, as well as other resources	AEE		2011 - 2012
<u>Update Environmental Network Order</u> – The Environmental Network Order establishes an agency network of experts on environmental issues. The Order will be updated to reflect needs of NextGen integration.	AEE		2011 - 2012
Stakeholder Communications			
<u>Review NEPA Plan with Stakeholders</u> – Review and revise this NEPA plan to ensure it adequately reflects actions and coordination necessary to facilitate NEPA completion.	AEE		2012
<u>FAA NEPA Website</u> – A public website with links to FAA NEPA policy and guidance, and other related documentation.	AEE		2011 - 2012

Resources and Training

NEPA reviews are performed by the FAA’s Lines of Business, with policy guidance and technical assistance by the Office of Environment and Energy and legal advice from the Office of the Chief Counsel. The number of skilled NEPA practitioners within each Line of Business needs to correspond with the volume and complexity of NextGen NEPA reviews. Under CEQ regulations, primary NEPA functions must be retained by a Federal agency and cannot be delegated to stakeholders or consultants—although consultant and stakeholder performance of permitted tasks remains vital as well. NEPA practitioners must be capable of preparing environmental documents effectively. High quality analytical tools are important resources needed to complement staff. Training in NEPA practices and in use of analytical tools will improve skills across FAA.

Resources and Training include the following considerations:

- Assure an FAA workforce with adequate number of skilled and trained NEPA practitioners to support NextGen
- Use contractor support and stakeholder roles effectively and as allowed under CEQ regulations, including funding of contractor support from sources allowed under FAA authorizing legislation
- Establish an environmental analysis lab within FAA to improve in-house technical capability and provide training
- Bring next generation environmental analysis models on line, with capabilities to perform integrated analysis for aviation noise and emissions
- Improve environmental screening tools and capabilities
- Provide training for NEPA, new NextGen NEPA guidance and innovative processes, and environmental analytical tools

Tasks:

Task Name	OPR	Supporting Office	Time Frame
Resources			
<u>Establish Environmental Analysis Lab</u> – Laboratory will be used for environmental modeling and training.	AEE		2011
<u>Increase Number of Trained NEPA Practitioners to Support NextGen</u> – Adding staff and/or training existing employees on NEPA requirements and compliance process.	FAA		2011 - 2015
Improve Environmental Analysis Tools			
<u>TARGETS Integration with AEDT</u> – TARGETS is used to design flight procedures. This integration will allow procedure developers to evaluate environmental implications of potential procedures early in the design process.	AEE	AJV	2011-2012

<u>AEDT Regional Version Release for Air Traffic</u> – Aviation Environmental Design Tool (AEDT) uses state of the art calculation and data to evaluate noise and emissions impacts in an integrated manner. Release AEDT the with regional analysis capabilities to support NextGen air traffic NEPA compliance. AEDT will replace ATO’s Noise Integrated Routing System (NIRS).	AEE	AJV	2012
<u>Enhance Noise Screening</u> – Revise guidance and process for noise screening for NextGen capabilities and operations.	AJV	AEE	2011
<u>Enhance NIRS Screening Capabilities</u> – The Noise Integrated Routing (NIRS) Screening Tool (NST) is used for a small number of procedures. Tool will be upgraded to align with revised guidance and process for environmental screening for NextGen capabilities and operations..	AJV	AEE	2012
<u>Develop a Screening Tool for AEDT</u> – This would develop a screening function within AEDT tool that will replace NST.	AJV	AEE	2013
<u>Develop Environmental Pre-Screening Filter</u> – This task will develop a pre-screening filter to be incorporated into the planned web-based IFP portal.	AJV	AEE	2012-2015
Training			
<u>Environmental Forum</u> – Annual training to disseminate environmental information across FAA Lines of Business	AEE		Annually
<u>Airport Recurrent Environmental Training</u> – Annual training provided on Airport environmental review process.	ARP		Annually
<u>Airports NEPA Training Course</u> – Redevelop the Airports NEPA training course previously given through the FAA Academy	ARP		2012-2013
<u>Operations Support Group (OSG) Airspace Environmental Conference</u> – Annual training provided on ATO environmental review process	ATO		Annually
<u>FAA policy course on updated 1050.1E</u> – Training on new elements of revised Order 1050.1E.	AEE		2013 - 2015
<u>ATO Electronic NEPA Training Course</u> – Online NEPA training course for ATO personnel.	AJV		2011
<u>ATO Training on Reengineered NEPA Process and Guidance</u> – Training on the revised NEPA review process for IFPs.	AJV		2012
<u>AEDT Regional Training</u> – Training on AEDT capabilities for modeling regional impacts.	AEE		2012

Acronyms:

AEDT – Aviation Environmental Design Tool

AEE – Office of Environment and Energy

AJV – Mission Support Services

ARP – Office of Airports

ATO – Air Traffic Organization

CEQ – Council on Environmental Quality

EMS – Environmental Management System

IFP – Instrument Flight Procedure

NEPA – National Environmental Policy Act

MSS – Mission Support Services

OPR – Office of Primary Responsibility

RNAV/RNP – Area Navigation/Required Navigation Performance