

# STATUS OF GAP ANALYSIS

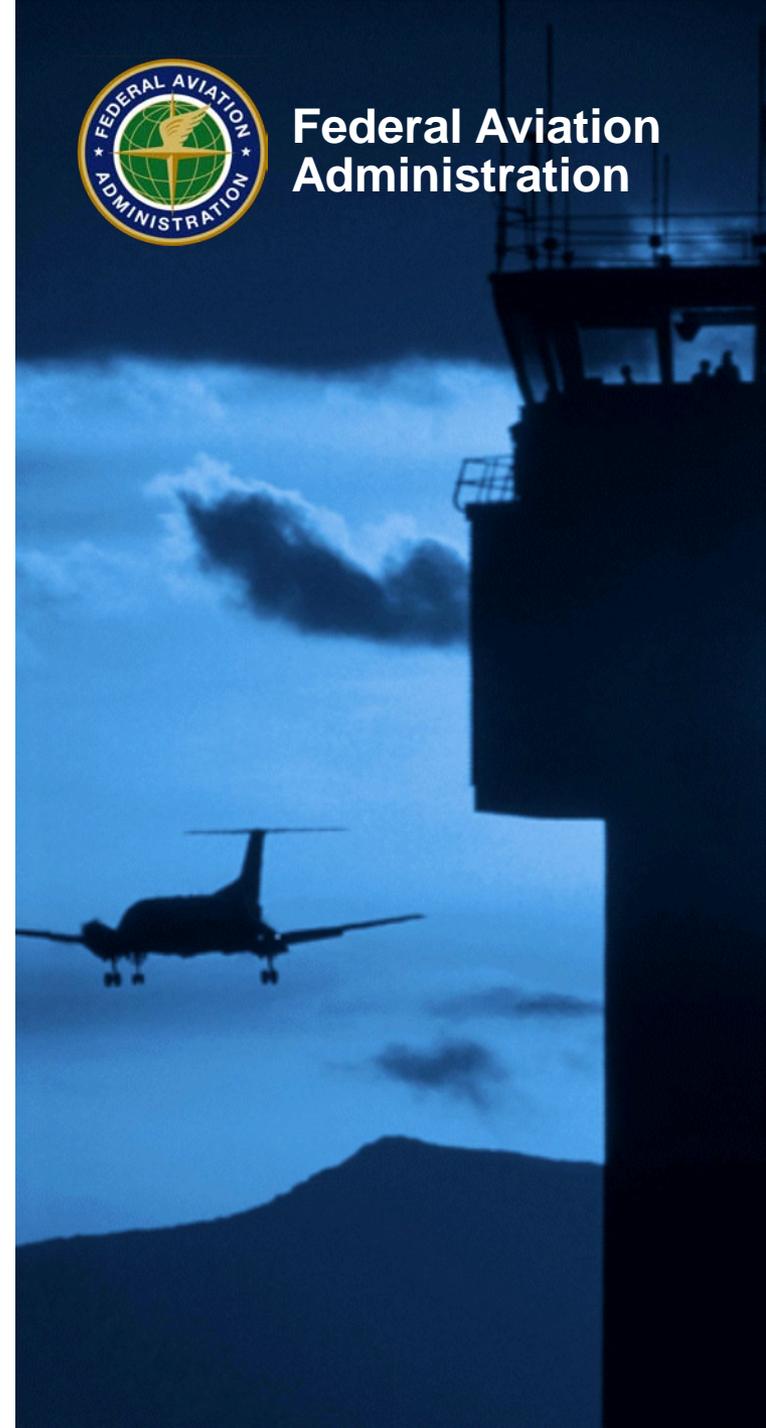
## Joint Interagency Weather Research Meeting Review

By: FAA, AJP-6810

Date: July 19, 2010



Federal Aviation  
Administration



# GAP ANALYSIS OVERVIEW

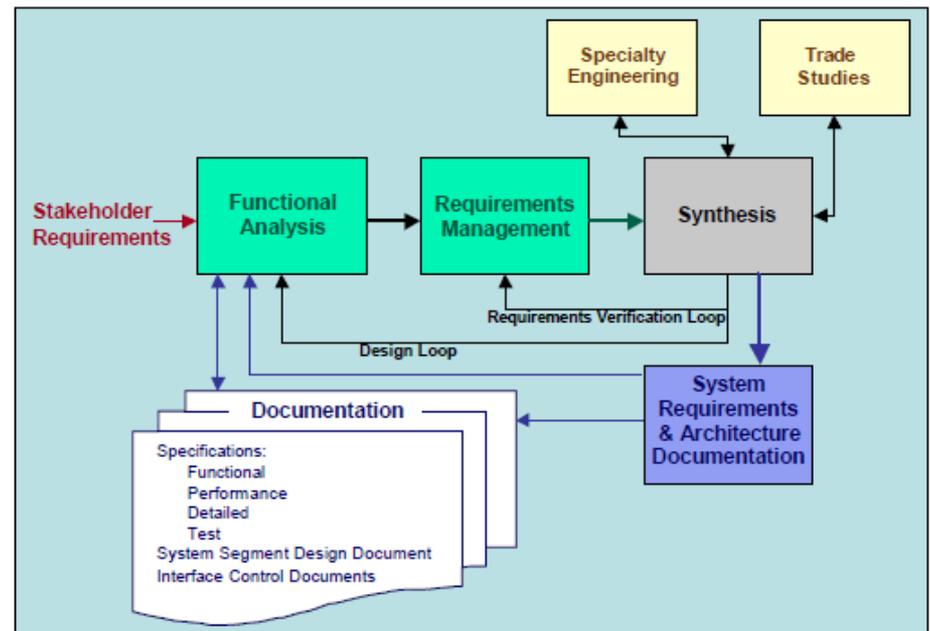
Definition: The Identification Of Gaps Between Current and A Future or Desired State.

Types Of Gap Analysis:

- Technology – Analysis Of Gaps Between Underlying Technologies (Models, Algorithms)
- Service Capability – Analysis Of Service Capability Gaps
- Requirements – Analysis of Identified Gaps In Requirements

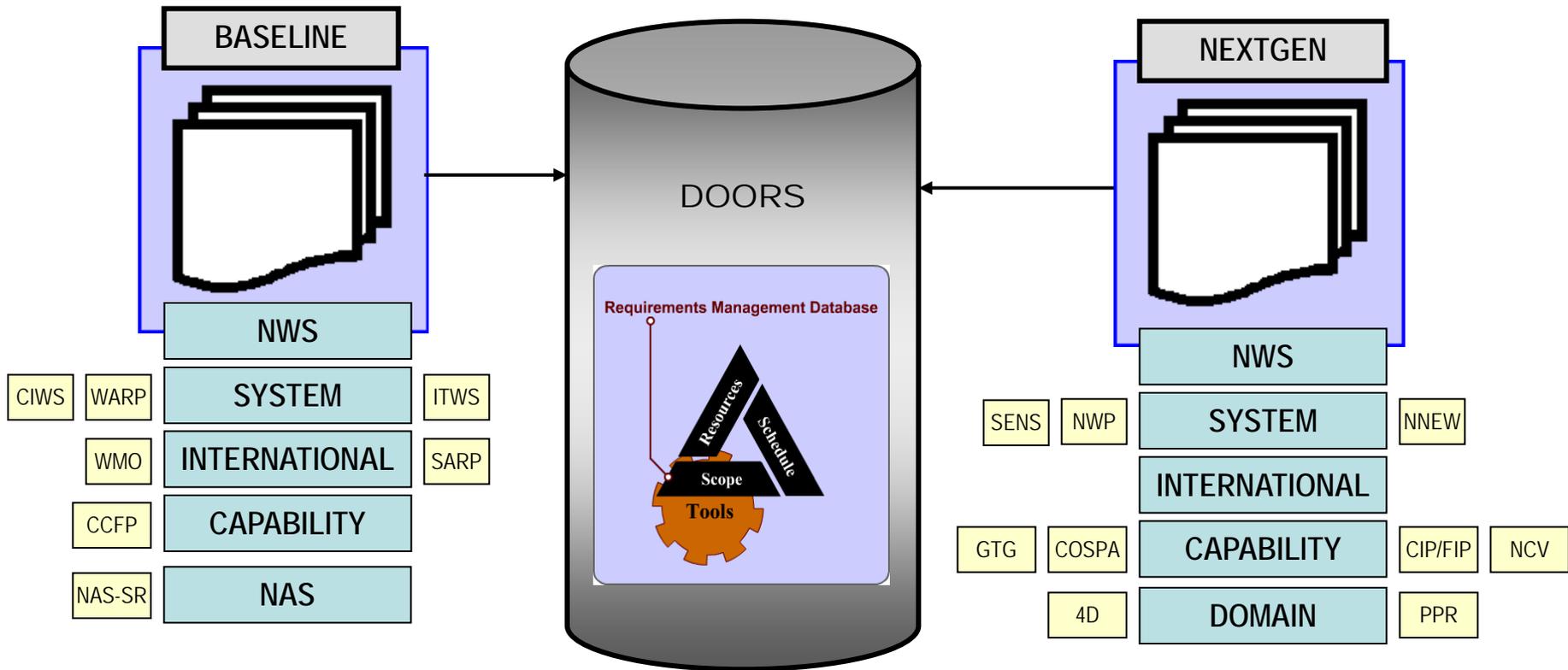
Requirements Gap Analysis Is Part of The FAA Systems Engineering Requirements Management Process.

Requirements Management Seeks To Identify And Develop All Requirements And Ensure That They Are Met Throughout The Product's Lifecycle. It Involves Analyzing Requirements So That Clear, Unambiguous, Traceable, And Verifiable Requirements Are Produced.



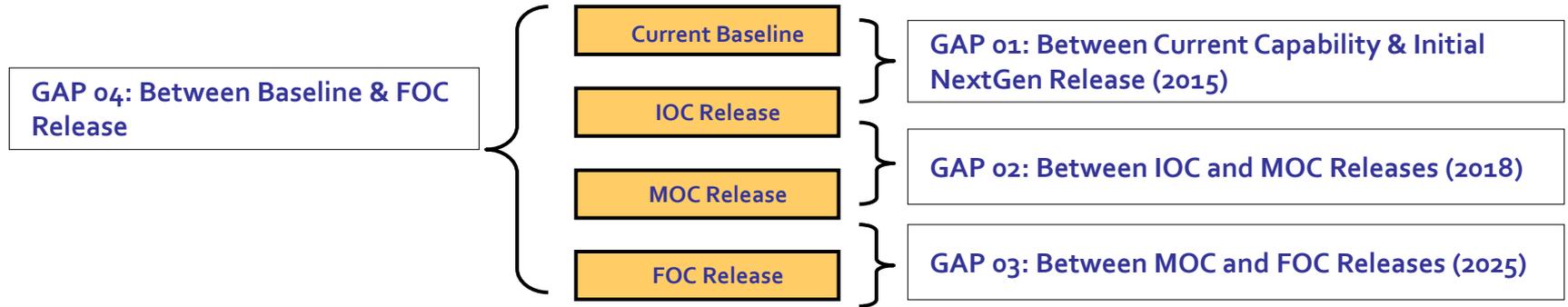
# REQUIREMENTS GAP ANALYSIS

Requirements Gap Analysis Begins With Establishing A Repository of Current and Future Requirements. The AWG Weather Requirements Repository Will Consist Of Requirements From Several Sources. It Will Serve As The Repository For All NextGen Weather Requirements

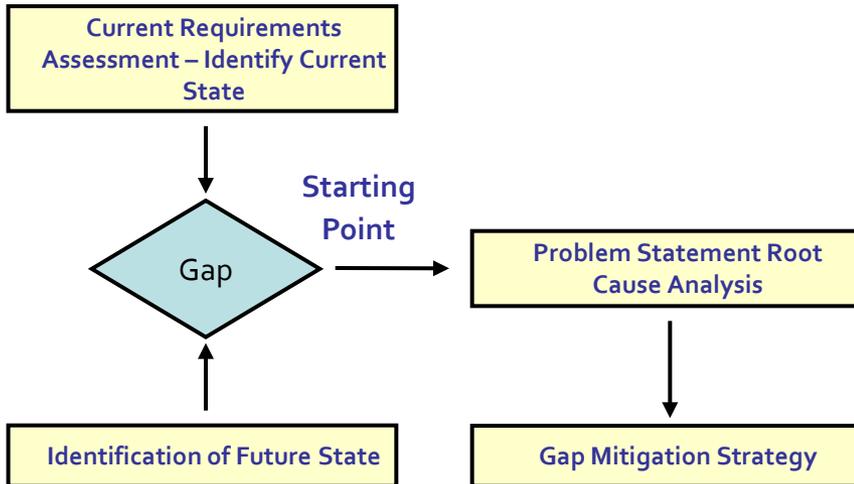


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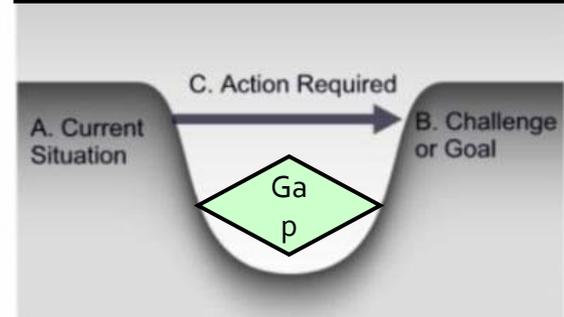
Definition: The Identification Of Gaps Between Two or More Weather Requirement Baselines.



End State	Current State	Gap Analysis	Actions
... Spatial Resolution Shall Be 5 km	... Spatial Resolution shall be 6 km	Gap: 1 km Spatial Resolution Performance: 16% Resolution Improvement	Assign to Research, Feasibility Study, etc.



A gap is sometimes spoken of as "the space between where we are and where we want to be." Gap analysis is undertaken as a means of bridging that space.



# GAP ANALYSIS – OPERATIONAL CAPABILITIES

The Initial Gap Analysis Will Focus On Current Operational Capabilities, Which Are Solutions To Needs Or Shortfalls In The NAS (Convective Weather Forecasting Capability, Turbulence Prediction Capability, Etc).

01. Temporal Resolution Increment

02. Spatial Resolution

03. Spatial Accuracy

04. Latency

05. Accuracy Percentage

06. Horizontal/Vertical Range

07. Temporal Accuracy

08. Detection Efficiency

Identify And Remediate Gaps Between "As-is" And "To-be" NAS Weather Technologies



IN-FLIGHT ICING



TURBULENCE



CEILING & VIS



CONVECTION



VOLCANIC ASH



# PLANNED ACTIVITIES / STATUS

- Incorporate Full Set of FOC Requirements Into Database – 07/30/10**
- Complete Requirements Baseline Activities – 8/30/10**
- Complete Gap Analysis Between Baseline (Current) and FOC Capabilities – 09/30/10**
- Import Midterm Requirements Into Database – 07/30/11**
- Complete Gap Analysis Between Baseline and MOC Capabilities – 09/30/11**

# QUESTIONS / COMMENTS

