

NAS Enterprise Architecture

Infrastructure Roadmaps v19.1



BASELINE

May 2025



Infrastructure Roadmap Overview

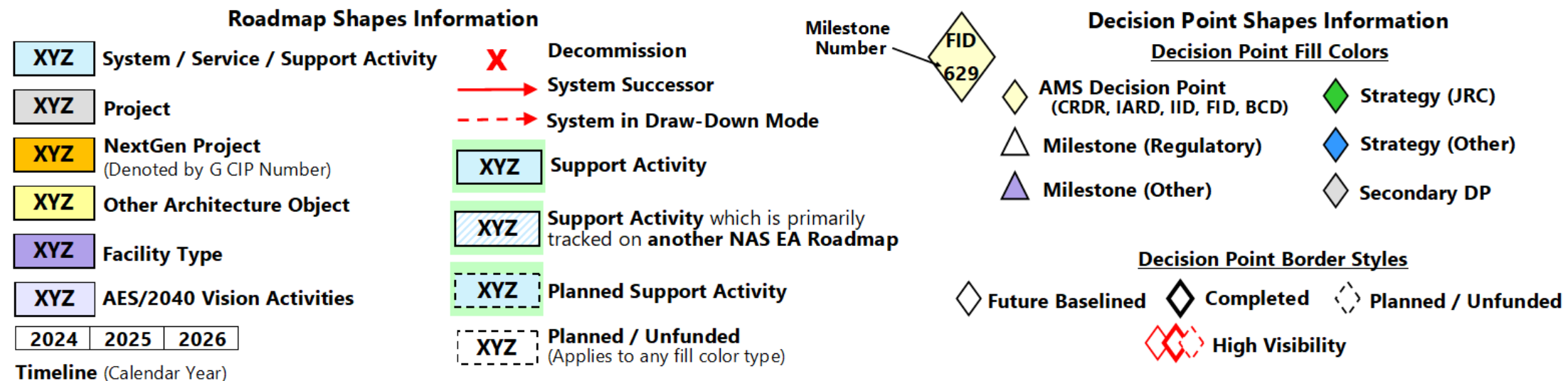
What are the Infrastructure Roadmaps?

- The FAA Infrastructure Roadmaps show the progression of system deployments, investments, and key decision points for major NAS acquisitions. They depict the acquisition strategy to evolve the NAS from the As-Is to the To-Be environment.
- The Infrastructure Roadmaps show all Capital Investment Plan (CIP) investment projects and systems identified in the NSIP that will deliver the necessary functionality to enable OIs and BTIs.

Guidelines for Understanding the Roadmaps

- The Infrastructure Roadmaps are organized by Domain (Automation, Communication, etc.) and depict projects, systems, services, decision points, and support activities.
- The timeline is in calendar years and shows a 17-year outlook.
- The roadmaps have swim lanes for Infrastructure (white), Support Activities (green), and Platform/Compute (purple).
- The DP diamonds represent the quarter in which a decision will occur.
- The Support Activity bars represent the dates that work is being performed on the activity.
- The Project bars represent the dates that CIP funding is allocated to a project.
- The System and Service bars represent the dates that a system or service is operational, with red lines indicating sustainment, drawdown, or convergence

Infrastructure Roadmap Legend

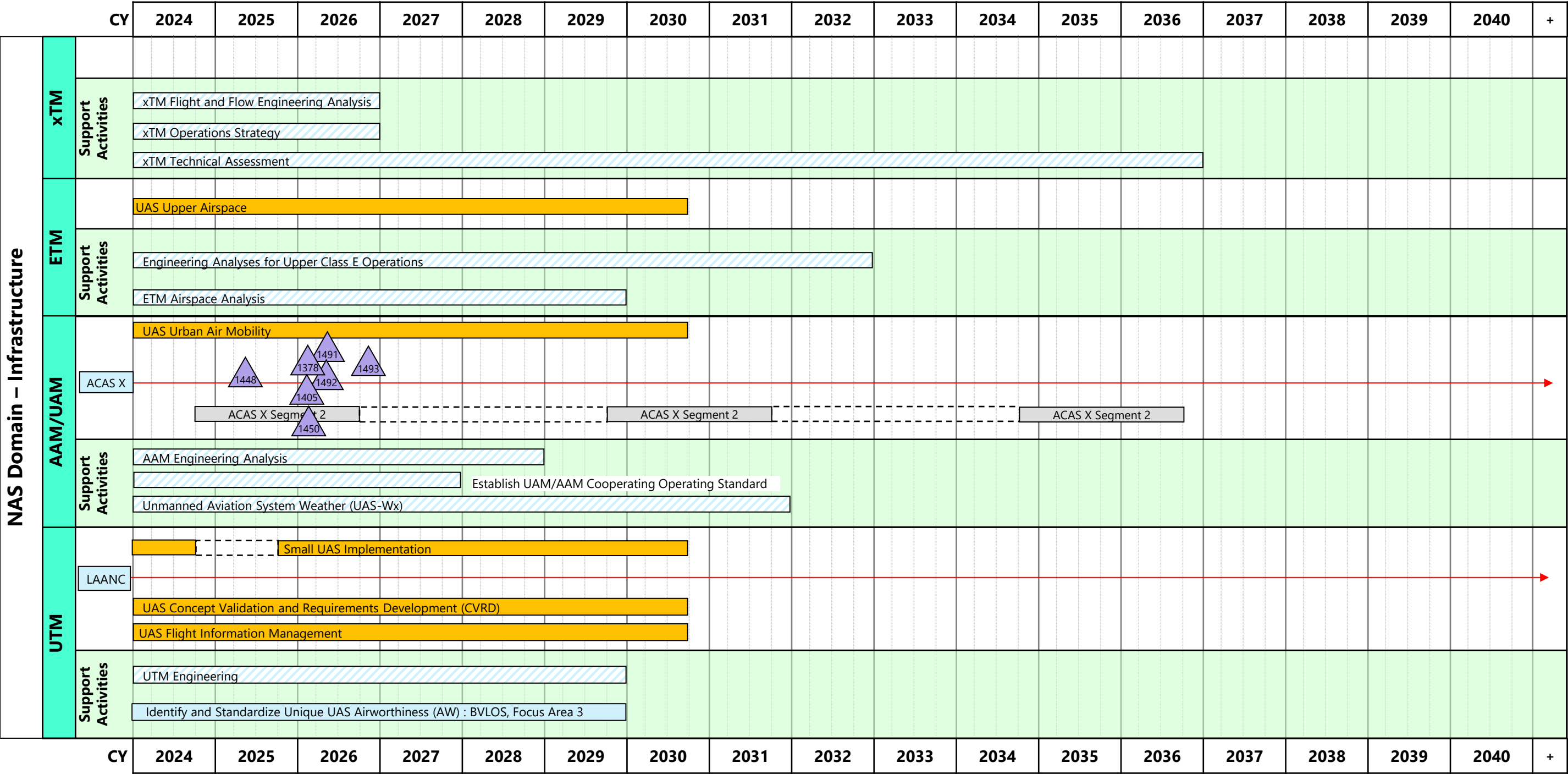


Extensible Traffic Management (xTM)

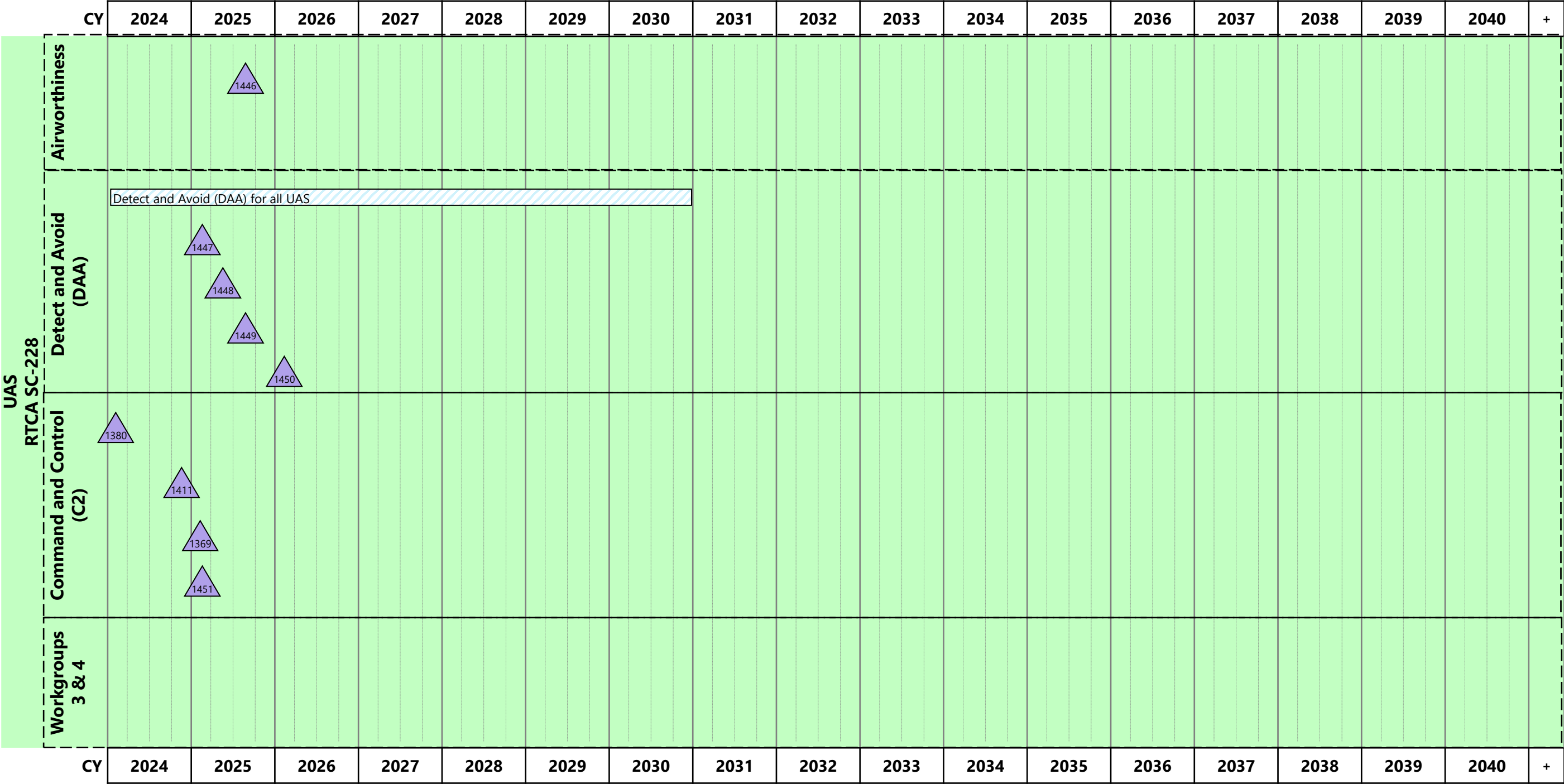
The Extensible Traffic Management (xTM) Roadmaps provide a consolidated timeline of activities and investments, both active and planned, required to integrate diverse operations into the NAS. The current iteration of the roadmaps reflect initial pre-implementation efforts and AMS acquisitions.

Extensible Traffic Management (xTM) Roadmap (1 of 2)

NAS Domain – Infrastructure



Extensible Traffic Management (xTM) Roadmap (2 of 2)



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Extensible Traffic Management (xTM): Assumptions

| Identifier | Description |
|------------|---|
| NE-01 | NSIC Implementation is dependent on TFMS/ ERAM/ STARS development bandwidth |
| NE-02 | The Authoritative references used to populate the CY2019 UAS roadmaps are: <ol style="list-style-type: none">1) "Integration of Civil Unmanned Aircraft Systems (UAS) in the National Airspace System (NAS) Roadmap" (July 2018)2) CIP data provided by AFN and Draft CIP FY 2020 – FY20243) UAS Integration Research Plan (2017 – 2022)4) Other NAS Infrastructure Roadmaps5) UAS Stakeholder inputs |
| NE-03 | Although impacted NAS systems are identified and documented in "Integration of Civil Unmanned Aircraft Systems (UAS) in the National Airspace System (NAS) Roadmap" (July 2018), requirements allocations have not been discussed and accepted by the organizations that manage the impacted systems. Upon coordination and decisions made about UAS requirements allocation, ANG-B intends to update this roadmap to depict acquisitions that will deliver UAS-related requirements in the future. |
| NE-04 | Research and Development: The full scope of research and development activities are too numerous and complex to depict on this format of the roadmaps. Roadmap stakeholders are encouraged to reference pages 10, 35 and 38 of "Integration of Civil Unmanned Aircraft Systems (UAS) in the National Airspace System (NAS) Roadmap" (July 2018) to understand the full scope of FAA UAS R&D efforts. |

Extensible Traffic Management (xTM) Roadmap: Decision Points (1 of 1)

| DP # | Target Date CY | Primary Domain | Type | Name |
|------|-------------------|----------------|-----------------|---|
| 1369 | 2025 Q1 | Aircraft | Other Milestone | C2 Link MOPS for Cellular Networks |
| 1380 | 2024 Q3 | Aircraft | Other Milestone | DO-406 - Minimum Operational Performance Standards for Ultra High Frequency Airborne Radio Systems Supporting UAS C2 Link Systems |
| 1405 | 2026 Q1 | Aircraft | Other Milestone | Minimal Operational Performance Standards (MOPS) for ACAS Xr |
| 1411 | 2024 Q4 | Aircraft | Other Milestone | C2 Link MOPS (Terrestrial) (DO-362B) |
| 1446 | 2025 Q3 | Aircraft | Other Milestone | MASPS: Navigation for Automatic Taxi (DO-VVV) |
| 1447 | 2025 Q1 | Aircraft | Other Milestone | DAA MOPS (DO-365C Change 1) |
| 1448 | 2025 Q2 | Aircraft | Other Milestone | DAA Radar MOPS Update (DO-366B) |
| 1449 | 2025 Q3 | Aircraft | Other Milestone | MASPS for DAA Supporting Taxi Operations (DO-WWW) |
| 1450 | 2026 Q1 | Aircraft | Other Milestone | DAA MOPS (DO-365D) |
| 1451 | 2025 Q2 | Aircraft | Other Milestone | RTCA Report (RR) for Users of DO- 377B for Deriving C2 Link System Requirements |
| 1491 | 2026 Q2 | Aircraft | Other Milestone | Minimum Operational Performance Standards (MOPS) for Cooperative Surveillance Systems |
| 1492 | 2026 Q2 | Aircraft | Other Milestone | Minimum Operational Performance Standards (MOPS) for ACAS Xu Revision A DO386(A)/ED275(A) |
| 1493 | 2026 Q4 | Aircraft | Other Milestone | Guidance for Validation of Collision Avoidance Systems |