Youngstown Business Incubator Request for Proposal

Title: Advanced Air Mobility/Unmanned Aircraft System Traffic Management Regional Market Readiness and Launch Requirements Analysis

Issued By: Youngstown Business Incubator (YBI)

Date Issued: April 1, 2025

Proposal Due Date: May 16, 2025, 5PM EST

1. INTRODUCTION

The Youngstown Business Incubator (YBI) is soliciting proposals from qualified firms or individuals to conduct a regional analysis of the market conditions supporting the emerging Advanced Air Mobility (AAM) industry. The analysis will focus on market readiness - the study of near-term use cases, their economic justification, infrastructure needs, policy gaps, and an actionable implementation plan for selected use cases. In addition, the study will include a preliminary review of the region's potential to participate in the AAM supply chain including breakdown on AAM enabling components and relevant regional industry capabilities.

Specifically, YBI is interested in the nearest-term applications and opportunities within AAM/UTM that are justifiable by standard market assessment metrics (judging by the region of interest economic and industrial demographics).

The selected Offeror will collaborate closely with YBI, relying on the organization for data gathering, workshop facilitation, and stakeholder engagement. YBI will depend on the Offeror to design an effective data collection methodology to inform the analysis and the deliverable of a final report.

2. BACKGROUND

Advanced Air Mobility (AAM) represents a transformative opportunity for regional economies, enabling new transportation solutions using electric vertical takeoff and landing (eVTOL) aircraft, drones, and related technologies such as Unmanned Traffic Management Systems (UTM). YBI aims to position the region as a leader in this emerging sector by identifying near-term opportunities, infrastructure gaps, and policy initiatives needed to support AAM growth.

The purpose of this study is to better understand AAM's potential impacts and create a clear implementation roadmap for select use cases that align with regional economic development priorities and its rich capabilities in materials, engineering and manufacturing.

The Region of Interest (Region) for this study includes the Northeast Ohio counties of Ashtabula, Columbiana, Geauga, Lake, Mahoning, Portage, Stark, Trumbull and those Western Pennsylvania counties symbiotic with the Mahoning Valley.

3. SCOPE OF WORK

Taking into account the participation of YBI and other project participants in the planning and execution of data gathering, the selected Offeror will complete the following tasks:

Task 1: Economic Impact & Market Readiness Analysis

- Conduct an analysis of the anticipated economic impact of the AAM/UTM industry on the economy in the Region including business models supporting sustained adoption.
- Identify near-term AAM use cases (e.g., first responder, cargo delivery, precision agriculture, passenger transport, infrastructure inspection) including market justification (referencing cities, towns districts, etc.) narrowing the analysis to the most promising implementations. Of specific interest are use cases where a 1:N control capability disrupts the economic justification of the application.
- Assess potential effects on job creation, business opportunities, workforce requirements, and regional GDP.

Task 2: Supply Chain Assessment

- Evaluate the impact of AAM/UTM on the regional supply chain, including existing strengths, gaps, and opportunities.
- Provide a brief on the critical components enabling AAM (vehicles and support infrastructure) highlighting those of strategic importance
- Identify key industry sectors and businesses that could support AAM/UTM models and use cases identified in this survey and those that can address supply chain needs.

Task 3: Infrastructure and Policy Gap Analysis

- Assess existing infrastructure in the Region (e.g., airports, vertiports, energy systems) and determine necessary upgrades or new developments to support AAM/UTM operations.
- Outline gaps, key milestones for required investments, and potential stakeholder setbacks to successful implementation of these use cases.

Task 4: Implementation Analysis

- Identify actionable steps required to enable implementation and execution of these near-term use cases (policy gaps, technology options, necessary approvals, etc.). Include an understanding of the buyer demographics, purchase decision criteria and funding mechanisms for near-term applications.

Expected Market Assessment Methods

Market modeling should utilize frameworks for projecting **Return on Investment (ROI)** such as **Total Addressable Market (TAM)** and **Serviceable Available Market (SAM)** or other arguments for the rational investment in infrastructure and services supporting AAM use cases. The focus should be on markets that exhibit both a demand for the product or service and an economic foundation to sustain a long-term, community-supported "leave-behind" business model. An example approach is outlined below:

Total Addressable Market (TAM):
Evaluate the total revenue potential of the Advanced Air Mobility (AAM) industry within the defined region and target community. This should provide a comprehensive estimate of the overall market size.

Serviceable Available Market (SAM):
Identify specific, actionable segments of the TAM that align with the local market's infrastructure and capabilities, ensuring they can support sustainable growth and adoption.

Competitive Analysis and Market Research:

1. **Market Research:**
   Leverage publicly available resources, industry reports, and local business directories to identify existing competitors and potential stakeholders in the AAM sector. Highlight potential industry and public-sector use cases that could be supported by local industries, communities, and government entities, ensuring a viable long-term business model.
2. **Customer Surveys and Interviews:**
   Conduct targeted outreach to state and local government representatives, residents, and local businesses to gather valuable insights about their needs, expectations, and potential applications of AAM and Unmanned Traffic Management (UTM) services.
3. **Foot Traffic Analysis:**
   Assess customer behavior, patterns, and engagement within areas identified as potential locations for AAM/UTM services. Provide detailed observations to inform deployment strategies and maximize adoption.

A structured approach ensures a thorough understanding of market potential, stakeholder dynamics, and community readiness to support the proposed AAM/UTM initiatives.

4. COLLABORATION AND DATA GATHERING

- **YBI Responsibilities:** YBI will support the Offeror in data gathering activities, including access to regional stakeholders, organizing and conducting workshops, and coordinating outreach to relevant organizations.
- **Offeror Responsibilities:** The Offeror will design the methodology for data collection ensuring alignment with the study's goals and requirements, participate in stakeholder workshops and interviews, and will collate the data and provide the final analysis and report.

Close collaboration between YBI and the Offeror will be critical to ensure comprehensive and actionable findings. *It is anticipated that this collaboration will be reflected in the efficiency of the project execution and cost.*

DATA PRIVACY CONCERNS

Data protection is paramount for YBI. The selected Offeror must adhere to strict data privacy protocols throughout the project. All gathered data, particularly from stakeholders and surveys, must comply with applicable data protection laws and regulations. The Offeror will be responsible for ensuring that sensitive information is handled securely, and that privacy is maintained in all reporting and analysis.

5. DELIVERABLES

The following deliverables are expected:

1. A written report outlining the economic impact of the AAM/UTM industry for the region with a focus on those use cases and opportunities with near-term justification (considering the availability of 1:N control systems and UTM for use cases of interest).
2. Supply chain assessment report, including regional capabilities, opportunities and gaps. (This can be quoted separately or as one study).
3. Infrastructure and business analysis with recommendations by use cases of interest.
4. An implementation roadmap for near-term AAM use cases of interest.
5. Presentation of findings to YBI and relevant stakeholders.

All deliverables must be provided in digital format (PDF and PowerPoint) and submitted by the agreed-upon deadlines.

6. PROPOSAL REQUIREMENTS

Proposals should include the following sections:

1. **Executive Summary**
    - Brief overview of the Offeror's qualifications and understanding of the project scope.
2. **Technical Approach**
    - Detailed methodology for completing each task (be sure to describe your structured approach such as TAM and SAM modeling in your methodology).
    - Approach to collaboration with YBI, including workshop design and data collection.

3. **Experience and Qualifications**
    - Relevant experience with economic impact and market studies, supply chain analysis, infrastructure assessments, or related projects.
    - Specific familiarity with AAM efforts in Ohio.
    - Specific familiarity with the Federal Aviation Administration (FAA) and any work conducted in collaboration with or under guidance of the FAA.
    - Profiles of key personnel involved in the project.
4. **Work Plan and Schedule**
    - Timeline for project completion, including milestones and deliverables.
5. **Budget and Pricing**
    - Detailed cost proposal, including fees, expenses, and payment schedule.
6. **References**
    - Contact information for at least three clients for whom similar work has been performed.

7. SELECTION CRITERIA

The review will be more heavily weighted for the Use Case and Implementation Analysis (80%) while the Supply Chain Analysis is understood to be preliminary (20%). These may be quoted separately with separate SOWs. Proposals will be evaluated based on the following criteria:

- **Understanding of Scope (25%)**: Demonstrated understanding of the AAM industry and project goals.
- **Technical Approach (30%)**: Feasibility, clarity, and effectiveness of the proposed methodology.
- **Experience and Qualifications (25%)**: Relevant expertise and past performance.
- **Cost (20%)**: Cost-effectiveness and clarity of pricing.

8. SUBMISSION INSTRUCTIONS

- **Deadline:** Proposals must be submitted by May 16, 2025 at 5PM EST.
- **Submission Method:** Submit proposals electronically in PDF or PowerPoint to sgaffney@ybi.org
- **Contact for Questions:** All inquiries related to this RFP should be directed to sganffney@ybi.org.

9. TIMELINE

Milestone	Date
RFP Released	April 1, 2025
Questions Due By	May 2, 2025
Proposals Due	May 16, 2025
Award Notification	May 30, 2025
Project Kickoff	June 13, 2025
Final Report Submission	NLT October 30, 2025

10. TERMS AND CONDITIONS

- YBI reserves the right to reject any and all proposals, waive irregularities, and award the contract in the best interest of the organization.
- All submitted proposals and deliverables become the property of YBI.
- Offerors are responsible for all costs associated with proposal preparation.

We look forward to receiving your proposals and partnering to advance the economic potential of the AAM industry in our region.

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