A Futures Report By

OMI FOUNDATION

Supported By

StartupTN

Skybound Tamil Nadu:

Unlocking the State's Potential in Advanced Air Mobility by 2030

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October 2025

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Foreword

Sivarajah Ramanathan
Mission Director and CEO, StartupTN

Tamil Nadu has rapidly emerged as one of India's most vibrant startup ecosystems. Anchored in a strong industrial base, world-class educational institutions, and a culture of innovation, the state provides fertile ground for entrepreneurs to build, scale, and compete globally. Its thriving startup ecosystem drives innovation across mobility, clean technology, aerospace, electronics, and digital services, establishing Tamil Nadu as a national and global hub for entrepreneurship and next-generation solutions.

At StartupTN, our mission is to empower these innovators by providing access to mentors, investors, industry partners, and platforms that accelerate growth. Among the most transformative opportunities today is Advanced Air Mobility (AAM) poised to redefine the movement of people and goods across urban, industrial, and logistics corridors. AAM enables startups to innovate in electric aircraft, autonomous systems, drone logistics, AI-powered traffic management, and connected mobility, creating high-value ventures, attracting global investment, and generating skilled employment.

Tamil Nadu offers an unparalleled ecosystem for startup innovation. Its industrial clusters, advanced manufacturing base, four international airports, three major ports, globally recognized knowledge institutions, and strategic urban-industrial corridors provide entrepreneurs with the infrastructure and expertise to pilot, test, and scale breakthrough solutions. By leading the way in AAM and next-generation mobility technologies, startups are developing faster, cleaner, and smarter transport solutions while contributing to high-value employment, investment, and a globally recognized innovation hub.

The report, '***Skybound Tamil Nadu: Unlocking the State's Potential in Advanced Air Mobility by 2030***', authored by **OMI Foundation** and supported by **StartupTN**, highlights the immense potential for startups and investors to leverage Tamil Nadu's innovation ecosystem, infrastructure, and policy support to shape the future of mobility. I am confident that through collaboration between government, industry, and entrepreneurs, Tamil Nadu will continue to lead India in fostering a vibrant startup ecosystem and unlocking the transformative promise of Advanced Air Mobility.

Foreword

Ambassador (Retd.) Gautam Bambawale
Managing Trustee,
OMI Foundation

Harish Abichandani
First Trustee,
OMI Foundation

Tamil Nadu has always been a state that leads from the front - whether in manufacturing, research, or the pursuit of inclusive growth. Today, as the world enters a decisive decade for clean and connected mobility, the state once again has the opportunity to chart a pioneering path. Advanced Air Mobility (AAM) is not a distant possibility but an emerging reality - one that promises to redefine the way people and goods move, while creating new industries, jobs, and opportunities for innovation.

At OMI Foundation, our conviction has always been that **India's growth story must be written with scale, speed, self-reliance, and synergy**. This report, ***Skybound Tamil Nadu: Unlocking the State's Potential in Advanced Air Mobility by 2030***, prepared by **OMI Foundation**, and supported by **StartupTN**, is an important step in that direction. It demonstrates with evidence and clarity how Tamil Nadu can extend its leadership in automotive and electric mobility to become India's first Advanced Air Mobility capital.

The findings are clear: by 2030, AAM can contribute significantly to the state's economy, generate thousands of high-skill jobs, strengthen tourism and industrial corridors, and deliver visible climate and congestion benefits. More importantly, it positions Tamil Nadu to capture **first-mover advantage in a global sector projected to exceed USD 100 billion by 2035**.

We are proud to have partnered with StartupTN, whose commitment to fostering entrepreneurship and innovation ensures that AAM will not remain confined to boardrooms or laboratories, but will translate into real opportunities for startups, small businesses, and local talent across the state.

This report is intended not just as a roadmap, but as a call to action. We invite policymakers, industry leaders, researchers, and citizens alike to see AAM as the next chapter in Tamil Nadu's development model - one that extends its leadership from roads to skies, and positions the state as India's gateway to the world.

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RETRO CAFE

Executive Summary

Tamil Nadu can unlock a ₹20,000 crore (~US$2.4B) Advanced Air Mobility (AAM) economy by 2030, creating between **1,800-4,800 high-skill jobs**, cutting **7-17 million kg CO_2** emissions, and saving **20-43 GWh** of energy annually. With the right roadmap, Tamil Nadu can cement its position as India's **gateway to Advanced Air Mobility** and a global hub for manufacturing, testing, and deployment.

What is AAM

Advanced Air Mobility (AAM) is not science fiction. It is a **clean, digitally managed aerial layer** for transport and logistics. Combining **electric Vertical Take-Off and Landing (eVTOL) aircraft** for passengers and **cargo drones** for freight, AAM connects cities, industrial hubs, ports, and airports, thereby complementing metros, buses, and highways with faster, congestion-free options.

Figure 1: View of futuristic drone; AI-generated

Why Tamil Nadu: The Strategic Case

Tamil Nadu has all the ingredients to pioneer AAM in India. Its industrial ecosystem, knowledge institutions, and infrastructure make it uniquely suited to become the first state where AAM moves from pilots to scale.

1. **Industrial depth**: As India's auto and EV capital, Tamil Nadu already manufactures the batteries, motors, power electronics, and lightweight materials needed for eVTOLs. Its aerospace and defence clusters further strengthen the base.
2. **Innovation platform**: IIT Madras, Anna University, and **StartupTN's incubator network** are nurturing drone and autonomous systems startups that can integrate into AAM supply chains.
3. **Infrastructure backbone**: With four international airports, three major ports, SEZs, and freight corridors, Tamil Nadu has natural anchors for both passenger and cargo AAM corridors.
4. **Real demand pressure**: Congestion in Chennai, inter-district commutes across, and Tamil Nadu's leadership in domestic tourism all create immediate markets for AAM.

What We Measured: Methodology at a Glance

To provide a credible basis for policymaking, **OMI Foundation built an in-house model** that translates Tamil Nadu's travel, tourism, and parcel flows into AAM demand scenarios for 2026-30. The model quantifies both economic outcomes and social/environmental benefits.

- ➢ **Daily Commute**: Long-distance (30 km+) commutes between residential hubs and industrial belts.
- ➢ **Domestic Tourism**: Premium religious and leisure circuits, where Tamil Nadu is India's #1 destination.
- ➢ **Cargo Logistics**: Express parcels, averaging 5 kg, linking ports, Inland Container Depots (ICDs), and logistics parks over 40 km hops.

Outputs are presented as **GSDP contribution, jobs created, value of time(VoT) saved, emissions avoided, and energy saved** across three scenarios, viz., Base, Medium, and High adoption.

Topline 2030 Results

The numbers are clear: AAM can become a **multi-thousand crore vertical within four years**.

- ➢ **GSDP impact:** Between ₹7,550 crore (Base adoption) and **₹20,150 crore** (High adoption)
- ➢ **Jobs created:** Ranging from 1,790 to **4,755 high-skill roles**, including engineering, UTM, vertiport operations, and Maintenance, Repair, Overhaul (MRO)
- ➢ **Value of time saved:** Estimated at ₹1,030 crore to **₹2,250 crore**
- ➢ **Emissions avoided:** Between 7.4 and **17.1 million kg of CO_2**
- ➢ **Energy saved:** Between 19.6 and **42.8 GWh**

Where is this value concentrated?

- ➢ **Tourism** dominates early, contributing 60-65% of GDP impact.
- ➢ **Daily commutes** strengthen industrial corridors with ₹1,200-2,600 crore in productivity gains.
- ➢ **Cargo logistics** scales fast, powered by 440 million parcels/year in Tamil Nadu.

Sectoral Benefits

The impacts of AAM are not confined to aviation; they ripple across business competitiveness, citizen welfare, and city systems.

- ➢ **Business competitiveness**: Drone corridors linking ports to ICDs compress dwell times, helping exporters in autos, textiles, electronics, and semiconductors.
- ➢ **User benefits**: Airport-city shuttles and long industrial commutes save hours where minutes matter. Tourists gain fast, predictable access to heritage and leisure circuits. Emergency medical logistics become quicker and more reliable.
- ➢ **City benefits**: AAM replaces peak-hour car trips on congested corridors, delivers visible CO_2 and energy savings, and acts as a connector between existing metro, rail, and bus systems.

Priority Corridors: Where to Start (2026-28)

The first phase of deployment must prove economics and public value. These corridors combine **clear demand**, **infrastructure anchors**, and **demonstration value**.

1. **Passenger (showcase & utility):** Chennai Airport - OMR/IT Corridor; Chennai - Mahabalipuram/ Puducherry; Madurai - Rameswaram; Coimbatore - Ooty.
2. **Industrial commute:** Chennai - Sriperumbudur/Oragadam; Coimbatore - Tiruppur; Hosur - Bengaluru.
3. **Cargo logistics:** Chennai/ Ennore/ Thoothukudi Ports to ICDs and SEZs; Oragadam - Airport/ Port; Palladam/ Sulur clusters to Coimbatore Airport.

The Way Forward: AAM Roadmap to 2035

Tamil Nadu has the potential to advance from vision to action through a clear roadmap that integrates policy, infrastructure, industry, and skilling.

1. **Policy & Governance**: Launch a TN-AAM Policy with a regulatory sandbox, safety and noise norms, and a multi-department Task Force.
2. **Infrastructure & Airspace**: Issue TN-specific vertiport guidelines; pilot a TN-UTM (unmanned traffic management) system for safe and interoperable flight management.
3. **Pilots to Prove Economics**: Start with two passenger and two cargo corridors, co-locating vertiports and drone hubs in airports, SEZs, and ports.
4. **Manufacturing & Innovation**: Anchor AAM manufacturing in Chennai - Hosur - Coimbatore clusters; align with StartupTN's AAM Innovation Challenge.
5. **Skills & Equity**: Partner with IIT-M, Anna University, and ITIs, among others, as well as the industry, to build a pipeline of pilots, operators, and technicians. Ensure early corridors serve public-good use-cases like medical logistics and disaster relief.

Guardrails: Build Trust Early

For AAM to succeed, **safety, noise, and equity are non-negotiable**.

- **Safety**: Align with DGCA, FAA, and EASA pathways; mandate transparent incident reporting.
- **Noise**: Publish corridor-level maps and enforce strict thresholds.
- **Equity**: Ensure that medical logistics, disaster relief, and integration with metros/buses are part of the first wave.

What We Need from Government Now

To seize first-mover advantage, Tamil Nadu has an opportunity to lead decisively.

1. **Green-light a TN-AAM Policy and Task Force** by 2026.
2. **Notify the first four corridors** (2 passenger, 2 cargo).
3. **Reserve land for 6-8 pilot vertiports and drone hubs** at airports, ports, and SEZs.
4. **Budget for sandbox pilots, UTM deployment, noise/ safety monitoring, and StartupTN innovation grants.**

Right Turn: Advanced Air Mobility could unlock a new vertical for Tamil Nadu's economy, delivering up to 10 times growth over its initial scale and positioning the state at the forefront of India's next mobility revolution. By 2030, Tamil Nadu can demonstrate to India, and the world, that **Advanced Air Mobility is real, viable, and scalable**. Moving first will cement its status as India's **AAM gateway**, anchor new high-skill industries, and open export pathways in components, systems, and services.

1. Introduction

Tamil Nadu stands at a pivotal moment in its mobility transition. The state's cities and industrial corridors are expanding rapidly, while road and rail networks - though critical - are nearing capacity. Daily commutes between residential hubs and industrial clusters routinely stretch productivity, logistics costs, and quality of life. To unlock its next growth frontier, Tamil Nadu has the opportunity to move beyond building more infrastructure, towards deploying smarter, faster, and cleaner systems. Advanced Air Mobility (AAM) - electric, digitally managed air taxis and drone logistics - offers such a complementary layer.

1.1. The Global Shift to AAM

Mobility systems worldwide are at an inflection point. As megacities expand, congestion already erodes 2-5% of GDP annually in lost productivity and wasted fuel (Asian Development Bank, Leather, 2022). In India, the transport sector contributes more than 12% of national CO_2 emissions, while vehicles consume nearly 70% of petroleum products, entrenching both economic and environmental risks (International Energy Agency & NITI Aayog, 2023).

Against this backdrop, AAM has emerged with the potential of a transformative frontier (OMI Foundation, 2024). Built on the convergence of electric propulsion, digital connectivity, and automation, AAM promises safe, sustainable, and efficient aerial mobility (World Economic Forum, 2025). Studies suggest air taxis could cut travel times on congested routes by up to 50% (Naser et al., 2021). In parallel, drone logistics are already reshaping last-mile delivery with speed, efficiency, and reduced emissions. India's drone market alone is projected to reach USD 1.39 billion by 2030 (Markets and Markets, 2025).

Globally, frontrunners such as Singapore, UAE, and South Korea are moving fast with pilots, enabling regulations, and investments in vertiports, signaling the maturity of AAM as a serious urban mobility solution. For India, where urbanisation is expected to cross 40% by 2030 (PIB, 2024) and congestion continues to mount, AAM is no longer a futuristic experiment but a timely necessity.

1.2. What is Advanced Air Mobility

Advanced Air Mobility (AAM) encompasses a new generation of electric, digitally connected aerial vehicles designed to move people and goods more quickly, cleanly, and flexibly than traditional road transport. Broadly, AAM comprises two families of services:

1. **Passenger AAM (air taxis and aerial shuttles):** Typically enabled by electric Vertical Take-Off and Landing (eVTOL) aircrafts - lightweight, and battery-powered that combine elements of helicopters, drones, and small airplanes.
2. **Cargo AAM (drone logistics):** Small- to medium-payload drones capable of transporting parcels, medical supplies, and high-value goods within and between cities.

1.2.1. eVTOLs at a Glance

To understand how AAM can become operational in Tamil Nadu, it helps to see what eVTOLs actually are.

Figure 2: eVTOL, a transformative shift in aviation technology

Source: DEWESoft, 2024

Electric Vertical Take-Off and Landing (eVTOL) aircrafts are the backbone of passenger Advanced Air Mobility (AAM). They combine innovations from aviation, drones, and electric mobility to offer a safe, clean, and efficient alternative to road and helicopter travel. Their feasibility depends on a few critical technical parameters, outlined below.

Table 1: Technical parameters of eVTOL

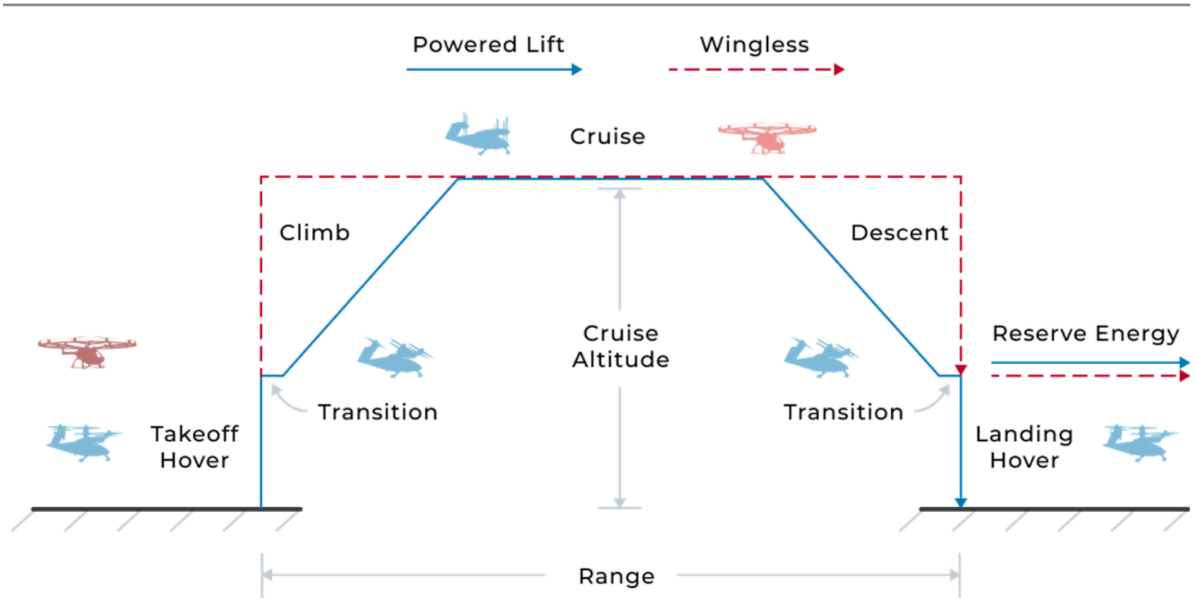
Parameter	Typical Range	Why It Matters
Cruise speed	150-250 km/h	Determines time savings and viable corridors
Range (cruise)	20-200 km	Defines airport - city, inter-district, or regional use cases
Passenger capacity	3-6 seats (initial)	Balances cost per passenger, vertiport size, and fleet operations
Propulsion architecture	Distributed electric propulsion (DEP), tilt-rotor/wing, lift + cruise formats	Impacts efficiency, noise, and redundancy

Battery energy density	~200-300 Wh/kg at cell level (vs. ~10,000+ Wh/kg for hydrocarbons)	Governs range and payload; drives infrastructure needs
Infrastructure requirements	Vertiports, charging/ battery swap systems, UTM (Unmanned Traffic Management), certification pathways	Dictates capex, regulatory approvals, and land-use planning

Sources: NASA eVTOL White Paper (2021); ICAO (2022); MIT (2021) and Cornell University (2022) eVTOL studies; DEWEsoft eVTOL Guide (2024).

These technical features, including performance targets - speed, range, payload - are central to demand and infrastructure modelling, allowing governments and industry alike to prioritise the adoption of AAM.

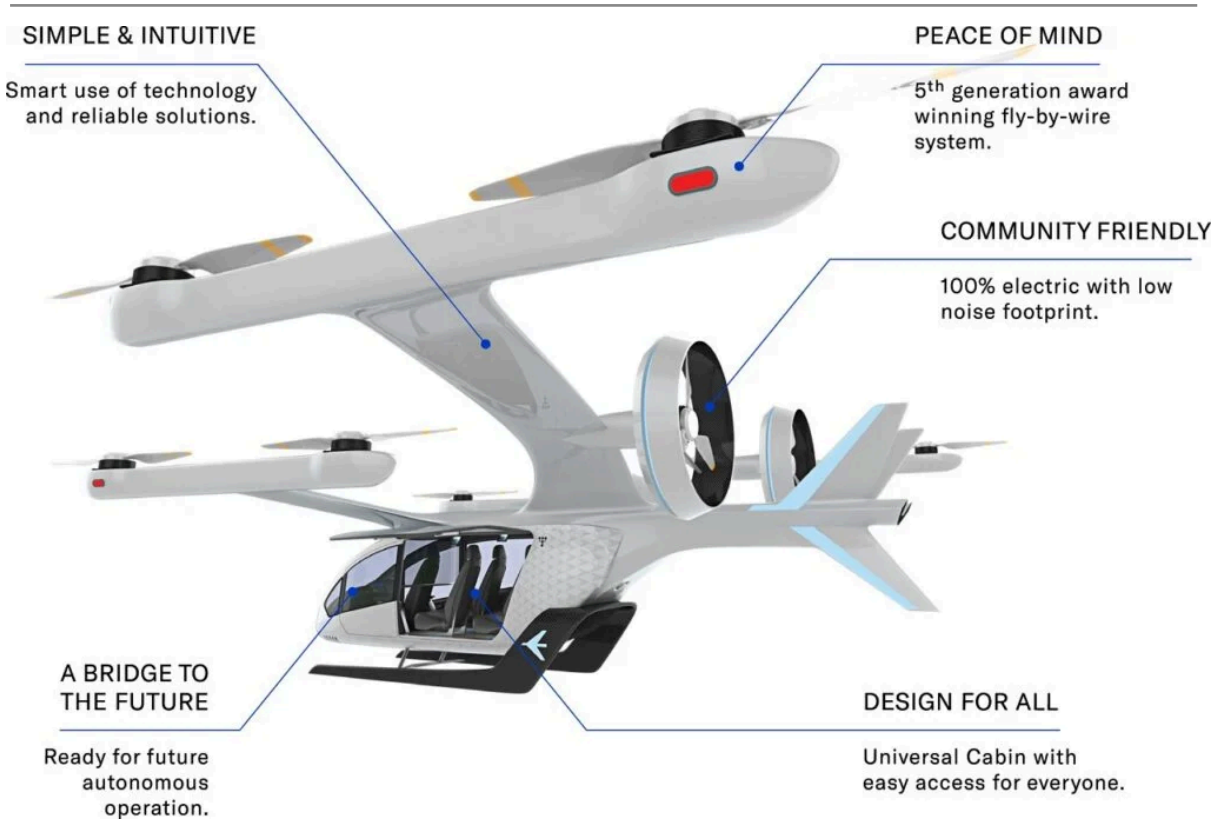
Figure 3: A representative profile of the powered lift and wingless eVTOL aircraft types



Source: Aerospace, MDPI, 2023

As diagrammed above, eVTOLs combine vertical lift capability (rotors or fans), forward propulsion (wings or tilt-rotor/tilt-wing designs), and battery-electric powertrains. Variations in lift-thrust architectures (e.g., lift + cruise, distributed lift, tilt-wing) all aim to balance efficiency, speed, noise, and safety.

Figure 4: A snapshot of eVTOL's benefits to the user and the city



Source: SFGate, 2019.

Overall, AAM's value proposition is simple: save hours where minutes matter, without tailpipe emissions, and with digital traffic management that scales safely.

1.3. Purpose of This Report

This report quantifies Tamil Nadu's near-term AAM opportunity across **daily commute, domestic tourism, and cargo logistics**, drawing on global benchmarks and state-specific demand patterns. It assesses potential contributions to GDP, job creation, emissions reduction, and energy savings by 2030, and sets out a roadmap to 2035.

AAM will not replace buses, metros, or highways. But anchored in Tamil Nadu's industrial corridors, tourism hubs, and logistics gateways, it can add a premium, high-value layer of connectivity that boosts productivity and positions the state as India's Advanced Air Mobility capital.

The following chapters demonstrate Tamil Nadu's AAM potential and opportunity.

2. The Global Outlook for AAM and Lessons for Tamil Nadu

2.1. Market Trends & Growth Drivers

Advanced Air Mobility (AAM) is moving rapidly from concept to commercialisation, spanning passenger air taxis, cargo logistics, and public service applications. The global market size of electric vertical take-off and landing aircraft (eVTOLs) and drone logistics exceeded **US$ 12.5 billion** in 2024, with investments led by players such as Joby Aviation, Archer, Volocopter, and EHang, among others. The market size is expected to reach US$ 15.6 billion in 2025 and around US$ 114.5 billion by 2034, at a compound annual growth rate (CAGR) of about 24.8% during the forecast period 2025 to 2034 (Custom Market Insights, n.d.).

Growth Drivers

1. **Urban Congestion:** Congestion costs 1-8% of GDP annually, pushing cities to explore aerial mobility as an efficiency lever (Caribbean United Nations, 2023; Hindustan Times, 2024; Suryawanshi, 2023).
2. **Green Aviation Demand:** Aviation accounts for ~2.5% of global CO_2 emissions; eVTOLs promise 50-70% lifecycle CO_2 savings compared to helicopters (European Union Aviation Safety Agency, 2025; International Energy Agency, 2024).
3. **Supply Chain Innovation:** E-commerce, healthcare logistics, and just-in-time manufacturing are accelerating demand for high-speed aerial delivery (Infosys BPM, 2023; Li, et. al. 2023; MDPI, 2024; Naser, et. al., 2023; World Economic Forum, 2024; Yin, Z., 2023).

Business Models

1. **Passenger Air Taxis:** Airport-city links, premium commuting corridors, tourism shuttles.
2. **Cargo & Logistics:** Drone corridors for e-commerce, medical deliveries, and high-value parts.
3. **Public Services:** Emergency response, disaster relief, and medical transport.

The global AAM market is not limited to futuristic air taxis; cargo logistics and public services are proving immediate, scalable entry points.

2.2. Global Case Studies & Policy Lessons for TN

AAM adoption is being shaped not only by **technology** but also by **policy, infrastructure, and public trust**. Leading economies are demonstrating the power of **roadmaps, regulatory sandboxes, and targeted investments**, as shown below.

Table 2: Global Best Practices in Advanced Air Mobility, and Lessons for Tamil Nadu; Source: OMI Foundation (forthcoming)

Domain	Best Practice	Global Example	Outcome	Lessons for Tamil Nadu
Policy & Governance	National / state-level AAM roadmap & central coordination	**South Korea:** K-UAM roadmap under the Ministry of Land, Infrastructure and Transport (MOLIT) with phased pilots, tech validation, and commercialisation milestones through the K-UAM Grand Challenge.	Faster, coordinated trials across cities; clarified responsibilities; clear regulatory milestones.	Launch TN-AAM Roadmap with a cross-departmental task force (Transport, Industries, Aerospace, IT, Environment). Define phased pilots, pilot corridors, and commercialisation roadmap.
	Proactive Certification & Regulatory Sandboxes	**USA:** FAA advanced powered-lift rule and phased AAM certification. **South Korea:** Sandbox programmes with trial exemptions and phased certification.	Reduced investor uncertainty; safer testing; predictable timelines for OEMs/ operators.	Launch a Tamil Nadu AAM sandbox (time-limited, location-bounded) with safety protocols and fast-track permits that align with DGCA/MoCA frameworks.
	Data governance, digital ecosystems & interoperability	**EU & USA:** Adopted standard APIs, open data-sharing, and cybersecurity frameworks to allow multiple service providers.	Encouraged competition, resilience, and scalability.	Define TN's AAM data standards and cybersecurity rules. Mandate open APIs for vertiports, UTM, and flight planning. Build a state-level AAM data exchange hub.
Infrastructure & Airspace	Design and approval pathway for vertiports	**USA:** FAA issued engineering briefs (EB-105) for vertiport siting, firefighting, safety, and approach paths. **Dubai:** Approved standard designs and dedicated approval tracks for developers.	Improved safety assurance; reduced planning uncertainty; faster vertiport deployment.	Develop Tamil Nadu-specific vertiport design guidelines aligned with DGCA norms. Designate pilot vertiports in select cities and near ports. Create a single-window clearance mechanism.
	Airspace integration and U-space / Unmanned aircraft system traffic management (UTM)	**EU:** SESAR, the technical arm of EU's Single European Sky initiative, demonstrated U-space services (geofencing, traffic info, deconfliction) with multiple interoperable service providers, and validated a	Enabled high-density drone operations with safety and predictable separation - key for logistics and passenger	Pilot a TN-UTM project with industry partners in a defined corridor; designate a state-level UTM operator; adopt interoperable data exchange and geofencing rules.

		multi-provider model through live trials.	services.	
Domain	**Best Practice**	**Global Example**	**Outcome**	**Lessons for Tamil Nadu**
	Dedicated drone corridors & logistics nodes	**EU**: Established designated corridors linking hospitals and industrial parks, integrating UTM services and vertiports with key stakeholders.	Improved medical delivery reliability; reduced last-mile time; proof of economic value for logistics.	Map TN drone corridors (e.g., Chennai-Kanchipuram, port–inland logistics parks). Prioritise healthcare, high-value cargo, and time-sensitive manufacturing parts.
Financing & Partnerships	Public-private partnerships & anchor investors	**UAE:** Government partnered with Skyports, VPorts, and AAM operators. Co-invested in vertiports, created concessions, and anchored demand through tourism and airport shuttle pilots.	Mobilised capital quickly; showcased use-cases; boosted private investor confidence.	Support PPPs in TN: Pilot airport-city air taxis or industrial park cargo shuttles; offer concessional land leases for vertiports; position ports and SEZs as logistics hubs.
	Financing mechanisms & incentives	**UAE & others:** Used seed funding, concessional land, and demand guarantees to reduce first-mover financing risks.	Lowered operator barriers; faster infrastructure rollout; increased adoption.	Offer concessional industrial land for AAM firms in TN; provide tax incentives for vertiport builds; demand guarantees for initial airport-city routes.
Skilling & Sustainability	Workforce development, skilling & certifications	South Korea: Industry collaborated with universities to build AAM training pathways (pilots, engineers, UTM staff); Global operators rolled out certification tracks.	Addressed talent bottlenecks; built local supply chains; boosted investor confidence.	Launch “TN AAM Skilling Mission” with industry, Industrial Training Institutes (ITIs), and universities. Create modules for eVTOL maintenance, UTM ops, vertiport management; offer trainee placement incentives.
	Environmental & noise standards, community engagement	**EU:** Noise testing, environmental dashboards, and outreach campaigns. **UAE:** High-visibility public demos to build social licence.	Higher acceptance; fewer delays; mitigation of noise and environmental pollution.	Mandate environmental/ social checks before pilots; install monitoring systems; hold public demo days in local languages; commit to noise compliance dashboards.

The global experience makes one thing clear: **technology alone will not drive AAM adoption**. Success depends on synchronising **policy, infrastructure, finance, talent, and community acceptance**.

For Tamil Nadu, the lesson is not to replicate global models wholesale, but to **adapt them**:

- Launch a **state-level AAM roadmap**;
- Pilot **sandbox corridors** for tourism, cargo, and commuting;
- Invest in **vertiports and UTM systems**;
- Embed AAM in **Tamil Nadu's Development Model values** of equity, accessibility, and sustainability.

By doing so, Tamil Nadu can leapfrog from being an automotive and aerospace hub to becoming **India's first AAM pioneer**, and a contender for **South Asia's Advanced Air Mobility capital**.

3. Tamil Nadu's Opportunity Landscape for Advanced Air Mobility

Tamil Nadu is uniquely positioned to pioneer Advanced Air Mobility (AAM) in India. Its combination of industrial depth, research capacity, multimodal infrastructure, and rising mobility challenges creates both the supply and demand conditions for early adoption. This chapter maps these enablers and bottlenecks to show how AAM can complement Tamil Nadu's economic vision while addressing systemic mobility constraints.

3.1. Industrial Depth: From EVs to Electric Aviation

Tamil Nadu is widely recognised as India's automotive and EV capital, producing nearly 30% of the nation's automobiles and auto components (Government of Tamil Nadu, 2023a). The state accounts for close to 70% of India's electric two-wheeler production, anchored by large-scale operations of Ola Electric, and other manufacturers such as Ather Energy, and Ampere of Greaves Electric Mobility, etc.

The Tamil Nadu Electric Vehicle Policy (2023) has accelerated this trajectory by targeting investment across the EV value chain, offering incentives for battery manufacturing, charging infrastructure, and R&D (Government of Tamil Nadu, 2023b). These capabilities - batteries, motors, power electronics, lightweight materials - are directly transferable to eVTOL propulsion and avionics systems.

Tamil Nadu's industrial policy framework further strengthens this base. The Industrial Policy 2021 envisages ₹10 lakh crore in new investment and 20 lakh jobs by 2025, with a strong emphasis on aerospace, electronics, renewable energy, and defence (Government of Tamil Nadu, 2021). Together, these create fertile ground for localising eVTOL component production and integrating AAM into Tamil Nadu's broader advanced manufacturing agenda.

> **Right Turn:** Tamil Nadu's EV ecosystem provides the propulsion and energy backbone for electric aviation, allowing a seamless pivot from road electrification to the skies.

3.2. Innovation and Research Capacity

Tamil Nadu's academic and startup ecosystem already addresses the frontier technologies on which AAM depends. IIT Madras, through the National Centre for Combustion Research and Development (NCCRD), one of the largest combustion labs in the world, and its Research Park, incubates startups in drones, AI, and battery technologies. Anna University and NIT Trichy contribute to aerospace, robotics, and UAV design research.

At the centre of this ecosystem is the Tamil Nadu Startup and Innovation Mission (StartupTN / TANSIM), the state's flagship agency for nurturing entrepreneurship. StartupTN has catalysed mobility-linked ventures through grants, accelerators, and dedicated sectoral initiatives, and is now actively scouting opportunities in drones, electric aviation, and robotics. Its network of incubators and hubs across Chennai, Coimbatore, Madurai, and tier-II cities ensures that AAM

innovation is not restricted to metropolitan centres but draws on the state's distributed talent pool.

Public–private research collaborations further expand this base, with ongoing work in battery storage, hydrogen fuel cells, lightweight composites, and autonomous navigation - all critical for scaling eVTOL operations. Meanwhile, Tamil Nadu Industrial Development Corporation (TIDCO) is working to attract global Centres of Excellence in advanced materials, avionics, and digital traffic management.

Right Turn: Together, Tamil Nadu's universities, startups, and state-led enablers like StartupTN provide a seamless knowledge-to-market pipeline. This ecosystem can accelerate design-to-deployment cycles, de-risk global OEM entry, and create a locally trained workforce for vertiport operations, UTM management, and electric aircraft maintenance.

3.3. Multimodal Infrastructure

Airports

Tamil Nadu hosts four international airports - Chennai, Coimbatore, Madurai, and Tiruchirappalli - along with several domestic airports. This is the highest concentration of international aviation gateways in South India. These nodes are natural anchors for the first generation of AAM routes: airport-city shuttles, airport-IT corridors, and airport-regional connections.

Ports

Figure 5: An aerial view of the port in the city of Chennai

The state's three major ports - Chennai, Ennore (Kamarajar Port), and Tuticorin (V. O. Chidambaranar Port Authority) - plus minor ports form one of India's busiest maritime clusters. Ports are critical both as import gateways for high-value avionics and battery components and as potential nodes in drone cargo networks linking port logistics zones to inland industrial corridors.

Industrial & Freight Corridors

Tamil Nadu is a key node in the Chennai-Bengaluru Industrial Corridor (CBIC), including the Ponneri investment region, and part of the East Coast Economic Corridor. These corridors already integrate highways, dedicated freight lines, and logistics parks, all of which form natural candidates for AAM cargo and commuter corridors.

Right Turn: With airports, ports, and freight corridors already in place, Tamil Nadu can deploy AAM as a multimodal connector rather than a standalone system, cutting logistics dwell times and reducing congestion around industrial hubs.

3.4. Mobility Challenges Driving Demand

Figure 6: Vehicular congestion and travel delays

Tamil Nadu's industrial leadership is creating new opportunities to reshape mobility. Rapid economic and urban growth is expanding demand for smarter transport solutions, even as current systems come under pressure.

1. Congestion and travel delays: Chennai's rapid growth highlights the need for innovative mobility solutions. With peak-hour speeds often falling below 20 kmph, there is a strong opportunity to improve productivity and quality of life through faster, more efficient commuting options. (Down To Earth, 2023).
2. Rising emissions: The state's transport sector offers potential to further reduce air pollution and carbon footprint. PM2.5 and PM10 levels in Chennai remain 4-6× WHO norms, but targeted interventions can establish Tamil Nadu as a national leader in clean, sustainable urban mobility. (Centre for Research on Energy and Clean Air (CREA), 2025; Greenpeace India, 2023).
3. Inadequate public transport expansion: Tamil Nadu has invested in electric and CNG buses, strengthening the foundation for clean public transport. The next step is to move beyond replacement toward true expansion, coupled with stronger first- and last-mile connectivity. This will ease pressure on private vehicle use and make public transport more accessible and attractive.
4. Urban sprawl: Between 1991 and 2016, Chennai's built-up area grew by over 70%. With Chennai's built-up area projected to expand by 85% by 2027, there is a strong opportunity to design mobility solutions that efficiently connect residents, industries, and services, supporting a sustainable and liveable urban environment (Shah & Mishra, 2017; Down To Earth, 2024).

Right Turn: Air taxis and drones offer targeted relief in precisely these pressure points: decongesting corridors along the airport to city, and industrial-to-residential stretches, providing time-definite cargo delivery, and supplementing weak last-mile connections in peri-urban and regional areas.

Tamil Nadu's industrial depth, research ecosystem, and infrastructure position it as India's most AAM-ready state. Yet it is the convergence with its mobility challenges - congestion, emissions, and accessibility gaps - that makes AAM a timely and strategic fit. **By embedding AAM into its policy framework and leveraging airports, ports, and industrial corridors, Tamil Nadu can leapfrog from EV and automotive leadership to becoming the nation's Advanced Air Mobility capital**.

4. Tamil Nadu's AAM Payoff by 2030: Methodology, Results & Sectoral Benefits

This chapter translates Tamil Nadu's Advanced Air Mobility (AAM) opportunity into numbers a policymaker can act on, an investor can underwrite, and a researcher can interrogate. It combines (i) a clear, policy-grade methodology, (ii) quantified 2030 results from our model, and (iii) sectoral implications for businesses, users, and cities.

Conceptual framing on business/user/city benefits and early-market sequencing is adapted from OMI Foundation's forthcoming publication on advanced air mobility in India. Quantification for Tamil Nadu (GDP, jobs, VoT, CO_2, energy) is from OMI Foundation's in-house systems and econometric model implemented in Python, and state-specific assumptions outlined below.

4.1. What We Modelled

Key Research Question, and Scope

If Tamil Nadu catalyses AAM between 2026 and 2030, how large is the near-term opportunity in three markets?

1. **Daily commute** (≥30 km) between residential hubs and industrial clusters
2. **Domestic tourism** (intra-state) on premium religious/leisure circuits
3. **Cargo logistics** (express/parcel) on short, frequent, time-sensitive hops; e.g., 5 kg average parcel weight; 40 km ground hops between sort centers, ports/ICDs, and city nodes.

Why these? They combine **high value of time, reliable demand, and infrastructure anchors** (airports, ports, logistics parks) suited to early AAM.

Outputs

For each segment and adoption scenario (Base/ Medium/ High), the model estimates:

1. **GDP contribution** (₹ crore)
2. **Jobs created** (direct + induced)
3. **Value of time (VoT) saved** (₹ crore)
4. **Emissions avoided** (kg CO_2)
5. **Energy saved** (kWh)

Who this serves

1. **Policymakers:** Defensible assumptions, and where to pilot first
2. **Industry leaders:** Sized near-term revenue pools
3. **Researchers:** Transparent, reproducible parameters

4.2. Modelling Framework

Demand & distance

The following help arrive at the total addressable market, and serviceable available market of advanced air mobility in Tamil Nadu.

1. **Commute:** Working population × share of ≥30 km work trips × trip length (air) × workdays
2. **Tourism:** TN domestic visits × intra-state share × hop length (air)
3. **Cargo:** Annual parcels × average hop distance (air); vehicle capacity applied to map parcel flows to AAM trips

Adoption

We assume small seeding in 2026 compounding to 2030 under three scenarios, viz., Base, Medium, and High.

Economics & Jobs

1. Revenues use segment ₹/passenger-km (or parcel logic), with a conservative multiplier to get **GDP contribution**.
2. **Jobs** follow a calibrated jobs-per-USD-million rule of thumb applied to rupee GDP.

Time, Energy, Emissions

1. **Time Saved:** Difference between ground time and air time, monetised via Value of Time (VoT) schedule. This schedule assumes higher value for early adopters, which in turn reduces slightly as advanced air mobility's market widens and adoption increases by 2030.
2. **Energy, and Emissions:** Comparison of electric AAM vs. ground internal combustion engine (ICE) baselines across occupancies, speeds, Wh/km.

4.3. Data Backbone

Tamil Nadu-specific inputs

1. **Commute viability:** 8.0% of work trips ≥30 km from *Census 2011* work-trip bands, scaled to 2025 for longer average commutes (urban sprawl, inter-district work).
2. **Tourism base:** 219 million domestic visits (2022) from *India Tourism Statistics 2023* as baseline, with an intra-state share of ~82% used to infer inter-district trips (*National Sample Survey*).
3. **Parcel volumes:** National express/CPE baseline 4.4B parcels/year; TN at 10% reflecting its manufacturing, ports, and e-commerce share/ footprint.
4. **Costs & adoption:** Passenger ₹/pkm starts at 100, with annual reduction; adoption starts tiny but compounds (base/medium/high growth).
    a. **Adoption seeding:** 2026 initial usage of 0.05% (commute) and 0.08% (tourism); cargo seeded at 0.01% of flows.

b. **Growth:** TN slightly faster than India baseline (e.g., commute 1.1/1.2/1.3; cargo 1.2/1.4/1.6) given industrial/logistics readiness.

5. **Jobs:** 20 jobs/US$1M GDP, an optimistic but defensible multiplier for a labour-intensive, aerospace-rich state.
6. **Energy factors:** eVTOL and ground energy intensities drawn from peer-reviewed electric aircraft literature; distances computed in air-km (ground detour factor handled in counterfactuals).

Primary data anchors used in calibration (non-exhaustive)

7. Census 2011; PLFS 2023-24; Tamil Nadu Economic Survey 2024-25; India Tourism Statistics 2023; Unicommerce/Wazir Advisors (parcel volumes & state shares); OMI Foundation's Forthcoming Study on Advanced Air Mobility.

4.4. Results: Tamil Nadu in 2030

Table 3: Advanced Air Mobility in Tamil Nadu in 2030 - Different Adoption Scenarios

Impact Area	Base Adoption	Medium Adoption	High Adoption
GDP contribution (₹ crore)	7,550	12,250	20,150
Jobs created	1,790	2,855	4,755
Value of Time saved (₹ crore)	1,030	1,500	2,250
Emissions avoided (mn kg CO_2)	7.4	11.5	17.1
Energy saved (GWh)	19.6	28.7	42.8

Source: Authors

Where the value sits by 2030

1. **Tourism** is the **largest near-term market**, with approximately 60-65% of GDP impact across scenarios.
2. **Daily commute** strengthens **industrial corridors**, e.g., Chennai-Sriperumbudur; Coimbatore-Tiruppur).
3. **Cargo** scales fast with **ports and e-commerce**, e.g., Chennai/ Ennore/ Tuticorin to Inland Container Depots (ICDs)/ logistics parks.

4.5. Sectoral Benefits

Business Competitiveness & Innovation

1. **Time-definite logistics:** Drone corridors linking ports (Chennai, Ennore, Tuticorin) to ICDs and industrial parks can compress turnaround windows and reduce dwell times for autos, textiles, and electronics, as well semiconductors and other emerging industries.
2. **Cluster connectivity:** Premium commute links between residential hubs and industrial belts protect productive hours for high-skill workforces.
3. **Supply-chain spillovers:** Localisation of eVTOL components (batteries, motors, avionics) leverages TN's EV/aerospace depth; StartupTN can accelerate TRL[1]-to-market with targeted challenges and procurement pathways.

User Benefits: Time, Reliability, and Access

1. **Time saved where minutes matter:** Airport-city shuttles and long industrial commutes see the largest deltas when ground speeds <20 km/h.
2. **Premium tourism experience:** Fast, predictable hops on heritage/ leisure corridors; e.g., Chennai-Mahabalipuram; Madurai-Rameswaram become early showcases.
3. **Critical services:** AAM augments medical logistics and emergency transfers by compressing response times and expanding catchments.

City Benefits: Decongestion, Emissions, Energy

1. **Targeted decongestion:** Each air shuttle replaces multiple peak-hour car trips on saturated links (airport-city, port-logistics, daily commute corridors).
2. **Visible climate wins:** While system-wide effects are modest early on, corridor-level CO_2 reduction and energy savings are tangible, supporting TN's climate leadership globally.
3. **System complementarity:** AAM is a capillaries-to-arteries connector, feeding metro/ rail/ bus rather than replacing them.

4.6. Sensitivity & Uncertainty: What Could Move the Needle

Even with carefully calibrated assumptions, the size of Tamil Nadu's AAM opportunity is sensitive to a few key variables. These high-impact levers can significantly shift GDP contributions, adoption rates, and climate benefits.

Adoption Growth (demand side)

1. This is the single most important driver. Faster user uptake - driven by visible pilots, strong government backing, and early private investment - can exponentially increase AAM's economic impact.
2. Delays in certification or lack of infrastructure (vertiports, UTM systems) could suppress adoption, capping the benefits.

[1] Technology readiness level:

Cost per Passenger-Kilometre (₹/pkm) Decline (supply & scale effects)

1. Early AAM services will be premium-priced, but costs are expected to fall with scale, battery improvements, and localisation of supply chains.
2. A slower cost decline risks keeping AAM as an elite service, limiting adoption. Conversely, rapid cost reductions unlock broader commuter and tourism markets.

Value of Time (VoT) (user heterogeneity by segment)

1. The model assumes early adopters (CXOs, premium travellers) place very high value on time, but as the market broadens, average VoT declines.
2. If Tamil Nadu can position AAM for mass premium users (e.g., IT professionals, frequent fliers), willingness to pay remains strong, accelerating demand.

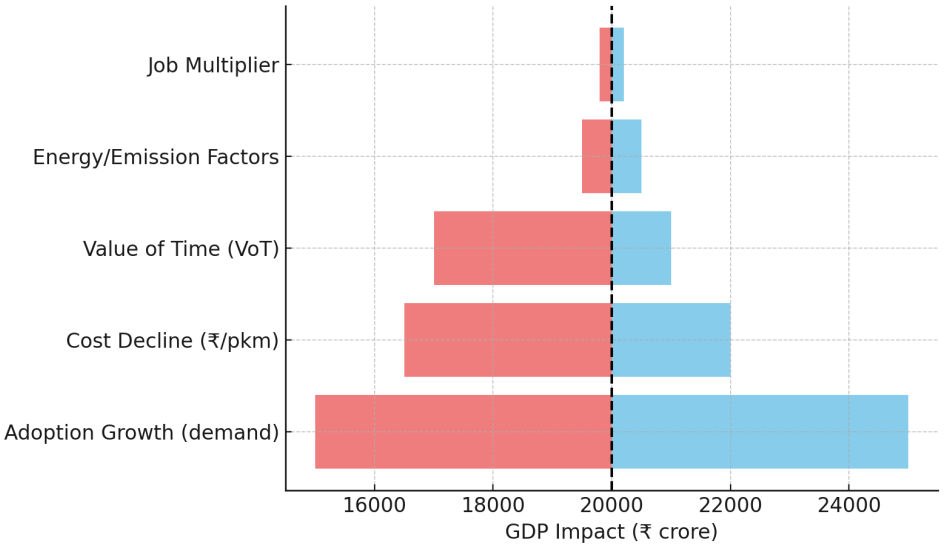
Energy/ Emissions Factors (ICE baselines, grid mix)

1. Emissions avoided depend heavily on the counterfactual baseline: petrol/diesel congestion vs. AAM on a largely coal-based grid.
2. A greener state grid (solar, wind) amplifies AAM's climate credentials.

Job Multiplier (localisation depth of manufacturing & MRO)

1. The assumed 20 jobs per US$1M GDP contribution is optimistic, contingent on how much of the AAM value chain localises in Tamil Nadu.
2. If components, MRO (Maintenance, Repair, Overhaul), and digital traffic management remain import-heavy, job gains will be lower.
3. Conversely, deeper localisation - via StartupTN-led incubators and TIDCO's aerospace cluster - could even exceed our job creation estimates.

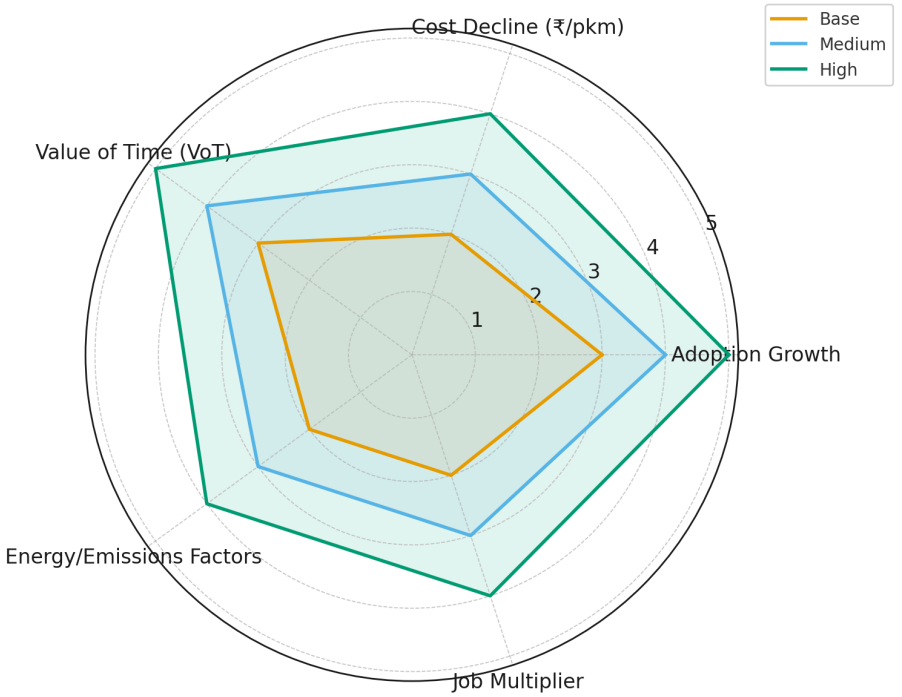
Figure 7: GDP Impact Sensitivity (2030, High Adoption Case)



Source: Authors

The Tornado Chart (figure 7) shows which variables most strongly affect GDP impact by 2030. Adoption growth is the largest swing factor, while energy/ emission and job multipliers have smaller marginal effects.

Figure 8: Sensitivity of AAM Impact Drivers



Source: Authors

The radar chart (figure 8) illustrates how adoption growth, cost decline, value of time, energy/ emissions factors, and job multiplier interact across the three scenarios (Base, Medium, High). The chart makes clear that while adoption growth and cost decline dominate the near-term impact, VoT, energy/emissions factors, and job multipliers significantly shape longer-term benefits and public acceptance.

4.7. Guardrails, Ethics & Safety: Non-Negotiables

Advanced Air Mobility cannot be pursued on economics alone. Safety, public trust, and equity must be designed into the system from day one.

Safety First

1. Tamil Nadu can establish robust certification pathways in alignment with DGCA standards, while drawing lessons from FAA (US) and EASA (EU).
2. Implementing mandatory incident reporting, transparent investigations, and open access to safety performance data will build trust with regulators, industry, and the public.
3. Early pilots can be conducted within carefully designed sandboxes with strict safety protocols ensuring safe and scalable deployment of AAM.

Noise & Public Acceptance

1. Noise remains the top barrier to community acceptance globally. Tamil Nadu has the opportunity to lead by developing and publishing corridor-level noise maps, monitor compliance, and enforce maximum decibel thresholds.
2. Public engagement should be multilingual (Tamil, English, etc.) and continuous, including live demonstrations, FAQ campaigns, and citizen dashboards.
3. Building trust through transparency and outreach will ensure that technically successful AAM pilots are embraced by communities.

Equity in Use-Cases

1. AAM must not be seen as a service for elites alone. To build legitimacy, early corridors should include public-good applications:
    a. **Medical logistics:** e.g., blood, organ, and medicine delivery between district hospitals.
    b. **Disaster relief:** drones as first responders in floods or cyclones.
2. Integration with metros, buses, and suburban rail for first/last-mile will prevent AAM from operating in a silo, embedding it in Tamil Nadu's multimodal mobility vision.

Bottom Line: By placing safety, noise, and equity as non-negotiables, Tamil Nadu can secure both a social licence to operate and a first-mover policy advantage in India's AAM journey.

5. Tamil Nadu as India's Advanced Air Mobility Capital: Opportunities and Policy Pathways

Advanced Air Mobility (AAM) is no longer a distant technology. It is a sector poised to deliver measurable economic, environmental, and social benefits within this decade. For Tamil Nadu, with its leadership in electric mobility, aerospace, and defence, AAM represents both a natural extension of existing strengths and a new frontier of opportunity.

Drawing on OMI Foundation's in-house modelling and global best practices, this chapter unpacks what AAM could mean for Tamil Nadu by 2030 and outlines a strategic roadmap through 2035.

5.1. Unlocking Tamil Nadu's AAM Potential by 2030

By 2030, Tamil Nadu can unlock a **₹20,000 crore flying taxi and drone cargo economy**, **create thousands of high-skill jobs**, and **become India's Advanced Air Mobility capital**, thereby building on its EV and aerospace leadership.

1. Tamil Nadu Can Build a ₹20,000 Crore AAM Industry by 2030

By 2030, AAM in Tamil Nadu could contribute ₹7,500-20,000 crore to GSDP. Though small compared to automotives in general or EVs today, this represents a new vertical with 10× growth potential over the following decade.

Policy takeaway: Tamil Nadu can position AAM as a strategic emerging industry that complements its established EV and aerospace sectors, rather than judging it solely on near-term GDP share.

2. Strategic Job Creation in High-Skill Ecosystems

AAM could create ~1,800 to 4,800 direct and indirect jobs by 2030. While modest in scale, these are high-value aerospace, robotics, and digital traffic management jobs.

Policy takeaway: AAM can be seen as a generator of high-skill, future-oriented employment that enhances attractiveness for engineers, startups, global talent, and global OEMs. This reinforces Tamil Nadu's leadership in AAM and knowledge-driven growth.

3. Tourism is the Biggest Early Market

Domestic tourism contributes 60-65% of GDP impact by 2030 in all scenarios. Premium religious and leisure circuits, such as Chennai-Mahabalipuram/ Pondicherry, Madurai-Rameswaram, Coimbatore-Ooty, are ideal AAM corridors.

Policy takeaway: By championing AAM-enabled premium tourism corridors, Tamil Nadu can become the global reference case for linking heritage and leisure destinations. Tamil Nadu

can showcase how AAM can unlock new growth, attract international visitors, and cement the state's reputation as India's tourism and innovation pioneer.

Figure 9: Aerial view of Sri Arulmigu Ramanathaswamy Temple, Rameswaram

4. Daily Commute Between Industrial Hubs and Cities

By 2030, daily commute via AAM could add ₹1,200-2,600 crore to TN's economy. The most viable use cases are long-distance commutes between residential areas and industrial corridors; for example, Chennai-Sriperumbudur (automotive and electronics hub), Coimbatore-Tirupur (pump and auto industry, textile, and garment cluster), Erode/ Salem-Hosur (auto cluster), and even Hosur-Bengaluru (aerospace and EV cluster).

Policy takeaway: By positioning AAM as a premium commuting solution for its industrial workforce and business travellers, Tamil Nadu can ease congestion while strengthening productivity links between clusters and cities.

5. Cargo and E-commerce Can Scale Fast

Cargo alone could add ₹5,600 crore in high adoption scenarios by 2030, powered by 440 million parcels/year in TN. With TN's ports (Chennai, Ennore, Tuticorin) and auto/textile export base, AAM cargo drones can decongest road freight and build logistics competitiveness.

Policy takeaway: Tamil Nadu has an opportunity to integrate AAM cargo corridors into its logistics and port strategy, making the state India's leading hub for time-sensitive and high-value freight movement.

6. Environmental & Congestion Benefits Are Real

By 2030, AAM could avoid 7.4-17.1 million kg CO_2 emissions and save up to 43 GWh of energy annually. While small relative to TN's total, these are symbolic early wins supporting TN's climate leadership.

Policy takeaway: The state can use AAM adoption to reinforce its clean mobility credentials and demonstrate visible, high-tech climate action in its cities.

7. Why Tamil Nadu Should Act Now

Tamil Nadu already leads India in EV manufacturing, aerospace clusters, and defence corridors. By being India's first mover in AAM, TN can attract global OEMs and promote home-grown startups alike, all the while setting national policy templates.

Policy takeaway: Early policy action will allow Tamil Nadu to capture first-mover advantage, build global partnerships, and establish itself as India's Advanced Air Mobility capital.

5.2. Roadmap for Tamil Nadu: Vision 2035

To move from promise to scale, Tamil Nadu can adopt a phased approach that aligns policy, infrastructure, innovation, and skilling measures.

1. Policy and Regulatory Blueprint

1. Launch a TN-AAM Policy by 2026 with sandboxing provisions, safety and noise norms, and clear airspace rules.
2. Establish a cross-departmental AAM Task Force (Transport, Industries, Aerospace, IT, Environment).
3. Provide long-term policy certainty to attract capital from global OEMs and local investors.

2. Manufacturing and Innovation Clusters

1. Anchor AAM manufacturing in Chennai, Hosur, and Coimbatore, among others, leveraging their EV, aerospace, and electronics ecosystems.
2. Position TN as a testbed for global OEMs through concessional land in SEZs and aerospace parks.
3. Support StartupTN's AAM Innovation Challenge, funding startups in propulsion, avionics, and UTM technologies.

3. Vertiport and Corridor Development

1. Phase I (2026-28): Launch airport-to-city shuttles in Chennai and Coimbatore; pilot corridors in Chennai-Mahabalipuram and Coimbatore-Ooty.
2. Phase II (2028-30): Expand to Madurai, Salem, and Hosur; integrate cargo corridors around ports and logistics parks.

3. Phase III (2030-35): Statewide AAM coverage with 20-30 vertiports, including peri-urban and rural logistics hubs.

Right Turn: Semiconductor & High-Tech Manufacturing Corridors as Key AAM Anchors

Tamil Nadu's Semiconductor Mission 2030, the IIT Madras Centre for Advanced Semiconductor Technologies, and private investment (e.g., display module factories in Oragadam; semiconductor parks in Palladam/ Sulur) are creating high-precision, time-sensitive clusters. These merit dedicated AAM corridors in the 2026-35 roadmap - for both passenger (skilled workers, executives, test engineers) and light cargo / drone delivery (prototypes, components, test shipments).

Some immediate corridor candidates include:

1. Oragadam to Chennai Airport/Port
2. Palladam/ Sulur to Coimbatore Airport
3. Sriperumbudur/ Oragadam ring
4. Madurai to Thoothukudi

Co-locating vertiports & cargo drone nodes in these clusters will unlock higher adoption, faster cost recovery, and synergy with semiconductor / electronics supply chain investments.

4. Skill Development and Workforce Readiness

1. Partner with IIT Madras, Anna University, aviation academies, ITIs, and other technical institutions.
2. Bring industry and academia together. Deliver education through dual system training, combining theoretical instruction at Industrial Training Institutes (ITIs) and skilling and educational institutions, with practical, hands-on experience in real industrial settings.
3. Develop training modules for pilots, drone operators, UTM managers, battery technicians, among others.
4. Build TN's reputation as India's aerospace skilling hub, creating globally competitive talent pipelines.

5. Systems Integration and Clean Mobility Stack

1. Embed AAM within urban transport systems (metros, suburban rails, buses, EV fleets).
2. Connect airports, ports, and logistics parks through cargo drone and air taxi corridors.
3. Quantify environmental gains as part of TN's Climate Change Mission and India's NDC commitments.

Conclusion: Tamil Nadu as India's AAM Gateway to the World

Skybound Tamil Nadu: From Roads to Skies, Leading India's Next Leap

Tamil Nadu stands uniquely positioned to become **India's gateway to Advanced Air Mobility (AAM)**. Its leadership in automotive and EV manufacturing, world-class aerospace and defence corridors, thriving research and startup ecosystem, and dense network of airports and ports together create the foundation for this next leap.

By 2030, AAM in Tamil Nadu can unlock a **₹20,000 crore opportunity**, generate thousands of high-skill jobs, and demonstrate clean, congestion-free, premium mobility solutions that complement public transit and logistics systems. The benefits are not confined to technology firms or urban elites; they extend to **industries seeking just-in-time delivery, tourists connecting heritage circuits, patients relying on critical medical logistics, and cities aiming to cut congestion and emissions**.

At the same time, global markets for Advanced Air Mobility are projected to cross **US$ 114.5 billion by 2035**. India's own aviation, e-commerce, and clean mobility expansion will create one of the largest demand bases worldwide. Tamil Nadu can seize this dual opportunity - **serving India's internal market while exporting AAM solutions, components, and talent** to the world. By aligning with India's green mobility, semiconductor, defence-tech, and aerospace missions, Tamil Nadu can cement its role as the country's **launchpad for future aviation** and a contender in the global value chain.

The call to action is clear: **Tamil Nadu has the opportunity to act decisively**. By launching a state-level AAM roadmap, piloting corridors in tourism and industrial belts, investing in vertiports and drone hubs, and integrating AAM into its EV and aerospace strategies, the state can capture **first-mover advantage**. In doing so, Tamil Nadu will not only set the template for India but also emerge as a **global hub for AAM manufacturing, testing, and deployment**.

When anchored in the values of **equity, sustainability, and innovation**, Advanced Air Mobility can become the next chapter in Tamil Nadu's development model - extending its leadership **from roads to skies, and from the state to the world**.

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Credits

About StartupTN

StartupTN, the nodal agency of the Government of Tamil Nadu for startups and innovation, works to position the state as a global innovation hub. Established under the Department of Micro, Small and Medium Enterprises (MSME), StartupTN fosters entrepreneurship by providing policy support, incubation facilities, seed funding, and access to markets and networks. With a focus on inclusivity, StartupTN supports women, rural, and social impact entrepreneurs alongside high-tech ventures. Through its sector-specific initiatives, global partnerships, and ecosystem-building programmes, StartupTN plays a pivotal role in transforming Tamil Nadu into one of India's most vibrant and diverse startup destinations.

About OMI Foundation Trust

OMI Foundation Trust is a new-age policy research and social innovation think tank operating at the intersection of mobility innovation, governance, and public good. Mobility is a cornerstone of inclusive growth providing the necessary medium and opportunities for every citizen to unlock their true potential. OMI Foundation endeavours to play a small but impactful role in ushering meaningful change as cities move towards sustainable, resilient, and equitable mobility systems, which meet the needs of not just today or tomorrow, but the day after.

OMI Foundation houses four interconnected centres that conduct cutting-edge evidence-based policy research on all things mobility:

1) The Centre for Technology Transitions is dedicated to transforming India's innovation ecosystem through a systems approach. It aims to position India as a global leader in ethical, inclusive, and sustainable technological innovation.

2) The Centre for Future Mobility supports the leapfrog of cities to a sustainable future anchored in the paradigms of active, shared, connected, clean, and AI-powered mobility.

3) The Centre for Clean Mobility catalyses the adoption of electric vehicles, future fuels, and renewable energy within the mobility ecosystem as a key climate strategy of cities.

4) The Centre for Inclusive Mobility promotes safe, accessible, reliable, and affordable mobility for all. It paves the road for the future of work and platform economy to fulfil the modern promise of labour.

About Futures Report

A “Futures Report” is a forward-looking, analytical report that explores emerging trends, transformative technologies, and future mobility scenarios through a combination of data-driven insights, strategic foresight, and policy analysis. Unlike traditional policy briefs or issue papers, the Futures Report anticipates and shapes future mobility developments, helping stakeholders prepare for and navigate upcoming disruptions.

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Aishwarya Raman, Executive Director, OMI Foundation, heads policy research and strategic engagements on energy, mobility, livelihoods, and technology transitions at OMI Foundation. An Oxford-trained student of sociology, she began her mobility sector journey as an entrepreneur and academic over a decade ago. A member of key policy committees at state, national, and global levels, she has received fellowships for AI-led transformations, including Salzburg Global and The Nippon Foundation fellowships. Under her leadership, OMI Foundation has developed pioneering policy tools, earning the organisation national and international recognition.

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