ID2Travel™
One ID for a **frictionless, secure digital journey** from home to destination

Introduction

With rising traveler volumes, resource constraints, and evolving travel regulations, efficiently processing passengers while maintaining high security and a seamless experience has become a top priority. To address these challenges, the travel industry has embraced digital transformation, integrating self-service and automated solutions to expand processing capacity, optimize resources, and enhance the traveler experience. However, meeting new demands requires key technological enablers—particularly digital identity and biometrics—to modernize processes and streamline operations.

ID2Travel™, our state-of-the-art, field-proven biometric traveler flow management solution, enables fully digital and frictionless journeys from home to destination. Managing operational complexities in the background, it enhances both security and efficiency while elevating the travel experience. Developed in compliance with leading international standards, including the requirements set by major organizations such as IATA, **ID2Travel™** ensures alignment with global travel industry best practices, providing a trusted and interoperable solution for all stakeholders.

Powered by IDEMIA Public Security's expertise in AI, biometrics, and identity management, **ID2Travel™** empowers travelers with greater control over their journey while ensuring compliance with data privacy regulations. It reduces stress, enhances convenience, and allows travelers to make the most of their time at the travel facility—all without compromising security obligations for port operators and carriers.

This end-to-end passenger flow facilitation solution is based on three main pillars:

Multi-channel, biometric traveler enrollment and digital ID issuance

Secure and reliable traveler identity management

Accurate and fast traveler identity verification

1 〉 Multi-channel biometric traveler enrollment and digital ID issuance

Offering a seamless passenger experience relies on the ability to establish a trusted digital identity that can be securely shared and used by all stakeholders involved. However, this requires robust identity verification, biometric authentication, and fraud prevention measures – this is where ID2Travel™ comes into play.

Designed to create a certified and reliable digital identity, ID2Travel™ establishes a secure link between the traveler, their travel document, and their boarding pass / ticket once the passenger's consent has been obtained.

This becomes possible through the powerful fusion of IDEMIA's cutting-edge technologies, including:

- Industry-leading biometric technology that ensures fast and secure authentication.
- Advanced ID proofing capabilities that verify the identity being enrolled is genuine and unaltered.
- Robust attack detection, including Morphing Attack Detection (MAD) and Presentation Attack Detection (PAD) that prevents identity fraud and ensures the integrity of digital IDs.

ID2Travel™ offers flexible, adaptable enrollment, catering to different use cases and levels of operational requirements, as ID2Travel™ supports both on-site and off-site enrollment, allowing travelers arrive ready to travel and help regulating congestion and processing times.

Once enrolled, using facial recognition, the traveler can move effortlessly through all key touchpoints—check-in, security, boarding, and even border control.

a. Off-site enrollment

Off-site enrollment relies on modern smartphone applications and is essentially carried out by the traveler themselves.

To meet your specific off-site enrollment strategy, ID2Travel™ comes up with three main identity verification service configurations:

- **Essential** : in this configuration we simply provide you with our field proven Capture SDK for simple, fast traveler data capture and identity verification. Compatible with mass market mobile devices (Android and iOS), Capture SDK securely performs travel document data capture (MRZ reading), live face acquisition with ISO 30107-3 level 2 tested liveness detection and biometric authentication (1:1) to validate the traveler's identity.

- **Professional** : in addition to Capture SDK, this configuration supports you with extra functionalities like passport chip reading for improved document authentication and higher-class algorithms through biometric and travel document chip reading back-ends.

- **Extended** : we have designed this configuration to provide you with a comprehensive traveler identity verification service. In addition to the Capture SDK, you will benefit from our exclusive SaaS ID Proof platform. With this configuration you can perform a thorough inspection of the identity document with no compromise on biometric quality.

	Essential	Professional	Extended
SDK module	**Capture SDK** for simple, fast traveler data capture and identity verification	**Capture SDK** for simple, fast traveler data capture and identity verification	**Capture SDK** for simple, fast traveler data capture and identity verification
Back-end module	n/a	**Back-ends** for passport chip reading for improved document authentication and higher-class algorithms	**SaaS ID Proof platform** for thorough inspection of the identity document with no compromise on biometric quality

b. On-site enrollment

On-site enrolment relies on robust and easy-to-use equipment, operated by port operator/carrier staff or accessible in self-service mode.

ID2Travel™ comes up with a comprehensive set of components to meet your traveler enrollment strategy:

- **MFACE™ Desktop** : delivers high-quality face capture and PAD for a reliable biometric enrollment at check-in desks. With walk-through, multi-face capture capabilities, it eases the enrollment process of groups and families.

- **Facial OEM Kit** : easy to integrate and robust to ambient lighting, it upgrades self-service check-in kiosks and self-bag drops with facial biometric capture and PAD capabilities for an onsite enrollment.

- **TravelKiosk™ Light** : for a seamless biometric journey, we have designed a dedicated biometric traveler enrollment self-service kiosk to complement the regular check-in process at the travel facility. This field proven solution enables a complete, user-friendly traveler enrollment (face capture with PAD, travel document reading and authentication, boarding pass scan and 1:1 face matching) in a cost effective, streamlined design.

Once the traveler has been securely enrolled, we are ready to manage their digital identity and trip information.

2 〉 Secure and reliable traveler identity management

Trusted, secure digital identity traveler management is the foundation of every biometric facilitation program.

ID2Travel™ comes with an interoperable and scalable identity management solution that creates and assigns a unique digital identifier to each traveler, by securely binding their facial biometrics with their travel data, allowing for fast, seamless identity verification at key travel touchpoints—eliminating the need for repeated document checks and reducing friction throughout their journey.

With its easy integration and minimal impact on your IT ecosystem, ID2Travel™ enhances the passenger experience while ensuring security and operational efficiency.

Travelers today recognize that secure data sharing, including biometrics, enables a more convenient and personalized experience. However, privacy and security concerns remain valid, especially as data protection regulations continue to evolve worldwide.

To meet global regulatory requirements while addressing traveler expectations, ID2Travel™ offers two secure options for identity management :

Look & Go
Your face is **YOUR** boarding pass

- Travelers temporarily consent to sharing their token with a central database.

- A one-to-few biometric match identifies them against a limited 'gallery of the day'.

- Travelers simply look and go through all checkpoints without the need to repeatedly present travel documents.

Tap & Go
Your face is **IN** the boarding pass

- Travelers securely store their token in their smartphone wallet.

- At each touchpoint, they present their smart device and verify identity via NFC or QR code.

- A one-to-one biometric authentication or cryptographic match ensures secure validation.

Regardless of the option chosen, ID2Travel™ upholds the highest standards of data security and privacy protection, enabling travelers to enjoy a trusted, seamless journey while maintaining full control over their personal information.

According to prevailing regulations and travelers' choice, ID2Travel™ comes up with two secure options:

• **Traveler Identity Management Platform (IMP):** The implementation of the **Look & Go** option involves setting up a centralized back-end solution. Bringing One ID concept to reality, and in line with IATA recommended practices (RP1701), Traveler IMP performs a secure digital ID management and an accurate, fast, identity verification, allowing travelers to simply 'Look & Go' at any touchpoint for a contactless, efficient travel experience without compromising security and data privacy.
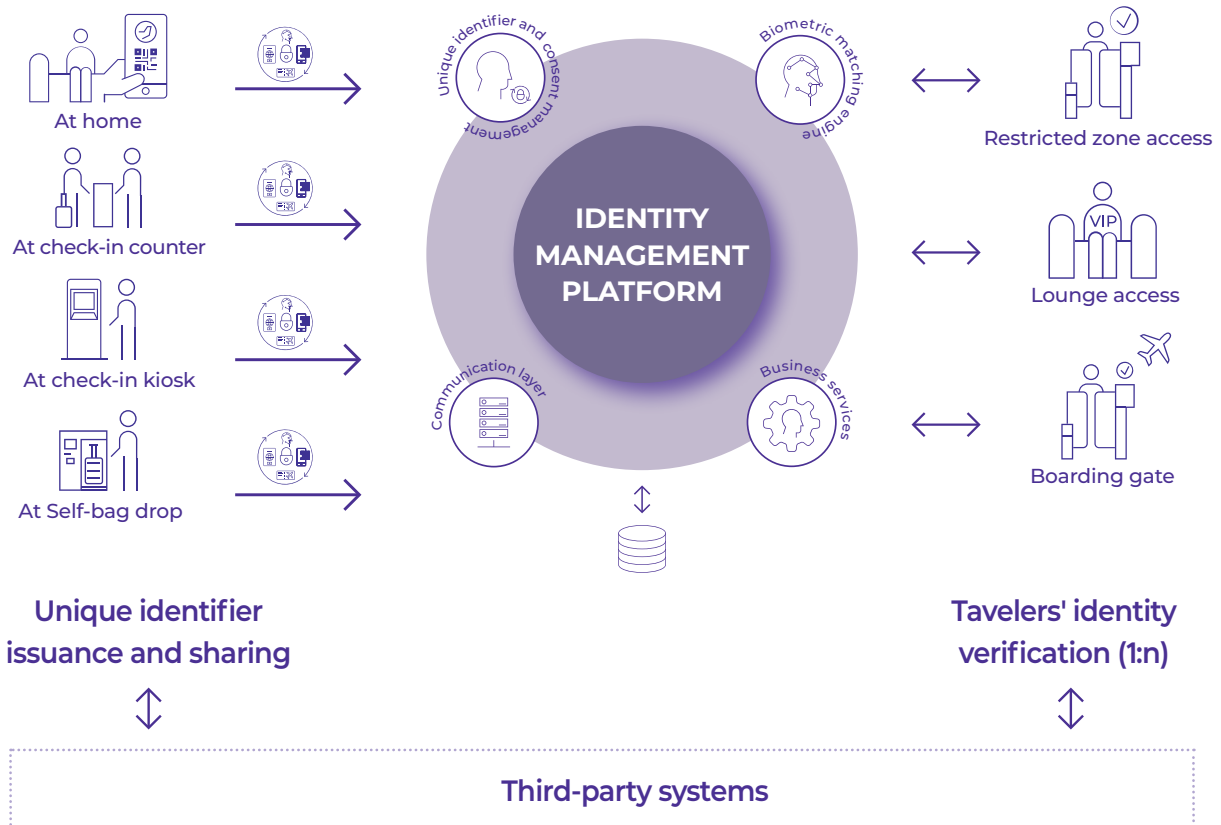
Powered by IDEMIA Public Security's best-in-class facial biometric algorithms, independently recognized as the most accurate and fair in the market, it is tolerant to real-life conditions coping with traveler attitudes and environment lighting conditions, greatly contributing to a pleasant experience.
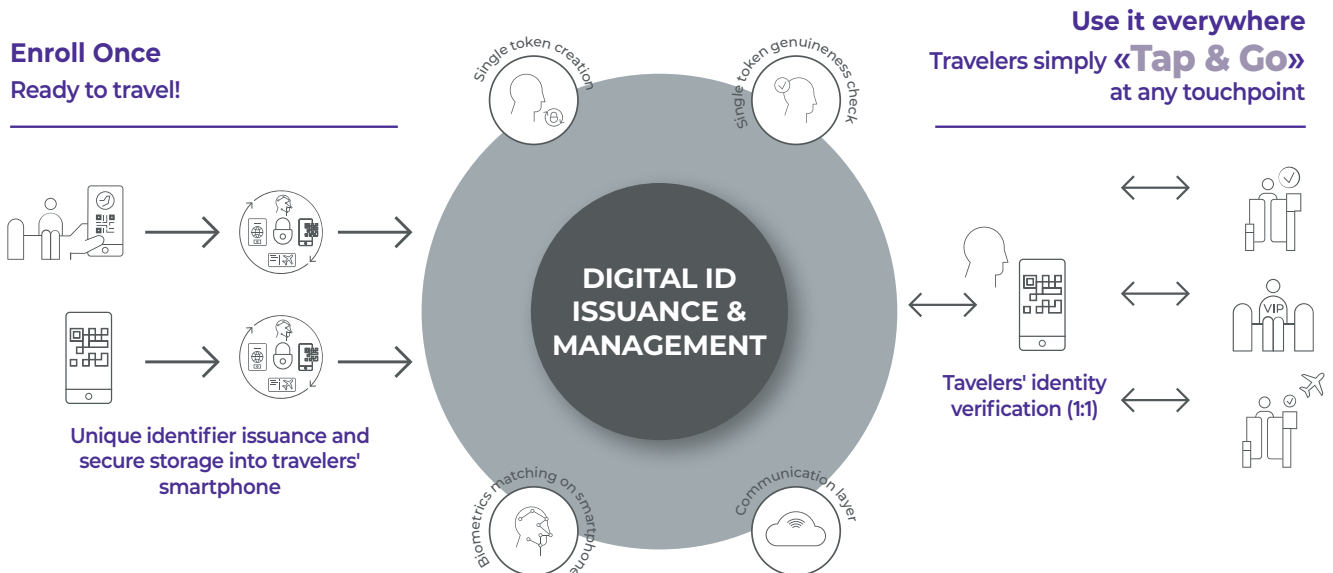
Enroll Once

Ready to travel!

Use it everywhere

Travelers simply «Look & Go» at any touchpoint

At home

At check-in counter

At check-in kiosk

At Self-bag drop

Unique identifier and consent management

Biometric matching engine

IDENTITY MANAGEMENT PLATFORM

Communication layer

Business services

Restricted zone access

Lounge access

Boarding gate

Unique identifier issuance and sharing

Tavelers' identity verification (1:n)

Third-party systems

- **Traveler Digital ID Issuance & Management (DIM):** The implementation of the **Tap & Go** option in turn involves the roll-out of a decentralized back-end solution and the development of a mobile application. In line with the European Union recommendations, the Traveler DIM back-end allows travelers to keep their data at all times, manage the sharing of their data and simply 'Tap & Go' with their smartphone to be authenticated at every touchpoint.

Enroll Once
Ready to travel!

Single token creation

Single token genuineness check

DIGITAL ID ISSUANCE & MANAGEMENT

Biometrics matching on smartphone

Communication layer

Unique identifier issuance and secure storage into travelers' smartphone

Use it everywhere
Travelers simply **«Tap & Go»** at any touchpoint

Tavelers' identity verification (1:1)

Efficient traveler identity management guarantees a smooth, secure travel experience. Now travelers can simply use their face to be cleared at each step of their journey.

Shaping European digital future

To shape Europe's digital future, the European Commission has designed a legal framework on Artificial Intelligence (AI Act) and Cybersecurity (Cyber Resilience Act), laying down harmonized rules and standards across the Member States.

》 AI Act:

Entering into force on August 1st, 2024, the AI Act is the first-ever comprehensive legal framework on AI worldwide. It ensures that Europeans can trust what AI has to offer. Therefore, the aim of the new rules is to foster trustworthy AI in Europe and beyond, by ensuring that AI systems respect fundamental rights, safety, and ethical principles and by addressing risks of very powerful and impactful AI models.

At IDEMIA Public Security we build secure, ethical biometric algorithms that are independently recognized as the most accurate and fair in the market, performing equally well for all people and under all conditions. In November 2024, we ranked 1st in fairness, demonstrating lack of bias for NIST Facial Recognition Vendor Test (FRTE) and in Age Evaluation Verification (AEV), evaluating the ability of an AI system to gauge the age of a person based on portrait.

》 Cyber Resilience Act (CRA):

Set to enter into force in the second half of 2024, the CRA aims to safeguard consumers and businesses buying or using products or software with a digital component. It will introduce mandatory cybersecurity requirements for manufacturers and retailers of such products, notably mandatory incident reporting and automatic security updates, with this protection extending throughout the product lifecycle. Once the CRA enters into force, manufacturers, importers, and distributors will have three years to adapt to the new requirements.

IDEMIA Public Security is strongly committed to complying with the Cyber Resilience Act (CRA) obligations in the period defined by the regulation adopted in October 2024. It is key to safeguard sensitive data, such as traveler data, and protect IT infrastructure from attacks, which is the reason why our products are secured by design. We are already putting different tools and means in place to ensure full compliance with the CRA requirements within the specified period.

3 〉 Accurate and fast traveler identity verification

An accurate, robust identity verification is the assurance that the traveler presenting at a touchpoint has the necessary authorization to be cleared.

Whether in 'Tap & Go' or 'Look & Go' mode, ID2Travel™ offers reliable and fast traveler identity verification at every touchpoint. To do so, it ensures a high-quality face capture, with embedded quality assessment and anti-spoofing measures, and an accurate matching result, thus enhancing confidence in automated/self-service solutions and improving resource management. It also delivers fast matching results, dramatically increasing throughput and reducing the level of stress.

Integrating top-tier, fair, unbiased facial biometrics, ID2Travel™ enables various traveler profiles to be processed in the same secure and efficient way, resulting in a better travel experience for everyone.

ID2Travel™ offers the possibility to capture faces on-the-move, as the traveler approaches the touchpoint, and to acquire multiple faces simultaneously, for groups and families, making the travel experience more efficient and user-friendly.

ID2Travel™ provides a comprehensive front-end solution for automated traveler's identity verification:

- **TraveLane™:** fully automated biometric eGate facilitating the flow of travelers and reducing waiting times

- **TravelKiosk™ Light:** slimline biometric self-service kiosk operating seamless identity verification at lounge and boarding

- **MFACE™:** delivers walk-through, multi-face capture with high matching accuracy and anti-spoofing capabilities

- **Facial OEM Kit:** with no need for height adjustment and using ambient light, it is easy to integrate into eGates to secure and expedite the clearance process

Our Key References

A groundbreaking biometric journey at Zayed International Airport

In 2022, as part of the Emirate's digital transformation vision, the Government commenced the deployment of a Single Token Journey Solution (STJ) to revolutionize the future of airport experiences in Zayed International Airport.

Building on a long-lasting partnership, Abu Dhabi airport entrusted IDEMIA Public Security to offer its seamless passenger facilitation solution powered by in-house cutting-edge biometric technology. By assigning a unique digital identifier to every traveler, the STJ solution eliminates the need for multiple documents, enabling passengers to move from curb to gate, including the border clearance step, in a record time of just 12 minutes. Once fully implemented, Abu Dhabi will pioneer as the world's first airport with biometrics integrated at every stage, ensuring travelers enjoy a seamless, safe, and secure journey.

Key facts:

- Passengers move from curb to gate in 12 minutes

- Processing times dropped from 25 seconds to just 7 seconds

Fostering the future of Indian air travel

In 2023, aligning with the Digital India vision, GMR Group selected IDEMIA Public Security as the technology partner for DigiYatra, an industry-led initiative coordinated by the Aviation Ministry in line with Prime Minister Shri Narendra Modi's Digital India vision to transform the nation into a digitally empowered society.

DigiYatra benefits from IDEMIA Public Security's best-in-class facial biometrics and digital ID technologies at Delhi, Hyderabad and Goa airports to verify the identity of domestic flyers, making terminal entry, security clearance and boarding at the airports a seamless and paperless process. IDEMIA's contactless biometrics and digital identity management technology provide stress-free travel experience while safeguarding their privacy and security.

Key facts:

- 220+ touchpoints have been deployed in very short lead-times

- 350K+ daily throughput of passengers facilitated in Delhi airport

Unlock the world,
make it safer.

www.idemia.com