

Revision of Advanced Passenger Information Directive

Council Directive 2004/82 on the obligation of carriers to communicate passenger data

Agenda

- 1. Introduction and presentation of the 'status quo'
- 2. 'Building upon' the ETIAS query
- 3. Modes of capture and API data quality
- 4. API on outbound flights



« Thomas Anderson goes on a trip"

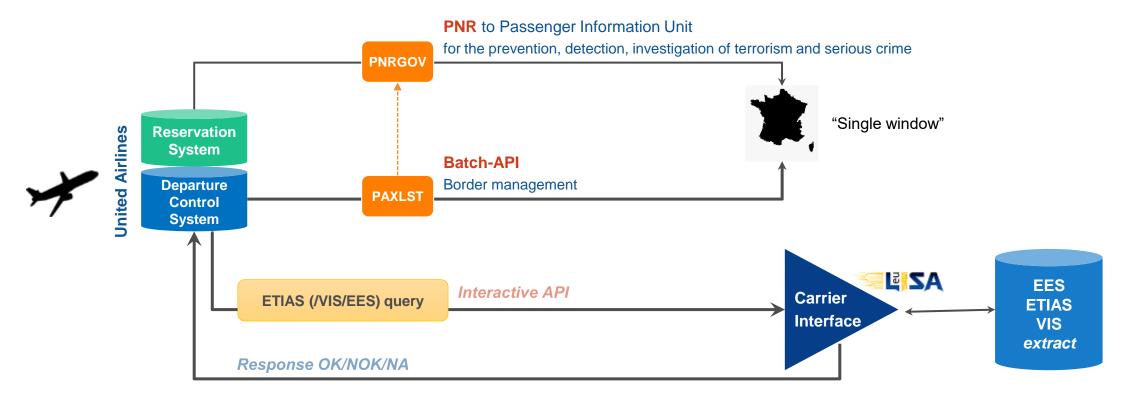
Thomas travels from Washington to Paris and back to New York

Thomas requested an ETIAS (European Travel Information and Authorisation System)

Thomas booked a ticket on United Airlines: Carrier sends PNR data to French PIU (but also PNR data to the USA)

Thomas checks-in online: Carrier queries ETIAS to make sure Donald has required authorization

Thomas boards the plane: Carrier (via ground-handler) sends batch-API to France





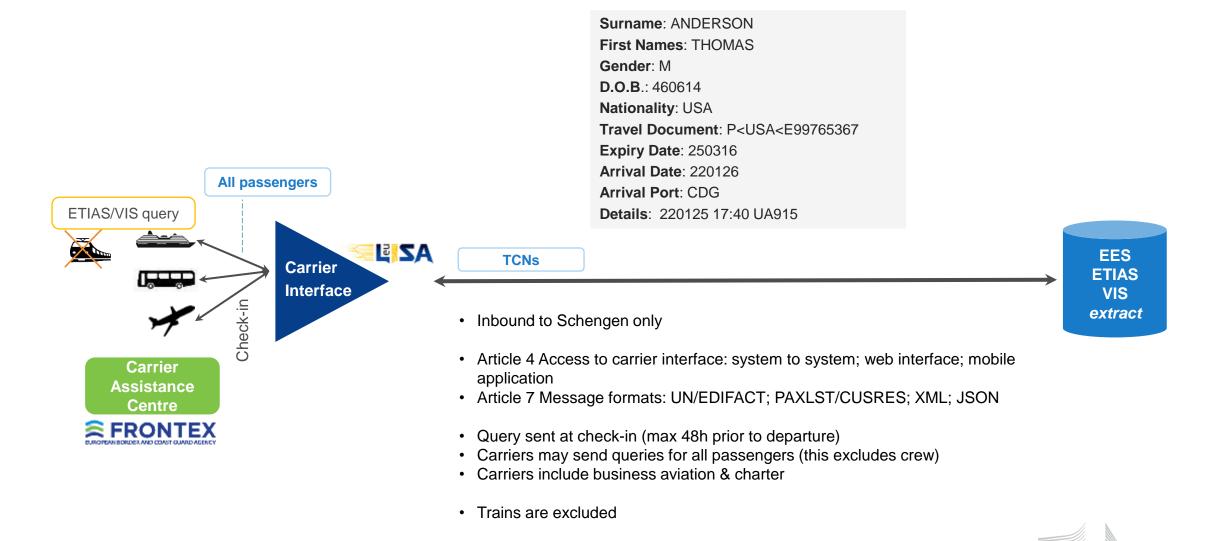


Interactive API

Article 5
Queries

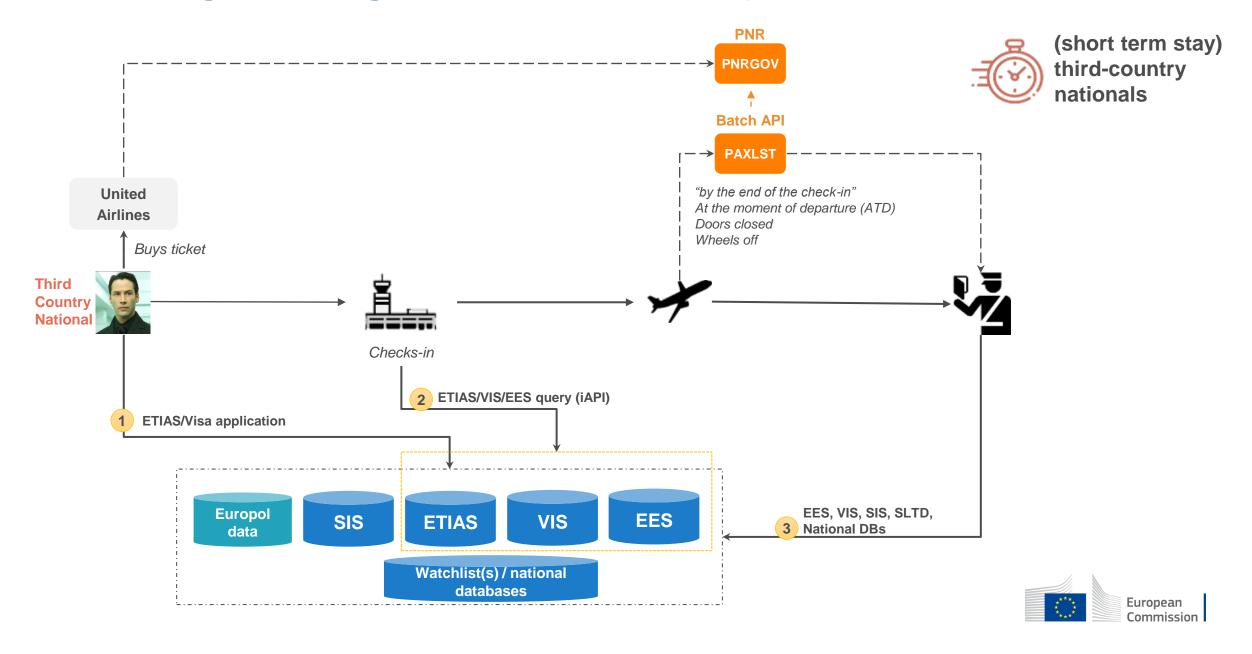
- 1. In order to send the verification query, the carrier shall provide the following traveller data:
 - (a) surname (family name); first name or names (given names);
 - (b) date of birth, sex and nationality;
 - (c) the type and number of the travel document and the three letter code of the issuing country of the travel document;
 - (d) the date of expiry of the validity of the travel document;
 - (e) the scheduled day of arrival at the border of the Member State of entry;
 - (f) one of the following:
 - (i) the scheduled Member State of entry;
 - (ii) where possible to identify the scheduled Member State of entry, an airport in the Member State of entry.
 - (g) the details (local date and time of scheduled departure, identification number where available or other means to identify the transport) of the means of transportation used to access the territory of a Member State.
- 2. For the purposes of providing the information referred to in paragraph 1, points (a) to (d), carriers may scan the machine-readable zone of the travel document.
- 3. Where the passenger is exempt from the scope of Regulation (EU) 2018/1240 in accordance with Article 2 of that Regulation or is in airport transit, the carrier shall be able to specify it in the verification query.
- 4. Carriers shall be able to send a verification query for one or more passengers. The carrier interface shall include the reply referred to in Article 6 for each passenger included in the query.

Situation after ETIAS

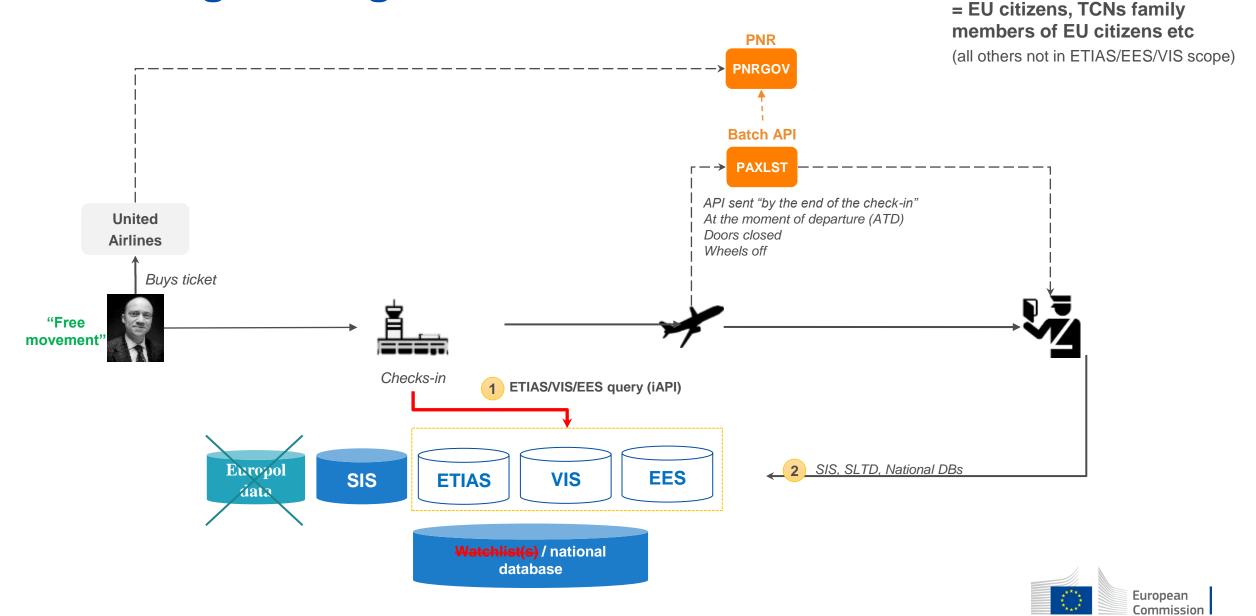


European

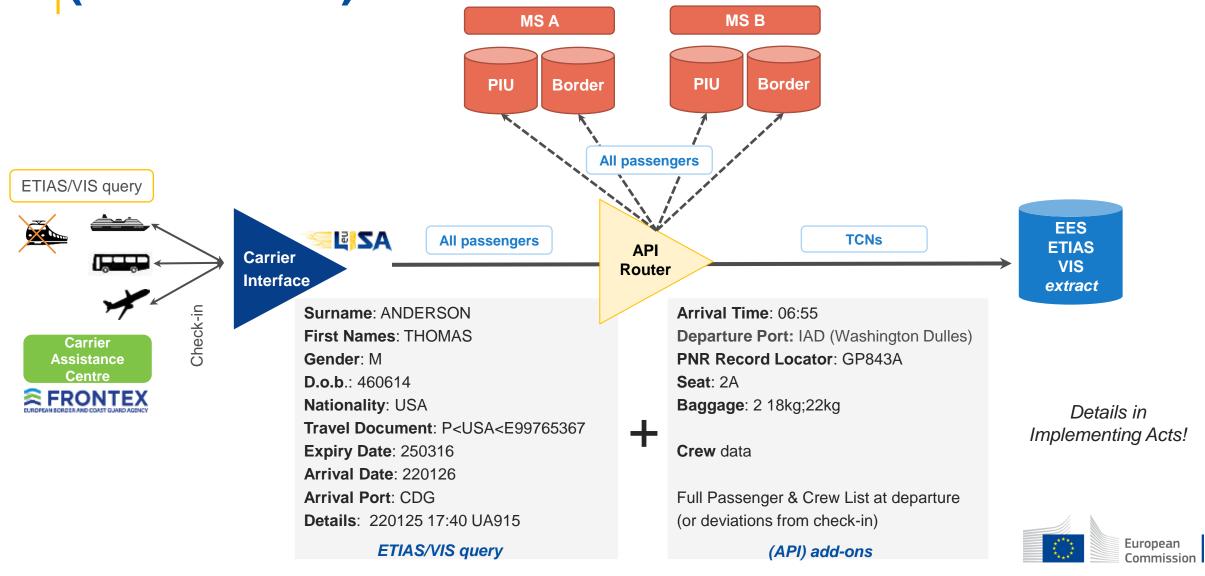
Entering Schengen Third Country National 'flow'



Entering Schengen "Free movement 'flow'"



'Building upon' the ETIAS query (API router)



Additional API data fields

Current API Directive

Additional data fields

Flight data

- border crossing point of entry
- code of transport
- departure and arrival *time* of the transportation
- total number of passengers
- initial point of embarkation

departure and arrival dates



Identity data

- Full name
- Date of birth
- Nationality
- Travel document n°
- ▶ Travel document type

- Gender
- Issuing State or organisation of the official travel document
- Travel document expiration date

- PNR locator
- Seating information
- ▶ Baggage information

Machine Readable Zone





'Building upon' the ETIAS query (API router)

Surname: ANDERSON First Names: THOMAS

> Gender: M D.o.b.: 460614 Nationality: USA

Travel Document: P<USA<E99765367

Expiry Date: 250316 Arrival Date: 220126 Arrival Port: CDG

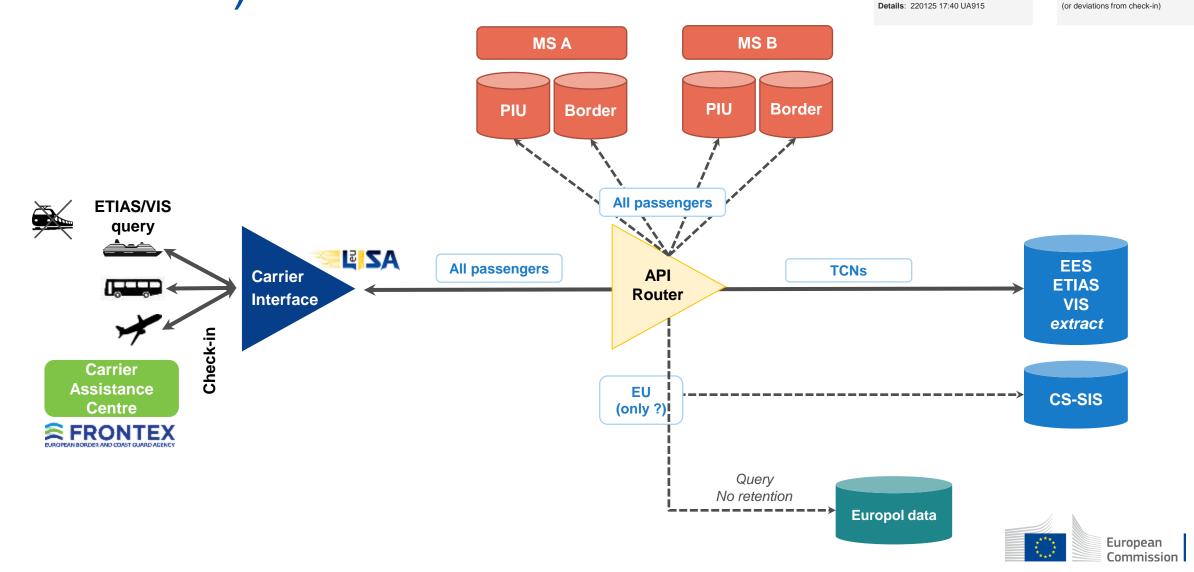
Arrival Time: 06:55

PNR Record Locator: GP843A

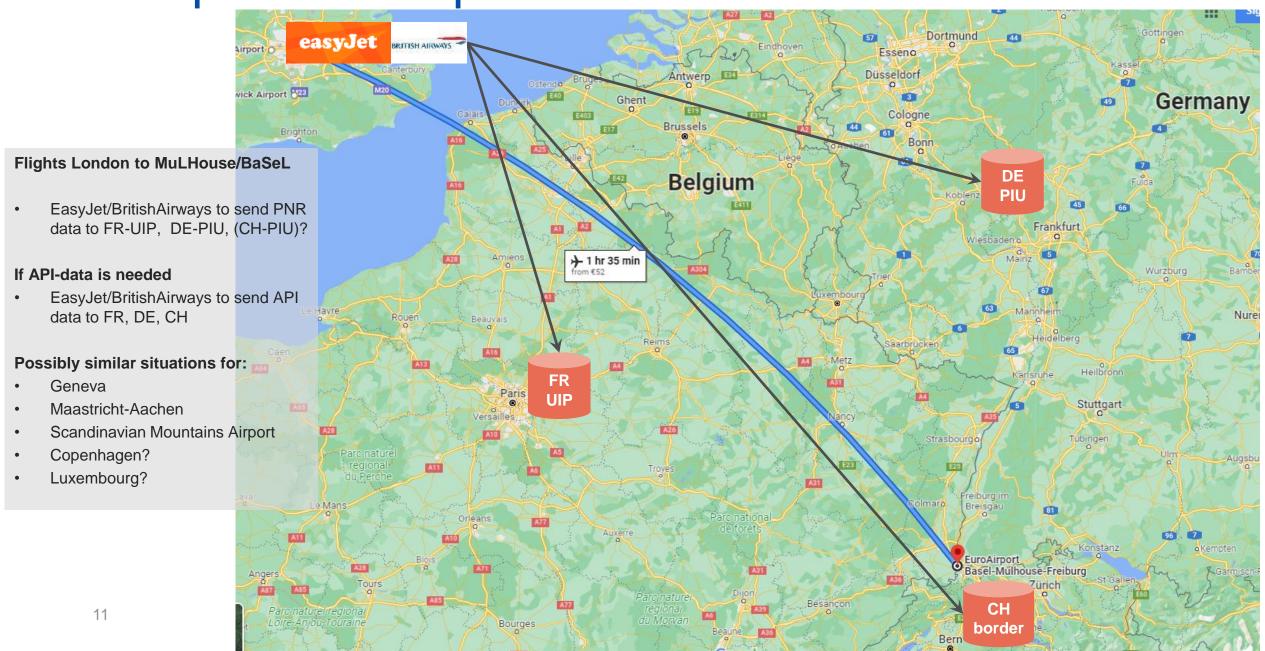
Baggage: 2 18kg;22kg

Full Passenger & Crew List at departure (or deviations from check-in)

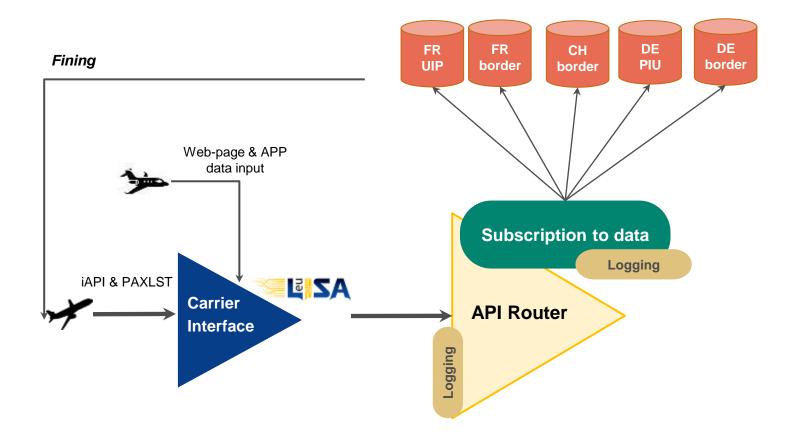
Departure Port: IAD (Washington Dulles)



Subscription example



'Building upon' the ETIAS query API router subscription



Subscription to data:

- Competent authorities subscribe to destination ports (departure ports) and means of transport to receive specific API data
- Multiple authorities may subscribe and receive the same data for different purposes
- Router could 'translate' from/to other formats (XML->PAXLST)

DE:

IATA=FRA;ICAO=EDDF IATA=BSL;ICAP=LFSB IATA=MLH;ICAO=LFSB Etc.

FR:

IATA=CDG;ICAO=LFPG IATA=BSL;ICAO=LFSB IATA=MLH;ICAO=LFSB IATA=EAP:ICAO=LFSB



Modes of API data capture

API identity data are supposed to be taken from the Machine Readable Zone of the travel document ...but they rarely are, the quality of data is limited

Manual data entry

Performed by the carrier at check-in counters

- + reliable data
- long check-ins (2 to 10 min for the check-in)

"Self-declaration"

Data entered manually by the passenger through the carrier's website/online/app check-in process

Data captured via a mobile app or a kiosk using the optical character recognition (OCR) of the MRZ information from a picture of the travel document

- + quick check-ins (max 20 sec), travel facilitation
- where passenger submits data unsupervised, 7 errors

Automated capture

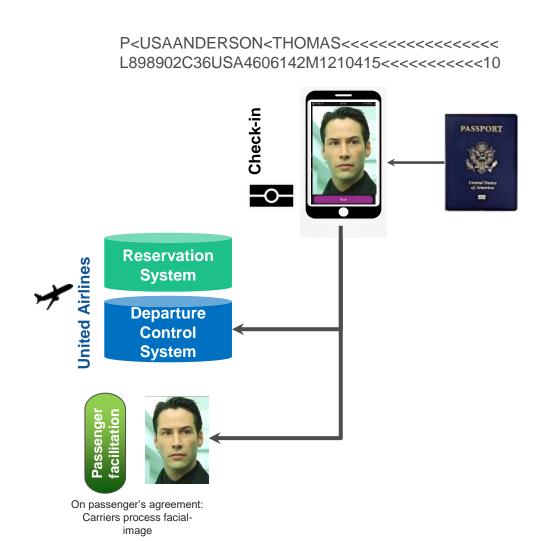
MRZ 'swipe' at the check-in desk

Carrier extracting the data from the RFID chip of the travel document

- + reliable data, travel facilitation
- Investing in (new) equipment



Mandatory MRZ OCR capture Possible RFID chip-data capture?



- Identity data captured from the passport/identity-card/ residence-permit chip by the passenger, at check-in, using a smartphone
- Carrier self-check-in web-interfaces and mobile applications to include the mandatory reading of MRZ/RFID chip
- Identity data from the chip is authenticated. API identity data will be of high quality and complete.
- All EU Residence Permits have an RFID chip
- All EU identity cards will in the future have an RFID chip
- All currently produced smartphones can read RFID chip
- Unable to use a smartphone? check-in at the airport
- Facial-image is not cryptographically protected (not needed for API but potentially useful for contactless boarding processes)
- Fingerprints ARE cryptographically protected



API data on outbound flights

