

# 2015

## Reference Manual on Air Transport Statistics



Version N°12

INTI	RODUC	CTION	7		
PAR	t I: ME	ETHODOLOGY, DEFINITIONS AND CLASSIFICATIONS	9		
1	De	escription of the datasets	9		
	1.1	Description of the Statistical units and variables	12		
	1.2	Definitions and variables of general interest	12		
	1.2	2.1 Air Passenger	12		
	1.2	2.2 Aircraft movement	12		
	1.2	2.3 Commercial aircraft movement	12		
	1.2	2.4 Passenger seats available	12		
	1.2	2.5 Community airport	12		
	1.2	2.6 Community airport covered	12		
	1.2	2.7 State Flight	13		
	1.2	2.8 Passenger unit	13		
	1.2	2.9 Commercial air service	13		
	1.2	2.10 Scheduled air service	13		
	1.2	2.11 Non-scheduled air service	13		
	1.2	2.12 Passenger air service	14		
	1.2	2.13 All-freight and mail air service	14		
	1.2	2.14 Airline (Commercial air transport operator)	14		
	1.2	2.15 Definitions and variables of interest for table A1 (flight stage)	14		
	1.3	Definitions and variables of interest for table A1 (flight stage)	14		
	1.3	3.1 Flight stage (Table A1)	14		
	1.3	3.2 Passengers on board (Table A1)	14		
	1.3	3.3 Freight and mail on board (Table A1)	15		
	1.3	3.4 Commercial air flight (Table A1)	15		
	1.3	3.5 Passenger seats available (Table A1)	15		
	1.3	3.6 Aircraft	15		
	1.4 C1 (ai	Definitions and variables of interest for table B1 (on flight origin and destination) an irports)	ıd table 16		
	1.4	4.1 On flight origin and destination (Table B1)	16		
	1.5	The difference between on flight origin/destination and flight stage data	17		
	1.6	The reporting of airport data in table C1	20		
	1.7	Codification of the type of flight	21		
2	Cla	assifications	21		
	2.1	Country code	21		
	2.2 Airport code				
	2.3 Air transport operator code 22				
	2.4	Aircraft code	23		
3	Dat	ata transmission Format: Standardisation and validation	23		

	3.1 Transmission of results						
	3.2 Description of the data files and transmission format						
	3.3	Data Transmission	25				
	3.3.	1 General recommendations	25				
	3.3.	2 eDAMIS presentation	26				
	3.3. eXc	.3 Standardization of message format for data exchange: Statistical Data and Metad hange (SDMX)	ata 29				
4	Que	estionnaire on aviation statistics	30				
5	Vol	untary data transmission	30				
	5.1	Background	30				
	5.2	Definitions	32				
	5.2.	1 Type of operation	32				
	5.3	Values to be collected	35				
	5.3.	1 Registered aircraft	35				
	5.3.	.2 Flights	36				
	5.3.	.3 Hours flown	36				
PAR	T II: NA	TIONAL METHODOLOGIES	37				
1	Info	ormation on Dataset A1: FS data	39				
2	Info	ormation on Dataset B1 : OFOD data	48				
3	Info	prmation on Datasets A1 and B1	54				
4	Info	prmation on Dataset C1	61				
5	5 Information on data compilation, validation and delivery practices						
6	6 New methodological information						
PAR	T III: PF	ROCEDURES FOR DATA TREATMENT AND DISSEMINATION	83				
1	Des	cription of the data integration process	83				
2	Des	cription of the quality checks	85				
	2.1	Quality checks results communicated to the countries	85				
	2.1.	1 Compliance with the Regulation checks	86				
	2.1.	2 Summary results	86				
	2.1.	3 Consistency over time	86				
	2.1.	4 Consistency between arrivals and departures figures	87				
2.1.5 Inter		5 Interdataset checks	87				
	2.1.	6 Seats available	89				
2.1.7		.7 Mirror checking	89				
	2.1.	8 Missing routes check	91				
	2.2	Frequency of the checks	91				
	2.3	Internal quality checks	91				
	2.3. orig	.1 Comparison between the flight stage declarations (A1) and the on flig gin/destination declarations (B1)	ght 91				

2 a	.3.2 irport d	Comparison between the on flight origin/destination declarations eclarations (C1)	(B1) and the 92
2 a	3.3 irport d	Comparison between the on flight origin/destination declarations eclarations (C1)	(B1) and the 92
3 N statist	/lethod :ics	of exclusion of the double counting when compiling aggregates for	air transport 92
3.1	Intro	oduction to the "double counting" concept	92
3.2	Prin	ciple of the exclusion of the double counting	92
3.3	Арр	lication of the principle	92
4 D	Dissemin	ation	94
4.1	Des	cription of the various supports	
4	.1.1	Eurobase	
4	.1.2	Statistics explained	
4.2	Proc	cedures of calculations and aggregations used in the dissemination proce	ess 95
ANNEXE	S		

## **INTRODUCTION**

This document is the twelfth version of the "Reference Manual on Air transport statistics". This Reference Manual contains three parts:

- Part I: Methodology, definitions and classifications
- Part II: National methodologies
- Part III: Procedures for data treatment and dissemination

The objective of part I is to give all the necessary background information related to the implementation of the Regulation (EC) 437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passengers, freight and mail by air as well as the subsequent implementing Commission Regulations 1358/2003, 546/2005 and 158/2007<sup>1</sup>. This part provides a description of the datasets structure, the definition of the statistical units and variables as well as the transmission of the datasets.

Part II of the manual provides information on the methodologies applied at national level for complying with the Regulation requirements. In order to collect this information, a questionnaire has been sent to the various reporting countries. Part II of the manual contains tables presenting the answers provided by the reporting countries by main methodological item of the questionnaire.

Part III of the manual gives an overview on how the data are processed and disseminated by Eurostat. It includes the description of the aviation data integration process as well as a description of the quality checks currently applied. The last section of this part is devoted to the dissemination means available for air transport data.

Compared to the eleventh version of the Manual, Part II, information related to the national methodologies has been reviewed. The countries provided up-to-date information that have been used to revise this part of the manual. The new structure of the simplified questionnaire has been detailed in annex. Other amendments cover the inclusion of the latest version of the annual quality report, based on 2014 data, and information regarding data transmission in the SDMX format.

This Manual also includes the updated list of reporting airports for the reference year 2016 (based on 2014 data provisions). Each year, the categories of airports are updated on the basis of the volumes of passengers and freight recorded during year n-2. This has an impact on the airports coverage in the data to be provided by the countries. The categories of airports defined for extra-EU reporting countries are given for information.

Finally, it has to be mentioned that there is a forum managed by Eurostat on CIRCABC, where documents, publications and other relevant information on air transport statistics can be accessed: <u>https://circabc.europa.eu</u> ("Transport Statistics" section)

<sup>&</sup>lt;sup>1</sup> All legal acts are available in the Annexes (I -V).

## PART I: METHODOLOGY, DEFINITIONS AND CLASSIFICATIONS

#### **1 DESCRIPTION OF THE DATASETS**

Regulation (EC) N°1358/2003, implementing Regulation N°437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passengers, freight and mail by air, mentions three datasets: the Flight Stage dataset, called A1, the On Flight Origin/Destination dataset, called B1 and the Airport dataset, called C1.

A1. This dataset contains periodic flight stage data registered for airport-to-airport routes, and broken down by arrivals/departures, scheduled/non-scheduled, passenger service/all-freight and mail service, airline information and aircraft type. The values provided concern passengers on board, freight and mail on board, commercial air flights as well as passenger seats available. Since the reference year 2004, data have to be provided on monthly basis.

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	"A1"	
Reporting country	2-alpha	Main ICAO nationality letters	
Reference year	2-digit	Type "yy" (2 last positions of the year)	
Reference period	2-alpha	Explicit (or Statra)	
Reporting airport	4-alpha	ICAO	
Next/previous airport	4-alpha	ICAO	
Arrival/departure	1-digit	1 = arrival	
		2 = departure	
Scheduled/non-scheduled	1-digit	1 = scheduled	
service		2 = non-scheduled	
Passenger service/all-	1-digit	1 = passenger service	
freight and mail service		2 = all-freight and mail service	
Airline information	3-alpha	Information on the airline	
Aircraft type	4-alpha	ICAO	
Passengers on board	12-digit		passenger
Freight and mail on board	12-digit		tonne
Commercial air fights	12-digit		Number of flights
Passenger seats available	12-digit		Passenger seat

**B1.** This dataset contains periodic on flight origin/destination data registered for airport-to-airport routes, and broken down by arrivals/departures, scheduled/non scheduled, passenger service/all-freight and mail service and airline information. The values provided concern passengers carried and freight and mail loaded or unloaded. Since the reference year 2004, data have to be provided on monthly basis.

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	B1	
Reporting country	2-alpha	Main ICAO nationality letters	
Reference year	2-digit	Type "yy" (2 last positions of the year)	
Reference period	2-alpha	Explicit(or Statra)	
Reporting airport	4-alpha	ICAO	
On flight origin/destination airport	4-alpha	ICAO	
Arrival/departure	1-digit	1=arrival	
		2=departure	
Scheduled/non-scheduled	1-digit	1=scheduled	
services		2=non-scheduled	
Passenger service/all-	1-digit	1=passenger service	
freight and mail service		2=all-freight and mail service	
Airline information	3-alpha	Information on the airline	
Passengers carried	12-digit		passenger
Freight and mail loaded or unloaded	12-digit		tonne

**C1.** This dataset contains periodic airport data registered for declaring airports, and broken down by airline information. The values provided concern total passengers carried, total direct transit passengers, total freight and mail loaded or unloaded, total commercial aircraft movements and aircraft movements. This dataset must contain at least annual data.

Elements	Coding detail	Nomenclature	Data provision	Unit
Table	2-alpha	C1	Obligatory, but could become part of the header information	
Reporting country	2-alpha	(1) Main ICAO nationality letters		
Reference year	2-digit	Туре "уу"		
Reference period	2-alpha	(2) Explicit		
Reporting airport	4-alpha	(3) ICAO		
Total passengers carried	12-digit			passenger
Total direct transit passengers	12-digit			passenger
Total transfer passengers <sup>2</sup>	12-digit			passenger
Total freight and mail loaded/unloaded	12-digit			tonne
Total commercial aircraft movements	12-digit			movement
Total aircraft movements	12-digit			movement

<sup>&</sup>lt;sup>2</sup> The number of transfer passengers that should be provided in dataset C1 consists in the total number of transfer passengers by reporting airport, counted only once.

#### 1.1 Description of the Statistical units and variables

Following the header of each definition, the list of articles or tables of the regulation where a reference to the term is made can be found.

#### 1.2 Definitions and variables of general interest

#### 1.2.1 Air Passenger

Any person, excluding on-duty members of the flight and cabin crews, who makes a journey by air. Infants in arms are included.

#### 1.2.2 Aircraft movement

An aircraft take-off or landing at an airport.

For airport traffic purposes one arrival and one departure is counted as two movements. Included are all commercial aircraft movements and non-commercial general aviation operations. Excluded are State flights, touch and goes, overshoots and unsuccessful approaches.

#### 1.2.3 Commercial aircraft movement

An aircraft movement performed for remuneration or for hire. Includes commercial air service movements and commercial general aviation operations.

#### **1.2.4 Passenger seats available**

The total number of passenger seats available for sale on an aircraft operating a fl ight stage between a pair of airports.

Includes seats which are already sold on a fl ight stage i.e. including those occupied by direct transit passengers.

Excludes seats not actually available for the carriage of passengers because of maximum gross weight limitations.

#### 1.2.5 Community airport

A defined area on land or water in a Member State subject to the provisions of the treaty, which is intended to be used either wholly or in part for the arrival, departure and surface movement of aircraft and open for commercial air services (see definition below).

#### 1.2.6 Community airport covered

Commission Regulation 1358/2003 implementing Regulation (EC) 437/2003 and the Commission Regulation (EC) No 546/2005 adapting Regulation (EC) No 437/2003 of the European Parliament and of the Council as regards the allocation of reporting-country codes and amending Commission Regulation (EC) No 1358/2003 as regards the updating of the list of Community airports, specify the airport categories applied in order to define the list of community airports covered by the Regulation until the reference year 2005.

The new Regulation (Commission Regulation (EC) No 158/2007 of 16 February 2007 amending Commission Regulation (EC) No 1358/2003 of 31 July 2003 as regards the list of Community airports (Text with EEA relevance)) specifies the airport categories applied in order to define the list of community airport covered by the Regulation for reference year 2007.

- Airports handling more than 1 500 000 passengers units per year (category 3), should transmit datasets A1, B1 and C1. However, they may have had complete or partial derogation on dataset B1 in year 2003.
- Airports handling more than 150 000 and less than 1 500 000 passengers units per year (category 2), should transmit datasets A1, B1 and C1. However, they may have had complete or partial derogation on the three datasets in years 2003, 2004 and 2005.
- Airports handling more than 15 000 and less than 150 000 passengers per year (category 1), should transmit dataset C1 only. However, they may have had complete or partial derogation in years 2003, 2004 and 2005
- Airports handling less than 15 000 passengers units annually (category 0), have no obligation to report data.

The list of reporting airports per country (for 2015 reference year) is available in Annex VI: the category of airports defined for the extra-EU reporting countries are given for information.

#### 1.2.7 State Flight

Any flight performed by aircraft for military, customs, police or other law enforcement services of a State.

Any flight declared as a "State flight" by State authorities.

The expression "except for flights by States aircraft" in Article 1 of Regulation (EC) 437/2003 should be interpreted as "except for State flights".

#### 1.2.8 Passenger unit

One passenger unit is equivalent to either one passenger or 100 kilograms of freight and mail. For the purpose of drawing up the list of Community airports (see above), the calculation of thresholds using "passenger units" has to take into account at Community airports (see definition), the total passengers carried (see definition) plus the total direct transit passengers (see definition) (counted once) plus the total freight and mail loaded and unloaded (see definition).

#### **1.2.9 Commercial air service**

An air transport flight or series of flights for the public transport of passengers and/or freight and mail, for remuneration or for hire.

The air service may be either scheduled (see definition) or non-scheduled (see definition).

#### 1.2.10 Scheduled air service

A commercial air service (see definition) operated according to a published timetable, or with such a regular frequency that it constitutes an easily recognisable systematic series of flights.

Includes extra section flights occasioned by overflow traffic from scheduled flights.

#### 1.2.11 Non-scheduled air service

A commercial air service (see definition) other than scheduled air service (see definition).

#### **1.2.12 Passenger air service**

Scheduled (see definition) or non-scheduled air service (see definition) performed by aircraft carrying one or more revenue passengers and any flights listed in published timetables as open to passengers.

Includes flights carrying both revenue passengers and revenue freight and mail.

#### 1.2.13 All-freight and mail air service

Scheduled (see definition) or non-scheduled air service (see definition) performed by aircraft carrying revenue loads other than revenue passengers, i.e. freight and mail.

Excludes flights carrying one or more revenue passengers and flights listed in published timetables as open to passengers.

#### **1.2.14** Airline (Commercial air transport operator)

An air transport undertaking with a valid operating licence for operating commercial air Flights (see definition).

Where airlines have joint-venture or other contractual arrangements requiring two or more of them to assume separate responsibility for the offer and sale of air transport products for a flight or combination of flights, the airline actually operating the flight shall be reported.

#### **1.2.15** Definitions and variables of interest for table A1 (flight stage)

An air transport undertaking with a valid operating licence for operating commercial air Flights (see definition).

Where airlines have joint-venture or other contractual arrangements requiring two or more of them to assume separate responsibility for the offer and sale of air transport products for a flight or combination An air transport undertaking with a valid operating licence for operating commercial air Flights (see definition).

Where airlines have joint-venture or other contractual arrangements requiring two or more of them to assume separate responsibility for the offer and sale of air transport products for a flight or combination An air transport undertaking with a valid operating licence for operating commercial air Flights (see definition).

#### **1.3 Definitions and variables of interest for table A1 (flight stage)**

#### **1.3.1 Flight stage (Table A1)**

The operation of an aircraft from take-off to its next landing.

#### 1.3.2 Passengers on board (Table A1)

All passengers on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport.

All revenue and non revenue passengers on board an aircraft during a flight stage (see definition).

Includes direct transit passengers (see definition) (counted at arrivals and departures).

All freight and mail on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport.

All freight and mail on board an aircraft during a flight stage (see definition).

Includes direct transit freight and mail (counted at arrivals and departures). Includes express services and diplomatic bags. Excludes passenger baggage.

It is recommended to exclude the weight of containers in the freight data reported.

#### **1.3.4 Commercial air flight (Table A1)**

An air transport flight performed for the public transport of passengers and/or freight and mail, for remuneration and for hire.

In table A1, the commercial air flights are aggregated to calculate the other "indicator fields" ("Passengers on board (see definition)", "Freight and Mail on board (see definition)" and "Passenger seats available (see definition)").

#### 1.3.5 Passenger seats available (Table A1)

The total number of passenger seats available for sale on an aircraft operating a flight stage (see definition) between a pair of airports.

On a flight stage (-10-), the total number of revenue passengers should not exceed the total number of passenger seats available for sale.

Includes seats which are already sold on a flight stage i.e. including those occupied by direct transit passengers (see definition).

Excludes seats not actually available for the carriage of passengers because of maximum gross weight limitations.

If information on this basis is not available, then one of the following estimates should be provided in order of preference (from more to less adequate):

- 1. The specific aircraft configuration expressed in number of passenger seats available in the aircraft (identified by aircraft registration number),
- 2. The average aircraft configuration expressed in average number of passenger seats available for the type of aircraft for the airline,
- 3. The average aircraft configuration expressed in average number of passenger seats available for the type of aircraft.

#### 1.3.6 Aircraft

Any machine that can derive support in the atmosphere from the reactions of the air other than the reactions of air against the earth's surface

Dirigibles and surface effect vehicles such as hovercraft are excluded.

## **1.4** Definitions and variables of interest for table B1 (on flight origin and destination) and table C1 (airports)

#### 1.4.1 On flight origin and destination (Table B1)

Traffic on a commercial air service (see definition) identified by a unique flight number subdivided by airport pairs in accordance with point of embarkation and point of disembarkation on that flight. For passengers, freight or mail where the airport of embarkation is not known, the aircraft origin should be deemed to be the point of embarkation; similarly, if the airport of disembarkation is not known, the aircraft destination should be deemed to be the point of disembarkation.

<u>NB</u>: Since an individual passenger's air journey may consist of more than one flight, a passenger's onflight origin and destination is not necessarily his true origin and destination. This is also the case, in a lower extent, for freight/mail consignments.

#### Passengers carried (Tables B1 & C1)

All passengers on a particular flight (with one flight number) counted once only and not repeatedly on each individual stage of that flight.

All revenue and non revenue passengers whose journey begins or terminates at the reporting airport and transfer passengers joining or leaving the flight at the reporting airport.

Excludes direct transit passengers (see definition).

#### Freight and mail loaded or unloaded (Tables B1 & C1)

All freight and mail loaded onto or unloaded from an aircraft.

Includes express services and diplomatic bags. Excludes passenger baggage. Excludes direct transit freight and mail.

It is recommended to exclude the weight of containers in the freight data reported.

#### Direct transit passengers (Table C1)

Passengers who, after a short stop, continue their journey on the same aircraft on a flight having the same flight number as the flight on which they arrive.

In total airport statistics as well as for the calculation of the passenger units (see definition), passengers in direct transit are counted once only.

Passengers who change aircraft because of technical problems but continue on a flight with the same flight number are counted as direct transit passengers.

On some flights with intermediate stops, the flight number changes at an airport to designate the change between an inbound and outbound flight. An example is a flight from Barcelona to Hamburg where the flight continues to Frankfurt before returning to Barcelona. Where passengers for an intermediate destination continue their journey on the same aircraft in such circumstances, they should be counted as direct transit passengers.

#### Transfer or indirect transit passengers

Passengers arriving and departing on a different aircraft within 24 hours, or on the same aircraft bearing different flight numbers. They are counted twice: once upon arrival and once on departure.

On some flights with intermediate stops, the flight number changes at an airport to designate the change between an inbound and outbound flight. Where passengers for an intermediate destination continue their journey on the same aircraft, they should not be counted as transfer or indirect transit passengers at the airport where the flight number is changed.

#### Total commercial aircraft movements (Table C1)

All take-offs and landings for flights performed for remuneration and for hire.

Includes commercial air services (see definition) as well as all commercial general aviation operations.

#### **Total aircraft movements (Table C1)**

All take-offs and landings of aircraft.

Includes total commercial aircraft movements (see definition) as well as non commercial general aviation operations. Excludes State Flights (see definition). Excludes Touch and goes, overshoots and unsuccessful approaches."

#### 1.5 The difference between on flight origin/destination and flight stage data

The difference between on flight origin/destination and flight stage data can be illustrated by the following example: a flight is operated on a route New York-London-Paris 185 passengers travel from New York to London, 135 from New York to Paris and 75 from London to Paris. Thus in terms of on flight origin/destination data the figures recorded are 185 passengers New York-London, 135 passengers New York-Paris and 75 passengers London-Paris. New York would record the figures for New York-London and New York-Paris; London would record New York-London and London-Paris; Paris would record New York-Paris and London-Paris. In terms of flight stage data there are two flight stages and the figures reported by New York and London airports are: New York-London 320=(185+135) passengers and by London and Paris airports are London-Paris 210=(135+75) passengers.

The following diagram gives an example of reporting transport in datasets A1 and B1.





Reporting Airport	Next/Previous Airport	(A/D) Arrival/Depart.	A1 - Flight stage passengers	B1 - On Flight OD passengers	True OD passengers (not to be reported)
Reported by USA					
New York	London	D	320	320	185
		Reported by	UK		
London	New York	А	320	320	185
London	Paris	D	210	210	75
Reported by France					
Paris	London	А	210	210	75

In case of "transfer" or "Indirect Transit" passengers, the passengers figures reported in A1 figures are equal to the passenger figures reported in B1.

Case 2: Journey from New York to London and then from London to Paris with the same Aeroplane (same flight number), making a transit in London.

FOR AIRLINE "X" AND AIRCRAFT TYPE "Y"



DATA TO BE REPOR	TED	

-	-	
		/

Reporting Airport	Next/Previous Airport	(A/D) Arrival/Depart.	A1 - Flight stage passengers	B1 - On Flight OD passengers	True OD passengers (not to be reported)
		Reported by	USA		
New York	London	D	320	185	185
New York	Paris	D	-	135	135
		Reported by	UK		
London	New York	А	320	185	185
London	Paris	D	210	75	75
Reported by France					
Paris	New York	Α	-	135	135
Paris	London	A	210	75	75

In case of "direct Transit" passengers, the passenger figures reported in A1 are different from the passenger figures reported in B1.

#### **1.6** The reporting of airport data in table C1

THE TOTAL TRANSPORT REPORTED BY LONDON:

- FROM ALL PARTNER AIRPORTS (ORIGIN OF THE FLIGHTS) TO LONDON
- **FROM LONDON TO ALL PARTNER AIRPORTS (DESTINATION OF THE FLIGHT)**
- **TOTAL TRANSFER PASSENGERS AT LONDON (COUNTED ONLY ONCE).**



**DATA TO BE REPORTED** 

	-				
Reporting Airport	Total passengers carried	Total transfer passengers			
Reported by London					
London	25 000	3 000			

#### 1.7 Codification of the type of flight

Validation checks performed in the frame of the data integration in the production database have allowed detecting a recurrent problem for the codification of the dimension "Type of Flight" in the Flight Stage and On flight Origin Destination datasets.

In order to harmonise the approach for all reporting countries, Eurostat recommends applying a general rule, fully in line with the Regulation:

- if the flight has at least one passenger: it is a "Passenger service flight" (Code "1")
- if the flight has no passenger but some freight and mail: it is an "All-freight and mail service flight" (Code "2")
- if the flight has no passenger and no freight and mail: it is most probably a non-commercial flight that should not be reported in datasets A1 and B1.

The aim of this recommendation is that the reporting countries provide the type of flights in the Flight Stage and On flight Origin Destination datasets according to one single methodology."

#### **2 CLASSIFICATIONS**

#### 2.1 Country code

In the files provided the reporting country code has to be completed. The countries are coded using a 2-letter codes corresponding to the concatenation of the ICAO Aeronautical fixed service area codes (first digit), ICAO country identifier codes (second digit). The updated list of the country codes to be used is provided in annex VIII

#### 2.2 Airport code

In the tables to be provided in the frame of Regulation 437/2003, the airports (reporting airports and partner airports) are coded using the 4-letter ICAO codes as listed in the ICAO Document 7910. The internal airport dictionary uses a concatenation of the ICAO Aeronautical fixed service area codes (first digit), ICAO country identifier codes (second digit) and national telecommunication centre identifier codes (third and fourth digit) and thus is a four digit alphanumeric code.

The airport dictionary is used in all datasets for the reporting airport and also in A1 and B1 for the partner airport.

The codes are derived as a subset from those published in ICAO Document 7910. The subset is determined by the data providers who nominate which codes to use when more than one telecommunication centre code exist for a given airport. Normally the selected code corresponds to the civil operations communication centre code. Transcoding is required when a country reports data to another telecommunications centre code than the one specified by the partner country

The range of valid airport codes is modified, if the ICAO country identifier codes and/or the national telecommunication centre identifier codes are revised. Therefore, the airport dictionary requires regular revisions for a small percentage of its codes.

ICAO doc 7910 is not a list of airports but of airport telecommunication centre codes. Not all world airports are in this list. This is why the dictionary is also updated when temporary codes are allocated by Eurostat for airports that do not have a valid ICAO Document 7910 code.

Indeed if no ICAO code is available for the airport, then a temporary code is allocated by Eurostat for the airport, with the codes XX01 to XX79 being used per country (XX being the 2 digits code of the country concerned.

If the partner airport is unknown, the code to be used to report data is "ZZZZ".

Before the adoption of Regulation (EC) 437/2003, other airport coding systems were used by some countries, notably IATA. IATA has 3-letter location identifiers, which include the codes for airports as used on passenger tickets. Eurostat used to transcode these IATA code to ICAO code before importing data in the database.

In order to support the reporting countries for transcoding IATA codes that may be provided by the data suppliers, Eurostat is regularly maintaining a correspondence table between ICAO airport codes and IATA airport codes, which is sent on a regular basis by Eurostat to the reporting countries.

#### 2.3 Air transport operator code

Initially it was planned to use the 3-letter air transport operator code as listed in ICAO Document 8585.

Discussion with the data providers lead to the conclusion that this information is a real sensitive one, and could hardly be obtained from the airport authorities.

Commission Regulation 1358/2003 gives the list of codes to be alternatively used for the provision of information related to the airline. The following codes have to be used by the data providers:

#### Datasets A1 and B1

- 1NE \_\_\_\_ Airlines not licensed in the European Union
- ZZZ \_\_\_ Unknown airlines
- 888 "confidential" (to be used in tables A1 and B1 if an "information on the airline" is not allowed for confidentiality reasons)

#### Dataset C1

- 1NE → Airlines not licensed in the European Union
- "999" -> "all airlines" (to be used in table C1 only)

Airlines partly licensed in EU shall be reported as "EU airlines". For instance SAS is reported under the code "1EU"

In dataset C1, in case the old format of dataset C1 is still provided, the airline information field is mandatory for airports, which also have to report tables A1 and B1. However, if in tables A1 and B1 the airline information is declared as confidential, in table C1 the code "999" should be provided.

For airports which are under no obligation to report tables A1 and B1, the code "999" that covers all airlines may be used.

The mention "optional" that appears in the description of tables A1 and B1 in Regulation, 1358/2003 for the dimension airline information refers to the fact that on a voluntary basis, the codes "1+lso alpha 2 country code" (country of licensing of the airline) for airlines licensed in a Member State or "2+lso alpha 2 country code" for airlines not licensed in a Member State could also be used as well as the ICAO airline code (document 8585).

#### 2.4 Aircraft code

Information on aircraft type has only to be provided in the table A1 of Regulation 437/2003, the aircraft information has to be coded following the 4-letter of the ICAO aircraft type designators as listed in the ICAO Document 8643.

The type of aircraft dictionary is updated by ICAO annually, for new types of aircraft.

If the data provider does not know the type of aircraft, the code "ZZZZ" has to be used

#### **3** DATA TRANSMISSION FORMAT: STANDARDISATION AND VALIDATION

#### 3.1 Transmission of results

In the frame of Regulation 1358/2003, the Member States have to transmit their data as soon as possible and no longer than six month after the end of the period of reference. The following table gives a clear overview of the deadlines depending on the observation period.

Period of observation	Latest date for transmission
January year t	July year t
February year t	August year t
March year t	September year t
April year t	October year t
May year t	November year t
June year t	December year t
July year t	January year t+1
August year t	February year t+1
September year t	March year t+1
October year t	April year t+1
November year t	May year t+1
December year t	June year t+1
Quarter 1 year t	September year t
Quarter 2 year t	December year t
Quarter 3 year t	March year t+1
Quarter 4 year t	June year t+1
Year t	June year t+1

#### 3.2 Description of the data files and transmission format

The following formats are acceptable for the transmission of the Regulation tables:

- "CSV" (Comma Separated Values) with semicolon (;) as field separator
- SMDX-ML (Statistical data and metadata exchange message language)

The SDMX-ML format is new and will facilitate data exchange and data pre-validation. The production environment has been set up and some countries are already sending SDMX-ML formatted data.

Having data formatted in SDMX-ML means that the eDAMIS validation engine can be used to validate data before it is transmitted to Eurostat.

The sending of GESMES formatted files has been phased out. Instead one can send the CSV format until a migration to SDMX-ML has been carried out.

Genedi is on phase out and should not be used anymore to generate GESMES formatted files. It can still be used to validate a data file before sending it to Eurostat. Once migrated to SDMX-ML the eDAMIS validation engine can be used for validation.

The following summary table gives for each table of the regulation ("A1", "B1" and "C1") and each record (line), the list of fields to be provided. Two different types of fields are marked in the column associated to the relevant table:

- "X": fields that have to be provided for a table,
- " " (space): fields not relevant for the table. These fields should normally not be provided in the related tables. Nevertheless empty fields (2 fields separator without data between) are also acceptable in this case.

Examples of transmission format are provided in Annex IX.

The format of each field is either numeric (n) or alphabetic (a) or alphanumeric (an)

The size is either fixed ("format + number" - e.g.:"n4") or variable with a maximum number of positions ("format + ".."+max. number of positions - e.g.:"n..12").

Pos	Fields	Format & size	Tables		
			A1	<b>B1</b>	<b>C1</b>
1	Table identification	an2	Х	Х	Х
2	Reporting country	a2	Х	Х	Х
3	Reference year	n2 or n4	Х	Х	Х
4	Reference period	an2	Х	Х	Х
5	Reporting airport	an4	Х	Х	Х
6	Partner airport	an4	Х	Х	
7	Arrival/departure	n1	Х	Х	
8	Scheduled/non scheduled services	n1	Х	Х	
9	Passenger flight / All-freight and mail flight	n1	Х	Х	
10	Airline information	an3	Х	Х	
11	Aircraft type	an4	Х		
12	Passengers	n12	X	X	X
13	Direct transit passengers	n12			X
14	Transfer passengers	n12			X
15	Freight and mail	n12	X	X	X
16	Commercial air flights (table "A1") /	n12	X		X
	Total commercial aircraft movements (table "C1")				
17	Total aircraft movements	n12			X
18	Passenger seats available	n12	X		

One table (for one period) should correspond to one file (or "consignment") transmitted to Eurostat

Each file (table) should be named according to the following standard: "CCYYPPTT.csv" (for csv format) or: "CCYYPPTT.ges" (for gesmes format): where:

- "CC" represents the Country Code (ISO alpha2),
- "YY" the Year, "PP" the period (AN, Q1..Q4 or 01..12)
- and "TT", the Table-ID ("A1", "B1" or "C1").

In case the file is compressed, the ".zip" suffix should be used instead of ".csv" or ".ges".

#### 3.3 Data Transmission

#### 3.3.1 General recommendations

The use of eDAMIS is mandatory for all official data transmissions to Eurostat. For more information about eDAMIS consult the eDAMIS helpcentre which is available via the eDAMIS homepage: <u>https://webgate.ec.europa.eu/edamis</u>, simply by clicking on the corresponding menu option:

Eurostat - eDAMIS-PROD - Portal			🙆 • 📾 - 🖙 🖶	• Page • Safety • Tools • 🔞 •
🔅 eurostat 🐶	DAMIS · Web	Portal		Important legal notice English 💌
eDAMIS - Web Portal			eDAMIS Help Centre	Contact   About Java enabled
		Welcome to eDAMIS web portal		
	Warning about regu	Circa user-id: Circa password: Sign int Sign int Self registration (1 have no circa user-id) Linave forgotten my user-id or password lar update to be made if necessary every first and third Wednesday of the Application is likely to be closed between 07:00 and 09:00 am.	month.	
	Main release	3.1d - Installed 21/02/2011	1	
	Content	Detailed release note		
	Last patch installed	3.1d.039 - 24/11/2011		
	Correction made	Erreur Base64XmlDecode : String index out of range: 86 when downloading fror Detailed patch note	n EWP.	
	200			

#### 3.3.2 eDAMIS presentation

eDAMIS (electronic Data files Administration and Management Information System) offers standard solutions for collecting data files in the European Statistical System. eDAMIS implements the Single Entry Point policy of Eurostat.



Its usage is simple: the tool can be either installed on the PC of the National Statistical Institute or the web application can be used (no installation is needed on the user's PC in this last case). The two methods of usage of the tool are detailed in the following diagrams.



The eDAMIS application environment also has the following characteristics:

- It provides adapted solutions to several needs and users profiles (National Statistical Institutes as well as other organisations)
- It facilitates fully automated data transmissions
- It guaranties secure transmissions
- It offers value added services such as traffic monitoring, acknowledgements, reminders ...

#### Single User-ID for all services

The other main advantage of the eDAMIS tool is that the ECAS user-id/password can be used to access the application.

In order to get an ECAS user-id/password, a user only needs to go to eDAMIS Web Portal (<u>https://webgate.ec.europa.eu/edamis</u>) and click on the "ECAS authentication" button. Once on the ECAS website, the user should click on "Not registered yet" and fill the form.

#### eDAMIS - the Validation Engine (eVE)

All the following information, necessary for data validation, is included in the eDAMIS application:

- Description of the structure of the datasets, including the type and size of each field
- Updated versions of reference code lists (or links towards code lists)
- Updated validation rules
- Information on problems leading to an error or a warning.

eDAMIS performs data validation for structured flat files (CSV: Comma Separated Values), GESMES files (except "compact GESMES") and SDMX-ML files. The following list presents the various checks that can be performed by the tool:

- Basic intra-record controls and checking of duplicate keys between records
- The main intra-record controls are:
  - Valid field separator (accepted field separators: ";" (semicolon), "," (comma), ":" (colon), "+" (plus), tab) and count of the number of fields
  - Consistency between the identification envelope and the content of the file. If present in the data file, the following fields will be controlled against the identification envelope:
    - the dataset ID
    - the country code
    - the year
    - the period
- Presence of characters in mandatory fields
- Type and size (e.g. AN(2..5) for alphanumeric 2 to 5 characters)
- Availability of a code in a code list
- Some basic validation rules (simple mathematical expressions evaluation)

#### More information

The following points provide some links to information about eDAMIS

- eDAMIS Web Portal (eWP) is accessible at <u>https://webgate.ec.europa.eu/edamis</u>
- "eDAMIS Help Centre" is accessible on eDAMIS Web Portal by clicking on the link "eDAMIS Help Centre"
- eDAMIS Web Application (for National Statistical Institute): the Local Coordinator in each country should be contacted (list on eDAMIS Help Centre, section "contacts")
- Eurostat Support can be contacted at the following address: <u>estat-support-edamis@ec.europa.eu</u>

### 3.3.3 Standardization of message format for data exchange: Statistical Data and Metadata eXchange (SDMX)

Eurostat developed during 2013 a so called structure definition for the existing aviation datasets for which data is currently being collected. The aim is to further improve the exchange and pre-validation of data for air transport statistics. This structure definition is compliant with the standards defined by the SDMX (Statistical Data and Metadata eXchange) initiative. It allows validating, in a user friendly manner, data that is being sent by the data providing organisation. The management of code lists and validation rules is centralized. No special software needs to be pre-installed anymore by the data provider to carry out the validation of data.

An introduction of this new data exchange standard to air transport data providers is being supported by other developments that have been and are being carried out for the Transport Information System (TRIS) and Eurostats Single Entry Point for data (eDAMIS).

SDMX consists of technical and statistical standards and guidelines, to be used for the efficient exchange and sharing of statistical data and metadata. Full information on the SDMX standards and organisation is available on http://www.sdmx.org. Eurostat aims to increase the use of SDMX in the European Statistical System (ESS) and to exploit this standard to improve data collection, production and dissemination processes. In April 2009, the Eurostat senior management reiterated that SDMX should be broadly used within the ESS. This is in line with the new Eurostat strategy on the production methods of EU statistics.

For air transport statistics Eurostat introduced in 2013 the usage of SDMX and pre-validation of data to be transmitted. Data providers are invited to consult the above mentioned sdmx related website in order to obtain further information on what this standard is about. It is planned that further transport modes will migrate to SDMX-ML.

The csv files to be prepared before conversion into SDMX using the converter tool and the latest version of the DSD for air transport statistics should have the following format:

Dataset A1:

M;A1;ED;ED99;ED99;2;1;1;ZZZ;ZZZZ;12\_07;1111;2222;3333;4444

Dataset B1:

M;B1;ED;ED99;ED99;2;1;1;ZZZ;12\_07;1111;2222

Dataset C1:

M;C1;ED;ED99;12\_01;1111;2222;3333;4444;5555;6666

The 'TIME\_PERIOD' field should be placed before the first value (namely "ObsValue") in all datasets, and the frequency field should be added at the beginning of each record.

An updated version of the DSD for air transport is issued each time a significant revision occurs in the ICAO list of airports, which has been defined as the reference list for launching an update of the DSD (updated lists received in the meantime for airlines and aircraft are systematically taken into consideration). The updated versions of the DSD are made available to the reporting countries via an outgoing dataset in eDAMIS.

#### **4 QUESTIONNAIRE ON AVIATION STATISTICS**

The current Regulations on air transport statistics cover the traffic and transport measurement. However, there is a need for further information on some additional issues related to the aviation sector which are collected for other modes of transport:

- Infrastructure
- Equipment
- Enterprises, economic performance and employment
- Accidents

For this purpose, a questionnaire has been designed in order to collect information on the above items. Its objective is to collect a limited number of indicators and aggregated data. It is compounded of a questionnaire aiming at collecting data at national level and of questionnaires collecting information for the main airports. As some of the requested data could be retrieved from existing sources, Eurostat pre-fills the questionnaires before sending it to the countries.

An example of a questionnaire is available in Annex XI.

#### **5 VOLUNTARY DATA TRANSMISSION**

#### 5.1 Background

In the frame of the different meetings of the Task Force and the Working Group on air transport statistics, new datasets S1, S2 and B2 were identified for the collection of air safety related data (S1 and S2) and true/origin destination data (B2) on a <u>voluntary basis</u>.

The structure of these datasets has been defined in order to fill needs expressed by data users.

The following paragraphs present detailed information on the structure and the format of these datasets.

#### **Objective for dataset S1:**

To provide data by aircraft type for aircraft registered in the country of the data provider.

#### **Dataset description:**

- Identification: AIR\_S1\_A
- Label: Air safety related utilisation data by aircraft type
- Frequency of transmission: annual
- Reference period: annual
- Indicative delay for transmitting data after the end of the reference period: voluntary

#### Data format defined for dataset S1

Elements	Coding detail	Nomenclature	Data provision	Unit
Table	2-alpha	S1	Obligatory	
Reporting country	2-alpha	Two-letter ISO country code	Obligatory	
Reference year	2-digit	Two-digit (2 last positions of the year)	Obligatory	
Aircraft type	4-alpha	Aircraft codification (ICAO, 4 characters)	Obligatory	
Type of operation	1-digit	1= Commercial 2= General aviation 3= Aerial work 4= Other	Obligatory	
Number of registered aircraft	6-digit		Obligatory	Number of aircraft
Number of flights	9-digit		Obligatory	Flights

#### **Objective for dataset S2:**

**S2** demands data by airport. No threshold is provided for defining the reporting airports: in principle, all airports/aerodromes where civil aviation operations take place should be covered.

#### **Dataset description:**

- Identification: AIR\_S2\_A
- Label: Air safety related utilisation data by airport
- Frequency of transmission: annual
- Reference period: annual
- Indicative delay for transmitting data after the end of the reference period: 5 months

#### Data format defined for dataset S2

Elements	Coding detail	Nomenclature	Data provision	Unit
Table	2-alpha	S2	Obligatory	
Reporting country	2-alpha	Two-letter ISO country code	Obligatory	
Reference year	2-digit	Two-digit (2 last positions of the year)	Obligatory	
Reporting airport	4-alpha	ICAO four-letter code	Obligatory	
Type of operation	1-digit	1= Commercial 2= General aviation 3= Aerial work 4= Other	Obligatory	
Number of flights	9-digit		Obligatory	Flights

#### **Objective for dataset B2:**

**B2** demands data by airport. No threshold is provided for defining the reporting airports. All data available are welcomed, on a voluntary basis.

#### **Dataset description:**

- Identification: AIR\_B2\_M
- Label: Terminal passengers Origin/Destination data

- Reference period: monthly
- Indicative delay for transmitting data after the end of the reference period: voluntary

#### Data format defined for dataset B2

Elements	Coding detail	Nomenclature	Data provision	Unit
Table	2-alpha	B2	Obligatory	
Reporting country	2-alpha	ICAO two-letter country code	Obligatory	
Reference year	2-digit	Two-digit (2 last positions of the year)	Obligatory	
Reference period	2-alpha	Explicit two-digit (month)	Obligatory	
Reporting airport	4-alpha	ICAO four-letter code	Obligatory	
First origin airport	4-alpha	ICAO four-letter code	Obligatory	
Final destination airport	4-alpha	ICAO four-letter code	Obligatory	
(Connecting airport(s)	4-alpha	ICAO four-letter code (max. 5 codes))	Tentative information if available	
Terminal passengers	12-digit		Obligatory	

#### 5.2 **Definitions**

The definitions available in this section are mainly those applied by ICAO. More definitions and information on the composition of each term defined hereafter are available in the ICAO documentation (see ICAO website ).

#### 5.2.1 Type of operation

#### Commercial air transport

The definition applied by ICAO for "Commercial air transport" is as follows:

**Commercial air transport operation:** An aircraft operation involving the transport of passengers, cargo or mail for remuneration or hire.

ICAO provides the following breakdown for commercial air transport:

- Scheduled air service (covering scheduled international, scheduled domestic)
- Non-scheduled revenue operations (covering non-scheduled international, non-scheduled domestic)
- Non-revenue operations (covering Ferry/positioning, Training/check, Other, Unknown)
- Other (covering Air taxi<sup>3</sup>, Emergency Medical Service, Off shore flight, Sight-seeing, Other, Unknown)
- Unknown

<sup>&</sup>lt;sup>3</sup> Air taxi is defined by ICAO as follows: "On-demand, non-scheduled flights on short notice for the carriage by air of passengers, freight or mail or any combination thereof for remuneration usually performed with smaller aircraft (max 30 seats or max 3 400 kg of payload capacity). Includes an on-demand flight for the specific carriage of sick or injured persons. (Air ambulance)"

#### General aviation

The definition applied by ICAO for "General aviation" is as follows:

**General aviation:** All civil aviation operations other than scheduled air services and nonscheduled air transport operations for remuneration or hire or aerial work.

As concerns the definition related to "commercial general aviation", there might be confusion between General Aviation and Commercial Aviation (e.g. Taxi is commercial, just as ambulance flights could be commercial etc. – but is it commercial according to the existing definitions?).

In terms of General Aviation, all Instrument Flight Rules (IFR) flights will probably be recorded in registers and come through dataset S2, but this is not the case with Visual Flight Rules (VFR) flights since General Aviation flying is very liberal and not always recorded by Air Navigation Service Providers/aerodromes (even though pilots log their hours in the logbook, it is not easy to get this information). EASA therefore supports the idea of Commercial General Aviation and Non-Commercial General Aviation.

EASA has no explicit definition on General Aviation, but instead has non-commercial operations. EASA's definitions are based on the purpose of the flight and whether the aircraft is complex or "other than complex". As an example, whenever an operation is operating commercially by transporting passengers, cargo or mail for remuneration or other valuable consideration, the operation has to apply CAT (Commercial Air Transport) rules that are contained in Part-CAT of Regulation 965/2012. Whenever the purpose of the flight is commercial, but does not transport passengers, cargo or mail (e.g. commercial areal work), the rules of Part-SPO (SPecialised Operations) will apply. The figure below shows the operation types and rules that apply, as per Regulation 965/2012<sup>4</sup>.

Commercial	Commercial air	Technical rules: Part-CAT			
operations	transport (CAT)	Specific approvals: Part-SPA			
		Operator requirements: Part-ORO Technical rules: Part-SPO Specific approvals: Part-SPA Operator requirements: Part-ORO			
	Non-CAT (specialised				
	operations - e.g. aerial work)				
Non-	Non-commercial operations (including	With complex motor-powered aircraft:	Technical rules: Part-NCC Specific approvals: Part-SPA Operator requirements: Part-ORO		
operations	training flights)	With other-than-complex motor-powered aircraft:	Technical rules: Part-NCO Specific approvals: Part-SPA		
	Specialised operations	Technical rules: Part-SPO			
	(e.g. aerial work)	Specific approvals: Part-SPA			
		With complex motor-powered aircraft: also Part-ORO			

Any activity that is non-CAT or non-SPO will fall under the non-commercial rules of Part NCC/Part-NCO, which corresponds roughly to "General Aviation" and includes flight training. Flight training schools will fall under non-commercial rules contained in Part-NCC (when flying with complex motor-powered aircraft) or Part-NCO (when flying with other than complex motor-powered aircraft or not). Therefore,

<sup>&</sup>lt;sup>4</sup> Currently, only the rules for CAT operators have been adopted with Regulation 965/2012. Rules for non-commercial operators (NCC and NCO) and specialised operations (PART-SPO) have not yet been adopted by the Council.

business aviation for commercial purposes complies with Part-CAT rules. Definitions of commercial, complex and other than complex are available in Basic Regulation Article 3 and the definition of CAT is available in OPS regulation 965/2012 under Article 2.

#### Aerial work

The definition of ICAO for "Aerial work" is as follows:

Aerial work: An aircraft operation in which an aircraft is used for specialized services such as agriculture, construction, photography, surveying, observation and patrol, search and rescue, aerial advertisement, etc

ICAO provides the following breakdown for aerial work:

- Commercial (including Aerial advertising, Aerial observation, Aerial patrol, Aerial survey, Agricultural, Construction/Sling loading, Firefighting, Government excluding state flights, Logging, Parachute drop, Photography, Search and rescue, Towing, Other, Unknown)
- Non-commercial (including Aerial advertising, Aerial observation, Aerial patrol, Aerial survey, Agricultural, Construction/Sling loading, Firefighting, Government excluding state flights, Logging, Parachute drop, Photography, Search and rescue, Towing, Other, Unknown)

The compilation of data on "aerial work" has been pointed out as relatively complex: while it concerns local flights, it could include both commercial and non-commercial flights, which is likely to generate issues for extracting "aerial work" from the data available in the reporting countries.

For EASA, "Aerial Work" is broken down into two categories (see figure above). The future SPO rules define specialised operations (SPO) as 'any operation other than commercial air transport where the aircraft is used for specialised activities such as agriculture, construction, photography, surveying, observation and patrol, aerial advertisement'. Part-SPO also includes a list of activities, which are as follows:



#### Other type of operations

The category "Other type of operations" should contain any operation not classified elsewhere (e.g. not classified in "Commercial air transport", "General aviation" or "Aerial work").

#### **5.3 Values to be collected**

This last section provides information on the different values that should be collected in dataset S2, aiming at constituting a clear basis for the data collection.

#### 5.3.1 Registered aircraft

The following definitions related to aircraft are available in the 4th edition of the Glossary for Transport Statistics:

Aircraft: Any machine that can derive support in the atmosphere from the reactions of the air other than the reactions of air against the earth's surface. Dirigibles and surface effect vehicles such as hovercraft are excluded. ICAO provides aircraft type designators in ICAO Document 8643. In addition, ICAO and the Commercial Aviation Safety team (CAST) have jointly developed a new taxonomy to correctly identify aircraft. Details are available on the following website: <u>http://www.intlaviationstandards.org/</u>

Aviation fleet: Aircraft registered at a given date in a country.

An aircraft registration is a unique alphanumeric string that identifies a civil aircraft. In accordance with the Convention on International Civil Aviation, all aircraft must be registered with a national aviation authority and they must carry proof of this registration in the form of a legal document called a Certificate of Registration at all times when in operation. Most countries also require the aircraft registration to be imprinted on a permanent fireproof plate mounted on the fuselage for the purposes of post-fire/post-crash aircraft accident investigation.

The Certificate of Registration contains contact information used by national authorities for enforcement purposes, and for the purposes of disseminating Airworthiness Directives to aircraft owners. Most national authorities require that the aircraft owners update said contact information immediately or as soon as possible any time there is a change in the same.

#### 5.3.2 Flights

The following definition of a flight is available in the 4th edition of the Glossary for Transport Statistics:



EASA's view on the collection of Origin/Destination data is that it should be limited to the number of landings (or cycles). In terms of safety, the highest risk of each flight is either the take-off phase or the landing phase: it is therefore valuable to collect the number of landings.

#### 5.3.3 Hours flown

Despite it looks as a self-explanatory concept, the term 'hours flown' needs a clear definition: indeed, in some cases, the number of hours flows could be considered strictly, from take-off to landing, while it has to cover a larger part of the aircraft movement. Therefore, the following definition, from ICAO, is proposed:

**Aircraft hours**: Aircraft hours based on "block-to-block" time (i.e. from the moment the aircraft is pushed back from the gate or starts taxiing from its parking stand for take-off to the moment it comes to a final stop at a gate or parking stand after landing); also known as block time.

EASA's view on the collection of hours flown is that time values should be from "gate to gate" but not from take-off to landing, thus confirming the approach of ICAO. An existing definition states the following: 'Flight time' means, for aeroplanes and touring motor gliders, the time between an aircraft first moving from its parking place for the purpose of taking off until it comes to rest on the designated parking position and all engines or propellers are shut down.

In terms of risk analysis, it is necessary for EASA to be able to determine risk on components like engines and other systems that are in operation from start-up until they are shut down – i.e. gate to gate.
# PART II: NATIONAL METHODOLOGIES

As foreseen in the Regulation (EC) No. 437/2003, the Commission (Eurostat) had to prepare a report for the European Parliament after the finalization of the 2005 data collection on the experience acquired in the application of the Regulation. In order to prepare this report, Eurostat sent a questionnaire to collect information on the methodologies applied at national level for the air transport data collection.

The questionnaire sent to the countries was divided into several sections:



In the frame of this manual, the answers received for three sections are particularly useful: questions on datasets A1 and B1, questions on datasets C1 and information on data compilation, validation and delivery practices. The answers of the reporting countries to these three sections are detailed in this part of the Manual.

Information on national methodologies are available for the EU Member States as well as the Candidate and EFTA countries providing data to Eurostat.

METHODOLOGY USED FOR DATA COLLECTION AND COMPILATION AT NATIONAL LEVEL

#### **1** INFORMATION ON DATASET **A1: FS** DATA

DATASET A1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD
Belgium	Airports (Brussels, Os MET (Ministère de l Transports) (Charlerc	stend, Antwerp) and ´Équipement et des bi and Liège)	Data are collected directly from airlines or their handling agents.	Data are collected directly from airlines or their handling agents and partially on the basis of electronic movement messages transmitted to airports.	Aggregated monthly to Regulation) Transmission system: e- How often: monthly (T+	otals (cfr. datasets in -mail -2)

Bulgaria	1.DG CAA provides the information to the National Statistical Institute. DG CAA is a statistical authority within the meaning of art. 3, par. 2 of the Statistical Low. NSI of Bulgaria will check the data and will supply the statistical information to Eurostat. 2.DG CAA receives information from the airports (Regulation PД 08- 20 of 14 Jan 1999 on collecting statistical information for civil aviation in the Republic of Bulgaria) 3.Airports generate information from the official documents for scheduling and carrying out each flight.	Same. Separately, bigger specialized companies, which are also, ground service operators (DHL, M&M, etc.) provide airports with information about cargo and mail being loaded or unloaded by them. This information is being used when necessary.	The main source is the loadsheet. Standards electronic IATA messages (IATA messages) are being used in isolated cases to obtain information or to perform a check.	<ol> <li>Every day airports enter the loadsheets for each flight into a common information database.</li> <li>The statistical forms A1, B1 and C1 are monthly excerpts from the common database made by to a special algorithm.</li> <li>Information is being passed on magnetic media or through coded email (password- protected ZIP file).</li> </ol>
Czech Republic	Airports		The airports use their own information databases which are supported by handling agents' data	Monthly totals, transmitted by e-mail on monthly basis.
Denmark	Airport in Denmarl originates from hance	k (data in general dling agencies, Cargo	Data in general originates from handling agencies, Cargo handlers at airport and/or airport administrations. In many cases original data are	All commercial airports with regular commercial traffic are transmitting monthly data to DCAA including detailed information

Dataset A1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY		
	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	Passenger on board	FREIGHT AND MAIL ON BOARD	
	handlers at airpo administrations)	rt and/or airport	uploaded manually a other cases some or m from other systems – A	uploaded manually at airport databases – in p other cases some or most data are based on data from other systems – ATS, ATC, OPS etc.		per individual flight. Data are transmitted as text files in fixed format and uploaded to local system at DCAA.	
Germany	By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data collecting to the airport which transmits electronic files to the Federal Statistical Office.		By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data-collecting to the airport which transmits electronic files to the Federal Statistical Office.		Data are transmitted monthly on an on-line basis (via internet). Level of aggregation: Individual Flight-Level.		
Estonia	One Community airport, Tallinn/Ülemiste (EETN), supplies all data		EETN receives electronic messages from the handling companies or airlines (in order to perform the necessary operations and billing/invoice procedures) but in some occasions (if electronic data is not available) data is also collected from the airlines/handling agents by other means.		All data are quarterly transmitted by airport on flight level to CNA by e-mail (not recommended) or by using electronic data transmission tool.		
Ireland	Details supplied directly by the following airports to the CSO. (List of airports as detailed in the regulation).		The Dublin Aviation Authority (DAA) which governs the three largest airports in the country (Cork, Dublin Shannon) collect their passenger information by both electronic movement messages and paper data from the airlines or their handling agents (85% of data by Electronic messages, 15 % by paper, faxes etc.)For all other airports, which are mainly smaller in size, the airports themselves act as the handling agents so they collect the information directly from the airlines.		Data is forwarded from the airports electronically be e-mail on a monthly basis. The data is aggregated monthly.		
Greece	Hellenic Civil Aviation	Authority (HCAA)	Electronic movement r	nessage	Quarterly		
Spain	Airports		Airlines		Information aggregate E-mail Semi-annual	ed at monthly level	

DATASET A1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	Passenger on board	FREIGHT AND MAIL ON BOARD	Passenger on board	FREIGHT AND MAIL ON BOARD	Passenger on board	FREIGHT AND MAIL ON BOARD
France	Airports		Companies or their age	nts	Aggregated information by month but bein precise on the traffic by flight. Transmitted by post, e-mail monthly.	
Croatia	<ul> <li>Passengers on board</li> <li>The airports supply the data to the CNA.</li> <li>Freight &amp; mail on board</li> <li>The airports supply the data to the CNA.</li> </ul>		<ul> <li>Passengers on board</li> <li>Airports collect data on the basis of SITA electronic messages.</li> <li>Freight &amp; mail on board</li> <li>Airports collect data on the basis of SITA electronic messages.</li> </ul>		<ul> <li>Passengers on board</li> <li>The data are aggregated monthly at flight level and transmitted by e-mail,</li> <li>Freight &amp; mail on board</li> <li>The data are aggregated monthly at flight</li> <li>Level and transmitted by e-mail</li> </ul>	
Italy						
Cyprus	Airports		Data are collected directly from the airlines or their handling agents.		Level of aggregation: individual flight level System: airport data system Periodicity: monthly	
Latvia	Airports		Data are collected directly from the airlines on the basis of electronic movement messages transmitted to the airport.		CNA receives aggrega MS Excel files by e-m	ated monthly totals in ail every month (T+15).
Lithuania	Airports		Data are collected directly from airlines' handling agents.		The data are transmitted at individual flight level by e-mail on a monthly basis.	
Luxembourg						
Hungary	Airports		On the basis of electronic movement messages transmitted to airports and from one handling agent	From handling agents	Level of aggregation: transmission system: Application; how ofte	aggregate monthly; EDAMIS Web en: monthly.
Malta						
Netherlands	Airports (EHAM, EHRD, EHEH, EHBK, EHGG)		Data are collected directly from airlines or their handling agents on the basis of electronic movement messages transmitted to airports. Also data from Traffic Control are used.		Data are transmitted monthly by e-mail or HTTP-web interface. Level of aggregation: Individual flight-level.	

Dataset A1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	Passenger on board	FREIGHT AND MAIL ON BOARD	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	Passenger on boa	ARD FREIGHT AND MAIL ON BOARD
Austria	Airport operating cor	npanies	Airlines		Monthly; individu By e-mail or dedio	al flights. cated line.
Poland	Airports		For the dataset A1 & B1, the data are collected on the basis of electronic movement messages in cooperation with other airport users like: airlines, handling agents, etc).		For the datasets A1 & B1, the data are aggregated monthly and transmitted quarterly by e-mail.	
Portugal	ANA and ANAM airports INAC – Civil Aviation National Institute (For Lages airport information)		From the airports data systems (both directly from airlines and electronic movement messages to the airport)		Individual flight, monthly basis by e-mail.	
Romania	The different international airports: Henri Coanda Bucharest, International Airport, Timisoara Giarmata, Cluj Napoca- Someseni and Băneasa.		Data are collected on the basis of electronic movement messages transmitted to airports but also there are cases when data are collected directly from the companies.		Level of aggregation: individual flight level Transmission system: e-mail Data are transmitted quarterly	
Slovenia	Ljubljana Jože Pučnik Airport		<ul> <li>Ljubljana Jože Pučnik Airport data are collected from the other airports, on the bases of SITA electronic messages</li> <li>CNA data are collected directly from the airport</li> </ul>		Data are aggregated monthly and transmitted by e-mail every month.	
Slovakia	Airports		The original information sources: Airport – database of individual flights Airport handling		Level of aggregation → Individual flight level - monthly Transmission system → excel file - monthly	
Finland	Passenger data received in real time	Airlines or their handling agents	IATA Type B messages (LDM, MVT and PTM)	Daily files from some airlines electronically, two weeks file electronically from some airlines and paper versions from some handling agents	D a N Individual flight level h c c	vaily files from some irlines electronically, two veeks file electronically rom some airlines and aper versions from some andling agents. Data is ollected at individual flight evel.
Sweden	Airports	Airports	Mainly handling agents	Mainly handling agents	Weekly, per V movement a	Veekly, per movement via webpage

DATASET A1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGER ON BOARD	FREIGHT AND MAIL ON BOARD	Passenger on board	FREIGHT AND MAIL ON BOARD	PASSENGER ON BOAF	D FREIGHT AND MAIL ON BOARD
					via a webpage	
United Kingdom	Handling Agents / Air CNA	lines – Airports -	Various – Handling Ag Messages	ents, Airlines, Movement	Flight Level or (whe aggregate level – b	ere applicable) at higher oth collected monthly
FYROM	Airports TAV MACEDONIA DOOEL	Airports TAV MACEDONIA DOOEL	Airports Airports		National level; 12-digit ICAO;Quaterly	
Turkey	Handling Companies and Major Turkish Republic Registered Airlines	No FS freight and mail.	Data are coming from in the content of load&treem sheet that recorded by mostly SAP System.		Data from all airports are transmitted by servers to CNA on a monthly basis and at individual flight level.	
Norway	Aggregated traffic information containing passenger-, freight- and mail volumes are coordinated, qualified and delivered to the CNA by Avinor which run all state owned airports, and for the biggest not Avinor owned airport as well. Data are delivered electronically by the airlines/airlines handling agents to AVINOR, alternatively from electronic data-messages transmitted between airports, aggregated by AVINOR and delivered to the CNA.		A combination of data the airline/handling a messages transmitted (LETIS/CAIN) qualified	a collected directly from gent and electronic data- l between airports, l by Avinor.	A1 normally reported to CNA by e-mail in quarterly sets consisting of 3 monthly reports. Scheduled flights and charter flights, respectively with passenger- and freight aircraft for each make/type of aircraft - defined of individual legs aggregated to monthly totals. (Airline not specified)	A1 normally reported to CNA by e-mail in quarterly sets consisting of 3 monthly reports. Scheduled flights and charter flights, respectively with passenger- and freight aircraft for each make/type of aircraft - defined on individual legs aggregated to monthly totals.
Switzerland	Airports Electronic from Airport for dire		rt for direct Flight.	Aggregated in individual Flight level. Transmitted by e-mail monthly (airports with line and Charter flight).		

Dataset A1	AIRCRAFT INFORMATION IN A1	SEATS AVAILABLE INFORMATION IN A1
Belgium	ICAO codes for aircraft types are collected from flight plans and/or from airlines or their handling agents.	Depends on the reporting airport. (technical data for Charleroi and Liège, commercial data for Brussels, number of passengers for Antwerp)
Bulgaria	Loadsheet.	Loadsheet, it states the configuration of the specific aircraft.
Czech Republic	Airports	Commercial data or average aircraft seat capacity if no commercial data are available
Denmark	All commercial airport with regular commercial traffic are transmitting monthly data to DCAA including detailed information per individual flight. Data are transmitted as text files in fixed format and uploaded to local system at DCAA.	In some cases based on individual aircraft configuration data reported annually be airlines – in other cases similar but as average per aircraft configuration per company. In few cases on the basis of technical data as per aircraft type.
Germany	The aircraft-carrier, partly supplemented by information delivered by the manufacturer.	Basically the carrier (commercial data); data are supplemented by information provided by different nomenclatures and partly by the manufacturer.
Estonia	All data are transmitted by airport on flight level with aircraft types information quarterly to CNA. The corrections are made manually by CNA, if tailor-made software for data processing in FOXPRO finds any mistake or by using ICAO codelist. Some of the mistakes are corrected by using www.airlines.net information on Aircraft Data and History.	Details on the number of seats available are estimated on the basis of aircraft types. The data are transmitted by airport on flight level with seats available information quarterly to CNA. The corrections are made manually by CNA, if tailor-made software for data processing in FOXPRO finds any mistake. The aircraft types and seats available summary tables.xls are useful for this work, but to improve the data correction procedures, the completely updated codelists are needed (Aircraft types and seats available summary tables.xls).
Ireland	The original information source that we use is the ICAO aircraft codes as available from Eurostat. These codes are also made available to the airports.	The original information source that we use is the file from Eurostat which details aircraft type and seat availability summary tables. These codes are also made available to the airports. Where a return is made by an airline/airport where the passenger seats aboard figure is less than the maximum seat capacity we do not make any changes. However if the return shows that the passenger seats aboard is greater than the maximum and the number of passengers is less than the maximum we adjust the seat capacity to the maximum as detailed in the file from Eurostat.
Greece	ICAO	a) From the constructing company (technical data)

DATASET A1	AIRCRAFT INFORMATION IN A1	SEATS AVAILABLE INFORMATION IN A1
		b) From the airline companies (commercial data)
Spain	Air operators	Commercial data are given by the airlines
France	The information on the type of aircraft is registered with the collection of the airport. The corrections are applied by the DGAC with respect to the registration of the aircraft.	The information on the type of aircraft is registered with the collection of the airport. The information is essentially technical, certain companies transmit to the airports the commercial configuration.
Croatia	The airlines are the original source of information for reporting the aircraft types.	The airlines are the original source of information for reporting the seats available (commercial data) or average aircraft seat capacity if commercial data are not available.
Italy	By airports	Technical data
Cyprus	Airport data system	Airport data system
Latvia	The source of information is electronic movement messages transmitted to the airport (SITA messages). The aircraft type, flight information, etc. is provided by the ATC (air traffic control).	The source of information is the type of aircraft received from an airline. The information of seats available refers to the technical data. If commercial data are not available the average seat capacity of an aircraft is used.
Lithuania	Aircraft type information is submitted to airports by airlines and their handling agents. In some airports airlines have to submit a list of aircraft operating on the flight, if the flight is scheduled. If the flight is non-scheduled, information is received from FLY plans. In other airports, aircraft information is received from airlines' handling agents.	Information on seats available refers to commercial data (aircraft configuration reported by airlines). In some cases it refers to technical data (average aircraft capacity taken from aviation catalogues).
Luxembourg		
Hungary	Electronic movement messages transmitted to airports	Electronic movement messages transmitted to airports
Malta		
Netherlands	By airports.	Airport EHAM: Announce the number of seats available. Other airports: Based on ICAO aircraft types classification, technical data.
Austria	Airlines $\rightarrow$ Airport $\rightarrow$ CNA	Airlines $\rightarrow$ Airport $\rightarrow$ CNA
Poland	Polish Airports get information on the basis of electronic movement messages, from different sources as: ATC reports Airport Services Airports Fees Departments	Polish Airports get information from airlines, when possible reported on the basis of commercial data (mostly in case of scheduled flights). And based on technical data in case of other flights (e.g. non-scheduled flights, GA – Flights).

Dataset A1	AIRCRAFT INFORMATION IN A1	SEATS AVAILABLE INFORMATION IN A1
Portugal	IATA type/subtype from the airports data systems (individual flight information)	At present, this variable is not collected on the dataset reported by the airports. We are trying to merge that datasets with the datasets received from INAC, where this variable is included, the problem (expected to be solved soon) is the coding needed to link the tables.
Romania	Aircraft information is obtained from airlines, as original source.	Seats available information refers to technical data, but there are situations when aircraft configuration is reported by airlines as commercial data.
Slovenia	Airport local flight information system database is based on IATA and ICAO aircraft types classification.	Airport local flight information system database is based on IATA and ICAO aircraft types classification; it refers to technical data (average aircraft capacities).
Slovakia	Message - strips traffic control Airport dispatching and matriculation of aircraft	The original source of information for reporting the seats available are Manual, aircraft database.
Finland	Finavias air traffic database. (ICAO doc 8643)	Data reported by airlines per registration if before mentioned is not available then use average aircraft capacities
Sweden	The airports.	The majority of the movements contain exact data, but there are also movements with information about numbers of seats based on the aircraft technical data/average capacity.
United Kingdom	Data supplier (where data collected at flight level)	(i)Original source: Airlines / Airline Websites (ii)Either down to aircraft registration or most common for fleet type.
FYROM	Airports TAV MACEDONIA DOOEL	Airports TAV MACEDONIA DOOEL
Turkey	ICAO Doc.8643	CNA Aircraft Database that is obtained by from charging purposes.
Norway	The aircraft database in the billing system in Avinor, relying on flight databases from the Norwegian CAA and Avinor in house register.	The aircraft database in the billing system in Avinor – technical data.
Switzerland	The aircraft types are reported by the airports.	The airports announce the number of available seats. If missing, we take the number of seats available for this aircraft type.

### 2 INFORMATION ON DATASET B1: OFOD DATA

DATASET B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	Passengers carried	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL
Belgium	Airports (Brussels, Os MET (Ministère de l'É Transports) (Charlerc	stend, Antwerp) and Équipement et des bi and Liège)	Data are collected directly from airlines or their handling agents.	Data are collected directly from airlines or their handling agents and partially on the basis of electronic movement messages transmitted to airports.	Aggregated monthly totals (cfr. datasets in Regulation) Transmission system: e-mail How often: monthly (T+2)	
Bulgaria	<ol> <li>DG CAA provides the information to the National Statistical Institute.</li> <li>DG CAA is a statistical authority within the meaning of art. 3, par. 2 of the Statistical Low.</li> <li>NSI of Bulgaria will check the data and will supply the statistical information to Eurostat.</li> <li>DG CAA receives information from the airports (Regulation PД 08- 20 of 14 Jan 1999 on collecting statistical information for</li> </ol>	Same. Separately, bigger specialized companies, which are also, ground service operators (DHL, M&M, etc.) provide airports with information about cargo and mail being loaded or unloaded by them. This information is being used when necessary.	The main source is t Standards electroni messages) are being to obtain informatio check.	the loadsheet. c IATA messages (IATA g used in isolated cases on or to perform a	<ol> <li>Every day airports ente each flight into a commor</li> <li>The statistical forms A1 monthly excerpts from th made by to a special algor</li> <li>Information is being pa media or through coded e protected ZIP file).</li> </ol>	r the loadsheets for n information database. , B1 and C1 are e common database rithm. ssed on magnetic email (password-

DATASET B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL	Passengers carried	FREIGHT AND MAIL
	civil aviation in the Republic of Bulgaria) 3. Airports generate information from the official documents for scheduling and carrying out each flight.					
Czech Republic	Airports		The airports use their own information databases which are supported by handling agents' data		Monthly totals, transmitted by e-mail on monthly basis.	
Denmark	Airport in Denmark (data in general originates from handling agencies, Cargo handlers at airport and/or airport administrations)		Data in general origi agencies, Cargo han airport administratic original data are upl airport databases – most data are based systems – ATS, ATC,	nates from handling dlers at airport and/or ons. In many cases oaded manually at in other cases some or on data from other OPS etc.	All commercial airports with regular commerce traffic are transmitting monthly data to DCAA including detailed information per individual flight. Data are transmitted as text files in fixe format and uploaded to local system at DCAA	
Germany	By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data collecting to the airport which transmits electronic files to the Federal Statistical Office.		By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data-collecting to the airport which transmits electronic files to the Federal Statistical Office		Data are transmitted mor (via internet) Level of aggregation: Indi	nthly on an on-line basis ividual Flight-Level
Estonia	Federal Statistical Office. One Community airport, EETN, supplies all data		EETN receives electric the handling compa- to perform the nece billing/invoice proce occasions (if electro	ronic messages from nies or airlines (in order essary operations and edures) but in some nic data is not	All data are quarterly transmitted by airport flight level to CNA by e-mail (not recommer or by using electronic data transmission too	

DATASET B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO <b>CNA</b> - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY		
	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL	Passengers carried	FREIGHT AND MAIL LOADED/UNLOADED	
			available) data is als airlines/handling age	o collected from the ents by other means.			
Ireland	Details supplied directly by the airports to the CSO. (List of airports as detailed in the regulation)		The Dublin Aviation Authority (DAA) which governs the three largest airports in the country (Cork, Dublin Shannon) collect their passenger information by both electronic movement messages and paper data from the airlines or their handling agents (85% of data by Electronic messages, 15 % by paper, faxes etc.) For all other airports, which are mainly smaller in size, the airports themselves act as the handling agents so they collect the information directly from the airlines.		Data is forwarded from the airports electronically be e-mail on a monthly basis. The data is aggregated monthly.		
Greece	Hellenic Civil Aviation	Authority (HCAA)	Electronic movemen	t	Quarterly	Quarterly	
Spain	Airports		Airlines		Data are aggregated at monthly level E-mail Semi-annual		
France	Airports		Companies or their agents		Aggregated information by month but being precise on the traffic by flight. Transmitted by post, e-mail monthly.		
Croatia	<ul> <li>Passengers carried</li> <li>The airports supply the data to the CNA.</li> <li>Freight &amp; mail loaded/unloaded</li> <li>The airports supply the data to the CNA.</li> </ul>		<ul> <li>Passengers carried</li> <li>Airports collect data on the basis of SITA electronic messages.</li> <li>Freight &amp; mail loaded/unloaded</li> <li>Airports collect data on the basis of SITA electronic messages.</li> </ul>		- Passengers carried The data are aggregated monthly and transmitted by e- mail, monthly.	- Freight & mail loaded/unloaded The data are aggregated monthly and transmitted by e- mail, monthly.	
Italy							
Cyprus	Airports		Data are collected directly from the airlines or their handling agents.		Level of aggregation: individual flight level System: airport data system Periodicity: monthly		

DATASET B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL
Latvia	Airports		Data are collected directly from the airlines on the basis of electronic movement messages transmitted to the airport.		CNA receives aggregated Excel files by e-mail every	monthly totals in MS / month (T+15).
Lithuania	Airports		Data are collected directly from airlines' handling agents		The data are transmitted by e-mail monthly	at individual flight level
Luxembourg						
Hungary	Airports		On the basis of electronic movement messages transmitted to airports and from one handling agent	From handling agents	Level of aggregation: agg transmission system: EDA how often: monthly	regate monthly; AMIS Web Application;
Malta						
Netherlands	Airports (EHAM, EHRD, EHEH, EHBK, EHGG)		Data are collected di their handling agent electronic movemen transmitted to airpo Traffic Control are us	irectly from airlines or s on the basis of it messages rts. Also data from sed.	Data are transmitted mor web interface. Level of aggregation: Indi	nthly by e-mail or HTTP- vidual flight-level.
Austria	Airport operating cor	mpanies	Airlines		Monthly; individual flight By e-mail or dedicated lin	s. ie
Poland	Airports		For the dataset A1 & B1, the data are collected on the basis of electronic movement messages in cooperation with other airport users like: airlines, handling agents, etc)		For the datasets A1 & B1 aggregated monthly and by e-mail.	, the data are transmitted quarterly
Portugal	ANA and ANAM airports INAC – Civil Aviation National Institute (For Lages airport information)		From the airports data systems (both directly from airlines and electronic movement messages to the airport)		Individual flight, monthly	basis by e-mail
Romania	The different interna Coanda Bucharest, Ti	tional airports Henri misoara Giarmata,	Data are collected on movement messages	the basis of electronic transmitted to airports	Level of aggregation: indi Transmission system: e-r Data are transmitted qua	vidual flight level mail arterly

DATASET B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL	PASSENGERS CARRIED	FREIGHT AND MAIL
	Airport Cluj Napoca-S International Airport	Someseni <i>,</i> Băneasa	but also there are cas collected directly from	ses when data are m the companies.		
Slovenia	Ljubljana Jože Pučnik Airport		<ul> <li>Ljubljana Jože Pučnik Airport data are collected from the other airports, on the bases of SITA electronic messages</li> <li>CNA data are collected directly from the airport</li> </ul>		Data are aggregate montl e-mail every month	hly and transmitted by
Slovakia	Airports		The original information sources: Airport – database of individual flights Airport handling		Level of aggregation → In monthly Transmission system → e	dividual flight level - xcel file via - monthly
Finland	Airlines or their handling agents		Daily files from some airlines electronically, two weeks file electronically from some airlines and paper versions from some handling agents		Daily files from some airli weeks file electronically f paper versions from some is collected at individual f	nes electronically, two rom some airlines and e handling agents. Data light level.
Sweden	Airports	Airports	Mainly handling agents	Mainly handling agents	Weekly, per movement via a webpage	Weekly, per movement via a webpage
United Kingdom	Handling Agents / Airlines – Airports – CNA	No OFOD cargo breakdowns – total load allocated to O/D	Various – Handling A Movement Messages	gents, Airlines,	Flight level where data received at this level	Not Collected
FYROM	Airports TAV MACEDONIA DOOEL	Airports TAV MACEDONIA DOOEL	Airports	Airports	National level; 12-digit IC	AO;Quaterly
Turkey	Questions related by Data-Set B1 were no an ongoing project for and Data-Set B1 in TU Flight Stage data an been completed.	<ul> <li>/ Data – Set A1 and t answered. There is or the Data – Set A1</li> <li>JRKEY. Production of d O/D data has not</li> </ul>				
Norway	Aggregated traffic inf passenger-, freight- a	ormation containing and mail volumes are	A combination of dat from the airline/hand	a collected directly dling agent and	B1 normally reported to CNA by e-mail in	B1 normally reported to CNA by e-mail in

Dataset B1	DATA SUPPLIERS TO CNA		DATA SUPPLIER'S INFORMATION SOURCES		DATA TRANSMISSION TO CNA - LEVEL OF AGGREGATION, SYSTEM AND PERIODICITY	
	PASSENGERS CARRIED	FREIGHT AND MAIL LOADED/UNLOADED	Passengers carried	FREIGHT AND MAIL	Passengers carried	FREIGHT AND MAIL LOADED/UNLOADED
	coordinated, qualified and delivered to the CNA by Avinor which run all state owned airports, and for the biggest not Avinor owned airport as well. Data are delivered electronically by the airlines/airlines handling agents to AVINOR, alternatively from electronic data-messages transmitted between airports, aggregated by AVINOR and delivered to the CNA.		electronic data-messages transmitted between airports, (LETIS/CAIN) qualified by Avinor.		quarterly sets consisting of 3 monthly reports. Scheduled flights and charter flights, respectively with passenger- and freight aircraft for each make/type of aircraft - defined on individual legs aggregated to monthly totals. (Airline not specified)	quarterly sets consisting of 3 monthly reports. Scheduled flights and charter flights, respectively with passenger- and freight aircraft for each make/type of aircraft - defined on individual legs aggregated to monthly totals.
Switzerland	Airport for direct flight, airlines and airport for traffic streams.	Airports	Electronic from Airport for direct Flight, Telex reading from airlines and electronic from airport for traffic streams.	Freight-system Carido.	Aggregated in individual Flight level (direct flight). Transmitted by e-mail monthly (airports with line and Charter flight).For stream flights. Aggregate in Passengers level.	Aggregated in individual Flight level (direct flight). Transmitted by e-mail monthly (airports with line and Charter flight).

### INFORMATION ON DATASETS A1 AND B1

DATASETS A1 AND	USE OF AIR WAYBILL DATA AS INFORMATION	CNA DATA STORAGE		
D1		Passenger on board Passengers carried	FREIGHT AND MAIL ON BOARD FREIGHT AND MAIL LOADED/UNLOADED	
Belgium	Not applicable	Data at individual airport pair level. Stored in a data bank, from the start of the Regulation, indefinitely		
Bulgaria	Used by exception when necessary. The air-cargo agent prepares the air waybill. Air cargo agent takes the decision whether to perform transportation by air or by truck. The airport administration receives information only about the cargo which will actually be loaded onboard (or unloaded) and which information is included in the loadsheet. Cargo transported by truck is not included in the provided information.	Information is being stored in the way it becomes available - monthly Excel forms. When necessary, excerpts and summaries are done. There is no regulatory storage deadline.		
Czech Republic	Not applicable Information collected only for freight transported by aircraft	Individual airport pair level without any time limit.		
Denmark	DCAA (CNA) does not accept freight statistics based on air waybill. This is the reason for the delay in reporting cargo statistics from Copenhagen Airport Kastrup – as complete new systems has to be implemented at the airport and all agencies at the airport.	<ul> <li>All commercial airport with regular commercial traffic are transmitting monthly data t including detailed information per individual flight. Data are transmitted as text files in format and uploaded to local system at DCAA.</li> <li>Data are kept UFN.</li> </ul>		
Germany	Freight transported by truck ("Trucking- data") is excluded at the beginning of the process of data-collection.	The data are kept for 2 years (aggregation: ind	lividual flight-level")	

DATASETS A1 AND	USE OF AIR WAYBILL DATA AS INFORMATION	CNA DATA STORAGE		
<b>DI</b>		Passenger on board Passengers carried	FREIGHT AND MAIL ON BOARD FREIGHT AND MAIL LOADED/UNLOADED	
Estonia	The airway bill is not used as an information source at EETN and therefore trucked cargo is not included in supplied data. Freight data is based on electronic Load Messages (if these are not available, by other means directly from the airlines/handling agents)	The CNA keeps original database sent quarterly by airports at individual airport pair level and also at aggregated level (monthly datasets A1 and B1) without a term.		
Ireland	DAA: This is supplied the same way as passenger data, i.e. electronically from airlines or handlers. Trucked freight not included. Other Airports: As these airports are small, the level of freight traffic is low. Where an airport has freight traffic the data is collected directly from the airlines.	The only data that we keep is the datasets as required by the Regulation. This is kept at an individual airport level.		
Greece	Freight transported by track is not included in the data supplied to the CNA.	At individual airport pair level – at least ten years.		
Spain		At airport pair level Unlimited period		
France	The information on the freight comes from the declarations of the companies or of their agents.	The information is stocked by airport (the flow is calculated at the time of the interrogation following the defined protocols; a city to national city is calculated from the traffic at the departure of every airport). The time series available contain data since 1986. A database is currently elaborated with objective active information over 15 years.		
Croatia	Original information source for the freight data is the Cargo Manifest. Freight transported by truck is not included.	Monthly datasets at flight level aggregation are stored in electronic archives form 2008 onwards, indefinitely.		
Italy				
Cyprus	Not applicable	CNA keeps data at individual airport pair level	and for unlimited period.	

DATASETS A1 AND B1	USE OF AIR WAYBILL DATA AS INFORMATION	CNA DATA STORAGE		
51		Passenger on board Passengers carried	FREIGHT AND MAIL ON BOARD FREIGHT AND MAIL LOADED/UNLOADED	
Latvia	The airport does not use this source of information.	Data are stored in SQL servers; previous periodata.	ods are archived and stored separately from current	
Lithuania	The freight transported by trucks is not included in the data supplied to the CNA	CNA keeps data at individual flight level for to	en years	
Luxembourg				
Hungary	Data do not include the freight transported by truck.	Data are archived at individual airport pair level at least for 10 years.		
Malta				
Netherlands	The airway bill is not used as an information source. Freight transported by truck (trucking-data) is excluded.	CNA keeps data permanent at individual airport level.		
Austria	Trucked transport is excluded.	Individual airport pair level		
Poland	Data suppliers do not include freight transported by truck into data sent to CSO.	At the moment the data for datasets A1 & B1 are stored from reference period 2004 in case of airport Okęcie – Warsaw, and the others airports from reference period 2006. The data at the individual level will be stored for 5 years.		
Portugal	Not applicable	Permanent at individual level		
Romania	There is no case.	NIS is keeping the information for five years,	both for airport pair level and aggregated level.	
Slovenia	Air waybill (AWB) is original information source for the freight data; freight transported by truck is not included	CNA keeps data at individual airport pair level for 10 years.		
Slovakia	Airports	The CNA keeps data at individual airport pair	level.	
Finland	Waybills not available	Permanently from year 1997		
Sweden	Information source for freight data is load message, not air waybill.	From 2005, data is stored on movement level and is saved continuously.	From 2008, data is stored on movement level and is saved continuously.	
United Kingdom	Freight Transported by truck not collected by CNA	Complete Database datasets are available for interrogation from 1986 to date	Not held	
FYROM	No	N.A	N.A	
Turkey	For freight data air waybill is not a source.			

DATASETS A1 AND	USE OF AIR WAYBILL DATA AS INFORMATION	<b>CNA</b> DATA STORAGE		
DI	SOURCE OF PREISHT DATA	Passenger on board Passengers carried	FREIGHT AND MAIL ON BOARD FREIGHT AND MAIL LOADED/UNLOADED	
Norway	Information contains volumes only transported by aircraft. Trucked freight is not included.	The micro data is stored temporarily in the pr permanently as text-files.	ogramming language SAS, and is stored	
Switzerland	No freight transported by truck in our data.	Dataset A1: Aggregated in individual Flight level. Kept since the beginning of statistic (1984). Dataset B1: Aggregated in individual Flight level. Kept since the beginning of statistic (1984). For stream flights. Aggregate in Passengers level. Kept until the beginning of statistic (2001).	Aggregated in individual Flight level. Kept since the beginning of statistic (1984).	

DATASETS A1 AND B1	IS THE OFOD DATA DERIVED FROM FS DATA OR COLLECTED SEPARATELY BY THE DATA SUPPLIER	FROM THE OFOD DATA COULD IT BE POSSIBLE TO IDENTIFY THE TRUE FIRST ORIGIN/FINAL DESTINATION OF A PASSENGERS	
Belgium	The OFOD data is derived from the FS data.	It is not possible to identify the true first origin/final destination of a passenger.	
Bulgaria	Due to the flight number condition, OFOD data are being extracted from the common database, i.e. from the loadsheets for each flight.	Access to the actual point of origin/destination when using flights with different flight numbers can be gained only through the processing of ticket information. On a national level this could be achieved: a) on reservation systems level, by involving all ticket sellers; b) by entering and processing the information either within the airlines or at the airports. This needs very serious argumentation and new regulatory requirements (although there is a precedent - the US requirement for providing personal passenger information), as well as serious additional human and financial resources. We are on the opinion that at the moment and in the near future the use of ticket information is impossible.	
Czech Republic	Handling agents supply this information to the airports and then the airports transmit it to CNA		
Denmark	It is not possible to derive the OFOD data.	In the case where the journey includes multiple flights (e.g. based on ticket information)? No, such system requires on line data collection from Airline booking systems and can only be done on a centralised basis – fx. by Eurostat.	
Germany	OFOD and Flight-Stage –Data are collected using the same questionnaire; but the questionnaire contains different positions to separate OFOD from FS-data.	Due to the contents of the positions of the questionnaire the first OFOD – cannot be identified in case of multiple flights (reservation lists or similar data sources are not used).	
Estonia	OFOD data is derived from FS data	The ticket information is not available and it is not possible to identify the true origin/destination data.	
Ireland	<ul> <li>DAA: The OFOD would be on the flight data, but DAA does not capture the true origin/destination of a passenger if they are making a transfer at either end of the flight.</li> <li>The airport does not get such ticket information from the airlines. It should also be noted that some people buy 2 independent tickets and it would be very difficult to track such passengers (e.g. a passenger may be taking a Ryanair flight from Dublin to Stansted and then an Easyjet flight from Stansted to Morocco). The airport surveys passengers to give them an idea about the number of passengers who do take connecting flights and where they go.</li> </ul>		

DATASETS A1 AND B1	IS THE OFOD DATA DERIVED FROM FS DATA OR COLLECTED SEPARATELY BY THE DATA SUPPLIER	FROM THE OFOD DATA COULD IT BE POSSIBLE TO IDENTIFY THE TRUE FIRST ORIGIN/FINAL DESTINATION OF A PASSENGERS
	Other Airports: The smaller remaining airports collate scheduled inform for multiple destinations – this information is not made known to the a that it would be an impossible task to gather this information and wou resources are under pressure already. Also gathering this information w unacceptable to the airlines.	nation from the passenger ticket. If a passenger has multiple tickets airport and it is not requested from the customer. They have advised Id put a considerable amount of additional work on airport where would slow down the check - in process which would be
Greece	OFOD data provided to the CNA is derived from FS data.	
Spain	Both datasets are collected separately.	It is not possible.
France	Currently the OFOD is derived from traffic on stages.	In the framework of a traffic of multiple flights, it is not always possible to know the true origin, or the true destination, the system is dependent on the change of the flight number that is the basis of the collection.
Croatia	Dataset B1 (OFOD data) is collected separately and not derived from dataset A1.	It is not possible to identify the true first origin/final destination.
Italy	FS (A1) and OFOD (B1) are collected separately	It can be possible but only on the ground of the data included on the dataset A1 and B1. In practice, this is a difficult problem to solve.
Cyprus	OFOD data is collected separately and provided to the CNA by the data supplier	There is no possibility to identify the true first origin/final destination
Latvia	The OFOD data provided to the CNA are derived from the FS data.	It is not possible to identify the true first origin/final destination of a passenger.
Lithuania	OFOD data and FS data are collected separately from the data supplier.	There is no possibility to identify the true first original/final destination of a passenger.
Luxembourg		
Hungary	There is no difference between FS and OFOD data	
Malta		
Netherlands	The OFOD data is derived from the FS data.	Because ticket information is not available, it is not possible to identify the true origin/destination data.
Austria	OFOD data is derived from FS data.	First origin: no Final destination: yes
Poland	OFOD data are derived from FS.	There is no possibility to identify the true origin/final destination of a passenger in case of multiple flights except for charter flight where such possibility exists by some airports.

DATASETS A1 AND B1	IS THE OFOD DATA DERIVED FROM FS DATA OR COLLECTED SEPARATELY BY THE DATA SUPPLIER	FROM THE OFOD DATA COULD IT BE POSSIBLE TO IDENTIFY THE TRUE FIRST ORIGIN/FINAL DESTINATION OF A PASSENGERS
Portugal	It's derived from the FS data.	Right now, it's impossible to identify that, but we are studying the possibility of obtaining that data on a regular basis .
Romania	Yes, OFOD data provided to NIS is derived from FS.	Being given that Henri Coanda Bucharest Airport is the only airport reporting multiple flights, and not more than two flight stages, it is very possible to identify the true first origin/destination in this particular case.
Slovenia	OFOD data are collected separately by data supplier.	Data are based on ticket information but the CNA doesn't receive the information on the true first origin/final destination of a passenger. This information couldn't be possible to identify from the data received by the CNA.
Slovakia	OFOD data are derived from FS data.	According to base on ticket information is not possible to identify the true first origin/final destination of a passenger.
Finland	OFOD is not derived from FS.	Ticket information is not available. Destination is available if same flight number includes multiple flights.
Sweden	FS and OFOD derive from the data material.	At the present it is not possible to identify the true first origin/final destination for passengers travelling via intermediate destinations.
United Kingdom	OFOD supplied as subset or derived by CNA from FS data.	Not possible to identify true first Origin/Final Destination as we do not collect interline information.
FYROM	N.A.	N.A.
Turkey		
Norway	OFOD data provided to the CNA is derived from FS data.	From the OFOD data it is not possible to identify true first origin/final destination, when the journey include multiple flights. At aggregated level, there is information about number of passengers in transit/transfer.
Switzerland		If the passenger flies away from Switzerland, we know that it is his first airport. Either we had one airport before the Swiss airport and two airports after the Swiss airport.

### 4 INFORMATION ON DATASET C1

DATASET C1	BODIES THAT SUPPLY THE DIRECT TRANSIT INFORMATION TO THE CNA	BODIES THAT SUPPLY THE COMMERCIAL AND TOTAL AIRCRAFT MOVEMENT TO THE CNA			
Belgium	The airports supply the direct transit passenger information. Data are collected directly from airlines or their handling agents.	The airports supply the commercial and total aircraft movement information. Data are collected directly from flight plans and/or from airlines or their handling agents.			
Bulgaria	<ol> <li>DG CAA provides the information to the National Statistical Institute. DG CAA is a statistical authority within the meaning of art. 3, par. 2 of the Statistical Low.</li> <li>NSI of Bulgaria will check the data and will supply the statistical information to Eurostat.</li> <li>DG CAA receives information from the airports (Regulation PД 08-20 of 14 Jan 1999 on collecting statistical information for civil aviation in the Republic of Bulgaria)</li> <li>Airports generate information from the official documents for scheduling and carrying out each flight.</li> <li>Freight &amp; mail on board</li> <li>Same. Separately, bigger specialized companies, which are also, ground service operators (DHL, M&amp;M, etc.) provide airports with information about cargo and mail being loaded or unloaded by them. This information is being used when necessary.</li> </ol>				
Czech Republic	Direct passenger transit is supplied to the Ministry of Transport by the airport. Handling agents supply this information to the airports				
Denmark	Airport in Denmark (data in general originates from handling agencies, Cargo handlers at airport and/or airport administrations) Data in general originates from handling agencies, Cargo handlers at airport and/or airport administrations. In many cases original data are uploaded manually at airport databases – in other cases some or most data are based on data from other systems – ATS, ATC, OPS etc All commercial airports with regular commercial traffic are transmitting monthly data to DCAA including detailed information per individual flight. Data are transmitted as text files in fixed format and uploaded to local system at DCAA.				
Germany	By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data-collecting to the airport which transmits electronic files to the Federal Statistical Office.	By law the airlines are obliged to provide the data; in practice the airlines (partly involving handling agents) delegate the process of data-collecting to the airport which transmits electronic files to the Federal Statistical Office.			
Estonia	One Community airport, EETN, supplies all data	EETN supplies all necessary data to the CNA and CNA forms dataset C1 using tailor-made software.			

DATASET C1	BODIES THAT SUPPLY THE DIRECT TRANSIT INFORMATION TO THE CNA	BODIES THAT SUPPLY THE COMMERCIAL AND TOTAL AIRCRAFT MOVEMENT TO THE CNA
Ireland	DAA: The airport supplies the CSO with this information. Transit passenger information is included in the messages the airport receives from the airlines/ground handlers. DA gets a message per movement. The definitions of 'Commercial Movements' and 'Total Aircraft Movements' that Eurostat has given the airport is used to calculate the required figures. Other Airports: The smaller airports would not normally have transit passengers.	DAA: The airport supplies the CSO with this information. Transit passenger information is included in the messages the airport receives from the airlines/ground handlers. DA gets a message per movement. The definitions of 'Commercial Movements' and 'Total Aircraft Movements' that Eurostat has given the airport is used to calculate the required figures. Other Airports: The smaller airport collects this information as part of their Airport Advice charges.
Greece	From the airline companies electronically or parer forms.	From the airline companies electronically or parer forms.
Spain	Airports. The airports obtain the information from the airlines that operate in them.	Airports. Both, the airlines and the individuals should fill in a statistical form for each landing or takeoff that they perform in the airport.
France	The information is given by the company or his representative to the airport which communicates it to the DGAC.	The commercial movements come from the collection of the commercial traffic by airport. Every airport addresses to the DGAC via a form the monthly total of the non-commercial movements. The information on the movements comes from the declarations of the companies and the information on the air navigation is recovered by certain airports.
Croatia	The airports supply the direct transit passenger information.	The airports supply the commercial and total aircraft movement information.
Italy	By dataset C1	By dataset C1
Cyprus	Information is collected from official documents provided by the airlines or handling agents (General Declaration).	Information is collected from the actual landings and take offs provided directly from the air traffic control services
Latvia	The airport supplies information on direct transit passengers to the CNA. The airport is collecting this information from the airline messages (SITA messages). Then the dispatchers put them in AFIPS program, which is making the summaries.	The airport supplies information on commercial and total aircraft movement to the CNA. The airport has this information from the airline messages. Then the dispatchers put them in AFIPS program and make the summaries.
Lithuania	Airports supply the direct transit passenger information to the CNA. This information is collected by airports from airlines' handling agents.	Airports supply the commercial and total aircraft movement information to the CNA. This information is collected from airlines and their handling agents.
Luxembourg		
Hungary	Airports	Airports

DATASET C1	BODIES THAT SUPPLY THE DIRECT TRANSIT INFORMATION TO THE CNA	BODIES THAT SUPPLY THE COMMERCIAL AND TOTAL AIRCRAFT MOVEMENT TO THE CNA
Malta		
Netherlands	The airports supply the direct transit passengers information. Data are collected directly from airlines or their handling agents.	The airports supply the commercial and total aircraft movement information. Data are collected directly from airlines or their handling agents.
Austria	Airlines $\rightarrow$ Airport $\rightarrow$ CNA	Airlines $\rightarrow$ Airport $\rightarrow$ CNA
Poland	This information is collected in cooperation with airlines by airports authority. Polish airports supply the data to CSO via e-mail.	This information is collected in cooperation with airlines and Air Traffic Control Agency by airports authority. Polish airports supply the data to CSO via e-mail.
Portugal	From the airports data systems	ANA and ANAM airports INAC – Civil Aviation National Institute (For Lages airport information)
Romania	Direct transit passengers is reported by the following airports: Henri Coanda Bucharest, Timisoara Giarmata, Cluj Napoca-Someseni, Baneasa, Iasi, Sibiu, Oradea, Constanta and Bacau The information is collected via e-mail, in a file of 18 fields allocated to variables which describe every individual flight from the airports listed above. Direct transit passengers is one of these variables.	The bodies that supply commercial and total aircraft information are the airports listed above. The information regarding commercial and total aircraft movements is collected with the description of every individual flight, as mentioned before.
Slovenia	<ul> <li>CNA receives the data monthly by e-mail</li> <li>Information is supplied by Ljubljana Jože Pučnik Airport and it is collected through local flight information system</li> </ul>	<ul> <li>CNA receives the data monthly by e-mail.</li> <li>Information is supplied by Ljubljana Jože Pučnik Airport through local flight information system</li> </ul>
Slovakia	The direct transit passenger information is from Stowing, which make out the voucher for aircraft.	The commercial and total aircraft movement information are: Aircraft dispatching, Flight plan, Handling agent. Database of airport.
Finland	Data are collected at individual flight level from carriers. Can also be derived from OFOD.	Flight records come from ANS systems on daily basis electronically.
Sweden	Is included in the weekly report from the airports. The airports often get the information from the handling agents. The information is included in the SITA-messages sent to the airport and are then reported into the airports data system.	Is included in the weekly report from the airports. The information comes from the ATS on the airport.
United Kingdom	Airline / Handling Agent – Airport – CNA	Airline / Handling Agent – Airport - CNA
FYROM	Airports TAV MACEDONIA DOOEL.	Airports TAV MACEDONIA DOOEL.

DATASET C1	BODIES THAT SUPPLY THE DIRECT TRANSIT INFORMATION TO THE CNA	BODIES THAT SUPPLY THE COMMERCIAL AND TOTAL AIRCRAFT MOVEMENT TO THE CNA
Turkey	Direct transit passenger information supplied by the Airports in the territory. There are persons in the Airports, who are responsible for the collecting statistical data. Main data suppliers are directly from airlines or their handling agents.	Commercial and total aircraft movement information is collected by from the Air Navigation Services Units.
Norway	Delivered electronically by the airlines/airlines handling agents to Avinor, alternatively from electronic data-messages transmitted between airports, aggregated by Avinor and delivered to the CNA.	Registered in the airports flight and navigation systems (NAIS) electronically transmitted to Avinor admin., qualified, aggregated and delivered to the CNA.
Switzerland	Collected by airport and transmitted by airport.	Collected by airport and transmitted by airport. (For line and charter flights by control tower else by listing from pilots).

## 5 INFORMATION ON DATA COMPILATION, VALIDATION AND DELIVERY PRACTICES

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
Belgium	Implementation of a new data collection and compilation process.	The airline information is confidential.	No transcodification needed.
Bulgaria	To obtain the statistical forms, Sofia Airport uses the existing database. Only the ICAO codes of airlines and airports were additionally entered. Providing the information for the Regulation 437 on statistical returns in respect of the carriage of passengers, freight and mail by air statistical forms was one of the arguments for developing and implementing new information systems for entering and processing flight information at Varna, Burgas and Plovdiv airports.	Since in statistical forms there is a direct identification of the statistical subject, they are subject to protection pursuant to the Information Classification Low with classification level "For official use". This protection has been also specified by an Order of the Director General of DG CAA. Access to the forms is allowed only to persons holding a special clearance for the same or higher classification level. These restrictions are valid for two years. Summarized references may be made during this period, given that subject identification is impossible.	ICAO codes are being used. When entering IATA codes used in the loadsheet, the program automatically generates in a separate field the respective ICAO code. Since the dynamics of registering airlines with ICAO is greater than the regularity of issuing Document 8585, when necessary and by request of the airports, DG CAA makes orderly references directly with ICAO.
Czech Republic	Ministry of Transport had to launch a new airport data collection in connection with the implementation of the mentioned Regulation	According to the Czech legal base, data on an individual enterprise or data from which this information can be easily obtained cannot be published or otherwise disseminated. In practice it means that only aggregated data based on the data from at least 3 reporting units can be published	The information supplied by the Czech airports to the Ministry of Transport use the same ICAO codification as requested by Eurostat. There are no problems with using the codes specified in the Regulation. Occasionally there are some problems with the list of codes specified in the regulation due to quite long periodicity of updating these codes.
Denmark	Complete new system at DCAA. New systems or major changes (programming) to existing systems at	See minutes from last meeting: "Denmark stressed that, although they provided detailed airline information, it should be disseminated only at aggregated	ICAO code not available from ICAO in file and therefore not fully up-dated in our system in order to validate data sufficiently. Similar problems at airport level.

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
	airport including similar changes at agencies. A new system is presently being developed at Copenhagen Airport – Cost not yet identified, but estimated around 1 mio. Euro !	level (EU and non-EU carriers) as already agreed in the past. Any change of this arrangement should be subject to Denmark approval beforehand."	Seat available / available for sale never fully according to the intension of the Regulation as such data requires extreme workload at source level.
Germany	To meet the demand of the Regulation a modification or change of the process of data collection or the compilation process was not necessary; the straightforward application of the existing process was possible.	The data output does not contain any confidentiality cases. The dissemination of individual data is impossible.	The received codes comply with the Regulation. Transcodifications are not necessary. Problems concerning the codes do not occur.
Estonia	Statistics Estonia (SE) started to implement Community Air Transport Statistics (Regulations 437/2003 and 1358/2003) in 2001. The compliance with the Regulation demands has required the implementation of a new data collection and compilation process. In 2001 SE participated in the Pilot Project of Air Transport Statistics. Data collection is fully in compliance with Community Air Transport Statistics.	The data are published and transmitted without characteristics that permit identification of the respondents, and classified into groups of at least three persons, while the share of data relating to each person in aggregate data does not exceed 90%. One Community airport, Tallinn/Ülemiste, supplies all data to Eurostat. Statistics Estonia has renewed the agreements with airports in order to get their consent to provide Eurostat with the data specified in the Regulation.	In database sent by data respondents to CNA, it is necessary to undertake some transcodifications. Information on passenger flight /all-freight and mail, flight scheduled/non-scheduled services and arrival/departure has to be transformed according to codes specified in the Regulation. There are no problems in providing and/or using the codes specified in the Regulation.
Ireland	CSO: The level of aviation data collected prior to the Regulation was very limited so a new data collection and compilation process was required to be put in place.	No problem to date. This is because of the time difference in submitting the data to the CSO and to Eurostat.	The Regulation codes are used by all airports. DAA: No problems using the codes. Kerry: The airport finds that the aircraft codes are not complete and that the use of

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
	Airports: The Regulation had required an extension of an existing process		such aircraft codes is not consistent with normal airport operations. That means slower collection of data as the application of such coding during analysis is slow and cannot be applied at the source of the data
Greece	HCAA implemented a new data collection and compilation process.	There are no such problems.	Use of codes requested in the regulation. No problems so far.
Spain	It was necessary to implement new extraction procedures on existing database	No, however confidentiality requires the conversion of the airline codes in codes 1EU, 1NE.	The codes required in the Regulation are used.
France	A new system is under elaboration in order to satisfy the demands of the Regulation. It integrates the collection of the commercial traffic and non-commercial traffic under the control of the information of the air navigation.	Currently the information traffic by company by relation is confidential.	The information is mostly collected with the codes ICAO, those collected in other coding (IATA notably) are transcoded by the DGAC.
Croatia	The compliance with the Regulation demands has required the implementation of a new data collection process.	Information on airlines is confidential. Identification of airline is confidential. Break down on EU and non-EU is used.	Airports use IATA/ICAO codes alternatively, so transcodification is made by airports before delivery to the CBS.
Italy	The compliance ha required the compilation of a new process.	There are some confidentiality problems about the airlines.	It's often necessary to undertake transcodification.
Cyprus	Straightforward exploitation/extension of an existing process	No confidentiality problems	The information is supplied to the CNA using the codes requested by the Regulation
Latvia	The compliance with the Regulation required from the CNA to implement an absolutely different system of data collection. The previously existing data collection did not comply with any of the requirements specified in the Regulation.	There are no confidentiality problems in the data collection process. Those were eliminated in the process of implementation of the new data collection.	The information supplied to CNA uses the codes required in the Regulation. There is no necessity to make any transcodification except the air transport operator code that is encoded by CNA. There were no problems encountered using the codes.

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
Lithuania	The compliance with the Regulation's demands required the implementation of a new data collection and compilation process.	Airports and CNA do not have any confidentiality problems.	In the information supplied to CNA codes requested in the Regulation are used.
Luxembourg			
Hungary	To meet the requirements of the EU Regulation a new monthly data collection has been launched to collect the data of Budapest/Ferenc Liszt International Airport (former Ferihegy airport) and an already existing annual data collection has been modified (simplified) to survey the smaller regional airports.	There are no confidentiality problems at any stage of the collection and compilation process. However, the airport does not allow the publication of the individual data of the airlines.	As from July 2006 the datasets supplied by Budapest/Ferenc Liszt International Airport (former Ferihegy airport) contain ICAO codes for coding the partner airports and the airlines while the aircraft types are coded with IATA codes. For transcodification the IATA codes into ICAO codes the code lists provided by Eurostat are used. From 2010 the datasets are supplied by the BUD airport with both IATA and ICAO aircraft codes.
Malta			
Netherlands	The compliance has required the compilation of a new process.	According to the Dutch Legal base, data on an individual enterprise or data from which this information can be easily obtained cannot be published or otherwise disseminated.	In general the received codes comply with the Regulation. There is one exception: Transcodification is needed for determining the type of aircraft on airport EHRD-data.
Austria	Not required	No problem; Confidentiality is in accordance with Federal Statistics Act.	Partially transcodification; no problems.
Poland	The compliance with the Regulation demands has required the implementation of a new data collection and compilation process.	Port to port data with identified airlines is treated as confidential.	Airports used IATA/ICAO codes alternatively, so trans-codification is made by airports.
Portugal	An all new data collection	As we receive the information at an individual flight level, we have to aggregate the data to surpass the confidentiality issues	All the data is received with all the fields in text descriptive (except the aircraft code),

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
		(the airliner identification on a specific airport pair)	which is coded with conversion tables (with systematic updates).
Romania	The compliance with the Regulation requests has implied the implementation of a new data collection and compilation process which was carried out by NIS Transport Department in 2003.	Data confidentiality problems may occure when commercial data is not reported by airlines for seats available information, and this is being replaced with average aircraft capacities.	Information supplied to NIS mainly use the codes requested in the Regulation, but there are still a few situations where transcodification is needed, especially concerning aircraft type codification.
Slovenia	The Regulation demands have required the implementation of a new data collection and compilation process	There was confidentiality problem with the airline information at the beginning but we solved it with codes for unknown and confidential airlines.	Ljubljana Jože Pučnik Airport has harmonized its information system with the codes requested in the Regulation.
Slovakia	Collection of data is made according to CR 437/2003 by monthly survey of airport The changes in the survey are not needed.	Statistical Office of the Slovak Republic do not have problem with confidential data.	The airports use the codes requested in the Regulation.
Finland	This has needed a lot of programming and extending processes		No problems
Sweden	The requirement to report OFOD (table B1) has resulted in that new information has to be collected for all airports. For the non- state-owned airports concerned by A1 and B1 information on movement level has to be reported, earlier this information has been reported monthly on an aggregated level.	The collection procedure to the CNA works well, but due to the Swedish confidentiality legislation concerning company information, there is no reporting on airline level to Eurostat.	There is no problem using the codes.
United Kingdom	Extension of existing process	Extensive – Not possible to release at movement level.	All data transcoded by CNA
FYROM	No	No	Yes, codes from the Regulation are used
Turkey	C1 (Airports) data submission was a straightforward extension of an existing process. But Data Sets A1 and B1 have	Confidentiality problem can exist, only in the declaration the name of the Airlines.	There is no any codification problem in C1 (Airports) data, In Data Sets A1 and B1 were not compiled in a computerized system yet.

	IMPLEMENTATION OF THE DATA COLLECTION AND COMPILATION PROCESS (THE COMPLIANCE WITH THE REGULATION DEMANDS HAS REQUIRED THE IMPLEMENTATION OF A NEW DATA COLLECTION AND COMPILATION PROCESS OR A STRAIGHTFORWARD EXPLOITATION/EXTENSION OF AN EXISTING PROCESS)	DATA CONFIDENTIALITY PROBLEMS	DATA CODIFICATION PRACTICES (THE INFORMATION SUPPLIED TO THE CNA USE THE CODES REQUESTED IN THE REGULATION OR IT IS NECESSARY TO UNDERTAKE ANY TRANSCODIFICATION. ARE THERE ANY PROBLEMS IN PROVIDING AND/OR USING THE CODES SPECIFIED IN THE REGULATION?)
	required the implementation of a new data compilation process, in summary have required a fully computerized system.		
Norway	No changes to the existing process in Avinor.	There are no confidentiality problems in Avinor, as specific airline data is normally removed from the information before further distribution.	The information supplied to CNA use the codes requested in the Regulation. There are no codification problems providing/ or using the codes specified in the Regulation.
Switzerland	Straightforward	At compilation level. If airline national or European. We know what SWISS do.	No

	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS
Belgium	Check data format Check airport, aircraft, airline code Check accordance between passenger/freight service and number of passengers/freight tonnage Check accordance between passenger seats and number of passengers. When errors are detected, the data are corrected (correct codes, average aircraft capacities).	Check of the 'top 30' most important origins/destinations of the reporting airport.
Bulgaria	NSI of Bulgaria will use SDMX format for data validation procedure. All inter data set checks are performed at national level before data transmission.	
Czech Republic	Ministry of Transport uses the validation procedure within eDamis tool. Usually there are no errors detected only if there are new airport, airline or airplane codes used by reporting airports, which are not yet in the list of codes used by Eurostat.	Consistency checks described in the article 2.1.5.of Reference Manual on Air Transport Statistics, Version 11 are used.
Denmark	Local validation of format and some validation of data – including validation between passenger figurer regarding FS and OFOD data, Area and some Country code validations etc. If errors data validation result is send back to the airport for correction and new file is provided after correction at airport level.	None as mentioned – All data provided according to the Regulation is generated in system on the basis of data in general originating from handling agencies, Cargo handlers at airport and/or airport administrations. In many cases original data are uploaded manually at airport databases – in other cases some or most data are based on data from other systems – ATS, ATC, OPS etc. All commercial airports with regular commercial traffic are transmitting monthly data to DCAA including detailed information per individual flight. Data are transmitted as text files in fixed format and uploaded to local system at DCAA.
Germany	A special plausibility-program electronically verifying the quality of the data contains about 150 individual data-checks. About 10 per cent of theses checks are automatic ones. The majority of the other checks (mistakes) is to be corrected; otherwise the generation of tables is impossible.	Flight-Stage data versus OFOD – Data Verification of sums Use of updated codes Availability of complete ICAO/IATA-Codes (airports worldwide).

	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS	
Estonia	Community airport EETN provides SE with necessary information in Excel format. First of all responsible person of CNA performs a short check-up over information in the columns and creates a new database to keep original data. CNA forms from Excel files datasets A1, B1 and C1 using tailor-made software for data processing in FOXPRO. There are also main validation rules implemented into this FOXPRO toolbox. After validating the data, necessary corrections are made manually into database. If necessary, the data respondents are involved into data correction process. New data correction tool with autocorrection function is under development. The output files are in csv format.	There are no consistency checks applied yet. It will be the work for future.	
Ireland	<ul> <li>The CSO runs the following checks on the data files received from the airports:</li> <li>Seating capacity – look to see if there are more passengers than seats available</li> <li>Zero Returns – look to see if a return has been made for a passenger flight with zero passengers or a freight flight with zero freight. Also run checks to</li> <li>Origin/Destination – run a check to see if flights included where origin is equal to destination</li> <li>Once these checks are completed the files is run through GENEDI to check for valid codes etc.</li> <li>Any errors that are found with the validations checks are queried with the airports by phone or email.</li> </ul>		
Greece	Data are checked in accordance to the existing tables for aircraft, airlines and airports. Statistics Department corrects all errors detected.	There are no other consistency checking.	
Spain	Validation of airport codes, airline codes, and aircraft codes. Comparison of the monthly aggregates by airports with other statistical publications. The actions taken when errors are detected: Investigation and correction of erroneous data To request data again.	Origin airport should differ from destination airport. Number of Passengers or volume of freight greater than 0. Passengers on board lower or equal to Seats available Seats available lower or equal to the maximum capacity of the type of aircraft.	
France	The detected errors by the DGAC are corrected after a dialog with the airport source	A mirror analysis is set up for the national traffic. Contacts with the companies allow deepening the analyses on the international traffic. These analyses are conducted in relation with the service that does the follow-up of the traffic rights.	
	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS	
---------	--	--	
Croatia	<ul> <li>The validations are following:</li> <li>airport, aircraft, airline code check</li> <li>accordance between passenger/freight service and number of passengers/freight tonnage check</li> <li>accordance between passenger seats and number of passengers check</li> <li>accordance between passenger seats and type of aircrafts check</li> <li>accordance between passenger seats and type of aircrafts check</li> <li>codes ZZZZ (unknown aircraft, airline or destination) for big aircrafts and schedule air service check</li> <li>data series checks for three consecutive years at airport level check</li> <li>indices on the same period of the previous year at airport level check</li> <li>When errors are detected results are sent back to the airports for explanation or correction and new file are provided after correction at airport level</li> </ul>	Data coherence between datasets A1, B1 and C1 at airline and airport level is checked. Mirror check of the national traffic.	
Italy	Interactive corrections (wrong codes) Consistency between Arr and Dep Comparison between dataset A1, B1 and C1 ecc		
Cyprus	CNA applies random checks and if errors are detected CNA indicates and requests the correction of the data.	No consistency checks are applied to the data.	
Latvia	CNA is responsible for the primary checks regarding the data format but Genedi tool is used for the data validation procedure. If it is necessary the detected errors are corrected by CNA or by contacting the airport.	<ul> <li>The CNA makes validation of the codes. The other validations are applied to the summary datasets. The validations are the following:</li> <li>the total number of seats available is compared with the total number of passengers on board and if necessary the corrections are made;</li> <li>the particular data coherence between datasets A1, B1 and C1 are verified.</li> <li>The consistency checks are done manually.</li> </ul>	

	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS
Lithuania	CNA applies some validation procedures to the incoming data. All codes are checked, some validation rules are applied to passengers, freight and mail on Flight Stage (FS) data and On Flight Origin/Destination (OFOD) data in the ORACLE program. If an error is detected, CNA contacts airport and corrects it.	CNA checks new routes directly with airports.
Luxembourg		
Hungary	The validation procedure includes the check of the data format, codification and internal consistency of each dataset received from the airport. After the correction of the detected errors— together with the airport, the datasets are validated by the GENEDI 2.1 toolbox for aviation to filter out the double lines.	Essential consistency check is applied to the datasets. (For example the passenger seats available cannot be less than the number of passengers)
Malta		
Netherlands	<ul> <li>Validation of airport codes, airline codes and type of aircraft codes.</li> <li>Comparison of the monthly aggregates by airports with other statistical publications.</li> <li>Actions taken when errors are detected:         <ul> <li>Investigation and correction of erroneous data.</li> <li>Request for new data at airport if necessary.</li> </ul> </li> </ul>	The total number of seats available is compared with the total number of passengers on board. Verification of sums.
Austria	Plausibility checks with 24 plausibility points; requests at airport if necessary	Not available.
Poland	The data received from airports are checked in CSO by GENEDI application and sent to EUROSTAT used STADIUM application.	All reported data are checking in CSO.
Portugal	All the main validation procedures are performed directly on the airports (ANA and ANAM) information systems. At INE only basic checks are made: mirror checks if possible and aggregate analysis on the main identification fields (by airport, by main air carriers, etc.)	By comparison of the data provided by the airport system and the data provided by the Portuguese air carriers and INAC (quarterly basis).
Romania	IT Department has created an Oracle application for validating and processing aviation data; according to validation conditions, all codification errors regarding type of aircraft, airports and airlines are listed and also the following correlations are checked:	There is a lack of such consistency checks.

	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS
	<ul> <li>-Total of passengers on board should be lower than number of passenger seats available;</li> <li>-Total of passengers embarked/debarked should be equal with the total of passengers resulted from summarizing the passengers by airports of origin/destination.</li> <li>- Total of freight and mail loaded/unloaded should be equal with the total of freight and mail resulted from summarizing the freight and mail by airports of origin/destination;</li> <li>- Passengers on board should be equal with the sum of passengers embarked/debarked and direct transit passengers.</li> </ul>	
Slovenia	CNA check codes used by the data providers and also total sum of passengers and goods as well as comparison between the flight stage declarations (A1) and on flight origin/destination declarations (B1), comparison between the flight stage declarations (A1) and the airport declarations (C1) and comparison between the on flight origin/destination declarations (B1) and the airport declarations (C1). When the errors are detected CNA contact directly with the airport (data provider to CNA), exactly with person who prepare the data.	Carrying out any other checking is very hard also because available codes are not updated regularly (ICAO airport codes only once per year).
ŝlovakia	CNA make the control between the data in files A1, B1, C1. Eventually errors are consulted with airport. If the number of passengers including infant on the board is higher than capacity of aircraft, the number of passenger must be physically corrected.	
Finland	E.g. Checking that every passenger flight (according to flight type) actually has received passengers	
Sweden	Automatic checks are implemented. Errors are communicated with reporting airport.	Manual comparisons with other data sources and historical data.
Jnited Kingdom	<ul><li>(i)Comprehensive validation process incorporating extensive matrix of Exception Reports.</li><li>(ii) Data errors identified amended in liaison with Data Suppliers.</li></ul>	Extensive matrix of Exception Reports - two such exception reports relate to "New" and "Old/Discontinued" routes.

	<b>DATA VALIDATION PROCEDURE</b> (DESCRIPTION OF THE VALIDATION PROCEDURES THAT ARE APPLIED AT THE CNA TO THE INCOMING DATA. WHAT ACTIONS ARE TAKEN WHEN ERRORS ARE DETECTED?)	DESCRIPTION OF CONSISTENCY CHECKS
FYROM	If errors occurred, Airports TAV MACEDONIA DOOEL is consulted. Errores are detected with mathematical control	Data are compared wirth similar data from previous periods.
Turkey	There are many validation procedures adapted into the system by process control. Some of them have been realized by automatic checks,others by manual controls with the several SQL sentences (airport, aircraft, airlinecode, mirror-check, etc.). If an error is detected, CNA contacts Airports and other data suppliers and then corrects it.	In connection with consistency checks for each reporting airport CNA checks total flights and total commercial aircraft movements.Origin airport should differ from destination Airport,number of passengers or volume of freight and mail should be greater than 0 for commercial movements. The main problem about checks is that all constant data sources are revised with the current versions (JP Fleets, ICAO Documents etc.) but it is not enough. CNA does not have any control criteria about seats available and aircraft type.
Norway	The datasets A1, B1 and C1 are aggregated and controlled against monthly press releases published by Avinor. Avinor is contacted if errors are detected in datasets. If the datasets have errors, the CNA are delivered aggregated datasets from each airport.	If there appear new routes or routes disappear or other changes, Avinor is contacted and the information is checked.
Switzerland	The data are read with SAS (statistic program). If we know that the data are systematically false (for example, GMT time instead of local time) then the data are adapted before being imported in Adabas (Database, Natural). After that the correctness of the data is tested (Airline code, airport code, date, time,).	At the beginning of statistics the records were controlled with the help of fly plans. After two years, because there were no differences, this control was abandoned. There is actually no more such tests.

	<b>DEADLINE FOR DATA TRANSMISSION</b> (ANY DIFFICULTY TO RESPECT IT THE T+6 TRANSMISSION DEADLINE FOR THE THREE DATASETS (A1, B1 AND C1). IS IT FEASIBLE TO DELIVER THE DATASETS WITH A SHORTER DELAY (E.G. T+5)?)	<b>PROBLEMS ON DATA COMPILATION, VALIDATION AND DELIVERY</b> (DESCRIPTION OF ANY PARTICULAR PROBLEM EXISTING IN THE DATA COMPILATION AND VALIDATION PROCESS AT THE CNA AND IN THE DATA TRANSMISSION TO EUROSTAT.)
Belgium	Feasible to deliver the datasets with a shorter delay	No problem
Bulgaria	In principle, the deadline for airports submitting the statistical forms to DG CAA is T+15 days (pursuant to Regulation PД-08-20). For Bulgaria there would not be any difficulties in submitting the forms every T+5 months.	Νο
Czech Republic	It would be possible to deliver data within the T+5 deadline	No problem
Denmark	Only problem is man-power at DCAA - In general is should be possible to send data on a monthly basis (M+1 or M+2)	From the OFOD data received by the CNA, could it be possible to identify the true first origin/final destination of a passenger in the case where the journey includes multiple flights (e.g. based on ticket information)? NO ! (Such system requires on line data collection from Airline booking systems and can only be done on a centralized basis – fx. by Eurostat. Complete new system at DCAA. New systems or major changes (programming) to existing systems at airport including similar changes at agencies. A new system is presently being developed at Copenhagen Airport – Cost not yet identified, but estimated around 1 mio. Euro !
Germany	T +2	At the beginning of every year databases have to be updated which can cause delays.
Estonia	The airport EETN provide SE quarterly with all the needed data. The data of three months (datasets A1 and B1 and C1) are transmitted to EUROSTAT T+ 5 months after the first reference period (month).	There are no considerable problems on data compilation, validation and delivery. SE has tailor-made software for data processing in FOXPRO. There are also main validation rules implemented into this FOXPRO toolbox. The output files are in csv format. From October 2005 the software eDAMIS was used for data transmission to EUROSTAT. From 2013 data are transmitted to Eurostat in SDMX format.
Ireland	At present we often just make the T+6 deadline for submitting data. This is because of the delay with some airports submitting the data to us. Because of this it would be difficult to meet a T+5 deadline.	Not applicable

	<b>Deadline for data transmission</b> (ANY DIFFICULTY TO RESPECT IT THE T+6 TRANSMISSION DEADLINE FOR THE THREE DATASETS (A1, B1 AND C1). IS IT FEASIBLE TO DELIVER THE DATASETS WITH A SHORTER DELAY (E.G. T+5)?)	<b>PROBLEMS ON DATA COMPILATION, VALIDATION AND DELIVERY</b> (DESCRIPTION OF ANY PARTICULAR PROBLEM EXISTING IN THE DATA COMPILATION AND VALIDATION PROCESS AT THE CNA AND IN THE DATA TRANSMISSION TO EUROSTAT.)	
Greece	No difficulties for the T+6 months.	There are no problems.	
Spain	We try to reduce the delays in terms of data transmission.	No problem.	
France	In the current system, it happens that for T + 6 the collection of all the data for the different airports is not complete and therefore it is difficult to envision in the framework of this system a reduction of the delays regarding the availability of the information.	The validation of the national traffic could only be done once the declarations of all the national traffic has been received. The new civil aviation system should reduce the delays by harmonising the collection system.	
Croatia	It is feasible to deliver datasets within T+5 months.	There are no problems in the data compilation and validation process at the CNA and in the data transmission to Eurostat.	
Italy	We usually respect T+6 months. It isn't possible T+5.	There are several problems due to wrong data transmitted from airports. There is some problems about the deadline for data transmission from airports (dataset A1, B1,C1).	
Cyprus	No difficulty to deliver the three datasets with a shorter delay	No problem	
Latvia	It is feasible to deliver the datasets respecting T+6 transmission deadline; it is also possible to deliver data with a shorter delay.	There were no problems encountered.	
Lithuania	T+6 deadline for the transmission of data to Eurostat is convenient.	No problems	
Luxembourg			
Hungary	There is no any difficulty to respect the deadline of T+6 months. It would be feasible to deliver datasets with a delay of T+5 months.	There is no any particular problem existing in the data compilation s. and validation process.	
Malta			
Netherlands	No difficulty to deliver the three datasets with a shorter delay (T+5).	Problems with SDMX data exchange.	
Austria	No difficulty to deliver data within T+5	No; problems with GENEDI eventually solved	
Poland	Period T+6 is optimal, the CSO cannot see possibility earlier data delivery to EUROSTAT.	For the time being, databases of the polish airports are not compatible yet, with the requirements of the regulation. Mostly errors can be classified: Problems with aggregation of the data received from Airports (e.g. The same flights is coded several times) "Empty flights" – the flight took place, but there is no information about e.g. passengers/freight/mail and "0" is reported in raw data	

	<b>DEADLINE FOR DATA TRANSMISSION</b> (ANY DIFFICULTY TO RESPECT IT THE T+6 TRANSMISSION DEADLINE FOR THE THREE DATASETS (A1, B1 AND C1). IS IT FEASIBLE TO DELIVER THE DATASETS WITH A SHORTER DELAY (E.G. T+5)?)	<b>PROBLEMS ON DATA COMPILATION, VALIDATION AND DELIVERY</b> (DESCRIPTION OF ANY PARTICULAR PROBLEM EXISTING IN THE DATA COMPILATION AND VALIDATION PROCESS AT THE <b>CNA</b> AND IN THE DATA TRANSMISSION TO EUROSTAT.)
		Codification problems for aircraft/airports/airlines using proper codes in delivered data by airports The CSO do not have any problems with data transmission to EUROSTAT.
Portugal	We can evaluate the possibility of doing that, but with the improvement on the data treatment performed by us (linking the data from different sources) it is not guaranteed and we cannot assume that objective.	The seats available variable is currently obtained by cross-reference with the aircraft type which means that a misidentification of the subtype of the aircraft leads to a lack of precision on the variable.
Romania	Yes, T+5 is an acceptable delay.	No particular problems detected.
Slovenia	No problem with a shorter delay. T + 5 is O.K.	No problems
Slovakia	The deadline for the transmission of data to Eurostat T+6 months shorter reference period is not a problem.	
Finland	No difficulties following current deadlines	Receiving freight data from certain carriers.
Sweden	T+6 is fine but at the moment it is not possible with a shorter delay.	There are no problems.
United Kingdom	T+5 would be acceptable to the UK.	Data Collection – with regard to integrity of Multi sector data and Freight / Mail splits.
FYROM	No difficulties	No problems
Turkey	Yes, feasible.	Purpose of flight should clearly be identified by the Airlines in a standardized way. Receiving freight data breakdowns from Airlines and Handling Companies.
Norway	Avinor may deliver datasets to the CNA on a much shorter (1 month) notice - if required.	The quality of the datasets could be better. Avinor have problems to get all data, especially data for arriving charter, both passengers and freight.
Switzerland	There is should be no difficulty even for T+5.	No problems.

# New methodological information

	IMPLEMENTATION AND COMPLIANCE WITH THE SDMX STANDARDS ARE YOU CURRENTLY ABLE TO GENERATE DATA FILES IN THE SDMX STANDARD FOR DATA TRANSMISSION? IF SO, DOES YOUR PRODUCTION SYSTEM GENERATE 'NATIVE' SDMX DATA FILES OR DO YOU USE THE SDMX CONVERTER? DO YOU USE THE SDMX STANDARD FOR DATA EXCHANGES WITH YOUR DATA PROVIDERS?	<b>COLLECTION OF TRANSFER PASSENGERS DATA</b> WHAT IS THE ENTITY SUPPLYING DATA RELATED TO TRANSFER PASSENGERS? WHAT IS THE SOURCE OF THE DATA (TICKET SALES, FLIGHT INFORMATION,)
Bulgaria	Yes we generate SDMX files for data transmission. We use the SDMX converter. No, we do not use this format for data exchange.	We have made the proper arrangements and expect to start transmitting data from the Q1 2015.
Czech Republic	Ministry of Transport regularly sends the data files in SDMX format via eDamis portal. Data files A1, B1 and C1 in CSV format are generated and then the SDMX converter is used. Data exchange between the Ministry of Transport and the airports is in the CSV format	Airports, handling agents
Estonia	From 2013 data are transmitted to Eurostat in SDMX format. SDMX converter is used for generating the datafiles. Estonia doesn't use the SDMX standard for data exchanges with our data providers. It is a plan for future.	EETN receives electronic messages from the handling companies or airlines (in order to perform the necessary operations and billing/invoice procedures) but in some occasions (if electronic data is not available) data is also collected from the airlines/handling agents by other means.
Croatia	<ul> <li>Please provide your feedback here</li> <li>The CBS delivers monthly datasets in the SDMX standard since June 2014 (for reference month April 2014) onwards.</li> <li>The SDMX data files are generated through the SDMX converter. Original data are generated from the data production system as excel files that are modified to comply with the SDMX structure, converted and delivered to Eurostat.</li> <li>SDMX standard for data exchanges is not used with data providers. Data providers deliver data as a flat file via e-mail.</li> </ul>	Please provide your feedback here Data related to transfer passengers are supplied by airports. The source of the data is "check in ticket".
Italy	Yes Yes we use SDMX Converter No	Airports Ticket sales, flight information.
Cyprus	<ol> <li>Yes</li> <li>Use of SDMX converter</li> <li>No</li> </ol>	<ol> <li>Handling agents and/or airline representatives</li> <li>Usually ticket sales</li> </ol>
Latvia	We are testing a possibility to provide datasets in the SDMX standard. The datasets have been formatted according to the new structure and were sent to Eurostat. In	The transfer passenger statistics are collected from SITA messages and provided to CNA by the airport.

	IMPLEMENTATION AND COMPLIANCE WITH THE SDMX STANDARDS ARE YOU CURRENTLY ABLE TO GENERATE DATA FILES IN THE SDMX STANDARD FOR DATA TRANSMISSION? IF SO, DOES YOUR PRODUCTION SYSTEM GENERATE 'NATIVE' SDMX DATA FILES OR DO YOU USE THE SDMX CONVERTER? DO YOU USE THE SDMX STANDARD FOR DATA EXCHANGES WITH YOUR DATA PROVIDERS?	<b>Collection of transfer passengers data</b> What is the entity supplying data related to transfer passengers? What is the source of the data (ticket sales, flight information,)
	order to produce these files the SDMX converter was used. The data provider doesn't send data in SDMX standard.	
Hungary	The programme requested a login name and password, the installation was unsuccessful.	Please provide your feedback here
Netherlands	Currently we are not able to generate data files in SDMX standard. We try to send the data files from January 2015 in SDMX standard. We will use the SDMX converter. No use of the SDMX standard for data exchanges with data providers.	Collection of transfer passengers data of Amsterdam Airport Schiphol (EHAM) is possible on a monthly basis. At our other national airports (EHEH, EHRD, EHBK, EHGG) are no transfer passengers.
Lithuania	Yes, we generate data files in the SDMX standard. We use the SDMX converter. No, we don't use the SDMX standard for data exchanges with the data providers.	Currently we don't provide transfer passenger data to Eurostat, because the transfer passenger data is not available in the data base of the main airports. In the future we will be able to compile and send this data to Eurostat, when the new information system will be implemented in the main airports.
Austria	Data files in the SDMX standard for data transmission are currently generated without any problems. The SDMX converter is used. SDMX standard for data exchanges with data providers is not used.	Airport Information about transfer passengers is available for every flight.
Slovenia	Yes, CNA is currently able to generate data files in the SDMX standard for data transmission. We use the SDMX converter. We do not use SDMX standard for data exchanges with our data provider yet.	Currently we do not collect data concerning transfer passengers.
Slovakia	No	Database of airport
Finland	Not applicable	Please provide your feedback here
Sweden	Sweden reports the files in the SDMX format by using the converter. The SDMX standard is not used for other providers.	This information is included in the weekly report from the airports. The source is handling agents.

	IMPLEMENTATION AND COMPLIANCE WITH THE SDMX STANDARDS ARE YOU CURRENTLY ABLE TO GENERATE DATA FILES IN THE SDMX STANDARD FOR DATA TRANSMISSION? IF SO, DOES YOUR PRODUCTION SYSTEM GENERATE 'NATIVE' SDMX DATA FILES OR DO YOU USE THE SDMX CONVERTER? DO YOU USE THE SDMX STANDARD FOR DATA EXCHANGES WITH YOUR DATA PROVIDERS?	<b>COLLECTION OF TRANSFER PASSENGERS DATA</b> WHAT IS THE ENTITY SUPPLYING DATA RELATED TO TRANSFER PASSENGERS? WHAT IS THE SOURCE OF THE DATA (TICKET SALES, FLIGHT INFORMATION,)
Turkey	Yes, currently CNA is able to generate data files in the SDMX standard. But, our system does not support the format so CNA uses the SDMX converter. Furthermore, for data exchanges CNA does not use SDMX standardwith its data providers.	At first Airlines and then Handling Companies. The main source of the data is obtained bystandard forms.

# PART III: PROCEDURES FOR DATA TREATMENT AND DISSEMINATION

# **1 DESCRIPTION OF THE DATA INTEGRATION PROCESS**

The following diagram describes the production process for Aviation statistics both on data suppliers and Eurostat side.





# **2 DESCRIPTION OF THE QUALITY CHECKS**

countries together

Mirror checks

Missing routes check

# 2.1 Quality checks results communicated to the countries

Several types of quality checks are made on datasets A1 and B1 respectively, for national and international air passenger transport, on the basis of annual, quarterly and monthly declarations, for the total number of passengers, the total volume of freight and mail and the number of commercial air flights.



Consistency over time/Passengers

- Consistency over time/Freight and mail
- Consistency over time/Commercial air flights
- Comparison between arrivals and departures
- Interdataset checks/Passengers
- Interdataset checks/Freight and mail
- Seats available check

Possible data errors that are detected during the quality checks are discussed with the countries for confirmation. All corrections of errors should be documented. Sometimes it might be prudent to return the data to the countries for correction and re-supply. Data that are re-supplied are then re-validated, before further quality checking.

The quality checks are run once the data have been integrated in the aviation database. However, several checks are applied during the integration process:

- Control of the file format
- Control of the codes when importing the data
- Control of the double records after having imported the data

When problems are detected at this stage, an email is sent to the corresponding countries to clarify the situation.

# 2.1.1 Compliance with the Regulation checks

Once the data available completely for a given year, compliance with the Regulation check is applied for each country separately. This check allows comparing the list of airports defined in the Regulation to the list of airports for which data have been provided by the countries (category of the airports, datasets provided for each airports). Each country receives the details and the conclusions of this check.

# 2.1.2 Summary results

The summary results presents by reporting country the aggregated data at airport level for the values provided in the three datasets (A1, B1 and C1) available in Eurostat database. The figures presented exclude, if necessary, double counting between an airport and itself: the results presented are then used for dissemination.

# 2.1.3 Consistency over time

This check is made in order to detect unlikely increases or decreases of air transport at one of the reporting airports.

This check is applied separately for air passenger, freight and mail transport and commercial air flights for A1 and B1, at airport level and for annual data. In order to define thresholds to apply for the detection of suspicious growths, a preliminary study on the existing time series has been done. This analysis, for specific data ranges, has lead to the following results:

# **Passenger transport:**

Data range		Thresholds
>= 10000 passengers	< 100000 passengers	40%
>=100000 passengers	< 400000 passengers	15%
>= 400000 passengers	< 3000000 passengers	15%
>= 3000000 passengers		10%

# Freight transport:

Data range		Thresholds
>= 50 Tonnes	< 1500 Tonnes	100%
>= 1500 Tonnes	< 4000 Tonnes	70%
>= 4000 Tonnes	< 60000 Tonnes	25%
>= 60000 Tonnes		15%

# **Commercial air flights:**

Data r	Thresholds	
>= 100 Flights	< 1200 Flights	70%
>= 1200 Flights	< 12000 Flights	20%
>= 12000 Flights	< 100000 Flights	10%
>= 100000 Flights		5%

Each participating country receives the list of their national airports that were detected due to an annual growth rate (in absolute value) that was above the defined thresholds.

# Formula used for the calculation:

$Indicator = \left  \frac{Passenger_{Y} - Passenger_{Y-1}}{Passenger_{Y-1}} \right  \times 100, \text{ Y= reference year, Y-1=previous reference year.}$	
Indicator = $\left  \frac{Freight_{Y} - Freight_{Y-1}}{Freight_{Y-1}} \right  \times 100$ , Y= reference year, Y-1=previous reference year.	
Indicator = $\left  \frac{Flights_{Y} - Flights_{Y-1}}{Flights_{Y-1}} \right  \times 100$ , Y= reference year, Y-1=previous reference year.	

Some of the suspect data detected in the previous years have however proved to be normal, for instance in the case of a rapid development of low cost companies' activities at certain airports.

# 2.1.4 Consistency between arrivals and departures figures

This check verifies if, for each reporting airport, A1 departures (Total Passengers on board at Arrival) "is similar" to A1 arrivals (Total Passengers on board at Departures). The same way, for each reporting airport, B1 arrivals (Total Passengers carried at Arrival) "should be similar" to B1 departures (Total Passengers carried at Departures)

In order to define thresholds to apply for the detection of suspicious deviations between arrivals and departures, a preliminary study on historical data has been done. This analysis, for specific data ranges, has lead to the following results.

# **Passengers:**

Data r	Thresholds	
>= 1500 passengers	10%	
>=50000 passengers	< 400000 passengers	4%
>= 400000 passengers		2%

# 2.1.5 Interdataset checks

This section presents the quality checks allowing to detect discrepancies between the three datasets A1, B1 and C1.

The thresholds defined for the difference between two datasets have been defined in the frame of a preliminary study on the historical data and depending on the size of the flow considered.

# Comparison between the flight stage declarations (A1) and the airport declarations (C1)

The following statement should be verified for each reporting airport:

# A1(Total Passengers on Board) "is similar" to C1(Total Passengers on Board)\*

\*Passengers on board from dataset C1 are calculated as Passengers carried + 2\*Transit passengers

The difference is calculated as follow:

Absolute value (Passengers on board [A1] - Passengers on board [C1])

Difference A1/C1=

0.5\*(Passengers on board [A1] + Passengers on board [C1])

The following thresholds are applied on the differences observed:

Data r	Thresholds	
>= 0 passenger	< 150000 passengers	50%
>= 150000 passengers	< 400000 passengers	10%
>= 400000 passengers	< 2000000 passengers	5%
>= 2000000 passengers		2%

# Comparison between the on flight origin/destination declarations (B1) and the airport declarations (C1)

The following statements should be verified for each reporting airport:

# B1 (Total passengers carried) "is similar" to C1 (Total passengers carried) B1 (Total Freight and mail loaded/unloaded) "is similar to" C1 (Total Freight and mail loaded/unloaded)

The differences are calculated as follow:

Absolute value (Passengers carried [B1] - Passengers carried [C1])

Difference A1/C1 (Pax)=

0.5\*(Passengers carried [B1] + Passengers carried [C1])

Absolute value (Passengers carried [B1] - Passengers carried [C1])

Difference A1/C1 (freight)=

0.5\*(Passengers carried [B1] + Passengers carried [C1])

The following thresholds are applied on the differences observed:

Passengers carried B1-C1

Data r	Thresholds	
>= 0 passenger	< 150000 passengers	10%
>= 1500000 passengers		2%

# Freight and mail loaded/unloaded B1-C1

Data r	Thresholds	
>= 50 tonnes	= 50 tonnes < 500 tonnes	
>= 500 tonnes	<7000 tonnes	5%
>= 7000 tonnes		2%

The analysis of the results of the quality checks performed on the 2014 data is available in Annex XII.

# A report containing the four last checks mentioned is sent to the corresponding country, in order to approve the results or submit updated datasets again.

# 2.1.6 Seats available

These checks highlight by reporting country, the cases where the number of seats available is lower compared to the number of passengers.

The check contains 4 parts:

- the airport-to-airport routes for which the number of seats available is lower compared to the number of passengers by aircraft type
- the share of each aircraft type in the total number of airport-to-airport routes where problems are discovered
- the airport-to-airport routes for which the number of seats available is lower compared to the number of passengers by aircraft type and period
- the share of each aircraft type in the total number of airport-to-airport routes where problems are discovered by period

Once all the data of the participating countries are compiled, mirror and missing routes checks can be run.

# 2.1.7 Mirror checking

These quality checks have been performed in order to compare the consistency between two partner declarations in a same dataset: dataset A1 (flight stage declarations) or dataset B1 (On flight Origin/Destination declarations).

This check is limited to the routes between the airports of categories 2 and 3 listed in the Regulation (more than 150 000 passengers units annually). When a problem is found for a route between airport A (belonging to city A') and airport B (belonging to city B'), all the airport-to-airport routes available between city A' and city B' are displayed in order to check if the difference is due to a wrong code attribution.

The check is run both for national and international declarations at airport level.

Formula used for the calculation of the deviation for a given airport-to-airport route:



The thresholds defined for the detection of the abnormal deviation have been defined depending on the size of the flow.

# National transport of passengers

Data r	Thresholds	
>= 2000 passengers	< 5000 passengers	100%
>= 5000 passengers	< 35000 passengers	10%
>= 35000 passengers	< 160000 passengers	2.5%
>= 160000 passengers		1.5%

# International transport of passengers

Data r	Thresholds	
>= 2000 passengers	< 5000 passengers	100%
>= 5000 passengers	< 15000 passengers	40%
>= 15000 passengers	< 65000 passengers	15%
>= 65000 passengers		5%

## National transport of freight and mail

Data r	Thresholds	
>= 200 Tonnes	50%	
>= 800 Tonnes	< 2000 Tonnes	25%
>= 2000 Tonnes		20%

# International transport of freight and mail

Data r	Thresholds	
>= 500 Tonnes	< 1300 Tonnes	150%
>= 1300 Tonnes	< 6500 Tonnes	75%
>= 6500 Tonnes		50%

Concerning the mirror quality checks on freight transport, they have been performed by making the distinction on the direction, i.e. that for a specific airport-to-airport route, the arrivals at one airport have to be compared with the departures at the partner airport and vice-versa.

Mirror quality checks were implemented since the first data collection (1993) for passengers transport and since the reference year 2001 for freight and mail and it should be noted that the number of deviations detected by these checks has been constantly decreasing.

Since 2007, the new version of the quality checks (described in this section) was implemented, with the particularity to be applied at airport-to-airport routes level and not any more at city-to-city level.

# 2.1.8 Missing routes check

The aim is to check if data have been reported by both reporting airports for a given route. Only the routes for which both airports are reporting airports will be considered for this check. This means that if the route airport A (from country X) to airport B (from country Y) is reported by country Y and not by country X, Eurostat checks first if the airport A is a reporting airport of country X (with a volume above the legal threshold), before indicating that the route is missing.

For instance if the route London/Stansted-Carcassone is reported by the United-Kingdom and not by France and if Carcassone airport is a reporting airport in France, then this route will be declared to France as missing.

At this step, a report is sent to the countries in order to inform them about the data comparison made thanks to the corresponding data of other participating countries (Mirror and missing routes checks).

# 2.2 Frequency of the checks

The checks:

- Summary results
- Consistency over time annual
- Consistency between arrivals and departure figures
- Mirror checking
- Missing routes check

are normally run once a year, except if revised data are provided.

However, Eurostat may do extra-quality checks if some countries have specific requests and if this could help the countries improving the quality of the data transmitted to Eurostat.

# 2.3 Internal quality checks

This section presents the quality checks that are run internally in Eurostat and sent to the participating countries only if important problems are detected.

# 2.3.1 Comparison between the flight stage declarations (A1) and the on flight origin/destination declarations (B1)

- for each reporting airport, A1(Total Passengers on Board) >= B1(Total Passengers carried)
- for each reporting airport, A1(Total Freight and mail on Board) >= B1(Total Freight and mail loaded/unloaded)

# 2.3.2 Comparison between the on flight origin/destination declarations (B1) and the airport declarations (C1)

for each reporting airport, A1(Total Flights) <= C1 (Total commercial aircraft movements

# 2.3.3 Comparison between the on flight origin/destination declarations (B1) and the airport declarations (C1)

- for each reporting airport, B1 (Total passengers carried) "is similar" to C1 (Total passengers carried)
- for each reporting airport, B1 (Total Freight and mail loaded/unloaded) "is similar to" C1 (Total Freight and mail loaded/unloaded)

# **3 METHOD OF EXCLUSION OF THE DOUBLE COUNTING WHEN COMPILING AGGREGATES** FOR AIR TRANSPORT STATISTICS

# 3.1 Introduction to the "double counting" concept

In the frame of the data dissemination process, Eurostat has to calculate aggregates at intra-EU level (national, regional and intra-EU aggregates). It requires solving the problem of double counting for the airport routes for which both airports report the volume, since these constitute the routes where the problem of double counting occurs.

When calculating the total volumes of passengers and freight in such cases, only the departure declarations of the concerned airports are taken into account. The problem of the double counting only appears for the calculation of the total "arrivals plus departures" volumes but not for the total arrivals (respectively total departures), which corresponds to the sum of the arrivals (respectively departures) at each airport.

Concerning the total international extra-EU transport, the calculation is easier. It consists in the sum of all the declarations of the Member States to/from all the partner countries out of the European Union, as there is no double counting.

# 3.2 Principle of the exclusion of the double counting

Ideally, to calculate aggregates at intra-EU level (national, regional and intra-EU aggregates), one should only take departures declarations into account. In practice, the total transport is calculated as follows: it includes all the departures figures reported plus "a part of" arrivals declarations, "a part of" including those arrivals declarations for which the corresponding departures declarations of the partner airport are missing.

The double counting is excluded at city-to-city route level by taking into consideration the dimensions period, year, arrival/departure and scheduled/non scheduled: this means that the figures are aggregated on these dimensions before excluding the double counting. Eurostat has produced a correspondence table between airports and cities allowing the aggregation of the figures at city-to-city route level before excluding the double counting. This aims to prevent as much as possible errors due to miscodifications by the partner airports.

# 3.3 Application of the principle

In order to highlight the principle of exclusion of the double counting, the necessary calculation will be applied to the following case.



# The schema corresponds to the following declarations of the airports located in cities A and B:

Period	Year	Reporting City	Partner City	Arrival/ Departure	Scheduled/ Non Scheduled	Number of passengers
01	2013	CITY A	CITY B	1	1	50
01	2013	CITY A	CITY B	2	1	80
01	2013	CITY B	CITY A	1	1	70
01	2013	CITY A	CITY C	1	2	100
01	2013	CITY A	CITY B	1	2	30
01	2013	CITY A	CITY B	2	2	20
01	2013	CITY B	CITY A	1	2	19

# The exclusion of the double counting is performed as follows:

Period	Year	Reporting City	Partner City	Arrival/ Departure	Scheduled/ Non Scheduled	Number of passengers	Mirror declarations available
01	2013	CITY A	CITY B	1	1	50	
01	2013	CITY A	CITY B	2	1	80	70
01	2013	CITY B	CITY A	1	1	70	80
01	2013	CITY A	CITY C	1	2	100	
01	2013	CITY A	CITY B	1	2	30	
01	2013	CITY A	CITY B	2	2	20	19
01	2013	CITY B	CITY A	1	2	19	20

Departures declarations are always taken into consideration

Arrivals taken into consideration as the partner city has not reported departures to this reporting city Arrivals not taken into consideration as the partner city has reported departures to this reporting city for this type of flight

Arrivals taken into consideration as CITY C has no reporting airport (the corresponding departures of CITY C is estimated by the arrivals declared by CITY A)

Arrivals taken into consideration as the partner city has not reported departures to this reporting city for non-scheduled flights

The total transport excluding double counting is equal to the sum of the remaining records:

# **Reference Manual on Air Transport Statistics**

Period	Year	Reporting City	Partner City	Arrival/ Departure	Scheduled/ Non Scheduled	Number of passengers	Mirror declarations available
01	2013	CITY A	CITY B	1	1	50	
01	2013	CITY A	CITY B	2	1	80	70
<del>01</del>	<del>2013</del>	CITY B	CITY A	1	1	<del>70</del>	<del>80</del>
01	2013	CITY A	CITY C	1	2	100	
01	2013	CITY A	CITY B	1	2	30	
01	2013	CITY A	CITY B	2	2	20	19
<del>01</del>	<del>2013</del>	CITY B	<del>CITY A</del>	<del>1</del>	2	<del>19</del>	<del>20</del>

The total transport excluding double counting is thus calculated by adding the remaining records: 50 + 80 + 100 + 30 + 20 = 280 passengers.

# In this case, this represents a difference of 89 passengers compared to the total transport calculated without excluding double counting.

# **4 DISSEMINATION**

# 4.1 Description of the various supports

The dissemination of air transport statistics is done through different supports.

# 4.1.1 Eurobase

Eurobase is open freely to the public since October 2004.

The Air transport domain contains detailed data and time series since 1993. It is composed of four subdomains (based on data collected in the frame of the Questionnaire):

- Air transport infrastructure (avia\_if)
- Air transport equipment (avia\_eq)
- Air transport Enterprises economic performances and employment (avia\_ec)
- Air transport Accidents (avia\_ac)

As well as five sub-domains (based on the data collected in the frame of the Regulation) devoted to:

- Air transport measurement passengers (avia\_pa)
- Air Transport measurement Freight and mail (avia\_go)
- Air transport measurement traffic data by airports, aircrafts and airlines (avia\_tf)
- Air transport data aggregated at standard regional levels (NUTS) (avia\_rg)

Two derived tables based on the data collected in the frame of the Regulation:

- Air transport of passengers (ttr00012)
- Air transport of goods (ttr00011)

Each sub-domain is divided into several collections of tables. The detail of the tables disseminated in Eurobase is given in **annex XIII**.

# 4.1.2 Statistics explained

Statistics Explained is an official Eurostat website presenting all statistical topics in an easily understandable way. Together, the articles make up everyone's encyclopedia of European statistics, completed by a statistical glossary clarifying all terms used and by numerous links to further information and the very latest data and metadata, a portal for occasional and regular users alike.

# 4.2 Procedures of calculations and aggregations used in the dissemination process

In the frame of the data dissemination process, Eurostat has to calculate aggregates like the total volume of domestic transport for each country or the total volume of intra–EU-28 transport. These calculations require the problem of double counting to be solved. Indeed, taking as example the calculation of the domestic transport for one country, it does not correspond to the sum of the total volume of transport reported by each domestic airport because in this case the volume of transport between two domestic airports would have been counted twice. The problem of the double counting only appears for the calculation of the total transport but not for the total arrivals (respectively total departures), which correspond to the sum of the arrivals (respectively departures) at each domestic airport.

For each aggregate it is necessary to start at the airport level in order to identify the mirror declarations, i.e. the airport routes for which the volume of transport is reported by both airports, because these constitute the routes where the problem of double counting occurs. When calculating the total volume of transport in such cases only the departure declarations of the concerned airports are aggregated.

European aggregates are compiled by Eurostat for EU28 and EU27 as soon as all data become available - provided that dissemination is not limited by confidentiality. In order to estimate regional air transport of passengers/goods in the tables from the Regional transport statistics section, the issue of "double counting" (transport of the same passenger is declared by both the departing airport - as departures - and the destination airport - as arrivals) has to be addressed.

Ideally, to calculate these aggregates for air transport, one should only take departures declarations into account. In practice, total transport includes all the departures figures reported plus "a part of" arrivals declarations, "a part of" including those national arrivals declarations for which the corresponding departures declarations of the partner airport are missing.

Until recently, the exclusion of the double counting for regional air transport statistics was performed at the same level of aggregation than for the "Air transport" domain. A recent analysis has allowed to conclude that a different level of exclusion of the double counting would be more convenient for regional statistics due to methodological reasons: the double counting is now excluded at airport-to-airport route level by taking only into consideration the period. This means that the figures are aggregated on these dimensions before excluding double counting. As a different level of aggregation is used in the "Air transport" domain of the Reference Database, some aggregated figures common to both domains ("Air transport" and "Regional transport") may thus be slightly different due to methodological divergences in the data compilation.

The list of airports to be considered as "main declaring airports" for the passenger tables (respectively the freight tables) are all airports reporting data in the Flight Stage dataset and/or in the On Flight Origin/Destination dataset for passenger transport (respectively freight transport).

The selection of routes between main declaring airports and their main partners is subject to several constraints due to the important difference of volumes reported by the main airports of the various reporting countries. The details of the methodology used for the selection is available in Annex XIV.

# ANNEXES

- Annex I: Regulation (EC) 437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passenger, freight and mail by air
- Annex II: Commission Regulation 1358/2003 implementing Regulation (EC) 437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passengers, freight and mail by air
- Annex III: Commission Regulation (EC) No 546/2005 of 8 April 2005 adapting Regulation (EC) No 437/2003 of the European Parliament and of the Council as regards the allocation of reporting-country codes and amending Commission Regulation (EC) No 1358/2003 as regards the updating of the list of Community airports
- Annex IV: Commission Regulation (EC) No 158/2007 of 16 February 2007 amending Commission Regulation (EC) No 1358/2003 as regards the list of Community airports (Text with EEA relevance)
- Annex V: Regulation (EC) N° 219/2009 of the European Parliament and of the Council of 11 March 2009 adapting a number of instruments subjects to the procedure referred to in Article 251 of the Treaty to Council decision 1999/468/EC with regard to the regulatory procedure with scrutiny
- Annex VI: 2015 List of reporting airports per country
  - 2015 List of Community airports covered by Commission Regulation 1358/2003
  - 2015 List of airports for Candidate Countries
  - 2015 List of airports for EFTA Countries
- Annex VII: Glossary on air transport statistics
- Annex VIII: Updated list of country codes
- Annex IX: Transmission format examples
- Annex X: List of validation rules
- Annex XI: SDMX User Guide
- Annex XII: Questionnaire on aviation statistics
- Annex XIII: 2014 data collection Quality summary report
- Annex XIV: Eurobase structure. Aviation Domain
- Annex XV: Eurobase: main declaring airports. Selection of the routes between the "main declaring airports" and their "main partners"
- Annex XVI: Air Transport Statistics metadata information in Eurobase
- Annex XVII: Country specific notes

# ANNEX I: Regulation (EC) 437/2003

Ι

(Acts whose publication is obligatory)

# REGULATION (EC) No 437/2003 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 27 February 2003

## on statistical returns in respect of the carriage of passengers, freight and mail by air

THE EUROPEAN PARLIAMENT AND THE COUNCIL OF THE EUROPEAN UNION,

Having regard to the Treaty establishing the European Community, and in particular Article 285 thereof,

Having regard to the proposal from the Commission (1),

Having regard to the opinion of the European Economic and Social Committee (<sup>2</sup>),

Acting in accordance with the procedure laid down in Article 251 of the Treaty (3),

Whereas:

- (1)To carry out the tasks entrusted to them, in the context of the Community air transport policy and that of the future development of the Common Transport Policy, the Community institutions should have at their disposal comparable, consistent, synchronised and regular statistical data on the scale and development of the carriage of passengers, freight and mail by air within the Community or to and from the Community.
- There are currently no such comprehensive Community-(2)wide statistics.
- (3) Council Decision 1999/126/EC of 22 December 1998 on the Community statistical programme 1998 to 2002 (4) has identified the need to establish such statistics.
- The common data collection on a comparable or harmo-(4)nised basis makes possible the provision of an integrated system with reliable, consistent and prompt information.
- (5) The data for the carriage of passengers, freight and mail by air should, where possible, be compatible with international data provided by the International Civil Avia-

tion Organisation (ICAO) and be made comparable, where applicable, as between Member States and for the different modes of transport.

- (6) After a certain period, the Commission should submit a report in order to allow an assessment of the application of this Regulation to be made.
- In accordance with the principle of subsidiarity laid (7)down in Article 5 of the Treaty, the creation of common statistical standards that permit the production of harmonised data is an action which can only be undertaken efficiently at Community level. Such standards should be implemented in each Member State under the authority of the bodies and institutions in charge of producing official statistics.
- Council Regulation (EC) No 322/97 of 17 February (8) 1997 on Community statistics (5) provides a reference framework for the provisions laid down by this Regulation.
- (9)The measures necessary for the implementation of this Regulation should be adopted in accordance with Council Decision 1999/468/EC of 28 June 1999 laying down the procedures for the exercise of implementing powers conferred on the Commission (6).
- (10)The Statistical Programme Committee established by Council Decision 89/382/EEC, Euratom (7) has been consulted.
- Arrangements for greater cooperation over the use of (11)Gibraltar airport were agreed in London on 2 December 1987 by the Kingdom of Spain and the United Kingdom of Great Britain and Northern Ireland in a joint declaration by the Ministers of Foreign Affairs of the two countries, and such arrangements have yet to come into operation,

<sup>(&</sup>lt;sup>1</sup>) OJ C 325, 6.12.1995, p. 11. (<sup>2</sup>) OJ C 39, 12.2.1996, p. 25.

OJ C 39, 12.21996, p. 25. Opinion of the European Parliament of 29 February 1996 (OJ C 78, 18.3.1996, p. 28), confirmed on 16 September 1999 (OJ C 54, 25.2.2000, p. 79), Council Common Position of 30 September 2002 (OJ C 275 E, 12.11.2002, p. 33) and Decision of the European Parliament of 18 December 2002 (not yet published in the Official Lourer). the Official Journal).

<sup>(&</sup>lt;sup>4</sup>) OJ L 42, 16.2.1999, p. 1.

<sup>(&</sup>lt;sup>5</sup>) OJ L 52, 22.2.1997, p. 1.

<sup>🍈</sup> OJ L 184, 17.7.1999, p. 23.

<sup>&</sup>lt;sup>(7)</sup> OJ L 181, 28.6.1989, p. 47.

HAVE ADOPTED THIS REGULATION:

### Article 1

## Objective

Member States shall establish statistical returns on the carriage of passengers, freight and mail by commercial air services as well as on civil aircraft movements to or from Community airports, except for flights by State aircraft.

### Article 2

#### Gibraltar

1. The application of this Regulation to the airport of Gibraltar is understood to be without prejudice to the respective legal positions of the Kingdom of Spain and the United Kingdom of Great Britain and Northern Ireland with regard to the dispute over sovereignty over the territory in which the airport is situated.

2. The application of this Regulation to Gibraltar airport shall be suspended until the arrangements in the Joint Declaration made by the Foreign Ministers of the Kingdom of Spain and the United Kingdom of Great Britain and Northern Ireland on 2 December 1987 come into operation. The Governments of Spain and the United Kingdom of Great Britain and Northern Ireland shall inform the Council of such date of entry into operation.

#### Article 3

### Data collection characteristics

1. Each Member State shall collect statistical data relating to the following variables:

- (a) passengers
- (b) freight and mail
- (c) flight stages
- (d) passenger seats available
- (e) aircraft movements.

The statistical variables in each area, the nomenclatures for their classification, their periodicity of observation and the definitions are set out in Annexes I and II.

2. Each Member State shall collect all data set out in Annex I for all Community airports in its territory with traffic in excess of 150 000 passenger units annually.

A list of Community airports covered by the first subparagraph shall be drawn up by the Commission and, if necessary, updated in accordance with the procedure laid down in Article 11(2).

3. For airports, apart from those having only occasional commercial traffic, which are not covered by paragraph 2, Member States shall transmit only an annual return of the data specified in Table C1 of Annex I.

- 4. Notwithstanding paragraphs 2 and 3, for airports:
- (a) with fewer than 1 500 000 passenger units a year for which no collection of data corresponding to those specified in Annex I exists on the date of entry into force of this Regulation,
- (b) and for which the introduction of a new data collection system proves very difficult,

a Member State may for a limited time not exceeding three years from 1 January 2003, in accordance with the procedure laid down in Article 11(2), transmit data less complete than those referred to in Annex I.

- 5. Notwithstanding paragraph 2, for airports:
- (a) for which no collection of data corresponding to those specified in Table B1 of Annex I exists on the date of entry into force of this Regulation,
- (b) and for which the introduction of a new data collection system proves very difficult,

a Member State may, until 31 December 2003, in accordance with the procedure laid down in Article 11(2), transmit only existing data.

#### Article 4

## Collection of data

1. The collection of data shall be based where possible on available sources, minimising the burden on respondents.

2. Respondents called upon by Member States to supply information shall be obliged to give true and complete information within the prescribed time limits.

#### Article 5

## Accuracy of statistics

The collection of data shall be based on complete returns, unless other standards of accuracy are established in accordance with the procedure laid down in Article 11(2).

#### Article 6

## Data processing

Member States shall use methods for data processing which ensure that the data collected under Article 3 comply with the standards of accuracy set out in Article 5.

#### Article 7

## Transmission of results

1. Member States shall transmit to the Statistical Office of the European Communities the results of the data processing referred to in Article 6, including data declared confidential by the Member States pursuant to domestic legislation or practice concerning statistical confidentiality, in accordance with Regulation (EC) No 322/97.

2. The results shall be transmitted according to the data files shown in Annex I. The files and the medium to be used for transmission shall be specified by the Commission in accordance with the procedure laid down in Article 11(2).

3. The first period of observation shall begin on 1 January 2003. Transmission shall take place as soon as possible and no later than six months after the end of the period of observation.

### Article 8

#### Dissemination

1. The arrangements whereby the Commission publishes or disseminates the statistical results shall be drawn up in accordance with the procedure laid down in Article 11(2).

2. The Commission shall disseminate to the Member States appropriate statistical results with a frequency similar to that laid down for the transmission of results.

## Article 9

#### Reports

1. At the request of the Commission, Member States shall communicate all information concerning the methods used in the collection of data. Member States shall also, where appropriate, communicate to the Commission any substantive changes to the collection methods used. 2. After data have been collected over a period of three years, the Commission shall submit a report to the European Parliament and the Council on experience acquired in the application of this Regulation, in particular of Articles 7 and 8.

#### Article 10

### **Implementing arrangements**

The arrangements for implementing this Regulation, including measures for adaptation to economic and technical developments, in particular:

- adaptation of the specifications in the Annexes to this Regulation,
- adaptation of the data collection characteristics (Article 3),
- the list of Community airports covered by Article 3(2),
- accuracy of statistics (Article 5),
- description of the data files, codes and the medium to be used for transmission of results to the Commission (Article 7),
- dissemination of statistical results (Article 8),

shall be laid down by the Commission in accordance with the procedure specified in Article 11(2).

### Article 11

## **Committee procedure**

1. The Commission shall be assisted by the Statistical Programme Committee established by Article 1 of Decision 89/ 382/EEC, Euratom.

2. Where reference is made to this paragraph, Articles 5 and 7 of Decision 1999/468/EC shall apply, having regard to the provisions of Article 8 thereof.

The period laid down in Article 5(6) of Decision 1999/468/EC shall be set at three months.

3. The Committee shall adopt its Rules of Procedure.

## Article 12

### Entry into force

This Regulation shall enter into force on the 20th day following that of its publication in the Official Journal of the European Union.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels, 27 February 2003.

For the European Parliament The President P. COX For the Council The President M. CHRISOCHOÏDIS

## ANNEX I

## RECORD STRUCTURE FOR DATA TRANSMISSION TO EUROSTAT

# A. FLIGHT STAGE DATABASE (AT LEAST QUARTERLY DATA)

The 'flight stage' data refer to commercial air services only.

Data file record format

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	A1	
Reporting country	2-alpha	(1) ICAO nationality letters	
Reference year	2-digit	уу	
Reference period	2-digit	(2) Statra 291 rev., April 1991	
Reporting airport	4-alpha	(3) ICAO	
Next/previous airport	4-alpha	(3) ICAO	
Arrival/departure	1-digit	1 = arrival 2 = departure	
Scheduled/non-scheduled services	1-digit	1 = scheduled 2 = non-scheduled	
Passenger services/all-freight and mail services	1-digit	1 = passenger services 2 = all- freight and mail services	
Airline information		(4) To be defined	
Aircraft type	4-alpha	(5) ICAO + taxiflight code	
Passengers on board	12-digit		Passenger
Freight and mail on board	12-digit		Tonne
Flights	12-digit		Flight
Passenger seats available	12-digit		Passenger seat

# B. ON FLIGHT ORIGIN/DESTINATION DATABASE (AT LEAST QUARTERLY DATA)

The 'on flight origin and destination' data refer to commercial air services only.

Data file record format

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	B1	
Reporting country	2-alpha	(1) ICAO nationality letters	
Reference year	2-digit	уу	
Reference period	2-digit	(2) Statra 291 rev., April 1991	
Reporting airport	4-alpha	(3) ICAO	
On flight origin/destination airport	4-alpha	(3) ICAO	
Arrival/departure	1-digit	1 = arrival 2 = departure	

Elements	Coding detail	Nomenclature	Unit
Scheduled/non-scheduled services	1-digit	1 = scheduled 2 = non-scheduled	
Passenger services/all-freight and mail services	1-digit	1 = passenger services 2 = all- freight and mail services	
Airline information		(4) To be defined	
Passengers carried	12-digit		Passenger
Freight and mail loaded/unloaded	12-digit		Tonne

## C. AIRPORTS DATABASE (AT LEAST ANNUAL DATA)

The 'airports data' refer to commercial air services only, with the exception of 'total aircraft movements' which refers to all aircraft movements.

## Data file record format

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	C1	
Reporting country	2-alpha	(1) ICAO nationality letters	
Reference year	2-digit	уу	
Reference period	2-digit	(2) Statra 291 rev., April 1991	
Reporting airport	4-alpha	(3) ICAO	
Total passengers carried	12-digit		Passenger
Total direct transit passengers	12-digit		Passenger
Total freight and mail loaded/unloaded	12-digit		Tonne
Total aircraft movements on commercial air services	12-digit		Movement
Total aircraft movements	12-digit		Movement

# CODES

## 1. Reporting country

The coding system to be used is derived from the ICAO index to nationality letters for location indicators.

Belgium	EB
Denmark	EK
France	LF
Germany	ED
Greece	LG
Ireland	EI
Italy	LI
Luxembourg	EL

Netherlands	EH
Portugal	LP
Spain	LE
United Kingdom	EG
Austria	LO
Finland	EF
Sweden	ES

## 2. Reference period

- 45 year
- 21 January to March (first quarter)
- 22 April to June (second quarter)
- 23 July to September (third quarter)
- 24 October to December (fourth quarter)
- 1 to 12 January to December (month)

## 3. Airports

Airports shall be coded according to the ICAO four-letter codes as listed in ICAO document 7910.

## 4. Airline information

Information related to the airline. The coding of this variable shall be decided in accordance with the procedure laid down in Article 11(2).

## 5. Aircraft type

Aircraft types shall be coded according to ICAO aircraft type designators as listed in ICAO document 8643.

### ANNEX II

#### DEFINITIONS

### **Community airport**

Any area in a Member State which is subject to the provisions of the Treaty and open for commercial air transport operations.

#### **Commercial air services**

An air transport flight or series of flights performed by civil aircraft for remuneration to or from Community airports. Services may be either scheduled or non-scheduled.

#### Scheduled services

Services possessing all the following characteristics:

- 1. they are performed by aircraft for the transport of passengers, freight and/or mail for remuneration, in such a manner that on each flight seats are available for individual purchase by members of the public (either directly from the airline or from its authorised agents);
- 2. they are operated so as to serve traffic between the same two or more airports, either:
  - (a) according to a published timetable; or
  - (b) with flights so regular or frequent that they constitute a recognisably systematic series.

#### Non-scheduled services

Services for remuneration other than those reported under scheduled services. Includes taxiflights.

#### **Passenger services**

All flights carrying one or more revenue passengers, and any flights listed in timetables as providing passenger services.

#### All-freight and mail services

Services relating to scheduled or non-scheduled services performed by aircraft carrying loads other than passengers, i.e. freight and mail.

#### Flights by State aircraft

Any flight in the context of military, customs, police, protocol or firefighting services.

#### Passenger units

For the purpose of drawing up the list of Community airports as referred to in Article 3(2) and for the transitional period referred to in Article 3(4), one passenger unit is equivalent to either one passenger or 90 kilograms of freight and mail.

#### Airline

An air transport undertaking with a valid operating licence. Where airlines have joint-venture or other contractual arrangements requiring two or more of them to assume separate responsibility for the offer and sale of air transport products for a flight or combination of flights, the airline actually operating the flight shall be reported.

#### Flight stage

A flight stage is the operation of an aircraft from take-off to its next landing. A technical stop should not result in any flight stage being classified differently. The classification of traffic, irrespective of its nature (passengers, freight and mail), shall be identical to the classification of the flight stage flown by the aircraft.

#### Flights

The number of flights performed between each pair of airports on a flight stage.

#### Passengers on board

All passengers whose journey begins or terminates at the reporting airport, including connecting passengers and direct transit passengers.

#### Direct transit passengers

Passengers who continue their journey on a flight having the same flight number as the flight on which they arrived.

#### Freight and mail on board

Any property carried on an aircraft other than stores and baggage; includes express services and diplomatic bags but not passenger baggage.

#### Passenger seats available

The total number of passenger seats available for sale between each pair of airports on a flight stage (excluding seats not actually available for the carriage of passengers because of maximum gross weight limitation). Where information is not available on exact aircraft seating configuration, estimated data may be provided.

#### On flight origin/destination

Traffic on a given flight with the same flight number subdivided by airport pairs in accordance with point of embarkation and point of disembarkation on that flight. (For passengers or freight where the airport of embarkation is not known, the aircraft origin should be deemed to be the point of embarkation; similarly, if the airport of disembarkation is not known, the aircraft destination should be deemed to be the point of disembarkation).

### Passengers carried

Includes all passengers whose journey begins or terminates at the reporting airport. Excludes direct transit passengers.

### Freight and mail loaded/unloaded

Any property loaded or unloaded on to or off an aircraft other than stores and baggage. Includes express services and diplomatic bags but not passenger baggage.

#### Total aircraft movements

All take-offs and landings by non-military aircraft. Includes aerial work flights, i.e. specialised commercial aviation operations which are performed by aircraft chiefly engaged in agriculture, construction, photography and surveying, as well as pilot training, business/executive flying and all other non-commercial flights.

#### Total aircraft movements on commercial air services

All take-offs and landings performed by civil aircraft for remuneration.

# ANNEX II: Commission Regulation 1358/2003
## COMMISSION REGULATION (EC) No 1358/2003

## of 31 July 2003

implementing Regulation (EC) No 437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passengers, freight and mail by air and amending Annexes I and II thereto

(Text with EEA relevance)

THE COMMISSION OF THE EUROPEAN COMMUNITIES,

Having regard to the Treaty establishing the European Community,

Having regard to Regulation (EC) No 437/2003 of the European Parliament and of the Council of 27 February 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air (<sup>1</sup>), and in particular Article 10 thereof,

Whereas:

- (1) In accordance with Article 10 of Regulation (EC) No 437/2003, the Commission should lay down the arrangements for implementing that Regulation.
- (2) It is necessary to establish the list of Community airports, apart from those having only occasional commercial traffic, and the derogations to be provided.
- (3) It is necessary to specify the format in which the data are to be transmitted, in sufficient detail to ensure that such data can be processed rapidly and in a cost-effective way.
- (4) The arrangements concerning the dissemination of the statistical results should be drawn up.
- (5) In accordance with the first indent of Article 10 of Regulation (EC) No 437/2003, the Commission should also adapt the specifications in the Annexes thereto.
- (6) The record structure for data transmission, the codes and the definitions set out in Annexes I and II to Regulation (EC) No 437/2003 need to be adapted.
- (7) Regulation (EC) No 437/2003 should therefore be amended accordingly.

(8) The measures provided for in this Regulation are in accordance with the opinion of the Statistical Programme Committee set up by Decision 89/382/EEC/ Euratom (<sup>2</sup>),

HAS ADOPTED THIS REGULATION:

#### Article 1

For the purposes of Article 3(2), (4) and (5) of Regulation (EC) No 437/2003, the list of Community airports, apart from those having only occasional commercial traffic, and the derogations, shall be as specified in Annex I to this Regulation.

#### Article 2

For the purposes of Article 7 of Regulation (EC) No 437/2003, the results shall be transmitted according to the description of the data files and transmission medium defined in Annex II to this Regulation.

## Article 3

For the purposes of Article 8(1) of Regulation (EC) No 437/2003, the Commission shall disseminate all data not declared as confidential by the Member States, on any medium and with any data structure.

#### Article 4

Annexes I and II to Regulation (EC) No 437/2003 are replaced by the text set out in Annex III to this Regulation.

### Article 5

This Regulation shall enter into force on the 20th day following its publication in the Official Journal of the European Union.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels, 31 July 2003.

For the Commission Pedro SOLBES MIRA Member of the Commission

#### ANNEX I

#### AIRPORT CATEGORIES, LISTS OF COMMUNITY AIRPORTS AND DEROGATIONS

#### I. Airport categories and reference periods taken into account

Four categories of Community airports can be defined:

- category 0: Airports with less than 15 000 passenger units per year are considered as having only 'occasional commercial traffic', so have, according to Article 3(3), no obligation to report,
- category 1: Airports with between 15 000 and 150 000 passenger units per year shall transmit only table C1,
- category 2: Airports with more than 150 000 passenger units and less than 1 500 000 passenger units per year shall transmit all tables listed in Annex I, but may, according to the terms of Article 3(4), benefit from complete or partial derogations until year 2003, 2004 or 2005,
- category 3: Airports with at least 1 500 000 passenger units per year shall transmit all tables listed in Annex I, but may, according to the terms of Article 3(5), benefit from a complete or partial derogation on table B1, in year 2003 only.

For the purpose of defining the airport category in year N, the reference year taken into account for the calculation of the passenger units is:

- for category 0, 1 and 2 airports: year N-2,
- for category 3 airports: year N (except for the reporting of year 2003 tables where 2001 passenger units are taken into account and for the reporting of year 2004 tables where 2003 passenger units are taken into account).

Airports for which passenger units decreased between year N-2 and year N-1 may use year N-1 as the reference year for their classification.

## II. Permitted derogations

Summary table by reporting year and according to the Community airport size category.

Community Airports categories by size	Year 2003	Year 2004	Year 2005	
(0) Less than 15 000 passenger units	No obligation to report	No obligation to report	No obligation to report	
(1) Between 15 000 and 150 000 passenger units	C1 (possible derogation)	C1 (possible derogation)	C1 (possible derogation)	
(2) More than 150 000 and less than 1 500 000 passenger units	A1 (possible derogation) B1 (possible derogation) C1 (possible derogation)	A1 (possible derogation) B1 (possible derogation) C1 (possible derogation)	A1 (possible derogation) B1 (possible derogation) C1 (possible derogation)	
(3) At least 1 500 000 passenger units	A1 (no derogations) B1 (possible derogation) C1 (no derogations)	A1(no derogations) B1 (no derogations) C1 (no derogations)	A1(no derogations) B1 (no derogations) C1 (no derogations)	

Derogations can be either partial or total.

Partial derogations can only be granted for the following fields: 'airline information' and 'passenger seats available'.

In case a partial derogation is granted for these fields, an 'unknown code' shall be reported instead of the expected code (for the 'Passenger seats available' field, the unknown code to be used is '999999999999').

If a derogation was granted for an airport in year N but the airport changes category in year N, then the derogation is no longer valid for that year.

## III. List of Community airports covered and derogations

Community airports having only occasional commercial traffic (category 0) have no obligation to report. They are therefore excluded from the following lists.

Category 1 airports are mentioned in italic font in the following lists.

Category 2 airports are mentioned in normal font in the following lists.

Category 3 airports are mentioned in bold font in the following lists.

Category 3 airports for which a derogation for table B1 is granted in 2003 are marked with an X in column (4) in case of a total derogation and a P in column (4) in case of a partial derogation.

Category 2 airports for which a derogation for table A1 and/or B1 is granted until year N (year 2003, 2004 or 2005) are marked with 'year N' in column (5.1) and/or (5.2). In case only a partial derogation is granted, a 'P' follows the year.

Category '1' or '2' airports for which a derogation for table C1 is granted until year N (year 2003, 2004 or 2005) are marked with 'year N' in column (5.3). In case only a partial derogation is granted, a 'P' follows the year.

Details related to partial derogations (if any) follow the tables.

#### Belgium: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested '' or '2003' or '2004' or '2005'		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EBAW	Antwerpen/Deurne	2		2005	2005	2005
EBBR	Bruxelles/National	3				
EBCI	Charleroi/Brussels South	2		2005	2005	2005
EBLG	Liège/Bierset	2		2005	2005	2005
EBOS	Oostende	1				2005

#### Denmark: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
			for table B1 in 2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EKAH	Århus	2		2003	2004	
EKBI	Billund	3	X			
EKCH	Copenhagen Kastrup	3	X			
EKEB	Esbjerg	2		2003P	2003	
EKKA	Karup	2		2003P	2004	
EKRK	Copenhagen Roskilde	1				2004
EKRN	Bornholm	2		2003P		
EKSB	Sønderborg	1				
EKYT	Aalborg	2		2003	2004	
D 1 1 1			( 11 ( ) 0 11			

Partial derogations are applicable to the 'passenger seats available' (table A1) field.

# Germany: List of Community airports and derogations

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table P1 in	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
coue			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EDDB	Berlin-Schönefeld	3				
EDDC	Dresden	3				
EDDE	Erfurt	2				
EDDF	Frankfurt/Main	3				
EDDG	Münster/Osnabrück	3				
EDDH	Hamburg	3				
EDDI	Berlin-Tempelhof	2				
EDDK	Köln/Bonn	3				
EDDL	Düsseldorf	3				
EDDM	München	3				
EDDN	Nürnberg	3				
EDDP	Leipzig/Halle	3				
EDDR	Saarbrücken	2				
EDDS	Stuttgart	3				
EDDT	Berlin-Tegel	3				
EDDV	Hannover	3				
EDDW	Bremen	3				
EDFH	Hahn	2		2003	2003	
EDFM	Mannheim	1				
EDHK	Kiel	1				
EDHL	Lübeck	2		2004	2004	
EDLN	Mönchengladbach	1				
EDLP	Paderborn/Lippstadt	2		2003	2003	
EDLW	Dortmund	2		2003	2003	
EDMA	Augsburg	2		2004	2004	
EDNY	Friedrichshafen	2		2004	2004	
EDOG	Gransee	1				
EDOR	Rostock-Laage	1				
EDQM	Hof/Plauen	1				
EDTK	Karlsruhe	2		2004	2004	

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EDVE	Braunschweig	1				
EDVK	Kassel	1				
EDWG	Wangerooge	1				
EDWJ	Juist	1				
EDWS	Norddeich	1				
EDXP	Harle	1				
EDXW	Sylt/Westerland	1				
ETNU	Neubrandenburg	1				

# Greece: List of Community airports and derogations

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LGAL	Alexandroupolis	2				
LGAT	Athens	3				
LGBL	N. Anchialos	1				
LGHI	Chios	2				
LGIK	Ikaria	1				
LGIO	Ioannina	1				
LGIR	Irakleion	3				
LGKF	Kefallinia	2				
LGKL	Kalamata	1				
LGKO	Kos	3				
LGKP	Karpathos	1				
LGKR	Kerkyra	3				
LGKV	Kavala	2				
LGLM	Limnos	1				
LGMK	Mykonos	2				
LGMT	Mytilini	2				
LGNX	Naxos	1				

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LGPZ	Aktio	2				
LGRP	Rodos	3				
LGRX	Araxos	1				
LGSA	Chania	2				
LGSO	Syros	1				
LGSK	Skiathos	2				
LGSM	Samos	2				
LGSR	Santorini	2				
LGTS	Thessaloniki	3				
LGZA	Zakynthos	2				

# Spain: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
GCFV	Puerto del Rosario/Fuer- teventura	3				
GCGM	Gomera España	1				
GCHI	Hierro	1				
GCLA	Santa Cruz de La Palma	2				
GCLP	Las Palmas/Gran Canaria	3				
GCRR	Arrecife/Lanzarote	3				
GCTS	Tenerife Sur — Reina Sofía	3				
GCXO	Tenerife Norte	3				
GEML	Melilla	2				
LEAL	Alicante	3				
LEAM	Almería	2				
LEAS	Avilés/Asturias	2				
LEBB	Bilbao	3				
LEBL	Barcelona	3				

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LEBZ	Badajoz/Talavera la Real	1				
LECO	A Coruña	2				
LEGE	Girona/Costa Brava	2				
LEGR	Granada	2				
LEIB	Eivissa (Ibiza)	3				
LEJR	Jerez	2				
LELC	Murcia-San Javier	2				
LELN	León	1				
LEMD	Madrid/Barajas	3				
LEMG	Málaga	3				
LEMH	Menorca/Maó (Mahón)	3				
LEPA	Palma de Mallorca	3				
LEPP	Pamplona	2				
LERS	Reus	2				
LESA	Salamanca	1				
LESO	San Sebastián	2				
LEST	Santiago	2				
LEVC	Valencia	3				
LEVD	Valladolid	2				
LEVT	Vitoria	2				
LEVX	Vigo	2				
LEXJ	Santander	2				
LEZG	Zaragoza	2				
LEZL	Sevilla	3				

# France: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
FMEE	St Denis Roland Garros	3				
LFBA	Agen La Garenne	1				

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code		8,	for table B1 in 2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LFBD	Bordeaux Merignac	3				
LFBE	Bergerac Roumanière	1				
LFBH	La Rochelle Île de Ré	1				
LFBI	Poitiers Biard	1				
LFBL	Limoges	1				
LFBO	Toulouse Blagnac	3				
LFBP	Pau Pyrénées	2		2005P		
LFBT	Tarbes Lourdes Pyrénées	2		2005P		
LFBV	Brive Laroche	1				
LFBX	Périgueux	1				
LFBZ	Biarritz-Bayonne — Anglet	2		2005P		
LFCK	Castres Mazamet	1				
LFCR	Rodez Marcillac	1				
LFJL	Metz Nancy Lorraine	2		2005P		
LFKB	Bastia Poretta	2		2005P		
LFKC	Calvi Sainte Catherine	2		2005P		
LFKF	Figari Sud Corse	2		2005P		
LFKJ	Ajaccio Campo dell'oro	2		2005P		
LFLB	Chambéry — Aix Les Bains	1				
LFLC	Clermont Ferrand Auvergne	2		2005P		
LFLL	Lyon St Exupéry	3				
LFLP	Annecy Meythet	1				
LFLS	Grenoble St Geoirs	2		2005P		
LFLW	Aurillac Tronquières	1				
LFMH	St Étienne Bouthéon	1				
LFMK	Carcassonne	2		2005P		
LFML	Marseille Provence	3				
LFMN	Nice Côte d'Azur	3				
LFMP	Perpignan Rivesaltes	2		2005P		

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LFMT	Montpellier Médi- terranée	3				
LFMU	Béziers Vias	1				
LFMV	Avignon Caumont	1				
LFOB	Beauvais Tille	2		2005P		
LFOH	La Havre Octeville	1				
LFOK	Châlons Vatry	1				
LFOP	Rouen Vallée de Seine	1				
LFPG	Paris Charles De Gaulle	3				
LFPO	Paris Orly	3				
lfqq	Lille Lesquin	2		2005P		
LFRB	Brest Guipavas	2		2005P		
LFRD	Dinard Pleurtuit	1				
LFRH	Lorient	2		2005P		
LFRK	Caen Carpiquet	1				
LFRN	Rennes St Jacques	2		2005P		
LFRO	Lannion Servel	1				
LFRQ	Quimper Pluguffan	1				
LFRS	Nantes Atlantique	3				
LFSB	Bâle Mulhouse	3				
LFSD	Dijon Bourgogne	1				
LFST	Strasbourg	3				
LFTH	Toulon — Hyères	2		2005P		
LFTW	Nîmes Arles Camargue	2		2005P		
SOCA	Cayenne Rochambeau	2		2005P		
TFFF	Fort de France	3				
TFFG	St Martin Grand Case	1				
TFFJ	St Barthélemy	2		2005P		
TFFR	Pointe à Pitre	3				

Partial derogations are applicable to the 'passenger seats available' (Table A1) field.

# Ireland: List of Community airports and derogations

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
coue			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EICA	Connemara Regional Airport	1				
EICK	Cork	3				
EICM	Galway	1				
EIDL	Donegal	1				
EIDW	Dublin	3				
EIIM	Inishmore	1				
EIKN	Connaught Regional Airport	2		2005	2005	2005P
EIKY	Kerry	2		2005	2005	2005P
EINN	Shannon	3				
EISG	Sligo Regional Airport	1				
EIWF	Waterford	1				
Partial derog	ations are applicable to the 'airlin	e information' field.	1	I	1	1

# Italy: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LIBC	Crotone	1				
LIBD	Bari-Palese Macchie	2				
LIBP	Pescara	2		2005	2005	
LIBR	Brindisi-Casale	2				
LICA	Lamezia Terme	2			2005	
LICC	Catania-Fontanarossa	3				
LICD	Lampedusa	1				

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LICG	Pantelleria	1				
LICJ	Palermo-Punta Raisi	3				
LICR	Reggio di Calabria	2		2005	2005	
LICT	Trapani-Birgi	1				
LIEA	Alghero-Fertilia	2		2005	2005	
LIEE	Cagliari-Elmas	3				
LIEO	Olbia — Costa Smeralda	2				
LIET	Arbatax di Tortoli	1				
LIMC	Milano-Malpensa	3				
LIME	Bergamo-Orio al Serio	3				
LIMF	Torino-Caselle	3				
LIMJ	Genova-Sestri	2		2005	2005	
LIML	Milano-Linate	3				
LIMP	Parma	1				
LIPB	Bolzano	1				
LIPE	Bologna-Borgo Panigale	3				
LIPH	Treviso-Sant'Angelo	2		2003	2003	
LIPK	Forlì	1				
LIPO	Brescia-Montichiari	2				
LIPQ	Trieste-Ronchi dei Legio- nari	2		2004	2004	
LIPR	Rimini	2				
LIPX	Verona-Villafranca	3				
LIPY	Ancona-Falconara	2		2005	2005	
LIPZ	Venezia-Tessera	3				
LIRA	Roma-Ciampino	2				
LIRF	Roma-Fiumicino	3				
LIRN	Napoli-Capodichino	3				
LIRP	Pisa-San Giusto	2		2005	2005	
LIRQ	Firenze-Peretola	2				
LIRZ	Perugia	1				

# Luxembourg: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
ELLX	Luxembourg	3	Х			

# Netherlands: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
		8 /	for table B1 in 2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EHAM	Amsterdam/Schiphol	3	Р			
ЕНВК	Maastricht-Aachen	2		2005P		2005P
EHEH	Eindhoven/Welschap	2		2005P		2005P
EHGG	Eelde/Groningen	1				
EHRD	Rotterdam/Zestienhoven	2		2005P		2005P
EHTE	Deventer/Teuge	1				2005
EHTW	Enschede/Twenthe	1				2005
Partial derog	ations are applicable to the 'passe	nger seats available' i	and 'airline informati	on' fields.		

# Austria: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LOWG	Graz	2				
LOWI	Innsbruck	2				
LOWK	Klagenfurt	2				
LOWL	Linz	2				
LOWS	Salzburg	2				
LOWW	Wien/Schwechat	3				

# Portugal: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
LPAZ	Santa Maria	1				
LPFL	Flores	1				
LPFR	Faro	3				
LPMA	Madeira/Madeira	3				
LPHR	Horta	2				
LPLA	Lajes	2				
LPPD	Ponta Delgada	2				
LPPI	Pico	1				
LPPR	Porto	3				
LPPS	Porto Santo	2				
LPPT	Lisboa	3				

# Finland: List of Community airports and derogations

(1) ICAO airport (2) Airport name code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table P1 in	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
		2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1	
EFHK	Helsinki-Vantaa	3				
EFIV	Ivalo	1				
EFJO	Joensuu	2				
EFJY	Jyväskylä	2				
EFKE	Kemi-Tornio	1				
EFKI	Kajaani	1				
EFKK	Кгиипируу	1				
EFKS	Kuusamo	1				
EFKT	Kittilä	2				
EFKU	Киоріо	2				
EFLP	Lappeenranta	1				
EFMA	Mariehamn	1				
EFOU	Oulu	2				

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
			2003	(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EFPO	Pori	1				
EFRO	Rovaniemi	2				
EFSA	Savonlinna	1				
EFSI	Seinäjoki	1				
EFTP	Tampere-Pirkkala	2				
EFTU	Turku	2				
EFVA	Vaasa	2				
EFVR	Varkaus	1				

# Sweden: List of Community airports and derogations

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
couc				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
ESDB	Ängelholm	2			2005	
ESDF	Ronneby	2			2005	
ESGG	Göteborg-Landvetter	3	Х			
ESGJ	Jönköping	2			2005	
ESGP	Göteborg/Säve	1				2005
ESGT	Trollhättan/Vänersb	1				2005
ESKN	Stockholm/Skavsta	2		2005	2005	2005
ESMK	Kristianstad/Everöd	2		2005	2005	2005
ESMO	Oskarshamn	1				2005
ESMQ	Kalmar	2			2005	
ESMS	Malmö-Sturup	3	Х			
ESMT	Halmstad	1				
ESMX	Växjö/Kronoberg	2		2005	2005	2005
ESNG	Gällivare	1				2005
ESNK	Kramfors	1				2005
ESNL	Lycksele	1				2005

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
ESNN	Sundsvall-Härnösand	2			2005	
ESNO	Örnsköldsvik	2			2005	
ESNQ	Kiruna	2			2005	
ESNS	Skellefteå	2			2005	
ESNU	Umeå	2			2005	
ESNV	Vilhelmina	1				2005
ESNX	Arvidsjaur	1				2005
ESOE	Örebro	2		2005	2005	2005
ESOK	Karlstad	2			2005	
ESOW	Stockholm/Västerås	2		2005	2005	2005
ESPA	Luleå	2			2005	
ESPC	Östersund	2			2005	
ESSA	Stockholm-Arlanda	3	X			
ESSB	Stockholm-Bromma	2			2005	
ESSD	Borlänge	1				2005
ESSL	Linköping/Saab	1				2005
ESSP	Norrköping	2			2005	
ESSV	Visby	2			2005	
ESUD	Storuman	1				2005

# United Kingdom: List of Community airports and derogations

(1) ICAO airport code	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EGAA	Belfast International	3				
EGAC	Belfast City	2				
EGAE	Londonderry	2				
EGBB	Birmingham	3				
EGBE	Coventry	1				

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code	2003		(5.1) Table A1	(5.2) Table B1	(5.3) Table C1	
EGCC	Manchester	3				
EGDG	Newquay	1				2004
EGFF	Cardiff Wales	3				
EGFH	Swansea	1				2004
EGGD	Bristol	3				
EGGP	Liverpool	3				
EGGW	Luton	3				
EGHC	Land's End	1				
EGHD	Plymouth	1				
EGHE	Isles of Scilly (St. Marys)	1				
EGHH	Bournemouth	2				
EGHI	Southampton	2				
EGHK	Penzance Heliport	1				
EGHT	Isles of Scilly (Tresco)	1				
EGKK	Gatwick	3				
EGLC	London City	3				
EGLL	Heathrow	3				
EGMH	Kent International	2				
EGNH	Blackpool	1				
EGNJ	Humberside	2				
EGNM	Leeds Bradford	3				
EGNT	Newcastle	3				
EGNV	Teesside	2				
EGNX	East Midlands	3				
EGPA	Kirkwall	1				
EGPB	Sumburgh	1				
EGPC	Wick	1				
EGPD	Aberdeen	3				
EGPE	Inverness	2				
EGPF	Glasgow	3				

(1) ICAO airport	(2) Airport name	(3) Airport cate- gory in 2003	(4) Category 3 airports only: derogation request for table B1 in 2003	(5) Categories 1 and 2 airports only: For each table: last year for which a dero- gation is requested (' ' or '2003' or '2004' or '2005')		
code				(5.1) Table A1	(5.2) Table B1	(5.3) Table C1
EGPH	Edinburgh	3				
EGPI	Islay	1				
EGPK	Prestwick	3				
EGPL	Benbecula	1				
EGPM	Scatsta	2				
EGPN	Dundee	1				
EGPO	Stornoway	1				
EGSC	Cambridge	1				
EGSH	Norwich	2				
EGSS	Stansted	3				
EGSY	Sheffield City	1				
EGTE	Exeter	2				

#### ANNEX II

## DESCRIPTION OF THE DATA FILES AND TRANSMISSION MEDIUM

Two EDI compatible formats are acceptable for the transmission of the regulation tables: 'CSV' (Comma Separated Values) with semicolon (;) as field separator and GESMES-EDIFACT.

#### List and description of the fields to be used for each table of the Regulation:

The following summary table gives for each table of the regulation (A1, B1 and C1) and each record (line), the list of fields to be provided. Two different types of fields are marked in the column associated to the relevant table:

- 'X': fields that have to be provided for a table,
- '' (space): fields not relevant for the table. These fields should normally not be provided in the related tables. Nevertheless empty fields (two fields separator without data between) are also acceptable in this case.

### Format and size of the fields:

The format of each field is either numeric (n) or alphabetic (a) or alphanumeric (an)

The size is either fixed ('format + number' — e.g.: 'n4') or variable with a maximum number of positions ('format + ".." + maximum number of positions — e.g.: "n..12").

Pos	Fields	Format	Tables		
POS	rielus	and size	A1	B1	C1
1	Table identification	an2	Х	Х	Х
2	Reporting country	a2	Х	Х	Х
3	Reference year	n2	Х	Х	Х
4	Reference period	an2	Х	Х	Х
5	Reporting airport	an4	Х	Х	Х
6	Partner airport	an4	Х	Х	
7	Arrival/departure	n1	Х	Х	
8	Scheduled/non-scheduled services	n1	Х	Х	
9	Passenger flight/All-freight and mail flight	n1	Х	Х	
10	Airline information	a3	Х	Х	Х
11	Aircraft type	an4	Х		
12	Passengers	n12	Х	Х	Χ
13	Direct transit passengers	n12			Х
14	Freight and mail	n12	Х	Х	Х
15	Commercial air flights (table 'A1')/Total commercial aircraft move- ments (table 'C1')	n12	Х		Х
16	Total aircraft movements	n12			Χ
17	Passenger seats available	n12	X		

One table (for one period) should correspond to one file (or 'consignment') transmitted to Eurostat

Each file (table) should be named according to the following standard: 'CCYYPPTT.csv' (for csv format) or: 'CCYYPPTT.ges' (for gesmes format): where 'CC' represents the Country Code (ISO alpha2), 'YY' the Year, 'PP' the period (AN, Q1..Q4 or 01..12) and 'TT', the Table-ID ('A1', 'B1' or 'C1').

In case the file is compressed, the '.zip' suffix should be used instead of '.csv' or '.ges'.

The transmission mean shall be compatible with an automatic monitoring and processing of data in Eurostat.

EDI compatible tools should be favoured. Nevertheless, 'Pre-EDI' tools as well as structured e-mail sent to an address given by Eurostat could also be accepted in a transitional period.

In case a structured e-mail is used, then:

- the subject field of the e-mail should contain the name of the file (table) to be transmitted,
- the file (table) should be attached to the e-mail (only one file attached per e-mail is acceptable),
- comments on data can be entered as plain text in the body of the message to which a table is attached (formatted text shall not be used).

## ANNEX III

## Amendments to the Annexes of Regulation (EC) No 437/2003

## 'ANNEX I

## RECORD STRUCTURE FOR DATA TRANSMISSION TO EUROSTAT

The scope of the data to be reported is limited to civil aviation.

State flights and movements by surface modes of either passengers travelling with a flight code or freight shipped using an air waybill are excluded.

## A. Flight stage table (monthly data (\*))

Data reported in this table refer to commercial air services only.

Data file record format

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	"A1"	
Reporting country	2-alpha	(1) Main ICAO nationality letters	
Reference year	2-digit	Type "yy" (2 last positions of the year)	
Reference period	2-alpha	(2) Explicit (or Statra)	
Reporting airport	4-alpha	(3) ICAO	
Next/previous airport	4-alpha	(3) ICAO	
Arrival/departure	1-digit	1 = arrival	
		2 = departure	
Scheduled/non-scheduled service	1-digit	1 = scheduled	
		2 = non-scheduled	
Passenger service/all-freight and mail service	1-digit	<ol> <li>1 = passenger service</li> <li>2 = all-freight and mail service</li> </ol>	
Airline information	3-alpha	(4) Information on the airline (optional)	
Aircraft type	4-alpha	(5) ICAO	
Passengers on board	12-digit		passenger
Freight and mail on board	12-digit		tonne
Commercial air flights	12-digit		number of flights
Passenger seats available	12-digit		passenger seat

## B. On flight origin/destination table (monthly data (\*\*))

Data reported in this table refer to commercial air services only.

Data file record format

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	B1	
Reporting country	2-alpha	(1) Main ICAO nationality letters	
Reference year	2-digit	Type "yy" (2 last positions of the year)	
Reference period	2-alpha	(2) Explicit (or Statra)	

(\*) In 2003 quarterly data can be accepted. (\*\*) In 2003 quarterly data can be accepted.

## Official Journal of the European Union

Elements	Coding detail	Nomenclature	Unit
Reporting airport	4-alpha	(3) ICAO	
On flight origin/destination airport	4-alpha	(3) ICAO	
Arrival/departure	1-digit	1 = arrival 2 = departure	
Scheduled/non-scheduled services	1-digit	1 = scheduled 2 = non-scheduled	
Passenger service/all-freight and mail service	1-digit	<ol> <li>1 = passenger service</li> <li>2 = all-freight and mail service</li> </ol>	
Airline information	3-alpha	(4) Information on the airline (optional)	
Passengers carried	12-digit		passenger
Freight and mail loaded or unloaded	12-digit		tonne

## C. Airports table (at least annual data)

Data reported in this table refer to commercial air services only, with the exception of "total commercial aircraft movements" which also refers to all commercial general aviation operations and "total aircraft movements" which refers to all civil aircraft movements (except State flights).

Elements	Coding detail	Nomenclature	Unit
Table	2-alpha	C1	
Reporting country	2-alpha	(1) Main ICAO nationality letters	
Reference year	2-digit	Туре "уу"	
Reference period	2-alpha	(2) Explicit (or Statra)	
Reporting airport	4-alpha	(3) ICAO	
Airline information (*)	3-alpha	(4) Information on the airline	
Total passengers carried	12-digit		passenger
Total direct transit passengers	12-digit		passenger
Total freight and mail loaded/ unloaded	12-digit		tonne
Total commercial aircraft move- ments	12-digit		movement
Total aircraft movements	12-digit		movement

## Data file record format

(\*) The "airline information" field is obligatory only for airports which also have to report tables A1 and B1. For the airports which are under no obligation to report tables A1 and B1, a code that covers all airlines may be used.

## CODES

## 1. Reporting country

The coding system to be used is derived from the ICAO index to nationality letters for location indicators. If several ICAO prefixes exist for the same country, only the main ICAO prefix of the mainland is applicable.

Belgium	EB
Denmark	EK
Germany	ED
Greece	LG
Spain	LE
France	LF
Ireland	EI

Italy	LI
Luxembourg	EL
Netherlands	EH
Austria	LO
Portugal	LP
Finland	EF
Sweden	ES
United Kingdom	EG

## 2. Reference period

AN	(or 45) year
Q1	(or 21) January-March (first quarter)
Q2	(or 22) April-June (second quarter)
Q3	(or 23) July-September (third quarter)
Q4	(or 24) October-December (fourth quarter)
01 to 12	January to December (month)

## 3. Airports

Airports shall be coded according to the ICAO four-letter codes as listed in ICAO document 7910. Unknown airports should be coded as "ZZZZ".

## 4. Airline information

"1EU" for airlines licensed in the European Union,

"1NE" for airlines not licensed in the European Union,

"ZZZ" for unknown airlines,

"888" for "confidential" (to be used in tables A1 and B1 if an "information on the airline" is not allowed for confidentiality reasons),

"999" for all airlines (to be used in table C1 only).

Airlines partly licensed in EU shall be reported as "EU airlines".

On a voluntary basis, the code "2"+Iso alpha 2 country code (country of licensing of the airline) could also be used as well as the ICAO airline code.

## 5. Aircraft type

Aircraft types shall be coded according to ICAO aircraft type designators as listed in ICAO document 8643. Unknown aircraft types should be coded as "ZZZZ".

#### ANNEX II

#### DEFINITIONS AND STATISTICS TO BE REPORTED

Following the header of each definition, the list of articles or tables of the regulation where a reference to the term is made can be found.

#### I. DEFINITIONS AND VARIABLES OF GENERAL INTEREST

#### 1. Community airport (Articles 1 and 3)

A defined area on land or water in a Member State subject to the provisions of the treaty, which is intended to be used either wholly or in part for the arrival, departure and surface movement of aircraft and open for *commercial air services*<sup>(sec -4-)</sup>.

#### 2. State flight (Article 1 and table C1)

Any flight performed by aircraft for military, customs, police or other law enforcement services of a State.

Any flight declared as a "State flight" by State authorities.

The expression "except for flights by States aircraft" in Article 1 should be interpreted as "except for State flights".

#### 3. Passenger unit (Article 3(2), (4) and (5))

One passenger unit is equivalent to either one passenger or 100 kilograms of freight and mail.

For the purpose of drawing up the list of **Community airports**<sup>(sec-1-)</sup> as referred to in Article 3(2) and for the transitional period referred to in Article 3(4) and (5), the calculation of thresholds using "passenger units" has to take into account at **Community airports**<sup>(sec-1-)</sup>, the total **passengers carried**<sup>(sec-16-)</sup> plus the total **direct transit passengers**<sup>(sec-18-)</sup> (counted once)</sup> plus the total **freight and mail loaded and unloaded**<sup>(sec-17-)</sup>.

#### 4. Commercial air service (Article 1 and tables A1, B1, C1)

An air transport flight or series of flights for the public transport of passengers and/or freight and mail, for remuneration or for hire.

The air service may be either scheduled<sup>(-5-)</sup> or non-scheduled<sup>(-6-)</sup>.

#### 5. Scheduled air service (Tables A1 and B1)

A **commercial air service**<sup>(see.4)</sup> operated according to a published timetable, or with such a regular frequency that it constitutes an easily recognisable systematic series of flights.

Includes extra section flights occasioned by overflow traffic from scheduled flights.

#### 6. Non-scheduled air service (Tables A1 and B1)

A **commercial air service**<sup>(see-4-)</sup> other than scheduled air service<sup>(see-5-)</sup>.

#### 7. Passenger air service (Tables A1 and B1)

**Scheduled**<sup>(sec-5-)</sup> or non-scheduled air service<sup>(sec-6-)</sup> performed by aircraft carrying one or more revenue passengers and any flights listed in published timetables as open to passengers.

Includes flights carrying both revenue passengers and revenue freight and mail.

#### 8. All-freight and mail air service (Tables A1 and B1)

Scheduled<sup>(see-5-)</sup> or non-scheduled air service<sup>(see-6-)</sup> performed by aircraft carrying revenue loads other than revenue passengers, i.e. freight and mail.

Excludes flights carrying one or more revenue passengers and flights listed in published timetables as open to passengers.

#### 9. Airline (Commercial air transport operator) (Tables A1, B1 and C1)

An air transport undertaking with a valid operating licence for operating commercial air flights<sup>(sec-13-)</sup>.

Where airlines have joint-venture or other contractual arrangements requiring two or more of them to assume separate responsibility for the offer and sale of air transport products for a flight or combination of flights, the airline actually operating the flight shall be reported.

#### II. DEFINITIONS AND VARIABLES OF INTEREST FOR TABLE A1 (FLIGHT STAGE)

#### 10. Flight stage (Table A1)

The operation of an aircraft from take-off to its next landing.

#### 11. Passengers on board (Table A1)

All passengers on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport.

All revenue and non revenue passengers on board an aircraft during a flight stage<sup>(see-10-)</sup>.

Includes direct transit passengers<sup>(see-18-)</sup> (counted at arrivals and departures).

#### 12. Freight and mail on board (Table A1)

All freight and mail on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport.

All freight and mail on board an aircraft during a *flight stage*<sup>(see-10-)</sup>.

Includes direct transit freight and mail (counted at arrivals and departures).

Includes express services and diplomatic bags.

Excludes passenger baggage.

#### 13. Commercial air flight (Table A1)

An air transport flight performed for the public transport of passengers and/or freight and mail, for remuneration and for hire.

In table A1, the commercial air flights are aggregated to calculate the other "indicator fields" ("**Passengers on board**<sup>(see-11-)</sup>", "**Freight and mail on board**<sup>(see-12-)</sup>" and "**Passenger seats available**<sup>(see-14-)</sup>").

#### 14. Passenger seats available (Table A1)

The total number of passenger seats available for sale on an aircraft operating a *flight stage*<sup>(see-10.)</sup> between a pair of airports.

On a **flight** stage<sup>(-10-)</sup>, the total number of revenue passengers should not exceed the total number of passenger seats available for sale.

Includes seats which are already sold on a flight stage i.e. including those occupied by direct transit passengers<sup>(sec-18-)</sup>.

Excludes seats not actually available for the carriage of passengers because of maximum gross weight limitations.

If information on this basis is not available, then one of the following estimates should be provided in order of preference (from more to less adequate):

- 1. the specific aircraft configuration expressed in number of passenger seats available in the aircraft (identified by aircraft registration number),
- 2. the average aircraft configuration expressed in average number of passenger seats available for the type of aircraft for the airline,
- 3. the average aircraft configuration expressed in average number of passenger seats available for the type of aircraft.
- III. DEFINITIONS AND VARIABLES OF INTEREST FOR TABLE B1 (ON FLIGHT ORIGIN AND DESTINATION) AND TABLE C1 (AIRPORTS)

#### 15. On flight origin and destination (Table B1)

Traffic on a commercial air service<sup>(see-4)</sup> identified by a unique flight number subdivided by airport pairs in accordance with point of embarkation and point of disembarkation on that flight.

For passengers, freight or mail where the airport of embarkation is not known, the aircraft origin should be deemed to be the point of embarkation; similarly, if the airport of disembarkation is not known, the aircraft destination should be deemed to be the point of disembarkation.

#### 16. Passengers carried (Tables B1 and C1)

All passengers on a particular flight (with one flight number) counted once only and not repeatedly on each individual stage of that flight.

All revenue and non revenue passengers whose journey begins or terminates at the reporting airport and transfer passengers joining or leaving the flight at the reporting airport.

Excludes direct transit passengers(see-18-).

#### 17. Freight and mail loaded or unloaded (Tables B1 and C1)

All freight and mail loaded onto or unloaded from an aircraft.

Includes express services and diplomatic bags.

Excludes passenger baggage.

Excludes direct transit freight and mail.

#### 18. Direct transit passengers (Table C1)

Passengers who, after a short stop, continue their journey on the same aircraft on a flight having the same flight number as the flight on which they arrive.

In total airport statistics as well as for the calculation of the passenger units<sup>(see-3-)</sup>, passengers in direct transit are counted once only.

Passengers who change aircraft because of technical problems but continue on a flight with the same flight number are counted as direct transit passengers.

On some flights with intermediate stops, the flight number changes at an airport to designate the change between an inbound and outbound flight. An example is a flight from Barcelona to Hamburg where the flight continues to Frankfurt before returning to Barcelona. Where passengers for an intermediate destination continue their journey on the same aircraft in such circumstances, they should be counted as direct transit passengers.

#### 19. Total commercial aircraft movements (Table C1)

All take-offs and landings for flights performed for remuneration and for hire.

Includes **commercial air services**<sup>(-4-)</sup> as well as all commercial general aviation operations.

#### 20. Total aircraft movements (Table C1)

All take-offs and landings of aircraft.

Includes total commercial aircraft movements<sup>(-19-)</sup> as well as non-commercial general aviation operations.

Excludes State flights<sup>(-2-)</sup>.

Excludes Touch and goes, overshoots and unsuccessful approaches.'

# ANNEX III: Commission Regulation (EC) No 546/2005

## COMMISSION REGULATION (EC) No 546/2005

#### of 8 April 2005

# adapting Regulation (EC) No 437/2003 of the European Parliament and of the Council as regards the allocation of reporting-country codes and amending Commission Regulation (EC) No 1358/2003 as regards the updating of the list of Community airports

#### (Text with EEA relevance)

THE COMMISSION OF THE EUROPEAN COMMUNITIES,

Having regard to the Treaty establishing the European Community,

Having regard to Regulation (EC) No 437/2003 of the European Parliament and of the Council of 27 February 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air (<sup>1</sup>), and in particular Article 10 thereof,

## Whereas:

- In accordance with Article 10 of Regulation (EC) No 437/2003, the Commission is required to lay down the arrangements for the adaptation of the specifications in the Annexes thereto.
- (2) It is necessary to establish the list of Community airports, other than those having only occasional commercial traffic, and the derogations to be provided for the Member States joining the European Union on 1 May 2004. Moreover, the codes of the new Member States should be added to those set out in Annex III to Regulation (EC) No 1358/2003, which implements Regulation (EC) No 437/2003 and adapts Annexes I and II thereto.

- (3) It is necessary to update the list of Community airports and the derogations provided for in Annex I to Regulation No 1358/2003 in accordance with the rules set out in that Annex.
- (4) Regulations (EC) No 437/2003 and (EC) No 1358/2003 should therefore be amended accordingly.
- (5) The measures provided for in this Regulation are in accordance with the opinion delivered by the Statistical Programme Committee,

HAS ADOPTED THIS REGULATION:

## Article 1

Annex I to Regulation (EC) No 437/2003 as amended by Regulation (EC) No 1358/2003, is adapted in accordance with Annex I to this Regulation.

## Article 2

Annex I to Regulation (EC) No 1358/2003 is amended in accordance with Annex II to this Regulation.

## Article 3

This Regulation shall enter into force on the 20th day following its publication in the Official Journal of the European Union.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels, 8 April 2005.

For the Commission Joaquín ALMUNIA Member of the Commission

OJ L 66, 11.3.2003, p. 1. Regulation as amended by Regulation (EC) No 1358/2003 (OJ L 194, 1.8.2003, p. 9).

## ANNEX I

Annex I to Regulation (EC) No 437/2003 as amended by Annex III to Regulation (EC) No 1358/2003 is adapted as follows:

In the Section 'CODES', '1. Reporting Country', the following codes are added:

Czech Republic	LK
Estonia	EE
Cyprus	LC
Latvia	EV
Lithuania	EY
Hungary	LH
Malta	LM
Poland	EP
Slovenia	LJ
Slovakia	LZ

# ANNEX II

Annex I to Regulation (EC) No1358/2003 is amended as follows:

(a) in Section III the following tables are added:

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')		
1			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
LKPR	Praha-Ruzyne	3			
LKTB	Brno-Turany	2			
LKMT	Ostrava-Mosnov	2			
LKKV	Karlovy Vary	1			

# Czech Republic: List of Community airports and derogations

Estonia: List of Community airports and derogations

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2'airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')		
			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
EETN	Tallinn/Ülemiste	2			
EECL	Tallinn/City Hall	1			

Cyprus: List of Community airports and derogations

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')		
·			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
LCLK	Larnaka	3			
LCPH	Pafos	3			

Latvia:	List	of	Community	airports	and	derogations
						0

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')			
			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1	
EVRA	Riga International Airport	2				

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	<ul><li>(4) Categories '1' and '2' airports only:</li><li>For each table: last year for which a derogation is requested (' ' or '2004' or '2005')</li></ul>		
1			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
EYVI	Vilnius	2	2005	2005	2005P
EYKA	Kaunas	1			2005P
EYPA	Palanga	1			2005P

# Lithuania: List of Community airports and derogations

Table C1: Partial derogations are applicable to the 'airline information' field.

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')		
			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
LHBP	Budapest/Ferihegy	3			

# Hungary: List of Community airports and derogations

Malta: List of Community airports and derogations

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	<ul><li>(4) Categories '1' and '2' airports only:</li><li>For each table: last year for which a derogation is requested (' ' or '2004' or '2005')</li></ul>		
			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
LMML	Malta/Luqa	3			

# Poland: List of Community airports and derogations

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')			
•			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1	
EPWA	Warszawa–Okęcie	3				
EPGD	Gdańsk–Trójmiasto	2	2005	2005	2005P	
EPKK	Kraków–Balice	2	2005	2005	2005P	
EPWR	Wrocław-Strachowice	2	2005	2005	2005P	
EPPO	Poznań–Lawica	2	2005	2005	2005P	
EPKT	Katowice–Pyrzowice	2	2005	2005	2005P	
EPSC	Szczecin–Goleniów	1			2005	
EPRZ	Rzeszów–Jasionka	1			2005	
EPBG	Bydgoszcz	1			2005	

Table C1: Partial derogations are applicable to the 'airline information' field.

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')			
1			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1	
LJLJ	Ljubljana	2				

## Slovenia: List of Community airports and derogations

#### Slovakia: List of Community airports and derogations

(1) ICAO Airport Code	(2) Airport Name	(3) Airport category in 2004	(4) Categories '1' and '2' airports only: For each table: last year for which a derogation is requested (' ' or '2004' or '2005')		
			(4.1) Table A1	(4.2) Table B1	(4.3) Table C1
LZIB	Bratislava/Ivanka	2			
LZKZ	Kosice	2			

- (b) in Section III, table 'Germany: List of Community airports and derogations' the category of Augsburg airport (ICAO code: EDMA) is changed from 2 to 1;
- (c) in Section III, table 'France: List of Community airports and derogations' the category of Limoges airport (ICAO code: LFBL) is changed from 1 to 2;
- (d) in Section III, table '**France**: List of Community airports and derogations' the following airports are added with category 1 and without any derogation: Deauville St Gatien (ICAO code: LFRG), Tours St Symphorien (ICAO code: LFOT) and Saint Pierre Pierrefonds (ICAO code: FMEP);
- (e) in Section III, table 'Italy: List of Community airports and derogations' the category of Forli airport (ICAO code: LIPK) is changed from 1 to 2;
- (f) in Section III, table 'Netherlands: List of Community airports and derogations' the following airport is removed: Deventer (ICAO code: EHTE);
- (g) in Section III, table 'United Kingdom: List of Community airports and derogations' the category of Belfast City airport (ICAO code: EGAC) is changed from 2 to 3;
- (h) in Section III, table 'United Kingdom: List of Community airports and derogations' the following airports are removed: Sheffield (ICAO code: EGSY) and Cambridge (ICAO code: EGSC);
- (i) in Section III, table 'United Kingdom: List of Community airports and derogations' a derogation for table C1 is granted until 2005 for Swansea airport (ICAO code: EGFH).

# ANNEX IV: Commission Regulation (EC) No 158/2007

## COMMISSION REGULATION (EC) No 158/2007

## of 16 February 2007

## amending Commission Regulation (EC) No 1358/2003 as regards the list of Community airports

(Text with EEA relevance)

THE COMMISSION OF THE EUROPEAN COMMUNITIES,

Having regard to the Treaty establishing the European Community,

Having regard to Regulation (EC) No 437/2003 of the European Parliament and of the Council of 27 February 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air (<sup>1</sup>), and in particular Article 10 thereof,

Whereas:

- In accordance with Article 10 of Regulation (EC) No 437/2003, the Commission is required to lay down the arrangements for the adaptation of the specifications in the Annexes thereto.
- (2) Due to the evolution of air transport, it is necessary to update the list of Community airports and their category provided for in Annex I to Commission Regulation (EC) No 1358/2003 (<sup>2</sup>), in accordance with the rules set out in that Annex.

(3) Commission Regulation (EC) No 1358/2003 should therefore be amended accordingly.

(4) The measures provided for in this Regulation are in accordance with the opinion of the Statistical Programme Committee,

HAS ADOPTED THIS REGULATION:

#### Article 1

For the purposes of Article 3(2) and Article 3(3) of Regulation (EC) No 437/2003, the list of Community airports, apart from those having only occasional commercial traffic, and their category as specified in Annex I to Regulation (EC) No 1358/2003, as amended by Annex II to Commission Regulation (EC) No 546/2005 (<sup>3</sup>), is replaced by the list set out in the Annex to this Regulation.

## Article 2

This Regulation shall enter into force on the 20th day following its publication in the Official Journal of the European Union.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels, 16 February 2007.

For the Commission Joaquín ALMUNIA Member of the Commission

OJ L 66, 11.3.2003, p. 1. Regulation as last amended by Regulation (EC) No 1791/2006 (OJ L 363, 20.12.2006, p. 1).
 OJ L 194, 1.8.2003, p. 9. Regulation as last amended by Regulation

<sup>(&</sup>lt;sup>2</sup>) OJ L 194, 1.8.2003, p. 9. Regulation as last amended by Regulation (EC) No 1792/2006 (OJ L 362, 20.12.2006, p. 1).

# ANNEX

## List of Community airports covered from 1 January 2007

# Belgium: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EBAW	Antwerpen/Deurne	2
EBBR	Bruxelles/National Brussel/Nationaal	3
EBCI	Charleroi/Brussels South	3
EBLG	Liège/Bierset	3
EBOS	Oostende	2

# Bulgaria: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LBBG	Burgas	3
LBPD	Plovdiv	1
LBSF	Sofia	3
LBWN	Varna	3

# Czech Republic: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LKKV	Karlovy Vary	1
LKMT	Ostrava/Mošnov	2
LKPR	Praha/Ruzyně	3
LKTB	Brno-Tuřany	2

# Denmark: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EKAH	Århus	2
EKBI	Billund	3
ЕКСН	Copenhagen Kastrup	3
EKEB	Esbjerg	2
EKKA	Karup	2
EKRK	Copenhagen Roskilde	1
EKRN	Bornholm	2
EKSB	Sønderborg	1
EKYT	Aalborg	2

## Germany: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EDAC	Altenburg-Nobitz	1
EDDB	Berlin-Schönefeld	3
EDDC	Dresden	3
EDDE	Erfurt	2

17.2.2007

EN

ICAO airport code	Airport name	Airport category in 2007
EDDF	Frankfurt/Main	3
EDDG	Münster/Osnabrück	2
EDDH	Hamburg	3
EDDI	Berlin-Tempelhof	2
EDDK	Köln/Bonn	3
EDDL	Düsseldorf	3
EDDM	München	3
EDDN	Nürnberg	3
EDDP	Leipzig/Halle	3
EDDR	Saarbrücken	2
EDDS	Stuttgart	3
EDDT	Berlin-Tegel	3
EDDV	Hannover	3
EDDW	Bremen	3
EDFH	Hahn	3
EDFM	Mannheim-Neuostheim	1
EDHK	Kiel-Holtenau	1
EDHL	Lübeck	2
EDLN	Mönchengladbach	1
EDLP	Paderborn/Lippstadt	2
EDLV	Niederrhein	2
EDLW	Dortmund	3
EDMA	Augsburg-Mühlhausen	1
EDNY	Friedrichshafen	2
EDOG	Gransee	1
EDOR	Rostock-Laage	2
EDQM	Hof	1
EDTK	Karlsruhe	2
EDVE	Braunschweig	1
EDWG	Wangerooge	1
EDWJ	Juist	1
EDWS	Norden-Norddeich	1
EDXP	Harle	1
EDXW	Westerland/Sylt	1
ETNU	Neubrandenburg	1

# Estonia: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EECL	Tallinn/City Hall	1
EETN	Tallinn/Ülemiste	2

## Greece: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LGAL	Alexandroupolis	2
LGAV	Athens	3
LGBL	Nea Anchialos	1

ICAO airport code	Airport name	Airport category in 2007
LGHI	Chios	2
LGIK	Ikaria	1
LGIO	Ioannina	1
LGIR	Irakleion	3
LGKC	Kithira	1
LGKF	Kefallinia	2
LGKL	Kalamata	1
LGKO	Kos	3
LGKP	Karpathos	2
LGKR	Kerkyra	3
LGKV	Kavala	2
LGLE	Leros	1
LGLM	Limnos	1
LGMK	Mykonos	2
LGML	Milos	1
LGMT	Mytilini	2
LGNX	Naxos	1
LGPA	Paros	1
LGPZ	Aktio	2
LGRP	Rodos	3
LGRX	Araxos	1
LGSA	Chania	3
LGSK	Skiathos	2
LGSM	Samos	2
LGSR	Santorini	2
LGST	Siteia	1
LGTS	Thessaloniki	3
LGZA	Zakynthos	2

# Spain: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
GCFV	Puerto del Rosario/Fuerteventura	3
GCGM	Gomera	1
GCHI	Hierro	2
GCLA	Santa Cruz de la Palma	2
GCLP	Las Palmas/Gran Canaria	3
GCRR	Arrecife/Lanzarote	3
GCTS	Tenerife Sur-Reina Sofía	3
GCXO	Tenerife Norte	3
GECT	Ceuta	1
GEML	Melilla	2
LEAL	Alicante	3
LEAM	Almería	2
LEAS	Avilés/Asturias	2
LEBB	Bilbao	3
LEBL	Barcelona	3
17.2.2007

EN

ICAO airport code	Airport name	Airport category in 2007
LEBZ	Badajoz/Talavera la Real	1
LECO	La Coruña	2
LEGE	Girona/Costa Brava	3
LEGR	Granada	2
LEIB	Ibiza	3
LEJR	Jerez	2
LELC	Murcia-San Javier	2
LELN	León	1
LEMD	Madrid/Barajas	3
LEMG	Málaga	3
LEMH	Menorca/Mahón	3
LEPA	Palma de Mallorca	3
LERJ	Logroño	1
LEPP	Pamplona	2
LERS	Reus	2
LESA	Salamanca	1
LESO	San Sebastián	2
LEST	Santiago	3
LEVC	Valencia	3
LEVD	Valladolid	2
LEVT	Vitoria	2
LEVX	Vigo	2
LEXJ	Santander	2
LEZG	Zaragoza	2
LEZL	Sevilla	3

## France: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
FMEE	St-Denis-Roland-Garros (Réunion)	3
FMEP	Saint-Pierre-Pierrefonds (Réunion)	1
LFBA	Agen — La Garenne	1
LFBD	Bordeaux — Mérignac	3
LFBE	Bergerac — Roumanière	2
LFBH	La Rochelle — Île de Ré	1
LFBI	Poitiers — Biard	1
LFBL	Limoges	2
LFBO	Toulouse — Blagnac	3
LFBP	Pau — Pyrénées	2
LFBT	Tarbes — Lourdes — Pyrénées	2
LFBV	Brive — Laroche	1
LFBZ	Biarritz — Bayonne — Anglet	2
LFCK	Castres — Mazamet	1
LFCR	Rodez — Marcillac	2
LFDN	Rochefort — Saint-Agnant	1
LFJL	Metz — Nancy — Lorraine	2
LFKB	Bastia — Poretta	2

ICAO airport code	Airport name	Airport category in 2007
LFKC	Calvi — Sainte-Catherine	2
LFKF	Figari — Sud Corse	2
LFKI	Aiaccio — Campo Dell'Oro	2
LFLB	Chambéry — Aix-les-Bains	2
LFLC	Clermont-Ferrand — Auvergne	2
LFLL	Lvon — St-Exupéry	3
LFLP	Annecy — Meythet	1
LFLS	Grenoble — St-Geoirs	2
LFLW	Aurillac — Tronauières	1
LFLX	Châteauroux/ — Déols	1
LFMD	Cannes — Mandelieu	1
LFMH	St-Étienne — Bouthéon	1
LFMK	Carcassonne	2
LFML	Marseille — Provence	3
LFMN	Nice — Côte d'azur	3
LFMP	Perpignan — Rivesaltes	2
LFMT	Montpellier — Méditerranée	2
LFMU	Béziers — Vias	1
LFMV	Avignon — Caumont	1
LFOB	Beauvais — Tillé	3
LFOH	La Havre — Octeville	1
LFOK	Châlons — Vatry	2
LFOP	Rouen — Vallée de Seine	1
LFOT	Tours — St-Symphorien	1
LFPG	Paris — Charles-de-Gaulle	3
LFPO	Paris — Orly	3
LFOO	Lille — Lesquin	2
LFRB	Brest — Guipavas	2
LFRD	Dinard — Pleurtuit	2
LFRG	Deauville — St-Gatien	1
LFRH	Lorient	2
LFRK	Caen — Carpiquet	1
LFRN	Rennes — St-Jacques	2
LFRO	Lannion — Servel	1
LFRQ	Quimper — Cornouaille	1
LFRS	Nantes — Atlantique	3
LFSB	Bâle — Mulhouse	3
LFSR	Reims — Champagne	1
LFST	Strasbourg	3
LFTH	Toulon — Hyères	2
LFTW	Nîmes — Arles — Camargue	2
SOCA	Cayenne — Rochambeau (Guyane)	2
TFFF	Fort-de-France (Martinique)	3
TFFG	St-Martin — Grand-Case (Guadeloupe)	2
TFFJ	St-Barthélemy (Guadeloupe)	2
TFFR	Pointe-à-Pitre (Guadeloupe)	3

## Ireland: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EICA	Connemara Regional Airport	1
EICK	Cork	3
EICM	Galway	2
EIDL	Donegal	1
EIDW	Dublin	3
EIKN	Connaught Regional Airport	2
EIKY	Kerry	2
EINN	Shannon	3
EISG	Sligo Regional Airport	1
EIWF	Waterford	1

Ita	ly:	List	of	Community	air	ports
-----	-----	------	----	-----------	-----	-------

ICAO airport code	Airport name	Airport category in 2007
LIBC	Crotone	1
LIBD	Bari-Palese Macchie	3
LIBP	Pescara	2
LIBR	Brindisi-Casale	2
LICA	Lamezia Terme	2
LICC	Catania-Fontanarossa	3
LICD	Lampedusa	2
LICG	Pantelleria	1
LICJ	Palermo-Punta Raisi	3
LICR	Reggio di Calabria	1
LICT	Trapani-Birgi	2
LIEA	Alghero-Fertilia	2
LIEE	Cagliari-Elmas	3
LIEO	Olbia-Costa Smeralda	3
LIMC	Milano-Malpensa	3
LIME	Bergamo-Orio al Serio	3
LIMF	Torino-Caselle	3
LIMJ	Genova-Sestri	2
LIML	Milano-Linate	3
LIMP	Parma	1
LIMZ	Cuneo/Levaldigi	1
LIPB	Bolzano	1
LIPE	Bologna-Borgo Panigale	3
LIPH	Treviso-Sant'Angelo	2
LIPK	Forlì	2
LIPO	Brescia-Montichiari	2
LIPQ	Trieste-Ronchi dei Legionari	2
LIPR	Rimini	2
LIPX	Verona-Villafranca	3
LIPY	Ancona-Falconara	2
LIPZ	Venezia-Tessera	3
LIRA	Roma-Ciampino	3

ICAO airport code	Airport name	Airport category in 2007
LIRF	Roma-Fiumicino	3
LIRN	Napoli-Capodichino	3
LIRP	Pisa-San Giusto	3
LIRQ	Firenze-Peretola	3
LIRZ	Perugia	1

#### Cyprus: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LCLK	Larnaka	3
LCPH	Pafos	3

#### Latvia: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EVRA	Rīga	3

#### Lithuania: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EYKA	Kaunas	1
EYPA	Palanga	1
EYVI	Vilnius	2

#### Luxembourg: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
ELLX	Luxembourg	3

#### Hungary: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LHBP	Budapest-Ferihegy	3
LHDC	Debrecen	1
LHSM	Sármellék-Balaton	1

#### Malta: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LMML	Malta/Luqa	3

#### Netherlands: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EHAM	Amsterdam/Schiphol	3
EHBK	Maastricht-Aachen	2
EHEH	Eindhoven/Welschap	2
EHGG	Eelde/Groningen	1
EHRD	Rotterdam/Zestienhoven	2

#### Austria: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LOWG	Graz	2
LOWI	Innsbruck	2
LOWK	Klagenfurt	2
LOWL	Linz	2
LOWS	Salzburg	3
LOWW	Wien/Schwechat	3

## Poland: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EPBG	Bydgoszcz – Szwederowo	1
EPGD	Gdańsk – Rębiechowo	2
ЕРКК	Kraków – Balice	3
EPKT	Katowice – Pyrzowice	2
EPPO	Poznań – Ławica	2
EPRZ	Rzeszów – Jasionka	1
EPSC	Szczecin – Goleniów	1
EPWA	Warszawa – Okęcie	3
EPWR	Wrocław – Strachowice	2
EPLL	Lódź – Lublinek	1

## Portugal: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LPFL	Flores	1
LPFR	Faro	3
LPFU	Madeira/Madeira	3
LPHR	Horta	2
LPLA	Lajes	2
LPPD	Ponta Delgada	2
LPPO	Santa Maria	1
LPPR	Porto	3
LPPS	Porto Santo	2
LPPT	Lisboa	3

#### Romania: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LRBC	Васай	1
LRBS	București/Băneasa	2
LRCK	Constanța/M. Kogălniceanu	1
LRCL	Cluj-Napoca/Someșeni	2
LRIA	Iași	1
LROD	Oradea	1
LROP	București/Otopeni	3
LRSB	Sibiu/Turnişor	1
LRTR	Timișoara/Giarmata	2

#### Slovenia: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LJLJ	Ljubljana	2

#### Slovakia: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
LZIB	Bratislava	2
LZKZ	Košice	2
LZSL	Sliač	1
LZTT	Poprad-Tatry	1

#### Finland: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EFHK	Helsinki-Vantaa	3
EFIV	Ivalo	2
EFJO	Joensuu	2
EFJY	Jyväskylä	2
EFKE	Kemi-Tornio	1
EFKI	Kajaani	1
EFKK	Ктиипируу	1
EFKS	Киизато	1
EFKT	Kittilä	2
EFKU	Киоріо	2
EFLP	Lappeenranta	1
EFMA	Mariehamn	1
EFOU	Oulu	2
EFPO	Pori	1
EFRO	Rovaniemi	2
EFSA	Savonlinna	1
EFSI	Seinäjoki	1
EFTP	Tampere-Pirkkala	2
EFTU	Turku	2
EFVA	Vaasa	2
EFVR	Varkaus	1

#### Sweden: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
ESDF	Ronneby	2
ESGG	Göteborg-Landvetter	3
ESGJ	Jönköping	1
ESGP	Göteborg City	2
ESGT	Trollhättan/Vänersborg	1
ESKN	Stockholm/Skavsta	3
ESMK	Kristianstad/Everöd	1
ESMQ	Kalmar	2
ESMS	Malmö-Sturup	3

17.2.2007

EN

ICAO airport code	Airport name	Airport category in 2007
ESMT	Halmstad	1
ESMX	Växjö/Kronoberg	2
ESNG	Gällivare	1
ESNK	Kramfors	1
ESNL	Lycksele	1
ESNN	Sundsvall-Härnösand	2
ESNO	Örnsköldsvik	1
ESNQ	Kiruna	2
ESNS	Skellefteå	2
ESNU	Umeå	2
ESNX	Arvidsjaur	1
ESOE	Örebro	1
ESOK	Karlstad	2
ESOW	Stockholm/Västerås	2
ESPA	Luleå	2
ESPC	Östersund	2
ESSA	Stockholm-Arlanda	3
ESSB	Stockholm-Bromma	2
ESSD	Borlänge	1
ESSL	Linköping/Saab	1
ESSP	Norrköping	1
ESSV	Visby	2
ESTA	Ängelholm	2

## United Kingdom: List of Community airports

ICAO airport code	Airport name	Airport category in 2007
EGAA	Belfast International	3
EGAC	Belfast City	3
EGAE	City of Derry (Eglinton)	2
EGBB	Birmingham	3
EGBE	Coventry	2
EGCC	Manchester	3
EGCN	Doncaster Sheffield	2
EGDG	Newquay	2
EGFF	Cardiff Wales	3
EGGD	Bristol	3
EGGP	Liverpool	3
EGGW	Luton	3
EGHC	Lands End	1
EGHD	Plymouth	1
EGHE	Isles of Scilly (St.Marys)	1
EGHH	Bournemouth	2
EGHI	Southampton	3
EGHK	Penzance Heliport	1
EGHT	Isles of Scilly (Tresco)	1
EGKK	Gatwick	3

ICAO airport code	Airport name	Airport category in 2007
EGLC	London City	3
EGLL	Heathrow	3
EGMH	Kent International	2
EGNH	Blackpool	2
EGNJ	Humberside	2
EGNM	Leeds Bradford	3
EGNR	Hawarden	1
EGNT	Newcastle	3
EGNV	Durham Tees Valley	2
EGNX	Nottingham East Midlands	3
EGPA	Kirkwall	1
EGPB	Sumburgh	1
EGPC	Wick	1
EGPD	Aberdeen	3
EGPE	Inverness	2
EGPF	Glasgow	3
EGPH	Edinburgh	3
EGPI	Islay	1
EGPK	Prestwick	3
EGPL	Benbecula	1
EGPM	Scatsta	2
EGPN	Dundee	1
EGPO	Stornoway	1
EGSH	Norwich	2
EGSS	Stansted	3
EGTE	Exeter	2

# ANNEX V: Regulation (EC) N° 219/2009

EN

#### REGULATION (EC) No 219/2009 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL

#### of 11 March 2009

adapting a number of instruments subject to the procedure referred to in Article 251 of the Treaty to Council Decision 1999/468/EC with regard to the regulatory procedure with scrutiny

#### Adaptation to the regulatory procedure with scrutiny — Part Two

THE EUROPEAN PARLIAMENT AND THE COUNCIL OF THE EUROPEAN UNION,

Having regard to the Treaty establishing the European Community, and in particular Articles 37, 44(1), 71, 80(2), 95, 152(4)(b), 175 (1), 179 and 285 thereof,

Having regard to the proposal from the Commission,

Having regard to the opinion of the European Economic and Social Committee  $(^{1}),\,$ 

Having regard to the opinion of the European Central Bank (2),

After consulting the Committee of the Regions,

Acting in accordance with the procedure laid down in Article 251 of the Treaty  $(^{3})$ ,

Whereas:

(1) Council Decision 1999/468/EC of 28 June 1999 laying down the procedures for the exercise of implementing powers conferred on the Commission (<sup>4</sup>) has been amended by Decision 2006/512/EC (<sup>5</sup>), which introduced the regulatory procedure with scrutiny for the adoption of measures of general scope designed to amend non-essential elements of a basic instrument adopted in accordance with the procedure laid down in Article 251 of the Treaty, *inter alia*, by deleting some of those elements or by supplementing the instrument with new non-essential elements.

(2) In accordance with the statement of the European Parliament, the Council and the Commission (<sup>6</sup>) concerning Decision 2006/512/EC, for the regulatory procedure with scrutiny to be applicable to instruments adopted in accordance with the procedure laid down in Article 251 of the Treaty which are already in force, those instruments must be adjusted in accordance with the applicable procedures.

(3) Since the amendments made to instruments for this purpose are technical in nature and concern committee procedure only, they do not, in the case of directives, need to be transposed by the Member States,

HAVE ADOPTED THIS REGULATION:

#### Article 1

The instruments listed in the Annex are hereby adapted, in accordance with that Annex, to Decision 1999/468/EC, as amended by Decision 2006/512/EC.

#### Article 2

References to provisions of the instruments listed in the Annex shall be understood to be references to those provisions as adapted by this Regulation.

#### Article 3

This Regulation shall enter into force on the 20th day following its publication in the Official Journal of the European Union.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Strasbourg, 11 March 2009.

For the European Parliament	For the Council
The President	The President
HG. PÖTTERING	A. VONDRA

(<sup>1</sup>) OJ C 224, 30.8.2008, p. 35.

- (<sup>3</sup>) Opinion of the European Parliament of 23 September 2008 (not yet published in the Official Journal) and Council Decision of 16 February 2009.
- (<sup>4</sup>) OJ L 184, 17.7.1999, p. 23.

<sup>(&</sup>lt;sup>2</sup>) OJ C 117, 14.5.2008, p. 1.

<sup>(&</sup>lt;sup>5</sup>) OJ L 200, 22.7.2006, p. 11.

<sup>(&</sup>lt;sup>6</sup>) OJ C 255, 21.10.2006, p. 1.

EN

## 4.5. Regulation (EC) No 437/2003 of the European Parliament and of the Council of 27 February 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air (<sup>1</sup>)

As regards Regulation (EC) No 437/2003, the Commission should be empowered to establish standards of accuracy, specify data files and adopt certain implementing measures. Since those measures are of general scope and are designed to amend non-essential elements of Regulation (EC) No 437/2003, *inter alia*, by supplementing it with new non-essential elements, they must be adopted in accordance with the regulatory procedure with scrutiny provided for in Article 5a of Decision 1999/468/EC.

Accordingly, Regulation (EC) No 437/2003 is hereby amended as follows:

1. Article 5 shall be replaced by the following:

'Article 5

#### Accuracy of statistics

The collection of data shall be based on complete returns, unless other standards of accuracy are established by the Commission. Those measures, designed to amend non-essential elements of this Regulation by supplementing it, shall be adopted in accordance with the regulatory procedure with scrutiny referred to in Article 11(3).';

2. Article 7(2) shall be replaced by the following:

<sup>12</sup>. The results shall be transmitted according to the data files shown in Annex I. The files shall be specified by the Commission. Those measures, designed to amend non-essential elements of this Regulation, shall be adopted in accordance with the regulatory procedure with scrutiny referred to in Article 11(3).

The medium to be used for transmission shall be specified by the Commission in accordance with the regulatory procedure referred to in Article 11(2).';

3. Article 10 shall be replaced by the following:

'Article 10

#### Implementing measures

1. The following implementing measures shall be adopted in accordance with the regulatory procedure referred to in Article 11(2):

- the list of Community airports covered by Article 3(2),
- description of the data codes and the medium to be used for transmission of results to the Commission (Article 7),
- dissemination of statistical results (Article 8),
- 2. The Commission shall adopt the following implementing measures:
- adaptation of the specifications in the Annexes to this Regulation,
- adaptation of the data collection characteristics (Article 3),
- accuracy of statistics (Article 5),
- description of the data files (Article 7),

Those measures, designed to amend non-essential elements of this Regulation by supplementing it, shall be adopted in accordance with the regulatory procedure with scrutiny referred to in Article 11(3).';

<sup>(&</sup>lt;sup>1</sup>) OJ L 66, 11.3.2003, p. 1.

4. Article 11 shall be replaced by the following:

'Article 11

#### Committee procedure

1. The Commission shall be assisted by the Statistical Programme Committee established by Decision 89/382/ EEC, Euratom.

2. Where reference is made to this paragraph, Articles 5 and 7 of Decision 1999/468/EC shall apply, having regard to the provisions of Article 8 thereof.

The time limit laid down in Article 5(6) of Decision 1999/468/EC shall be set at three months.

3. Where reference is made to this paragraph, Article 5a(1) to (4) and (5)(a) and Article 7 of Decision 1999/ 468/EC shall apply, having regard to the provisions of Article 8 thereof.'

## 4.6. Regulation (EC) No 48/2004 of the European Parliament and of the Council of 5 December 2003 on the production of annual Community statistics on the steel industry for the reference years 2003-2009 (<sup>1</sup>)

As regards Regulation (EC) No 48/2004, the Commission should be empowered to update the list of characteristics concerned by that Regulation. Since those measures are of general scope and are designed to amend non-essential elements of Regulation (EC) No 48/2004, *inter alia*, by supplementing it with new non-essential elements, they must be adopted in accordance with the regulatory procedure with scrutiny provided for in Article 5a of Decision 1999/ 468/EC.

Accordingly, Regulation (EC) No 48/2004 is hereby amended as follows:

1. Article 7 shall be replaced by the following:

'Article 7

#### Implementing measures

1. The measures for the implementation of this Regulation concerning transmission formats and the first transmission period shall be adopted in accordance with the regulatory procedure referred to in Article 8(2).

2. The measures for the implementation of this Regulation concerning the updating of the list of characteristics, designed to amend non-essential elements of this Regulation, *inter alia*, by supplementing it, shall be adopted in accordance with the regulatory procedure with scrutiny referred to in Article 8(3), provided that no significant additional burden is imposed upon the Member States.';

2. Article 8(3) shall be replaced by the following:

'3. Where reference is made to this paragraph, Article 5a(1) to (4) and Article 7 of Decision 1999/468/EC shall apply, having regard to the provisions of Article 8 thereof.'

#### 5. INTERNAL MARKET

#### Directive 2004/25/EC of the European Parliament and of the Council of 21 April 2004 on takeover bids (2)

As regards Directive 2004/25/EC, the Commission should be empowered to adopt rules for the application of Article 6(3) to the contents of the offer document. Since those measures are of general scope and are designed to amend non-essential elements of Directive 2004/25/EC, they must be adopted in accordance with the regulatory procedure with scrutiny provided for in Article 5a of Decision 1999/468/EC.

Directive 2004/25/EC provided for a time restriction concerning the implementing powers conferred on the Commission. In their statement concerning Decision 2006/512/EC amending Decision 1999/468/EC, the European Parliament, the Council and the Commission have stated that Decision 2006/512/EC provides a horizontal and satisfactory solution to the European Parliament's wish to scrutinise the implementation of instruments adopted under the co-decision procedure and that, accordingly, implementing powers should be conferred on the Commission without time limit. Following the introduction of the regulatory procedure with scrutiny, the provision establishing that time restriction in Directive 2004/25/ EC should be deleted.

<sup>(1)</sup> OJ L 7, 13.1.2004, p. 1.

# ANNEX VI 2016 List of community airports covered by Commission Regulation 1358/2003

## Belgium: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EBAW	ANTWERPEN/DEURNE	1
EBBR	BRUSSELS	3
EBCI	CHARLEROI/BRUSSELS SOUTH	3
EBLG	LIEGE/LIEGE (CIV)	3
EBOS	OOSTENDE-BRUGGE/OOSTENDE	2

## Bulgaria: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LBBG	BURGAS	3
LBPD	PLOVDIV	1
LBSF	SOFIA	3
LBWN	VARNA	2

## Czech Republic: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LKKV	KARLOVY VARY	1
LKMT	OSTRAVA/MOSNOV	2
LKPD	PARDUBICE	1
LKPR	PRAHA/RUZYNE	3
LKTB	BRNO/TURANY	2

## Denmark: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
ЕКАН	AARHUS	2
ЕКВІ	BILLUND	3
ЕКСН	KØBENHAVN/KASTRUP	3
ЕКЕВ	ESBJERG	1
ЕККА	KARUP (MIL)	1
EKRK	KOBENHAVN/ROSKILDE	0
EKRN	BORNHOLM/RONNE	2
EKSB	SONDERBORG	1
EKTS	THISTED	0
EKYT	AALBORG (CIV/MIL)	2

## Germany: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EDAH	HERINGSDORF	1
EDBC	MAGDEBURG/COCHSTEDT	0
EDDB	BERLIN/SCHÖNEFELD	3
EDDC	DRESDEN	3
EDDE	ERFURT	2
EDDF	FRANKFURT/MAIN	3
EDDG	MUENSTER/OSNABRUECK	2
EDDH	HAMBURG	3
EDDK	KÖLN/BONN	3
EDDL	DÜSSELDORF	3
EDDM	MÜNCHEN	3
EDDN	NUERNBERG	3
EDDP	LEIPZIG/HALLE	3
EDDR	SAARBRUECKEN	2
EDDS	STUTTGART	3
EDDT	BERLIN/TEGEL	3
EDDV	HANNOVER	3
EDDW	BREMEN	3
EDFH	FRANKFURT-HAHN	3
EDFZ	MAINZ/FINTHEN	1
EDHL	LUEBECK-BLANKENSEE	2
EDJA	MEMMINGEN	2
EDLP	PADERBORN/LIPPSTADT	2
EDLV	NIEDERRHEIN	3
EDLW	DORTMUND	3
EDMA	AUGSBURG	1
EDNL	LEUTKIRCH-UNTERZEIL	1
EDNY	FRIEDRICHSHAFEN	2
EDRZ	ZWEIBRUECKEN	2
EDSB	KARLSRUHE/BADEN-BADEN	2
EDVE	BRAUNSCHWEIG-WOLFSBURG	1
EDVK	KASSEL-CALDEN	1
EDWG	WANGEROOGE	1
EDWJ	JUIST	1
EDWS	NORDEN-NORDDEICH	1
EDXH	HELGOLAND-DUENE	1
EDXP	HARLE	1
EDXW	SYLT	1
ETNL	LAAGE	1

## Estonia: List of Community airports

ICAO	Airport	Airport category for the 2016
Airport Code	Name	data provision
EETN	LENNART MERI TALLINN	3

## Ireland: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EICA	CONNEMARA	1
EICK	CORK	3
EIDL	DONEGAL	1
EIDW	DUBLIN	3
EIIM	INISHMORE	0
EIKN	IRELAND WEST	2
EIKY	KERRY	2
EINN	SHANNON	3
EIWF	WATERFORD	1

## Greece: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LGAL	ALEXANDROUPOLIS/DIMOKRITOS	2
LGAV	ATHENS	3
LGBL	ALMIROS/NEA ANCHIALOS (MIL)	1
LGHI	CHIOS/OMIROS	2
LGIK	IKARIA/IKAROS	1
LGIO	IOANNINA/KING PYRROS	1
LGIR	IRAKLION/NIKOS KAZANTZAKIS	3
LGKA	KASTORIA/ARISTOTELIS	0
LGKC	KITHIRA	1
LGKF	KEFALLINIA	2
LGKJ	KASTELORIZO	0
LGKL	KALAMATA (MIL)	2
LGKO	KOS/IPPOKRATIS	3
LGKP	KARPATHOS	2
LGKR	KERKIRA/IOANNIS KAPODISTRIAS	3
LGKS	KASSOS	0
LGKV	KAVALA/MEGAS ALEXANDROS	2
LGKY	KALYMNOS	1
LGKZ	KOZANI/FILIPPOS	0
LGLE	LEROS	1
LGLM	LIMNOS/IFAISTOS	1
LGMK	MIKONOS	2
LGML	MILOS	1
LGMT	MITILINI/ODYSSEAS ELYTIS	2
LGNX	NAXOS	1
LGPA	PAROS	1
LGPL	ASTYPALAIA	0
LGPZ	PREVEZA/AKTION (MIL)	2
LGRP	RODOS/DIAGORAS	3
LGRX	ARAXOS (MIL)	2
LGSA	CHANIA/IOANNIS DASKALOGIANNIS (MIL)	3
LGSK	SKIATHOS/ALEXANDROS PAPADIAMANDIS	2
LGSM	SAMOS/ARISTARCHOS OF SAMOS	2
LGSO	SYROS/DIMITRIOS VIKELAS	1

LGSR	SANTORINI	2
LGST	SITIA	1
LGSY	SKIROS (MIL)	0
LGTS	THESSALONIKI/MAKEDONIA	3
LGZA	ZAKINTHOS/DIONISIOS SOLOMOS	2

## Spain: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
GCFV	FUERTEVENTURA	3
GCGM	LA GOMERA	1
GCHI	HIERRO	1
GCLA	LA PALMA	2
GCLP	GRAN CANARIA	3
GCRR	LANZAROTE	3
GCTS	TENERIFE SUR/REINA SOFIA	3
GCXO	TENERIFE NORTE (AD CIVIL)	3
GECT	CEUTA (HEL MILITAR)	0
GEML	MELILLA	2
LEAL	ALICANTE	3
LEAM	ALMERIA	2
LEAS	ASTURIAS	2
LEBB	BILBAO	3
LEBG	BURGOS	1
LEBL	BARCELONA	3
LEBZ	BADAJOZ	1
LECO	A CORUNA	2
LEGE	GIRONA	3
LEGR	GRANADA/FEDERICO GARCIA LORCA GRANADA-JAEN	2
LEIB	IBIZA	3
LEJR	JEREZ	2
LELC	MURCIA/SAN JAVIER	2
LELN	LEON	1
LEMD	MADRID/BARAJAS	3
LEMG	MALAGA	3
LEMH	MENORCA	3
LEPA	PALMA DE MALLORCA	3
LEPP	PAMPLONA	1
LERS	REUS	2
LESA	SALAMANCA	1
LESO	SAN SEBASTIAN	2
LEST	SANTIAGO	3
LEVC	VALENCIA	3
LEVD	VALLADOLID	2
LEVT	VITORIA	2
LEVX	VIGO	2
LEXJ	SANTANDER	2
LEZG	ZARAGOZA	2
LEZL	SEVILLA	3

## France: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
FMCZ	DZAOUDZI	2
FMEE	LA REUNION/ROLAND GARROS	3
FMEP	SAINT PIERRE PIERREFONDS	1
LFAQ	ALBERT/BRAY	1
LFBA	AGEN/LA GARENNE	1
LFBD	BORDEAUX/MERIGNAC	3
LFBE	BERGERAC/ROUMANIERE	2
LFBH	LA ROCHELLE/ILE DE RE	2
LFBI	POITIERS/BIARD	1
LFBL	LIMOGES/BELLEGARDE	2
LFBO	TOULOUSE/BLAGNAC CCER	3
LFBP	PAU/PYRENEES	2
LFBT	TARBES/LOURDES/PYRENEES	2
LFBZ	BIARRITZ/BAYONNE/ANGLET	2
LFCK	CASTRES/MAZAMET	1
LFCR	RODEZ/MARCILLAC	1
LFGJ	DOLE/TAVAUX	1
LFJL	METZ/NANCY/LORRAINE	2
LFKB	BASTIA/PORETTA	2
LFKC	CALVI/SAINTE-CATHERINE	2
LFKF	FIGARI/SUD-CORSE	2
LFKJ	AJACCIO/NAPOLEON-BONAPARTE	2
LFLB	CHAMBERY/AIX-LES-BAINS	2
LFLC	CLERMONT-FERRAND/AUVERGNE CCER	2
LFLL	LYON/SAINT-EXUPERY	3
LFLS	GRENOBLE/ISERE	2
LFLW	AURILLAC	1
LFLX	CHATEAUROUX/DEOLS	1
LEMH	SAINT-ETIENNE/BOUTHEON	1
LFMK	CARCASSONNE/SALVAZA	2
LFML	MARSEILLE/PROVENCE	3
LEMN	NICE/CÔTE DAZUR	3
LEMP	PERPIGNAN/RIVESALTES	2
LEMT		3
LEMU	BF7IFRS/VIAS	2
LEOB	BEALIVAIS/TILLE	3
		2
LEOT		2
LEPR		1
	PARIS/CHARLES DE GALILLE	2
LEPO		3
1500		2
		3
LERD		1
		1
		1
		1
		1
		2
LFRO		1
LFRQ	QUIMPER/PLUGUFFAN	1

LFRS	NANTES/ATLANTIQUE	3
LFRZ	SAINT-NAZAIRE/MONTOIR	2
LFSB	BALE/MULHOUSE	2
LFSL	BRIVE/SOUILLAC	1
LFST	STRASBOURG/ENTZHEIM	2
LFTH	HYERES/LE PALYVESTRE	2
LFTW	NIMES/GARONS	2
SOCA	CAYENNE-ROCHAMBEAU	2
SOOA	MARIPASOULA	1
TFFF	AIME CESAIRE/MARTINIQUE	3
TFFG	SAINT MARTIN GRAND CASE GUADELOUPE	2
TFFR	POINTE-A-PITRE/LE RAIZET/GUADELOUPE	3

## Croatia: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LDDU	DUBROVNIK/CILIPI	3
LDOS	OSIJEK/KLISA	1
LDPL	PULA/PULA	2
LDRI	RIJEKA/KRK I.	1
LDSP	SPLIT/KASTELA	3
LDZA	ZAGREB/PLESO	3
LDZD	ZADAR/ZEMUNIK	2

## Italy: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LIBC	CROTONE	1
LIBD	BARI/PALESE	3
LIBP	PESCARA	2
LIBR	BRINDISI/CASALE (MIL)	3
LICA	LAMEZIA TERME	3
LICB	COMISO	2
LICC	CATANIA/FONTANAROSSA	3
LICD	LAMPEDUSA	2
LICG	PANTELLERIA	1
LICJ	PALERMO/PUNTA RAISI	3
LICR	REGGIO CALABRIA	2
LICT	TRAPANI/BIRGI (MIL)	3
LIEA	ALGHERO/FERTILIA	3
LIEE	CAGLIARI/ELMAS (MIL)	3
LIEO	OLBIA/COSTA SMERALDA	3
LIMC	MILANO/MALPENSA	3
LIME	BERGAMO/ORIO AL SERIO	3
LIMF	TORINO/CASELLE	3
LIMJ	GENOVA/SESTRI	2

LIML	MILANO/LINATE	3
LIMP	PARMA	2
LIMZ	CUNEO/LEVALDIGI	2
LIPB	BOLZANO	1
LIPE	BOLOGNA/BORGO PANIGALE	3
LIPH	TREVISO/S.ANGELO (MIL)	3
LIPO	BRESCIA/MONTICHIARI	2
LIPQ	TRIESTE/RONCHI DEI LEGIONARI	2
LIPR	RIMINI/MIRAMARE (MIL.)	2
LIPX	VERONA/VILLAFRANCA (MIL.)	3
LIPY	ANCONA/FALCONARA	2
LIPZ	VENEZIA/TESSERA	3
LIRA	ROMA/CIAMPINO (MIL.)	3
LIRF	ROMA/FIUMICINO	3
LIRN	NAPOLI/CAPODICHINO	3
LIRP	PISA/S. GIUSTO (MIL)	3
LIRQ	FIRENZE/PERETOLA	3
LIRZ	PERUGIA/S. EGIDIO	2

## Cyprus: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LCLK	LARNAKA/INTL	3
LCPH	PAFOS/INTL	3

## Latvia: List of Community airports

ICAO	Airport	Airport category for the 2016
Airport Code	Name	data provision
EVRA	RIGA	3

## Lithuania: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
ЕҮКА	KAUNAS INTL	2
EYPA	PALANGA INTL	1
EYSA	SIAULIAI INTL/CIV/MIL	1
EYVI	VILNIUS INTL	3

## Luxembourg: List of Community airports

ICAO	Airport	Airport category for the 2016
Airport Code	Name	data provision
ELLX	LUXEMBOURG	3

## Hungary: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LHBP	BUDAPEST/FERIHEGY	3
LHDC	DEBRECEN	1
LHSM	SARMELLEK/BALATON	1

## Malta: List of Community airports

ICAO	Airport	Airport category for the 2016
Airport Code	Name	data provision
LMML	LUQA AIRPORT	3

## Netherlands: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EHAM	AMSTERDAM/SCHIPHOL	3
ЕНВК	MAASTRICHT/MAASTRICHT AACHEN	2
ЕНЕН	EINDHOVEN/EINDHOVEN	3
EHGG	GRONINGEN/EELDE	2
EHRD	ROTTERDAM/ROTTERDAM	3

## Austria: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LOWG	GRAZ	2
LOWI	INNSBRUCK	2
LOWK	KLAGENFURT	2
LOWL	LINZ	2
LOWS	SALZBURG	3
LOWW	WIEN/SCHWECHAT	3

## **Poland:** List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EPBY	BYDGOSZCZ/SZWEDEROWO	2
EPGD	GDANSK IM LECHA WALESY	3
ЕРКК	KRAKOW/BALICE	3
ЕРКТ	KATOWICE/PYRZOWICE	3
EPLB	LUBLIN AIRPORT	2
EPLL	LODZ/LUBLINEK	2
EPMO	WARSZAWA/MODLIN	3
EPPO	POZNAN/LAWICA	2

EPRZ	RZESZOW/JASIONKA	2
EPSC	SZCZECIN/GOLENIOW	2
EPWA	WARSZAWA/CHOPINA	3
EPWR	WROCLAW/STRACHOWICE	3

## Portugal: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LPBJ	BEJA	0
LPCR	CORVO	0
LPCS	CASCAIS	0
LPFL	FLORES	1
LPFR	FARO	3
LPGR	GRACIOSA	1
LPHR	HORTA	2
LPLA	LAJES	2
LPMA	MADEIRA	3
LPPD	PONTA DELGADA	2
LPPI	PICO	1
LPPO	SANTA MARIA OAC/FIC	1
LPPR	PORTO	3
LPPS	PORTO SANTO	1
LPPT	LISBOA	3
LPSJ	SAO JORGE	1

## Romania: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LRBC	BACAU/BACAU	2
LRBM	BAIA MARE/BAIA MARE	1
LRCK	CONSTANTA/MIHAIL KOGALNICEANU-CONSTANTA	1
LRCL	CLUJ NAPOCA/CLUJ NAPOCA	2
LRCV	CRAIOVA/CRAIOVA	1
LRIA	IASI/IASI	2
LROD	ORADEA/ORADEA	1
LROP	BUCURESTI/HENRI COANDA	3
LRSB	SIBIU/SIBIU	2
LRSM	SATU MARE/SATU MARE	0
LRSV	SUCEAVA/STEFAN CEL MARE-SUCEAVA	0
LRTM	TARGU MURES/TRANSILVANIA-TARGU MURES	2
LRTR	TIMISOARA/TRAIAN VUIA	2

## Slovenia: List of Community airports

ICAO	Airport	Airport category for the 2016
Airport Code	Name	data provision
IJIJ	LJUBLJANA/BRNIK	2

## Slovakia: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LZIB	BRATISLAVA/M.R.STEFANIK	3
LZKZ	KOSICE	2
LZPP	PIESTANY	0
LZSL	SLIAC	1
LZTT	POPRAD-TATRY	1
LZZI	ZILINA	0

## Finland: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EFET	ENONTEKIO	1
EFHA	HALLI	0
EFHF	HELSINKI-MALMI	0
EFHK	HELSINKI/VANTAA	3
EFIV	IVALO	1
EFJO	JOENSUU	1
EFJY	JYVASKYLA	1
EFKA	KAUHAVA	0
EFKE	KEMI-TORNIO	1
EFKI	KAJAANI	1
EFKK	KOKKOLA-PIETARSAARI	1
EFKS	KUUSAMO	1
EFKT	KITTILA	2
EFKU	KUOPIO	2
EFLP	LAPPEENRANTA	1
EFMA	MARIEHAMN	1
EFOU	OULU	2
EFPO	PORI	1
EFRO	ROVANIEMI	2
EFSA	SAVONLINNA	0
EFTP	TAMPERE-PIRKKALA	2
EFTU	TURKU	2
EFUT	UTTI	0
EFVA	VAASA	2
EFVR	VARKAUS	0

## Sweden: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
ESDF	RONNEBY	2
ESGG	GOTEBORG/LANDVETTER	3
ESGJ	JONKOPING	1
ESGP	GOTEBORG/SAVE	2
ESGT	TROLLHATTAN-VANERSBORG	1
ESKN	STOCKHOLM/SKAVSTA	3
ESMK	KRISTIANSTAD	1
ESMQ	KALMAR	2
ESMS	MALMO	3
ESMT	HALMSTAD	1
ESMX	VAXJO/KRONOBERG	2
ESNG	GALLIVARE	1
ESNK	KRAMFORS-SOLLEFTEA	1
ESNL	LYCKSELE	1
ESNN	SUNDSVALL-HARNOSAND	2
ESNO	ORNSKOLDSVIK	1
ESNQ	KIRUNA	2
ESNS	SKELLEFTEA	2
ESNU	UMEA	2
ESNX	ARVIDSJAUR	1
ESNZ	ARE OSTERSUND	2
ESOE	OREBRO	2
ESOK	KARLSTAD	1
ESOW	STOCKHOLM/VASTERAS	2
ESPA	LULEA/KALLAX	2
ESSA	STOCKHOLM/ARLANDA	3
ESSB	STOCKHOLM/BROMMA	3
ESSD	BORLANGE	1
ESSL	LINKOPING/SAAB	1
ESSP	NORRKOPING/KUNGSANGEN	1
ESSV	VISBY	2
ESTA	ANGELHOLM	2

## United Kingdom: List of Community airports

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
EGAA	BELFAST/ALDERGROVE	3
EGAC	BELFAST/CITY	3
EGAE	LONDONDERRY/EGLINTON	2
EGBB	BIRMINGHAM	3
EGBE	COVENTRY	1
EGBJ	GLOUCESTERSHIRE	1
EGCC	MANCHESTER	3
EGCN	DONCASTER SHEFFIELD	2
EGEC	CAMPBELTOWN	0
EGET	LERWICK/TINGWALL	0
EGFF	CARDIFF	2

EGFH	SWANSEA	0
EGGD	BRISTOL	3
EGGP	LIVERPOOL	3
EGGW	LONDON/LUTON	3
EGHC	LANDS END/ST JUST	1
EGHE	SCILLY ISLES/ST MARYS	1
EGHH	BOURNEMOUTH	2
EGHI	SOUTHAMPTON	3
EGHQ	NEWQUAY	2
EGKA	SHOREHAM	0
EGKB	BIGGIN HILL	0
EGKK	LONDON/GATWICK	3
EGLC	LONDON/CITY	3
EGLL	LONDON/HEATHROW	3
EGLW	LONDON HELIPORT	0
EGMC	SOUTHEND	2
EGMD	LYDD	0
EGMH	MANSTON	1
EGNC	CARLISLE	0
EGNH	BLACKPOOL	2
EGNJ	HUMBERSIDE	2
EGNM	LEEDS BRADFORD	3
EGNR	HAWARDEN	0
EGNT	NEWCASTLE	3
EGNV	DURHAM TEES VALLEY	1
EGNX	EAST MIDLANDS	3
EGPA	KIRKWALL	2
EGPB	SUMBURGH	2
EGPC	WICK	1
EGPD	ABERDEEN/DYCE	3
EGPE	INVERNESS	2
EGPF	GLASGOW	3
EGPH	EDINBURGH	3
EGPI	ISLAY	1
EGPK	PRESTWICK	2
EGPL	BENBECULA	1
EGPM	SCATSTA	2
EGPN	DUNDEE	1
EGPO	STORNOWAY	1
EGPR	BARRA	0
EGPU	TIREE	0
EGSC	CAMBRIDGE	1
EGSH	NORWICH	2
EGSS	LONDON/STANSTED	3
EGTE	EXETER	2
EGTK	OXFORD/KIDLINGTON	0

## LIST OF AIRPORTS FOR CANDIDATE COUNTRIES

## Former Yugoslav Republic of Macedonia: List of airports on the basis of 2014 data

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LWOH	OHRID	1
LWSK	SKOPJE	2

## Turkey: List of airports on the basis of 2014 data

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LTAC	ANKARA/ESENBOGA	3
LTAF	ADANA	3
LTAI	ANTALYA (CIV/MIL)	3
LTAJ	GAZIANTEP	3
LTAL	KASTAMONU/UZUNYAZI	1
LTAN	KONYA (MIL-CIV)	2
LTAP	AMASYA/MERZIFON (MIL-CIV)	1
LTAR	SIVAS (MIL/CIV)	2
LTAS	ZONGULDAK/CAYCUMA	1
LTAT	MALATYA/ERHAC (MIL/CIV)	2
LTAU	KAYSERI/ERKILET (MIL-CIV)	3
LTAW	ΤΟΚΑΤ	1
LTAY	DENIZLI/CARDAK (MIL-CIV)	2
LTAZ	NEVSEHIR/KAPADOKYA	2
LTBA	ISTANBUL/ATATURK	3
LTBD	AYDIN/CILDIR (MIL)	0
LTBF	BALIKESIR (MIL-CIV)	0
LTBH	CANAKKALE (MIL-CIV)	1
LTBJ	IZMIR/ADNAN MENDERES	3
LTBO	USAK	0
LTBQ	IZMIT/TOPEL (MIL-CIV)	0
LTBR	BURSA/YENISEHIR (MIL-CIV)	1
LTBS	MUGLA/DALAMAN (MIL.CIV.)	3
LTBU	TEKIRDAG/CORLU (MIL-CIV)	1
LTBY	ESKISEHIR/ANADOLU	1
LTBZ	MANISA	1
LTCA	ELAZIG (MIL-CIV)	2
LTCC	DIYARBAKIR (CIVIL/MIL)	3
LTCD	ERZINCAN (MIL-CIV)	2
LTCE	ERZURUM (CIV/MIL)	2
LTCF	KARS	2
LTCG	TRABZON	3

LTCI	VAN/ FERIT MELEN	2
LTCJ	BATMAN (MIL-CIV)	2
LTCK	MUS (MIL-CIV)	2
LTCL	SIIRT	1
LTCM	SINOP	1
LTCN	KAHRAMANMARAS	2
LTCO	AGRI	2
LTCP	ADIYAMAN	2
LTCR	MARDIN	2
LTCS	SANLIURFA/GAP	2
LTCT	IGDIR AIRPORT	2
LTCU	BINGOL	1
LTCV	SIRNAK/SERAFETTIN ELCI	2
LTDA	HATAY (CIV)	2
LTFC	ISPARTA/S.DEMIREL	2
LTFD	BALIKESIR/KORFEZ	2
LTFE	MUGLA/MILAS-BODRUM	3
LTFG	ANTALYA/GAZIPASA	2
LTFH	SAMSUN/CARSAMBA	3
LTFJ	ISTANBUL/SABIHA GOKCEN	3
LTFK	GÖKÇEADA HAVAALANI	0

## LIST OF AIRPORTS FOR OTHER PARTICIPATING COUNTRIES

## Iceland : List of airports on the basis of 2014 data

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
BIKF	KEFLAVIK APP/TWR OPS MET	3

## Norway : List of airports on the basis of 2014 data

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
ENAL	ALESUND/VIGRA	2
ENAN	ANDENES/ANDOYA	1
ENAT	ALTA	2
ENBL	FORDE/BRINGELAND	1
ENBN	BRONNOYSUND/BRONNOY	2
ENBO	BODO	3
ENBR	BERGEN/FLESLAND	3
ENBS	BATSFJORD	1
ENBV	BERLEVAG	1
ENCN	KRISTIANSAND/KJEVIK	2
ENDU	BARDUFOSS	2
ENEV	HARSTAD/NARVIK/EVENES	2
ENFG	FAGERNES/LEIRIN	0
ENFL	FLORO	1
ENGM	OSLO/GARDERMOEN	3
ENHD	HAUGESUND/KARMOY	2
ENHF	HAMMERFEST	2
ENHK	HASVIK	1
ENHT	HATTFJELLDAL/VOLLEN	0
ENHV	HONNINGSVAG/VALAN	1
ENKB	KRISTIANSUND/KVERNBERGET	2
ENKR	KIRKENES/HOYBUKTMOEN	2
ENLK	LEKNES	1
ENMH	MEHAMN	1
ENML	MOLDE/ARO	2
ENMS	MOSJOEN/KJAERSTAD	1
ENNA	LAKSELV/BANAK	1
ENNK	NARVIK/FRAMNES	1
ENNM	NAMSOS	1
ENNO	NOTODDEN	0
ENOL	ORLAND	0
ENOV	ORSTA-VOLDA/HOVDEN	1
ENRA	MO I RANA/ROSSVOLL	1
ENRM	RORVIK/RYUM	1

ENRO	ROROS	1
ENRS	ROST	1
ENRY	MOSS/RYGGE	3
ENSB	SVALBARD/LONGYEAR	2
ENSD	SANDANE/ANDA	1
ENSG	SOGNDAL/HAUKASEN	1
ENSH	SVOLVAER/HELLE	1
ENSK	STOKMARKNES/SKAGEN	1
ENSN	SKIEN/GEITERYGGEN	1
ENSO	STORD/SORSTOKKEN	1
ENSR	SORKJOSEN	1
ENSS	VARDO/SVARTNES	1
ENST	SANDNESSJOEN/STOKKA	1
ENTC	TROMSO/LANGNES	3
ENTO	SANDEFJORD/TORP	3
ENUL	OS/VAKSINEN	1
ENVA	TRONDHEIM/VAERNES	3
ENVD	VADSO	1
ENVR	VAEROY	0
ENZV	STAVANGER/SOLA	3

## Switzerland : List of airports on the basis of 2014 data

ICAO Airport Code	Airport Name	Airport category for the 2016 data provision
LSGG	GENEVA	3
LSGS	SION	0
LSZA	LUGANO	1
LSZB	BERN-BELP	2
LSZH	ZURICH	3
LSZM	BASEL	3
LSZR	ST. GALLEN-ALTENRHEIN	1

# ANNEX VII: Glossary on air transport statistics

## F. AIR TRANSPORT

## F.I. INFRASTRUCTURE

#### F.I-01 Airport

A defined area of land or water (including any buildings, installations and equipment) intended to be used either wholly or in part for the arrival, departure and surface movement of aircraft and open for commercial air transport operations.

Most airports have a 4-letter ICAO code as listed in the ICAO Document 7910. Most but not all also have codes allocated by IATA.

#### F.I-02 International Airport

Any airport designated by the State in the territory of which it is situated as an airport of entry and departure for international air traffic, where the formalities incidental to customs, immigration, public health, agricultural quarantine and similar procedures are carried out, whether such facilities are provided on a full time or part time basis.

#### F.I-03 Domestic Airport

Any airport not designated to handle international traffic

#### F.I-04 Airport Terminal

A self contained facility for handling passengers and/or freight

- Passenger terminal

An airport terminal with facilities for the handling of passengers, including passenger check-in, baggage handling, security, immigration passenger boarding and disembarkation.

- Freight terminal

An airport terminal designed solely to handle freight shipments, including freight acceptance and release, secure storage, security and documentation.

#### F.I-05 Airport runways

A defined rectangular area on an airport prepared for the landing and take-off of aircraft with the following characteristics:

- Take-off run available

The length of runway declared available and suitable for the ground run of an aircraft taking off.

- Landing distance available

The length of runway which is declared available and suitable for the ground run of an aircraft landing.

#### F.I-06 Airport taxiways

A defined path on an airport established for the taxiing of aircraft and intended to provide a link between one part of the airport and another.

#### F.I-07 Check-in Facilities

- Conventional

A conventional check-in facility where airline staff handle ticket processing, luggage labelling, including fast bag drops, and issue of boarding cards directly.

- Self service check-in kiosks

A kiosk providing check-in facilities and offering automatic ticket processing, boarding cards and, in some cases, luggage label printing.

#### F.I-08 Passenger gates

An area of a passenger terminal where passengers gather prior to boarding their Aircraft.

a) With finger bridges (jetbridges or jetways)

A gate with a finger bridge connecting to the aircraft to allow boarding without descending to ground level and using steps to board

b) Other

Gates other than those with finger bridges

#### F.I-09 Airport car parking

Parking facilities provided at the airport.

- Short stay

Parking where the maximum permitted duration of stay is less than 24 hours.

- Medium and long stay (long term)

Parking where the maximum permitted duration of stay is 24 hours or more.

For remote parking facilities, only those served by airport buses should be included.

#### F.I-10 Intermodal freight facilities

A freight terminal within the airport with connections to modes other than road on its landside

#### F.I-11 Connections to other modes of transport

Facilities provided within the airport for connection to the following modes of surface transport

a) High speed rail

Access to high speed rail services

b) Main line rail

Access to main line rail services

c) Metro

Access to city metro and underground services

d) Inter urban bus services

Access to express and inter urban coach services

e) City bus services

Access to local bus services

## F.II. TRANSPORT EQUIPMENT (AIRCRAFT)

#### F.II-01 Aircraft

Any machine that can derive support in the atmosphere from the reactions of the air other than the reactions of air against the earth's surface

Dirigibles and surface effect vehicles such as hovercraft are excluded. ICAO provides aircraft type designators in ICAO Document 8643. In addition, ICAO and the Commercial Aviation Safety team (CAST) have jointly developed a new taxonomy to correctly identify aircraft. Details are available on the following website: <u>http://www.intlaviationstandards.org/</u>.

#### F.II-02 Aviation fleet

Aircraft registered at a given date in a country

#### F.II-03 Operating fleet

Operating Fleet includes all aircraft in service for commercial purposes (including all aircraft that are temporarily unserviceable due to major accidents, conversions, government action such as grounding by government regulatory agencies).

Aircraft used solely for training and communications and private flying are not included in the operating fleet.

#### F.II-04 Aircraft by configuration

a) Passenger aircraft

An aircraft configured for the transport of passengers and their baggage. Any freight, including mail, is generally carried in cargo holds in the belly of the aircraft.

b) Cargo aircraft

An aircraft configured solely for the carriage of freight and/or mail.

Persons accompanying certain kinds of cargo, such as livestock, may also be carried.

c) Combi aircraft

A passenger aircraft with enhanced capabilities for the carriage of freight on the passenger deck.

d) Quick change aircraft

An aircraft designed to allow a quick change of configuration from passenger to cargo and vice versa.

e) Other

An aircraft not used for commercial air transport.

#### F.II-05 Aircraft by noise characteristics

f) Non-noise certificated aircraft

Aircraft not certificated against international noise requirements

g) Chapter II aircraft

Aircraft meeting the ICAO Chicago Convention Annex 16 Chapter II specifications

h) Chapter III aircraft

Aircraft meeting the ICAO Chicago Convention Annex 16 Chapter III specifications

i) Chapter IV aircraft

Aircraft meeting the ICAO Chicago Convention Annex 16 Chapter IV specifications.

#### F.II-06 Aircraft age

Years since first registration of an aircraft.
### F.III. ENTERPRISES, ECONOMIC PERFORMANCE AND EMPLOYMENT

#### F.III-01 Enterprise

Institutional unit or smallest combination of institutional units that encloses and directly or indirectly controls all the necessary functions to carry out is production activities.

The requirements of an enterprise are that it has one ownership or control. It can, however, be heterogeneous with regard to its economic activity as well as to its location.

#### F.III-02 Airline (Commercial air transport operator)

An aviation enterprise operating aircraft for commercial purposes which (i) performs scheduled or non-scheduled air transport services, or both, which are available to the public for carriage of passengers, mail, and /or cargo and (ii) is certified for such purposes by the civil aviation authority of the state in which it is established.

ICAO provides a 3-letter air transport operator code as listed in ICAO Document 8585 and is required for all airlines operating international routes. A two-character airline designator is assigned by IATA in accordance with the provisions of IATA Resolution 762. The two-character airline designators are used for reservations, schedules, time tables, telecommunications, ticketing, cargo documentation, legal, tariffs, and/or other commercial/traffic purposes. In terms of activity classifications the following classes are involved:

ISIC Rev 4 Draft Division 51 Air transport NACE Rev 2 Division 51 Air transport

#### F.III-03 Airport operator

An air transport undertaking operating a commercial airport.

In terms of activity classifications the following classes are involved:

ISIC Rev 4 Draft Class 5223 Service activities incidental to air transport NACE Rev 2 Class 5223 Service activities incidental to air transport.

#### F.III-04 Air traffic control provider

An air transport undertaking providing air traffic control services In terms of activity classifications the following classes are involved:

ISIC Rev 4 Draft Class 5223 Service activities incidental to air transport NACE Rev 2 Class 5223 Service activities incidental to air transport.

#### F.III-05 Airport services provider

An undertaking providing airport services such as aircraft ground handling, fuelling, maintenance and security, passenger services such as check in, baggage handling, cargo handling and other services.

In terms of activity classifications the following classes are involved:

ISIC Rev 4 Draft	Class 5223 Service activities incidental to air transport
	Class 5224 Cargo handling
NACE Rev 2	Class 52.23 Service activities incidental to air
	Class 52.24 Cargo handling

#### F.III-06 Turnover

Total amount invoiced by the air transport enterprise during the period under review. This total corresponds to market sales of services or goods supplied to third parties. Included in turnover is "other operating income" e.g. income from concessions, franchise arrangements, patents, trademarks and similar values. Turnover includes all duties and taxes on the goods or services invoiced by the enterprise with the exception of VAT invoiced by the enterprise vis-à-vis its customers. It also includes all other charges to customers. Reductions in prices, rebates and discounts must be deducted, but not cash discounts.

Turnover includes only ordinary activities and hence does not include sales of fixed assets. Operating subsidies received from public authorities are also excluded.

#### F.III-07 Maintenance costs – airports

Expenditure necessary to sustain airport operations by maintaining the fixed infrastructure and essential equipment. Examples are runway maintenance, upkeep of baggage handling equipment and freight handling equipment.

#### F.III-08 Maintenance costs – aircraft

Expenditure necessary to maintain aircraft and their engines in an airworthy condition.

This includes routine maintenance of the airframe and engines, whether or not this is conducted in-house or sub-contracted.

#### F.III-09 Employment

Employment is the number of persons employed, i.e. the total number of persons who work in the enterprise (inclusive of working proprietors, partners working regularly in the enterprise and unpaid family workers), as well as persons who work outside the enterprise who belong to it and are paid by it (e.g. sales representatives, delivery personnel, repair and maintenance teams). It includes persons absent for a short period (e.g. sick leave, paid leave or special leave), and also those on strike, but not those absent for an indefinite period. It also includes part-time workers who are regarded as such under the laws of the country concerned and who are on the pay-roll, as well as seasonal workers, apprentices and home workers on the pay-roll.

The number of persons employed excludes manpower supplied to the enterprise by other enterprises, persons carrying out repair and maintenance work in the enquiry enterprise on behalf of other enterprises, as well as those on compulsory military service. On the other hand, persons who are at the disposal of an enterprise for commercial reasons on the basis of a long term contract (i.e. demonstrators in department stores) should be included as employees of the enterprise where they work rather than in the enterprise with which they have their employment contract.

The number of persons employed corresponds to the annual average number of persons employed.

#### F.III-10 Types of employment

a) General administration

Includes central and regional management staff (e.g. finance, legal, personnel etc.) and boards of directors.

The management staff of specialist departments (operations and traffic, aircraft, air traffic control, runway and terminal construction and maintenance, emergency services) are excluded but are taken into account in the statistics specific to each of these services.

b) Operations and traffic

Cabin and ground crews (excluding flight deck staff) and associated central and regional offices. Includes tourism, advertising and terminal operations.

c) Aircraft

Flight deck staff, maintenance and inspection staff and associated central and regional offices.

d) Airports

Air traffic control staff, terminals, runway and other airport facilities construction, maintenance and supervision staff, ground handling staff, emergency services staff.

e) Other operations

Passenger and freight services, freight shipment services etc.

## F.IV. TRAFFIC

#### F.IV-01 Aircraft movement

An aircraft take-off or landing at an airport.

For airport traffic purposes one arrival and one departure is counted as two movements. Included are all commercial aircraft movements and non-commercial general aviation operations. Excluded are State flights, touch and goes, overshoots and unsuccessful approaches.

#### F.IV-02 Commercial aircraft movement

An aircraft movement performed for remuneration or for hire.

Includes commercial air service movements and commercial general aviation operations.

#### F.IV-03 Aircraft departure

A take-off of an aircraft.

#### F.IV-04 Aircraft arrival

An aircraft landing.

#### F.IV-05 Revenue stop

A traffic stop for purpose of taking on and/or taking off revenue load.

#### F.IV-06 Non-revenue stop

A stop other than a revenue stop.

Such stops include stops of positioning flights, state flights, training flights and technical stops.

#### F.IV-07 Diversion

An aircraft landing at an airport other than the one in the aircraft's flight plan because of operational or technical difficulties either on the aircraft or at the destination airport.

Diversions may be caused by passenger misbehaviour, aircraft technical problems, bad weather conditions, accidents or other emergencies at the planned destination airport.

#### F.IV-08 Airport pair

An airport pair is defined as two airports between which travel is authorised by a passenger ticket or part of a ticket, or between which freight and mail shipments are made in accordance with a shipment document or part of it (air waybill or mail delivery bill).

#### F.IV-09 Airport-to-airport distance

For statistical purposes, airport-to-airport distance means the airport-to-airport great circle distance in kilometres.

The measurement is based on airport co-ordinates and a great circle calculation formula.

#### F.IV-10 City pair - On flight origin/destination (OFOD)

Two cities between which travel is authorized by a passenger ticket or part of a ticket or between which freight and mail shipments are made in accordance with a shipment document or a part of it (air waybill or mail delivery bill).

In common usage, city pair is sometimes used interchangeably with airport pair.

#### F.IV-11 Flight stage (FS)

The operation of an aircraft from take-off to its next landing.

Technical stops are not included.

#### F.IV-12 Domestic flight stage

Any flight stage flown between points within the domestic boundaries of a State.

Flight stages between a State and territories belonging to it, as well as any flight stages between such territories should be classified as domestic.

#### F.IV-13 International flight stage

A flight stage where the take off is in one country and the next landing is in another country.

#### F.IV-14 Flight

The operation of an aircraft on one or more flight stages, using a single flight number, assigned by the airline.

#### F.IV-15 Domestic flight

A flight having exclusively domestic flight stages, all using the same flight number.

#### F.IV-16 International flight

A flight having one or more international flight stages, where all flight stages use the same flight number.

#### F.IV-17 Commercial air flight

An air transport flight performed for the public transport of passengers and/or freight and mail, for remuneration and for hire.

#### F.IV-18 Commercial air service

An air transport flight or series of flights for the public transport of passengers and/or freight and mail, for remuneration or for hire.

The air service may be either scheduled or non-scheduled.

#### F.IV-19 Scheduled air service

A commercial air service operated according to a published timetable, or with such a regular frequency that it constitutes an easily recognisable systematic series of flights.

Includes extra section flights occasioned by overflow traffic from scheduled flights.

#### F.IV-20 Non-scheduled air service

A commercial air service other than scheduled air service.

#### F.IV-21 Passenger air service

Scheduled or non-scheduled air service performed by aircraft carrying one or more revenue passengers and any flights listed in published timetables as open to passengers.

Includes flights carrying both revenue passengers and revenue freight and mail.

#### F.IV-22 All-freight and mail air service

Scheduled or non-scheduled air service performed by aircraft carrying revenue loads other than revenue passengers, i.e. freight and mail.

Excludes flights carrying one or more revenue passengers and flights listed in published timetables as open to passengers. Air freight and air mail combined are sometimes referred to as air cargo.

#### F.IV-23 General aviation operations – commercial

All commercial civil aviation operations other than scheduled air services and non-scheduled air transport operations for remuneration or hire. The main categories of commercial general aviation are as follows:

- a) Air taxi
- b) Photographic
- c) Sightseeing trips
- d) Advertising
- e) Agricultural/crop spraying
- f) Medical/air ambulance trips
- g) Other commercial.

#### F.IV-24 General aviation operations – non-commercial

All non-commercial civil aviation operations other than scheduled air services and nonscheduled air transport operations for remuneration or hire. The main categories of noncommercial general aviation are as follows:

a) State Flight

Any flight performed by aircraft for military, customs, police or other law enforcement services of a State. Any flight declared as a "State flight" by State authorities.

- b) Instructional flying
- c) Private flying
- d) Business flying
- e) Parachute and glider launch flights
- f) Technical stops
- g) Test flight

A non-commercial flight carried out for the purpose of testing the aircraft prior to placing it in operational service

h) Positioning flight

A non-commercial flight carried out to position an aircraft for a scheduled or non-scheduled flight or service.

i) Other non-commercial.

#### F.IV-25 Flight number (aircraft)

A flight number is the primary published flight number assigned by the air transport operator to the flight. Passengers using a flight by an aircraft may be travelling under a range of different flight numbers. Only the active flight number for the flight is in question here.

#### F.IV-26 Code sharing

The use of one operator's flight number for services/flights provided by other operators.

For statistical purposes, the traffic is assigned to the operating carrier, the flight number for which is used by air traffic control.

#### F.IV-27 Block-to-block time

The total time measured in hours and minutes measured from the aircraft's initial move from its departure point until its final stop at its arrival point.

#### F.IV-28 Aircraft hours

An aircraft hour is said to be performed when an aircraft operates for one hour. Aircraft hours are measured on the basis of block-to-block time.

#### F.IV-29 Average daily aircraft utilisation - revenue hours

Total revenue hours (scheduled plus charter) flown by aircraft type (block to block) during a period divided by the related number of aircraft days available. "Aircraft days available" shall be the sum of the number of days each aircraft is available for use during the period in question. The following days should be excluded from the days available:

- a) Days between the date of purchase and the date actually placed in service
- b) Days after its last revenue flight prior to disposal
- c) Days out of service due to major accidents or conversion
- d) Days when an aircraft is in the possession of others or not available due to government action such as grounding by government regulatory agencies.

All other days must be considered as "days available", including days required for maintenance or overhaul.

#### F.IV-30 Aircraft kilometres performed

Aircraft kilometres equal the sum of the products obtained by multiplying the number of flights performed on each flight stage by the airport-to-airport distance.

#### F.IV-31 Passenger seats available

The total number of passenger seats available for sale on an aircraft operating a flight stage between a pair of airports.

Includes seats which are already sold on a flight stage i.e. including those occupied by direct transit passengers. Excludes seats not actually available for the carriage of passengers because of maximum

gross weight limitations.

#### F.IV-32 Seat-kilometre offered

Unit of measurement representing the movement of one seat available in a passenger aircraft when performing the services for which it is primarily intended over one kilometre.

The distance to be considered is that actually travelled. Shunting and other similar movements are excluded.

#### F.IV-33 Tonne-kilometre offered

Unit of measurement representing the movement of one tonne of payload available in an aircraft when performing services for which it is primarily intended over one kilometre.

The distance to be considered is that actually travelled.

## F.V. TRANSPORT MEASUREMENT

#### F.V-01 Air transport

Any movement of goods and/or passengers on an aircraft movement.

#### F.V-02 Commercial air transport

Any movement of goods and/or passengers on a commercial aircraft movement.

#### F.V-03 National air transport

Air transport on a domestic flight.

#### F.V-04 International air transport

Air transport on an international flight.

#### F.V-05 On flight origin and destination (OFOD)

Traffic on a commercial air service identified by a unique flight number subdivided by airport pairs in accordance with point of embarkation and point of disembarkation on that flight.

For passengers, freight or mail, where the airport of embarkation is not known, the aircraft origin should be deemed to be the point of embarkation; similarly if the airport of disembarkation is not known, the aircraft destination should be deemed to be the point of disembarkation.

#### F.V-06 Air Passenger

Any person, excluding on-duty members of the flight and cabin crews, who makes a journey by air.

Infants in arms are included.

#### F.V-07 Revenue air passenger

A commercial passenger for whose transportation an air carrier receives commercial remuneration.

This definition includes, for example, (i) passengers travelling under publicly available promotional offers (for example "two-for-one") or loyalty programmes (for redemption of frequent flier points); (ii) passengers travelling as compensation for denied boarding; (iii) passengers travelling under corporate discounts; (iv) passengers travelling under preferential fares (government, seamen, military, youth student etc.);

This definition excludes, for example, (i) persons travelling free; (ii) persons travelling at a fare or discount available only to employees of air carriers or their agents or only for the business of the carriers; (iii) infants who do not occupy a seat.

#### F.V-08 Non-revenue air passenger

Passengers other than revenue passengers.

#### F.V-09 Air passengers carried

All passengers on a particular flight (with one flight number) counted once only and not repeatedly on each individual stage of that flight.

All revenue and non revenue passengers whose journey begins or terminates at the reporting airport and transfer passengers joining or leaving the flight at the reporting airport. Excludes direct transit passengers.

#### F.V-10 Terminating passengers

Passengers starting or ending their trip at the designated airport.

#### F.V-11 Direct transit passengers

Passengers who, after a short stop, continue their journey on the same aircraft on a flight having the same flight number as the flight on which they arrive. Passengers who change aircraft because of technical problems but continue on a flight with the same flight number are counted as direct transit passengers.

On some flights with intermediate stops, the flight number changes at an airport to designate the change between an inbound and outbound flight. Where passengers for an intermediate destination continue their journey on the same aircraft in such circumstances, they should be counted as direct transit passengers.

#### F.V-12 Transfer or indirect transit passengers

Passengers arriving and departing on a different aircraft within 24 hours, or on the same aircraft bearing different flight numbers. They are counted twice: once upon arrival and once on departure.

On some flights with intermediate stops, the flight number changes at an airport to designate the change between an inbound and outbound flight. Where passengers for an intermediate destination continue their journey on the same aircraft, they should not be counted as transfer or indirect transit passengers at the airport where the flight number is changed.

#### F.V-13 Terminal passengers

Total of terminating and transfer passengers.

#### F.V-14 Air passengers on board

All passengers on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport.

All revenue and non revenue passengers on board an aircraft during a flight stage. Includes direct transit passengers.

#### F.V-15 Passenger-kilometre

A passenger kilometre is performed when a passenger is carried for one kilometre.

#### F.V-16 Passenger load factor

Passenger-kilometres expressed as a percentage of available seat kilometres.

#### F.V-17 Passenger-kilometres flown by flight stage

The sum of the products obtained by multiplying the number of passengers carried on each flight stage by the airport-to-airport distance.

#### F.V-18 Passenger-kilometres flown by on-flight origin/ destination airports

The product of multiplying the number of passengers flown between two airports as initial origin and final destination by the airport-to-airport distance.

#### F.V-19 Passenger tonne-kilometres performed

The result obtained by multiplying the passenger kilometres flown by the weight of each of the passengers including both free and excess baggage.

Each air transport operator can use its own internal passenger weights or the standard 100kgs (baggage included).

#### F.V-20 Baggage

Personal property of passengers and crew loaded or carried on board an aircraft by agreement with the operator.

#### F.V-21 Freight

Any property carried on an aircraft other than mail, stores and baggage.

For statistical purposes, freight includes express freight and parcels and diplomatic bags but not passenger baggage. All trucking operations using an air waybill should be excluded.

#### F.V-22 Gross-Gross Weight of goods

The total weight of the goods carried, all packaging, and the tare weight of the transport unit (e.g. air container).

#### F.V-23 Gross Weight of goods

The total weight of the goods carried, including packaging but excluding the tare weight of transport units (e.g. air container).

#### F.V-24 Tare Weight

The weight of a transport unit (e.g. air container) before any cargo is loaded.

#### F.V-25 Freight loaded or unloaded

Any freight loaded onto or unloaded from an aircraft.

Direct transit freight is excluded.

#### F.V-26 Freight on board

All freight on board an aircraft upon landing at an airport and at take off from an airport.

Direct transit freight is included and it is counted at both landing and take off.

#### F.V-27 Freight tonne-kilometres performed by flight stage

A tonne-kilometre is a metric tonne of freight revenue load carried one kilometre. Tonnekilometres performed is obtained by multiplying the total number of tonnes of freight revenue load carried on the flight stage by the airport-to-airport distance.

#### F.V-28 Freight tonne-kilometres performed by on-flight origin/ destination airports

A tonne-kilometre is a metric tonne of freight revenue load carried one kilometre. Tonnekilometres performed is obtained by multiplying the total number of tonnes of freight revenue load carried between two airports as initial origin and final destination by airport-to-airport distance.

#### F.V-29 Mail

Dispatches of correspondence and other objects carried on an aircraft, which have been dispatched by and intended for delivery to postal administrations.

Express freight and express parcel shipments are excluded.

#### F.V-30 Mail loaded and unloaded

Any mail loaded onto or unloaded from an aircraft.

Direct transit mail is excluded.

#### F.V-31 Mail on board

All mail on board during each flight stage, including mail loaded and direct transit mail.

#### F.V-32 Diplomatic bag

A mail pouch used by governments to send official letters and dispatches.

#### F.V-33 Mail tonne-kilometres performed by flight stage

A tonne-kilometre is a metric tonne of mail revenue load carried one kilometre. Tonnekilometres performed is obtained by multiplying the total number of tonnes of mail revenue load carried on each sector of a flight by airport-to-airport distance.

#### F.V-34 Mail tonne-kilometres performed by on-flight origin/ destination airports

A tonne-kilometre is a metric tonne of mail revenue load carried one kilometre. Tonnekilometres performed is obtained by multiplying the total number of tonnes of mail revenue load carried between two airports as initial origin and final destination by airport-to-airport distance.

#### F.V-35 Total freight/mail

The sum of the total freight and mail, both loaded and unloaded, at the reporting airport. All trucking operations using an air waybill should be excluded.

Freight and mail together are sometimes referred to as cargo.

#### F.V-36 Categories of goods carried by air

Goods in transport may be classified according to type.

Examples of classification schemes are NST 2007 (Standard Goods Nomenclature for Transport Statistics) that replaces the CSTE nomenclature (Commodity Classification for Transport Statistics in Europe - UNECE) and the NST/R nomenclature (Standard Goods Nomenclature for Transport Statistics/revised - Eurostat).

#### F.V-37 Dangerous goods

The classes of dangerous goods carried by Air are those defined by the fifteenth revised edition of the UN Recommendations on the Transport of Dangerous Goods, United Nations, Geneva 2007.

- Class 1: Explosives
- Class 2: Gases
- Class 3: Flammable liquids
- Class 4: Flammable solids; substances liable to spontaneous combustion; substances which, on contact with water, emit flammable gases
- Class 5: Oxidizing substances and organic peroxides
- Class 6: Toxic and infectious substances
- Class 7: Radioactive material
- Class 8: Corrosive substances
- Class 9: Miscellaneous dangerous substances and articles.

#### F.V-38 Payload carried

The revenue load of passengers, baggage, freight and mail carried in the aircraft as measured in metric tonnes.

#### F.V-39 Revenue tonne-kilometres performed

A tonne-kilometre is a metric tonne of revenue load carried one kilometre. Tonne-kilometres performed equals the sum of the products obtained by multiplying the total number of tonnes of each category of revenue load carried on each sector of a flight by airport-to-airport distance.

#### F.V-40 Weight load factor

Total revenue tonne-kilometres performed expressed as a percentage of available tonne-kilometres.

# F.VI. ENERGY CONSUMPTION

#### F.VI-01 Energy consumption by air transport

Final energy consumed by aircraft for propulsion, power and heating.

#### F.VI-02 Tonne of oil equivalent (TOE)

Unit of measurement of energy consumption: 1 TOE = 0.041868 TJ. The conversion factor adopted by the International Energy Agency (IEA) for kerosene is the following:

- Kerosene 1.045.

### F.VI-03 Joule

Unit of measurement of energy consumption:

1 terajoule =  $10^{12}$  J = 2.78 x  $10^{5}$  kWh, 1 terajoule = 23.88459 TOE.

### F.VII. AVIATION ACCIDENTS

#### F.VII-01 Accident

An occurrence associated with the operation of an aircraft which takes place between the time any person boards the aircraft with the intention of flight until such time as all such persons have disembarked, in which one of the following applies:

a) A person is fatally or seriously injured.

Where this is as a result of being in the aircraft, or direct contact with any part of the aircraft, including parts which have become detached from the aircraft, or direct exposure to jet blast, except when the injuries are from natural causes, self inflicted or inflicted by other persons, or when the injuries are to stowaways hiding outside the areas normally available to the passengers and crew.

b) The aircraft sustains damage or structural failure.

Where this adversely affects the structural strength, performance or flight characteristics of the aircraft, and would normally require major repair or replacement of the affected component, except for engine failure or damage. When the damage is limited to the engine, its cowlings or accessories: or for damage limited to propellers, wing tips, antennas, tires, brakes, fairings, small dents or puncture holes in the aircraft skin.

c) The aircraft is missing or is completely inaccessible.

An aircraft is considered to be missing when the official search has been terminated and the wreckage has not been located.

#### F.VII-02 Incident

An occurrence, other than an accident, associated with the operation of an aircraft which affects or could affect the safety of operation.

#### F.VII-03 Serious incident

An incident involving circumstances indicating that an accident nearly occurred.

The difference between an accident and a serious incident lies only in the result. Examples of serious incidents can be found in the ICAO Accident/Incident Reporting Manual.

#### F.VII-04 Fatal injury

An injury resulting in death within thirty days of the date of the accident is classified as a fatal injury.

#### F.VII-05 Non-fatal injury

An injury, other than a fatal injury, which is sustained by a person in an accident.

#### F.VII-06 Serious injury

A non-fatal injury which is sustained by a person in an accident and which:

- a) Requires hospitalization for more than 48 hours, commencing within seven days from the date the injury was received: or
- b) Results in a fracture of any bone (except simple fractures of fingers. toes, or nose): or
- c) Involves lacerations which cause severe haemorrhage, nerve, muscle or tendon damage: or
- d) Involves injury to any internal organ: or
- e) Involves second or third degree burns, or any burns affecting more than 5 per cent of the body surface: or
- f) Involves verified exposure to infectious substances or injurious radiation.

#### F.VII-07 Slight injury

A non-fatal injury, other than a serious injury, which is sustained by a person in an accident.

#### F.VII-08 State of occurrence.

The State in the national territory of which an accident or incident occurs.

#### F.VII-09 State of the operator.

The State in which the operator's principal place of business is located or, if there is no such place of business, the operators permanent residence.

#### F.VII-10 State of registry.

The State on whose register the aircraft is entered.

#### F.VII-11 Accident on national territory

An accident on the national territory of a state

#### F.VII-12 An accident on a nationally registered aircraft

An accident involving an aircraft on the national aircraft register of a state.

ANNEX VIII : Updated list of country codes The list of reporting country codes presented in Annex I to Regulation (EC) No 437/2003 has been amended in order to add the new Member states codes.

The final list is the following one:

Belgium	EB
Bulgaria	LB
Czech Republic	LK
Denmark	EK
Germany	ED
Estonia	EE
Ireland	EI
Greece	LG
Spain	LE
France	LF
Croatia	LD
Italy	LI
Cyprus	LC
Latvia	EV
Lithuania	EY
Luxembourg	EL
Hungary	LH
Malta	LM
Netherlands	EH
Austria	LO
Poland	EP
Portugal	LP
Romania	LR
Slovenia	IJ
Slovakia	LZ
Finland	EF
Sweden	ES
United Kingdom	EG

# Country codes for non-EU reporting countries:

The Former Yugoslav	LW
Republic of Macedonia	
Turkey	LT
Iceland	BI
Norway	EN
Switzerland	LS

# ANNEX IX :

Transmission format – Examples

Datasets A1, B1 and C1 can be transmitted each one following two formats described below.

The first format has 17 fields for datasets A1 and B1 and 18 fields for dataset C1, with empty fields when needed. The second format only contains the fields needed for the dataset concerned, in the regulation order.

Pos A1-B1	Pos C1		Format & size	-	Table	s
				A1	B1	C1
1	1	Table identification	an2	Х	Х	Х
2	2	Reporting country	a2	Х	Х	Х
3	3	Reference year	n2 or n4	Х	Х	Х
4	4	Reference period	an2	Х	Х	Х
5	5	Reporting airport	an4	Х	Х	Х
6	6	Partner airport	an4	Х	Х	
7	7	Arrival/departure	n1	Х	Х	
8	8	Scheduled/non scheduled services	n1	Х	Х	
9	9	Passenger flight / All-freight and mail flight	n1	Х	Х	
10	10	Airline information	an3	Х	Х	
11	11	Aircraft type	an4	Х		
12	12	Passengers	n12	X	X	X
13	13	Direct transit passengers	n12			X
	14	Transfer passengers	n12			X
14	15	Freight and mail	n12	X	X	X
15	16	Commercial air flights (table "A1") /	n12	X		X
		Total commercial aircraft movements (table "C1")				
16	17	Total aircraft movements	n12			X
17	18	Passenger seats available	n12	X		

"X": fields that have to be provided for a table,

" " (space): fields not relevant for the table. These fields should normally not be provided in the related tables. Nevertheless empty fields (2 fields separator without data between) are also acceptable in this case.

Grey shading: Field not counted when providing empty fields format.

For each dataset in the following examples present two cases:

Format 1 gives an example of record where the field not relevant for the tables have been kept empty Format 2 gives an example of record where the field not relevant for the tables have not been provided.

SDMX format is also presented as well as the CSV format that must be used to convert into SDMX.

#### Table A1 - Flight Stage Table (Monthly Data)



Format of record from the CSV file before conversion into SDMX:

M;A1;EV;EVRA;EBBR;1;1;1;1EU;B735;15\_01;131;0;2;206

Format SDMX record:

<air:Series FREQUENCY="M" TABLE="A1" COUNTRY="EV" AIRPORT="EVRA" PART\_AIRPORT="EBBR" DIRECTION="1" SCHEDULED="1" SERVICE="1" AIRLINE\_INFO="1EU" AIRCRAFT\_TYPE="B735"> <air:Obs TIME\_PERIOD="15\_01" OBS\_VALUE="131" FREIGHT\_MAIL="0" COMMERCIAL="2" SEATS\_AVAIL="206"/> </air:Series>

#### Table B1: Origin/Destination Table (Monthly Data)



Format of record from the CSV file before conversion into SDMX:

M;B1;EV;15;1;EVRA;EBBR;1;1;1;1EU;15\_01;2988;4

Format SDMX record:

</air:Series>

#### Table C1: Airport Table (Monthly Data)



ICAO Nomenclatures
Eurostat Nomenclatures
Data Values for Validation
Empty fields

#### Format of record from the CSV file before conversion into SDMX:

#### M;C1;EV;EVRA;15\_01;319462;900;73166;1172;4505;4811

Format SDMX record:

```
<air:Series FREQUENCY="M" TABLE="C1" COUNTRY="EV" AIRPORT="EVRA">
<air:Obs TIME_PERIOD="15_01" OBS_VALUE="319462" TRANS_PASSENGERS="900"
TRANSFER_PAX="73166" FREIGHT_MAIL="1172" COMMERCIAL="4505" MOVEMENTS="4811"/>
</air:Series>
```

#### Table C1: Airport Table (Old format without transfer passengers)





# ANNEX X :

List of validation rules

#### Are classified as errors:

- Invalid field separators or invalid number of fields or non authorized characters
- Duplicate key
- The data set id in the filename should be identical to the data set id in the record
- The data set id in the record should be coded on 2 positions
- Invalid data set id in the record
- The reporting country in the filename (ISO) is not consistent with the reporting country field in the record (ICAO)
- The reporting country should be coded on 2 positions
- Invalid reporting country (not in the ICAO nationality list)
- The year in the filename is different from the year in the record
- The year in the record should be coded on 2 or 4 digits
- The year should be >1996 & <2100
- The reference period in the filename is not consistent with the reference period field in the dataset
- The reference period should be coded on 2 positions
- Invalid reference period
- The reporting airport should be coded on 4 positions
- The reporting airport code is not consistent with the reporting country code
- The partner airport should be coded on 4 positions
- Invalid direction (arrival or departure). This should be coded on one position
- The field "Scheduled / Non Scheduled services" should be coded on 1 position
- Invalid "scheduled / Non scheduled services" field
- The field "passengers or freight and mail services" should be coded on one position
- Invalid "passengers or freight and mail services" field
- The number of passengers should be numeric
- The number of direct transit passengers should be numeric
- The tonnage of freight and mail should be numeric
- The numbers of flights (dataset A1) or of civil commercial aircraft movements (dataset C1) should be numeric
- The number of flights (for A1) is mandatory and should be greater than 0
- The total number of aircraft movements should be numeric
- The number of passenger seats available should be numeric

#### Are classified as warnings:

- Invalid reporting airport (not in the ICAO airport list)
- Invalid Partner airport (not in the ICAO list)
- The partner airport should in most of the cases be different than the reporting airport
- Airline code missing
- The airline code should be coded on 3 positions
- Invalid airline code
- Aircraft type missing
- The aircraft type should be coded on 4 positions maximum
- Invalid aircraft type code
- The number of passengers should in most cases be greater than zero in case of type of service passengers
- The numbers of passengers should in most cases be equal to zero or empty for type of service "freight and mail"
- The tonnage of freight and mail should in most cases be higher than zero for type of service "freight and mail"
- The number of commercial aircraft movements (for C1) is mandatory and should be greater than 0
- The number of passenger seats available should in most cases be greater or equal to the number of passengers
- The number of passenger seats available should be equal to zero or empty for type of service "freight and mail"
- The number of passenger seats available divided by the number of flights should be lower of equal to the maximum aircraft configuration (expressed in passenger seats available for this type of aircraft)

# ANNEX XI :

SDMX – User Guides



ESTAT/E-3

# **AIR TRANSPORT STATISTICS**

# IT DEVELOPMENTS: SDMX

# Table of Contents

1.	INTRODUCTION	4
2.	CREATING SDMX-ML FILES DIRECTLY FROM THE LOCAL IT SYSTEM	4
	<ul><li>2.1. Tools available for creating SDMX-ML files</li><li>2.2. Aviation DSDs and SDMX-ML structures</li></ul>	4 5
3.	HOW TO CONVERT CSV FILES INTO SDMX-ML USING THE CONVERTER	6
	3.1. Modifications of the original flat files	6
	3.2. Using the converter	7
	3.3. Resulting SDMX files	8

# 1. Introduction

This document provides information on the technical framework for introducing SDMX-ML transmission of aviation data from the Member States.

A migration towards a new format for data exchange is foreseen in order to support the validation (code and format) of data files before they are transmitted to Eurostat. This new format is SDMX-ML, a standard developed by the SDMX initiative (see <u>www.sdmx.org</u> for more information).

This document describes the content of an SDMX file, as well as the way to use the SDMX converter provided by Eurostat.

Detailed instructions on usage of standard software to convert CSV formatted files into SDMX-ML and on finding ways of generating SDMX-ML formatted files directly from internal database management systems are available through the following link: <u>https://webgate.ec.europa.eu/fpfis/mwikis/sdmx/index.php/Main\_Page</u>

2. Creating SDMX-ML files directly from the local IT system

# 2.1. Tools available for creating SDMX-ML files

In addition to the converter proposed by Eurostat, there are several tools available to create SDMX-ML files directly from the local IT system.

- Data Structure Wizard DSW, a desktop application that is able to convert/edit commonly used metadata formats into SDMX-ML formats. It contains an interface that allows the user to select a given Data Structure and to complete the data according to the requirements.
  - More information on this application at this address: <u>https://webgate.ec.europa.eu/fpfis/mwikis/sdmx/index.php/Data\_Structure\_Wiza</u> rd\_DSW
  - You can download the application using the following link: https://circabc.europa.eu/faces/jsp/extension/wai/navigation/container.jsp? FormPrincipal: idcl=FormPrincipal: id3&FormPrincipal\_SUBMIT=1&id =b12dbe0a-eb2a-4d1c-91fa-9c35bdb5cb82&javax.faces.ViewState=rO0ABXVyABNbTGphdmEubG FuZy5PYmplY3Q7kM5YnxBzKWwCAAB4cAAAAAN0AAExcHQAK y9qc3AvZXh0ZW5zaW9uL3dhaS9uYXZpZ2F0aW9uL2NvbnRhaW5lci 5qc3A=
- SDMX Reference Infrastructure SDMX-RI, a generalized service infrastructure that can be re-used partially or completely by any organisation interested in starting SDMX projects for data exchange.
  - More information on this application at this address: <u>https://webgate.ec.europa.eu/fpfis/mwikis/sdmx/index.php/SDMX\_Reference\_In</u> <u>frastructure\_SDMX-RI</u>

• You can download the application using the following link: <u>https://circabc.europa.eu/faces/jsp/extension/wai/navigation/container.jsp</u>

A detailed user guide for SDMX is available as Annex 1 of this document. The detailed structure of SDMX-ML files is described in point 2.2 of that user guide.

# 2.2. Aviation DSDs and SDMX-ML structures

In case the user wants to implement the creation of SDMX file directly in his system:

- The DSD <u>AIR\_A1+ESTAT+3.9.xml</u> provided by Eurostat has to be used for the creation of the SDMX files of dataset A1.
- The DSD <u>AIR B1+ESTAT+3.9.xml</u> provided by Eurostat has to be used for the creation of the SDMX files of datasets F1 and F2.
- The DSD <u>AIR\_C1+ESTAT+3.9.xml</u> provided by Eurostat has to be used for the creation of the SDMX files of dataset A3.

The DSDs version is updated by Eurostat approximately every quarter mostly because of the ICAO code list updates. An updated version of the DSDs is provided to all the reporting countries via EDAMIS (AIR\_ICAO\_Q dataset).

Example of resulting SDMX record for dataset A1:

</air:Series>

Example of resulting SDMX record for dataset B1:

<air:Series FREQUENCY="M" TABLE="B1" COUNTRY="EV" AIRPORT="EVRA" PART\_AIRPORT="EBBR" DIRECTION="1" SCHEDULED="1" SERVICE="1" AIRLINE\_INFO="1EU">

<air:Obs TIME\_PERIOD="15\_01" OBS\_VALUE="2988" FREIGHT\_MAIL="4"/> </air:Series>

## Example of resulting SDMX record for dataset C1:

3. How to convert CSV files into SDMX-ML using the converter

# 3.1. Modifications of the original flat files

In order to successfully convert the current aviation CSV files into SDMX-ML, the structure of the CSV files needs to be slightly modified. The examples below illustrate the two modifications which need to be applied before conversion to SDMX-ML using the converter.

1. The existing fields "reference year" and "reference period" should be combined in **one unique field** called **"TIME-PERIOD"**, having the format YYYY-PP. The following table presents the values to be used in the new record structure:

Current	situation	Modification applied
Year	Period	Time_Period
2015	01	2015_01
2015	02	2015_02
2015	03	2015_03
2015	12	2015_12

2. Add a new field "frequency" as first field of the record related to the scope of values: A-Annual, Q-Quarterly, M-Monthly

Examples of records in the current CSV files and the resulting SDMX-ML files:

<u>A1</u>

Example of record in a current CSV file:

A1;EV;**15;1**;EVRA;EBBR;1;1;1;1EU;B735;131;0;2;206

The record has to be modified as follows before conversion into SDMX:

M;A1;EV;EVRA;EBBR;1;1;1;1EU;B735;15\_01;131;0;2;206

# <u>B1</u>

Example of record in a current CSV file:

B1;EV;**15;1**;EVRA;EBBR;1;1;1;1EU;2988;4

The record has to be modified as follows before conversion into SDMX:

**M**;B1;EV;15;1;EVRA;EBBR;1;1;1;1EU ;**15\_01**;2988;4

<u>C1</u>

Example of record in a current CSV file:

C1;EV;**15;1**;EVRA;319462;900;73166;1172;4505;4811

The record can be modified as follows before conversion into SDMX:

M;C1;EV;EVRA;15\_01;319462;900;73166;1172;4505;4811

# **3.2.** Using the converter

# **Recommended version of the Converter: 4.5.0**

This version can be found in the following folder of CircaBC Website: <u>SDMX Converter</u> <u>folder</u>

Some documentaions are available (Installation, User Manual, ...): Documentation

Two different applications exist: a <u>Platform Independent version</u> (recommended) and a <u>Windows version</u> using a Setup Wizard.

For both versions, an environment variable "JAVA\_HOME" has to be set up on the computer (More information is given in the installation documentation)

					A REAL COMMON
					Converter Details
schOutput Files and Parmats					
Input File		16	Brouse (1)	Input Format	GP (2)
Output Pile			boost (2)	Output Parmet	
peafy DSD			~		
CGD File			Brosse (4)	DSD Agency	
Line Registry	False		~	0000	
0.000				D5D Version	
Specify Dataflow	Fille			Detaflow Agency	
				Detaflow 1d	1
				Dataflow Version	
Scotl Pervenier					
kul Paranatar Paraneter File			Wood		Papiterenters
Faranzier File			Wrongs		Pagiteresters
Foranciar Fie Foranciar Fie SVFIA,EXCE	107		from Tot Set Header	Output Date Format	Pagilarameters
Forancier File StyFiA,ExCL Edit Header	39		Fronse Edit SCHN Header	Output Date Format	[ Papileonines ]
Farameter File SV/FILEICE Edit Header Header	30		Troom Edit SDMX Header	Output Date Format	( Hap Deversions )
Farameter File SV/FARENCEL Edit Header Header Lanete of CSV/FAR Be	100 1		From Edit SCHN Header 5 Broom	Output Date Format Seput Ordered Header Row	Papitanastas SMR IZ NO:COLIMA (MADERS
Sout Faraneter File Sty FLA.EXCEL Edit Header Header Lanete of CDV/FUIL file Default Heageng [2]	(J) [1 [Har mass/s Diversiter		Troope East SCHN Header 5 Troope Charge Alagory	Output Date Format Seput Ordered Header Rose CSV Delenter	Dispilorameters SDMS IZI INC.COLLIPPL.JEADERS I: 6
Facameter File SVFL/EXCEL Edit Header Header Landle of CEX/FUR. Bis Default Happing [2]	30 1 May masare Diversity	+	From Edit SDHV Header (5 Stream Charge Mapping Transcoding	Output Date Format Seput Ordened Header Ros CSV Deletter Write Header	Des Pap Parenting
Financiar File Sty FLAENCEL ESR Header Header Lensis of CSN/FLA Be Default Mapping [2]	30 1 Mag maaaturo Diversita		Fronze Edit SDHN Header (5 Transe Transcoling Transcoling	Output Data Format Seput Ordered Header Rose CSV Deleniter Write Header	Page Terrentiere SDMR IEI NO_COLLIME L_HEADERS III
Farameter File Farameter File StyFALEXCEL Edit Header Header Lande of CSV/FSIL Be Default Heaping [J] Her Geomes/TS Technique	30 1 Intermative Diversite Tree Range		Transcoling	Output Date Format Seput Onland Haader Row CSV Deliniter Write Header SDMV Veldation	EDMS.
Exemption Framework File  Framework File  Styf-FL/ExCEL  Edit Header  Header  Levels of CEV/FUIL Be  Default Heageng  [/]  fter  Geomes/75 Technique  amergines	(J) [1 [Her manuful Diversitien		Transcoling	Output Date Format Seput Ordered Hader Row CSV Deliniter Write Header	E Top Parameters
Sour Parameter File Farameter File Sty FUR EXCEL ESR Header Header Lanete of (20/(FUR, Bile Default Mapping) [/] Star Gesmes/T5 Tochnique Gesmes/T5 Tochnique Default Namespace	30 1 Play manages Diversities The Range [2]	+	Froner Edit SCHN Header Trans Charge Measury Transcoling	Output Date Format Reput Ordened Haader Rom CSV Delenter Write Header SD49; Veldation	E Text Texansions

The picture on the next page illustrates the interface of the converter:

- 1: Select the Input File
- 2: Select the Output File (will be created by the application)
- 3: Select Input and Output formats ; use COMPACT\_SDMX for the Output Format

4: Select the DSD file (use the latest verision of the DSDs provided by Eurostat)

- <u>AIR\_A1+ESTAT+3.9.xml</u> must be uploaded as 'DSD file' to convert datasets A1
- <u>AIR\_B1+ESTAT+3.9.xml</u> must be uploaded as 'DSD file' to convert dataset B1
- <u>AIR\_C1+ESTAT+3.9.xml</u> must be uploaded as 'DSD file' to convert datasets
- 5: Edit the header of the resulting SDMX with the user ID and the date
- 6: Select the correct CSV delimiter ";" or ","

7: The converter directly checks the codes of the file converted compared to the code-list belonging to the DSD using this option

8: Click on the button "Convert"

Result: A successful message should appear and the output file is generated



# 3.3. Resulting SDMX files

<u>A1</u>

Record from the CSV file: M;A1;EV;EVRA;EBBR;1;1;1;1EU;B735;15\_01;131;0;2;206

Resulting SDMX record:

```
<air:Series
         FREQUENCY="M"
                           TABLE="A1"
                                        COUNTRY="EV"
                                                       AIRPORT="EVRA"
PART AIRPORT="EBBR"
                                          SCHEDULED="1"
                                                            SERVICE="1"
                        DIRECTION="1"
AIRLINE_INFO="1EU" AIRCRAFT_TYPE="B735">
                                    OBS VALUE="131"
      <air:Obs
             TIME PERIOD="15 01"
                                                      FREIGHT MAIL="0"
COMMERCIAL="2" SEATS_AVAIL="206"/>
</air:Series>
```

<u>B1</u>

Record from the CSV file: M;B1;EV;15;1;EVRA;EBBR;1;1;1;1EU ;15\_01;2988;4

Resulting SDMX record:
<u>C1</u> Record from the CSV file: M;C1;EV;EVRA;15\_01;319462;900;73166;1172;4505;4811

Resulting SDMX record:

<air:Series FREQUENCY="M" TABLE="C1" COUNTRY="EV" AIRPORT="EVRA"> <air:Obs TIME\_PERIOD="15\_01" OBS\_VALUE="319462" TRANS\_PASSENGERS="900" TRANSFER\_PAX="73166" FREIGHT\_MAIL="1172" COMMERCIAL="4505" MOVEMENTS="4811"/> </air:Series>

## ANNEX XII: Questionnaire on aviation statistics (new structure)

		2014			2015			2016		
References	Text	Quantity <sup>(1)</sup>	Flag <sup>(2)</sup>	Note <sup>(3)</sup>	Quantity <sup>(1)</sup>	Flag <sup>(2)</sup>	Note <sup>(3)</sup>	Quantity <sup>(1)</sup>	Flag <sup>(2)</sup>	Note <sup>(3)</sup>

I. INFRASTRUCTURE	

1. AIRPORTS (ONLY COMMERCIAL AIRPORTS)						
Number at 31.12						
1 Total number of airports (with more than 15,000 passenger	units per year	)				
References						
Total						
by type of airport and traffic						
1.1 Main airports [with more than 150000 passenger movement	nts or 150000	passenge	r units per year]			
References						
Total						
1.1.1 International airports						
References						
Total						
1.1.2 Domestic airports						
References						
1 Total						
1.2 Other airports (between 15,000 and 150,000 passenger uni	ts per year)					
Références						
Total						

## II. TRANSPORT EQUIPMENT - NATIONAL FLEET

1. AIRCRAFT (COMMERCIAL AIRCRAFT ONLY) Number at 31.12 1 Total					
References					
Total					
by type of aircraft 1.1 Passenger aircraft (total)					
References					
Total					
1.1.1 Passenger aircraft with less than 50 seats					
References					
Total					
1.1.2 Passenger aircraft with 51 to 150 seats					
References					
Total					1
1.1.3 Passenger aircraft with 151 to 250 seats					
References					
Total					· · · · · · · · · · · · · · · · · · ·

1.	1.1.4 Passenger aircraft with more than 250 seats				
	References				
Tota	al				
1.2	Cargo aircraft				
	References				
Tota	tal				
1.3	Combi aircraft				
	References				
Tota	tal			 	
1.4	Quick change aircraft				
	References				
Tota					
1.5	Other				
Tett	References				
1 0ta	al				
1.1.4	by age				
1.1	0-4 years				
Tota	Keterences				
1012					
1.2 .	S-9 years References				
Tota					
1.3	10-14 years		I		
10	References				
Tota	al				
1.4	15-19		 		
	References				
Tota	tal				
1.5	More than 20 years				
	References				
Tota	tal				

## ANNEX XII: Questionnaire on aviation statistics (old structure)

#### **AVIATION QUESTIONNAIRE - GENERAL AVIATION DATA**

- (1): : data not available
  - magnitude zero, not applicable

(2): p provisional data

r revised data

(3):

e estimated data Any text or comment needed

GLOSSARY

\_\_\_\_

			2008			2000	
References	Tayt	Quantity (1)	Elag (2)	Note (3)	Quantity (1)	Elan (2)	Note (3)
References	TOAL	quantity	1 lug	11010	Quantity	1.69	1010
-							
	I. INFRASTRUCTURE						
	1. AIRPORTS (ONLY COMMERCIAL AIRPORTS) Number at 31-12						
	1 Total						
	Reference	es					
	Total						
	by type of airport and traffic						
	1.1 Main airports [with more than 150000passenger movements per year]	res					
	1 Total		1				
	1.1.1 International airports						
	1 Total	es					
	1.1.2 Domestic airports						
	Referen	es					
	1 Total						
	1.2 Other airports Référen	es					
	1 Total						
	II. TRANSPORT EQUIPMENT - NATIONAL FLEET						
	1. AIRCRAFT (COMMERCIAL AIRCRAFT ONLY)						
	Number at 31.12						
	1 Total Reference						
	Total		1				
	by type of aircraft						
	1.1 Passenger aircraft (total)						
	Total	es					
	1.1.1 Passenger aircraft with less than 50 seats						
	Reference	res					
	1 0 tal						
	Reference	es					
	Total						
	1.1.3 Passenger aircraft with 151 to 250 seats						
	Total	es.	1				
	1.1.4 Passenger aircraft with more than 250 seats						
	Reference	es	1				
	1.2 Cargo aircraft						
	Reference	es					
	Total	_					
	1.5 Combi aircrait	es					
	Total						
	1.4 Quick change aircraft						
	Total	es					
	1.5 Other		·				1
	Referen	res					
	Total		1	1			

by age	
1.1 0-4 years	
References	
Total	
1.2 5-9 years	
References	
Total	
1.3 10-14 years	
References	
Total	
1.4 15-19	
References	
Total	
1.5 More than 20 years	
References	
Total	

	III. ENTERPRISES ECONOMIC PERFORMANCE AND EMPLOYMENT			
-				
	1. AVIATION ENTERPRISES			
	Number of enterprises at 31.12			
	1 Total			
	References			
	Total			
	2. EMPLOYMENT IN AVIATION ENTERPRISES (AT 31.12)			
	Number of employees at 31.12.			
	1 Total			
	References			
	rotar			
	by gender			
	1.1 Female			
	Total References			
	1 2 Male	1		L
	References			
	Total			
-	-			
	3. AIRPORT ENTERPRISES			
	Number of enterprises at 31.12			
	1 Total			
	References			
	Total			

4. EMPLOYMENT IN AIRPORT ENTERPRISES			
Number of employees at 31.12.			
1 Total			
References			
Total			
by gender			
1.1 Female			
References			
Total			
1.2 Male			
References			
Total			

	IV. ACCIDENTS		
	1 INJURY ACCIDENTS ON NATIONAL TERRITORY (REGARDLESS OF THE NATIONALITY OF THE	AIRCRAFT OPERATOR)	
	Number during the year		
	1 Total		
	References		
	1 Total		
-			
	2. FATALITIES IN INJURY ACCIDENTS ON NATIONAL TERRITORY		
	Number during the year		
	1 Total		
	References		
	1 100a		
	<ol> <li>INJURY ACCIDENTS WHERE A NATIONAL COMPANY WAS INVOLVED (REGARDLESS OF THE I Number during the near</li> </ol>	ERRITORY WHERE THE ACCIDENT OCCURR	<u>EDI</u>
	A model and ing the year		
	1 10tai		
	1 Total		
	- 1004		
	4 FATALITIES IN INTERVACCIDENTS WHERE A NATIONAL COMPANY WAS INVOLVED		
	Number during the year		
	1 Total		
	References		
	1 Total		

#### **AVIATION QUESTIONNAIRE - MAIN AIRPORTS DATA**

(1):	:
(2):	- p r
(3):	e

GLOSSARY

Number

MAIN AIRPORT:

			200	08			2009
References	Text	Quantity (1)	Flag (2)	Note (3)	Quantity (1)	Flag (2)	Note <sup>(3)</sup>
			0			0	
	I. INFRASTRUCTURE FOR GÖTEBORG-LANDVETTER						
	1. AIRPORT RUNWAYS						
	Number at 31.12						
	Total	s					
	Total	5					
	2. CHECK-IN FACILITIES						
	Number at 31.12						
	1 Total						
	Total	s					
	by type of facility						
	1.1 Conventional check-in desks						
	Reference	s					
	Number						
	1.2 Self service check-in kiosks						
	Reference	s					
	Number						
	3 AIRCRAFT GATES						
	Number at 31.12						
	1 Total						
	Reference	s					
	Total						
	by type of gate						
	1.1 Gates equipped with finger/bridges						
	Reference	s					
	Number						
	1.2 Other gates						

References

4. PARKING PLACES FOR PRIVATE CARS			
Number at 31.12			
1 Total			
References			
Total			
by type of stay			
1.1 Short stay places			
References			
Number			
1.2 Medium and long stay places			
References			
Number			

5. CONNECTION TO OTHER TRANSPORT MODES				
5.1 Passenger connections by type of transport mode				
1.1 Direct motorway connections				
Reference	es			
Number of direct motorway connections				
1.2 High speed rail line				
Reference	es			
Number of high speed rail services calling at airport				
1.3 Other rail lines				
Reference	es			
Number of other rail line services calling at airport other than high speed services				
1.4 Metro/Underground				
Reference	es			
Number of Metro/Underground line sevices at airport				
1.5 Interurban and city bus services				
Reference	es			
Number of interurban and city bus services calling at the airport				
5.2 Intermodal freight facilities				
2.1 Intermodal freight area				
Reference	es			
Area in square metres				

	II. EMPLOYMENT IN GÖTEBORG-LANDVETTER	
	1. EMPLOYMENT IN GÖTEBORG-LANDVETTER Number of employees at 31.12	
	1 Total	
	References	
	Total	
	by gender	
	by gender	
	1.1 Female	
	1.1 Female References	
	1.1 Female References Number	
_	1.1 Female References Number 1.2 Male	
	1.1 Female References Number 1.2 Male References References	

## ANNEX XIII 2015 QUALITY REPORT

## **1** INTRODUCTION

This report gives an overview of the quality of the data received in the frame of the 2014 data collection on air transport statistics. Data were reported by the national authorities of the participating countries according to Commission Regulation n° 1358/2003 for the Member States and on a voluntary basis for the Candidate Countries (the Former Yugoslav Republic Of Macedonia and Turkey), as well as for the EFTA countries Iceland, Norway and Switzerland.

Eurostat integrates the data received and quality checks are made regularly during the integration process. At the reception of the data, the number of datasets provided is checked, as well as the quality of the format of the data provided. The volume of revisions submitted by the different participating countries is also monitored.

While importing air transport data, codes for airports, aircraft types and airlines are checked. Furthermore, double records are also treated in the course of this step. Once the data imported in the database, checks on the compliance with the Regulation are run for the Member States, in order to compare the list of airports provided by the reporting countries to the list of airports defined in the Regulation. Other checks are produced, such as time series checks (consistency of the data over time) and mirror and missing routes checks (consistency of the data declared by different participating countries).

## 2 QUALITY AT RECEPTION OF THE DATA

## 2.1 NUMBER OF DATASETS PROVIDED

The next table gives details on the datasets provided by the participating countries for the 2013 and the 2014 data collections (A1: Flight Stage dataset, B1: On Flight Origin Destination dataset, C1: Airport dataset).

		2013			2014	
	Number of datasets provided	out of which airport-to- airport datasets	Detail of the datasets provided	Number of datasets provided	out of which airport-to- airport datasets	Detail of the datasets provided
BE	3	2	A1, B1, C1	3	2	A1, B1, C1
BG	3	2	A1, B1, C1	3	2	A1, B1, C1
CZ	3	2	A1, B1, C1	3	2	A1, B1, C1
DK	3	2	A1, B1, C1	3	2	A1, B1, C1
DE	3	2	A1, B1, C1	3	2	A1, B1, C1
EE	3	2	A1, B1, C1	3	2	A1, B1, C1
IE	3	2	A1, B1, C1	3	2	A1, B1, C1
EL	3	2	A1, B1, C1	3	2	A1, B1, C1
ES	3	2	A1, B1, C1	3	2	A1, B1, C1
FR	3	2	A1, B1, C1	3	2	A1, B1, C1
HR	3	2	A1, B1, C1	3	2	A1, B1, C1
IT	3	2	A1, B1, C1	3	2	A1, B1, C1
CY	3	2	A1, B1, C1	3	2	A1, B1, C1
LV	3	2	A1, B1, C1	3	2	A1, B1, C1
LT	3	2	A1, B1, C1	3	2	A1, B1, C1
LU	3	2	A1, B1, C1	3	2	A1, B1, C1
HU	3	2	A1, B1, C1	3	2	A1, B1, C1
MT	3	2	A1, B1, C1	3	2	A1, B1, C1
NL	3	2	A1, B1, C1	3	2	A1, B1, C1
AT	3	2	A1, B1, C1	3	2	A1, B1, C1
PL	3	2	A1, B1, C1	3	2	A1, B1, C1
PT	3	2	A1, B1, C1	3	2	A1, B1, C1
RO	3	2	A1, B1, C1	3	2	A1, B1, C1
SI	3	2	A1, B1, C1	3	2	A1, B1, C1
SK	3	2	A1, B1, C1	3	2	A1, B1, C1
FI	3	2	A1, B1, C1	3	2	A1, B1, C1
SE	3	2	A1, B1, C1	3	2	A1, B1, C1
UK	3	2	A1, B1, C1	3	2	A1, B1, C1
IS	3	2	A1, B1, C1	3	2	A1, B1, C1
NO	3	2	A1, B1, C1	3	2	A1, B1, C1
CH	3	2	A1, B1, C1	3	2	A1, B1, C1
MK*	1	0	C1	1	0	C1
TR	2	1	A1, C1	2	1	A1, C1

\* Former Yugoslav Republic of Macedonia

In terms of number of datasets provided by the reporting countries, the 2013 and 2014 data collections are comparable. Among the EU28 Member States, all reporting countries provided the three datasets for both reference years.

As concerns EFTA countries, all countries provided the three datasets for 2014, similarly than for 2013.

Regarding the Candidate Countries, only Turkey provided two datasets (A1 and C1) while the Former Yugoslav Republic of Macedonia provided only dataset C1.

## 2.2 FORMAT OF THE DATA IN THE FILE PROVIDED

For the reference year 2014 (as for 2013), all the participating countries provided data according to the format requested by the Regulation. However, in some cases, formatting work still had to be performed before integrating the data.

## 2.3 NUMBER OF DECLARING AIRPORTS

The number of reporting airports by country did not vary much between 2013 and 2014 for each of the three datasets. Detailed tables with the number of reporting airports are presented below for the three datasets separately. *The figures presented are broken down according to the size of the airports expressed in terms of passenger units*.

The small evolutions observed between 2013 and 2014 can be due to several reasons. Indeed, airports can have changed category between the reference years 2013 and 2014: either changing to the higher category if the traffic has increased, or changing to the lower category if the traffic has decreased<sup>\*</sup>.

The main changes in the number of reporting airports concern France and Iceland, having reported voluntarily 2013 data for airports under the threshold mentioned in the terms of the Regulation in dataset C1, while it has not been the case for the 2014 reference year.

Table A1	<15	000	between	15 000	between	150 000	more 1	than 000	Total		
Table AT	2013	2014	2013	2014	2013	2014	2013	2014	2013	2014	
BELGIUM	:		1	1	1	1	3	3	5	5	
BULGARIA	:	:	:	:	1	1	2	2	3	3	
CZECH REPUBLIC	:	:	1	2	3	2	1	1	5	5	
DENMARK	1	2	4	3	3	3	2	2	10	10	
GERMANY	:	:	1	2	10	9	16	16	27	27	
ESTONIA	:	:	:	:	:	:	1	1	1	1	
IRELAND	:	:	:	:	3	2	2	3	5	5	
GREECE	6	6	14	12	12	14	7	7	39	39	
SPAIN	:	:	2	2	15	15	17	17	34	34	
FRANCE	:	:	1	2	30	28	14	15	45	45	
CROATIA	:	:	:	:	2	2	3	3	5	5	
ITALY	:	:	2	1	10	11	22	22	34	34	
CYPRUS	:	:	:	:	:	:	2	2	2	2	
LATVIA	:	:	:	:	:	:	1	1	1	1	
LITHUANIA	:	:	2	2	1	1	1	1	4	4	
LUXEMBOURG	:	:	:	:	:	:	1	1	1	1	
HUNGARY	:	:	:	:	:	:	1	1	1	1	
MALTA	:	:	:	:	:	:	1	1	1	1	
NETHERLANDS	:	:	:	:	2	2	3	3	5	5	
AUSTRIA	:	:	:	:	4	4	2	2	6	6	
POLAND	:	:	:	:	5	6	5	6	10	12	
PORTUGAL	3	3	6	6	3	3	4	4	16	16	
ROMANIA	:	:	:	:	6	6	1	1	7	7	
SLOVENIA	:	:	:	:	1	1	:	:	1	1	
SLOVAKIA	:	:	:	:	1	1	1	1	2	2	
FINLAND	4	5	11	10	8	8	1	1	24	24	
SWEDEN	:	:	1	:	13	14	5	5	19	19	
UNITED KINGDOM	9	7	6	10	17	15	18	18	50	50	
ICELAND	:	:	:	:	:	:	1	1	1	1	
NORWAY	:	:	:	:	10	10	8	8	18	18	
SWITZERLAND	1	1	2	2	1	1	3	3	7	7	
TURKEY	4	3	15	12	19	23	12	13	50	51	

\* The category of an airport for Year Y is based on the transport registered by the airport for Year Y-2

	<15	000	between	15 000	between	150 000	more	than	Tot	al
Table B1	\$15	000	and 15	0 000	and 1 50	000 00	1 500	000	101	ai
	2013	2014	2013	2014	2013	2014	2013	2014	2013	2014
BELGIUM	:	:	1	1	1	1	3	3	5	5
BULGARIA	:	:	:	:	1	1	2	2	3	3
CZECH REPUBLIC	:	:	1	2	3	2	1	1	5	5
DENMARK	2	2	3	3	3	3	2	2	10	10
GERMANY	:	:	1	2	10	9	16	16	27	27
ESTONIA	:	:	:	:	:	:	1	1	1	1
IRELAND	:	:	:	:	3	2	2	3	5	5
GREECE	6	6	14	12	12	14	7	7	39	39
SPAIN	:	:	1	2	16	15	17	17	34	34
FRANCE	:	:	1	2	30	28	14	15	45	45
CROATIA	:	:	:	:	2	2	3	3	5	5
ITALY	:	:	2	1	10	11	22	22	34	34
CYPRUS	:	:	:	:	:	:	2	2	2	2
LATVIA	:	:	:	:	:	:	1	1	1	1
LITHUANIA	:	:	2	2	1	1	1	1	4	4
LUXEMBOURG	:	:	:	:	:	:	1	1	1	1
HUNGARY	:	:	:	:	:	:	1	1	1	1
MALTA	:	:	:	:	:	:	1	1	1	1
NETHERLANDS	:	:	:	:	3	2	2	3	5	5
AUSTRIA	:	:	:	:	4	4	2	2	6	6
POLAND	:	:	:	:	5	6	5	6	10	12
PORTUGAL	3	1	6	6	3	3	4	4	16	14
ROMANIA	:	:	:	:	6	6	1	1	7	7
SLOVENIA	:	:	:	:	1	1	:	:	1	1
SLOVAKIA	:	:	:	:	1	1	1	1	2	2
FINLAND	3	2	11	11	7	7	1	1	22	21
SWEDEN	:	:	1	:	13	14	5	5	19	19
UNITED KINGDOM	9	7	7	10	16	15	18	18	50	50
							1	1	1	1
NORWAY				1	10	9	8	8	18	18
SWITZERI AND	1	1	. 2	2	.0	1	3	3	.0	7

Table C1	<15	000	between	15 000	between	150 000	more	than	Tot	al
10010 01	2013	2014	2013	2014	2013	2014	2013	2014	2013	2014
BELGIUM	:	:	1	1	1	1	3	3	5	5
BULGARIA	:	:	1	1	1	1	2	2	4	4
CZECH REPUBLIC	:	:	1	2	3	2	1	1	5	5
DENMARK	1	2	4	3	3	3	2	2	10	10
GERMANY	:	1	13	12	10	10	16	16	39	39
ESTONIA	2	:	:	:	:	:	1	1	3	1
IRELAND	1	1	3	3	2	2	3	3	9	9
GREECE	6	6	14	12	12	14	7	7	39	39
SPAIN	2	1	7	7	15	15	17	17	41	40
FRANCE	3	:	18	2	30	28	14	15	65	45
CROATIA	1	:	1	2	2	2	3	3	7	7
ITALY	:	:	4	3	11	12	22	22	37	37
CYPRUS	:	:	:	:	:	:	2	2	2	2
LATVIA	:	:	:	:	:	:	1	1	1	1
LITHUANIA	:	:	2	2	1	1	1	1	4	4
LUXEMBOURG	:	:	:	:	:	:	1	1	1	1
HUNGARY	:	:	2	2	:	:	1	1	3	3
MALTA	:	:	:	:	:	:	1	1	1	1
NETHERLANDS	:	:	:	:	2	2	3	3	5	5
AUSTRIA	:	:	:	:	4	4	2	2	6	6
POLAND	:	:	:	:	5	6	5	6	10	12
PORTUGAL	3	:	6	6	3	3	4	4	16	13
ROMANIA	1	2	5	4	6	6	1	1	13	13
SLOVENIA	:	:	:	:	1	1	:	:	1	1
SLOVAKIA	2	2	2	2	1	1	1	1	6	6
FINLAND	5	7	11	10	8	8	1	1	25	26
SWEDEN	:	:	13	13	14	14	5	5	32	32
UNITED KINGDOM	14	12	8	12	17	15	18	18	57	57
	11		3		2		1	1	17	1
NORWAY	4	. 5	28	28	14	13	8	8	54	54
SWITZERI AND	- 1	1	20	20	1	13	3	3	7	7
		'	2	2	'	'	0	Ŭ	'	'
			1	1	1	1			2	2
TIDKEY			15	10	10	1	10	12	2 50	2 F2
IURNEY	6	5	15	12	19	23	12	13	52	53

## 2.4 2014 DATA REVISIONS

Revised data have been received for 15 of the 33 participating countries in the frame of the 2014 data collection, which is less than the number of countries having revised data in 2012 (18).

Among the reporting countries for which data have been revised, 7 countries provided complete datasets updated, and 8 countries submitted revised data for a specific airport and/or a specific period (NB: Germany provided both complete revisions of dataset C1 and partial revisions for dataset A1 and B1).

Country		BE	BG	אם די	DE	FE	IE	FI	FS	FR	HP	ІТ	CV	IV	IТ	111	
Country		- DE			L DL		hun	the second second					101			FIC.	1
	A1	000000	0000	ШЗ X			0000	<i>((((()</i>	х	х	111111	X	illili	11111	11111	0000	
Complete year	B1							(//)	Х	Х		Х					
	C1				X				Х	Х		Х					
	A1				ŠХ		Х						X				
Partial revision	B1				X		Х						X				
	C1				XIII								Х			X	
																	•
Country		HU	MTN	NL AT	PL	PT	RO	SI	SK	FI	SE	UK	NO	CH	IS	MK	TR
	A1		()(X)		X												<u> </u>
Complete year	B1		1111		¥Х.												
	C1	X			X											Х	
	A1	311113	<u> </u>	Ш Х		(0)		$\lambda 000$						Х	Х		()))
Partial revision	B1			Ж		(11)		(0)						X	Х		
	C1		111181	111 <b>7</b> 111	XIIII	Х		(0)					$m_{\lambda}$	())))	Х		

## 2.5 SDMX DATA PROVISION IN 2014

SDMX data files have been received for 20 of the 33 participating countries in the frame of the 2014 data collection.

Among the reporting countries for which data have been provided in the SDMX format, 16 countries provided datasets covering the whole year 2014 and 4 countries submitted SDMX data for a specific period only. Flat files have been provided by all remaining countries. The table below provides details on the SDMX data provision for the reference year 2014:

Country		BE	BG	CZ	DK	DE	EE	IE	EL	ES	FR	HR	IT	CY	LV	LT	LU	
	A1	Х	Х	Х	Х		Х				Х		Х	Х		Х		
Complete year	B1	Х	Х	Х	Х		Х				Х		Х	Х		Х		
	C1	Х	Х	Х	Х		Х				Х		Х	Х		Х		
	A1				$\chi$					Х		Х			Х		Х	
Partial	B1									Х		Х			Х		X	
	C1									Х		Х			Х		Х	
Country		HU	MT	NL	AT	PL	PT	RO	SI	SK	FI	SE	UK	NO	СН	IS	MK	TR
	A1				Х		Х		Х			Х			Х		Х	Х
Complete year	B1				X		Х		Х			Х			Х		Х	Х
	C1				X		Х		Х			Х			Х		X	Х
	A1																$\lambda = 0$	
Partial	B1				$()))\lambda$							(111)					$\Lambda $	
	C1	111113			$())))\lambda$	111112		111112		1111112		allin a		111112		en e	$\chi_{(((((((((((((((((((((((((((((((((((($	

## **3** MAIN PROBLEMS DURING INTEGRATION

## 3.1 FREIGHT UNITS

Some participating countries provided Eurostat with freight data in kilograms while <u>figures should be</u> <u>expressed in tonnes according to the Regulation</u>. In this case, freight data have been divided by 1000 during the importation in the production database.

#### 3.2 AIRLINE INFORMATION AND AIRCRAFT TYPE CODIFICATION – AVAILABILITY OF THE INFORMATION

The following table presents the summary of the information received for the fields "airline information" and "aircraft type" by dataset for the reference year 2014.

2014	Airline provision in A1 and/or B1	Airline provision in C1	Aircraft provision in A1
BELGIUM	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
BULGARIA	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
CZECH REPUBLIC	"Unknown" code	"All airlines" code	Detailed aircraft ICAO codes
DENMARK	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
GERMANY	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
ESTONIA	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
IRELAND	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
GREECE	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
SPAIN	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
FRANCE	Confidential code	"All airlines" code	Detailed aircraft ICAO codes
CROATIA	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
ITALY	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
CYPRUS	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
LATVIA	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
LITHUANIA	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
LUXEMBOURG	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
HUNGARY	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
MALTA	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
NETHERLANDS	"1+ISO", "2+ISO" codes	"1+ISO", "2+ISO" codes	Detailed aircraft ICAO codes
AUSTRIA	"1EU", "1NE" codes	"All airlines" code	Detailed aircraft ICAO codes
POLAND	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
PORTUGAL	"1+ISO", "2+ISO" codes	"1EU", "1NE" codes	Detailed aircraft ICAO codes
ROMANIA	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
SLOVENIA	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
SLOVAKIA	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
FINLAND	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
SWEDEN	Detailed airline ICAO codes	"All airlines" code	Detailed aircraft ICAO codes
UNITED KINGDOM	"1EU", "1NE" codes	"1EU", "1NE" codes	Detailed aircraft ICAO codes
ICELAND	Detailed airline ICAO codes	Detailed airline ICAO codes	Detailed aircraft ICAO codes
NORWAY	"1+ISO", "2+ISO" codes	"All airlines" code	Detailed aircraft ICAO codes
SWITZERLAND	"1+ISO", "2+ISO" codes	"All airlines" code	Detailed aircraft ICAO codes
THE FORMER			
YUGOSLAV REPUBLIC	-	"All airlines" code	-
OF MACEDONIA			
TURKEY	Confidential code	"All airlines" code	Detailed aircraft ICAO codes

When considering the overall airline information provision in the Flight Stage and the On Flight Origin Destination datasets for 2014, it appears that 88% of the participating countries provided detailed codes (detailed airline ICAO codes for 46% and the "1EU", "1NE" codes for 42% - both categories recording the same shares than for 2013).

It should be noted that countries providing the codes "1+ISO" and "2+ISO" have been taken into consideration under the group ""1EU", "1NE" codes.'

The other countries for which airport-to-airport statistics are available provided confidential codes (6%) or unknown codes (3%). The remaining countries (3%) did not provide datasets A1 and B1 for the reference year 2014.



Regarding the airline provision in the Airport dataset (C1), 70% of the reporting countries provided "999: All airlines" code

There were 21% of the countries providing the detailed ICAO codes airlines and 9% giving the distinction between EU airlines and non-EU.

Airline provision in A1 and/or B1



All countries having provided dataset A1 for 2014 reported detailed ICAO codes for the aircraft type dimension, representing a percentage of 97% of the 33 participating countries.

The last 3% of the participating countries did not provide dataset A1 for 2014.



### 3.3 PROBLEMS OF CODIFICATION

As for the previous reference years, when codes (for airports, airlines and aircraft) provided by the reporting countries could not be identified by Eurostat, a request has been sent to the concerned countries in order to have clarifications about these codes. Subsequently, the codes (and the related labels) have been either integrated in the appropriate dictionary or trans-coded, following the indications of the countries.

### 3.4 SEATS AVAILABLE

Quality checks on seats available are a consistency check aiming at ensuring that the number of seats available is higher or equal to the number of passengers at record level. The cases where this condition is not met are sent by Eurostat to the participating countries in order to clarify the situation (sometimes, the concerned countries provide Eurostat with full datasets updated).

Details on the provision of the seats available information for the reference year 2014 are given in the table below.

Country	Dataset A1 provision (v/n)	Seats available provision
EB BELGIUM	Yes	Seats available provided
LB BULGARIA	Yes	Seats available provided
LK CZECH REPUBLIC	Yes	Seats available provided
EK DENMARK	Yes	Seats available provided
ED GERMANY	Yes	Seats available provided
EE ESTONIA	Yes	Seats available provided
EI IRELAND	Yes	Seats available provided
LG GREECE	Yes	Seats available provided
LE SPAIN	Yes	Seats available provided
LF FRANCE	Yes	Seats available provided
LD CROATIA	Yes	Seats available provided
LI ITALY	Yes	Seats available provided
LC CYPRUS	Yes	Seats available provided
EV LATVIA	Yes	Seats available provided
EY LITHUANIA	Yes	Seats available provided
EL LUXEMBOURG	Yes	Seats available provided
LH HUNGARY	Yes	Seats available provided
LM MALTA	Yes	Seats available provided
EH NETHERLANDS	Yes	Seats available provided
LO AUSTRIA	Yes	Seats available provided
EP POLAND	Yes	Seats available provided
LP PORTUGAL	Yes	Seats available provided
LR ROMANIA	Yes	Seats available provided
LJ SLOVENIA	Yes	Seats available provided
LZ SLOVAKIA	Yes	Seats available provided
EF FINLAND	Yes	Seats available provided
ES SWEDEN	Yes	Seats available provided
EG UNITED KINGDOM	Yes	Seats available provided
BI ICELAND	Yes	Seats available provided
EN NORWAY	Yes	Seats available provided
LS SWITZERLAND	Yes	Seats available provided
LW THE FORMER		
YUGOSLAV	No	_
REPUBLIC OF		
MACEDONIA		
LT TURKEY	Yes	Seats available provided

The number of seats available has been systematically provided when dataset A1 has been transmitted. For data quality reasons, the 2014 seats available data could not be disseminated for Greece and France.

Concerning the majority of the other reporting countries for which problems have been detected, the figures have been confirmed: the main reason for the discrepancies observed between the

passengers and seats available figures could be explained by infant in arms, counted in passengers statistics, but not having any seat.

## **3.5** FREIGHT FIGURES AT PARIS AIRPORTS

France confirmed that there were still difficulties to provide freight statistics for Paris/Charles de Gaulle airport. The underestimation of the current figure was evaluated between 30% and 40%. The situation should improve in the coming years thanks to a new system planned but not yet available.

## **4 COMPLIANCE WITH THE REGULATION CHECKS**

### 4.1 AIRPORTS IN CATEGORY 1 (REPORTING DATASET C1 ONLY)

A couple of countries did not provide dataset C1 as requested in the Regulation for airports belonging to category 1. However, it has to be highlighted that very few airports were concerned.

## **5 SUMMARY OF THE MIRROR QUALITY CHECKS**

The summary of the outcomes of the mirror quality checks, presented below, compares the declarations of the reporting countries to those of the partner reporting countries on common airport-to-airport routes. Since the reference year 2009, mirror checks are performed at airport-to-airport routes level for routes concerning reporting and partner airports of categories 2 and 3.

### 5.1 PASSENGER TRANSPORT (SEE DETAILED TABLES BY AIRPORT IN ANNEXES 1 AND 2)

### Table A1

The following table highlights the number of routes for which problems have been detected in 2013 and 2014 as well as the number of routes for which the figures of both participating countries concerned were reasonably close.

		20	13		2014							
	Total	No problem	Problem	% with problems	Total	No problem	Problem	% with problems				
EB BELGIUM	426	406	20	4.7%	423	405	18	4.3%				
LB BULGARIA	246	242	4	1.6%	236	233	3	1.3%				
EK DENMARK	495	489	6	1.2%	483	476	7	1.4%				
ED GERMANY	2 331	2 309	22	0.9%	2 358	2 328	30	1.3%				
EE ESTONIA	80	78	2	2.5%	100	98	2	2.0%				
EI IRELAND	322	322	0	0.0%	328	326	2	0.6%				
LG GREECE	1 056	1 009	47	4.5%	1 148	1 096	52	4.5%				
LE SPAIN	2 199	2 123	76	3.5%	2 201	2 131	70	3.2%				
LF FRANCE	1 768	1 753	15	0.8%	1 834	1 809	25	1.4%				
LD CROATIA	357	350	7	2.0%	394	388	6	1.5%				
LI ITALY	1 613	1 586	27	1.7%	1 675	1 642	33	2.0%				
LC CYPRUS	170	167	3	1.8%	173	169	4	2.3%				
EV LATVIA	101	100	1	1.0%	113	111	2	1.8%				
EY LITHUANIA	144	140	4	2.8%	130	126	4	3.1%				
EL LUXEMBOURG	154	152	2	1.3%	152	150	2	1.3%				
LH HUNGARY	146	146	0	0.0%	137	135	2	1.5%				
LM MALTA	118	117	1	0.8%	121	119	2	1.7%				
EH NETHERLANDS	594	555	39	6.6%	578	544	34	5.9%				
LO AUSTRIA	495	490	5	1.0%	493	485	8	1.6%				
EP POLAND	637	619	18	2.8%	647	636	11	1.7%				
LP PORTUGAL	451	433	18	4.0%	450	423	27	6.0%				
LR ROMANIA	171	153	18	10.5%	220	196	24	10.9%				
LJ SLOVENIA	94	90	4	4.3%	81	80	1	1.2%				
LZ SLOVAKIA	151	150	1	0.7%	162	161	1	0.6%				
EF FINLAND	356	354	2	0.6%	374	371	3	0.8%				
ES SWEDEN	640	626	14	2.2%	719	707	12	1.7%				
EG UNITED KINGDOM	1 954	1 944	10	0.5%	1 941	1 926	15	0.8%				
BI ICELAND	86	86	0	0.0%	85	82	3	3.5%				
EN NORWAY	755	740	15	2.0%	739	726	13	1.8%				
LS SWITZERLAND	321	316	5	1.6%	308	303	5	1.6%				
LT TURKEY	649	627	22	3.4%	625	610	15	2.4%				

For 12 reporting countries, the share of routes with problems for passenger transport has decreased between 2013 and 2014. Generally speaking, this share is very low: at total countries level, it rose a bit from 2.1% to 2.2% between 2013 and 2014.

The following table gives detailed results by category, based on the volume of passengers registered on the routes. The categories registering the highest number of routes with problems are the two categories with the highest number of passengers (routes with more than 15 000 passengers annually), representing 72% of all the problems detected in 2014 (against 66% in 2013).

	Pouto	with nov	- 6500	10 and	Route	with pax :	>= 15000	) and <	Route	with pax	>= 5000	and <	Route	with pax	>= 2000	and <				
	Roule	wiiii pax	- 0000	10 anu -0/	65000	and whe	e differer	ice >=	15000	and wher	e differer	nce >=	5000	and where	e differen	ce >=		NO PR	OBLEM	
	wne	ere amerei	1Ce >= :	0%		15	%			409	%			100	%					
	20	)13	20	)14	20	13	20	14	20	13	20	)14	20	)13	20	)14	20	013	20	)14
EB BELGIUM	5	1.2%	2	0.5%	12	2.8%	12	2.8%	1	0.2%	3	0.7%	2	0.5%	1	0.2%	406	95.3%	405	95.7%
LB BULGARIA	2	0.8%	2	0.8%	2	0.8%	1	0.4%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	242	98.4%	233	98.7%
EK DENMARK	1	0.2%	2	0.4%	2	0.4%	4	0.8%	2	0.4%	1	0.2%	1	0.2%	0	0.0%	489	98.8%	476	98.6%
ED GERMANY	10	0.4%	13	0.6%	5	0.2%	9	0.4%	5	0.2%	8	0.3%	2	0.1%	0	0.0%	2309	99.1%	2328	98.7%
EE ESTONIA	0	0.0%	1	1.0%	2	2.5%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	78	97.5%	98	98.0%
EI IRELAND	0	0.0%	2	0.6%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	322	100.0%	326	99.4%
LG GREECE	7	0.7%	10	0.9%	19	1.8%	16	1.4%	18	1.7%	19	1.7%	3	0.3%	7	0.6%	1009	95.5%	1096	95.5%
LE SPAIN	14	0.6%	19	0.9%	38	1.7%	37	1.7%	18	0.8%	12	0.5%	6	0.3%	2	0.1%	2123	96.5%	2131	96.8%
LF FRANCE	2	0.1%	2	0.1%	5	0.3%	9	0.5%	4	0.2%	12	0.7%	4	0.2%	2	0.1%	1753	99.2%	1809	98.6%
LD CROATIA	0	0.0%	1	0.3%	4	1.1%	3	0.8%	3	0.8%	2	0.5%	0	0.0%	0	0.0%	350	98.0%	388	98.5%
LI ITALY	5	0.3%	7	0.4%	12	0.7%	13	0.8%	7	0.4%	8	0.5%	3	0.2%	5	0.3%	1586	98.3%	1642	98.0%
LC CYPRUS	2	1.2%	2	1.2%	0	0.0%	0	0.0%	1	0.6%	2	1.2%	0	0.0%	0	0.0%	167	98.2%	169	97.7%
EV LATVIA	0	0.0%	2	1.8%	0	0.0%	0	0.0%	1	1.0%	0	0.0%	0	0.0%	0	0.0%	100	99.0%	111	98.2%
EY LITHUANIA	1	0.7%	2	1.5%	1	0.7%	1	0.8%	2	1.4%	0	0.0%	0	0.0%	1	0.8%	140	97.2%	126	96.9%
EL LUXEMBOURG	0	0.0%	0	0.0%	1	0.6%	2	1.3%	1	0.6%	0	0.0%	0	0.0%	0	0.0%	152	98.7%	150	98.7%
LH HUNGARY	0	0.0%	1	0.7%	0	0.0%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	146	100.0%	135	98.5%
LM MALTA	0	0.0%	1	0.8%	1	0.8%	1	0.8%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	117	99.2%	119	98.3%
EH NETHERLANDS	8	1.3%	9	1.6%	21	3.5%	21	3.6%	10	1.7%	4	0.7%	0	0.0%	0	0.0%	555	93.4%	544	94.1%
LO AUSTRIA	1	0.2%	1	0.2%	2	0.4%	4	0.8%	1	0.2%	1	0.2%	1	0.2%	2	0.4%	490	99.0%	485	98.4%
EP POLAND	2	0.3%	3	0.5%	12	1.9%	3	0.5%	2	0.3%	4	0.6%	2	0.3%	1	0.2%	619	97.2%	636	98.3%
LP PORTUGAL	2	0.4%	6	1.3%	7	1.6%	15	3.3%	8	1.8%	5	1.1%	1	0.2%	1	0.2%	433	96.0%	423	94.0%
LR ROMANIA	9	5.3%	13	5.9%	3	1.8%	7	3.2%	5	2.9%	2	0.9%	1	0.6%	2	0.9%	153	89.5%	196	89.1%
LJ SLOVENIA	0	0.0%	0	0.0%	1	1.1%	1	1.2%	1	1.1%	0	0.0%	2	2.1%	0	0.0%	90	95.7%	80	98.8%
LZ SLOVAKIA	0	0.0%	1	0.6%	1	0.7%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	150	99.3%	161	99.4%
EF FINLAND	0	0.0%	1	0.3%	0	0.0%	1	0.3%	2	0.6%	1	0.3%	0	0.0%	0	0.0%	354	99.4%	371	99.2%
ES SWEDEN	3	0.5%	4	0.6%	5	0.8%	4	0.6%	6	0.9%	4	0.6%	0	0.0%	0	0.0%	626	97.8%	707	98.3%
EG UNITED KINGDOM	3	0.2%	5	0.3%	4	0.2%	6	0.3%	2	0.1%	3	0.2%	1	0.1%	1	0.1%	1944	99.5%	1926	99.2%
BI ICELAND	0	0.0%	0	0.0%	0	0.0%	1	1.2%	0	0.0%	2	2.4%	0	0.0%	0	0.0%	86	100.0%	82	96.5%
EN NORWAY	4	0.5%	2	0.3%	9	1.2%	7	0.9%	2	0.3%	4	0.5%	0	0.0%	0	0.0%	740	98.0%	726	98.2%
LS SWITZERLAND	2	0.6%	1	0.3%	1	0.3%	3	1.0%	0	0.0%	1	0.3%	2	0.6%	0	0.0%	316	98.4%	303	98.4%
LT TURKEY	9	1.4%	3	0.5%	8	1.2%	11	1.8%	4	0.6%	0	0.0%	1	0.2%	1	0.2%	627	96.6%	610	97.6%

#### Table B1

		20	13		2014					
	Total	No problem	Problem	% with problems	Total	No problem	Problem	% with problems		
EB BELGIUM	395	380	15	3.8%	402	392	10	2.5%		
LB BULGARIA	232	227	5	2.2%	223	220	3	1.3%		
EK DENMARK	451	446	5	1.1%	451	447	4	0.9%		
ED GERMANY	2 051	2 034	17	0.8%	2 143	2 123	20	0.9%		
EE ESTONIA	73	73	0	0.0%	96	96	0	0.0%		
EI IRELAND	302	302	0	0.0%	312	309	3	1.0%		
LG GREECE	981	955	26	2.7%	1 075	1 041	34	3.2%		
LE SPAIN	2 138	2 089	49	2.3%	2 146	2 109	37	1.7%		
LF FRANCE	1 623	1 612	11	0.7%	1 660	1 642	18	1.1%		
LD CROATIA	346	338	8	2.3%	373	366	7	1.9%		
LI ITALY	1 544	1 521	23	1.5%	1 610	1 585	25	1.6%		
LC CYPRUS	164	162	2	1.2%	165	164	1	0.6%		
EV LATVIA	97	96	1	1.0%	109	107	2	1.8%		
EY LITHUANIA	131	130	1	0.8%	123	123	0	0.0%		
EL LUXEMBOURG	142	140	2	1.4%	140	139	1	0.7%		
LH HUNGARY	137	137	0	0.0%	129	128	1	0.8%		
LM MALTA	119	118	1	0.8%	121	120	1	0.8%		
EH NETHERLANDS	541	532	9	1.7%	544	527	17	3.1%		
LO AUSTRIA	461	455	6	1.3%	462	455	7	1.5%		
EP POLAND	595	579	16	2.7%	602	589	13	2.2%		
LP PORTUGAL	444	426	18	4.1%	463	440	23	5.0%		
LR ROMANIA	161	146	15	9.3%	204	182	22	10.8%		
LJ SLOVENIA	88	87	1	1.1%	77	77	0	0.0%		
LZ SLOVAKIA	138	137	1	0.7%	148	147	1	0.7%		
EF FINLAND	290	288	2	0.7%	319	315	4	1.3%		
ES SWEDEN	594	583	11	1.9%	671	658	13	1.9%		
EG UNITED KINGDOM	1 872	1 860	12	0.6%	1 850	1 833	17	0.9%		
BI ICELAND	82	79	3	3.7%	81	80	1	1.2%		
EN NORWAY	686	669	17	2.5%	691	680	11	1.6%		
LS SWITZERLAND	320	317	3	0.9%	304	302	2	0.7%		

For the reference year 2014, the share of routes with problems for passenger transport was slightly lower in the On Flight Origin Destination dataset compared to the Flight Stage dataset: there were problems for 1.7% of the routes registered in the On Flight Origin Destination dataset. The share of

routes with problems has decreased between 2013 and 2014 for 15 out of the 30 reporting countries having provided data both for 2013 and 2014 reference years. In 2014, there were 9 countries for which the share of routes with problems was higher in B1 compared to A1.

Route with pax >= 65000 and where difference >= 5%         NO PROBLEM           2013         2014	14 97.5% 98.7% 99.1%
$\frac{10000 \text{ and where difference} >= 5\%}{15\%} = \frac{10000 \text{ and where difference} >= 100000 \text{ and w$	14 97.5% 98.7% 99.1%
Image: Normal State	14 97.5% 98.7% 99.1%
EB BELGIUM         0         0.0%         2         0.5%         12         3.0%         6         1.5%         1         0.3%         1         0.2%         2         0.5%         1         0.2%         2         0.5%         1         0.2%         2         0.5%         1         0.2%         2         0.5%         1         0.2%         380         96.2%         392           LB BULGARIA         0         0.0%         1         0.4%         5         2.2%         1         0.4%         0         0.0%         0         0.0%         1         0.4%         220	97.5% 98.7% 99.1%
EB BELGIUM         0         0.0%         2         0.5%         1         0.5%         1         0.2%         2         0.5%         1         0.2%         380         96.2%         392           LB BULGARIA         0         0.0%         1         0.4%         5         2.2%         1         0.4%         0         0.0%         0         0.0%         1         0.4%         227         97.8%         220	97.5% 98.7% 99.1%
LB BOLGARIA 0 0.0% I 0.4% 5 2.2% I 0.4% 0 0.0% 0 0.0% 0 0.0% I 0.4% 227 97.8% 220	98.7% 99.1%
	99.1%
ER DEDMARK 1 0.2% 2 0.4% 1 0.2% 2 0.4% 3 0.7% 0 0.0% 0 0.0% 0 0.0% 446 98.9% 447	00 40/
ED GERMANY 9 0.4% 9 0.4% 3 0.1% 6 0.3% 3 0.1% 4 0.2% 2 0.1% 1 0.0% 2034 99.2% 2123	99.1%
EE ESTONIA 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 73 100.0% 96	100.0%
EIRELAND 0 0.0% 2 0.6% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 1 0.3% 302 100.0% 309	99.0%
LG GREECE 4 0.4% 9 0.8% 5 0.5% 11 1.0% 16 1.6% 9 0.8% 1 0.1% 5 0.5% 955 97.3% 1041	96.8%
LE SPAIN 5 0.2% 7 0.3% 25 1.2% 20 0.9% 12 0.6% 6 0.3% 7 0.3% 4 0.2% 2089 97.7% 2109	98.3%
LF FRANCE 1 0.1% 3 0.2% 8 0.5% 10 0.6% 2 0.1% 3 0.2% 0 0.0% 2 0.1% 1612 99.3% 1642	98.9%
LD CROATIA 0 0.0% 1 0.3% 5 1.4% 3 0.8% 1 0.3% 1 0.3% 2 0.6% 2 0.5% 338 97.7% 366	98.1%
LIITALY 5 0.3% 5 0.3% 12 0.8% 11 0.7% 2 0.1% 3 0.2% 4 0.3% 6 0.4% 1521 98.5% 1585	98.4%
LC CYPRUS 1 0.6% 1 0.6% 0 0.0% 0 0.0% 1 0.6% 0 0.0% 0 0.0% 162 98.8% 164	99.4%
EV LATVIA 0 0.0% 2 1.8% 0 0.0% 0 0.0% 1 1.0% 0 0.0% 0 0.0% 0 0.0% 96 99.0% 107	98.2%
EY LITHUANIA 0 0.0% 0 0.0% 0 0.0% 0 0.0% 1 0.8% 0 0.0% 0 0.0% 0 0.0% 130 99.2% 123	100.0%
ELLUXEMBOURG 0 0.0% 0 0.0% 1 0.7% 0 0.0% 1 0.7% 1 0.7% 0 0.0% 0 0.0% 140 98.6% 139	99.3%
LH HUNGARY 0 0.0% 0 0.0% 1 0.8% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 137 100.0% 128	99.2%
LM MALTA 0 0.0% 0 0.0% 1 0.8% 1 0.8% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 118 99.2% 120	99.2%
EH NETHERLANDS 1 0.2% 5 0.9% 3 0.6% 8 1.5% 5 0.9% 4 0.7% 0 0.0% 0 0.0% 532 98.3% 527	96.9%
LOAUSTRIA 2 0.4% 0 0.0% 2 0.4% 2 0.4% 2 0.4% 2 0.4% 0 0.0% 3 0.6% 455 98.7% 455	98.5%
EP POLAND 1 0.2% 4 0.7% 12 2.0% 4 0.7% 1 0.2% 3 0.5% 2 0.3% 2 0.3% 579 97.3% 589	97.8%
LP PORTUGAL 1 0.2% 5 1.1% 7 1.6% 11 2.4% 6 1.4% 4 0.9% 4 0.9% 3 0.6% 426 95.9% 440	95.0%
LR ROMANIA 6 3.7% 11 5.4% 3 1.9% 7 3.4% 5 3.1% 2 1.0% 1 0.6% 2 1.0% 146 90.7% 182	89.2%
LJSLOVENIA 0 0.0% 0 0.0% 0 0.0% 0 0.0% 0 0.0% 1 1.1% 0 0.0% 87 98.9% 77	100.0%
LZ SLOVAKIA 0 0.0% 0 0.0% 1 0.7% 0 0.0% 0 0.0% 0 0.0% 1 0.7% 137 99.3% 147	99.3%
FE FINI AND 0 00% 1 03% 0 00% 1 03% 1 03% 2 06% 1 03% 0 00% 288 993% 315	98.7%
ES SWEPEN 0 00% 2 03% 5 08% 2 03% 4 07% 5 07% 2 03% 4 06% 583 981% 658	98.1%
EGUINTED KINGDOM 4 0.2% 7 0.4% 5 0.3% 5 0.3% 2 0.1% 3 0.2% 1 0.1% 2 0.1% 1860 99.4% 1833	99.1%
BUCELAND 0.00% 0.00% 1.12% 1.12% 2.24% 0.00% 0.00% 0.00% 7.96% 80	98.8%
EN NORWAY 1 0 1% 1 0 1% 1 1 16% 8 12% 2 0.5% 2 0.5% 0 0.0% 15 50.5% 600	98.4%
LING THE LINE LINE LINE LINE LINE LINE LINE LIN	00.4%

As for dataset A1, the categories registering the highest number of routes with problems are the two categories with more than 15 000 passengers, representing 68% of all the problems detected in 2014 (against 61% in 2013). Nevertheless, the share of routes without problems still remains very high.

## 5.2 FREIGHT TRANSPORT (SEE DETAILED TABLES BY AIRPORT IN ANNEXES 3 AND 4)

## Table A1

		20	013		2014					
Arrivals	Total	No Problem	Problem	% with problems	Total	No Problem	Problem	% with problems		
EB BELGIUM	167	141	26	15.6%	167	140	27	16.2%		
LB BULGARIA	61	57	4	6.6%	51	47	4	7.8%		
EK DENMARK	87	84	3	3.4%	85	79	6	7.1%		
ED GERMANY	815	765	50	6.1%	638	589	49	7.7%		
EE ESTONIA	23	21	2	8.7%	26	26	0	0.0%		
EI IRELAND	102	99	3	2.9%	88	85	3	3.4%		
LG GREECE	127	118	9	7.1%	116	109	7	6.0%		
LE SPAIN	455	437	18	4.0%	374	355	19	5.1%		
LF FRANCE	220	202	18	8.2%	221	205	16	7.2%		
LD CROATIA	38	37	1	2.6%	25	24	1	4.0%		
LI ITALY	308	292	16	5.2%	308	293	15	4.9%		
LC CYPRUS	57	56	1	1.8%	51	50	1	2.0%		
EV LATVIA	40	37	3	7.5%	47	46	1	2.1%		
EY LITHUANIA	19	19	0	0.0%	18	18	0	0.0%		
EL LUXEMBOURG	37	31	6	16.2%	37	31	6	16.2%		
LH HUNGARY	49	43	6	12.2%	50	44	6	12.0%		
LM MALTA	52	50	2	3.8%	50	48	2	4.0%		
EH NETHERLANDS	137	123	14	10.2%	142	122	20	14.1%		
LO AUSTRIA	87	81	6	6.9%	86	79	7	8.1%		
EP POLAND	102	94	8	7.8%	101	96	5	5.0%		
LP PORTUGAL	90	86	4	4.4%	82	77	5	6.1%		
LR ROMANIA	42	38	4	9.5%	56	50	6	10.7%		
LJ SLOVENIA	25	24	1	4.0%	20	19	1	5.0%		
LZ SLOVAKIA	17	17	0	0.0%	19	19	0	0.0%		
EF FINLAND	75	70	5	6.7%	83	79	4	4.8%		
ES SWEDEN	88	80	8	9.1%	121	111	10	8.3%		
EG UNITED KINGDOM	550	523	27	4.9%	392	364	28	7.1%		
BI ICELAND	33	29	4	12.1%	36	34	2	5.6%		
EN NORWAY	104	95	9	8.7%	108	97	11	10.2%		
LS SWITZERLAND	112	105	7	6.3%	111	105	6	5.4%		

		14						
Departures	Total	No Problem	Problem	% with problems	Total	No Problem	Problem	% with problems
EB BELGIUM	177	153	24	13.6%	164	141	23	14.0%
LB BULGARIA	54	52	2	3.7%	57	54	3	5.3%
EK DENMARK	82	75	7	8.5%	86	76	10	11.6%
ED GERMANY	750	696	54	7.2%	601	544	57	9.5%
EE ESTONIA	21	18	3	14.3%	25	22	3	12.0%
EI IRELAND	111	110	1	0.9%	96	93	3	3.1%
LG GREECE	167	159	8	4.8%	145	137	8	5.5%
LE SPAIN	462	438	24	5.2%	410	381	29	7.1%
LF FRANCE	278	260	18	6.5%	256	238	18	7.0%
LD CROATIA	44	43	1	2.3%	33	32	1	3.0%
LI ITALY	301	277	24	8.0%	299	277	22	7.4%
LC CYPRUS	60	59	1	1.7%	62	61	1	1.6%
EV LATVIA	40	38	2	5.0%	39	38	1	2.6%
EY LITHUANIA	27	25	2	7.4%	18	18	0	0.0%
EL LUXEMBOURG	47	36	11	23.4%	42	31	11	26.2%
LH HUNGARY	42	38	4	9.5%	45	37	8	17.8%
LM MALTA	54	53	1	1.9%	54	51	3	5.6%
EH NETHERLANDS	108	94	14	13.0%	98	84	14	14.3%
LO AUSTRIA	90	86	4	4.4%	83	79	4	4.8%
EP POLAND	96	89	7	7.3%	89	86	3	3.4%
LP PORTUGAL	112	104	8	7.1%	91	84	7	7.7%
LR ROMANIA	54	48	6	11.1%	63	58	5	7.9%
LJ SLOVENIA	25	21	4	16.0%	22	17	5	22.7%
LZ SLOVAKIA	20	20	0	0.0%	17	15	2	11.8%
EF FINLAND	82	75	7	8.5%	96	92	4	4.2%
ES SWEDEN	89	78	11	12.4%	122	110	12	9.8%
EG UNITED KINGDOM	502	483	19	3.8%	368	350	18	4.9%
BI ICELAND	39	39	0	0.0%	37	33	4	10.8%
EN NORWAY	118	108	10	8.5%	119	109	10	8.4%
LS SWITZERLAND	129	120	9	7.0%	138	131	7	5.1%

The previous tables show that when considering arrivals (respectively departures), the share of routes with problems at total country level slightly increased from 6.4% in 2013 (respectively 6.8% in 2013) to 7.2% in 2014 (respectively 7.8% in 2014). There are however important disparities at country level. Among the 30 reporting countries available in 2013 and 2014, the share of routes with problems has decreased for 11 countries for arrivals and departures.

Arrivals	Route with Freight >= 6500 and where difference >= 50%		Route with Freight >= 1300 and < 1 6500 and where difference >= 75%			Route with Freight >= 100 and < 1300 and where difference >= 150%			) and < 1ce >=	No problem						
	20	13	201	4	201	13	20	14	20	)13	20	14	20	013	2	014
EB BELGIUM	2	1.2%	1	0.6%	7	4.2%	10	6.0%	17	10.2%	16	9.6%	141	84.4%	140	83.8%
LB BULGARIA	0	0.0%	0	0.0%	1	1.6%	1	2.0%	3	4.9%	3	5.9%	57	93.4%	47	92.2%
EK DENMARK	0	0.0%	1	1.2%	2	2.3%	3	3.5%	1	1.1%	2	2.4%	84	96.6%	79	92.9%
ED GERMANY	9	1.1%	10	1.6%	15	1.8%	16	2.5%	26	3.2%	23	3.6%	765	93.9%	589	92.3%
EE ESTONIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	8.7%	0	0.0%	21	91.3%	26	100.0%
EI IRELAND	1	1.0%	1	1.1%	0	0.0%	0	0.0%	2	2.0%	2	2.3%	99	97.1%	85	96.6%
LG GREECE	0	0.0%	0	0.0%	2	1.0%	1	0.9%	1	5.5%	6	5.2%	118	92.9%	109	94.0%
	2	0.2%	2	0.3%	0	1.3%	0	1.0%	0	2.4%	12	3.2% 2.2%	437	90.0%	205	94.9%
	0	0.0%	2	0.9%	0	0.0%	9	4.1%	0	2.6%	1	2.3%	37	91.0%	205	92.0%
LUTALY	2	0.6%	2	0.6%	2	0.6%	2	0.6%	12	3.9%	11	3.6%	292	94.8%	293	95.1%
LC CYPRUS	0	0.0%	0	0.0%	1	1.8%	1	2.0%	0	0.0%	0	0.0%	56	98.2%	50	98.0%
EV LATVIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	3	7.5%	1	2.1%	37	92.5%	46	97.9%
EY LITHUANIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	19	100.0%	18	100.0%
EL LUXEMBOURG	0	0.0%	0	0.0%	2	5.4%	2	5.4%	4	10.8%	4	10.8%	31	83.8%	31	83.8%
LH HUNGARY	1	2.0%	1	2.0%	3	6.1%	4	8.0%	2	4.1%	1	2.0%	43	87.8%	44	88.0%
LM MALTA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	3.8%	2	4.0%	50	96.2%	48	96.0%
EH NETHERLANDS	5	3.6%	6	4.2%	4	2.9%	5	3.5%	5	3.6%	9	6.3%	123	89.8%	122	85.9%
LO AUSTRIA	1	1.1%	2	2.3%	4	4.6%	3	3.5%	1	1.1%	2	2.3%	81	93.1%	79	91.9%
EP POLAND	1	1.0%	1	1.0%	1	1.0%	0	0.0%	6	5.9%	4	4.0%	94	92.2%	96	95.0%
LP PORTUGAL	0	0.0%	0	0.0%	1	1.1%	2	2.4%	3	3.3%	3	3.7%	86	95.6%	//	93.9%
	0	0.0%	0	0.0%	0	0.0%	1	1.8%	4	9.5%	5	8.9% 5.0%	38 24	90.5%	50 10	89.3% 05.0%
LJ SLOVENIA	0	0.0%	0	0.0%	0	0.0 %	0	0.0%	0	4.0%	0	0.0%	24 17	90.0 % 100.0%	19	90.0 % 100.0%
EE EINI AND	0	0.0%	0	0.0%	3	4.0%	2	2.4%	2	2.7%	2	2.4%	70	93.3%	79	95.2%
ES SWEDEN	1	1.1%	1	0.8%	7	8.0%	8	6.6%	0	0.0%	1	0.8%	80	90.9%	111	91.7%
EG UNITED KINGDOM	5	0.9%	6	1.5%	8	1.5%	6	1.5%	14	2.5%	16	4.1%	523	95.1%	364	92.9%
BI ICELAND	1	3.0%	1	2.8%	0	0.0%	0	0.0%	3	9.1%	1	2.8%	29	87.9%	34	94.4%
EN NORWAY	0	0.0%	1	0.9%	2	1.9%	3	2.8%	7	6.7%	7	6.5%	95	91.3%	97	89.8%
LS SWITZERLAND	0	0.0%	0	0.0%	1	0.9%	1	0.9%	6	5.4%	5	4.5%	105	93.8%	105	94.6%
	Pouto	with Ero	in ht > = CE	00 and	Route w	ith Freigh	it>= 130	0 and <	Route v	with Freia	ht>= 100	and <				
Departures	wh	ere differ	ence >= f	00 and 0%	6500 a	ind wher	e differen	ce >=	1300 a	and wher	e differen	ce >=		No pro	blem	
Departures	wh	ere differ	ence >= 5	00 and i0%	6500 a	ind wher 75	e differen %	ce >=	1300 a	and wher 150	e differen )%	ce >=		No pro	blem	
Departures	wh	ere differ	ence >= 5	00 and i0%	6500 a	ind wher 75 13	e differen % 20	ce >=	1300 a	and wher 150	e differen )% 20'	ce >=	20	No pro	blem 20	14
Departures	20 2	1.1%	ence >= 5	1.2%	6500 a	13 2.3%	e differen % 20 7	ce >=	1300 a 20 18	and wher 150 113 10.2%	e differen 0% <u>207</u> 14	ce >= 14 8.5%	20 153	No pro	blem 20 141	14 86.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK	20 2 0	113 1.1% 0.0%	ence >= 5 20' 2 0	1.2% 0.0%	6500 a 20 <sup>-</sup> 4 0 2	nd wher 75 13 2.3% 0.0%	e differen % 20 7 0	ce >= 14 4.3% 0.0%	1300 a 20 18 2	and wher 150 13 10.2% 3.7%	e differen )% <u>20'</u> 14 3	ce >= 14 8.5% 5.3%	20 153 52 75	No pro	blem 20 141 54 76	14 86.0% 94.7%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY	20 21 2 0 1	113 1.1% 0.0% 1.2% 1.3%	gnt >= 65 ence >= 5 20 <sup>-</sup> 2 0 2 10	1.2% 0.0% 2.3% 1.7%	6500 a 20 <sup>.</sup> 4 0 2 9	nd wher 75 13 2.3% 0.0% 2.4% 1.2%	e differen % 20 7 0 4 12	ce >= 14 4.3% 0.0% 4.7% 2.0%	1300 a 20 18 2 4 35	and wher 150 113 10.2% 3.7% 4.9% 4.7%	e differen )% <u>20'</u> 14 3 4 35	ce >= 14 8.5% 5.3% 4.7% 5.8%	20 153 52 75 696	No pro	blem 20 141 54 76 544	14 86.0% 94.7% 88.4% 90.5%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY FF FSTONIA	20 20 2 0 1 10 10	113 1.1% 0.0% 1.2% 1.3% 4.8%	gnt >= 65 ence >= 5 20' 2 0 2 10 10	1.2% 0.0% 2.3% 1.7% 4.0%	6500 a 20 <sup>-</sup> 4 0 2 9 0	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0%	e differen % 20 7 0 4 12 0	ce >= <u>14</u> 4.3% 0.0% 4.7% 2.0% 0.0%	1300 a 20 18 2 4 35 2	and wher 150 13 10.2% 3.7% 4.9% 4.7% 9.5%	e differen )% <u>20'</u> 14 3 4 35 2	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0%	20 153 52 75 696 18	No pro	blem 20 141 54 76 544 22	14 86.0% 94.7% 88.4% 90.5% 88.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND	wh 20 2 0 1 10 1 0	113 1.1% 0.0% 1.2% 1.3% 4.8% 0.0%	gnt >= 65 ence >= 5 20 <sup>-</sup> 2 0 2 10 1 1 0	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0%	6500 a 20 <sup>.</sup> 4 0 2 9 0 0	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 0.0%	e differen % 20 7 0 4 12 0 0	ce >= <u>14</u> <u>4.3%</u> 0.0% <u>4.7%</u> 2.0% 0.0% 0.0%	1300 a 20 18 2 4 35 2 1	and wher 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9%	e differen )% 14 3 4 35 2 3	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1%	20 153 52 75 696 18 110	No pro	blem 20 141 54 76 544 22 93	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE	20 2 0 1 10 1 0 0 0	1.1% 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.0%	gnt >= 65 ence >= 5 20 2 0 2 10 1 1 0 0 0	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0%	6500 a 20 <sup>-</sup> 4 0 2 9 0 0 0 2	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 0.0% 1.2%	e differen % 20 7 0 4 12 0 0 0 2	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4%	1300 a 20 18 2 4 35 2 1 6	and wher 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6%	e differen <u>)%</u> <u>20'</u> 14 3 4 35 2 3 6	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1%	20 153 52 75 696 18 110 159	No pro	blem 20 141 54 76 544 22 93 137	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN	wh 20 2 0 1 10 1 0 0 3	113 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.0% 0.0% 0.6%	gn(>= 65 ence >= 5 20 2 0 2 10 1 1 0 3	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.7%	6500 a 20 4 0 2 9 0 0 2 7	nd wher 75 13 2.3% 0.0% 1.2% 0.0% 0.0% 1.2% 1.5%	e differen % 20 7 0 4 12 0 0 2 8	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4% 2.0%	1300 a 20 18 2 4 35 2 1 6 14	and wher 150 13 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0%	e differen )% 20' 14 3 4 35 2 3 6 18	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4%	20 153 52 75 696 18 110 159 438	No pro	blem 20 141 54 76 544 22 93 137 381	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE	wh 20 2 0 1 10 1 0 3 3 3	113           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.0%           0.6%           1.1%	9(11) = 05 ence >= 5 20 2 0 2 10 1 1 0 0 3 3 3	1.2% 0.0% 1.2% 0.0% 1.7% 4.0% 0.0% 0.0% 0.7% 1.2%	6500 a 20 <sup>-</sup> 4 0 2 9 0 0 2 7 7 7	nd wher 75 2.3% 0.0% 2.4% 1.2% 0.0% 0.0% 1.2% 1.5% 2.5%	e differen <u>20</u> 7 0 4 12 0 0 2 8 8 8	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 1.4% 2.0% 3.1%	1300 a 20 18 2 4 35 2 1 6 14 8	and wher 150 13 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9%	e differen )% 20' 14 3 4 35 2 3 6 18 7	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7%	20 153 52 75 696 18 110 159 438 260	No pro	blem 20 141 54 76 544 22 93 137 381 238	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 93.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA	20 2 0 1 10 1 0 0 3 3 0	<pre>will Fre ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.0% 0.6% 1.1% 0.0%</pre>	200 200 2 10 1 3 3 0 3 0	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.7% 1.2% 0.0%	6500 a 20 <sup>-</sup> 4 0 2 9 0 0 2 7 7 7 0	nd wher 75 2.3% 0.0% 2.4% 1.2% 0.0% 0.0% 1.2% 1.5% 2.5% 0.0%	e differen <u>20</u> 7 0 4 12 0 0 2 8 8 0	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 1.4% 2.0% 3.1% 0.0%	1300 a 20 18 2 4 35 2 1 6 14 8 1	and wher 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3%	e differen )% 14 3 4 35 2 3 6 18 7 1	ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0%	20 153 52 75 696 18 110 159 438 260 43	No pro	blem 20 141 54 76 544 22 93 137 381 238 32	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 93.0% 97.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY	wh 20 1 10 1 0 3 3 0 4	<pre>www.in Free ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.6% 1.1% 0.0% 1.3%</pre>	gn(>- 65 ence >= 5 20 <sup>-</sup> 2 0 2 10 1 1 0 3 3 3 0 4	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.7% 1.2% 0.0% 1.3%	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.5% 2.5% 0.0% 2.7%	e differen % 20 7 0 4 12 0 0 2 8 8 8 0 6	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4% 2.0% 3.1% 0.0% 2.0%	1300 a 20 18 2 4 35 2 1 6 14 8 1 1 2	and wher 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0%	e differen )% 20* 14 3 4 35 2 3 6 18 7 1 12	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0%	20 153 52 75 696 18 110 159 438 260 43 277	No pro	blem 20 141 54 76 544 22 93 137 381 238 32 277	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 93.0% 97.0% 92.6%
Departures	wh 20 2 0 1 10 1 0 0 3 3 0 4 1 2	will Fle ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.0% 0.6% 1.1% 0.0% 1.3% 1.3%	200 200 2 0 2 10 1 0 3 3 0 4 1 0	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 1.2% 0.0% 1.3% 1.3% 1.6%	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8 0	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.5% 2.5% 0.0% 2.7% 0.0%	e differen % 20 7 0 4 12 0 0 2 8 8 8 0 6 0	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4% 2.0% 3.1% 0.0% 2.0% 0.0% 0.0%	1300 a 20 18 2 4 35 2 1 6 14 8 1 12 0	and where 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0% 0.0%	e differen )% 14 3 4 35 2 3 6 18 7 1 12 0	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0	20 153 52 75 696 18 110 159 438 260 43 277 59	No pro	blem 20 141 54 76 544 22 93 137 381 238 32 277 61 02	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 93.0% 97.0% 92.6% 98.4%
Departures	wh 20 2 0 1 10 1 0 3 3 0 4 1 0 0 3 0 4 1 0 0 0 0 0 0 0 0 0 0 0 0 0	will Fle ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.6% 1.1% 0.0% 1.3% 1.3% 1.7% 0.0%	200 2 0 2 10 1 0 3 3 0 4 1 0 0 3 3 0 4	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 1.2% 0.0% 1.3% 1.6% 0.0%	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8 0 0 0	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.5% 2.5% 0.0% 2.7% 0.0% 0.0%	e differen % 20 7 0 4 12 0 0 2 8 8 8 0 6 0 0 0	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4% 2.0% 3.1% 0.0% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0%	1300 a 20 18 2 4 35 2 1 6 14 8 1 12 0 2 2	and where 150 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0%	e differen )% 14 3 4 35 2 3 6 18 7 1 12 0 1	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0% 2.6%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25	No pro	blem 20 141 54 76 544 22 93 137 381 238 32 277 61 38 19 277 19 277 19 20 20 20 20 20 20 20 20 20 20	14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 92.9% 92.6% 92.6% 98.4% 97.4%
Departures	wh 20 1 10 1 0 3 3 0 4 1 0 3 3 0 4 1 0 3 3 0 4 1 0 3 3 0 3 3 0 3 3 0 3 3 0 3 3 0 3 3 0 3 3 0 3 3 3 3 3 3 3 3 3 3 3 3 3	wwill Flee ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.6% 1.1% 0.0% 1.3% 1.7% 0.0% 0.0% 0.0% 0.0%	gn(2-05 ence >= 5 20 2 0 2 10 1 1 0 0 3 3 0 4 4 1 0 0 4	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.7% 1.2% 0.0% 1.3% 1.6% 0.0% 9.5%	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.5% 2.5% 0.0% 2.7% 0.0% 0.0% 0.0% 6.4%	e differen % 7 0 4 12 0 0 2 8 8 8 0 6 0 0 0 0 3	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0	1300 a 20 18 2 4 35 2 1 6 14 8 1 12 0 2 2 5	and wher 150 113 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0% 7.4% 10.6%	e differen )% 20' 14 3 4 35 2 3 6 18 7 1 12 0 1 0 4	ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0% 2.6% 0.5% 5% 5% 5% 5% 5% 5% 5%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 277 59 38 25 26	No pro	blem 20 141 54 76 544 22 93 137 381 238 32 277 61 38 18 31	14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 92.9% 92.9% 92.6% 92.6% 92.6% 97.4% 100.0% 73.8%
Departures	wh 20 2 0 1 10 1 0 3 3 0 4 1 0 0 3 0 4 1 0 0 3 0 4 1 0 0 3 0 0 0 0 0 0 0 0 0 0 0 0 0	wwill Flee ere differ 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.6% 1.1% 0.0% 1.3% 1.7% 0.0% 0.0% 6.4% 0.0%	gn(2-65 ence >= 5 20 2 0 2 10 1 1 0 0 3 3 0 4 1 0 0 4 1 0 0 4 0	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.0% 1.2% 0.0% 1.3% 1.6% 0.0% 0.0% 9.5%	6500 a 20: 4 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3 3	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 0.0% 1.5% 2.5% 0.0% 0.0% 0.0% 0.0% 6.4% 7.1%	e differen % 7 0 4 12 0 0 2 8 8 8 0 6 0 0 0 0 0 3 5	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 2.0% 0.0% 0.0% 0.0% 0.0% 7.1% 11.1%	1300 a 20 18 2 4 35 2 1 6 14 8 1 12 0 2 5 1 1 2 5 1 1 1 2 1 1 1 1 1 1 1 1 1 1 1 1 1	and wher 150 113 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0% 7.4% 10.6% 2.4%	e differen )% 20' 14 3 4 35 2 3 6 18 7 1 12 0 1 10 0 4 3	ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0% 2.6% 0.0% 9.5% 6.7%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38	No pro	blem 20 141 54 76 544 22 93 137 381 238 32 277 61 38 18 31 37	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 97.0% 92.6% 92.6% 92.6% 92.6% 92.6% 92.4% 100.0% 73.8%
Departures	white the second	will File ere differ 113 1.1% 0.0% 1.2% 1.3% 4.8% 0.0% 0.6% 1.1% 0.0% 1.3% 1.7% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0%	gn(2-65 ence >= 5 20 2 0 2 10 1 1 0 0 3 3 0 4 1 0 0 4 1 0 0 4 0 0	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0%	6500 a 20 4 0 2 9 0 0 2 7 7 7 7 0 8 0 0 0 3 3 1	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.5% 2.5% 0.0% 2.7% 0.0% 0.0% 0.0% 0.0% 6.4% 7.1% 1.9%	e differen % 20 7 0 4 12 0 2 8 8 0 0 0 0 0 0 0 3 5 1	ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 1.4% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0% 1.1% 1.9%	1300 a 20 18 2 4 35 2 1 6 14 8 1 12 0 2 2 5 1 0	and wher 150 113 10.2% 3.7% 4.9% 4.7% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0% 7.4% 10.6% 2.4% 0.0%	e differen )% 207 14 3 4 35 2 3 6 18 7 1 12 0 1 0 4 3 2	ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0% 2.6% 0.0% 9.5% 6.7% 3.7%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 38 25 36 38 53	No pro	blem 200 141 54 76 544 22 93 137 381 238 32 277 61 38 8 31 37 51	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 94.5% 92.9% 97.0% 92.6% 98.4% 97.4% 100.0% 73.8% 82.2%
Departures	where the second	113           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%           0.6%           0.1%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%	gn(2-65 ence >= 5 20 2 0 2 10 1 1 0 0 3 3 0 4 1 0 0 4 1 0 0 3 3 3 0 4 3 3 0 3 3 3 0 3 3 3 0 3 3 3 0 3 3 3 3	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.0% 0.7% 1.2% 0.0% 0.	6500 a 20 4 0 2 9 0 2 7 7 7 0 8 8 0 0 0 3 3 1 4	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 0.0% 1.5% 2.5% 0.0% 0.0% 0.0% 0.0% 6.4% 7.1% 1.9% 3.7%	e differen % 20 7 0 4 12 0 0 2 8 8 8 0 0 2 8 8 0 0 0 0 0 0 3 5 1 2	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0	1300 a 20 18 2 4 35 2 1 6 14 8 1 1 2 2 5 1 0 9	and wher 150 113 10.2% 3.7% 4.9% 4.7% 0.9% 3.6% 3.0% 2.9% 2.3% 4.0% 0.0% 5.0% 7.4% 10.6% 2.4% 0.0% 8.3%	e differen )% 20° 14 3 4 35 2 3 6 18 7 1 12 0 1 0 4 3 2 9	ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 2.7% 3.0% 0.0% 2.6% 0.0% 9.5% 6.7% 3.7% 3.2% 0	20 153 52 75 696 18 110 159 438 260 438 260 433 277 59 38 25 36 38 25 36 38 53 94	No pro	200 141 54 76 544 22 93 317 381 228 32 277 61 38 32 277 61 38 31 37 51 84	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 92.9% 92.9% 92.9% 92.6% 92.6% 92.6% 92.6% 92.4% 82.2% 94.4% 85.7%
Departures	where the second	113           1.1%           0.0%           1.2%           4.8%           0.0%           0.9%           0.0%	gn(2-65 ence >= 5 20 2 10 1 1 0 3 3 0 4 1 0 0 4 1 0 0 4 0 0 4 0 0 3 0 0	14 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.0% 0.7% 1.2% 0.0% 0.	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3 3 1 4 2	nd wher 75 33 2.3% 2.4% 2.4% 0.0% 0.0% 1.2% 0.0% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	20           7         7           0         4           12         0           0         2           8         8           0         0           2         8           8         0           6         0           0         0           3         5           1         2           2         2	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 0.0% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0% 1.1.1% 1.9% 2.0% 2.4%	1300 a 20 18 2 4 4 35 2 1 6 14 8 1 12 0 2 2 5 1 0 9 2 2	and wher 150 10.2% 3.7% 4.9% 9.5% 0.9% 3.6% 2.9% 2.3% 4.0% 0.0% 5.0% 7.4% 10.6% 2.4% 0.0% 8.3% 2.2%	e differen 1% 20 14 3 4 35 2 3 6 18 7 1 12 0 1 12 0 1 12 0 1 2 2 3 6 18 7 1 12 0 1 2 2 2 3 6 18 3 2 3 6 18 3 5 2 3 6 18 3 5 2 3 6 18 3 5 2 3 6 18 3 5 2 3 6 18 3 5 2 3 6 18 19 19 19 19 19 10 10 10 10 10 10 10 10 10 10	Let >= 14 8.5% 5.3% 4.7% 5.8% 6.8% 3.1% 4.7% 4.7% 4.1% 4.4% 2.7% 3.0% 4.0% 0.0% 9.5% 6.7% 3.7% 3.7% 2.6% 2.4%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 38 33 94 86	No pro	200 141 54 76 544 22 93 317 381 228 32 2277 61 38 32 2277 61 38 18 31 37 51 84 79	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 92.9% 92.9% 93.0% 97.0% 92.6% 97.4% 100.0% 73.8% 82.2% 94.4% 85.7%
Departures	200         2           0         1           100         0           3         3           0         4           1         0           0         3           3         0           0         1           0         1           0         1           1         0           1         1	113           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.6%           0.0%	gn(2-65 ence >= 5 20 2 10 1 1 0 3 3 0 4 1 0 0 4 1 0 0 4 0 0 3 0 1	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0	6500 a 20 4 0 2 9 0 0 2 7 7 0 8 0 0 0 3 3 1 4 2 1	nd where 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 2.5% 0.0% 2.7% 0.0% 2.7% 0.0% 0.0% 6.4% 7.1% 1.9% 3.7% 3.7%	200           7           0           4           12           0           2           8           0           0           2           8           0           0           12           0           0           2           1           2           2           0	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 2.0% 0.0% 2.0% 0.0% 0.0% 1.1% 1.1% 1.9% 2.0% 0.0%	1300 a 200 18 2 4 35 2 1 6 6 14 8 1 12 2 2 5 1 0 9 9 2 5 5 5 5 5 1 1 0 2 5 5 1 1 1 1 1 1 1 1 1 1 1 1 1	10.102% 15(7) 10.2% 3.7% 4.9% 4.9% 4.7% 9.5% 0.9% 3.6% 2.3% 4.0% 0.0% 2.3% 10.6% 2.4% 0.0% 2.4% 0.0% 8.3% 2.2% 5.2%	e differen % 200 14 3 4 35 2 3 6 6 8 7 7 1 12 0 1 0 4 3 2 9 9 2 2 2	Ce >= 14 8.5% 5.3% 5.3% 8.0% 3.1% 4.1% 4.1% 4.4% 2.6% 0.0% 9.5% 6.7% 3.7% 9.2% 2.4% 2.2%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 53 94 86 89	No pro	200 141 54 544 22 93 137 381 238 32 277 61 38 18 31 37 51 84 79 86	14 86.0% 94.7% 88.4% 90.5% 88.0% 92.9% 92.9% 92.9% 93.0% 97.0% 92.6% 97.0% 97.4% 82.2% 94.4% 85.7% 95.2% 96.6%
Departures	Note         Note           20         2         0           1         10         0           3         3         3           0         0         3           3         0         0           3         3         0           0         1         1           0         0         1           1         0         1           1         1         1	13           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%	$\begin{array}{c} g(n) > - 63\\ ence > = 6\\ \hline 20\\ 0\\ 2\\ 10\\ 1\\ 1\\ 0\\ 0\\ 3\\ 3\\ 3\\ 0\\ 4\\ 1\\ 1\\ 0\\ 0\\ 4\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 1\\ 1\\ 1\end{array}$	1.2%           0.0%           1.2%           0.0%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           1.6%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.1%           1.1%	6500 a 20: 4 0 2 9 0 0 2 7 7 0 0 2 7 7 0 8 0 0 0 0 0 0 0 3 1 4 2 1 5 5	nd wher 75 33 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 0.0% 2.5% 0.0% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	200           7         7           0         4           12         0           0         2           8         8           0         6           0         0           3         5           1         2           2         0           3         3	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 2.0% 2.0% 2.0% 0.0% 1.4% 0.0% 1.4% 1.9% 2.0% 11.1% 1.9% 2.0% 3.3%	1300 a 200 18 2 4 35 2 1 6 14 8 1 12 0 0 2 2 5 1 0 9 2 5 2 2 2 5 1 1 0 2 2 2 2 1 1 1 2 2 2 1 2 2 2 1 2 2 2 2 2 2 2 2 2 2 2 2 2	10.102% 15(7) 10.2% 3.7% 4.9% 4.9% 4.9% 0.9% 3.6% 3.6% 2.3% 4.0% 0.0% 2.3% 10.6% 2.4% 0.0% 8.3% 0.0% 2.2% 5.2% 1.8%	e differen % 200 14 3 4 35 2 3 6 6 18 7 7 1 12 0 1 0 4 3 2 9 9 2 2 3 3	Ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.4% 4.4% 4.2% 3.0% 4.0% 0.0% 9.5% 6.7% 3.7% 9.2% 3.3%	20 153 52 696 18 110 159 438 260 43 277 59 38 260 43 277 59 38 36 38 35 3 94 46 89 104	No pro	200 141 54 544 22 93 137 381 238 32 277 61 38 18 31 37 51 84 37 9 86 84	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 92.9% 93.0% 97.0% 92.6% 97.4% 100.0% 82.2% 94.4% 85.7% 95.2% 96.6% 92.3%
Departures	Note         Provide           22         0           1         10           1         1           0         3           3         3           0         4           1         1           0         0           1         1           0         1           1         1           0         1	13           1.1%           0.0%           1.2%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%           0.6%           1.1%           0.0%           0.6%           1.1%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%	$\begin{array}{c} g(n) > - 63\\ ence > = 6\\ \hline 20\\ 0\\ 2\\ 10\\ 1\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 4\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 4\\ 1\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 3\\ 0\\ 0\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\$	1.2%           0.0%           1.2%           0.0%           1.7%           4.0%           0.0%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.2%           0.0%           0.0%           0.0%           1.1%           0.0%           1.1%           0.0%	6500 a 20 4 0 2 9 0 0 2 7 7 7 0 8 0 0 0 0 0 0 0 0 0 0 0 0 0	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	200           7         0           4         12           0         0           2200         2           8         8           8         0           0         0           0         0           12         2           0         0           3         5           1         2           2         0           0         3           3         2	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0	1300 £ 200 18 2 2 4 35 2 2 1 6 6 4 14 8 8 1 1 12 2 5 1 1 0 9 9 9 2 2 2 2 4 4 4 35 5 2 1 1 6 1 4 8 1 4 1 7 1 6 1 6 1 4 7 1 6 1 7 1 7 1 7 1 7 1 7 1 7 1 7 1 7	13 10.2% 4.9% 4.9% 4.9% 4.9% 4.7% 9.5% 0.9% 2.9% 3.0% 2.9% 3.0% 2.9% 3.0% 5.0% 7.4% 0.0% 8.3% 0.0% 8.3% 0.0% 8.3% 1.6% 1.6% 1.6% 1.6% 1.6% 1.6% 1.6% 1.6	e differen % 200 14 3 4 35 2 2 3 6 6 8 8 7 1 1 2 0 1 0 1 0 4 3 2 9 2 2 2 2 3 3 3 6 8 7 1 2 9 2 2 2 3 3 6 8 7 7 10 10 10 10 10 10 10 10 10 10 10 10 10	14           8.5%           5.3%           4.7%           5.8%           8.9%           5.8%           8.9%           3.1%           4.4%           2.7%           3.0%           4.0%           2.7%           3.0%           4.0%           2.6%           0.0%           2.6%           0.7%           3.7%           9.2%           2.4%           3.3%           4.8%	20 153 52 75 696 18 110 438 260 438 260 43 277 59 38 25 36 83 94 86 89 104 48 80 91 104 104 104 104 104 104 104 10	No pro	20           141         54           5544         22           93         137           381         32           2277         61           38         31           37         51           84         79           86         84           58         54	14 86.0% 94.7% 88.4% 90.5% 88.0% 96.9% 93.0% 97.0% 92.9% 97.4% 100.0% 73.8% 82.2% 94.4% 85.7% 95.2% 96.6% 92.3% 92.3%
Departures	Robinstance         Robinstance           22         2         0           1         10         1           0         3         3           0         4         1           1         0         0           3         3         0           0         0         3           0         0         0           1         1         0           0         1         1           0         0         0           0         1         1           0         0         0	13           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%	$\begin{array}{c} g(n) > - 63\\ ence > = 6\\ \hline 20\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 4\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 3\\ 0\\ 0\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\$	1.2%           0.0%           4           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.2%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%	6500 a 20 4 0 2 9 0 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3 3 1 4 2 1 5 2 1 1 5 2 1 1 1 1 1 1 1 1 1 1 1 1 1	nd wher 75 13 2.3% 2.3% 2.0% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 2.7% 0.0% 0.0% 0.0% 2.4% 1.2% 1.2% 0.0% 0	e differen % 200 7 0 4 4 12 0 0 2 8 8 8 0 0 0 2 2 8 8 8 0 0 0 0 0	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 2.0% 3.1% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0% 0.0% 3.1% 0.0	1300 £ 200 188 2 4 35 2 2 1 6 14 8 1 1 12 0 0 2 2 5 5 1 0 9 9 2 2 5 5 2 4 3 3 5 2 2 4 3 5 5 5 1 1 0 9 9 9 2 2 5 5 1 1 0 9 9 9 2 2 5 5 1 1 0 9 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	133 10.2% 4,9% 4,9% 4,9% 4,9% 4,9% 4,9% 4,9% 4,9	e differen % 2000 14 3 4 35 2 2 3 6 6 18 7 1 1 2 0 0 1 0 4 3 2 9 2 2 2 3 3 4 5 2 3 6 6 18 7 7 1 1 1 2 0 0 14 35 2 2 0 14 35 2 0 14 35 2 2 0 14 35 2 0 14 35 2 0 14 35 2 2 0 14 35 2 10 14 35 2 10 14 35 2 10 14 35 2 2 10 14 35 2 10 14 35 2 2 10 14 35 2 10 14 35 2 2 10 14 35 2 2 10 14 35 2 2 3 3 6 10 11 11 11 11 11 11 11 11 11 11 11 11	14           8.5%           5.3%           4.7%           5.8%           8.0%           3.1%           4.4%           2.7%           3.0%           4.0%           0.0%           2.6%           0.0%           2.6%           0.0%           2.4%           3.3%           4.8%           18.2%	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 89 94 86 89 104 48 21 21 25 25 25 25 25 25 25 25 25 25	No pro	blem 200 141 54 76 544 22 93 381 381 238 327 61 38 18 31 37 51 84 79 86 84 55 84 79 86 84 71 75 75 75 75 75 75 75 75 75 75	14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 93.0% 97.0% 92.6% 98.4% 97.4% 100.0% 73.8% 82.2% 94.4% 85.7% 95.2% 95.2% 92.3% 92.1% 77.3%
Departures	Note           22           0           1           10           1           0           3           3           0           4           1           0           0           0           1           0           0           1           0           0           0           0           0           0           1           1           0 <td>13           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%</td> <td><math display="block">\begin{array}{c} g(n) &gt; -63\\ ence &gt; = 5\\ \hline 20\\ 0\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 4\\ 1\\ 0\\ 0\\ 0\\ 3\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\</math></td> <td>1.2%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           0.0%</td> <td>6500 a 20 4 0 2 9 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3 3 1 4 2 1 5 2 1 0 5 2 1 5 2 1 5 2 5 5 6 1 5 5 5 5 5 5 5 5 5 5 5 5 5</td> <td>nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 2.7% 0.0% 0.0% 2.7% 0.0% 0</td> <td>200           7         0           4         12           0         0           22         0           3         5           1         2           2         0           3         2           1         0           1         2           2         2           1         1           1         2           2         2           1         1           1         0</td> <td>Ce &gt;= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 3.1% 0.0% 4.5% 0.0</td> <td>1300 £ 200 188 2 4 35 2 2 4 35 2 2 2 2 2 2 5 5 2 2 2 5 5 2 2 2 2 2 2 5 5 2 2 2 2 2 2 2 2 2 2 2 2 2</td> <td>113 10.2% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9</td> <td>e differen % 200 14 3 4 35 2 3 6 8 7 1 1 2 0 0 1 0 4 3 2 9 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 0 1 4 3 5 5 2 3 5 5 2 3 3 5 5 2 3 3 5 5 2 3 5 5 3 5 5 3 5 3</td> <td>Ce &gt;= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.7% 3.0% 4.9% 3.0% 4.0% 0.0% 2.6% 0.0% 2.6% 0.0% 2.6% 10.0% 2.2% 3.3% 4.4% 18.2% 11.8%</td> <td>200 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 89 94 86 89 94 86 89 94 104 48 21 200</td> <td>No pro</td> <td>200           141           54           76           544           22           93           381           322           277           61           38           18           317           51           84           79           86           58           17           15           58           17           58           17           58           17           56           57</td> <td>14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 93.0% 97.0% 92.6% 98.4% 97.4% 100.0% 73.8% 82.2% 94.4% 95.2% 92.3% 92.1% 77.3% 88.2%</td>	13           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%	$\begin{array}{c} g(n) > -63\\ ence > = 5\\ \hline 20\\ 0\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 2\\ 10\\ 1\\ 0\\ 0\\ 3\\ 3\\ 0\\ 4\\ 1\\ 0\\ 0\\ 0\\ 3\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 1\\ 1\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\ 0\\$	1.2%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           0.0%	6500 a 20 4 0 2 9 0 2 9 0 0 2 7 7 7 0 8 0 0 0 3 3 1 4 2 1 5 2 1 0 5 2 1 5 2 1 5 2 5 5 6 1 5 5 5 5 5 5 5 5 5 5 5 5 5	nd wher 75 13 2.3% 0.0% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 2.7% 0.0% 0.0% 2.7% 0.0% 0	200           7         0           4         12           0         0           22         0           3         5           1         2           2         0           3         2           1         0           1         2           2         2           1         1           1         2           2         2           1         1           1         0	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 3.1% 0.0% 4.5% 0.0	1300 £ 200 188 2 4 35 2 2 4 35 2 2 2 2 2 2 5 5 2 2 2 5 5 2 2 2 2 2 2 5 5 2 2 2 2 2 2 2 2 2 2 2 2 2	113 10.2% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9% 4.9	e differen % 200 14 3 4 35 2 3 6 8 7 1 1 2 0 0 1 0 4 3 2 9 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 3 3 4 2 2 0 1 4 3 5 5 2 3 5 5 2 3 3 5 5 2 3 3 5 5 2 3 5 5 3 5 5 3 5 3	Ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.7% 3.0% 4.9% 3.0% 4.0% 0.0% 2.6% 0.0% 2.6% 0.0% 2.6% 10.0% 2.2% 3.3% 4.4% 18.2% 11.8%	200 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 89 94 86 89 94 86 89 94 104 48 21 200	No pro	200           141           54           76           544           22           93           381           322           277           61           38           18           317           51           84           79           86           58           17           15           58           17           58           17           58           17           56           57	14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 93.0% 97.0% 92.6% 98.4% 97.4% 100.0% 73.8% 82.2% 94.4% 95.2% 92.3% 92.1% 77.3% 88.2%
Departures	Robie         Robie           22         0           1         10           1         10           3         3           0         0           3         3           0         1           1         0           0         0           1         1           0         0           0         0           0         0           0         0           0         0           0         0           0         0           0         0           0         0	13           1.1%           0.0%           1.2%           1.2%           1.3%           4.8%           0.0%           1.3%           4.8%           0.0%           0.6%           1.3%           0.0%           0.6%           1.3%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%           0.0%	g(n) = -63 ence >= 5 20 2 10 2 10 1 0 0 2 10 3 3 0 4 1 0 0 4 0 0 3 0 1 1 0 0 0 1 1 1 0 0 0 1 1 1 0 0 0 1 1 1 0 0 0 1 1 1 0 0 0 0 1 1 1 0 0 0 0 1 1 1 0 0 0 0 1 1 1 0 0 0 0 1 1 1 0 0 0 0 1 1 1 0 0 0 0 0 1 1 1 0 0 0 0 0 1 1 1 0 0 0 0 0 1 1 1 0 0 0 0 0 1 1 1 0 0 0 0 0 1 1 1 0	1.2%           1.2%           0.0%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           0.0%	6500 a 20 4 0 2 9 0 2 9 0 2 7 7 7 0 8 0 0 2 7 7 0 8 0 0 0 2 1 5 2 1 0 5 7 1 5 2 1 1 1 5 2 1 1 1 5 2 1 1 1 1 1 1 1 1 1 1 1 1 1	nd wher 75 13 2.3% 2.0% 2.4% 1.2% 0.0% 2.4% 1.2% 2.5% 0.0% 2.7% 0.0% 0	200           7         0           4         12           0         4           12         0           0         2           8         8           0         0           2         8           0         0           3         5           1         2           2         0           3         2           1         0           2         2           3         2           1         0           2         8	Ce >= 4.3% 0.0% 4.7% 2.0% 0.0% 2.0% 0.0% 0.0% 0.0% 0.0% 0.0	1300 £ 200 188 2 4 35 2 2 4 35 2 2 1 6 6 14 8 1 12 0 0 2 2 5 5 1 0 9 9 2 2 5 5 2 2 2 2 2 2 5 5 1 1 1 2 2 2 2 2 2 2 2 2 2 2 2 2	133 10.2% 3.7% 4.9% 4.7% 9.5% 0.9% 2.3% 4.0% 2.3% 4.0% 0.0% 2.2% 10.6% 2.3% 4.0% 0.0% 8.3% 2.2% 10.6% 2.2% 10.6% 2.2% 10.6% 2.2% 10.0% 2.2% 10.0% 2.4% 2.3% 2.2% 2.3% 2.2% 2.3% 2.2% 2.3% 2.2% 2.3% 2.2% 2.3% 2.4% 2.4% 2.4% 2.4% 2.4% 2.4% 2.4% 2.4	e differen % 200 14 3 4 35 2 3 3 4 35 2 3 3 6 6 8 7 1 1 2 0 0 4 3 2 2 2 2 2 3 3 4 2 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 0 1 4 3 5 5 2 3 6 6 1 2 0 1 4 3 5 5 5 2 3 6 6 1 9 1 1 4 3 5 5 5 2 1 1 4 3 5 5 5 5 1 1 4 1 4 3 5 5 5 2 3 6 6 1 1 4 1 4 3 5 5 5 7 1 1 4 1 3 5 5 5 7 1 1 4 3 5 5 5 7 2 3 6 6 7 1 1 4 3 5 5 5 7 1 1 4 3 5 5 7 1 1 4 3 5 5 5 7 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	Ce >= 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 4.7% 3.0% 4.1% 3.0% 4.0% 3.0% 4.0% 0.0% 9.5% 4.0% 3.3% 4.2% 1.0% 2.2% 11.8% 1.0% 2.5%	200 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 38 53 94 86 94 80 94 48 21 20 75 78	No pro	blem 200 141 54 76 544 22 93 381 238 32 277 61 38 18 31 37 61 38 18 31 37 61 38 18 31 37 61 38 137 51 84 76 64 54 22 277 61 51 51 51 51 51 51 51 51 51 5	14 86.0% 94.7% 88.4% 90.5% 88.0% 94.5% 92.9% 93.0% 97.0% 98.4% 97.4% 100.0% 73.8% 82.2% 94.4% 95.2% 96.6% 92.3% 92.1% 88.2% 90.2%
Departures	Robie         Robie           22         0           1         10           1         10           3         3           0         0           3         3           0         0           1         1           0         0           1         1           0         0           0         0           0         0           1         1           0         0           0         0           1         3	Multi Here           1.1%           0.0%           1.2%           1.2%           1.3%           4.8%           0.0%           0.6%           1.1%           0.0%           0.6%           1.1%           0.0% <td>g(n) = -63 ence &gt;= 5 20 2 10 2 10 1 0 0 2 10 3 3 0 4 1 0 0 4 0 0 3 0 1 1 1 0 0 0 1 1 1 0 0 0 1 1 2 0 0 0 1 1 2 0 0 0 0</td> <td>1.2%           1.2%           0.0%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           0.0%</td> <td>6500 a 20 4 0 2 9 0 2 7 7 0 8 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 0 0 2 9 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 0 2 7 7 0 0 0 0 0 0 2 7 7 0 0 0 0 0 0 0 0 0 0 0 0 0</td> <td>nd wher 75 33 2.3% 2.3% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 2.7% 2.5% 0.0% 0.0% 6.4% 1.9% 3.7% 4.5% 1.9% 3.7% 4.5% 0.0% 6.1% 7.9% 0.0% 2.2% 0.0% 6.1% 1.9% 2.2% 0.0% 2.2% 0.0% 2.7% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0</td> <td>200           7         0           4         12           0         4           12         0           0         2           8         8           0         0           2         8           0         0           3         3           2         2           0         3           2         1           0         2           1         0           2         3           2         1           0         2           3         4</td> <td>Ce &gt;= 4.3% 0.0% 4.7% 2.0% 0.0% 2.0% 0.0% 1.4% 0.0% 3.1% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0</td> <td>1300 £ 200 188 2 4 35 2 2 4 35 2 2 1 6 6 14 8 1 12 0 0 2 2 2 5 5 2 2 4 3 5 5 2 2 2 2 2 5 5 2 2 2 2 2 2 2 2 2 2 2 2 2</td> <td>133 10.2% 3.7% 4.9% 4.7% 9.5% 9.5% 9.5% 0.9% 2.3% 4.0% 2.3% 4.0% 0.0% 2.3% 7.4% 10.6% 2.4% 5.2% 7.4% 5.2% 5.2% 7.4% 5.2% 0.0% 2.2% 2.2% 2.2% 2.2% 5.2% 2.2% 5.2% 2.2% 2</td> <td>e differen % 200 14 3 4 35 2 3 6 6 8 8 7 1 1 2 0 1 1 2 0 4 3 2 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 6 18 19 10 10 10 10 10 10 10 10 10 10 10 10 10</td> <td>Ce &gt;= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 2.7% 3.0% 4.0% 3.0% 4.0% 3.0% 4.0% 3.0% 4.0% 2.5% 6.7% 4.2% 18.2% 18.2% 18.2% 18.2% 18.2% 1.0% 2.5% 1.0% 2.5% 1.0% 2.5% 1.0% 2.5% 3.3% 5.5% 1.0% 5.5% 5.5% 5.5% 5.5% 5.5% 5.5% 5.5% 5</td> <td>20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 38 38 94 486 89 104 48 21 20 75 78 78</td> <td>No pro</td> <td>blem 200 141 54 76 544 22 93 381 238 32 277 61 38 38 38 38 31 37 51 84 79 86 84 79 86 84 79 86 84 71 51 238 317 517 517 517 517 517 517 517 5</td> <td>14 86.0% 94.7% 88.4% 90.5% 88.0% 92.9% 92.9% 92.9% 92.9% 93.0% 97.0% 98.4% 97.4% 100.0% 73.8% 82.2% 96.6% 92.1% 92.1%</td>	g(n) = -63 ence >= 5 20 2 10 2 10 1 0 0 2 10 3 3 0 4 1 0 0 4 0 0 3 0 1 1 1 0 0 0 1 1 1 0 0 0 1 1 2 0 0 0 1 1 2 0 0 0 0	1.2%           1.2%           0.0%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%           0.7%           1.2%           0.0%           0.7%           1.2%           0.0%           0.7%           1.3%           0.0%	6500 a 20 4 0 2 9 0 2 7 7 0 8 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 0 0 2 9 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 2 7 7 0 0 0 0 2 7 7 0 0 0 0 0 0 2 7 7 0 0 0 0 0 0 0 0 0 0 0 0 0	nd wher 75 33 2.3% 2.3% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 2.7% 2.5% 0.0% 0.0% 6.4% 1.9% 3.7% 4.5% 1.9% 3.7% 4.5% 0.0% 6.1% 7.9% 0.0% 2.2% 0.0% 6.1% 1.9% 2.2% 0.0% 2.2% 0.0% 2.7% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	200           7         0           4         12           0         4           12         0           0         2           8         8           0         0           2         8           0         0           3         3           2         2           0         3           2         1           0         2           1         0           2         3           2         1           0         2           3         4	Ce >= 4.3% 0.0% 4.7% 2.0% 0.0% 2.0% 0.0% 1.4% 0.0% 3.1% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	1300 £ 200 188 2 4 35 2 2 4 35 2 2 1 6 6 14 8 1 12 0 0 2 2 2 5 5 2 2 4 3 5 5 2 2 2 2 2 5 5 2 2 2 2 2 2 2 2 2 2 2 2 2	133 10.2% 3.7% 4.9% 4.7% 9.5% 9.5% 9.5% 0.9% 2.3% 4.0% 2.3% 4.0% 0.0% 2.3% 7.4% 10.6% 2.4% 5.2% 7.4% 5.2% 5.2% 7.4% 5.2% 0.0% 2.2% 2.2% 2.2% 2.2% 5.2% 2.2% 5.2% 2.2% 2	e differen % 200 14 3 4 35 2 3 6 6 8 8 7 1 1 2 0 1 1 2 0 4 3 2 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 6 18 19 10 10 10 10 10 10 10 10 10 10 10 10 10	Ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 2.7% 3.0% 4.0% 3.0% 4.0% 3.0% 4.0% 3.0% 4.0% 2.5% 6.7% 4.2% 18.2% 18.2% 18.2% 18.2% 18.2% 1.0% 2.5% 1.0% 2.5% 1.0% 2.5% 1.0% 2.5% 3.3% 5.5% 1.0% 5.5% 5.5% 5.5% 5.5% 5.5% 5.5% 5.5% 5	20 153 52 75 696 18 110 159 438 260 43 277 59 38 25 36 38 25 36 38 38 94 486 89 104 48 21 20 75 78 78	No pro	blem 200 141 54 76 544 22 93 381 238 32 277 61 38 38 38 38 31 37 51 84 79 86 84 79 86 84 79 86 84 71 51 238 317 517 517 517 517 517 517 517 5	14 86.0% 94.7% 88.4% 90.5% 88.0% 92.9% 92.9% 92.9% 92.9% 93.0% 97.0% 98.4% 97.4% 100.0% 73.8% 82.2% 96.6% 92.1% 92.1%
Departures	Robie         Robie           22         0         1           10         1         1           0         0         3           3         3         0           4         1         1           0         0         3           1         1         0           0         1         1           0         0         0           1         1         0           0         0         0           0         0         0           0         0         0           1         3         0	Image: series         Image: s	$g_{11} = -63$ ence >= 5 20 2 10 2 10 1 0 2 10 3 3 0 4 1 0 0 4 0 0 4 0 0 1 1 0 0 0 1 1 1 0 0 0 1 1 2 0 0 0 0	1.2%           0.0%           1.2%           0.0%           2.3%           1.7%           4.0%           0.0%	6500 a 20 4 0 2 9 0 2 7 7 0 8 0 0 2 7 7 0 8 0 0 0 3 3 1 4 2 1 5 2 1 0 5 7 2 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 2 7 7 0 8 0 0 0 0 2 7 7 0 8 0 0 0 0 2 7 7 0 8 0 0 0 0 0 2 7 7 0 8 0 0 0 0 0 0 0 0 0 0 0 0 0	nd wher 75 13 2.3% 2.3% 2.4% 1.2% 0.0% 1.2% 1.2% 2.5% 0.0% 2.7% 0.0% 0.0% 0.0% 6.4% 1.9% 4.5% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 6.4% 1.9% 1.9% 1.2% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.3% 1.0% 1	200           7         0           4         12           0         2           8         8           0         0           2         8           8         0           0         0           3         5           1         1           2         0           3         3           2         1           0         2           8         4           4         4	Ce >= 4.3% 0.0% 4.7% 2.0% 0.0% 2.0% 0.0% 3.1% 0.0% 3.1% 0.0% 7.1% 11.1% 1.9% 2.0% 0.0% 2.4% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	1300 & 200 188 2 4 35 2 2 1 1 6 14 8 1 12 2 2 2 2 2 5 5 1 1 0 2 2 2 2 5 5 2 2 2 2 2 3 5 5 2 2 2 2 3 5 5 2 2 2 2 3 5 5 2 2 2 2 3 5 5 2 2 2 2 2 3 5 5 5 5 2 2 2 2 2 2 2 5 5 5 1 1 0 2 2 2 2 2 2 2 2 2 2 2 2 2	133 10.2% 3.7% 4.9% 4.9% 4.7% 9.5% 9.5% 0.9% 2.9% 2.9% 2.9% 2.9% 2.9% 2.9% 2.9% 2	e differen % 200 14 3 4 35 2 3 6 6 18 7 1 12 0 1 12 0 1 1 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 3 3 4 2 2 2 2	Ce >= 14 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.1% 2.7% 3.0% 4.0% 0.0% 9.5% 6.7% 3.0% 4.0% 2.5% 6.7% 3.3% 4.8% 1.1.8% 1.0% 2.5% 3.3% 5.5% 11.8% 1.0% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 3.3% 5.5% 5.5	20 153 52 696 18 110 159 260 43 277 59 38 25 36 38 25 36 38 53 36 48 94 48 89 104 48 21 20 75 78 83 39	No pro	200           141           54           76           544           22           93           137           381           228           32           2777           61           38           31           37           51           84           79           86           84           58           77           15           92           110           350           33	14 86.0% 94.7% 88.4% 90.5% 88.0% 92.9% 92.9% 92.9% 93.0% 97.0% 92.6% 97.4% 82.2% 94.4% 85.7% 95.2% 96.6% 92.3% 92.3% 92.3% 95.8% 90.2% 85.2%
Departures	Note           2C           2           0           1           10           1           0           3           3           0           4           1           0           3           0           0           1           0           0           1           0           0           1           0           0           1           0           0           1           0           0           0           1           1           0           0           0           0           0           0           0           0           0           0           1           3           0           0           0           0           0           0	13           1.1%           0.0%           1.2%           1.3%           4.8%           0.0%	g(n) = 0 = 0 = 0 $g(n) = 0 = 0$ $g(n) = 0$	1.2% 0.0% 1.2% 0.0% 2.3% 1.7% 4.0% 0.0%	6500 a 20 4 0 2 9 0 2 7 7 0 0 2 7 7 0 8 0 0 0 0 0 0 0 0 3 1 4 2 1 5 2 1 0 5 7 2 0 5 5 7 2 0 5 5 7 7 0 0 0 0 0 0 0 0 0 0 0 0 0	nd wher 75 13 2.3% 2.3% 2.4% 1.2% 0.0% 2.4% 1.5% 2.5% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0.0% 0	200           7         0           4         12           0         0           22         2           8         8           0         0           0         2           8         8           0         0           0         0           0         0           0         3           5         1           2         2           0         3           2         1           0         2           8         4           4         4	Ce >= 14 4.3% 0.0% 4.7% 2.0% 0.0% 1.4% 2.0% 0.0	1300 & 200 18 2 4 35 2 1 1 6 14 35 2 2 1 1 6 4 3 1 1 2 2 2 2 5 1 1 0 9 9 2 2 5 2 4 3 0 2 3 1 4 0 0 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	10.102% 15(2) 10.2% 13.7% 4.9% 4.9% 4.7% 9.5% 0.9% 3.6% 2.9% 2.9% 2.9% 2.9% 2.9% 2.9% 2.9% 2.9	e differen % 200 14 3 4 35 2 3 6 6 18 3 4 35 2 3 6 6 18 7 1 12 0 1 0 4 3 2 9 9 2 2 3 3 4 2 2 3 3 4 2 5 5 5 5 5 5 5 5 5 6 1 1 4 1 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	Ce >= 4 8.5% 5.3% 4.7% 5.8% 8.0% 3.1% 4.7% 5.8% 8.0% 3.1% 4.1% 4.0% 6.7% 3.0% 6.7% 3.7% 9.5% 6.7% 3.3% 4.8% 1.0% 2.2% 3.3% 1.1.8% 1.0% 2.5% 5.4% 4.8% 5.4%	20 153 52 55 696 18 110 159 438 260 43 277 59 38 25 36 38 53 36 38 53 39 448 20 104 48 20 75 75 75 75 89 10 10 159 75 75 696 807 10 10 10 10 10 10 10 10 10 10	No pro	20           141           54           76           544           22           93           137           381           228           32           277           61           38           31           37           51           84           79           86           84           58           17           15           92           110           333           109	14 86.0% 94.7% 88.4% 90.5% 88.0% 92.9% 92.9% 92.9% 92.9% 97.4% 92.9% 97.4% 97.4% 82.2% 94.4% 85.7% 96.6% 92.3% 92.3% 92.1% 77.3% 88.2% 95.8% 90.2% 89.2%

For the reference year 2014, 54% of the routes with problems for arrivals (and 57% for departures) were concentrated within the category "Route with Freight >= 100 and < 1300 and where difference >= 150%". As mentioned previously for passenger transport, routes with problems represent nevertheless a very small share in the total number of routes for freight transport.

## 5.2.1 TABLE B1

		20	)13			20	14	
Arrivals	Total	No Problem	Problem	% with problems	Total	No Problem	Problem	% with problems
EB BELGIUM	161	138	23	14.3%	167	142	25	15.0%
LB BULGARIA	59	56	3	5.1%	48	44	4	8.3%
EK DENMARK	80	78	2	2.5%	80	77	3	3.8%
ED GERMANY	727	702	25	3.4%	568	535	33	5.8%
EE ESTONIA	22	20	2	9.1%	24	23	1	4.2%
EI IRELAND	97	94	3	3.1%	86	83	3	3.5%
LG GREECE	122	116	6	4.9%	111	106	5	4.5%
LE SPAIN	457	444	13	2.8%	369	355	14	3.8%
LF FRANCE	282	266	16	5.7%	199	180	19	9.5%
LD CROATIA	39	39	0	0.0%	26	26	0	0.0%
LI ITALY	303	292	11	3.6%	297	288	9	3.0%
LC CYPRUS	58	58	0	0.0%	52	52	0	0.0%
EV LATVIA	37	35	2	5.4%	43	43	0	0.0%
EY LITHUANIA	18	16	2	11.1%	18	17	1	5.6%
EL LUXEMBOURG	32	31	1	3.1%	31	29	2	6.5%
LH HUNGARY	47	46	1	2.1%	45	43	2	4.4%
LM MALTA	51	49	2	3.9%	49	47	2	4.1%
EH NETHERLANDS	127	117	10	7.9%	130	119	11	8.5%
LO AUSTRIA	79	76	3	3.8%	78	75	3	3.8%
EP POLAND	103	97	6	5.8%	97	94	3	3.1%
LP PORTUGAL	92	90	2	2.2%	88	86	2	2.3%
LR ROMANIA	38	36	2	5.3%	51	48	3	5.9%
LJ SLOVENIA	20	20	0	0.0%	18	18	0	0.0%
	19	19	0	0.0%	18	18	0	0.0%
	68	64	4	5.9%	/3	70	3	4.1%
ES SWEDEN	84 504	// 540	1	8.3%	111	99	12	10.8%
	24	20	10	3.4% 11 00/	3/4	300	10	4.0%
	106	30 QS	4	7.5%	103	03	10	9.0%
LS SWITZERI AND	100	103	4	3.7%	103	105	3	2.8%
							_	
		20	113			20	1/	
		20	)13			20	14	
Departures	Total	20 No	)13	% with	Total	20 <sup>-</sup> No	14	% with
Departures	Total	20 No Problem	Problem	% with problems	Total	20 No Problem	14 Problem	% with problems
Departures	Total	20 No Problem	013 Problem	% with problems	Total	20 <sup>-</sup> No Problem	14 Problem	% with problems
Departures	Total 175	20 No Problem 151	013 Problem 24	% with problems 13.7%	Total 165	20 <sup>°</sup> No Problem	14 Problem 19	% with problems 11.5%
Departures EB BELGIUM LB BULGARIA EK DENMARK	Total 175 50	20 No Problem 151 48 76	013 Problem 24 2	% with problems 13.7% 4.0%	Total 165 53	20 <sup>-</sup> No Problem 146 49 73	14 Problem 19 4 7	% with problems 11.5% 7.5%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY	Total 175 50 79 651	20 No Problem 151 48 76 624	213 Problem 24 2 3 27	% with problems 13.7% 4.0% 3.8% 4.1%	Total 165 53 80 517	20 No Problem 146 49 73 489	14 Problem 19 4 7 28	% with problems 11.5% 7.5% 8.8% 5.4%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY FF ESTONIA	Total 175 50 79 651 20	20 No Problem 151 48 76 624 18	213 Problem 24 2 3 27 2	% with problems 13.7% 4.0% 3.8% 4.1% 10.0%	Total 165 53 80 517 22	20 No Problem 146 49 73 489 22	14 Problem 19 4 7 28 0	% with problems 11.5% 7.5% 8.8% 5.4% 0.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA FURFL AND	Total 175 50 79 651 20 111	20 No Problem 151 48 76 624 18 107	213 Problem 24 2 3 27 2 4	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6%	Total 165 53 80 517 22 93	20 No Problem 146 49 73 489 22 90	14 Problem 19 4 7 28 0 3	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE	Total 175 50 79 651 20 111 163	20 No Problem 151 48 76 624 18 107 159	Problem 24 2 3 27 2 4 4	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5%	Total 165 53 80 517 22 93 137	20 No Problem 146 49 73 489 22 90 131	14 Problem 19 4 7 28 0 3 6	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN	Total 175 50 79 651 20 111 163 460	20 No Problem 151 48 76 624 18 107 159 443	Problem 24 2 3 27 2 4 4 17	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 3.5% 3.7%	Total 165 53 80 517 22 93 137 391	20 No Problem 146 49 73 489 22 90 131 372	14 Problem 19 4 7 28 0 3 6 19	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE	Total 175 50 79 651 20 111 163 460 281	20 No Problem 151 48 76 624 18 107 159 443 267	213 Problem 24 2 3 27 2 4 4 17 17 14	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0%	Total 165 53 80 517 22 93 137 391 219	20 No Problem 146 49 73 489 22 90 131 372 203	14 Problem 19 4 7 28 0 3 6 19 19 16	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA	Total 175 50 79 651 20 111 163 460 281 45	20 No Problem 151 48 76 624 18 107 159 443 267 45	)13 Problem 24 2 3 27 2 4 4 17 14	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0% 0.0%	Total 165 53 80 517 22 93 137 391 219 30	20 No Problem 146 49 73 489 22 90 131 372 203 29 29 20 29 29	14 Problem 19 4 7 28 0 3 6 19 16 1	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.4% 4.9% 7.3% 3.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY	Total 175 50 79 651 20 111 163 460 281 45 302	20 No Problem 151 48 76 624 18 107 159 443 267 45 286	013 Problem 24 2 3 27 2 4 4 4 17 14 0 16	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0% 0.0% 5.3%	Total 165 53 80 517 22 93 137 391 219 30 288	20 No Problem 146 49 73 489 22 90 131 372 203 29 273	14 Problem 19 4 7 288 0 3 6 19 16 11 5	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS	Total 175 50 79 651 20 111 163 460 281 45 302 59	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 658	)13 Problem 24 2 3 3 27 2 4 4 17 14 0 16	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0% 0.0% 5.3% 1.7%	Total 165 53 80 517 22 93 3137 391 219 30 288 61	200 Problem 146 499 73 489 22 90 131 372 203 29 273 60	14 Problem 19 4 7 28 0 3 6 19 16 19 16 15 15	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA	Total 175 50 79 651 20 111 163 460 281 45 302 59 38	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 8 36	)13 Problem 24 2 3 3 27 2 4 4 4 17 14 0 16 1 2	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0% 0.0% 5.3% 1.7% 5.3%	Total 165 53 80 517 22 93 137 391 219 30 288 611 37	200 Problem 146 499 73 489 22 90 131 1 372 203 29 273 60 36	14 Problem 19 4 4 7 28 0 3 6 19 16 1 15 1 1	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 7.3% 3.3% 5.2% 1.6% 2.7%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA	Total 175 500 79 651 20 111 163 460 281 45 302 59 38 24	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 366 23	013 Problem 24 2 3 3 27 2 4 4 4 17 14 0 16 1 2 2 1	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.0% 0.0% 5.3% 1.7% 5.3% 4.2%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 37 18	200 No Problem 146 49 73 489 22 90 131 1372 203 29 273 60 366 18	14 Problem 19 4 7 28 0 3 6 19 16 1 1 15 1 1 0	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG	Total 175 500 799 651 20 1111 163 460 281 455 302 59 388 24 44	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 366 233 43	24           24           23           27           2           4           17           14           0           16           1           2           1           1	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.6% 5.0% 0.0% 5.3% 1.7% 5.3% 1.7% 5.3% 2.3%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 7 18 38	20 No Problem 146 49 73 3489 22 90 131 372 203 29 273 60 36 36 18 8 36	14 Problem 19 4 7 28 0 3 6 19 16 11 15 1 1 5 1 0 2	% with problems 11.5% 7.5% 8.8% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY	Total 175 50 79 651 20 111 163 460 281 45 302 59 38 24 44 39 39	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 343 38	)13 Problem 24 2 3 3 27 2 4 4 4 17 14 0 16 1 1 2 2 1 1 1	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 3.7% 5.3% 4.2% 5.3% 4.2% 2.3% 2.6%	Total 165 53 80 517 22 93 137 391 219 300 288 61 37 18 38 42	200 Problem 1466 499 733 4899 222 900 1311 3722 2033 299 2273 600 366 188 366 366	14 Problem 19 4 7 28 0 3 6 19 16 11 15 1 15 1 1 0 2 6 6	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA	Total 175 50 79 651 20 1111 163 460 281 45 302 59 38 24 44 39 53 53	No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 28 36 23 343 38 33 8 35	3)13           Problem           24           2           3           27           2           4           17           14           0           16           1           2           1           1           0           0	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.25% 3.7% 5.0% 0.0% 5.3% 4.2% 2.3% 4.2% 2.3% 2.6% 0.0%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 42 52 52	200 Problem 146 499 73 489 22 90 0 90 131 372 203 29 273 60 366 18 366 366 365	14 Problem 19 4 7 28 0 3 6 19 16 115 1 15 1 1 0 2 6 1 1	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 1.4% 4.4% 1.9%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS	Total 175 50 79 651 20 1111 163 460 281 45 302 59 38 24 44 39 53 103 103	20 No Problem 151 48 76 624 18 107 159 443 266 58 36 286 58 36 23 43 38 33 8 33 8 96	3)13           Problem           24           23           3           27           2           4           17           14           0           16           1           2           1           1           0           7	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.5% 5.0% 0.0% 5.3% 4.2% 2.3% 2.3% 2.3% 6.0% 6.8%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 42 252 88 252	200 Problem 146 499 73 489 222 90 131 1372 203 29 273 203 29 273 6 6 18 36 36 51 83 36	14 Problem 19 4 7 28 0 3 6 19 16 11 15 11 1 0 2 6 6 1 5	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 0.0% 5.2% 0.0% 5.3% 1.6% 2.7% 0.0% 5.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA	Total 175 500 79 651 20 1111 163 460 2811 45 302 59 38 24 44 39 53 103 83 103 83 103	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 36 23 38 33 8 36 23 38 53 36 23 24 38 53 36 23 23 24 25 28 53 26 23 23 26 23 26 26 26 26 26 26 27 26 26 26 26 26 26 26 26 26 26 26 26 26	24           24           23           37           27           2           3           27           2           4           17           14           0           16           1           2           1           0           7           2           1           1           0           7           2	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 0.0% 5.0% 0.0% 5.3% 4.2% 2.3% 2.3% 2.3% 2.6% 2.4% 2.4%	Total 165 53 80 517 22 93 137 391 219 30 288 61 137 18 38 42 52 88 70	200 Problem 146 449 73 489 22 90 131 1 372 203 29 273 60 36 36 36 51 83 86 36 51 83	14 Problem 19 4 7 28 0 3 6 19 16 1 1 15 1 1 1 0 2 2 6 1 1 5 2	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 2.9%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EV DATTA	Total 175 500 79 651 20 1111 1633 460 281 455 302 599 388 24 44 39 533 1003 83 100	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 343 36 53 396 81 95	24           24           23           37           27           2           3           27           2           3           27           2           3           27           2           3           27           2           3           27           2           3           27           2           3 <t< td=""><td>% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 5.3% 5.0% 5.3% 4.2% 2.3% 2.3% 2.3% 2.6% 0.8% 2.4% 5.3%</td><td>Total 165 53 80 517 22 93 137 391 219 30 288 61 377 18 38 42 52 88 870 89 95</td><td>200 No Problem 146 499 73 489 22 90 1311 372 203 29 273 600 366 18 366 366 511 833 68 868 869</td><td>14 Problem 19 4 7 28 0 3 6 6 19 16 1 1 15 1 1 0 2 6 6 1 5 2 3 3</td><td>% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 2.9% 3.4% 2.2%</td></t<>	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 5.3% 5.0% 5.3% 4.2% 2.3% 2.3% 2.3% 2.6% 0.8% 2.4% 5.3%	Total 165 53 80 517 22 93 137 391 219 30 288 61 377 18 38 42 52 88 870 89 95	200 No Problem 146 499 73 489 22 90 1311 372 203 29 273 600 366 18 366 366 511 833 68 868 869	14 Problem 19 4 7 28 0 3 6 6 19 16 1 1 15 1 1 0 2 6 6 1 5 2 3 3	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 2.9% 3.4% 2.2%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LP ROMANIA	Total 1755 500 79 651 200 1111 163 460 281 455 302 59 38 244 44 39 53 103 83 100 120 428	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 3 43 38 53 96 81 95 116 44	3)13           Problem           24           2           3           27           2           4           4           17           14           0           16           1           1           1           1           1           1           1           1           2           5           4	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.7% 5.3% 5.3% 1.7% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 2.4% 5.0% 3.3% 8.24%	Total 165 53 80 517 22 93 137 391 219 300 288 61 37 18 38 42 52 88 70 89 95 55	200 No Problem 146 49 73 489 22 90 0 131 372 290 0 131 372 203 29 9 273 60 36 18 36 83 68 83 68 86 92 51	14 Problem 19 4 7 28 0 3 6 19 16 11 15 1 1 15 1 1 0 2 6 6 1 5 2 3 3 3 4	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 0.2% 3.4% 3.2% 7.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LIITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LI SL OVENIA	Total 175 50 79 651 20 111 163 460 281 45 302 59 38 24 44 39 53 103 83 100 120 48 120	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 43 38 53 96 81 195 116 44 4	3)13           Problem           24           2           3           27           2           4           17           14           0           16           1           1           1           1           1           1           1           1           1           1           1           2           5           4           4	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.7% 5.9% 0.0% 5.3% 4.2% 2.5% 5.3% 4.2% 2.6% 0.0% 6.8% 2.3% 3.3% 8.3% 11.1%	Total 165 53 80 517 22 93 3137 391 219 300 288 61 37 18 38 42 52 88 700 89 95 51 12	200 Problem 146 499 73 489 22 90 0 131 372 203 299 273 60 366 18 366 366 366 366 366 366 366 36	14 Problem 19 4 7 28 0 3 6 19 19 16 115 1 15 1 0 2 6 1 1 5 2 6 1 3 3 4 4	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 2.9% 3.4% 3.2% 7.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVENIA LJ SLOVENIA LJ SLOVENIA	Total 175 50 79 651 20 1111 163 460 281 45 302 59 38 24 44 39 53 103 83 100 120 48 18 19	No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 58 36 23 343 338 53 96 81 95 116 44 195	D13           Problem           24           2           3           27           2           4           17           14           0           16           1           1           0           7           2           4           4           11           0           7           2           5           4           4           2           5           4           4           2           14           10           7           2           5           4           4           2           0           11           11           11           12           13           14           14           2           3           3           3           3           3 <tr< td=""><td>% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.5% 5.9% 0.0% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 2.4% 5.3% 3.3% 8.3% 11.1% 0.0%</td><td>Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 42 52 88 70 89 95 55 18 16 18</td><td>200 Problem 146 499 73 489 22 90 0 0 131 372 203 29 273 60 366 366 366 366 366 366 366 318 368 868 868 868 82 511 83 368 848 849 849 849 849 849 849 849 849 84</td><td>14 Problem 19 4 7 28 0 3 6 19 16 19 16 1 15 1 1 5 2 3 3 4 4 2 2 3 3 4</td><td>% with problems 11.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 1.6% 2.7% 0.0% 5.3% 1.4.3% 1.9% 5.7% 2.9% 3.4% 3.2% 7.3%</td></tr<>	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.5% 5.9% 0.0% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 2.4% 5.3% 3.3% 8.3% 11.1% 0.0%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 42 52 88 70 89 95 55 18 16 18	200 Problem 146 499 73 489 22 90 0 0 131 372 203 29 273 60 366 366 366 366 366 366 366 318 368 868 868 868 82 511 83 368 848 849 849 849 849 849 849 849 849 84	14 Problem 19 4 7 28 0 3 6 19 16 19 16 1 15 1 1 5 2 3 3 4 4 2 2 3 3 4	% with problems 11.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 1.6% 2.7% 0.0% 5.3% 1.4.3% 1.9% 5.7% 2.9% 3.4% 3.2% 7.3%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVENIA LZ SLOVAKIA EF FINLAND	Total 175 500 79 651 20 1111 163 460 281 45 302 59 38 24 44 39 53 103 83 100 120 48 18 19 74	No Problem 151 48 76 624 18 107 159 443 286 58 36 286 58 36 23 43 38 38 33 83 53 96 81 95 116 44 16 19 70	D13           Problem           24           23           3           27           2           4           17           14           0           16           1           2           1           0           7           2           1           1           0           7           2           1           1           0           7           2           4           4           2           1           1           1           1           1           1           1           1           1           1           1           1           1           2           3           2           3           4           2           4           4           4	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.3% 5.0% 0.0% 5.3% 4.2% 2.3% 2.3% 2.3% 2.3% 2.3% 3.7% 5.3% 4.2% 2.3% 2.3% 2.3% 3.3% 4.2% 2.3% 2.4% 5.3% 3.3% 5.0% 5.0% 5.0% 5.0% 5.0% 5.0% 5.0% 5.0	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 422 52 88 70 89 95 55 18 165 89	200 Problem 146 499 73 489 222 90 131 1372 203 29 273 203 29 273 36 18 36 36 51 83 86 86 86 92 51 14 14	14 Problem 19 4 7 28 0 3 6 19 16 1 1 15 11 1 0 2 6 6 1 1 5 2 2 3 3 4 4 4 2 4 4	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 5.7% 2.9% 3.4% 7.3% 2.2% 12.5%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVENIA LZ SLOVAKIA EF FINLAND ES SWEDEN	Total 175 500 79 651 20 1111 1633 460 2811 45 302 59 38 24 44 39 53 103 83 100 1200 48 18 19 74 82	No Problem 151 48 76 624 18 107 159 443 267 45 286 528 36 23 36 23 38 36 23 38 36 23 396 81 95 116 44 416 19 97 3	D13           Problem           24           23           37           27           2           3           277           2           4           17           14           0           16           1           2           3           7           2           4           0           16           1           0           7           2           5           4           2           0           4           2           0           4           2           0           4           2           0           4           2           0           4           2           3	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 2.5% 0.0% 5.3% 4.2% 2.3% 2.3% 2.3% 2.3% 2.3% 2.3% 2.4% 5.0% 3.3% 1.1% 0.0% 5.3%	Total 165 53 80 517 22 93 137 391 219 30 288 61 11 37 18 38 422 525 555 18 16 89 114	200 Problem 146 449 73 489 22 90 131 1 372 203 29 273 60 36 36 36 36 36 31 83 88 86 92 251 14 14 14 85	14 Problem 19 4 7 28 0 3 6 19 16 1 1 10 16 1 1 10 2 6 6 1 1 5 2 3 3 3 4 4 2 4 11	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 4.4% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 2.9% 3.4% 3.2% 4.5% 9.6%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVENIA LJ SLOVENIA LJ SLOVENIA LJ SLOVENIA ES SWEDEN EG UNIED KINGDOM	Total 175 50 79 651 20 111 163 460 281 45 302 59 38 244 44 39 53 103 83 100 120 48 18 19 74 82 49	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 3 43 38 53 96 81 95 116 44 16 44 19 70 73 479	3)13           Problem           24           2           3           27           2           4           4           17           14           0           16           1           1           1           1           1           1           1           1           1           1           1           1           1           0           4           4           2           5           4           2           5           4           2           0           4           2           0           4           2           0           4           2           0           4           9           12	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.7% 5.3% 5.3% 1.7% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 3.3% 8.3% 11.1% 11.1% 5.4% 11.1%	Total 165 53 80 517 22 93 137 391 219 30 288 61 37 18 38 42 52 88 70 89 95 55 18 16 89 91 14 351	200 No Problem 146 49 73 489 22 90 0 131 372 290 90 131 372 203 29 90 273 60 36 18 36 83 68 83 68 86 92 51 144 14 83 339	14 Problem 19 4 7 28 0 3 6 19 16 1 1 15 1 1 15 1 1 5 2 6 6 1 1 5 2 3 3 3 4 4 2 4 11 12	% with problems 11.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.3% 14.3% 2.9% 3.4% 3.2% 7.3% 3.2% 7.3% 3.2% 7.5% 3.4% 3.2% 7.5% 3.4% 3.2% 3.4% 3.2% 3.4% 3.2% 3.4% 3.4% 3.2% 3.4% 3.2% 3.4% 3.4% 3.4% 3.4% 3.4% 3.4% 3.4% 3.4
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVAKIA EF FINLAND ES SWEDEN EG UNITED KINGDOM BI JCELAND	Total 175 50 79 651 20 111 163 460 281 45 302 59 38 24 44 39 53 103 83 100 120 48 18 19 74 82 491 38	20 No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 23 43 38 53 96 81 95 116 44 195 70 73 38	3)13           Problem           24           2           3           27           2           4           17           14           0           16           1           1           0           77           25           4           4           2           5           4           4           2           5           4           2           0           4           4           2           0           4           2           0           4           4           2           0           4           12           0	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.7% 5.3% 5.3% 1.7% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 2.4% 3.3% 8.3% 11.0% 5.4% 11.0% 2.4% 0.0%	Total 165 53 80 517 22 93 3137 391 219 300 288 61 37 18 38 42 52 88 70 89 95 55 18 88 70 89 95 55 18 16 89 11 37 18 33 137 18 34 19 19 19 19 19 10 10 10 10 10 10 10 10 10 10	200 Problem 146 49 73 489 22 90 0 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 90 131 372 203 29 18 366 366 366 366 366 366 367 18 368 888 888 888 892 925 11 14 14 14 18 366 367 18 368 888 888 892 925 11 14 14 14 14 14 14 14 14 14	14 Problem 19 4 7 28 0 3 6 19 16 19 16 11 15 1 1 5 2 6 1 1 5 2 6 1 3 3 3 4 4 4 2 4 11 12 3	% with problems 11.5% 7.5% 8.8% 5.4% 0.0% 3.2% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 3.3% 14.3% 1.9% 5.7% 2.9% 3.4% 3.2% 7.3% 2.2% 7.3% 2.2% 1.5% 8.1%
Departures EB BELGIUM LB BULGARIA EK DENMARK ED GERMANY EE ESTONIA EI IRELAND LG GREECE LE SPAIN LF FRANCE LD CROATIA LI ITALY LC CYPRUS EV LATVIA EY LITHUANIA EY LITHUANIA EY LITHUANIA EL LUXEMBOURG LH HUNGARY LM MALTA EH NETHERLANDS LO AUSTRIA EP POLAND LP PORTUGAL LR ROMANIA LJ SLOVENIA LZ SLOVAKIA EF FINLAND ES SWEDEN EG UNITED KINGDOM BI ICELAND EN NORWAY	Total 1755 500 799 6511 200 1111 1633 4600 2811 455 3022 599 388 244 444 399 533 1030 1200 488 183 199 74 822 491 388 1211 388 1211 388 1211 388 1211 388 1211 388 1211 388 1211 388 1211 388 1211 388 1211 12	No Problem 151 48 76 624 18 107 159 443 267 45 286 58 36 2286 58 36 228 658 36 23 343 38 53 96 811 95 116 44 19 70 70 73 3479 38 211	D13           Problem           24           23           27           2           4           17           14           0           16           1           2           3           4           9           12           0           9           12           12	% with problems 13.7% 4.0% 3.8% 4.1% 10.0% 3.6% 5.0% 0.0% 5.3% 1.7% 5.3% 4.2% 2.3% 2.6% 0.0% 6.8% 2.4% 5.0% 3.3% 8.3% 11.1% 0.5% 5.4% 11.0% 5.4% 11.0% 5.4%	Total 165 53 80 517 22 93 3137 391 219 300 288 61 37 18 38 42 52 88 70 89 95 55 18 16 89 114 351 371 371 371 375 375 375 375 375 375 375 375	200 Problem 146 499 73 489 22 90 0 131 372 203 299 273 60 366 18 366 366 366 366 366 366 366 36	14 Problem 19 4 7 28 0 3 6 19 16 1 15 1 1 15 1 1 5 2 3 3 4 4 2 2 3 3 4 4 2 2 3 3 3 4 4 2 3 3 3 4 3 3 4 3 3 4 4 2 3 3 3 4 3 3 3 3	% with problems 11.5% 8.8% 5.4% 0.0% 3.2% 4.4% 4.9% 7.3% 3.3% 5.2% 1.6% 2.7% 0.0% 5.3% 14.3% 1.9% 5.7% 2.9% 14.3% 1.9% 5.3% 2.2% 12.5% 9.6% 3.4% 8.1% 8.0%

The share of routes with problems observed in the On Flight Origin Destination dataset decreased between 2013 and 2014 for 9 countries for arrivals and 14 for departures (out of the 30 countries for which data were available both for 2013 and 2014).

When considering all reporting countries as a whole, the share of routes with problems decreased from 4.5% in 2013 to 5.5% in 2014, both for arrivals and departures.

Arrivals	Route with Freight >= 6500 and where difference >= 50%			Route with Freight >= 1300 and < 6500 and where difference >= 75%					d < Route with Freight >= 100 and < 1300 and where difference >= 150% 2013 2014				No problem			
	20	13	20	14	201	13	20	14	20	13	20	14	2	013	2	014
EB BELGIUM	1	0.6%	1	0.6%	6	3.7%	9	5.4%	16	9.9%	15	9.0%	138	85.7%	142	85.0%
LB BULGARIA	0	0.0%	0	0.0%	1	1.7%	2	4.2%	2	3.4%	2	4.2%	56	94.9%	44	91.7%
EK DENMARK	0	0.0%	0	0.0%	2	2.5%	3	3.8%	0	0.0%	0	0.0%	78	97.5%	77	96.3%
ED GERMANY	3	0.4%	4	0.7%	13	1.8%	19	3.3%	9	1.2%	10	1.8%	702	96.6%	535	94.2%
EE ESTONIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	9.1%	1	4.2%	20	90.9%	23	95.8%
EI IRELAND	1	1.0%	0	0.0%	1	1.0%	2	2.3%	1	1.0%	1	1.2%	94	96.9%	83	96.5%
LG GREECE	0	0.0%	0	0.0%	1	0.8%	1	0.9%	5	4.1%	4	3.6%	116	95.1%	106	95.5%
LE SPAIN	1	0.2%	1	0.3%	4	0.9%	4	1.1%	8	1.8%	9	2.4%	444	97.2%	355	96.2%
LF FRANCE	4	1.4%	3	1.5%	5	1.8%	11	5.5%	7	2.5%	5	2.5%	266	94.3%	180	90.5%
LD CROATIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	39	100.0%	26	100.0%
LI ITALY	1	0.3%	1	0.3%	3	1.0%	3	1.0%	7	2.3%	5	1.7%	292	96.4%	288	97.0%
LC CYPRUS	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	58	100.0%	52	100.0%
EV LATVIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	5.4%	0	0.0%	35	94.6%	43	100.0%
EY LITHUANIA	0	0.0%	0	0.0%	1	5.6%	1	5.6%	1	5.6%	0	0.0%	16	88.9%	17	94.4%
EL LUXEMBOURG	0	0.0%	0	0.0%	1	3.1%	0	0.0%	0	0.0%	2	6.5%	31	96.9%	29	93.5%
LH HUNGARY	0	0.0%	0	0.0%	1	2.1%	2	4.4%	0	0.0%	0	0.0%	46	97.9%	43	95.6%
LM MALTA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	3.9%	2	4.1%	49	96.1%	47	95.9%
EH NETHERLANDS	1	0.8%	1	0.8%	6	4.7%	5	3.8%	3	2.4%	5	3.8%	117	92.1%	119	91.5%
LO AUSTRIA	0	0.0%	0	0.0%	2	2.5%	2	2.6%	1	1.3%	1	1.3%	76	96.2%	75	96.2%
EP POLAND	1	1.0%	1	1.0%	1	1.0%	0	0.0%	4	3.9%	2	2.1%	97	94.2%	94	96.9%
LP PORTUGAL	0	0.0%	0	0.0%	1	1.1%	1	1.1%	1	1.1%	1	1.1%	90	97.8%	86	97.7%
LR ROMANIA	0	0.0%	0	0.0%	0	0.0%	1	2.0%	2	5.3%	2	3.9%	36	94.7%	48	94.1%
LJ SLOVENIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	20	100.0%	18	100.0%
LZ SLOVAKIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	19	100.0%	18	100.0%
EF FINLAND	0	0.0%	0	0.0%	3	4.4%	2	2.7%	1	1.5%	1	1.4%	64	94.1%	70	95.9%
ES SWEDEN	1	1.2%	1	0.9%	6	7.1%	10	9.0%	0	0.0%	1	0.9%	77	91.7%	99	89.2%
EG UNITED KINGDOM	1	0.2%	1	0.3%	8	1.5%	7	1.9%	9	1.7%	10	2.7%	513	96.6%	356	95.2%
BI ICELAND	1	2.9%	1	2.8%	0	0.0%	0	0.0%	3	8.8%	1	2.8%	30	88.2%	34	94.4%
EN NORWAY	0	0.0%	0	0.0%	2	1.9%	3	2.9%	6	5.7%	7	6.8%	98	92.5%	93	90.3%
LS SWITZERLAND	0	0.0%	0	0.0%	0	0.0%	0	0.0%	4	3.7%	3	2.8%	103	96.3%	105	97.2%

	Pouto	with Eroi	iaht >- 65	no ond	Route w	ith Freigh	nt >= 130	0 and <	Route v	with Freigh	nt >= 100	) and <				
Departures	Nule	will Fiel	onoo >- 5	00 anu ///	6500 a	ind wher	e differer	nce >=	1300 a	and where	e differer	ice >=		No pr	oblem	
Departures	wrie		ence >= 0	U /0		75	%			150	%					
	20	13	201	4	20	13	20	14	20	13	20	14	20	013	20	)14
EB BELGIUM	2	1.1%	2	1.2%	4	2.3%	4	2.4%	18	10.3%	13	7.9%	151	86.3%	146	88.5%
LB BULGARIA	0	0.0%	0	0.0%	0	0.0%	1	1.9%	2	4.0%	3	5.7%	48	96.0%	49	92.5%
EK DENMARK	0	0.0%	0	0.0%	1	1.3%	4	5.0%	2	2.5%	3	3.8%	76	96.2%	73	91.3%
ED GERMANY	3	0.5%	3	0.6%	13	2.0%	17	3.3%	11	1.7%	8	1.5%	624	95.9%	489	94.6%
EE ESTONIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	10.0%	0	0.0%	18	90.0%	22	100.0%
EI IRELAND	1	0.9%	0	0.0%	2	1.8%	2	2.2%	1	0.9%	1	1.1%	107	96.4%	90	96.8%
LG GREECE	0	0.0%	0	0.0%	1	0.6%	3	2.2%	3	1.8%	3	2.2%	159	97.5%	131	95.6%
LE SPAIN	2	0.4%	2	0.5%	4	0.9%	4	1.0%	11	2.4%	13	3.3%	443	96.3%	372	95.1%
LF FRANCE	3	1.1%	2	0.9%	6	2.1%	12	5.5%	5	1.8%	2	0.9%	267	95.0%	203	92.7%
LD CROATIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	3.3%	45	100.0%	29	96.7%
LI ITALY	1	0.3%	2	0.7%	8	2.6%	8	2.8%	7	2.3%	5	1.7%	286	94.7%	273	94.8%
LC CYPRUS	1	1.7%	1	1.6%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	58	98.3%	60	98.4%
EV LATVIA	0	0.0%	0	0.0%	1	2.6%	1	2.7%	1	2.6%	0	0.0%	36	94.7%	36	97.3%
EY LITHUANIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	4.2%	0	0.0%	23	95.8%	18	100.0%
EL LUXEMBOURG	0	0.0%	0	0.0%	1	2.3%	1	2.6%	0	0.0%	1	2.6%	43	97.7%	36	94.7%
LH HUNGARY	0	0.0%	0	0.0%	1	2.6%	3	7.1%	0	0.0%	3	7.1%	38	97.4%	36	85.7%
LM MALTA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	1	1.9%	53	100.0%	51	98.1%
EH NETHERLANDS	0	0.0%	0	0.0%	1	1.0%	2	2.3%	6	5.8%	3	3.4%	96	93.2%	83	94.3%
LO AUSTRIA	0	0.0%	0	0.0%	1	1.2%	1	1.4%	1	1.2%	1	1.4%	81	97.6%	68	97.1%
EP POLAND	1	1.0%	1	1.1%	1	1.0%	0	0.0%	3	3.0%	2	2.2%	95	95.0%	86	96.6%
LP PORTUGAL	0	0.0%	0	0.0%	3	2.5%	2	2.1%	1	0.8%	1	1.1%	116	96.7%	92	96.8%
LR ROMANIA	0	0.0%	0	0.0%	2	4.2%	2	3.6%	2	4.2%	2	3.6%	44	91.7%	51	92.7%
LJ SLOVENIA	0	0.0%	0	0.0%	1	5.6%	1	5.6%	1	5.6%	3	16.7%	16	88.9%	14	77.8%
LZ SLOVAKIA	0	0.0%	0	0.0%	0	0.0%	0	0.0%	0	0.0%	2	12.5%	19	100.0%	14	87.5%
EF FINLAND	0	0.0%	0	0.0%	3	4.1%	3	3.4%	1	1.4%	1	1.1%	70	94.6%	85	95.5%
ES SWEDEN	1	1.2%	1	0.9%	7	8.5%	8	7.0%	1	1.2%	2	1.8%	73	89.0%	103	90.4%
EG UNITED KINGDOM	1	0.2%	1	0.3%	2	0.4%	3	0.9%	9	1.8%	8	2.3%	479	97.6%	339	96.6%
BI ICELAND	0	0.0%	0	0.0%	0	0.0%	2	5.4%	0	0.0%	1	2.7%	38	100.0%	34	91.9%
EN NORWAY	0	0.0%	0	0.0%	5	4.1%	4	3.5%	4	3.3%	5	4.4%	112	92.6%	104	92.0%
LS SWITZERLAND	0	0.0%	0	0.0%	0	0.0%	0	0.0%	3	2.8%	2	1.7%	106	97.2%	118	98.3%

The trend observed for dataset A1 also applies to dataset B1: in 2013, the category "Route with Freight >= 100 and < 1300 and where difference >= 150%" accounted for 47% of the routes with problems for arrivals and departures.

## 5.3 TRENDS BETWEEN 2013 AND 2014

The figures previously mentioned tend to indicate that the data quality remains stable between the reference years 2013 and 2014, both as concerns statistics on passenger and freight and mail transport by air.

## ANNEX XIV: Eurobase structure. Aviation Domain

## 1. Air transport infrastructure (avia\_if)

Number of airports (with more than 15,000 passenger movements per year) (avia\_if\_arp) Airport infrastructures by type (avia\_if\_typ) Airport connections to other modes of transport (avia\_if\_arp\_co)

## 2. Air transport equipment (avia\_eq)

Commercial aircraft fleet by type of aircraft (avia\_eq\_arc\_typ) Commercial aircraft fleet by age of aircraft (avia\_eq\_arc\_age)

# 3. Air transport - Enterprises, economic performances and employment (avia\_ec)

Number of aviation and airport enterprises (avia\_ec\_enterp) Employment in aviation and airport enterprises by gender (avia\_ec\_emp\_ent) Employment in main airports by gender (avia\_ec\_emp\_arp)

## 4. Air transport - Accidents (avia\_ac)

Number of injury accidents (avia\_ac\_number) Number of fatalities in injury accidents (avia\_ac\_fatal)

## 5. Air transport measurement - passengers (avia\_pa)

## Overview of the air passenger transport by country and airports (avia\_pao)

Air passenger transport by reporting country (avia\_paoc) Air passenger transport by main airports in each reporting country (avia\_paoa) Air passenger transport between reporting countries (avia\_paocc) Air passenger transport between main airports in each reporting country and partner reporting countries (avia\_paoac)

## National air passenger transport by country and airports (avia\_pan)

National air passenger transport by reporting country (avia\_panc) National air passenger transport by main airports in each reporting country (avia\_pana)

## International intra-EU air passenger transport by country and airports (avia\_pai)

International intra-EU air passenger transport by reporting country and EU partner country (avia\_paincc)

International intra-EU air passenger transport by main airports in each reporting country and EU partner country (avia\_painac)

## International extra-EU air passenger transport by country and airports (avia\_pae)

International extra-EU air passenger transport by reporting country and partner world regions and countries (avia\_paexcc)

International extra-EU air passenger transport by main airports in each reporting country and partner world regions and countries (avia\_paexac)

#### Detailed air passenger transport by reporting country and routes (avia\_par)

Air passenger transport between the main airports of Belgium and their main partner airports (routes data) (avia par be) Air passenger transport between the main airports of Denmark and their main partner airports (routes data) (avia par dk) Air passenger transport between the main airports of Germany and their main partner airports (routes data) (avia\_par\_de) Air passenger transport between the main airports of Estonia and their main partner airports (routes data) (avia\_par\_ee) Air passenger transport between the main airports of Greece and their main partner airports (routes data) (avia par gr) Air passenger transport between the main airports of Spain and their main partner airports (routes data) (avia par es) Air passenger transport between the main airports of France and their main partner airports (routes data) (avia par fr) Air passenger transport between the main airports of Ireland and their main partner airports (routes data) (avia\_par\_ie) Air passenger transport between the main airports of Italia and their main partner airports (routes data) (avia\_par\_it) Air passenger transport between the main airports of Cyprus and their main partner airports (routes data) (avia par cy) Air passenger transport between the main airports of Latvia and their main partner airports (routes data) (avia par lv) Air passenger transport between the main airports of Lithuania and their main partner airports (routes data) (avia par lt) Air passenger transport between the main airports of Luxembourg and their main partner airports (routes data) (avia\_par\_lu) Air passenger transport between the main airports of Hungaria and their main partner airports (routes data) (avia\_par\_hu) Air passenger transport between the main airports of Malta and their main partner airports (routes data) (avia par mt) Air passenger transport between the main airports of the Netherlands and their main partner airports (routes data) (avia\_par\_nl) Air passenger transport between the main airports of Austria and their main partner airports (routes data) (avia par at) Air passenger transport between the main airports of Poland and their main partner airports (routes data) (avia\_par\_pl) Air passenger transport between the main airports of Portugal and their main partner airports (routes data) (avia par pt) Air passenger transport between the main airports of Slovenia and their main partner airports (routes data) (avia par si) Air passenger transport between the main airports of Finland and their main partner airports (routes data) (avia\_par\_fi) Air passenger transport between the main airports of Sweden and their main partner airports (routes data) (avia par se) Air passenger transport between the main airports of the United Kingdom and their main partner airports (routes data) (avia\_par\_uk) Air passenger transport between the main airports of Iceland and their main partner airports (routes data) (avia par is) Air passenger transport between the main airports of Norway and their main partner airports (routes data) (avia par no) Air passenger transport between the main airports of Switzerland and their main partner airports (routes data) (avia\_par\_ch) Air passenger transport between the main airports of Bulgaria and their main partner airports (routes data) (avia\_par\_bg)

Air passenger transport between the main airports of Romania and their main partner airports (routes Data) (avia\_par\_ro)

Air passenger transport between the main airports of Croatia and their main partner airports (routes data) (avia\_par\_hr)

Air passenger transport between the main airports of Czech Republic and their main partner airports (routes data) (avia\_par\_cz)

Air passenger transport between the main airports of Slovakia and their main partner airports (routes data) (avia\_par\_sk)

## 6. Air transport measurement - freight and mail (avia\_go)

### Overview of the freight and mail air transport by country and airports (avia\_goo)

Freight and mail air transport by reporting country (avia\_gooc)

Freight and mail air transport by main airports in each reporting country (avia\_gooa) Freight and mail air transport between reporting countries (avia\_goocc) Freight and mail air transport between main airports in each reporting country and partner reporting countries (avia\_gooac)

### National freight and mail air transport by country and airports (avia\_gon)

National freight and mail air transport by reporting country (avia\_gonc) National freight and mail air transport by main airports in each reporting country (avia\_gona)

## International intra-EU freight and mail air transport by country and airports (avia\_goi)

International intra-EU freight and mail air transport by reporting country and EU partner country (avia\_goincc)

International intra-EU freight and mail air transport by main airports in each reporting country and EU partner country (avia\_goinac)

## International extra-EU freight and mail air transport by country and airports (avia\_goe)

International extra-EU freight and mail air transport by reporting country and partner world regions and countries (avia\_goexcc)

International extra-EU freight and mail air transport by main airports in each reporting country and partner world regions and countries (avia\_goexac)

#### Detailed freight and mail air transport by reporting country and routes (avia\_gor)

Freight and mail air transport between the main airports of Belgium and their main partner airports (routes data) (avia\_gor\_be)

Freight and mail air transport between the main airports of Denmark and their main partner airports (routes data) (avia\_gor\_dk)

Freight and mail air transport between the main airports of Germany and their main partner airports (routes data) (avia\_gor\_de)

Freight and mail air transport between the main airports of Estonia and their main partner airports (routes data) (avia\_gor\_ee)

Freight and mail air transport between the main airports of Greece and their main partner airports (routes data) (avia\_gor\_gr)

Freight and mail air transport between the main airports of Spain and their main partner airports (routes data) (avia\_gor\_es)

Freight and mail air transport between the main airports of France and their main partner airports (routes data) (avia\_gor\_fr)

Freight and mail air transport between the main airports of Ireland and their main partner airports (routes data) (avia gor ie) Freight and mail air transport between the main airports of Italia and their main partner airports (routes data) (avia gor it) Freight and mail air transport between the main airports of Cyprus and their main partner airports (routes data) (avia\_gor\_cy) Freight and mail air transport between the main airports of Latvia and their main partner airports (routes data) (avia\_gor\_lv) Freight and mail air transport between the main airports of Lithuania and their main partner airports (routes data) (avia\_gor\_lt) Freight and mail air transport between the main airports of Luxembourg and their main partner airports (routes data) (avia gor lu) Freight and mail air transport between the main airports of Hungary and their main partner airports (routes data) (avia gor hu) Freight and mail air transport between the main airports of Malta and their main partner airports (routes data) (avia\_gor\_mt) Freight and mail air transport between the main airports of the Netherlands and their main partner airports (routes data) (avia\_gor\_nl) Freight and mail air transport between the main airports of Austria and their main partner airports (routes data) (avia\_gor\_at) Freight and mail air transport between the main airports of Poland and their main partner airports (routes data) (avia gor pl) Freight and mail air transport between the main airports of Portugal and their main partner airports (routes data) (avia\_gor\_pt) Freight and mail air transport between the main airports of Slovenia and their main partner airports (routes data) (avia\_gor\_si) Freight and mail air transport between the main airports of Finland and their main partner airports (routes data) (avia\_gor\_fi) Freight and mail air transport between the main airports of Sweden and their main partner airports (routes data) (avia\_gor\_se) Freight and mail air transport between the main airports of the United Kingdom and their main partner airports (routes data) (avia gor uk) Freight and mail air transport between the main airports of Iceland and their main partner airports (routes data) (avia\_gor\_is) Freight and mail air transport between the main airports of Norway and their main partner airports (routes data) (avia gor no) Freight and mail air transport between the main airports of Switzerland and their main partner airports (routes data) (avia\_gor\_ch) Freight and mail air transport between the main airports of Bulgaria and their main partner airports (routes data) (avia gor bg) Freight and mail air transport between the main airports of Romania and their main partner airports (routes data) (avia gor ro) Freight and mail air transport between the main airports of Croatia and their main partner airports (routes data) (avia\_gor\_hr) Freight and mail air transport between the main airports of Czech Republic and their main partner airports (routes data) (avia gor cz) Freight and mail air transport between the main airports of Slovakia and their main partner airports (routes data) (avia\_gor\_sk)

# 7. Air transport measurement - traffic data by airports, aircrafts and airlines (avia\_tf)

Aircraft traffic data by reporting country (avia\_tf\_acc) Aircraft traffic data by main airport (avia\_tf\_aca) Airline traffic data by reporting country (avia\_tf\_alc) Airline traffic data by main airport (avia\_tf\_ala) Airport traffic data by reporting airport and airlines (avia\_tf\_apal)

# 8. Air transport - data aggregated at standard regional levels (NUTS) (avia\_rg)

Air transport of passengers at regional level (tran\_r\_avpa\_nm) Air transport of freight at regional level (tran\_r\_avgo\_nm) ANNEX XV:

Eurobase: main declaring airports. Selection of the routes between the "main declaring airports" and their "main partners" For the tables of the collections avia\_par and avia\_gor, the main partners of the "main declaring airports" have to be selected in the appropriate manner. The selected airport pairs will then be displayed in the tables of each country.

To determine the thresholds for the airports routes to be included in the Eurostat dissemination database, the most recent reference datasets have to be used.

## I. <u>Main declaring airports</u>

The list of airports to be considered as "main declaring airports" for the passenger tables (respectively the freight tables) are all airports reporting data in the Flight Stage dataset and/or in the On Flight Origin/Destination dataset for passenger transport (respectively freight transport).

## II. Routes between the main declaring airports and their main partners

## A. Problem with thresholds

Eurostat proposed to apply a unique threshold for all routes declared by the main airports. However, due to the important difference of volumes reported by the main airports of the various reporting countries, a unique threshold would present two inconveniences:

- the biggest airports of the smallest countries would be under the threshold and thus no data would be available in the tables for this country
- the number of airports selected for the participating countries where the transport is among the highest would be too important

## B. Solution

The following methodology takes into account the size class of the "main declaring airports" in order to determinate appropriate thresholds. This methodology would thus avoid the problem mentioned in the previous section.

The first step is the filling of the tables until 2003 using the annual thresholds defined in the method described in this document following the airport size (based on "passenger units"). For a specific year, data will be available for a list of "main declaring airports"-to-"main partner airports" routes defined for this year.

Furthermore, the list of "main declaring airports" and "main partner airports" defined at annual level should be kept at quarterly and monthly level for each year.

Some routes having only seasonal traffic may not appear.

## Annual updates

The tables in the collections avia\_par and avia\_gor will be updated on annual basis. This means that when country XX has sent data for a whole year, the tables avia\_par \_XX and avia\_gor \_XX could be updated. When the country has provided data for the complete year, the annual updates can be run for the monthly, quarterly and annual data. The new selection of "main

declaring airports"-to-"main partner airports" routes is made using these latest annual data according to the thresholds defined.

A list of "main declaring airports"-to-"main partner airports" routes is defined for each year separately. Once this selection has been made, the data should be included in the collection for each year only for the "main declaring airports"-to-"main partner airports" routes defined for the year concerned.

The list of "main declaring airports" and "main partner airports" defined at annual level will also be used to display the monthly and quarterly data of the same reference year.

For a specific reference year, the tables will contain values only for the "main declaring airports"to-"main partner airports" routes of this year, the other cells will remain empty.

	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003
Airport A - Airport A'			Х								Х
Airport B - Airport B'	Х		Х		Х			Х		Х	Х
Airport C - Airport C'	Х		Х	Х	Х	Х	Х	Х	Х	Х	Х
Airport D - Airport D'	Х	Х	Х	Х	Х	Х	Х		Х	Х	Х
Airport E - Airport E'	Х	Х		Х	Х	Х	Х	Х	Х		Х
Airport F - Airport F'		Х		Х	Х	Х	Х	Х			Х
Airport G - Airport G'		Х			Х	Х		Х		Х	Х
Airport H - Airport H'						Х				Х	Х
Airport I - Airport I'	Х	Х	Х		Х		Х	Х			
Airport J - Airport J'	Х					Х	Х	Х	Х		Х
Airport K - Airport K'				Х	Х	Х	Х			Х	Х

The availability of the information for a selection of routes could then be as follow:

## C. Method to define thresholds

In order to select the routes to display in the tables avia\_par and avia\_gor of the Eurostat dissemination domain, thresholds for the airports routes should be defined. These thresholds should allow having the most appropriate selection for each of the various countries.

The thresholds are defined separately for passenger and "freight and mail" transport because the importance of a route may be quite different in terms of passenger transport and in terms of "freight and mail" transport.

## 1. Passengers

## Data taken into account for the determination of the thresholds

In order to define these thresholds, a table with the total passenger transport has been made for the "main reporting airport"-to-partner airports routes, based on the 2003 data of the aviation database.

For each of the "main declaring airport", all the partner airports have been taken into account.

### Details of the calculation

Based on the available data, the total transport for each of the main declaring airport has been calculated. Furthermore, for each of the "main declaring airports", the quartiles have been calculated on the volumes of the airport-to-airport routes related to this declaring airport where passenger transport has been reported.

This action allows knowing the repartition of the volumes of passengers on the airport-to-airport routes declared by the reporting airports considered.

A summary table has been created, associating to each reporting airport its total passenger transport in 2003, the quartiles calculated previously and the number of airport-to-airport routes declared by this airport. The following table gives a sample of the previously mentioned table.

2003					
	Pax transport	Quartile 1	Quartile 2	Quartile 3	nb routes
EGLL LONDON/HEATHROW	63 208 331	2 823	63 983	268 686	269
EDDF FRANKFURT/MAIN	48 023 283	53	5 933	82 167	571
LFPG PARIS/CHARLES-DE-GAULLE	48 008 164	422	12 851	128 432	439
EHAM AMSTERDAM/SCHIPHOL	39 807 306	2 285	35 986	149 112	362
LEMD MADRID/BARAJAS	35 369 823	230	7 232	97 893	281
EGKK LONDON/GATWICK	29 893 190	520	12 991	91 895	351
LIRF ROMA/FIUMICINO	25 473 178	513	10 616	70 227	261
EDDM MUNCHEN	23 953 104	21	1 663	42 056	422
LEBL BARCELONA	22 492 001	220	3 177	62 210	254
LFPO PARIS/ORLY	22 448 820	228	6 969	44 435	249
EDDV HANNOVER	4 903 012	199	1 914	19 215	215
LPFR FARO	4 634 504	251	7 591	18 156	133
EGAA BELFAST/ALDERGROVE	3 954 859	239	1 757	17 742	104
ENBR BERGEN/FLESLAND	3 314 878	214	912	19 606	63

The quartiles allow knowing the repartition of the volumes of passengers on all the airports routes selected for each "main declaring airport": 25% of the routes have a volume of passengers inferior to Quartile 1, 50% of the routes have a volume of passengers inferior to Quartile 2 and 75% of the routes have a volume of passengers inferior to Quartile 3.

## Determination of the classes and the thresholds

Following the distribution of the total volume of passengers at each reporting airport, classes have been defined. These classes will allow calculating different thresholds depending on the size of the reporting airport.
If no classes were defined and a general threshold applied, some airports would not appear in the selection because of the relatively small passenger transport registered for some countries compared to the biggest participating countries in terms of total transport.

For each declaring airport, the study of the repartition of the volumes of the routes (based on quartile) following the airport size and the total number of route has lead to the following classes and thresholds.

Annual da	ta	
	Classes	Threshold (passengers)
	[150 000 ; 300 000[	10 000
	[300 000 ; 1 000 000[	15 000
	[1 000 000 ; 5 000 000[	20 000
	[5 000 0000 ; 10 000 000[	40 000
	[10 000 000 ; + [	75 000

A new method may be elaborated, establishing the threshold of an airport on the basis of its annual transport. However, these new thresholds would not change the general methodology.

# 2. Freight

# Data taken into account for the determination of the thresholds/Details of the calculation

The same table compared to passenger transport has been made for the "main declaring airports" with the freight transport.

#### Determination of the classes and the thresholds

For each declaring airport, the study of the repartition of the volumes of the routes (based on quartile) following the airport size and the total number of route has lead to the following classes and thresholds.

Annual dat	ta	
		Threshold (tonnes of
	Classes	freight and mail)
	[0;10 000[	50
	[10 000;100 000[	100
	[100 000;1 000 000[	500
	[1 000 000; + [	3 000

# ANNEX XVI: Air Transport Statistics metadata information in Eurobase

# Passenger and freight transport by air/Traffic data/Air transport at regional level

Reference Metadata in Euro SDMX Metadata Structure (ESMS)

Compiling agency: Eurostat, the Statistical Office of the European Union

# Eurostat metadata

## **Reference metadata**

1. Contact 2. Metadata update 3. Statistical presentation 4.Unit of measure 5. Reference Period 6. Institutional Mandate 7. Confidentiality 8. Release policy 9. Frequency of dissemination 10. Dissemination format 11. Accessibility of documentation 12. Quality management 13. Relevance 14. Accuracy 15. Timeliness and punctuality 16. Comparability 17. Coherence 18. Cost and Burden 19. Data revision 20. Statistical processing 21. Comment Related Metadata <u>Annexes</u> (including footnotes)

For any question on data and metadata, please contact: <u>EUROPEAN STATISTICAL</u> <u>DATA SUPPORT</u>

Download

1. Contact Top		
1.1. Contact organisation	Eurostat, the Statistical Office of the European Union	
1.2. Contact organisation unit	E3: Transport	
1.5. Contact mail address	5, Rue Alphonse Weicker L- 2920 Luxembourg LUXEMBOURG G-D	

2. Metadata update		
2.1. Metadata last certified	16/01/2015	
2.2. Metadata last posted	16/01/2015	

# **3. Statistical presentation**

#### 3.1. Data description

The Air transport domain contains national and international intra and extra-EU data. This provides air transport data for passengers (in number of passengers) and for freight and mail (in 1 000 tonnes) as well as air traffic data by airports, airlines and aircraft. Data are transmitted to Eurostat by the Member States of the European Union as well as the Candidate Countries, Iceland, Norway and Switzerland. The air transport data have been calculated using data collected at airport level. The data are presented in four sub-domains:

- Air Transport measurement Passengers
- Air Transport measurement Freight and mail
- Air Transport measurement Traffic data by airports, aircraft and airlines
- Air Transport measurement Data aggregated at standard regional levels (NUTS).

The two first domains contain several data collections:

- Overview of the air transport by country and airport,
- National air transport by country and airport,
- International intra-EU air transport by country and airport,
- International extra-EU air transport by country and airport,
- Detailed air transport by reporting country and routes.

In the tables of the sub-domain "Transport measurement - Passengers", data are broken down by passengers on board (arrivals, departures and total), passengers carried (arrivals, departures and total) and passenger commercial air flights (arrival, departures and total). Additionally, the tables of collection "Detailed air transport by reporting country and routes" provide data on seats available (arrival, departures and total). The data is presented at monthly, quarterly and annual level. In the tables of the sub-domain "Transport measurement - Freight and mail", data are broken down by freight and mail on board (arrival, departures and total), freight and mail loaded/unloaded (loaded, unloaded and total) and all-freight and mail commercial air flights (arrival, departures and total). The data is presented at monthly, quarterly and total).

In the tables of the sub-domain "Transport measurement - Traffic by airports, aircraft and airlines": - Data by type of aircraft are broken down by total passengers on board, total freight and mail on board in tonnes, total passengers seats available, total commercial air flights (passengers + all-freight and mail), passenger commercial air flights, all-freight and mail commercial air flights. The data is presented at annual level since 2003.

- Data by type of airline are broken down by total passengers on board, total passengers carried, total freight and mail on board, total freight and mail loaded/unloaded, total passengers seats available, total commercial air flights (passengers + all-freight and mail), passenger commercial air flights, all-freight and mail commercial air flights. The data is presented at annual level since 2003.

- Data by airport are broken down by total passengers carried, total transit passengers, total transfer passengers, total freight and mail loaded/unloaded, total commercial aircraft movements, total aircraft movements. The data is presented at monthly, quarterly and annual level.

The sub-domain "Transport measurement - Data aggregated at standard regional levels (NUTS)", contains two tables:

- Air transport of passengers at regional level
- Air transport of freight at regional level

The tables present the evolution of the number of passengers carried (if not available passengers on board) and the volume of freight and mail loaded or unloaded (if not available freight and mail on board) to/from the NUTS regions (level 2, 1 and 0) since 1999. The data is presented at annual level. The air transport regional data have been calculated using data collected at the airport level in the frame of the regulatory data collection on air transport. More information can be found in <u>Regional transport statistics metadata file.</u>

## **3.2.** Classification system

Airports are classified according to ICAO (International Civil Aviation Organization) airport coded as listed in ICAO document 7910.

The aircraft are classified according to aggregated aircraft categories based on the ICAO aircraft codes as listed in ICAO document 8643.

The airlines are classified according to the region where they are licensed: European Union or outside the European Union. The information is either directly provided by the data providers or derived from the ICAO airline codes as listed in the ICAO document 8585.

The geographical classification for country codes (ISO 3166) is applied for dissemination purposes.

## 3.3. Coverage - sector

Air transport

## 3.4. Statistical concepts and definitions

Regulation (EC) N°1358/2003, implementing Regulation N°437/2003 of the European Parliament and of the Council on statistical returns in respect of the carriage of passengers, freight and mail by air, mentions three datasets: the Flight Stage dataset, called A, the On Flight Origin/Destination dataset, called B and the Airport dataset, called C.

<u>Dataset A</u>: This dataset contains periodic flight stage data registered for airport-to-airport routes, and broken down by arrivals/departures, scheduled/non-scheduled, passenger service/all-freight and mail service, airline information and aircraft type. The values provided concern passengers on board, freight and mail on board, commercial air flights as well as passenger seats available.

<u>Dataset B</u>: This dataset contains periodic on flight origin/destination data registered for airport-toairport routes, and broken down by arrivals/departures, scheduled/non scheduled, passenger service/all-freight and mail service and airline information. The values provided concern passengers carried and freight and mail loaded or unloaded.

<u>Dataset C:</u> This dataset contains periodic airport data registered for declaring airports, and broken down by airline information. The values provided concern total passengers carried, total direct transit passengers, total freight and mail loaded or unloaded, total commercial aircraft movements and total aircraft movements.

Before the adoption of the Regulations, not all the participating countries were providing data according to the two reporting concepts covered by the Regulation: "On flight origin and destination" (OFOD) and "Flight stage" (FS).

The main concepts used in this domain are the following:

## **Community airport**

A defined area on land or water in a Member State subject to the provisions of the treaty, which is intended to be used either wholly or in part for the arrival, departure and surface movement of aircraft and open for commercial air services.

## Flight stage

The operation of an aircraft from take-off to its next landing. This is linked to the definition of passengers (or freight and mail) on board.

## Passengers on board

All passengers on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport. All revenue and non revenue passengers on board an aircraft during a flight stage. Includes direct transit passengers (counted at arrivals and departures).

## **Direct transit passengers**

Passengers who, after a short stop, continue their journey on the same aircraft on a flight having the

same flight number as the flight on which they arrive.

## Transfer of indirect transit passengers

Passengers arriving and departing on a different aircraft within 24 hours, or on the same aircraft bearing different flight numbers. They are counted twice: once upon arrival and once on departure.

# Freight and mail on board

All freight and mail on board of the aircraft upon landing at the reporting airport or at taking off from the reporting airport. All freight and mail on board an aircraft during a flight stage. Includes direct transit freight and mail (counted at arrivals and departures). Includes express services and diplomatic bags. Excludes passenger baggage.

# On flight origin and destination

Traffic on a commercial air service identified by a unique flight number subdivided by airport pairs in accordance with point of embarkation and point of disembarkation on that flight. For passengers, freight or mail where the airport of embarkation is not known, the aircraft origin should be deemed to be the point of embarkation; similarly, if the airport of disembarkation is not known, the aircraft destination should be deemed to be the point of disembarkation. This is linked to the definition of passengers carried and freight and mail loaded or unloaded.

## **Passengers carried**

All passengers on a particular flight (with one flight number) counted once only and not repeatedly on each individual stage of that flight. All revenue and non-revenue passengers whose journey begins or terminates at the reporting airport and transfer passengers joining or leaving the flight at the reporting airport. Excludes direct transit passengers.

# Freight and mail loaded or unloaded

All freight and mail loaded onto or unloaded from an aircraft. Includes express services and diplomatic bags. Excludes passenger baggage. Excludes direct transit freight and mail. Conceptually speaking, figures obtained by applying the Flight Stage concept and the On Flight Origin/Destination concept are not comparable because of direct transit passengers, which are counted for "flight stages" but not for "on flight origin/destination". The following example shows the difference between the "On flight origin and destination" data and the "Flight Stage" data: a flight is operated on a route New York-London-Paris 185 passengers travel from New York to London, 135 from New York to Paris and 75 from London to Paris. Thus in terms of on flight origin/destination data the figures recorded are 185 passengers New York-London, 135 passengers New York-Paris; London would record New York-London and London-Paris; Paris would record New York-Paris and London-Paris. In terms of flight stage data there are two flight stages and the figures reported by New York and London airports are: New York-London 320=(185+135) passengers and by London and Paris airports are London-Paris 210=(135+75) passengers.

## 3.5. Statistical unit

The data used in the domain are collected by the different data providers at the airport level.

## **3.6. Statistical population**

As mentioned in the Regulation, four categories of Community airports are defined, the reported data differing following the airport's category.

Category "0": Airports with less than 15 000 passenger units per year are considered as having only "occasional commercial traffic" without obligation to report. However, some countries report data on these airports which are disseminated.

Category "1": Airports with between 15 000 and 150 000 passenger units per year shall transmit only aggregated airport data (Dataset C).

Category "2": Airports with more than 150 000 passenger units and less than 1 500 000 passenger units per year shall transmit flight stage data, on flight origin destination data as well as aggregated airport data (Datasets A, B and C).

Category "3": Airports with at least 1 500 000 passenger units per year shall transmit flight stage

data, on flight origin destination data as well as aggregated airport data (Datasets A, B and C). A list of the airports obliged to deliver data according to the Regulation (categories 1, 2 and 3) is included on the Reference Manual for Air Transport Statistics (see Annex at the bottom of this page).

#### 3.7. Reference area

The data cover the EU Member States, the Candidate Countries as well as Norway, Iceland, Switzerland. Aggregates are also provided for euro area (EA), EU-15, EU-25, EU-27 and EU-28.

#### 3.8. Coverage - Time

1993 was the first year where data were collected. However, the availability and time coverage of the data depends on each country. For more details about data availability per period and country see the Annex at the bottom of this page.

#### **3.9. Base period**

Not applicable

# 4. Unit of measure

The units used depend on the elements collected and are: passengers, tonnes (for freight and mail), flights, aircraft movements and seats available.

# **5. Reference Period**

Data is collected on a monthly basis and then aggregated at quarterly and annual level.

# 6. Institutional Mandate

6.1. Institutional Mandate - legal acts and other agreements

This data transmission is based on a EP and Council framework legal act and on several implementing Commission Regulations:

- <u>Regulation (EC) No 437/2003 of the European Parliament and of the Council of 27 February</u> 2003 on statistical returns in respect of the carriage of passengers, freight and mail by air.
- Commission Regulation (EC) No 1358/2003 of 31/07/2003.
- Commission Regulation No 546/2005 of 8 April 2005.
- Commission Regulation No 158/2007 of 16 February 2007.

Before 2003, the data was provided by the different participating countries on a voluntary basis.

## 6.2. Institutional Mandate - data sharing

Not applicable

# 7. Confidentiality

## 7.1. Confidentiality - policy

<u>Regulation (EC) No 223/2009 on European statistics</u> (recital 24 and Article 20(4)) of 11 March 2009 (OJ L 87, p. 164), stipulates the need to establish common principles and guidelines ensuring the confidentiality of data used for the production of European statistics and the access to those confidential data with due account for technical developments and the requirements of users in a democratic society.

## 7.2. Confidentiality - data treatment

Only the airline information data is subject to confidentiality. The data providers may deliver this

<u>Top</u>

<u>Top</u>

Top

information with a higher level of aggregation to avoid confidentiality constraints at national level.

# 8. Release policy

## 8.1. Release calendar

The on-line database is updated once per quarter.

#### 8.2. Release calendar access

There is not a precise calendar of updates apart from the periodicity above mentioned.

# 8.3. Release policy - user access

In line with the Community legal framework and the <u>European Statistics Code of Practice</u> Eurostat disseminates European statistics on Eurostat's website (see item 10 - 'Dissemination format') respecting professional independence and in an objective, professional and transparent manner in which all users are treated equitably. The detailed arrangements are governed by the <u>Eurostat</u> protocol on impartial access to Eurostat data for users.

# 9. Frequency of dissemination

Data is disseminated on a quarterly basis. Until 1996, all participating countries declared yearly data. However, for some of them, quarterly data appeared from 1997 onwards and monthly from 1998 onwards.

# **10. Dissemination format**

**10.1. Dissemination format - News release** 

News releases on-line

## **10.2. Dissemination format - Publications**

Statistics Explained article <u>Air passenger transport - monthly statistics</u> (three updates per year) Statistics in Focus in Statistics Explained format - <u>Air transport statistics</u>

Air transport services statistics - NACE Rev. 2 - Statistics Explained article

Eurostat Pocketbook *Energy, transport and environmental indicators* - <u>2013 edition</u> Eurostat *Regional Yearbook* - <u>2013 edition</u>, <u>2014 edition in Statistics Explained</u>

Eurostat Regional Tearbook - <u>2015 Cattion</u>, <u>2014 Cattion in Stati</u>

**10.3. Dissemination format - online database** 

Please consult free <u>data on-line</u> (Transport/Air transport) or refer to <u>contact details</u>.

# 10.4. Dissemination format - microdata access

Not applicable

# 10.5. Dissemination format - other

Not applicable

# **11. Accessibility of documentation**

# 11.1. Documentation on methodology

The *Reference Manual on Air Transport Statistics* (see Annex at the bottom of this page) contains detailed methodological information as well as background information on the implementation of the legal acts and on how data are processed and disseminated by Eurostat.

Methodological notes are also available in the different publications on Aviation statistics (see point 10.2).

Тор

Top

Тор

Additional definitions of the terms used in the frame of the statistics on air transport are available in the "*Glossary on Air Transport Statistics*" (see Annex at the bottom of this page).

# 11.2. Quality management - documentation

The Reference Manual (see Annex at the bottom of this page) includes a section describing the quality checks applied to the incoming data as well as showing the results of the quality analysis of the last full data collection year available.

# **12. Quality management**

## 12.1. Quality assurance

Data quality is ensured by the implementation of a common and well established methodology for the data collection and compilation at country level. Data is subsequently validated in Eurostat by applying different controls on the incoming data, before and after treatment, as well as by cross-checking partner countries figures (mirror statistics).

#### 12.2. Quality management - assessment

Data quality is high. Few problems are detected on data treatment and if so, the countries involved are immediately contacted to solve the problem. Annually, a data quality report is prepared with a summary of the main findings affecting quality as well as showing the solution adopted and the materiality of the existing differences. It is provided to each country in order either to correct the existing data or to improve the data quality for the future data transmissions.

# **13. Relevance**

#### **13.1. Relevance - User Needs**

The usual users of air transport data are people from different Commission Services or other European institutions (e.g.: DG MOVE, DG REGIO, GD COMP, the European Court of Auditors), National Statistical Authorities, international or other governmental institutions (Ministries of Transport), universities or research institutions as well as the users involved in the industry as airlines, airports or air traffic management.

Users mainly request these data to properly monitor the development of air transport in the EU and other European countries, evaluate the impact of the air transport industry in the economy, quantify the importance of the transport flows of passengers and freight at intra-EU and extra-EU level and assess the competition in the air transport market.

## **13.2. Relevance - User Satisfaction**

The existing data collection on air transport statistics is well appreciated by the users. Accuracy, clarity and comparability are particularly indicated as good qualities of these data. European air transport statistics are a valuable resource to a wide range of users.

Timeliness and lack of information on major partner countries are cited as weaknesses of this domain.

For more details, please refer to the latest Rolling Review of 2009 (see Annex at the bottom of this page).

## 13.3. Completeness

Completeness of data is high. There is an obligation of data provision for the Member States and, as a consequence, there are very few gaps in the data provision, at least since 2003 when the framework legal act came into force.

# **14. Accuracy**

14.1. Accuracy - overall

<u>Top</u>

Top

<u>Top</u>

Overall accuracy of the data is good. Regular comparisons with other relevant international sources (ICAO, airports data) shows a high level of comparability.

#### 14.2. Sampling error

Not applicable

#### 14.3. Non-sampling error

Not applicable

# **15. Timeliness and punctuality**

#### 15.1. Timeliness

According to the existing legal basis, countries have 6 months to deliver the data for the reference monthly period. In practice, final annual data are disseminated about nine months after the reference period. Monthly and quarterly provisional data are disseminated earlier, depending on data deliveries from the reporting countries.

#### **15.2.** Punctuality

A majority of countries deliver the data earlier than the t+6 months regulatory deadline. The rest of the countries respect the deadline for data provision with some occasional exceptions.

# **16.** Comparability

#### **16.1.** Comparability - geographical

Data comparability across countries is very high. This is ensured by the implementation of a common methodology. In addition, the so-called "mirror checks" allow to compare the data declared by partner reporting airports and find possible inconsistencies that are corrected as far as possible.

#### 16.2. Comparability - over time

Comparability over time is also very high. The present methodological approach has been applied for a number of years now and it is well understood and applied at airport and country level. So the analysis of the data over time produces very reliable results.

Only in the case of countries where there has been an increase in the number of reporting airports over time, the comparison of national aggregated data has to be taken with care because the comparison is affected by the fact that more airports report data from one year to another. Data availability over the time depends on each country.

# **17.** Coherence

#### 17.1. Coherence - cross domain

Data coherence across the domain is good. Detailed data at airport level are available: national, international intra- and extra-EU figures at community, country, and airport levels. Data at regional level (NUTS level 2, 1 and 0) are also available. This information allows the implementation of different quality checks to ensure the coherence of the data.

# **17.2.** Coherence - internal

The quality checks include mirror statistics, time series checks and inter-datasets checks. These quality checks detect data that could possibly be in error. Further investigation is recommended for data that fail these checks. Therefore, the internal consistency of the data is high.

# **18. Cost and Burden**

Top

Top

<u>Top</u>

An exercise to measure cost-benefit of this obligatory data collection was made in 2007. However, the methodology applied to compare both sides did not allow to provide consistent and valuable conclusions, particularly because of the difficulty of comparing costs (measured in a currency) and benefits (measured with a scoring system).

# **19. Data revision**

# 19.1. Data revision - policy

Data revisions are taken into account and processed when provided by the national competent authorities.

## **19.2. Data revision - practice**

Methodology has been settled down in the above mentioned Regulations following existing agreements. Therefore, no major change in the methodology used to collect and process the data have taken place in this domain.

# 20. Statistical processing

## 20.1. Source data

Data are collected and/or compiled by the competent national authorities, which can be for instance the Statistical Office or the Civil Aviation Authorities. Original data sources are normally the airports organisations or enterprises.

#### 20.2. Frequency of data collection

Data are collected on a monthly basis as regards datasets A1 and B1. Dataset C1 can be delivered on a monthly, quarterly or annually basis.

## 20.3. Data collection

Data should be transmitted to Eurostat using the eDAMIS engine tool following the transmission format foreseen in Regulation (EC) 1358/2003 (Commission Regulation).

# 20.4. Data validation

Data validation takes place at several levels of the data processing. The first step is the automatic validation during the integration, and the second step is the quality checks when data has been integrated.

## Automatic validation

The checks especially ensure that:

- the record format is correct
- there are no duplicate records within the dataset

- each record contains valid and correct codes

## Quality checks

Three types of quality checks are made on the datasets received for national and international transport.

• Consistency over time

This check is made in order to detect unlikely increase or decrease of transport at one of the reporting airports. This check is applied separately for international and national transport.

• Mirror checking

These quality checks are performed in order to compare the consistency between two partner declarations. They are run both for national and international declarations at city level. This means

<u>Top</u>

that the reported data have been first aggregated at city levels and then compared. This allows detecting and solving potential problems of wrong airport code attribution.

• Missing routes

This check allows detecting the routes between two declaring airports where only one of them has declared the information. It is run for international and national transport separately.

## Managing Quality check errors

Possible data errors that are detected at this stage are communicated to the countries for checking purposes. All corrections of errors should be documented. Sometimes it might be prudent to return the data to the countries for correction and re-supply. Data that are re-supplied are then re-validated, before further quality checking.

#### 20.5. Data compilation

In the frame of the data dissemination process, Eurostat has to calculate aggregates at intra-EU level (national, regional and intra-EU aggregates). It requires sometimes solving the problem of double counting. For each aggregate it is necessary to start at the airport level in order to identify the mirror declarations, i.e. the airport routes for which both airports report the volume, since these constitute the routes where the problem of double counting occurs. When calculating the total volume in such cases, only the departure declarations of the concerned airports have been taken into account. The problem of the double counting only appears for the calculation of the total passengers but not for the total arrivals (respectively total departures), which corresponds to the sum of the arrivals (respectively departures) at each domestic airport.

Concerning the total international extra-EU transport, the calculation is easier. It consists in the sum of all the declarations of the Member States to/from all the partner countries out of the European Union, as there is no double counting.

20.6. Adjustment

Not applicable

# 21. Comment

**Belgium:** From 1993 to 2003 the data provided by Belgium only refer to Brussels airport, 2004 and 2005 data refer to Brussels and Charleroi. From 2006 onwards, Liege, Oostende and Antwerpen are also sending data.

Czech Republic: No data at airport to airport level (routes) is disseminated.

*Denmark*: Due to the lack of data for 2000, there is a break on the time series. Freight and mail data are not available for Kobenhavn/Kastrup airport from 2004 to 2007.

*Ireland:* In 1993 data provided by Ireland only refer to Dublin airport. From 1994 until 2004 data refer to Dublin, Shannon and Cork airports. From 2005 onwards more airports are providing data, notably Connaught, Kerry and Galway.

*Greece*: Due to the lack of data for 2001 and 2002, there is a break on the time series. Until 2000 the airport code for Athens airport is LGAT, in 2001 the new Athens airport was opened with the code LGAV, since 2002 only the code LGAV is used. Data for passengers on board from the years 2003 until 2007 are underestimated because they do not include direct transit passengers.

*France*: Up to 2000, figures for Paris concern the airport system. From 2001, data are available for Paris/Charles de Gaulle and Paris/Orly separately. Data for freight transport in the Paris airports (Charles de Gaulle and Orly) are systematically underestimated due to incomplete data provision.

*Italy:* Due to missing airports in the declarations from Italy from 1999 to 2002, there is a break on the time series for the aggregated figures for this country.

*Lithuania*: In 2003 and 2004, Lithuanian data refer to Vilnius Intl. airport only. From 2005 onwards, data for Kaunas and Palanga airports have been added.

Luxembourg: Until 2007 Luxembourg has only provided Flight Stage data.

<u>Top</u>

**Poland:** Because of derogations granted to other airports Polish 2004 and 2005 data refer to Warszawa/Okecie airport only. From 2006 onwards Poland reports data for 10 airports.

*Portugal*: Until 2004 the airport code for Santa Maria airport is LPAZ and since 2005 it has been replaced by the code LPPO.

*Slovakia*: Slovakia provided data at country level until 2005 included. Until that year, no data at airport to airport level (routes) is disseminated.

*Sweden*: From 1993 to 1994 the number of reporting Swedish airports increased from 3 to 15. Freight and mail data are not available for Sweden for the period 2005-2007.

*Croatia:* Until 2007 Croatia has provided only aggregated airport declarations. From 2008 onwards flight stage and on flight origin destination data are provided.

Turkey: Only aggregated airport declarations are provided.

*Iceland*: Only Keflavik airport delivers all datasets. The other airports in Iceland only provide aggregated airport declarations.

# **Related metadata**

<u>avia\_if\_esms</u> - Air transport infrastructure, transport equipment, enterprises, employment and accidents

# Annexes

Glossary on air transport statistics

Rolling Review - Air Transport Statistics - Final Report -11 September 2009 Reference Manual on Air Transport Statistics V.11

Data availability status 09\_2015

<u>Top</u>

Тор

# ANNEX XVII: Country specific notes





# Country and table specific notes to be considered when using data on air transport statistics published in Eurobase

#### Last update: 05/11/2015

#### Bulgaria:

- Data has been reported starting from 2007 for flight stage and on flight origin destination data; 2001 for airport data
- In 2014, the increase in freight and mail transport at Burgas airport is due to the improvement of the economic situation in this sector, using air transport for transporting freight and mail.

#### Czech Republic:

- Data has been reported starting from 2002 for flight stage and on flight origin destination data; 2001 for airport data
- Information on airlines and partner airports are aggregated due to confidentiality issue.

#### Germany:

• For the smallest airports there are sometimes important fluctuations of their traffic performance from one year to another. Very often the services of only one carrier predominate at these airports. If such carriers reduce or cancel their operations, there are significant repercussions on the traffic performance of the airports.

#### Estonia

• Data has been reported starting from 2004 for flight stage and on flight origin destination data; 2001 for airport data

#### Ireland:

• Number of passengers can be greater to the number of seats available because of infant in arms.

#### Greece:

• Seats available not disseminated due to low data quality.

#### France:

- Seats available not disseminated due to low data quality.
- Freight and mail data are underestimated for the two main airports in Paris (Paris/Orly and Paris/Charles De Gaulle).

#### Croatia:

• Data has been reported starting from 2008 for flight stage and on flight origin destination data; 2004 for airport data

#### Cyprus:

• Data has been reported starting from 2001

#### Latvia:

- Data has been reported starting from 2004 for flight stage and on flight origin destination data; 2001 for airport data
- The increase in 2013 for freight and mail data was due to freight sent to international forces.

#### Lithuania:

• Data has been reported starting from 2003 for flight stage and on flight origin destination data; 2001 for airport data

#### Luxembourg:

• Data has been reported starting from 2004 for flight stage and on flight origin destination data; 2000 for airport data

#### Hungary:

• Data has been reported starting from 2002

#### Malta:

• Data has been reported starting from 2001

#### Netherlands:

• The growth of passengers in Eindhoven airport is partially the result of more destinations. In addition, number of flights is planned to grow until 2020.

#### Austria:

• Number of passengers can be greater to the number of seats available because of infant in arms.

#### Poland:

• Data has been reported starting from 2004 for flight stage and on flight origin destination data; 2001 for airport data

#### Romania:

• Data has been reported starting from 2001.

#### Slovenia:

- Data has been reported starting from 2004 for flight stage and on flight origin destination data; 2001 for airport data.
- Number of passengers can be greater to the number of seats available because of infant in arms.
- Differences when comparing data between datasets can be observed, due to rounding in tonnes.

#### Slovakia:

• Data has been reported starting from 2001.

#### Finland:

- Varkaus airport does not have any commercial flights anymore from the beginning of 2014.
- Pori, Ivalo and Kittilä are cases where there are circular flights. For that reason there are more passengers on board for departures than on board for the arrivals since departures include transit passengers for the second leg of the journey.

#### Sweden:

• The differences between number of arriving passengers and departing passengers depend on more accurate reporting from the airports of departing passengers.

#### United Kingdom:

- The drop in number of passengers, freight and flights in 2014 is explained as follow:
  - Manston Airport closed 15 May 2014.
  - Prestwick Airport has reduced numbers.
  - The Operator running scheduled services from Oxford has now ceased.
  - In 2014, Birmingham had two major Freight Operators that were not operating that year.

Former Yugoslav Republic of Macedonia:

• Data has been reported starting from 2007, only for airport data

Iceland:

• Data has been reported starting from 2003

#### Norway:

• Data has been reported starting from 2001

Switzerland:

• Data has been reported starting from 2002

Turkey:

- Kastamonu, Bingöl and Şırnak airports started to operate by July 2013.
- Çanakkale airport was opened after Professional Air Training works where completed by March 2014.

#### **Exclusion of double counting**

The national aggregates and total intra-EU-28 aggregates exclude any double counting.

For the countries which doesn't have any comment – they start providing all air transport data at the same time in1993 (no derogations).