

TONNE-KILOMETRE MONITORING PLAN

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Flying Circus Germany AG
< Commission list has not yet been published >
New monitoring plan

If your competent authority requires you to hand in a signed paper copy of the monitoring plan, please use the space below for signature:

Date

Name and Signature of
legally responsible person

GUIDELINES AND CONDITIONS

- 1 Directive 2003/87/EC, as amended by Directives 2004/101/EC and 2008/101/EC (hereinafter "the EU ETS Directive") requires aircraft operators who are included in the European Greenhouse Gas Emission Trading Scheme (the EU ETS) to monitor and report their emissions and tonne-kilometre data, and to have the reports verified by an independent and accredited verifier.
- 2 The Monitoring and Reporting Guidelines (hereinafter "the MRG") as set out by Commission Decision 2007/589/EC, as amended by Commission Decisions 2009/87/EC and 2009/339/EC, define further requirements for monitoring and reporting.

Annex XV of the MRG provides for activity-specific guidelines for the determination of tonne-kilometre data from aviation activities for the purpose of an application under Articles 3e or 3f of Directive 2003/87/EC (i.e. application for allocation of allowances free of charge). This annex specifies the content of the monitoring plan. The same annex specifies further:

"The competent authority may require the aircraft operator to use an electronic template for submission of the monitoring plan. The Commission may publish a standardised electronic template or file format specification. In this case the competent authority shall accept the use by the aircraft operator of this template or specification, unless the competent authority's template requires at least the same data input."

- 3 This file constitutes the said template developed by the European Commission. Under certain conditions as described below, it may have been amended to a limited extent by a Member State's competent authority.

Before you use this file, please carry out the following steps:

- a **Make sure you know which EU Member State is responsible for administering you** (the aircraft operator to which this monitoring plan refers). The criteria for defining the administering Member State are set out by Art. 18a of the EU ETS Directive. A list specifying the administering Member State for each aircraft operator can be found on the Commission's website (see below).
 - b Identify the Competent Authority (CA) responsible for your case in that administering Member State (there may be more than one CA per Member State).
 - c Check the CA's webpage or directly contact the CA in order to find out if you have the correct version of the template. The template version is clearly indicated on the cover page of this file.
 - d Some Member States may require you to use a more sophisticated system, such as Internet-based forms instead of a spreadsheet. In this case the CA will provide further information to you.
- 4 This Monitoring Plan must be submitted to your Competent Authority to the following address:

< German Competent Authority example; please check on Commission website for your CA's address:
<http://ec.europa.eu/environment/climat/pdf/aviation/contacts.pdf> >

Umweltbundesamt, Deutsche Emissionshandelsstelle /
Federal Environment Agency, German Emissions Trading
< please note the requirements for the electronic communication with
the German Emissions Trading Authority, see also
http://www.dehst.de/cln_162/nn_1378136/EN/DEHST/Electronic_Communication/Electronic_communication_aviation/Electronic_communication_aviation_node.html?_nnn=true >

- 5 The Competent Authority may contact you to discuss modifications to your monitoring plan to ensure the accurate and verifiable monitoring and reporting of tonne-kilometre data, according to the principles set in the MRG. Once approved, the Competent Authority will send you an approved Monitoring Plan, that you will use as the methodology to determine tonne-kilometres and to implement your data acquisition and handling activities and control activities. It will also serve as a reference for verification of your tonne-kilometre report.
- 6 Any substantial change in your monitoring methodology shall be notified to the competent authority without undue delay after you become aware of it or could in all reasonableness have become aware of it, unless otherwise specified in the monitoring plan, as set in the Monitoring and Reporting Guidelines.
- 7 Contact your Competent Authority if you need assistance to complete your Monitoring Plan. Some Member States have produced guidance documents which you may find useful.
- 8 **Confidentiality statement-** The information submitted in respect of this application may be subject to public access to information requirements, including Directive 2003/4/EC on public access to environmental information. If you consider that any information you provide in connection with your application should be treated as commercially confidential, please let your Competent Authority know. You should be aware that under the provisions Directive 2003/4/EC, the Competent Authority may be obliged to disclose information even where the applicant requests that it is kept confidential.

Information sources:

EU Websites:

EU-Legislation: <http://eur-lex.europa.eu/en/index.htm>
EU ETS general: http://ec.europa.eu/environment/climat/emission/index_en.htm
Aviation EU ETS: http://ec.europa.eu/environment/climat/aviation_en.htm
Monitoring and Reporting in the EU ETS:
http://ec.europa.eu/environment/climat/emission/mrg_en.htm

Other Websites:

< German Competent Authority example >

Website of the German Competent Authority: <http://www.dehst.de/>
Aviation-specific pages: http://www.dehst.de/cln_090/nn_484538/EN/Aviation/Aviation_node.html?_nnn=true

Helpdesk:

< German Competent Authority example >
Hotline of the German Competent Authority: +49 - (0)30 - 89 03 - 50 50
E-mail: emissionshandel@uba.de




How to use this file:

In order to minimize your workload, you may choose to enter only in one monitoring plan all the data which is needed identically in both monitoring plans (emissions and tonne-kilometre). This choice has to be made in input field 2(c). It is recommended to use the annual emission monitoring plan as the primary document, as this requires generally the more complete information. If you do not send both documents to the Competent Authority at the same time, you have to fill in this data in the first document.

It is recommended that you go through the file from start to end. There are a few functions which will guide you through the form which depend on previous input, such as cells changing colour if an input is not needed (see colour codes below).

In several fields you can choose from predefined inputs. For selecting from such a "drop-down list" either click with the mouse on the small arrow appearing at the right border of the cell, or press "Alt-CursorDown" when you have selected the cell. Some fields allow you to input your own text even if such drop-down list exists. This is the case when drop-down lists contain empty list entries.

colour codes and fonts:

Black bold text:	This is text provided by the Commission template. It should be kept as it is.
<i>Smaller italic text:</i>	This text gives further explanations. Member States may add further explanations in MS specific versions of the template.
	Yellow fields are input fields
	Shaded fields indicate that an input in another field makes the input here irrelevant.
	Grey shaded areas should be filled by Member States before publishing customized version of the template.

Further guidance as provided by the Member State:

Please refer also to the guidance document "Guidance for the Aviation Industry - Monitoring and Reporting Annual Emissions and Tonne km Data for EU Emissions Trading"
< <http://www.emissieautoriteit.nl/mediatheek/hulpmiddelen/aviation/EU%20ETS%20Aviation%20guidance%20version%201.0%2028052009.pdf>>.

IDENTIFICATION OF THE AIRCRAFT OPERATOR AND DESCRIPTION OF ACTIVITIES

2 Identification of Aircraft Operator

(a) Please enter the name of the aircraft operator:

This name should be the legal entity carrying out the aviation activities defined in Annex I of the EU ETS Directive

Flying Circus Germany AG

(b) Unique Identifier as stated in the Commission's list of aircraft operators:

This identifier can be found on the list published by the Commission pursuant to Article 18a(3) of the EU ETS Directive.

< Commission list has not yet been published >

(c) Please choose the primary monitoring plan:

Explanation: There are several fields in this template that are identical in the template for the annual emissions monitoring plan, like address information, and information regarding the aircraft fleet. In order to avoid unnecessary duplication of reporting, you may select here either the annual emission monitoring plan (this file) or the monitoring plan for tonne-kilometre as the primary document. As soon as you have made your selection, you have to fill in the requested information only once in the selected document.

Monitoring Plan for Annual Emissions

(d) Is this a new or an updated monitoring plan?

Note: If you are using this file to update a previous version, you have to select the current file as the primary document under 2(c). If this is an updated monitoring plan, your competent authority may allow that you fill in only new information instead of the complete data.

New monitoring plan

<<< If you have selected the annual emissions monitoring plan under 2(c), click here to proceed to section 3a >>>

(e) If different to the name given in 2(a), please also enter the name of the aircraft operator as it appears on the Commission's list of operators:

The name of the aircraft operator on the list pursuant to Article 18a(3) of the EU ETS Directive may be different to the actual aircraft operator's name entered in 2(a) above.

(f) Please enter the unique ICAO designator used in the call sign for Air Traffic Control (ATC) purposes, where available:

The ICAO designator should be that specified in box 7 of the ICAO flight plan (excluding the flight identification) as specified in ICAO document 8585. If you do not specify an ICAO designator in flight plans, please select "n/a" from the drop down list and proceed to 2(g).

(g) Where a unique ICAO designator for ATC purposes is not available, please provide the aircraft registration markings used in the call sign for ATC purposes for the aircraft you operate.

If a unique ICAO designator is not available, enter the identification for ATC purposes (tail numbers) of all the aircraft you operate as used in box 7 of the flight plan. (Please separate each registration with a semicolon.) Otherwise enter "n/a" and proceed.

(h) Please enter the administering Member State of the aircraft operator pursuant to Art. 18a of the Directive.

Please select

(i) Competent authority in this Member State:

In some Member States there is more than one Competent Authority dealing with the EU ETS for aircraft operators. Please enter the name of the appropriate authority, if applicable. Otherwise choose "n/a".

Please select

(j) Please enter the number and issuing authority of the Air Operator Certificate (AOC) and EU Operating Licence if available:

Air Operator Certificate:

AOC Issuing authority:

Please select

EU Operating Licence:

Issuing authority:

Please select

(k) Please enter the address of the aircraft operator, including postcode and country:

Address Line 1

Address Line 2

City

State/Province/Region

Postcode/ZIP

Country

Please select

Email address

(l) If different to the information given above in part (k), please enter the contact address of the aircraft operator (including postcode) in the administering Member State, if any:

Address Line 1	
Address Line 2	
City	
State/Province/Region	
Postcode/ZIP	
Country	Please select
Email address	

(m) Please provide details of the ownership structure of your firm and whether you have subsidiaries or parent companies

Please include in your description the unique ICAO designator of your subsidiaries or parent company, and indicate the administering Member State of these entities, if applicable. Add attachments to your submission as necessary to show a diagram of your ownership structure.

Please note that your Administering Member State may ask you further details about contact addresses and company structure (see worksheet "MS specific content").

(n) Description of the activities of the aircraft operator falling under Annex I of the EU ETS Directive

Please specify whether you are a commercial or non-commercial air transport operator, whether you operate scheduled, non scheduled flights or both and, whether the scope of your operations cover only the EU or also non EU countries.

Operator status	Please select
-----------------	---------------

Commercial air transport operators: Please attach a copy of Annex I of your AOC to this monitoring plan as evidence.

Scheduling of flights	Please select
-----------------------	---------------

Scope of operations	Please select
---------------------	---------------

(o) Please provide further description of your activities as necessary.

3 Contact details and Address for Service

(a) Who can we contact about your monitoring plan?

It will help us to have someone who we can contact directly with any questions about your monitoring plan. The person you name should have the authority to act on your behalf. This could be an agent acting on behalf of the aircraft operator.

Title:	Kapitän
First Name:	Jürgen T.
Surname:	Kork
Job title:	Manager ETS
Organisation name (if acting on behalf of the aircraft operator):	
Telephone number:	+49 69 1234568
Email address:	juergent.kork@flyingcircus-air.de

<<< If you have selected the annual emissions monitoring plan under 2(c), click here to proceed to section 5 >>>

(b) Please provide an address for receipt of correspondence

You must provide an address for receipt of notices or other documents under or in connection with the EU Greenhouse Gas Emissions Trading Scheme. Please provide an electronic address and a postal address within the administering Member State.

Title:	Please select
First Name:	
Surname:	
Email address:	
Telephone number:	
Address Line 1:	
Address Line 2:	
City:	
State/Province/Region:	
Postcode/ZIP:	
Country:	Please select

EMISSION SOURCES and FLEET CHARACTERISTICS

4 About your operations

Under 2(c) you have chosen:

Monitoring Plan for Annual Emissions

If you have chosen the Tonne-kilometre monitoring plan, please continue with point (a) below.

<<< If you have chosen the annual emissions monitoring plan, click here to continue with section 5. >>>

(a) Please provide a list of the aircraft types operated at the time of submission of this monitoring plan.

The list should include all aircraft types (by ICAO aircraft type designator - DOC8643), which you operate at the time of submission of this monitoring plan and the number of aircraft per type, including owned aircraft, as well as leased-in aircraft. You are required to list only aircraft types used for carrying out activities falling under Annex I of the EU ETS Directive.

You may use the second column to further specify sub-types of that aircraft type, if relevant for defining the monitoring methodology. This can be useful e.g. if there are different types of on-board measurement systems, different data transmission systems (e.g. ACARS) etc.

Date of submission of monitoring plan:

Generic aircraft type (ICAO aircraft type designator)	Sub-type (optional input)	Number of aircraft operated at time of submission

Please continue on a separate sheet if required.

(b) Please provide an indicative list of additional aircraft types expected to be used.

Please note that this list should not include any of the aircraft listed in table 4(a) above. Where available, please also provide an estimated number of aircraft per type, either as a number or an indicative range.

Generic aircraft type (ICAO aircraft type designator)	Sub-type (optional input)	Estimated number of aircraft to be operated

Please continue on a separate sheet if required.

(c) Please provide details about the procedure to be used for defining the monitoring methodology for additional aircraft types.

While this monitoring plan in general defines the monitoring methodology for the aircraft already in your fleet at the time of submission of the monitoring plan to the competent authority (see point 4(a)), a defined procedure is needed to ensure that any additional aircraft including those listed under 4(b) will be properly monitored as well. The items specified below should ensure that a monitoring methodology is defined for any aircraft type operated.

<u>Title of procedure</u>	
<u>Reference</u> for procedure	
<u>Brief description</u> of procedure	
<u>Post or department</u> responsible for data maintenance	
<u>Location</u> where records are kept	
<u>Name of system</u> used (where applicable).	

(d) Please provide details about the systems, procedures and responsibilities used to track the completeness of the list of emission sources (aircraft used) over the monitoring year.

The items specified below should ensure the completeness of monitoring and reporting of the emissions of all aircraft used during the monitoring year, including owned aircraft, as well as leased-in aircraft.

<u>Title of procedure</u>	
<u>Reference</u> for procedure	
<u>Brief description</u> of procedure	
<u>Post or department</u> responsible for data maintenance	
<u>Location</u> where records are kept	
<u>Name of system</u> used (where applicable).	

(e) Please provide details about the procedures to monitor the completeness of the list of flights operated under the unique designator by aerodrome pair.

Please detail the procedures and systems in place to keep an updated detailed list of aerodrome pairs and flights operated during the monitoring period as well as the procedures in place to ensure completeness and non duplication of data.

<u>Title of procedure</u>	
<u>Reference</u> for procedure	
<u>Brief description</u> of procedure	
<u>Post or department</u> responsible for data maintenance	
<u>Location</u> where records are kept	
<u>Name of system</u> used (where applicable).	

(f) Please provide details about the procedures for determining whether flights are covered by Annex I of the Directive, ensuring completeness and avoiding double counting.

Please detail the systems in place to keep an updated detailed list of flights during the monitoring period which are included/excluded from EU ETS, as well as the procedures in place to ensure completeness and non-duplication of data.

<u>Title of procedure</u>	
<u>Reference</u> for procedure	
<u>Brief description</u> of procedure	
<u>Post or department</u> responsible for data maintenance	
<u>Location</u> where records are kept	
<u>Name of system</u> used (where applicable).	

TONNE KILOMETRE DATA

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5 Distance

(a) Please confirm that the latitude and longitude of aerodromes will be taken from aerodrome location data published in Aeronautical Information Publications (AIP) in compliance with Annex 15 of the Chicago Convention or from a source using such AIP data.

Yes

(b) Please describe the methodology or data source used to determine Distance (= Great Circle Distance + 95 km) between aerodrome pairs.

Great Circle Distances must be approximated using the system referred to in Article 3.7.1.1 of Annex 15 of the Chicago Convention (World Geodetic System, WGS84)

To calculate great circle distances, we use an in-built tool in our IT system that is based on the WGS-84 ellipsoid. The additional 95km are added at a later stage, after GCD's have been extracted from the IT system.
For aerodrome coordinates we use location data published in Eurocontrol's eAIP (electronic Aeronautical Information Publications), which is in compliance with Annex 15 of the Chicago Convention.

(c) Please provide details about the systems and procedures you have in place to determine aerodrome location information

Title of procedure	Monitoring aerodrome location information
Reference for procedure	Chapter 11 of Flying Circus Operations Manual
Brief description of procedure	As part of the master data, our operations system OMS has a list of aerodromes by airport code and location. The location information of aerodromes in OMS is updated regularly with Eurocontrol's eAIP. For the implementation of ETS specific requirements we will use all updates to the eAIP made before 31 Dec 2010. In case of the opening of a new destination a new aerodrome will be implemented in OMS using the usual procedures for updating master data. The update will be done before the first flight takes place. Key risks: aerodrome coordinates are not up to date (i.e. as per 31 Dec 2010). Control activities: We have defined a specific step in our process to check that coordinates are up to date. See also data flow uploaded in section 7 ("TKM_data_flow.pdf")
Post or department responsible for data maintenance	Operations Management Department IT maintenance: IT department
Location where records are kept	IT servers / records of the source system and backups of OMS are kept in our operations department in Frankfurt
Name of system used (where applicable).	Operations Management System (OMS)

(d) Please provide details about the systems and procedures you have in place to determine the Great Circle Distance between aerodrome pairs.

Title of procedure	Determination of Great Circle Distance
Reference for procedure	Chapter 19 of Flying Circus Operations Manual
Brief description of procedure	We calculate GCDs between airports from airport coordinates using an embedded tool in OMS. This tool uses an iteration to calculate GCDs based on the WGS-84 ellipsoid and requires airport coordinates as input. Whenever airport locations are updated from Eurocontrol eAIP, we also use the tool to update distances that are saved as master data in the OMS. In case a new destination is opened the sector distances of new airport pairs will be implemented in OMS using the same methodology and tools. Key risks: IT tool does not work properly Control activities: we performed plausibility checks on distances calculated using our tool. This was done by comparing internally calculated great circle distances with the GCD calculator from Eurocontrol.
Post or department responsible for data maintenance	Operations Management Department IT maintenance: IT department
Location where records are kept	Records of the source system and backups of OMS are kept at our operations department in Frankfurt
Name of system used (where applicable).	OMS - as above

NOTE.
Eurocontrol have been contacted about a tool for calculating GCD but have not yet replied. The final paragraph in this section may have to be reviewed.

6 Payload (Passengers and Checked Baggage)

(a) Which method will you use for determining the mass of passengers and checked baggage?

Operators may select as a minimum the Tier 1 level to determine the mass of passengers and checked baggage. Within the same trading period the chosen tier shall be applied consistently for ALL flights.

- Tier 1 - Default 100 kg/passenger and c
- Tier 2 - Mass contained in Mass and Ba

(b) If you have chosen tier 2, please state the source of the Mass & Balance data (e.g. as required by EU OPS (Regulation (EC) 3922/91), or other international flight regulations).

If you measure the mass of passengers and checked baggage, you should include here details of the measuring equipment used.

Flying Circus always uses the mass of passengers and checked baggage from the Mass & Balance sheet which is made up in accordance with our CAA-approved operations manual.

Mass of passengers & hand luggage:

Following Flying Circus operations manual and implemented in OMS a standard mass for passengers incl. hand baggage is used for most scheduled flights: adult (male): 88 kg, adult (female): 70 kg, children: 35 kg, infants: 0 kg. These values are in compliance with EU-OPS subpart J, 1.620 (d) Table 1 "all flights except holiday charters".

For a number of well-defined flight routes - all flights between EU and Asia - we use a different set of standard weights on scheduled flights. These weights are recorded in the OMS and in the appendix of our Operations Manual. They have been authorised by the civil aviation authority LBA, as required by EU-OPS & German laws.

For holiday charter flights, alternative masses are used (and implemented in OMS), in line with EU OPS subpart J, 1.620 (d) Table 1 "holiday charters" (adult(male): 83kg, adult(female): 69kg, children: 35kg, infants: 0kg).

Note that all our aircraft covered by the EU-ETS have 20 seats or more, so the special provision in EU OPS subpart J for aircraft with 19 seats or less do not apply.

Note that baggage checked in by active crew is stated separately on our mass & balance documentation, such that there is no risk of counting it.

Mass of checked baggage

We use the standard masses from EU OPS Subpart J 1.620 (f) except on flights between EU and Asia.

This special case and the corresponding (lower) standard masses have been approved by the civil aviation authority and are recorded in our Operations Manual, including their exact applicability.

(c) Please provide details about the systems and procedures you have in place to monitor the number of passengers on a flight:

Title of procedure	Determination of number of passengers
Reference for procedure	Chapter 13 of Flying Circus Operations Manual; see also process charts (TKM_passenger_data_flow_standard.pdf and
Brief description of procedure	<p>Description of the system: We extract the number of passengers for our TKM reporting from the OMS. See also section 4(e) for more information on OMS. The initial number of passengers for each flight in OMS (in the planning status) is uploaded from flight planning, i.e. sold tickets. This data is overwritten before the flight by check-in and later by boarding data where the latter reflects actual passenger numbers.</p> <p>In general, check-in and boarding data are transmitted to OMS via an electronic interface at the airport of departure. In case the airport of departure does not have the facilities for an electronic connection with the OMS, the primary source of the actual number of passengers is the technical flight log.</p> <p>On aircraft equipped with ACARS, the technical flight log information is transmitted to OMS via an ACARS datalink. For aircraft not equipped with ACARS, technical flight logs are sent to our main office in Frankfurt, where the data is manually input into OMS.</p> <p>The number of passengers from check-in data is also used to compile the Mass and Balance documentation. In case boarding data differ from check-in by more than 3 passengers or 500 kg, mass and balance documentation and load sheet will be changed (last minute changes). However, the flight data stored in OMS will use the actual passenger numbers from boarding (these are also recorded in the technical flight log). For our TKM reporting, we will therefore use actual passenger numbers.</p> <p>Key risks: (i) counting no-show passengers ;(ii) counting crew as passengers; (iii) where there is manual input into OMS: manual typing in errors</p> <p>Control activities: (i) The number of passengers in OMS takes boarding <data> into account, thereby ensuring that the overall number of persons on board is accurate. (ii) In OMS, all persons on board are assigned a type. All crew members on duty are marked with a special type. We will perform a check to make sure the number of crew corresponds (iii) Within OMS, there is an automatic comparison of the actual number of passengers on a flight against the booking and check-in data, as well as against the maximum number of passengers of the aircraft used.</p>
Post or department responsible for data maintenance	Operations Management Department IT maintenance: IT department
Location where records are kept	Records of the source system and backups of OMS are kept in our operations department in Frankfurt
Name of system used (where applicable).	Operations Management System (OMS)

Payload (Freight and Mail)

(d) Are you required to have Mass and Balance documentation for the relevant flights?

Aircraft operators which are not required to have Mass and Balance documentation shall propose a suitable methodology for determining the mass of freight and mail.

- No If no, please continue to 6(e)
- Yes If yes, please continue to 6(f)

(e) Please provide a concise description of the proposed alternative methodology for determining mass of freight and mail.

(f) Please provide a description of the measurement devices used for measuring mass of freight and mail.

To ensure accuracy of the data provided by ground handling service providers, we have clauses in our contracts with them laying down guaranteed standards.

Freight:

All freight is weighed prior to loading.

Measurement devices are owned & used by ground handling service providers and are calibrated regularly in line with local calibration laws. At most airports measurements are taken using weigh bridges, which have uncertainty margins of +/- 1%. Smaller objects and baggage is weighed on weighing platforms with conveyor belts.

Mail:

Mail is usually weighed prior to loading.

When this is not done - e.g. when there is no other freight, and weigh bridges are not used - we count the number of mail bags (which have standardised dimensions) and apply standard masses per mail bag. Standard masses for mail bags are documented in our Operations Manual. Whenever we use this counting method, it is noted on the AWB.

(g) Please confirm that you will exclude the tare weight of all pallets and containers that are not payload, and the service weight.

Actual mail and freight mass will exclude the tare weight of freight containers, freight

(h) Please provide details about the procedures you have in place to monitor the mass of freight and mail on a flight

Title of procedure	Determination of mass of freight and mail
Reference for procedure	Chapter 16 of Flying Circus Operations Manual; see also process chart in section "Additional Information"
Brief description of procedure	<p>Gross weight of cargo and mail is measured by ground handling service providers (see 6(g) above). Input of gross cargo and mail weight (in kg) into OMS via the mass & balance documentation. Once loading is completed, the ground handling agent sends an electronic load message to OMS. This contains the information from the mass & balance documentation.</p> <p>At airports with no facilities for an electronic load message, the mass & balance documentation is delivered manually to the pilot, who delivers it at the main office along with other flight documentation.</p> <p>The gross weight, net weight and tare weight of pallets and containers which are not payload are registered in the system. We use 4 standard-dimension unit load devices (ULD) with a standard tare weight each. This standard weight is determined in line with the procedures in our operations manual, which meets the safety requirements of the CAA. In our mass & balance documentation, we register the number of each standard-type ULD. This information is transmitted to OMS along with all other mass & balance input, enabling us to determine the net weight.</p> <p>Containers, nets and pallets provided and paid for by our logistics customers are part of the payload. In such cases we do not subtract, or indeed know, the weight of containers, nets and pallets. The service weight (lavatory chemicals, etc.) is part of the dry operating weight, and as such does not appear as load on our mass & balance documentation.</p> <p>- gross weight: Cargo weighed on measuring devices subject to calibration regulations with max uncertainty dependent on local legislation -> input as described above. - net weight: gross weight - tare weight of own containers -> calculated automatically in OMS. - tare weight of containers: standard weight per container -> update in OMS is manual.</p> <p>Key risks: (i) Not subtracting mass of containers. (ii) double counting of checked baggage as freight</p> <p>Control activities: (i) Checks of transported freight and mail against invoices from contractors. (ii) checked baggage is a separate entry on mass & balance documentation.</p>
Post or department responsible for data maintenance	Operations Management Department
Location where records are kept	Records of the source system and backups of OMS are kept in our operations department in Frankfurt
Name of system used (where applicable).	Operations Management System (OMS)

DESCRIPTION OF PROCEDURES FOR DATA ACQUISITION AND HANDLING ACTIVITIES, AND CONTROL ACTIVITIES

7 Management

(a) Please identify the responsibilities for monitoring and reporting (MRG Annex I Section 10.3)

Please identify the relevant job titles/posts and provide a succinct summary of their role relevant to monitoring and reporting. Only those with overall responsibility and other key roles should be listed below (i.e. do not include delegated responsibilities)

These could be outlined in a tree diagram or organisational chart attached to your submission

Job title/post	Responsibilities
Operations Management Department	completeness of flights, data input OMS, cross-checks, extract reports from OMS and collate tkm data,
Controlling Department	Validate tkm data, control of operational and financial risks
Fleet management coordinator	maintenance of aircraft list
Pilot	correctness of Mass&Balance sheet, transmission of technical flight log to the main office
IT department	security, backup, software-updates etc.

(b) Please provide titles and references for the procedures for data acquisition and handling activities and control activities, including maintenance and calibration of measurement equipment (MRG Annex I Section 10.3).

Please refer to specific management and control procedures and documents where relevant. For example, specific quality or environmental management procedures (MRG 2007 Annex I Section 10.2)

Item	Procedure Title and Reference	Is this procedure part of a certified Management System?
The sequence and interaction of data acquisition and handling activities, including methods of calculations and measurements	See previous sections: Fleet list (incl wet lease list) update -> 4 (d) Flight recording -> 4(e) Distance determination -> 5 (b), (c), (d) Payload determination -> 6 (b), (d), (g), (i) ETS cross-check -> See also uploaded process flows.	No
Risk assessment of the definition and evaluations of the control system	Because risks depend on the type of data, these are discussed in previous sections. See "key risks" and "control activities" in the procedure description of sections 4 (d), (e), (f), 5 (c), (d), 6 (c) and (h) of this monitoring plan. See also Chapter "risk assessment" of the Management System.	No
Management of competences for the responsibilities assigned	Chapter "organisation and responsibilities" of the Management System.	No
Quality assurance of measuring equipment and information technology used	Chapters "implementation of software", "change management", "security management" of the Management System. See also "control activities" in procedure description of	No
Internal reviews of reported data	See process flow 7 (e)	No
Outsourced processes	Ground handling agents: chapter "subcontractors and third-party services" of the Management System Calibration of weighing bridges: chapter "calibration of measurement devices" of the Management System	No
Corrections and corrective action	Chapter "corrections" of the Management System	No
Records and documentation	Chapter "documentation" of the Management System	No

(c) Does your organisation have a documented quality management system? Please choose the most relevant response.

Certified quality management system in place

(d) If the Quality Management System is certified by an accredited organisation, please specify to which standard e.g. ISO 9001, etc.

We have a certified integrated process-oriented management system (ISO 9001). We checked the existing procedures (needed for monitoring) if they meet the EU-ETS requirements and if needed we made appropriate adjustments. There are also newly defined procedures for the EU ETS, where new roles/capacities and responsibilities have been defined and documented in amendments to our existing manuals (e.g. new processes: definition of the monitoring methodology for additional aircrafts under 4 c), determination of flights covered by Annex I of the Directive under 4 f) and compliance with the requirements of the selected tier under 6 a) in our operations manual). Our activities to integrate monitoring for EU-ETS in our management system include procedures on recording, transmitting, storing and retrieving data used for EU ETS purposes, as well as new internal review procedures. See also section 11(b) for reference to the relevant chapters, which have been extended to cover EU ETS processes.

Also improved/amended quality assurance procedures are documented in our management system. They include regular plausibility checks of flight data (fuel consumption per airport pair and aircraft, etc.).

EU ETS procedures will also be addressed in our audit plan. The next audit is scheduled for January/February 2010 to check the quality of the new/amended processes for the monitoring. In this context the new/amended procedures should get a certification.

We have also defined new responsibilities for monitoring the accuracy of our methodology and potential for improvement. This currently takes the form of a project team made up members from a variety of departments (i.e. controlling, operations, IT, fuel) who have regular documented meetings and report to our Chief Operational Officer.

- (e) **Please attach a representation of the data flow for the calculation of tonne-kilometre data, including responsibility for retrieving and storing each type of data. If necessary, please refer to additional information, submitted with your completed plan.**

Please reference the file/document attached to your monitoring plan in the box below.

TKM_data_flow.pdf

8 List of definitions and abbreviations used

(a) Please list any abbreviations, acronyms or definitions that you have used in completing this monitoring plan.

Abbreviation	Definition
eAIP	Eurocontrol electronic Aeronautical Information Publication
OMS	Operations Management System
AWB	Air Waybill
GCD	Great Circle Distance
CAA	Civil aviation authority

9 Additional information

(a) If you are providing any other information that you wish us to take into account in considering your plan, tell us here. Please provide this information in an electronic format wherever possible. You can provide information as Microsoft Word, Excel, or Adobe Acrobat formats.

You are advised to avoid supplying non-relevant information as it can slow down the approval. Additional documentation provided should be clearly referenced, and the file name / reference number provided below. If needed, check with your competent authority if other file formats than the ones mentioned above are acceptable.

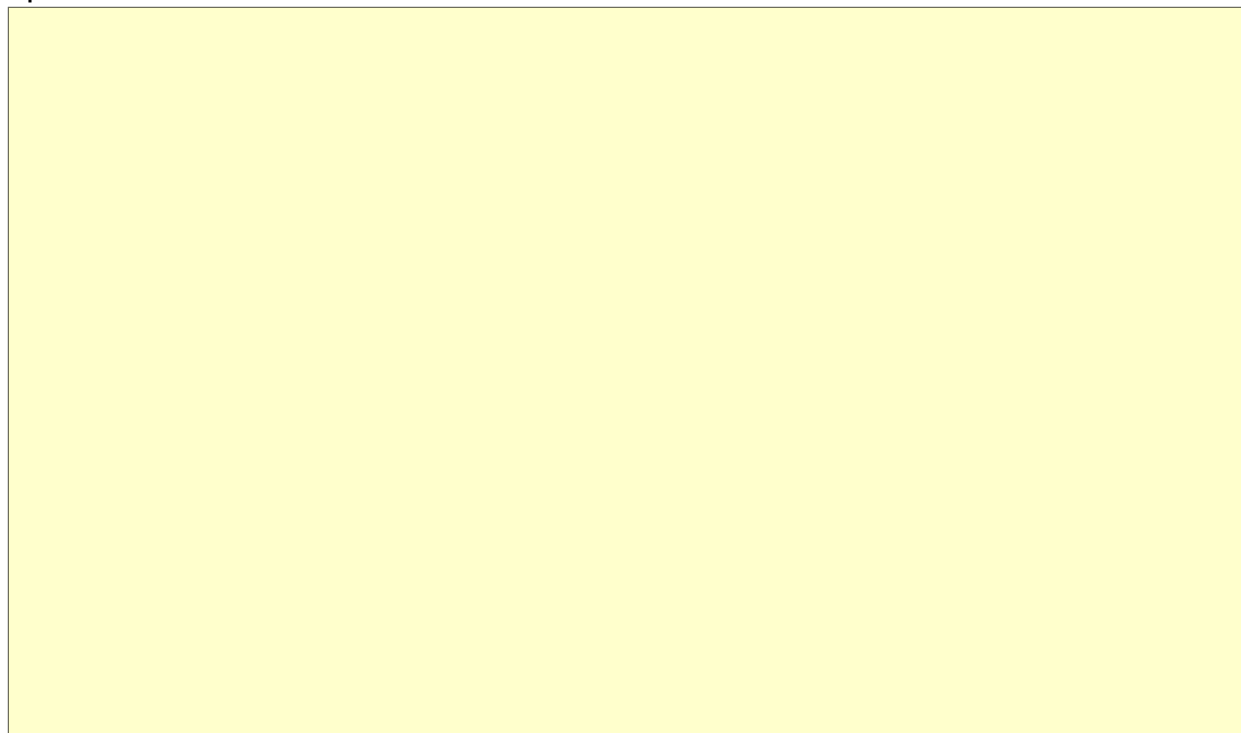
Please provide file name(s) (if in an electronic format) or document reference number(s) (if hard copy) below:

File name/Reference	Document description
TKM_passenger-freight_data-flow_standard.pdf	document illustrating standard data flow into the OMS, where there is a direct link into the OMS at check-in
TKM_passenger-freight_data-flow_manual.pdf	document illustrating alternative data flow into the OMS, where there is NO link into the OMS at check-in

Member State specific further information

10 Comments

Space for further Comments:



Info for automatic Version detection

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Version list	Reference File Name	Version comments
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