



Free Route Developments in Europe

Edition February 2012

European Free Route Airspace Developments

Edition Number	:	1.0
Edition Date	:	27. 02. 2012
Status	:	Released Issue
Intended for	:	General Public

DOCUMENT CHARACTERISTICS

TITLE			
European Free Route Airspace Developments			
Publications Reference:			
Document Identifier	Edition Number:	1.0	
		Edition Date:	27 February 2012
Abstract			
<p>This document provides an overview of the Free Route Airspace developments taking place at European ATM network and local level.</p> <p>It describes the European Network Free Route Airspace Concept of Operations and it provides a summary of the Free Route Airspace Projects planned for deployment in Europe. .</p> <p>By 2014, at least 16 ACCs of the 64 European ACCs will implement various steps of Free Route Operations. They represent more than 25% of the NM area. Savings from these project would account to approximately 25000 NMs per day. As a result of these free route projects, flying distances would be reduced by approximately 7.5 million NMs, this representing the equivalent of 45000 tons of fuel saved, or reduced emissions of 150000 tons, or 37 million Euros.</p>			
Keywords			
Free Route	Sectors	Airspace	Traffic flow/Traffic Demand
Contact Person(s)		Tel	Unit
Razvan Bucuroiu		+32.2.7293648	Directorate Network Management Operations Planning Unit (DNM/COO/NOM/OPL)
STATUS, AUDIENCE AND ACCESSIBILITY			
Status	Intended for	Accessible via	
Working Draft <input type="checkbox"/>	General Public <input checked="" type="checkbox"/>	Intranet <input checked="" type="checkbox"/>	
Draft <input type="checkbox"/>	EATMP Stakeholders <input type="checkbox"/>	Extranet <input checked="" type="checkbox"/>	
Proposed Issue <input type="checkbox"/>	Restricted Audience <input type="checkbox"/>	Internet (www.eurocontrol.int) <input checked="" type="checkbox"/>	
Released Issue <input checked="" type="checkbox"/>	Printed & electronic copies of the document can be obtained from the Publications Infocentre (see page iii)		



TABLE OF CONTENT

DOCUMENT CHARACTERISTICS	ii
TABLE OF CONTENT	iii
ORGANISATION AND CONTENTS.....	Error! Bookmark not defined.
1. A CONSOLIDATED EUROPEAN APPROACH TOWARDS FREE ROUTE AIRSPACE5	
1.1. A COOPERATIVE NETWORK APPROACH.....	5
1.2. THE NEED FOR A COORDINATED APPROACH.....	5
1.3. BRINGING THE NETWORK CONTRIBUTION.....	6
2. EUROPEAN FREE ROUTE AIRSPACE CONCEPT	7
2.1. DEFINITION	7
2.2. SCOPE	7
2.3. NETWORK ENABLERS	7
2.4. AIRSPACE CLASSIFICATION.....	7
2.5. FLIGHT LEVEL ORIENTATION.....	7
2.6. LIMITED APPLICABILITY OF FREE ROUTE AIRSPACE OPERATIONS	8
2.6.1. Time Limited	8
2.6.2. Structurally Limited	8
2.7. AIRSPACE ORGANISATION.....	8
2.7.1. General.....	8
2.7.2. Applicable Airspace	8
2.7.3. Vertical Limits of Free Route Operations Airspace and Their Publication	8
2.7.4. Horizontal Limits of Free Route Operations Airspace and Their Publication.....	9
2.7.5. Vertical Connection Between Free Route Operations Airspace and the underlying Fixed ATS Route Network	9
2.7.6. Maximising Efficiency of Free Route Operations Airspace.....	9
2.7.7. Access To/From Terminal Airspace.....	9
2.7.8. Publication of a Contingency ATS Route Network	10
2.7.9. Maintenance of a Fixed ATS Route Network within Free Route Airspace	10
2.7.10. Airspace Reservations	10
2.7.11. Route Availability.....	11
2.7.12. Sectorisation.....	11
2.7.13. Sector and Traffic Volumes Capacities/Monitoring Values.....	11
2.7.14. ATS Delegation	12
2.8. AIRSPACE MANAGEMENT	12
2.8.1. General.....	12
2.8.2. Information Sharing	12
2.8.3. OAT Handling	12
2.9. LETTERS OF AGREEMENT AND COORDINATION PROCEDURES.....	12
2.10. FLIGHT PLANNING	13
2.10.1. General.....	13
2.10.2. Flight Plan Format	13
2.10.3. Use of Intermediate Lat/Long Points for Flight Planning	13
2.10.4. Flight Planning Routeings Through Airspace Reservations	13
2.10.5. Route Description.....	14
2.10.6. Flight Planning Facilitation Through the Use of DCTs.....	14

2.10.7.	Requested FL Change	14
2.10.8.	Flight Plan Submission.....	14
2.10.9.	Flight Plan Checking and Correction.....	14
2.10.10.	Flight Plan Distribution.....	15
2.10.11.	DCT Limits	15
2.11.	AIR TRAFFIC FLOW AND CAPACITY MANAGEMENT	15
2.11.1.	General	15
2.11.2.	Sector Configuration Management	16
2.11.3.	Sector and Traffic Volumes Capacities/Monitoring Values	16
2.11.4.	Letters of Agreement Restrictions.....	16
2.11.5.	Re-routing Proposals	16
2.11.6.	ATFCM Procedures	16
3.	EUROPEAN FREE ROUTE AIRSPACE DEPLOYMENT PLANS.....	17



1. A CONSOLIDATED EUROPEAN APPROACH TOWARDS FREE ROUTE AIRSPACE

1.1. A COOPERATIVE NETWORK APPROACH

The coordinated development and implementation of Free Route Airspace was initiated by EUROCONTROL in 2008 and was included in the **Flight Efficiency Plan** developed cooperatively between IATA, CANSO and EUROCONTROL.

While the first implementation steps took place within the context of the European ATS Route Network Version 6 (**ARN Version-6**), the overall coordination was included in the **ARN Version-7**.

The **ARN Version-7** was developed and deployed through a co-operative and partnership approach facilitated in the context of the Route Network Development Sub-Group (RNDSG). The RNDSG is the co-ordination forum for European airspace design and development, planning and implementation of improved European ATS route network, optimised civil and military airspace structures and ATC sectors. The members of the RNDSG work in a partnership approach, through civil and military experts in airspace design from EUROCONTROL, the ECAC member States and their ANS providers, airspace users organisations, flight planner organisations and other relevant international organisations.

With respect to Free Route Airspace, European ARN Version-7 included:

- The implementation of an advanced concept of operations, including Free Route Operations
- A pan-European view of Free Route Airspace deployment.

Further evolutions followed through the approval of the the COMMISSION REGULATION (EU) No 677/2011 of 7 July 2011 (laying down the detailed rules for the implementation of air traffic management (ATM) network functions and amending Regulation (EU) No 691/2010. The Annex I of this Regulation describes the European Route Network Design Function and the European Route Network Improvement Plan. The content of the European Route Network Improvement Plan will include “***an agreed European route network and, where feasible, free route airspace structure designed to meet all user requirements***”.

As part of the European Route Network Improvement Plan, the Network Manager develops the following material:

- **A European Airspace Design Methodology – General Principles, Guidelines and Technical Specifications for airspace Design** that will include a Free Route Airspace Concept;
- **The ARN Version 8** – that will include all the Free Route Airspace Projects scheduled for deployment between 2012-2014;
- **The ASM Handbook** – that will include appropriate considerations with respect to civil/military aspects of Free Route Airspace;
- **The Route Availability Document (RAD)** – that will include appropriate route orientation and flight plan facilitating measures with respect to Free Route Airspace.

1.2. THE NEED FOR A COORDINATED APPROACH

A number of States, ANSPs and FABs have proposed in 2007 development towards the implementation of Free Route Airspace. The common thread of these initiatives was the transition from reliance on a fixed route network to offering direct routes and tailored routes in order to contribute to airspace performance improvements on capacity, efficiency and environment.



These initiatives come at a time when there are very demanding economic and environmental pressures on the Aircraft Operators and other stakeholders. The network has to respond to this and the States and ANSPs should look at innovative and obvious methods to make their contribution.

The implementation of Free Route Airspace initiatives will, in the short term, go some way to meeting the efficiency, capacity, and environmental challenges. They will be the starting point on the path to full Free Routing across the European airspace, which itself is an intermediate step on the road to SESAR business trajectories and 4D profiles.

The local Free Route Airspace Initiatives will bring improvements to the Network but if they are to develop further, they will also bring new demands on Network Management and System Support.

1.3. BRINGING THE NETWORK CONTRIBUTION

In order to respond to a clear need from all operational stakeholders, EUROCONTROL put in place a flexible but purposeful approach where individual States, ANSPs or FABs can move at a much quicker pace than they would if they were bound into a larger project. The need for a greater visible picture and for coordination was put in place and developed in harmony.

At a European level, EUROCONTROL started to offer pro-active coordination and technical and operational support to the local or sub-regional Free Route Airspace and ensured that the required network improvements were in place to support these initiatives.

The coordination and support tasks cover:

- The development of an European Free Route Airspace Concept in the context of the ARN Version 7;
- Providing an overall focal point that will consolidate and circulate information on initiatives, plans and proposals;
- Technical and operational support to ensure mainly that there is harmonisation between the initiatives and that there is a common approach towards operational aspects;
- Identification of the required network enablers, in particular:
 - System adaptation and compatibility across the network;
 - Harmonised AIS publication;
 - Checklist of Free Route Airspace Implementation Actions;
 - Enhanced Flight planning procedures;
 - Initiating work at network level to ensure that enablers will be available;
 - Supporting airspace design and ASM/ATFCM processes at network, FAB and local level;
 - Support to a co-ordinated deployment of local, sub-regional and network aspects of these initiatives;
 - Coordination on the development of the network systems and operational procedures;



2. EUROPEAN FREE ROUTE AIRSPACE CONCEPT

2.1. DEFINITION

A specified airspace within which users may freely plan a route between a defined entry point and a defined exit point, with the possibility to route via intermediate (published or unpublished) way points, without reference to the ATS route network, subject to airspace availability. Within this airspace, flights remain subject to air traffic control.

2.2. SCOPE

The overall scope of the Free Route Concept of Operations is to provide an enabling framework for the harmonised implementation of Free Route Operations in Europe whenever a State/ANSP, a group of States/ANSPs or a FAB decides to proceed with such implementation. This concept can be used for a European-wide implementation of Free Route Operations.

The Free Route Concept of Operations forms the basis for a common understanding for all ATM partners involved in Free Route Operations implementation. The Concept of Operations encompasses various Free Route Operations implementation scenarios that will:

- Meet the Safety Objectives;
- Be compatible with existing operations;
- Be sustainable through further development;
- Be capable of expansion/connectivity to/with adjacent airspace;
- Be capable of being exported to other regions.

2.3. NETWORK ENABLERS

The enablers are:

- Appropriate System Support - enhancement for the purposes of Flight Planning and ATFCM;
- Procedures – enhanced procedures where necessary for operations within Free Route airspace and at its interfaces;
- Adaptations to airspace structures;
- Adaptations to airspace management procedures.

No additional equipment requirements or flight planning procedures changes are foreseen for aircraft operators. Nevertheless, modifications to flight planning systems may be required to ensure that full benefit of the Free Route operations can be realised.

2.4. AIRSPACE CLASSIFICATION

Free Route Operations airspace will, in principle be classified as Class C airspace, with certain agreed exemptions (e.g. above 460, within the NOTA).

2.5. FLIGHT LEVEL ORIENTATION

The Flight Level Orientation System (FLOS) applicable within Free Route Operations airspace shall be promulgated through the relevant national AIS publications.
(This does not constitute a change to the current system of 2 FLOS in Europe).



2.6. LIMITED APPLICABILITY OF FREE ROUTE AIRSPACE OPERATIONS

2.6.1. Time Limited

Even though the goal is to implement Free Route Airspace Operations on a permanent basis, a limited implementation during defined periods could facilitate early implementation. Procedures for transitioning between free route and fixed route operations shall be set

2.6.2. Structurally Limited

In complex airspace, the full implementation of Free Route Airspace Operations could potentially have a detrimental effect on capacity. In such airspace, ANSPs may decide to implement Free Route Airspace Operations on a structurally limited basis, for example by restricting the available entry/exit points for certain traffic flows, which could increase predictability and reduce the number of potential conflicts.

2.7. AIRSPACE ORGANISATION

2.7.1. General

Free Route Operations airspace forms an integral part of the overall European ATM network, interfacing vertically or laterally with adjoining fixed route operations airspace.

Airspace reservations will remain, and as all airspace users will have equal access to Free Route Operations airspace, harmonised application of the FUA Concept and Civil/Military Coordination are taken into account in order to ensure harmonised procedures and service provision for the benefit of all the airspace users.

2.7.2. Applicable Airspace

The Concept of Operations for Free Route Operations airspace is applicable to any area where Free Route Operations airspace is implemented within the European airspace network.

2.7.3. Vertical Limits of Free Route Operations Airspace and Their Publication

This Concept of Operations is aimed at facilitating the harmonised implementation of Free Route Operations airspace wherever and whenever a State/ANSP decides to do so. In this context, there is no specific recommendation on the minimum Flight Level of such implementation.

The vertical limits of the Free Route Operations airspace shall be published in national AIS Publications.

The setting of the lower limit of Free Route Operations airspace shall not adversely impact adjacent areas where Free Route Operations airspace is not yet implemented or where only limited application of Free Route Operations is in place.

Nevertheless, with goal being a harmonised airspace structure across the European network, the following recommendations are made:

- the lower vertical limit shall be coordinated at European network level to ensure interconnectivity with adjoining airspace and this could vary in different areas or at different times within a particular Free Route Operations Airspace.
- the minimum level should be the lowest feasible, taking into account the complexity of the airspace and the demand.



2.7.4. Horizontal Limits of Free Route Operations Airspace and Their Publication

The horizontal limits of the Free Route Operations airspace shall be published in national AIS Publications. In order to gain full benefits from its applicability, the horizontal limits should be based on operational requirements, not necessarily on FIR/UIR or ATS unit boundaries.

Entry/exit points into/out of the Free Route Operations airspace shall be published in national AIS publications with a clear reference to the Free Route Operations Airspace and to the nature of the point (entry, exit or entry/exit point).

In areas where the shape of the lateral boundaries of an FIR/UIR or ATC unit are such that direct routings could lead to exiting for a short time into adjacent airspace, all efforts shall be made to ensure that applicability of Free Route Operations airspace is organised based on operational requirements and appropriate arrangements are made with the adjacent ATC units/States. If such situations are unavoidable, the appropriate publication of entry/exit points shall be ensured.

If Free Route Operations airspace is implemented in adjacent FIR/UIRs, the publication of the Free Route Operations airspace shall clearly reflect this cross-border application. The publication of entry/exit points on the common FIR/UIR boundary is not necessary from an operational perspective.

Entry/exit points into/out of Free Route Operations airspace shall take into account adjacent airspace where Free Route Operations airspace is not implemented. Entry/exit points will be defined to allow for a structured transition between the two operational environments, this may not necessarily be at the FIR or ATC unit boundary.

In order to ensure overall European airspace structure interconnectivity, the entry/exit points from/into adjacent non Free Route Airspace shall ensure interconnectivity with the fixed ATS route network.

2.7.5. Vertical Connection Between Free Route Operations Airspace and the underlying Fixed ATS Route Network

The vertical connection between Free Route Operations Airspace and the underlying fixed ATS route network shall take into account the various climbing and descending profiles. The interconnectivity between Free Route Operations Airspace and the underlying fixed ATS route network shall be ensured through the publication of a set of waypoints or through the definition of a transition layer reflecting the typical climbing/descending profiles. The promulgation of these points shall be made through the national AIS publication with a clear indication of the nature of these points (entry, exit or entry/exit points).

2.7.6. Maximising Efficiency of Free Route Operations Airspace

To maximise the efficiency of Free Route Operations airspace and to ensure safe and efficient transfer of flight, all efforts need to be made to ensure any required realignment of the fixed route network in adjacent airspace not applying Free Route Operations airspace. Wherever a fixed route network will remain in operation below the Free Route Operations airspace, this underlying route network shall be refined and coordinated at network level to take into account the needs of free route operations in the airspace above.

2.7.7. Access To/From Terminal Airspace

Access to/from Terminal Airspace will need to be considered and appropriate refinements to TMA structures initiated, including the definition of additional SIDs/STARs to permit more flexibility. This could have implications for the management of Terminal airspace.



Note: In case of implementation of Free Route Operations airspace down to the upper limit of Terminal Airspace, the entry/exit points into/out of Free Route Operations airspace should preferably be the last point of the SID and the first point of the STAR. In some cases a redesign of the SID/STAR will be required and, depending on airspace complexity, extensions may need to be investigated to ensure appropriate traffic segregation.

Note: If for some airports no suitable SID/STAR is available, flight planning through the use of DCT should be facilitated.

2.7.8. Publication of a Contingency ATS Route Network

There is no over-arching requirement for a European contingency fixed ATS route network.

2.7.9. Maintenance of a Fixed ATS Route Network within Free Route Airspace

Wherever a fixed route network is maintained within airspace where Free Route Operations are implemented, details shall be published in AIS publications.

2.7.10. Airspace Reservations

In the context of this ARN Version-7 Free Route Concept of Operations, “**airspace reservation**” refers to airspace of defined dimensions for the exclusive use of specific users, including TRA, TSA, D, R, P, Areas and any specially activated areas. These are special designed areas within which both civil and military activities could take place.

Some airspace reservations are permanently active (such as prohibited areas) while others are active for varying periods of time and at varying levels. (e.g. TSA and similar exercise areas). Active airspace reservations are crossed or avoided depending on the degree of coordination (including civil/military coordination) and the status of the activity in the area. This will remain the case in Free Route Operations airspace.

There is the potential for airspace reservations to be reconfigured to meet different task needs.

In areas where coordination procedures (including civil/military coordination procedures) and airspace conditions permit, the airspace users are permitted to flight plan routings through airspace reservations.

In some cases, tactical rerouting will be given if airspace is not available for crossing. The expected maximum additional length of a tactical rerouting shall be promulgated through national AIS publications.

In other cases, when such airspace is not available for crossing, 5LNC will be defined to facilitate flight planning clear of the airspace reservation and ensure sufficient separation from the activity. The promulgation of these 5LNCs shall be ensured through national AIS Publication. If these points are to be used only for avoidance of airspace reservations, specific conditions for the use of these points for flight planning shall be published. An overall standardisation of the separation from airspace reservations will be required, in the longer term, especially for cross-border operations.

Publication of activation time of airspace reservations should be considered.

Note: the possibility of using lat/long should be considered

Procedures shall be developed between the NM and all interested parties to ensure a harmonised application of procedures for the avoidance of airspace reservations.



2.7.11. Route Availability

The role, format and applicability of the Route Availability Document (RAD) will need to be reconsidered within Free Route Operations airspace, especially for large scale applications. The strategic organisation of traffic flows currently executed through the RAD will require a complete review.

2.7.12. Sectorisation

The present sectorisation scheme may need to be restructured to accommodate traffic flows both within Free Route Operations Airspace and according to the underlying fixed route network. Instead of having regularised flows of traffic along the route network crossing at recognised points, the traffic will potentially be spread across the whole of a sector.

Sector design will need to respond to this change and may need to be more flexible as traffic demand varies.

The Free Route Operations Airspace sectors should be:

- Unconstrained by FIR/UIR or State boundaries.
- Capable of being reconfigured to meet demand. A structured methodology where sectors are taken from a library of designs already known to the internal and external systems is likely in areas where there are significant fluctuations of traffic flow orientation. Changes to sector definition will need to be notified to the CFMU and should be transparent to adjacent units.

Sector Design Criteria should, at least, take into account:

- the principle traffic flows and orientation;
- minimising short transits through sectors;
- minimising sector and ACC re-entry;
- positions of airspace reservations;
- coherency with adjoining fixed route sectors and link routes to SIDs and STARs;
- civil/military coordination aspects.

Sectors shall be aligned as far as possible so that the number of flights with short transit times is reduced to a minimum. If this is not feasible such traffic should be exempted from traffic counts. Appropriate rules shall be set in this context.

More flexibility in defining a larger number of elementary sectors/airspace volumes and sector configurations will need to be explored. Sectors will need to be designed to minimise short transits and to avoid sector/ATC unit re-entry of flights. Operationally designed, cross-border sectors may be needed where Free Route Airspace is implemented in adjacent areas.

A more extensive application of cross-border sectors is likely to be required to reflect better variations of traffic patterns.

Local FMPs will have to take a more proactive role in the selection of optimum sector configurations. Active sector configurations shall be dynamically communicated to the NM.

2.7.13. Sector and Traffic Volumes Capacities/Monitoring Values

Sector capacities shall take into account the more dynamic variations of traffic patterns. Definition of traffic volume capacities/monitoring values shall take into account a minimum transit time. Appropriate procedures shall be put in place by the CFMU to exempt such flows from sector traffic counts.



2.7.14. ATS Delegation

In areas where operational boundaries do not coincide with FIR/UIR boundaries, and delegation of ATS is effective, if one ATC unit has implemented Free Route Airspace but the adjacent one has not, the operational boundaries of Free Route Operations Airspace shall be published in the national AIS publications of both States. The Letters of Agreement between the concerned ATS units shall be amended accordingly to reflect any changes to the applicable procedures in the airspace where ATS is delegated.

2.8. AIRSPACE MANAGEMENT

2.8.1. General

ASM in Free Route Operations airspace will differ from that of the fixed Route Network in that AOs will no longer be given information on which routes are available, but will need to know which airspace is available/not available. For the transit period of a given flight through Free Route Operations airspace, the airspace users will need to know the activity of all pertinent airspace reservations areas to enable the selection of a flight path that will avoid them.

ATC units, corresponding military authorities, airspace users and the NM will need to know and share the same updated information with regard to activity of airspace reservations.

2.8.2. Information Sharing

When filing the flight plan, the airspace users will need to know the latest available information on the planned activity of airspace reservations affecting each flight.

In the pre-tactical phase the planned activation of all airspace reservations shall be made available to all interested parties. For the purpose of Free Route Operations Airspace, the CRAM shall be complemented by a similar publication that promulgates airspace availability/non-availability prior to the day of operation and that is updated as necessary during the tactical phase.

In the tactical phase, changes to the planned activation will need to be communicated to the CFMU as soon as they occur and shared with all the relevant ATM actors. A real-time airspace database will be necessary to deliver or make available real-time updates on airspace constraints.

An enhanced exchange and sharing of ASM data will be required at network level to ensure that airspace reservations is crossed or avoided depending on local procedures and whether or not activity is taking place in the area.

2.8.3. OAT Handling

OAT enroute shall benefit in a similar way from the implementation of Free Route Operations Airspace. There is no identified need for maintaining an OAT route structure within Free Route Operations Airspace.

2.9. LETTERS OF AGREEMENT AND COORDINATION PROCEDURES

Letters of Agreement shall be adapted to reflect the specificities of Free Route Operations in regard to transfer points, flexible changes in sectorisation, links with the fixed route network, high fluctuations in traffic flows, possibility to leave/enter the airspace at random points, etc.

Appropriate mentioning of ATS delegation in areas involving Free Route Operations Airspace shall be fully considered.



The automatic exchange of flight data between ACCs will need to consider the possibility of transfer at random points.

Transfer procedures and restrictions currently stipulated in the existing Letters of Agreement may no longer be applicable in Free Route Airspace. Appropriate procedures shall be defined to reflect these new provisions.

2.10. FLIGHT PLANNING

2.10.1. General

Within Free Route Operations Airspace, flight planning procedures are needed that are understandable and easy to use and that are coherent with procedures for the fixed route network.

Principles are outlined for GAT and OAT flight-planning, dealing primarily with GAT but will specifically mention OAT requirements where necessary.

Except in Free Route Operations Airspace where it is published that tactical rerouting will be given, the onus is on the originator of a FPL to submit a routeing through Free Route Operations Airspace that avoids active airspace reservations.

ATC, AOs and the NM should have the same information regarding the intended profile and routing of a flight, regarding both the initial flight plan and any subsequent revisions to that information. The development of appropriate tools will indicate real time and future activity status of airspace reservations to all users.

Within the Free Route Operations Airspace area there will be no limitations on the use of DCT, other than those recommended by ICAO.

Changes to airspace users' flight planning systems may be required to enable all airspace users to take full benefit of the Free Route Operations airspace.

The IFPS will be modified to enable flight plan processing and checking in the context of variable lower levels of Free Route Operations airspace in various parts of the European airspace. Similarly, the IFPS shall enable appropriate flight plan processing and checking for the transition from Free Route Operations airspace to fixed route network airspace whenever Free Route Operations will be implemented for limited time periods, e.g. during night time only.

2.10.2. Flight Plan Format

No change is envisaged to the ICAO flight-plan format in respect of Free Route Operations. OAT flight plans shall continue to comply with national regulations.

2.10.3. Use of Intermediate Lat/Long Points for Flight Planning

In order to benefit from the best operating conditions, airspace users may be allowed to use any intermediate Lat/Long points for flight planning. Such possibility shall be clearly promulgated in national AIS publications. Where such utilisation is not possible, publication of intermediate 5LNC points shall be ensured.

2.10.4. Flight Planning Routeings Through Airspace Reservations

For the transit period of a given flight through Free Route Operations airspace, the AO will need to know the activity of all pertinent airspace reservations areas to enable the selection of a route that will avoid them, except where none are published and tactical re-routeing is provided. The requirement for 'hard checking' of such flight plans needs to be considered.



The selection of the route shall be based on the 5LNC or lat/long formally published to this effect.

In areas where civil/military coordination procedures and airspace conditions permit, the airspace users can be allowed to flight plan through airspace reservations. Tactical re-routings could be expected in case of areas not being available for civil operations. In such cases the expected maximum additional length of tactical re-routings shall be promulgated through national AIS publications.

The NM shall ensure an overall estimation of the total additional length required for a particular flight, in the case of tactical re-routeing within more than one ACC.

2.10.5. Route Description

Free Route Operations Airspace entry/exit points, intermediate lat/long points and other significant points shall be described using the standard ICAO format. Route portions between waypoints or Lat/Long shall be indicated by means of DCT.

2.10.6. Flight Planning Facilitation Through the Use of DCTs

The use of published entry points with associated exit points might be required in certain cases to facilitate flight planning in Free Route Operations airspace. This is especially valid in cases where only limited combinations of entry/exit points are permitted within Free Route Operations Airspace. Similarly, a number of DCTs might not be allowed for use by the airspace users. A harmonised approach for the publication of these DCTs will be ensured at network level. This approach shall ensure the respect of the status of airspace within various FIRs (e.g min/max FLs, avoiding penetration of uncontrolled airspace, availability period, etc.).

2.10.7. Requested FL Change

The airspace users may use any significant point or Lat/Long for indicating changes to the RFL. The airspace users shall observe the Flight Level Orientation System applicable within the respective Free Route Operations airspace.

2.10.8. Flight Plan Submission

GAT flight-plans will be submitted to IFPS within the appropriate time-parameter. RPLs may continue to be submitted for flights that will transit Free Route Operations Airspace, but they might not have the full benefit of optimum route selection derived from precise information on airspace availability. They will continue to be checked by IFPS following normal procedures for proposing alternative routes when necessary.

Flight plan filing limitations shall be promulgated for areas where Free Route Airspace Operations is structurally limited – i.e. only a limited combination of entry/exit points are permitted

2.10.9. Flight Plan Checking and Correction

In addition to the normal flight plan validation rules within IFPS, the flight-planned route through Free Route Operations airspace shall be considered invalid if it:

- Fails to comply with published entry/exit requirements
- Infringes an airspace reservation
- Fails to maintain the prescribed minimum lateral and vertical distances from an airspace reservation;
- Fails to maintain the published FLOS.

In proposing alternative routes, IFPS will not be able to consider all the varying AO criteria for route selection. IFPS will propose routes on the basis of shortest distance and/or alternative FL above or below airspace reservations.



In case of time-limited application of Free Route Operations, IFPS shall check the flight plan to ensure that it complies with the time parameters of the Free Route Operations.

2.10.10. Flight Plan Distribution

Real time updates to airspace availability should lead to a recalculation of the submitted flight profile by IFPS before the FPL is distributed. To ensure that subsequent route corrections can be offered for affected flights, an appropriate distribution time parameter will need to be set. Once this parameter has passed and FPLs are distributed, further route updates will not be processed.

Flight Plans shall be distributed to appropriate ATS providers, relevant military organisations and other authorised parties decided by National Authorities. The IFPS shall ensure the appropriate calculation of the flight profile to enable a correct distribution of the flight plan to all interested parties.

For large scale applications of free route airspace, the flight plan distribution will need to be ensured to the appropriate ATC units and sectors, hence the importance of having updated information on active sector configurations. In addition, the ATC units, the airspace users and CFMU will need access to exactly the same information, both for the initial flight plan and subsequent updates. The importance of completely up-to-date information on the status of airspace reservations is to be again underlined.

2.10.11. DCT Limits

Existing limitations on the DCTs (in distance and for cross border DCTs) will need to be reviewed.

The current DCT limits are applicable to an administrative airspace (FIR/UIR/NAS) which does not always coincide with the operational airspace boundaries. In case of ATS delegation, this prevents the creation of a DCT covering the complete operational airspace.

The possibility of flight planning DCT across two or more FIR/UIR boundaries shall be made available. This will require IFPS to compute and communicate to all ACCs entry/exit positions for their area of responsibility.

If the DCT limits are different in the airspace below the Free Route Operations airspace, the IFPS calculation could raise errors for traffic flying in both airspaces. This is the case for the traffic climbing/descending between the Free Route Airspace and the fixed route airspace. System changes at network level are required to address this aspect.

In areas where a fixed route network remains, the % limitation of allowing DCT shall be reviewed.

2.11. AIR TRAFFIC FLOW AND CAPACITY MANAGEMENT

2.11.1. General

Airspace users shall comply with normal ATFCM procedures both within and outside Free Route Operations Airspace.

Large scale applications of free route airspace or implementation of free route operations in adjacent ATC units will generate a large variation of trajectories. Real-time updates of the airspace situation with respect to both sector configurations and airspace reservations will be required in order to offer the most updated ATFCM situation at network/local levels.



2.11.2. Sector Configuration Management

In areas where adjacent airspace is Free Route Operations Airspace, the volatility of the traffic flows will be higher than today. This will require a larger number of elementary sectors, a larger number of sector configurations and a more flexible and dynamic adaptation of the sector configuration to the traffic demand/pattern.

Changes to sector configurations will need to be notified in real time to the CFMU to enable optimum network management actions. Appropriate procedures and system support to enable this flexibility shall be required. System support shall be in place to better predict trajectories in an environment where trajectories will be more volatile than in a fixed route structure.

In addition, procedures need to be defined to allow CFMU, through collaborative decision making processes, to propose the most optimum configurations, taking into account the expected traffic pattern at network level.

Variable sector monitoring values, communicated in real time to the CFMU, will be required to reflect the changing traffic complexity.

2.11.3. Sector and Traffic Volumes Capacities/Monitoring Values

The use of traffic volumes and exclusions will need to be considered, as large variations in traffic patterns could appear in the context of large scale applications of free route airspace or even when two adjacent ATC units allow free route operations.

2.11.4. Letters of Agreement Restrictions

A number of restrictions currently stipulated in the existing Letters of Agreement and implemented by CFMU for flight planning or ATFCM purposes may no longer be applicable in free route airspace. Such provisions will need to be reviewed.

2.11.5. Re-routing Proposals

The possibility for IFPS to propose routes to airspace users, taking into account the best operating conditions in free route airspace, shall be considered. New procedures will be required to define rerouting within free route airspace. System support will be required to facilitate this task. The provision of a time window for the period the FPL/RPL will be suspended or invalid should be considered (FLS/REJ).

2.11.6. ATFCM Procedures

A comprehensive re-evaluation of the current procedures for strategic, pre-tactical and tactical planning phases shall be undertaken to facilitate large scale application of Free Route Operations Airspace.



Proposal :		Status:	State(s) & Org.
63.069a	<p>Phased implementation of Free Route Airspace within Sweden: Phase 1: To allow free route flight path for traffic overflying Sweden UIR above FL285, North of 61st parallel. Objective: To implement FRAS Free Route Airspace in Sweden UIR.</p>	<p>Implemented 09 APR 2009</p> <p>Project Category: Free Route Airspace</p>	<p>SWE</p> <p>Originator(s): SWE</p>
64.030	<p>To implement a Free Route Airspace Concept in Lisboa FIR above FL245. Objective: To further improve the ATS route options within Lisboa FIR.</p>	<p>Implemented 07 MAY 2009</p> <p>Project Category: Free Route Airspace</p>	<p>PRT</p> <p>Originator(s): PRT</p>
64.047	<p>ENSURE (EN-route Shannon Upper Airspace REdesign) project.</p> <ul style="list-style-type: none"> To introduce Free Route Airspace above FL245 within Shannon UTA, Northern Oceanic Transition Area (NOTA) and Shannon Oceanic Transition area (SOTA). To remove all upper ATS routes whilst maintaining the current lower ATS route structure below FL245. To permit airspace users to flight plan direct routeing "DCT" between any of the published waypoints or nav aids within the area (<i>except for some limited RAD Appendix 4 restrictions to prevent aircraft flying along common boundaries etc</i>). To implement a number of new waypoints. To withdraw a significant number of waypoints. <p>Objective: To further improve the airspace organisation within Shannon UIR, the Northern Oceanic Transition Area (NOTA) and the Shannon Oceanic Transition Area (SOTA) above FL245.</p>	<p>Implemented 17 DEC 2009</p> <p>Project Group: FAB UK/Ireland</p> <p>Project Category: Free Route Airspace</p>	<p>IRL GBR</p> <p>Originator(s): IRL</p>
63.069b	<p>Phased implementation of Free Route Airspace within Sweden: Phase 2: To allow free route flight path for traffic overflying Sweden UIR above FL285. Objective: To implement FRAS/ Free Route Airspace in Sweden UIR.</p>	<p>Implemented 06 MAY 2010</p> <p>Project Category: Free Route Airspace</p>	<p>SWE</p> <p>Originator(s): SWE</p>



Proposal :		Status:	State(s) & Org.
63.069c	<p>Phased implementation of Free Route Airspace within Sweden:</p> <p>Phase 3: To allow free route flight path for ARR/DEP to/from Sweden and adjacent airports, North of latitude 61°N with a planned trajectory above FL285.</p> <p>Objective: To implement FRAS/ Free Route Airspace in Sweden UIR.</p>	<p>Implemented</p> <p>16 DEC 2010</p> <p>Project Category: Free Route Airspace</p>	<p>SWE</p> <p>Originator(s): SWE</p>
70.059a	<p>To implement Free Route Airspace Maastricht - FRAM project:</p> <p>1. Phase 1: RTS 2 - NOV 2010;</p> <p>2. Phase 2A: Limited concept implementation - FEB 2011 (<i>Core night 2300/2200 - 0500/0400</i>).</p> <p>Objective: To implement FRA Concept and further improve flight efficiency within MUAC AoR.</p>	<p>Implemented</p> <p>10 FEB 2011</p> <p>Project Category: Night Routes Free Route Airspace</p>	<p>MUAC</p> <p>BEL</p> <p>DEU</p> <p>NLD</p> <p>FAB EC</p> <p>EUROCONTROL</p> <p>LUX</p> <p>Originator(s): MUAC</p>
63.069d	<p>Phased implementation of Free Route Airspace within Sweden:</p> <p>Phase 4: To allow free route flight path for traffic overflying Swedish FIR above FL285 including ARR/DEP to/from Sweden and adjacent airports, South of latitude 61°N with a planned trajectory above FL285.</p> <p>Objective: To implement FRAS/ Free Route Airspace in Sweden UIR.</p>	<p>Implemented</p> <p>05 MAY 2011</p> <p>Project Category: Free Route Airspace</p>	<p>SWE</p> <p>Originator(s): SWE</p>
70.059b	<p>To implement Free Route Airspace Maastricht – FRAM project:</p> <p>Phase 2B: Expand <i>near night time</i> from 0000 – 0400 to 0000 – 0600.</p> <p>Objective: To implement FRA Concept and further improve flight efficiency within MUAC AoR.</p>	<p>Implemented</p> <p>02 JUN 2011</p> <p>Project Category: Free Route Airspace Night Routes</p>	<p>MUAC</p> <p>BEL</p> <p>DEU</p> <p>LUX</p> <p>NLD</p> <p>EUROCONTROL</p> <p>FAB EC</p> <p>Originator(s): MUAC</p>



Proposal :	71.083a	Status :	State(s) & Org.
<p>To implement Free Route Airspace Concept in Karlsruhe UAC, Phase 1:</p> <ul style="list-style-type: none"> a. New DCTs (Mainly H24, some weekend DCTs) on axis EPWW-EDUU-EDYY (East sectors). b. New northbound (including DEP EDDM, EDDF, LKPR) and southbound DCT in the East sectors. c. New H24 (local) DCTs Dest. EBBR via ESAMA. d. New H24 DCTs Dest EDDV, EDDH via UL604 RUDNO. <p>Objective:</p> <p>To expand the implementation of Free Route Airspace Concept in Karlsruhe UAC and to</p> <ul style="list-style-type: none"> 1. shift/ optimize Pan-European flows off-loading EPWW / D sector. 2. get experiences with military areas, publication and IFPS processing on one side and to offer quick wins for our customer. 3. optimize operational requirements in Central sectors. 4. offer significant shorter routes. 	<p>Implemented</p> <p>30 JUN 2011</p> <p>Project Category :</p> <p>DCTs</p> <p>Free Route Airspace</p>	<p>DEU</p> <p>Originator(s) :</p> <p>DEU</p>	
Proposal :	69.053	Status :	State(s) & Org.
<ul style="list-style-type: none"> a. To implement Free Route Airspace within the DNK/SWE FAB. b. To introduce a number of points to use for flight planning in Free Route Airspace when TSAs, restricted and danger areas are active. <p>Objective:</p> <p>To further improve the airspace structure between Kobenhavn FIR and Sweden UIR.</p>	<p>Implemented</p> <p>17 NOV 2011</p> <p>Project Group:</p> <p>FAB</p> <p>Denmark/Sweden</p> <p>Project Category:</p> <p>Free Route Airspace</p>	<p>DNK</p> <p>SWE</p> <p>Originator(s) :</p> <p>FAB</p> <p>Denmark/Sweden</p>	
Proposal :	70.059c	Status:	State(s) & Org.
<p>To expand the implementation Free Route Airspace Maastricht - FRAM project by making the current Night FRAM DCTs also available H24 during weekends from Fri 2300 (2200) to Mon 0700 (0600):.</p> <p>Phase 2C: During Weekend.</p> <p>Objective:</p> <p>To implement FRA Concept and further improve flight efficiency within MUAC AoR</p>	<p>Implemented</p> <p>15 DEC 2011</p> <p>Project Category:</p> <p>Free Route Airspace</p> <p>DCTs</p>	<p>MUAC</p> <p>BEL</p> <p>DEU</p> <p>LUX</p> <p>NLD</p> <p>EUROCONTROL</p> <p>FAB EC</p> <p>Originator(s):</p> <p>MUAC</p>	

Proposal :	71.083b	Status:	State(s) & Org.
<p>To implement Free Route Airspace Concept in Karlsruhe UAC, Phase 2:</p> <ol style="list-style-type: none"> 1. Extend the list of RAD DCTs in the East sectors mainly H24 depending on military areas and connected to FRA Sweden, Denmark, Maastricht UAC and FRA/night at Praha ACC. 2. Selected new RAD DCTs in the other (complex and high loaded) sectors of Karlsruhe UAC and time extension of existing Night ATS routes or Night DCTs. <p>Objective: To expand the implementation of Free Route Airspace Concept in Germany.</p>		<p>Implemented 15 DEC 2011</p> <p>Project Category: DCTs Free Route Airspace</p>	<p>DEU</p> <p>Originator(s): DEU</p>
Proposal :	70.059d	Status:	State(s) & Org.
<p>To implement Free Route Airspace Maastricht - FRAM project:</p> <ol style="list-style-type: none"> a. Phase 3: RTS 3 - MAR 2012; b. Phase 4: Limited concept extended implementation. <p>Objective: To implement FRA Concept and further improve flight efficiency within MUAC AoR.</p>		<p>Proposed spring 2012</p> <p>Project Category: Free Route Airspace</p>	<p>MUAC BEL DEU LUX NLD EUROCONTROL FAB EC</p> <p>Originator(s): MUAC</p>
Proposal :	69.097	Status:	State(s) & Org.
<p>To implement NIGHT Free Route within Praha FIR (FL165 - FL660) between 23:00(22:00) and 05:00 (04:00) allowing DCT from any Entry-Point to any Exit-Point.</p> <p>Objective: To further improve the airspace structure within Praha FIR.</p>		<p>Planned 20 SEP 2012</p> <p>Project Category: Free Route Airspace</p>	<p>CZE</p> <p>Originator(s): CZE</p>



Proposal :	67.046	Status:	State(s) & Org.
<p>a. To implement NIGHT time DCT routing in Finland FIR/UIR for all traffic FL95 - FL660 from: FIR/UIR entry or TMA exit point to FIR/UIR exit or TMA entry point / IAF as appropriate.</p> <p>b. Intermediate waypoints can be filed by the operator if required.</p> <p>c. Scenario likely to be available 2300 - 0530 LMT with extended availability during SAT and SUN to 1200 LMT. Confirmation of availability periods to be provided later.</p> <p>d. Tactical rerouting provided to avoid active MIL airspace (potential D area activity). Scenario to be suspended during large scale MIL exercises extending to the timeframe of availability.</p> <p>Objective: To further improve the ATS route network while providing user preferred trajectories during periods of low traffic demand.</p>	<p>Planned 13 DEC 2012</p> <p>Project Category: Night Routes Free Route Airspace</p>	<p>FIN</p> <p>Originator(s): FIN</p>	
Proposal :	71.083c	Status:	State(s) & Org.
<p>To implement Free Route Airspace Concept in KarlsruheUAC, Phase 3:</p> <ol style="list-style-type: none"> Completion of the RAD list in East sectors. Certain new RAD DCTs for overflights in the other (complex and high loaded) sectors of Karlsruhe restricted by time (night/weekend/off-peak) and/ or MIN FL. Use of additional cross-border DCTs after upgrade of OLDI exchange with Maastricht UAC . Creation of transit routes to optimize vertical transition to/from FRA, to simplify RAD and to enable unlimited DCTs in FRA Karlsruhe (East sectors). <p>Objective: To expand implementation of Free Route Airspace Concept in Germany.</p>	<p>Proposed autumn 2012</p> <p>Project Category: DCTs Free Route Airspace</p>	<p>DEU</p> <p>Originator(s): DEU</p>	
Proposal :	69.086	Status:	State(s) & Org.
<p>To implement Night Free Route Airspace within Beograd FIR/UIR and Beograd ACC.</p> <p>Objective: To further improve the airspace structure within Beograd FIR/UIR and Beograd ACC.</p>	<p>Proposed Spring 2012</p> <p>Project Category: Free Route Airspace Night Routes</p>	<p>SRB MNE BIH</p> <p>Originator(s): SRB MNE</p>	

Proposal :		Status:	State(s) & Org.
73.051	To extent Portuguese Free Route airspace into Madrid ACC Santiago (SAN) and Asturias (ASI) sectors. Objective: To further improve the ATS route network between Lisboa FIR and Madrid FIR.	Proposed winter 2012/13 Project Group: FAB SW Project Category: Free Route Airspace	ESP PRT Originator(s): ESP
74.016a	To introduce NIGHT FREE ROUTE in Zagreb ACC (<i>Phase 1</i>). Objective: To further improve airspace organisation within Sarajevo FIR and Zagreb FIR.	Proposed Spring 2012 Project Group: RFG SE Project Category: Free Route Airspace	HRV BIH Originator(s): HRV
71.083d	To implement Free Route Airspace Concept in KarlsruheUAC, Phase 4 : 1. Update of DCTs after integration of upper sectors Munich in Karlsruhe. 2. Implementation of a FRA model according to simulation results and customer preferences for example: a. complete overlay above a high MINFL e.g. FL375 (perhaps with time limitations). b. overlay above e.g. FL375 and another layer with lower MINFL in the East sectors. c. further application and update of the RAD DCT list instead of introducing simplified but inflexible FRA layer(s) if customer prefer. Objective: To expand the implementation of Free Route Airspace Concept in Germany.	Proposed 2013 Project Category: DCTs Free Route Airspace	DEU Originator(s): DEU
70.059e	To implement Free Route Airspace Maastricht - FRAM project : Phase 5: All DCTs H24/7 - when ASM tools are available - 2012+. Objective: To implement FRA Concept and further improve flight efficiency within MUAC AoR.	Proposed 2013 Project Category: DCTs Free Route Airspace	MUAC, BEL DEU, LUX NLD, EUROCONTROL FAB EC Originator(s): MUAC



Proposal :		Status:	State(s) & Org.
74.017	To introduce FREE ROUTE H24 in Budapest ACC. Objective: To further improve airspace organisation within Budapest FIR.	Proposed winter 2013/14 Project Group: RFG SE Project Category: Free Route Airspace	HUN Originator(s): HUN
74.059	To implement (H24) Free Route Airspace within Beograd FIR/UIR . Objective: To further improve the airspace structure within Beograd FIR/UIR.	Proposed winter 2013/14 Project Category: Free Route Airspace	SRB MNE Originator(s): SRB
60.010g	SMART project Phase 5 - To allow Free Route flight during NIGHT and WEEKEND above FL285 . Objective: To further improve airspace organisation within Istanbul FIR and Ankara FIR and enhance capacity within the Turkish ACCs in order to cope with the increasing traffic demand.	Planned summer 2014 Project Group: RFG SE Project Category: Free Route Airspace	TUR Originator(s): TUR
69.052 / DN0073	To implement Free Route Airspace within the DANUBE area. Objective: To further improve the airspace structure between Bucuresti FIR and Sofia FIR.	Proposed summer 2014 Project Group: FAB DANUBE Project Category: Free Route Airspace	BGR ROU Originator(s): FAB DANUBE
74.011	To introduce FREE ROUTE H24 in Skopje ACC. Objective: To further improve airspace organisation within Skopje FIR.	Proposed summer 2014 Project Group: RFG SE Project Category: Free Route Airspace	MKD Originator(s): MKD

Proposal :	74.016b	Status:	State(s) & Org.
<p>To introduce FREE ROUTE H24 in Zagreb ACC (<i>Phase 2</i>).</p> <p>Objective: To further improve airspace organisation within Sarajevo FIR and Zagreb FIR.</p>	<p>Proposed summer 2014</p> <p>Project Group: RFG SE</p> <p>Project Category: Free Route Airspace</p>	<p>HRV BIH</p> <p>Originator(s): HRV</p>	
Proposal :	72.052 / 14.015	Status:	State(s) & Org.
<p>To implement Free Route Airspace within Moldova.</p> <p>Objective: To implement FRA Concept and further improve flight efficiency within Chisinau FIR.</p>	<p>Proposed 2014</p> <p>Project Group: SG BLACK RFG SE</p> <p>Project Category: Free Route Airspace</p>	<p>MDA</p> <p>Originator(s): MDA</p>	
Proposal :	70.059f	Status:	State(s) & Org.
<p>To implement Free Route Airspace Maastricht - FRAM project: Phase 6: Full Concept - 2013+.</p> <p>Objective: To implement FRA Concept and further improve flight efficiency within MUAC AoR.</p>	<p>Proposed 2014</p> <p>Project Category: Free Route Airspace</p>	<p>MUAC BEL DEU LUX NLD EUROCONTROL FAB EC</p> <p>Originator(s): MUAC</p>	
Proposal :	71.054	Status:	State(s) & Org.
<p>a. To introduce Casablanca ACC dynamic sector management.</p> <p>b. To implement Free Route during Night/ Week-end within South and East Sectors - (<i>Phase 1</i>).</p> <p>c. To implement Free Route within South Sector FL250+ (<i>Full concept Phase 2</i>).</p> <p>d. To implement Free Route for East/West traffic (Oceanic and West Sectors).</p> <p>Objective: To further improve airspace organisation within Casablanca FIR.</p>	<p>Proposed 2014</p> <p>Project Category: Free Route Airspace</p>	<p>MAR</p> <p>Originator(s): MAR</p>	

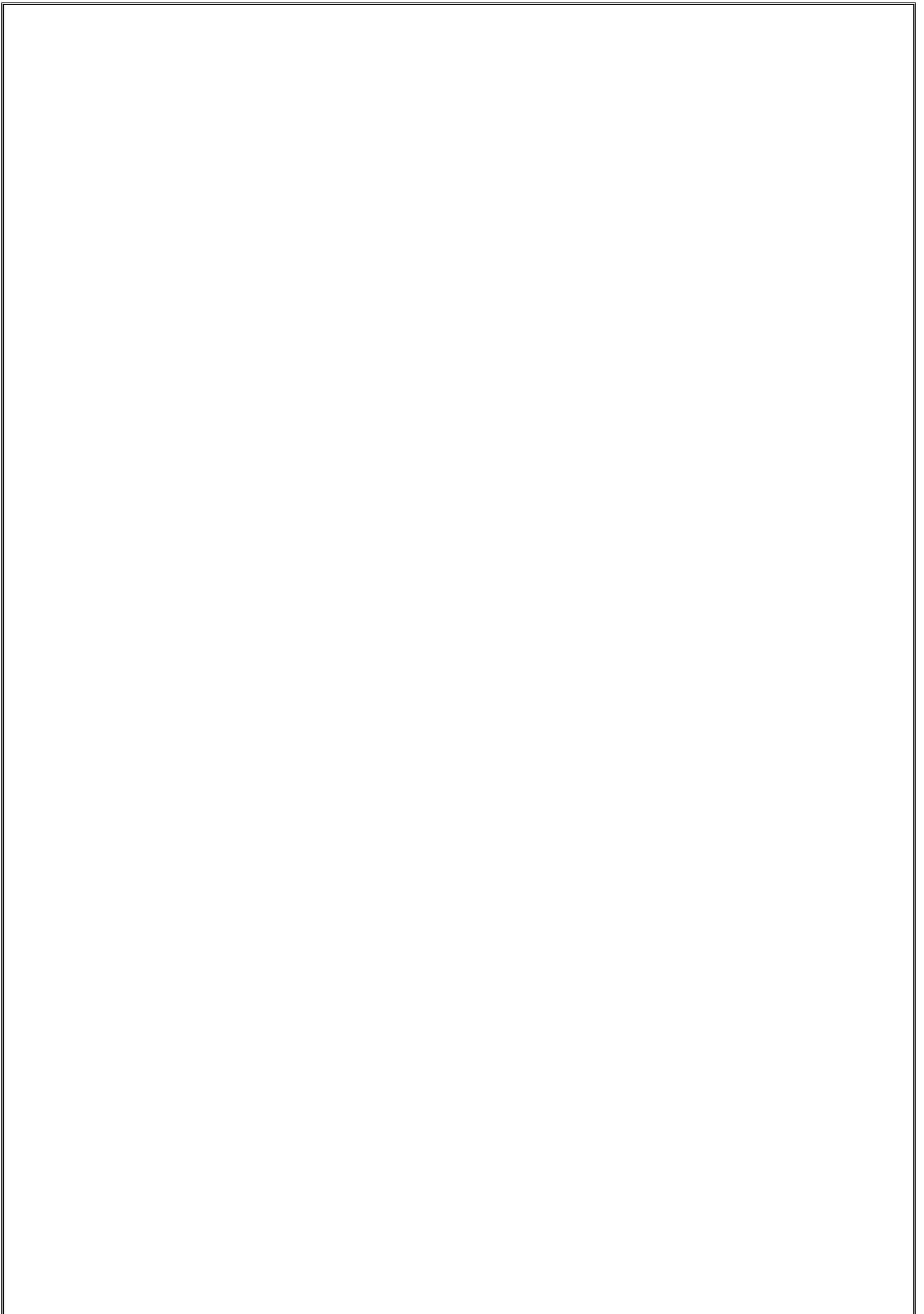


Proposal :	71.040	Status :	State(s) & Org.
<p>To implement Free Route Airspace within Ukraine during Night.</p> <p>Objective: To implement FRA Concept and further improve flight efficiency within L'viv FIR, Kyiv FIR, Odesa FIR, Simferopol FIR and Dnipropetrovs'K FIR</p>		<p>Proposed winter 2014/15</p> <p>Project Category: Free Route Airspace</p>	<p>UKR</p> <p>Originator(s) : UKR</p>
Proposal :	71.087	Status :	State(s) & Org.
<p>Free Route Airspace in Greece Free Route Like concept for Hellas UIR, FL195 and above, during night (2200-0400 UTC).</p> <p>Objective: Align the airspace structure with real operations. Operational DCT's to be made flightplannable</p>		<p>Proposed summer 2015</p> <p>Project Group: FAB BLUE MED</p> <p>Project Category: Free Route Airspace</p>	<p>FAB BLUE MED ALB CYP EGY GRC ITA MLT TUN</p> <p>Originator(s): GRC FAB BLUE MED</p>
Proposal :	71.086	Status :	State(s) & Org.
<p>Free Route Airspace in Albania Free Route Like concept for Tirana FIR, FL195 and above, 24h.</p> <p>Objective: Align the airspace structure with real operations. Operational DCT's to be made flightplannable</p>		<p>Proposed summer 2015</p> <p>Project Group: FAB BLUE MED</p> <p>Project Category: Free Route Airspace</p>	<p>FAB BLUE MED ALB CYP EGY GRC ITA MLT TUN</p> <p>Originator(s): ALB FAB BLUE MED</p>

Proposal :	71.089	Status:	State(s) & Org.
<p>Free Route Airspace in Malta Free Route Like concept for Malta UIR, FL195 and above, 24h.</p> <p>Objective: Align the airspace structure with real operations. Operational DCT's to be made flight plannable.</p>	<p>Proposed summer 2015</p> <p>Project Group: FAB BLUE MED</p> <p>Project Category: Free Route Airspace</p>	<p>FAB BLUE MED ALB CYP EGY GRC ITA MLT TUN</p> <p>Originator(s): MLT FAB BLUE MED</p>	
Proposal :	71.085	Status:	State(s) & Org.
<p>Free Route Airspace in Italy Segmented approach for Padova, Roma and Brindisi UIR above FL315 during night (2200-0400 UTC).</p> <p>Objective: Align the airspace structure with real operation. Operational DCT's to be made flight planable.</p>	<p>Proposed summer 2015</p> <p>Project Group: FAB BLUE MED</p> <p>Project Category: Free Route Airspace</p>	<p>FAB BLUE MED ALB CYP EGY GRC ITA MLT TUN</p> <p>Originator(s): ITA FAB BLUE MED</p>	
Proposal :	71.088	Status:	State(s) & Org.
<p>Free Route Airspace in Cyprus Free Route Like concept for Nicosia FIR, FL195 and above, 24h.</p> <p>Objective: Align the airspace structure with real operations. Operational DCT's to be made flight plannable</p>	<p>Proposed summer 2015</p> <p>Project Group: FAB BLUE MED</p> <p>Project Category: Free Route Airspace</p>	<p>FAB BLUE MED ALB CYP EGY GRC ITA MLT TUN</p> <p>Originator(s): CYP FAB BLUE MED</p>	



Proposal :	69.064	Status:	State(s) & Org.
<p>To implement Free Route Airspace within NEFAB area above FL 285.</p> <p>Objective: To further improve the airspace structure between the UIRs of Norway, Sweden, Finland, Tallinn, Riga and the FIRs of Reykjavik and Kobenhavn.</p>		<p>Planned 12 NOV 2015</p> <p>Project Group: FAB NEFAB</p> <p>Project Category: Free Route Airspace</p>	<p>FIN NOR EST LVA</p> <p>Originator(s): FAB NEFAB</p>
Proposal :	68.002	Status:	State(s) & Org.
<p>FRAL Future Steps/ Portugal:</p> <ol style="list-style-type: none"> 1. New sector configuration (adjustments according to AOs preferred trajectories); 2. Implementation of Free Route Airspace above FL195 within Lisboa FIR; 3. Cross border DCT between Lisboa FIR and Santa Maria FIR. <p>Objective: To further improve the airspace organisation and ATS route options within Lisboa FIR. To further improve the airspace utilisation between Santa Maria FIR and Lisboa FIR.</p>		<p>Proposed</p> <p>Project Category: Free Route Airspace</p>	<p>PRT</p> <p>Originator(s): PRT</p>
Proposal :	68.001	Status:	State(s) & Org.
<p>FRAN Project:</p> <p>Implementation of Free Route Airspace within Norway.</p> <p>Objective: To implement Free Route Airspace in Norway UIR.</p>		<p>Proposed</p> <p>Project Category: Free Route Airspace</p>	<p>NOR</p> <p>Originator(s): NOR</p>
Proposal :	New Proposal	Status:	State(s) & Org.
<p>Implementation of Free Route Airspace in FABEC Airspace - several steps between 2011-2018+</p> <p>Objective: To implement Free Route Airspace in FABEC Airspace</p>		<p>Proposed</p> <p>Project Category: Free Route Airspace</p>	<p>All FABEC</p> <p>Originator(s): FABEC</p>
Proposal :	New Proposal	Status:	State(s) & Org.
<p>Implementation of Free Route Airspace in FABCE Airspace - several steps between 2012-2018+</p> <p>Objective: To implement Free Route Airspace in FABCE Airspace</p>		<p>Proposed</p> <p>Project Category: Free Route Airspace</p>	<p>All FABCE</p> <p>Originator(s): FABCE</p>



Contact details

DNM/COO/NOM/OPL
razvan.bucuroiu@eurocontrol.int



EUROCONTROL

© February 2012 - L'Organisation européenne pour la sécurité de la navigation aérienne (EUROCONTROL)

Le présent document est publié par EUROCONTROL à titre d'information. Il peut être reproduit, en tout ou en partie, sous réserve qu'EUROCONTROL soit mentionnée comme source et qu'il ne soit pas utilisé à des fins commerciales (lucratives). Les informations contenues dans le présent document ne peuvent être modifiées sans l'autorisation écrite préalable d'EUROCONTROL.

www.eurocontrol.int