Feasibility of the Establishment of a "Single Airspace" within the Caribbean

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REQUEST FOR A SINGLE CARIBBEAN AIRSPACE

SAN JUAN ACCORD (Oct 19, 2007)

- The development of cross-border air transport policies applicable throughout the Caribbean region;
- The harmonization of the management of airspace within the region;
- Increase competitiveness of the Caribbean air transport sector.
REQUEST FOR A SINGLE CARIBBEAN AIRSPACE

IATA (APRIL 2008)

Proposal to CTO – “Provision of Consulting Services – Towards a Regional Strategy for Air Transport in the Caribbean”
MANDATE

- Examine the benefits to be derived by the Region from the establishment of a single airspace.

- Provide recommendations with respect to the establishment of a single airspace.
A method/tool used for the rational organization of airspace.

Definition: “THE CREATION AND DESIGN OF AIRSPACE REGULATIONS FOR EXECUTION BY A GROUP OF STATES OR NEIGHBOURING COUNTRIES IN A HARMONIZED MANNER”
OBJECTIONS OF A SINGLE AIRSPACE

- Reduce fragmentation and complexity;
- Implement the flexible use of airspace concepts;
- Increase ATC capacity and reduce delays;
- Facilitate the introduction of new technology;
- Increase harmonization and Co-operation.
BENEFITS OF A SINGLE AIRSPACE

- Enable the reconfiguration of airspace of states/neighborhood countries into delimited control areas without regard to national frontiers;
- Create single FIRs and FABs;
- Facilitate a more rational, cost effective and coordinated organization of the airspace.
BENEFITS OF A SINGLE AIRSPACE

- Improve current procedural control methods and techniques through the introduction of modern methods and equipment.
- Facilitate efficient use of airspace, systems, equipment and personnel.
BENEFITS OF A SINGLE AIRSPACE

- Reduce air traffic workload;
- Ensure consistency between the configurations of upper and lower airspace.
BENEFITS OF A SINGLE AIRSPACE

“Create integration across borders in order to improve capacity, enhance security and lower cost of air traffic services.”
Under the Chicago Convention the concept of Flight Information Regions (FIRs) defines homogeneous regions of airspace that should efficiently cover air routes.

Air frontiers have been fixed by reference to land and sea frontiers.
A single FIR (upper) will enable the airspace to be reconfigured into delimited control areas without regard to national frontiers;

Division of Upper and Lower Airspace will be facilitated:

*Upper airspace – dedicated to over flights*

*Lower airspace – dedicated to airport approaches, landings and takeoffs.*
ICAO

- Recommends that the delineation of international airspace should relate to the need for efficient service rather than national boundaries.
FUNCTIONAL AIRSPACE BLOCK (FAB)

- A method/tool used for the rational organization of airspace.

- Definition: *An airspace having the dimensions defined in space and in time, within which air navigation services are provided.*
SINGLE AIRSPACE - SAFEGUARDS

- Safety must not be compromised;
- Co-operation aims should be clearly defined;
- Legal/institutional obstacles must be resolved.
SINGLE AIRSPACE - SAFEGUARDS

- A cost benefit analysis undertaken;
- An incremental approach should be employed;
- Network coherency must be maintained and even enhanced.
INTERNATIONAL EFFORTS TOWARDS RATIONALISATION OF AIRSPACE
THE EUROPEAN EXPERIENCE

Source: EUROCONTROL
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CURRENT SITUATION OF ATM IN THE CARIBBEAN

- Eight (8) FIRs in the Caribbean Region;

- A number of Sovereign States, languages, cultures and varying procedures are involved;

- Traffic is expected to grow;

- Congestion leads to sub-optimal trajectories.
FLIGHT INFORMATION REGIONS IN THE CARIBBEAN

NASSAU FIR
HAVANA FIR
MIAMI OCEANIC FIR
PORT-AU-PRINCE FIR
SANTO DOMINGO FIR
CURACAO FIR
BARRANQUILLA FIR
MARQUETIA FIR
PIARCO FIR
GEORGETOWN FIR
CHALLENGES & ISSUES

- Legislative
- Institutional
- Sovereignty
- Equipment
- Regulatory
- Economic
- Culture
RECOMMENDATIONS OF CASSOS

- A COMPREHENSIVE AND DETAILED STUDY BE COMMISSIONED TO ANALYSE THE FEASIBILITY OF THE IMPLEMENTATION OF SINGLE CARIBBEAN AIRSPACE.

- THE PROVISION OF APPROPRIATE RECOMMENDATIONS FOR THE WAY FORWARD.
IMPLEMENTING THE RECOMMENDATIONS

It is recommended that:

- Consideration be given to the establishment of a **Single Airspace Committee**.

- **Composition of Committee:**
  Comprise technical aviation experts from Caricom region.

- **Modus Operandi:**
  - Functional separation from CASSOS, ideally under the aegis of COTED;
  - Impartial and Transparent;
  - Sufficient manpower and financial resources.
IMPLEMENTING THE RECOMMENDATIONS

STEPS FOR IMPLEMENTATION - TIMELINES

- The establishment of a Single Airspace Committee.
- Production and definition of documentation to formalize a Caribbean Single Airspace.
IMPLEMENTING THE RECOMMENDATIONS

STEPS FOR IMPLEMENTATION - TIMELINES

- Definition of TOR for consultants.
- Commission of consultant to execute recommendation of COTED.
WHERE ARE WE IN 2011?

1. The 2009 recommendations of CASSOS have been accepted.

2. The CARICOM Secretariat has been asked to secure funding to undertake the study.
CASSOS has identified **two** possible sources of funding for the study:


2. The Central American Safety Services Corporation (COCESNA). A grouping of Costa Rica, Guatemala, El Salvador, Honduras and Nicaragua. COCESNA is funded by air navigation fees derived directly from airlines for the mutual benefit of its members.
The Proposal of the Consortium of Edit Inc., et al

- To seek funding from USTAD for the study.

- **In the event of no funding from USTAD**
  
  1. The provision of over US$500 million towards the establishment of a regional single airspace to provide a seamless approach to air traffic in the Region.
  
  2. The establishment of an entity (CariControl) to collaborate with CASSOS and other aviation authorities in the region.
The Proposal of the Central American Safety Services Corporation (COCESNA)

- This grouping can fund the study.
- Has offered to enter into a relationship with CASSO for the mutual benefit of both organisations.
CASSOS has submitted the two offers to CARICOM.

CARICOM to approve one of the companies.

CARICOM to obtain funding if feasible.