



**Agenda Item 4 Transition of the AIM Subgroup, its Terms of Reference, Work Programme
and Task Forces into the AIM Programme and Projects**
**4.2 Project Integration for definition of metadata related to the AIM
Programme**

**NEED TO ACCELERATE THE ADOPTION OF SARPs AND GUIDANCE MATERIAL
REGARDING AICM / AIXM CONCEPTUAL MODELS**

(Presented by Cuba)

SUMMARY	
This paper presents the background of ICAO's intention to adopt conceptual models within its SARPs and the difficulties for States to work on their implementation before being adopted by ICAO.	
References:	
<ul style="list-style-type: none">• Roadmap prepared by the Air Navigation Commission on 2009• NACC/WG/3, Guatemala, 9 to 13 May 2011, WP/22 on "<i>Conceptual Models for Aeronautical Information and Data Exchange</i>"• GREPECAS/16 Final Report	
<i>Strategic Objectives</i>	<i>This working paper is related to Strategic Objective C.</i>

1. Introduction

1.1 Conceptual models for AICM and AIXM will guarantee, among other things, the unique data entry, the automatic incorporation of data in multiple publications, its digital distribution and will guarantee data with more precision, resolution and integrity.

1.2 Currently and considering the necessity to have the transition from AIS to AIM in order to support the new operational ATM concept, it is essential to implement the aeronautical information conceptual model (AICM) and the aeronautical exchange model (AIXM) as the basis for the electronic exchange of aeronautical information.

1.3 These models will support requirements for AIM information systems such as electronic AIPs, electronic charts, e-TOD data exchange and digital NOTAMs, among others.

2. Discussion

2.1 On the ICAO Roadmap, prepared by the Air Navigation Commission in 2009, it is foreseen that Phase 2, which was set to begin on November 2009, would start with the development of new related guidelines such as the electronic AIP, training and quality of the aeronautical information conceptual model, that would be prepared with the support of the AIS-AIMSG that was holding its second meeting by the end of 2009.

2.2 Therefore, the roadmap defines 3 phase and 21 steps that are recommended to be complied with by States in order to accomplish an effective transition to AIM.

2.3 Of these 21 steps, two are essentially focused on the operational concepts related with the aeronautical information conceptual model (AICM); for instance the P-8 step, foreseen for Phase 2, for this step, the roadmap establishes that it is essential to define the semantics of aeronautical information to manage it in terms of digital data structures in order to introduce operability; it also reflects that existing documentation prepared by States and International Organizations is considered mature enough to be implemented globally and it would be used to produce common guidance materials.

2.4 For the P-9 step – aeronautical information data exchange, foreseen for Phase 3, the roadmap establishes that it is of utmost importance to define the syntax of aeronautical information in order to exchange it in terms of names and types of fields thus introducing interoperability. Data exchange and mechanisms to exchange or access new products or digital services will be defined through an exchange model.

2.5 The European Community and the United States have developed these models, which confirm the need to adopt them, as well as the use by States and entities such as the FAA, EUROCONTROL and NAVCANADA.

2.6 States in the Region are currently requested to begin developing and implementing these models in their respective States, while ICAO adopt standards and recommended practices (SARPs) based on AICM/AIXM for Member States, but it would be feasible and safe to do so the other way around, as it should be; that is, ICAO is in the process of preparing these Standards since 2009, as mentioned in paragraphs 2.4 and 2.5; and once prepared and once they become SARPs, these standards can be followed by Contracting States for their implementation.

2.7 By doing so, the starting point for the implementation of these models and which AIXM version to use would be clear for States.

2.8 Otherwise, States would develop a version with the uncertainty to accomplish something that may differ with the ICAO proposal for not adopting the corresponding standard from the beginning.

2.9 Therefore, by using models that have not been officially adopted by ICAO, States are risking to misuse financial and human resources to develop versions that are not compatible with versions proposed by ICAO.

2.10 During the NACC Working Group Meeting recently held in Guatemala from 9 to 13 May 2011, the final report states under Agenda Item 5 – *Other Air Navigation activities to be analyzed and included in the NAM/CAR RPBANIP*, that in support of the implementation of AICM and AIXM models, the meeting urged ICAO to accelerate the preparation of standards and recommended practices (SARPs) to Annex 15 regarding the use of these models. However, Cuba is of the opinion that a Conclusion from the AIM/SG/13, is a more effective means to accelerate the adoption of SARPs and guidance material, and therefore proposes for the consideration of the Meeting, the Draft Conclusion contained in paragraph 3.1.

3. Suggested Action

3.1 The Meeting is invited to approve the following Draft Conclusion:

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CONCLUSION 13/XX

NEED TO ACCELERATE THE ADOPTION OF SARPS AND GUIDANCE MATERIAL REGARDING THE AICM/AIXM CONCEPTUAL MODELS FOR AERONAUTICAL DATA/INFORMATION EXCHANGE

That, the ICAO NACC Regional Office forwards to ICAO Headquarters the concern about the need to accelerate the adoption of standards and recommended practices (SARPs) and guidance material regarding the AICM/AIXM, to become official documents to be homogeneously implemented by all member States and allow the development and implementation of these models in a trustworthy and safe environment.