APPENDIX L

ANTIGUA AND BARBUDA - ATM/CNS TRANSITION PLAN

1.0 INTRODUCTION

1.1 Antigua and Barbuda recognizes the increasing limitations of the present air navigation system and the improvements needed to take civil aviation into the 21st century. The inherent limitations of the current system makes it necessary to transition to a new communication, navigation and surveillance (CNS) system to support future enhancements in air traffic control management (ATM) in conformity with the ICAO model and the regional plan for the E/CAR States.

2.0 BACKGROUND

2.1 The draft CAR/SAM ATM/CNS Transition Plan prepared by the ATM/CNS sub-group was approved by the fourth GREPECAS Meeting held in Panama City (1994 September 20-26). That meeting also required states to prepare national plans for the transition to a new ATM/CNS system taking into account the established guidelines in the CAR/SAM Region. It was noted that Regional Plans must allow for easy coordination with adjacent Regions.

3.0 SCOPE

3.1 The scope of the ATM/CNS Transition Plan for Antigua and Barbuda relates to the airspace under its jurisdiction, but does not include the plans for the State of St. Kitts and Nevis and the Colony of Montserrat which lie within the lateral limits of its airspace.

3.2 The terms below will have the following meanings for the purposes of this plan:

Short Term	1999 to 2003
Medium Term	2004 to 2008
Long Term	2009 to 2012 and beyond.

4.0 CURRENT SYSTEM LIMITATIONS

4.1 Communication

Air/Ground communication is effected through VHF propagation.

Controller/Controller communication is effected through the AFTN and landlines.

4.2 **Navigation**

A VOR/DME and two (2) NDBs are utilized for navigation within the Terminal Control Area.

A VOR/DME and NDBs are used for approaches at V.C. Bird International Airport.

4.3 **Surveillance**

Surveillance is achieved through Voice Position Reports.

Surveillance is also achieved through occasional SSR monitoring.

5.0 FUTURE ATM/CNS SYSTEM

5.1 Antigua and Barbuda recognizes that the ICAO ATM/CNS concept is being implemented globally and therefore accepts this concept.

5.2 This acceptance has therefore influenced the following plan for transition to the new ATM/CNS Plan.

5.3 **Communication**

5.3.1 **Short Term**

Continued use of VHF Communication.
Continued use of AFTN and landlines.
Implementation of improved AFS for the E/CAR.
Implementation of AIDC (to be determined)
Implementation of ATIS (to be determined)
Implementation of AMSS Data Voice (to be determined)
Implementation of VHF Data Link (to be determined)

5.3.2 **Medium Term**

Continued use of VHF Voice Communication
Continued use of AFTN and landlines
Implementation ATN
Implementation AIDC (to be determined)

5.3.3 **Long Term**

Continued use of VHF Voice Communication

Implementation of ATIS (to be determined
AMSS Data Voice (to be determined)
Implementation VHF Data Link (to be determined)
Continued use of ATN
Implementation of AIDC (to be determined)

5.4 **Navigation**

5.4.1 **Short Term**

Continued use of NDBs
Continued use of VOR/DME
Utilization of FMS/FMCS procedures

5.4.2 **Medium Term**

Continued use of NDBs
Continued use of VOR/DME
Continued utilization of FMS/FMCS procedures
Implement GNSS Navigation

5.4.3 **Long Term**

Withdrawal of NDBs
Continued use of VOR/DME
Continued utilization of FMS/FMCS procedures
Implement GNSS Navigation

5.5 **Surveillance**

5.5.1 **Short Term**

Continued utilization of Voice Position Reports
Mandatory carriage of transponders
Implementation of SSR (Mode C)

5.5.2 **Medium Term**

Continued utilization of Voice Position Reports
Mandatory carriage of transponders
Continued utilization of SSR (Mode C)
ADS (to be determined)

5.5.3 **Long Term**

Continued utilization of Voice Position Reports

Mandatory carriage of transponders
Continued utilization of SSR (Mode C)
Implementation of ADS (to be determined)

5.6 **Air Traffic Management**

5.6.1 **Short Term**

Evaluation of current ATM capacity
Dissemination of information on ATM/CNS concepts
Instruction and training on ATM/CNS
Dissemination of Human Aspects of ATM/CNS
Fixed RNAV Routes

5.6.2 **Medium Term**

Dissemination of information on ATM/CNS concepts
Instruction and training on ATM/CNS
Dissemination of Human Aspects of ATM/CNS
Fixed RNAV Routes

5.6.3 **Long Term**

Dissemination of information on ATM/CNS concepts
Instruction and training on ATM/CNS
Dissemination of Human Aspects of ATM/CNS
Fixed RNAV Routes
Application of ADS (to be determined)

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