



International Civil Aviation Organization

Sixth Meeting of CNS/MET of APANPIRG

Bangkok, Thailand, 15 – 19 July 2002

Agenda Item 10:

Review:

- a) **implementation of the ISCS and SADIS**
- b) **transition to the final phase of WAFS**

b) Review transition to the final phase of WAFS

**WORLD AREA FORECAST CENTER (WAFC) WASHINGTON WORK TOWARD
A FOLLOW-ON CONTRACT FOR THE INTERNATIONAL
SATELLITE COMMUNICATIONS SYSTEM (ISCS)**

(Presented by the United States)

Summary

This paper provides information on the efforts of WAFC Washington to provide a follow-on contract for the ISCS and to upgrade the protocol from X.25 to TCP/IP.

1. INTRODUCTION

1.1 The two WAFCs – London and Washington -- provide the ICAO World Area Forecast System satellite broadcasts, The Satellite Distribution System (SADIS), and ISCS to provide the meteorological information to approved users of WAFS information.

1.2 The contract for the existing ISCS will expire at the end of September 2003. Activities are under way for a successor to the existing system. This paper presents information on the ongoing activities for the new ISCS contract.

2. DISCUSSION

2.1 General

2.1.1 The primary goals of WAFC Washington are to continue satellite service to the member states without interruption during transition to the new contract, and to improve the existing system. The successor ISCS system is planned to improve performance of the existing data communications network by implementing the TCP/IP data communications network protocol. The users of the successor ISCS system will gain the following benefits from the change to TCP/IP:

- a) Increased data capacity during peak loads.
- b) Remote equipment diagnostics to reduce downtime.

The successor ISCS system will also provide:

- a) Leased data communications network facilities utilizing commercial, international satellites and other communication facilities to broadcast a broad range of WAFS Operational Meteorological (OPMET) products, and WMO required weather products and to collect a limited range of WMO required products from WMO Region IV sites.
- b) Leased equipment to interface the leased data communication network with the existing Very Small Aperture Terminals (VSAT) and workstations owned by the member States.

2.2 Transition from X.25 Protocol to the TCP/IP Protocol

2.2.1 To minimize possible problems for States and other authorized users of WAFS, transition to the successor ISCS system will provide both X.25 and TCP/IP data communications network protocols until the end of 2004. This will allow the member states time to upgrade or replace their existing X.25 ISCS workstations to support TCP/IP data communications protocol and will coincide with the new proposed Gridded Binary Fields (GRIB) and Binary Universal Form for the Representation of Meteorological Data (BUFR) data format additions.

2.2.2 With the expiration of the current contract by the end of September 2003, the United States will no longer provide WAFS and Region IV Meteorological Telecommunications Network (RMTN) data via the existing ISCS system but will then use only the successor ISCS system for providing these data. The transition from the existing ISCS system to the successor system will be performed with minimum service disruption to the member states. The commissioning of the successor ISCS system is planned to occur before mid September of 2003.

2.3 Additional and future information

2.3.1 Subsequent information on the progress of the procurement of the successor system, as well as WAFS information in general, is available through the WAFC Washington ISCS web page on the internet at: www.nws.noaa.gov/iscs. The procurement of the successor system is currently on schedule with award scheduled for October 2002.

3. CONCLUSION

3.1 WAFC Washington is working to renew the contract for ISCS, and at the same time to upgrade the system from X.25 to TCP/IP. To minimize the effect on WAFS users, the implementation of the new ISCS contract planned upgrade from X.25 to TCP/IP is timed to coincide with States having to acquire new workstations so they are capable of providing the necessary charts to flight crews from GRIB and BUFR coded messages in the final phase of WAFS.

3.2 The meeting is invited to note the material presented in this paper.