Informal South Pacific ATS Co-ordinating Group (ISPACG)
FANS Interoperability Team Meeting (FIT/17)
Brisbane, Australia, 9-10 March 2010
Meeting Report

Agenda Item 1 Feedback from Operators

Operators thanked the team for progress made over the year in improving daily operational benefits. Significant savings are being realized through the use of User Preferred Routes (UPRs), Dynamic Airborne Route Planning (DARP) and Tailored Arrival operations into SFO and LAX. Implementation of scheduled upgrades to ANSP ground automation systems making fulltime use of these procedures throughout the region will further increase in-service economic and environmental benefits.

Agenda Item 2 Feedback from Air Navigation Service Providers (ANSPs)

Network outages continue to be a concern. It was noted that the allowed outage time required to effectively sustain 30/30 separations for the entire year had already been exceeded by the time of the meeting. ANSPs urged the team to continue to investigate both technical and operational improvements to improve overall system availability. Several ANSPs provided status updates on progress being made to implement system improvements ranging from software block point updates to complete system replacement programs. Interoperability testing will be coordinated with the CRA to ensure systems continue to meet technical and operational requirements defined the GOLD.

Agenda Item 3 Feedback from DSPs

Both ARINC and SITA provided updates on the system upgrades they have completed over the last year. Several planned system updates were implemented by both service providers without any significant operational impact. DSPs have implemented comprehensive notification systems providing planned system maintenance as well as near real time problem alerting to affected stakeholders. Network outages over the period were acknowledged. In some cases networking fixes have been identified and implemented. DSPs continue to seek feedback from regional interoperability teams such as the ISPACG FIT for message and or aircraft traffic forecasts. This information is required to plan and schedule needed network system upgrades to meet the projected demand.

Agenda Item 4 CRA Problem Report Review

Problem reports filed since FIT 16 were reviewed. 98 PRs have been filed in the last year, and 69 of those from the South Pacific. Several noted communication performance issues related to the use of HF for datalink comms and to a B777 media management issue which prevents a timely transition from VHF to satcom. The B777 issue has been corrected in the AIMS Block Point Version 14 software. Also noted were issues with establishing and maintaining ADS-C and CPDLC connections with A3XX aircraft. It was noted that these problems have been addressed in the FANS-A+ standard. Individual problem report analysis details can be accessed via the FIT-CRA website hosted by Airways Corporation, NZ (http://www.ispacg-cra.com/).

Agenda Item 5 Update on Aircraft Operational Issues

No significant operational issues were raised. However ANSPs encouraged both new and established operators in the region to review section 5 of the GOLD documenting approved flight crew procedures. Examples of confusion on the use of weather deviation vs. offsets, inappropriate use of free text, accepting route clearance messages and not activating the uplinked route, creative logon procedures, and inadvertent activation of the ADS emergency mode, were provided as examples for operators to consider when updating their recurring training programs.

Agenda Item 6 Progress Toward the GOLD Standard

Tom Kraft from the FAA provided the group with a status update on the progress being made on adopting the new GOLD document. The Asia-Pacific Air Navigation Planning

and Implementation Regional Group (APANPIRG), the North Atlantic Systems Planning Group (NAT SPG), and others have recognized a need to globally harmonize data link operations and, to the greatest extent possible, resolve regional and/or State differences impacting seamless operations. At IPACG/29 and FIT/16, the ICAO Bangkok office and the FAA presented papers endorsing the global operational data link document (GOLD) concept. The GOLD will supersede the existing FANS Operation Manual (FOM) and the NAT Guidance Document and will be endorsed all states implementing FANS 1/A worldwide. Many SOPAC FIT participants have made significant contributions to the GOLD in an effort to achieve a true global standard for the use of FANS 1/A.

Although the group endorses the GOLD it has not yet gone through final approval which is scheduled for third quarter 2010. However, the group endorsed and adopted the GOLD procedures dealing with inadvertent activation of the Automatic Dependent Surveillance – Contract (ADS-C) Emergency mode in advance of final approval in the interest of improving operations and reducing both pilot and controller workload.

Agenda Item 7 Update on Implementation of RCP Performance Monitoring

The team recognized Airways New Zealand, and specifically Paul Radford, for work undertaken to provide comprehensive system performance data. In addition to Airways, the FAA is in the final stages of implementing a message latency monitoring system and will soon be providing monthly performance data as defined in the GOLD section 3.1.5. Other ATSUs within the region took actions to provide message latency data as defined in the GOLD to the CRA by the next meeting in 2011.

Agenda Item 8 SATCOM System Performance

INMARSAT
Message latency performance for INMARSAT based satcom systems improved over the previous year with both CPDLC and ADS-C performance meeting the 95% metric. Work continues to achieve the 99.9% metric for the entire data sample. However, it was noted that at least one airframe/operator within the region was meeting the 99.9% metric. The team is optimistic that scheduled improvements for airborne, satellite, network, and ground automation systems will lead to improvements in overall system performance.

Iridium
The team reviewed work being coordinated by the Performance-Based Operations Aviation Rulemaking Committee (PARC). Communication working Group (CWG) for the use of Iridium SATCOM systems to provide interoperable FANS 1/A communications services. There are two operators in the region now using Iridium SATCOM systems with approved FANS 1/A avionics. There is strong support from both operators and ANSPs for Iridium based SATCOM systems if they are shown to meet required system performance standards. Massage latency performance data showed comparable

performance to INMARSAT for both the 95% and 99.9% metric points for CPDLC. However ADS-C message latency performance was not meeting the 95% metric. Many FIT participants are working with the PARC CWG on methods to improve ADS-C message latency performance.

The team discussed the lack of progress being made within industry to develop long term plans to ensure the viability of SATCOM communications approved for safety services. Since the conclusion of the SATCOM Improvement Team (SIT) over a year ago little-to-no progress has been made on this important issue. During the FIT 16 in Santiago, Chile the FAA reported that they were conducting an internal study on the issue. However, no results are yet available. It was also noted that IATA has been asked to help coordinate operator inputs related to this important issue.

Agenda Item 9 SATCOM Voice as a Long Range Communication System, Update on the Communication Working Group SLRC Trial

The group discussed use of SATCOM voice in the region and the work being coordinated by the PARC CWG. The group noted that the North Atlantic region is proposing regional supplemental procedure to allow use of approved satellite voice communication systems for routine ATC communications. Both operators and ANSPs in the South Pacific region support the use of SATCOM for ATC communications. ARINC radio is collecting voice contact quantity and quality data and use of SATCOM voice for routine communications is increasing. The group acknowledged ARINC radio for the work they have done to enable the use of SATCOM voice in both the Oakland and New York radio facilities. Operators encouraged other ANSPs in the region to consider adding satcom voice capability to their work programs.

Agenda Item 10 HF Data Link

In June, 2008 Oakland ARTCC, Hawaiian Airlines, and ARINC commenced an operational trial of HF Data Link (HFDL). The data gathered during the trial will be evaluated against the criteria in RTCA DO-306, SAFETY AND PERFORMANCE STANDARD FOR AIR TRAFFIC DATA LINK SERVICES IN OCEANIC AND REMOTE AIRSPACE, to determine the suitability of the HF media for ATC data link communications.

Overall performance since December 2009 shows a slight degradation from previous reports, and HFDL is no longer meeting the requirements for RCP400. However, work continues to implement technical and procedural improvements. The region supports HF data link as backup to SATCOM data link communications and is preferred over the use of HF voice for routine communications and surveillance services.

Agenda Item 11 FOM RFCs

There were no RFC's (Request For Change) to the FANS Operations Manual (FOM) at this meeting due to the transition to the GOLD.

Agenda Item 12 Any Other Business

No other business was identified.