

Approved by General Counsel

TR-34 Meeting Report

Date(s): 02/18/2016 - 02/18/2016

Location: Virtual (conference call, web conference, etc.)

Approved: 04/08/2016

TITLE: TR-34 Meeting Report

DATE: February 18, 2016

SOURCE: Hughes Network Systems, Inc.

AUTHOR: Tony Noerpel (HNS)
Phone: 301-601-7449
Email: anthony.noerpel@hughes.com

RECOMMENDATION: Review and Approve

TR 34 Engineering Committee
SATELLITE EQUIPMENT & SYSTEMS
MEETING REPORT
February 18, 2016

1. Call to Order and Introduction

The Standards Committee, Satellite Equipment & Systems, TR-34, met at TIA's headquarters, 1320 North Courthouse Road, Arlington, Virginia and via teleconference. The Chair welcomed the participants and called the meeting to order at approximately 9:00 a.m.

GoToMeeting Dial-In & Screen Share Provided prior to meeting

The meeting ID for signing in was announced at the meeting.

IMPORTANT NOTICE OF PARTICIPATION

Participation in, or attendance at, any activity of a TIA Formulating Group or any sub-element thereof, constitutes acceptance of an agreement to be bound by all provisions of TIA Standards Development Procedures and permission that all communications and statements, oral or written, or other information disclosed or presented, and any translation or derivative thereof, may without compensation, and to the extent such participant or attendee may legally and freely grant such copyright rights, be distributed, published, and posted on TIA's web site, in whole or in part, on a non-exclusive basis by TIA or TIA's licensees or assignees, or as TIA directs. Exceptions to the foregoing may be granted or permitted in writing to the Chair of the Formulating Group by the head of the TIA Standards Department on a case-by-case basis.

Intellectual property rights (early disclosure policy)

The chairman read the TIA IPR statement, as found in the TIA Standards Development Procedures.

“TIA's Intellectual Property Rights Policy can be found in Statements of Policy (ANNEX D) and other clauses and annexes of this document. Participants in the work of the TIA Formulating Groups are urged to review the appropriate sections. Individual participants are encouraged to notify TIA of any patent(s) or published pending patent application(s) of which they are aware that may be essential to the practice of a proposed TIA Publication, including requirements introduced through normative references, early on in the development to reduce the possibility for delays in the development process and increase the likelihood that the proposed TIA Publication will become a Standard. However, a Patent Holder who has provided TIA with a TIA Patent Holder Statement with respect to the applicable proposed TIA Publication need not (but may elect to) identify its specific patent(s) or published pending patent application(s) that may be essential to the practice of the proposed TIA Publication in question. Patent searches are not required to comply with the TIA Intellectual Property Rights Policy.”

“TIA has an Intellectual Property Rights (IPR) Policy. We call to the attention of participants and attendees that TIA's Policy is to encourage, but not require, the voluntary disclosure (preferably early) of Essential Patent(s) and published pending patent application(s) that may be essential to the practice of a TIA Publication. Such disclosures are to be made following the procedures of

the TIA Intellectual Property Rights Policy. Additional information can be found in the TIA Intellectual Property Rights Guidelines.”

Participants in the work of the TR-34 are urged to review this policy. Participants were encouraged to notify TIA of any patents of which they are aware that are related to the practice of TIA publication early in the development of the TIA document to reduce the possibility for delays in the development process and increase the likelihood that the draft TIA publication will be approved for publication. If there is knowledge of patents, the use of which may be essential to any documents being considered by TIA TR-34. No new IPR was identified.

2. Attendance Registration

The meeting was attended by the following:

Name	Company
Noerpel, Tony	Hughes Network Systems
Jenkins, Teesha	TIA
Beljour, Herald	CIV USARMY RDECOM
Young, Paul	AASKI Technology, Inc.
Janardhan, Raghu	Hughes Network Systems
Sumit, Imrule	CIV USARMY RDECOM
Beeler , Michael	Comtech EF Data
Scardino , Paul	Globecomm

Quorum was achieved.

Apologies received:

Jim Hand, AASKI

3. Review and Approval of the Agenda

The proposed agenda, contribution 02.16.01 approved.

4. Introduction and Numbering of Contributions

Contributions and associated numbers received for this meeting were the following:

Number	Title	Source	Notes/Disposition
12.15.01	Meeting_Notice_Agenda	Tony Noerpel Chair	Approved
12.15.02_r0	TR 34 meeting report February , 2016	Tony Noerpel Chair	Review & approve by correspondence
12.15.03	Comment disposition to FAST document	Raghu Janardhan	comments
12.15.04	Final standard FAST, version 1.2, January 30, 2016	Raghu Janardhan	Review

5. Review and Approval of Meeting Report

Motion to approve TR-34 meeting report from 12/10/2015 was approved unanimously by voice vote.

The meeting report from this meeting, contribution 02.16.02, shall be circulated and approved by email after the meeting.

6. Correspondence and Liaisons

Tony Noerpel (Chair) reported on ETSI activities. TIA TR-34 has a liaison with ETSI SES MARESV to review and comment on technical reports regarding antenna performance characterization for GSO and NGSO mobile applications. TIA TR-34 has a liaison with ETSI SES SCN to review and comment on technical reports regarding receiver requirements. The Chair reported on new proposed receiver requirements for GNSS receivers in ETSI and ETSI SCN liaison with 3GPP activities regards 5G evolution with respect to a satellite specific waveform addressing round trip time and other satellite characteristics.

DVB is issuing a call for technologies for future satellite standards. Only a draft of this document currently exists.

7. Ballot Results

The ANSI/TIA-5041 FUTURE ADVANCED SATCOM TECHNOLOGIES (FAST) OPEN STANDARD DIGITAL-IF INTERFACE (OSDI) FOR SATCOM SYSTEMS ballot was approved. The Chair discussed the ANSI rules associated with the approved ballot and publication of the standard.

Herald Beljour made a motion seconded by Raghu Janardhan to approve publication of the ANSI/TIA-5041 FUTURE ADVANCED SATCOM TECHNOLOGIES (FAST) OPEN STANDARD DIGITAL-IF INTERFACE (OSDI) FOR SATCOM SYSTEMS standard. The motion passed unanimously.

8. Working Group Activities

Comments were solicited as part of our liaison with ETSI SES on the drafting of receiver standards for GNSS receivers.

9. New Business

The Chair requested members to consider new activities associated with GEO, LEO satellite standards and regulatory affairs, in particular ITU's Public Consultation on 2016-2019 Strategy in which TIA TR-34 might participate. Members should consider of high altitude platforms, spectrum sharing issues, new frequency bands such as Q, V and W bands and opportunities related to 5G standardization.

Vice Chairman Lars Erup has retired. Nominations are solicited. Herald Beljour nominated Jim Hand as a candidate for the open Vice Chair position. Hand is considering the nomination.

10. Assignments from the last Meeting

- The Chair to continue as liaison to DVB. On-going

- The chair to continue as liaison to ETSI SES. On-going
- Herald Beljour and Raghu Janardhan to address any outstanding comments to the FAST document. Completed

11. Future Work and Assignments

- The chair to continue as liaison to DVB.
- The chair to continue as liaison to ETSI SES.
- The chair to submit publication authorization form for the FAST document.
- The chair to create a presentation of 3GPP 5G activities related or relevant to the satellite community for the next meeting.
- The chair to create a presentation of ITU-19 activities related or relevant to the satellite community for the next meeting.

12. Future Meetings

The Working Group agreed to meet on the Thursday April 21, 2016 with the option to meet earlier if there is need.

13. Adjournment

The meeting was adjourned at 10:30 a.m.

This meeting was conducted in accordance with the TIA Legal Guide and the engineering procedures.