



**Electronic Working Tools;  
Giving recommendations for the  
usage of electronic working tools  
in the ETSI standardization process**

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ReferenceRSR/BOARD-00015

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Full standard:  
<https://standards.iteh.ai/catalog/standards/sist/f6dfe5e7-1835-4c00-8088-1b5c526fc256/etsi-sr-002-959-v1.3.2-2013-06>

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## Foreword

This Special Report (SR) has been produced by the ETSI Board GREEN AGENDA Ad-Hoc Group.

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## Introduction

The present document describes high level guidance for the use of electronic working tools considering performance, privacy and security, with a phased introduction of the collaboration tools necessary for effective remote participation in ETSI. The present document provides recommendations on when to use GoToMeeting™ and when to use GoToWebinar™, and also takes into account the time zone differences to ensure the maximum participation of members to electronic meetings.

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# 1 Scope

The present document describes electronic working tools, and a roadmap for their implementation including guidelines for the deployment and usage in the ETSI standardization process.

Annexes provide additional information on questionnaires to be completed by the users of these tools, concerning technical issues and standards that could help manufacturers to develop such tools.

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# 2 References

References are either specific (identified by date of publication and/or edition number or version number) or non-specific. For specific references, only the cited version applies. For non-specific references, the latest version of the reference document (including any amendments) applies.

Referenced documents which are not found to be publicly available in the expected location might be found at <http://docbox.etsi.org/Reference>.

NOTE: While any hyperlinks included in this clause were valid at the time of publication, ETSI cannot guarantee their long term validity.

## 2.1 Normative references

The following referenced documents are necessary for the application of the present document.

Not applicable.

## 2.2 Informative references

The following referenced documents are not necessary for the application of the present document but they assist the user with regard to a particular subject area.

- [i.1] EBU Recommendation R37-2007: "The relative timing of the sound and vision components of a television signal".

### Speech Terminals

- [i.2] ETSI ES 202 740: "Speech and multimedia Transmission Quality (STQ);Transmission requirements for wideband VoIP loudspeaking and handsfree terminals from a QoS perspective as perceived by the user".
- [i.3] ETSI ES 202 739: "Speech and multimedia Transmission Quality (STQ);Transmission requirements for wideband VoIP terminals (handset and headset) from a QoS perspective as perceived by the user".
- [i.4] ETSI ES 202 738: "Speech and multimedia Transmission Quality (STQ);Transmission requirements for narrowband VoIP loudspeaking and handsfree terminals from a QoS perspective as perceived by the user".
- [i.5] ETSI ES 202 737: "Speech and multimedia Transmission Quality (STQ);Transmission requirements for narrowband VoIP terminals (handset and headset) from a QoS perspective as perceived by the user".

### QoS and network performance metrics and measurement methods

- [i.6] ETSI ES 202 765-2: "Speech and multimedia Transmission Quality (STQ); QoS and network performance metrics and measurement methods; Part 2: Transmission Quality Indicator combining Voice Quality Metrics".
- [i.7] Void.

## Specification and measurement of speech transmission quality

- [i.8] Void.
- [i.9] Void.
- [i.10] ETSI EG 201 377-3: "Speech Processing, Transmission and Quality Aspects (STQ); Specification and measurement of speech transmission quality; Part 3: Non-intrusive objective measurement methods applicable to networks and links with classes of services".

## Audiovisual QoS for communication over IP networks

- [i.11] ETSI ES 202 667: "Speech and multimedia Transmission Quality (STQ); Audiovisual QoS for communication over IP networks".
- [i.12] Recommendation ITU-R BT.1359-1: "Relative timing of sound and vision for broadcasting".
- [i.13] ETSI ETS 300 807: "Integrated Services Digital Network (ISDN); Audio characteristics of terminals designed to support conference services in the ISDN".

# 3 Definitions and abbreviations

## 3.1 Definitions

For the purposes of the present document, the following terms and definitions apply:

**application sharing:** feature of many web conferencing applications that enables the conference participants to simultaneously share the same application

NOTE: The application itself resides on only one of the machines connected to the conference.

**attendee (or participant):** any person who joins a conference call or an electronic meeting with no pre-specified role

NOTE: By default, attendees can view the presenter's screen. An attendee may remotely control the presenter's computer screen if assigned the function. An attendee may optionally chat with other attendees, use drawing tools or view the participants list.

**blog:** web page that is made up of information about a particular subject, in which the newest information is always at the top of the page

**chairman:** presiding officer of a meeting who has the responsibility to determine the agenda for each meeting, and ensure that everyone operates in an efficient manner and in accordance with any previously agreed rules

**chat:** online real-time electronic text based conversation on the same screen (room) between two users or all users viewing the same screen

**co-located participants:** participants to an electronic meeting located in the same physical room

**conferencing terminal:** equipment that allows real-time point-to-point communications as well as multicast communication

**control panel:** gives organizers, panellists and attendees access to various in-session functions in the frame of an electronic meeting

**desktop/screen sharing:** feature of many web conferencing applications that enables the conference participants to simultaneously view (the contents of) the presenter's desktop

NOTE: The desktop itself resides on only one of the machines connected to the conference.

**drawing tools:** feature that allows organizers and panellists to use annotation tools to highlight elements of their presentation content

NOTE: These tools include highlighter, pen, spotlight and arrow functions.



**electronic mail:** computer-based messaging system where electronic text files (e-mails) can be exchanged across gateways linking different computer networks through the internet

**host:** person in charge of the organization of a physical meeting with co-located participants and remote participants

NOTE: The host has to ensure that the necessary Internet bandwidth is provided at the physical meeting place as well as the relevant conferencing terminals (and/or required audio/video equipment).

**keyboard/mouse control:** feature that allows organizers grant keyboard and mouse control to attendees during meetings

**organizer:** person with the corresponding account, who schedules, starts, manages and ends an electronic meeting

NOTE 1: An organizer can temporarily designate other attendees to be organizers or panellists (there can be simultaneously more than one organizer). Once an electronic meeting starts, the initial organizer is the default presenter and may either begin presenting or pass the presenter controls to any other organizer or panellist. The organizer can grant and revoke attendee privileges, such as passing the presenter role, sharing keyboard and mouse, inviting and dismissing attendees.

NOTE 2: The Chairman of a meeting can be designated as the Co-organizer for the purposes of launching, managing and ending the meeting.

**panellist:** guest who will be presenting (guest speaker) or answering questions (subject-matter expert) forwarded to him/her during a Webinar

NOTE: A panellist can be promoted to presenter at any time during the Webinar. An attendee can be promoted to a panellist.

**participant (or Attendee):** any person who joins a conference call or an electronic meeting with no pre-specified role

NOTE: By default, participants can view the presenter's screen. A participant may remotely control the presenter's computer screen if assigned the function. A participant may optionally chat with other participants, use drawing tools or view the participants list.

**practice Session:** allows organizers to practice their Webinar before going live

NOTE: Only organizers and panellists can join a Practice Session.

**presenter:** person showing his or her desktop to the electronic meeting audience

NOTE: The organizer is always designated as the first presenter. The presenter role can then be passed to another organizer, panellist or attendee. Presenters can show their complete desktops, a clean screen (with no icons or taskbar) or a specific application window to all attendees. Presenters may choose to pause showing their desktops or applications at any time. Presenters may grant other organizers or panellists the ability to control the presenter's mouse and keyboard.

**pre-session waiting room:** screen displayed any time attendees wait for a presenter to begin showing his or her screen

**Q&A:** feature that allows attendees to send text questions to organizers and panellists, who can respond with answers privately or to the entire audience

**raise hand:** feature that allows the participants of an electronic meeting to ask for microphone rights

NOTE: If the Chairman (with organizer rights) acknowledges an attendee's raised hand by "accepting" it, that allows the participant voice rights.

**recording:** feature that allows organizers to record meetings for later playback

NOTE: If an attendee is promoted to the role of organizer, he or she will be enabled to record the meeting.

**remote access:** access to a meeting through an electronic tool

**remote collaboration:** opportunity given to participants to be fully involved into an electronic or physical meeting through an electronic tool (e.g. online edition of a shared document)

**remote participants:** participants to a meeting through an electronic tool

**secretary:** person who has similar roles to a secretary in a physical meeting

**viewer window:** window that appears during an electronic meeting on the attendee's computer displaying the presenter's desktop or shared application

**web conferencing:** refers to a service that allows conferencing events to be shared with remote locations

NOTE: In general the service is made possible by Internet technologies, particularly on TCP/IP connections. The service allows real-time point-to-point communications as well as multicast communications from one sender to many receivers. It offers information of text-based messages, voice and video chat to be shared simultaneously, across geographically dispersed locations. Applications for web conferencing include meetings, events, or short presentations from any computer.

**wiki:** website whose users can add, modify, or delete its content via a web browser using a simplified markup language or a rich-text editor

NOTE: Wikis are typically powered by wiki software and are often used to create collaborative websites, to power community websites, for personal note taking, in corporate intranets, and in knowledge management systems.

## 3.2 Abbreviations

For the purposes of the present document, the following abbreviations apply:

AES	Advanced Encryption Standard
CEST	Central European Summer Time
CET	Central European Time
CPU	Central Processing Unit
CSN	Circuit Switching Network
DECT	Digital Enhanced Cordless Telephone
DST	Daylight Saving Time
DVB	Digital Video Broadcasting
EBU	European Broadcasting Union
EG	ETSI Guide
ES	ETSI Standard
ETS	ETSI Technical Specification
ETSI	European Telecommunications Standards Institute
HF	Human Factors
HTTP	HyperText Transfer Protocol
IEC	International Electrotechnical Commission
IETF	Internet Engineering Task Force
IP	Internet Protocol
IPR	Intellectual Property Rights
ISDN	Integrated Services Digital Network
ISO	International Organization for Standardization
ITU	International Telecommunication Union
ITU-R	ITU Radiocommunication Sector
ITU-T	ITU Telecommunication Standardization Sector
JTC	Joint Technical Committee
M2M	Machine-To-Machine
MCU	Multipoint Control Unit
PC	Personal Computer
PLMN	Public Land Mobile Networks
PSN	Packet Switching Network
PSTN	Public Switched Telephone Network
QoS	Quality of Service
RAM	Random Access Memory
SD	Standing Document
SMS	Short Message System
SR	Special Report
SSL	Secure Socket Layer
STF	Specialist Task Force

STQ	Speech and multimedia Transmission Quality
TC	Technical Committee
US	United States
USB	Universal Serial Bus
UTC	Universal Time Coordinated
VoIP	Voice over Internet Protocol

## 4 Electronic working tools and their usage in the standardization work

Several kinds of electronic tools may be used.

Some of them are to be used in real-time and simultaneously by the participants (e.g. GoToMeeting™, GoToWebinar™), others do not need the participants to be connected simultaneously (e.g. ETSI Portal).

The priority should be given, as far as possible, by ETSI to the provision and use of open and standardized tools. These tools should avoid as much as possible any intrusion on the Personal Computers of the participants. Privacy, security and access for all should be also major criteria to be taken into account.

The ETSI STF 354 website contains guidelines derived from the main known empirical user test results when user experience has been examined for one or more technical parameter. The user experience of an electronic working tool can be expected to vary according to many characteristics of the users, their communication purpose, the communication situation and technical parameters of the communication service. This information is available at: [http://portal.etsi.org/stfs/STF\\_HomePages/STF354/](http://portal.etsi.org/stfs/STF_HomePages/STF354/).

Detailed information on these guidelines is available in annex B.

### 4.1 Real-time electronic working tools

As indicated in the introduction, different types of electronic working tools may be used depending on the types of participations planned:

- Case 1: If all the participants are located in different physical locations and are using individual tools, these tools are mainly implemented on Personal Computers and are using the interfaces available on the Personal Computer (or that may be connected to the PC, e.g. headsets) and may be associated to phone terminals and conference bridges.
- Case 2: If some participants are located in one meeting room, the other participants are using individual tools, special attention should be paid to the equipment in the meeting room: all the participants in the meeting room should be close to the microphones to avoid impairment from background noises and room reverberation. The number of loudspeakers and their locations should be implemented to ensure the best hearing to the local participants and to avoid any howling. The distant users will use equipment similar to case 1.
- Case 3: When several groups of participants are located in different locations using group tools, telepresence systems could be used.

#### 4.1.1 Teleconferencing (audio conferencing)

A teleconference offers the possibility to several participants in different locations to participate to a meeting by means of telephones connected to a central switching unit.

Telephone conference is a very powerful tool as long as the speech quality is good enough for all the participants.

##### 4.1.1.1 Terminal equipment (for speech)

The participants to teleconferences may use different types of terminal equipment. The quality provided by this terminal equipment may have a strong impact on the quality.