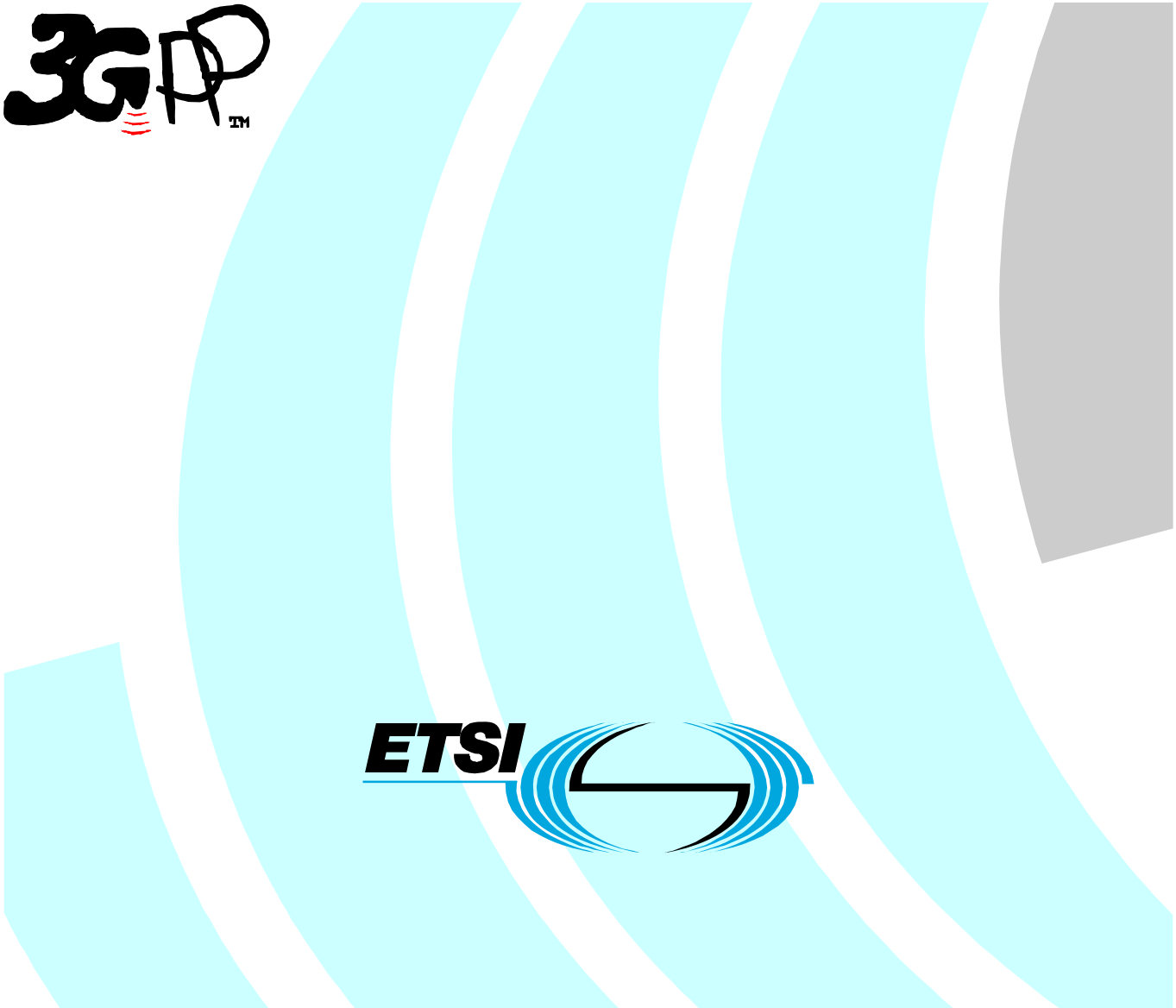
ETSI TS 134 229-2 V7.2.0 (2008-07)

Technical Specification

**Universal Mobile Telecommunications System (UMTS);
Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP);
Part 2: Implementation Conformance Statement (ICS) specification
(3GPP TS 34.229-2 version 7.2.0 Release 7)**



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Foreword

This Technical Specification (TS) has been produced by ETSI 3rd Generation Partnership Project (3GPP).

The present document may refer to technical specifications or reports using their 3GPP identities, UMTS identities or GSM identities. These should be interpreted as being references to the corresponding ETSI deliverables.

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Contents

Foreword

This Technical Specification has been produced by the 3rd Generation Partnership Project (3GPP).

The contents of the present document are subject to continuing work within the TSG and may change following formal TSG approval. Should the TSG modify the contents of the present document, it will be re-released by the TSG with an identifying change of release date and an increase in version number as follows:

Version x.y.z

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x the first digit:

1 presented to TSG for information;

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Introduction

To evaluate conformance of a particular implementation, it is necessary to have a statement of which capabilities and options have been implemented for a telecommunication specification. Such a statement is called an Implementation Conformance Statement (ICS).

The present document is 2rd part of a multi-part conformance test specification for UE and is *valid for 3GPP Release 5*. The specification contains the UE IMS CC capability and the applicability of the UE IMS CC conformance test cases.

3GPP TS 34.229-1 [5]: Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); User Equipment (UE) conformance specification; Part 1: Protocol conformance specification.

3GPP TS 34.229-2 (the present document): "Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); User Equipment (UE) conformance specification; Part 2: Implementation Conformance Statement (ICS) proforma specification" - current document.

3GPP TS 34.229-3 [6]: "Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); User Equipment (UE) conformance specification; Part 3: Abstract Test Suites (ATS)".

Note: For conformance testing of the UTRAN requirements refer to 3GPP TS 34.123 Parts 1 to 3 [2] [3] [4].

1 Scope

The present document provides the Implementation Conformance Statement (ICS) proforma for 3rd Generation User Equipment (UE) supporting the Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP), in compliance with the relevant requirements, and in accordance with the relevant guidance given in ISO/IEC 9646-7 [8] and ETS 300 406 [9].

The present document also specifies a recommended applicability statement for the test cases included in TS 34.229-1 [5]. These applicability statements are based on the features implemented in the UE.

The present document is valid for UE implemented according to 3GPP releases starting from Release 5 up to the Release indicated on the cover page of the present document.

2 References

The following documents contain provisions which, through reference in this text, constitute provisions of the present document.

- References are either specific (identified by date of publication, edition number, version number, etc.) or non-specific.
- For a specific reference, subsequent revisions do not apply.
- For a non-specific reference, the latest version applies. In the case of a reference to a 3GPP document (including a GSM document), a non-specific reference implicitly refers to the latest version of that document in the same Release as the present document.
  - For a Release 5 UE, references to 3GPP documents are to version 5.x.y, when available
  - For a Release 6 UE, references to 3GPP documents are to version 6.x.y, when available
  - For a Release 7 UE, references to 3GPP documents are to version 7.x.y, when available

[1] 3GPP TR 21.905: "Vocabulary for 3GPP Specifications".

[2] 3GPP TS 34.123-1: "User Equipment (UE) conformance specification; Part 1: Protocol conformance specification".

[3] 3GPP TS 34.123-2: "User Equipment (UE) conformance specification; Part 2: Implementation Conformance Statement (ICS) proforma specification".

[4] 3GPP TS 34.123-3: "User Equipment (UE) conformance specification; Part 3: Abstract Test Suites (ATS)".

[5] 3GPP TS 34.229-1: "Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); User Equipment (UE) conformance specification; Part 1: Protocol conformance specification ".

[6] 3GPP TS 34.229-3: "Internet Protocol (IP) multimedia call control protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); User Equipment (UE) conformance specification; Part 3: Abstract Test Suites (ATS)".

[7] ISO/IEC 9646-1: "Information technology - Open systems interconnection - Conformance testing methodology and framework - Part 1: General concepts".

[8] ISO/IEC 9646-7: "Information technology - Open systems interconnection - Conformance testing methodology and framework - Part 7: Implementation Conformance Statements".

[9] ETSI ETS 300 406: "Methods for testing and Specification (MTS); Protocol and profile conformance testing specifications; Standardization methodology".

[10] 3GPP TS 24.229: "IP Multimedia Call Control Protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP); Stage 3".

[11] 3GPP TS 26.234: "Transparent end-to-end Packet-switched Streaming Service (PSS); Protocols and codecs".

[12] 3GPP TS 33.203: "Access security for IP-based services".

[13] 3GPP TS 23.221: "Architectural requirements".

[14] 3GPP TS 26.235: "Packet switched conversational multimedia applications; Default codecs".

[15] RFC 3261: "SIP: Session Initiation Protocol".

[16] 3GPP TS 24.141: "Presence service using the IP Multimedia (IM) Core Network (CN) subsystem; Stage 3".

[17] 3GPP TS 24.247: "Messaging using the IP Multimedia (IM) Core Network (CN) subsystem; Stage 3".

[18] 3GPP TR 23.981: "Interworking aspects and migration scenarios for IPv4-based IP Multimedia Subsystem (IMS) implementations".

[19] 3GPP TS 24.147: "Conferencing using the IP Multimedia (IM) Core Network (CN) subsystem; Stage 3".

[20] RFC 3455: "Private Header (P-Header) Extensions to the Session Initiation Protocol (SIP) for the 3rd-Generation Partnership Project (3GPP)"

[21] RFC 3608: "Session Initiation Protocol (SIP) Extension Header Field for Service Route Discovery During Registration".

[22] RFC 3327: "Session Initiation Protocol Extension Header Field for Registering Non-Adjacent Contacts".

[23] RFC 3329: "Security Mechanism Agreement for the Session Initiation Protocol (SIP)".

[24] RFC 3680: "A Session Initiation Protocol (SIP) Event Package for Registrations".

[25] RFC 3486: 'Compressing the Session Initiation Protocol (SIP)'

[26] RFC 3312: "Integration of Resource Management and Session Initiation Protocol (SIP)".

[27] RFC 3262: "Reliability of provisional responses in Session Initiation Protocol (SIP)".

[28] RFC 3265: "Session Initiation Protocol (SIP) Specific Event Notification".

[29] RFC 3515: "The Session Initiation Protocol (SIP) REFER method".

[30] RFC 3311: "The Session Initiation Protocol (SIP) UPDATE method".

[31] RFC 3313: "Private Session Initiation Protocol (SIP) Extensions for Media Authorization".

[32] RFC 3323: "A Privacy Mechanism for the Session Initiation Protocol (SIP)".

[33] RFC 3325: "Private Extensions to the Session Initiation Protocol (SIP) for Network Asserted Identity within Trusted Networks".

[34] RFC 3428: "Session Initiation Protocol (SIP) Extension for Instant Messaging".

[35] RFC 3326: "The Reason Header Field for the Session Initiation Protocol (SIP)".

[36] RFC 3841: "Caller Preferences for the Session Initiation Protocol (SIP)"

[37] RFC 3903: "An Event State Publication Extension to the Session Initiation Protocol (SIP)".

[38] RFC 4028: "Session Timers in the Session Initiation Protocol (SIP)".

[39] RFC 3892: "The Session Initiation Protocol (SIP) Referred-By Mechanism".

[40] RFC 3891: "The Session Inititation Protocol (SIP) "Replaces" Header".

[41] RFC 3911: "The Session Inititation Protocol (SIP) "Join" Header".

[42] RFC 3840: "Indicating User Agent Capabilities in the Session Initiation Protocol (SIP)"

[43] RFC 3857: "A Watcher Information Event Template Package for the Session Initiation Protocol (SIP)".

[44] RFC 3856: "A Presence Event Package for the Session Initiation Protocol (SIP)".

[45] draft-ietf-sipping-config-framework-07 (July 2005): "A Framework for Session Initiation Protocol User Agent Profile Delivery".

Editor's note: The above document cannot be formally referenced until it is published as an RFC.

[46] draft-ietf-sipping-conference-package-12 (July 2005): "A Session Initiation Protocol (SIP) Event Package for Conference State"

Editor's note: The above document cannot be formally referenced until it is published as an RFC.

[47] RFC 2403 "The Use of HMAC-MD5-96 within ESP and AH".

[48] RFC 2404 "The Use of HMAC-SHA-1-96 within ESP and AH".

[49] RFC 3388: "Grouping of Media Lines in Session Description Protocol".

[50] RFC 3524: "Mapping of Media Streams to Resource Reservation Flows".

[51] RFC 3556: "Session Description Protocol (SDP) Bandwidth Modifiers for RTP Control Protocol (RTCP) Bandwidth".

[52] 3GPP TR 33.978: "Security aspects of early IP Multimedia Subsystem (IMS)".

[53] RFC 2451: "The ESP CBC-Mode Cipher Algorithms".

[54] RFC 3602: "The AES-CBC Cipher Algorithm and Its Use with IPsec".

[55] 3GPP TS 24.173: "IMS Multimedia Telephony Communication Service and supplementary services; stage 3"

[56] 3GPP TS 26.114: "IP Multimedia Subsystem (IMS); Multimedia Telephony; Media handling and interaction".

[57] RFC 4032 (March 2005): "Update to the Session Initiation Protocol (SIP) Preconditions Framework"

[58] RFC 4145 (September 2005): "TCP-Based Media Transport in the Session Description Protocol (SDP)".

[59] draft-ietf-mmusic-ice-17 (July 2007): "Interactive Connectivity Establishment (ICE): A Protocol for Network Address Translator (NAT) Traversal for Offer/Answer Protocols".

[60] RFC 4583 (November 2006): "Session Description Protocol (SDP) Format for Binary Floor Control Protocol (BFCP) Streams".

[61] RFC 4566 (June 2006): "SDP: Session Description Protocol".

[62] RFC 3267 (June 2002): "Real-Time Transport Protocol (RTP) Payload Format and File Storage Format for the Adaptive Multi-Rate (AMR) and Adaptive Multi-Rate Wideband (AMR-WB) Audio Codecs".

3 Definitions and abbreviations

3.1 Definitions

For the purposes of the present document, the following terms and definitions apply, in addition to those in TR 21.905 [1]:

- terms defined in the relevant 3GPP core specifications (see normative references);
- terms defined in ISO/IEC 9646-1 [7] and in ISO/IEC 9646-7 [8].

In particular, the following terms defined in ISO/IEC 9646-1 [7] apply:

Implementation Conformance Statement (ICS): statement made by the supplier of an implementation or system claimed to conform to a given specification, stating which capabilities have been implemented
The ICS can take several forms: protocol ICS, profile ICS, profile specific ICS, information object ICS, etc.

ICS proforma: document, in the form of a questionnaire, which when completed for an implementation or system becomes an ICS

3.2 Abbreviations

For the purposes of the present document, the abbreviations given in TR 21.905 [1] and the following apply. An abbreviation defined in the present document takes precedence over the definition of the same abbreviation, if any, in TR 21.905 [1].

ICS	Implementation Conformance Statement
SCS	System Conformance Statement
UEUT	User Equipment Under Test

4 Recommended test case applicability

The applicability of each individual test is identified in the table 1. This is just a recommendation based on the purpose for which the test case was written.

The applicability of every test is formally expressed by the use of Boolean expression that are based on parameters (ICS) included in annex A of the present document.

The columns in table 1 have the following meaning:

Clause

The clause column indicates the clause number in TS 34.229-1 [5] that contains the test body.

Title

The title column describes the name of the test.

Release

The release column indicates the earliest release from which each testcase is applicable, except if otherwise stated of an individual test case.

Applicability

The following notations are used for the applicability column:

R	recommended - the test case is recommended

O	optional – the test case is optional
N/A	not applicable - in the given context, the test case is not recommended.
Ci	conditional - the test is recommended ("R") or not ("N/A") depending on the support of other items. "i" is an integer identifying an unique conditional status expression which is defined immediately following the table. For nested conditional expressions, the syntax "IF ... THEN (IF ... THEN ... ELSE...) ELSE ..." is used to avoid ambiguities.

Comments

This column contains a verbal description of the condition included in the applicability column.

Table 1: Applicability of tests

Clause	Title	Release	Applicability	Comments
PDP Context Activation				
6.2	General Purpose PDP Context Establishment (UE Requests for a Dedicated PDP Context)	Rel-5	C04	UE capable of being configured to initiate Dedicated PDP Context
6.3	Dedicated PDP Context Establishment	Rel-5	C04	UE capable of being configured to initiate Dedicated PDP Context
P-CSCF Discovery				
7.1	P-CSCF Discovery via PDP Context	Rel-5	C05	UE capable of being configured to initiate P-CSCF Discovery via PCO
7.2	P-CSCF Discovery via DHCP – IPv4	Rel-5	C06	UE supporting IPv4 and capable of being configured to initiate P-CSCF Discovery via DHCPv4
7.3	P-CSCF Discovery via DHCP – IPv4 (UE Requests P-CSCF discovery via PCO)	Rel-5	C07	UE supporting IPv4, supporting P-CSCF Discovery via PCO and DHCPv4 and capable of being configured to initiate P-CSCF Discovery via PCO
7.4	P-CSCF Discovery by DHCP – IPv6	Rel-5	C08	UE capable of being configured to initiate P-CSCF Discovery via DHCPv6
7.5	P-CSCF Discovery by DHCP-IPv6 (UE Requests P-CSCF discovery by PCO)	Rel-5	C09	UE supporting P-CSCF Discovery via PCO and DHCPv6 and capable of being configured to initiate P-CSCF Discovery via PCO
7.6	P-CSCF Discovery by DHCP – IPv6 (UE does not Request P-CSCF discovery by PCO, SS includes P-CSCF Address(es) in PCO)	Rel-5	C10	UE supporting P-CSCF Discovery via PCO and DHCPv6 and capable of being configured to initiate P-CSCF Discovery via DHCPv6
7.7	Void			
7.8	Void			
Registration				
8.1	Initial registration	Rel-5	C17	UE supporting IMS security
8.2	User Initiated Re-Registration	Rel-5	C17	UE supporting IMS security
8.3	Mobile Initiated Deregistration	Rel-5	C17	UE supporting IMS security
8.4	Invalid Behaviour – 423 Interval Too Brief	Rel-5	C17	UE supporting IMS security
8.5	Initial registration for early IMS security	Rel-5	C18	UE supporting early IMS security only
8.6	Initial registration for combined IMS security and early IMS security	Rel-5	C19	UE supporting IMS security and early IMS security
8.7	Initial registration for combined IMS security and early IMS security with SIM application	Rel-5	C19	UE supporting IMS security and early IMS security
8.8	User initiated re-registration for early IMS	Rel-6	C18	UE supporting early IMS security only
8.9	Mobile initiated de-registration for early IMS	Rel-6	C18	UE supporting early IMS security only
Authentication				
9.1	Invalid Behaviour – MAC Parameter Invalid	Rel-5	C17	UE supporting IMS security
9.2	Invalid Behaviour – SQN out of range	Rel-5	C17	UE supporting IMS security
Subscription				
10.1	Invalid Behaviour – 503 Service Unavailable	Rel-5	R	
Notification				
11.1	Network-initiated deregistration	Rel-5	R	
11.2	Network initiated re-authentication	Rel-5	C17	UE supporting IMS security
Call Control				
12.1	MO Call Successful with preconditions (Rel-5)	Rel-5	FFS	FFS (see Note1 below)
12.2	MO Call – 503 Service Unavailable	Rel-5	FFS	FFS (see Note1 below)
12.3	Void			
12.4	MT Call (resource reservation, preconditions used)	Rel-6	FFS	FFS (see Note1 below)
12.5	MO Call (resource reservation, preconditions used) against SS (resource reservation, preconditions not used)	Rel-6	FFS	FFS (see Note1 below)
12.6	MT Call (resource reservation, preconditions not used)	Rel-6	FFS	FFS (see Note1 below)
12.7	MO Call (no resource reservation, preconditions not used)	Rel-6	FFS	FFS (see Note1 below)
12.8	MT Call (no resource reservation, preconditions not used)	Rel-6	FFS	FFS (see Note1 below)

Clause	Title	Release	Applicability	Comments
12.9	MO Call (no resource reservation, preconditions used)	Rel-6	FFS	FFS (see Note1 below)
12.10	MT Call (no resource reservation, preconditions used)	Rel-6	FFS	FFS (see Note1 below)
12.11	MO Call (resource reservation, preconditions used)	Rel-6	FFS	FFS (see Note1 below)
12.12	MO MTSI Voice Call Successful with preconditions	Rel-7	C22	UE supporting MTSI and speech
12.13	MT MTSI Speech call	Rel-7	C27	UE supporting MTSI and Initiating session and MTSI speech
12.15	MT MTSI Video call	Rel-7	C34	UE supporting MTSI and Initiating session and MTSI video
12.16	MO MTSI Text call	Rel-7	C26	UE capable of initiating a session and supporting preconditions and MTSI text, RTP
SIP Compression (SigComp)				
13.1	SigComp in the Initial registration	Rel-5	C17	UE supporting IMS security
13.2	SigComp in the MO Call	Rel-5	FFS	FFS (see Note1 below)
13.3	SigComp in the MT Call	Rel-5	FFS	FFS (see Note1 below)
13.4	Invalid Behaviour - State creation before authentication	Rel-5	C20	UE supporting IMS security and indicating (by using the "comp=sigcomp" parameter) its willingness to receive the responses and requests compressed from initial REGISTER onwards.
Emergency Service				
14.1	Emergency Call Initiation – Using CS domain	Rel-5	C11	UE supporting Emergency speech call
14.2	Emergency Call Initiation – 380 Alternative Service	Rel-5	C13	UE supporting Emergency speech call and capable of initiating a bidirectional voice session over IMS
Supplementary Services				
15.5	Communication Forwarding unconditional	Rel-7	C30	UE supporting MTSI and Communication Diversion
15.6	Communication Deflection	Rel-7	C31	UE supporting MTSI and speech and Communication Diversion
15.11	MO Call Hold without announcement	Rel-7	C23	UE supporting MTSI and speech and Communication Hold
15.12	MT Call Hold without announcement	Rel-7	C23	UE supporting MTSI and speech and Communication Hold
15.13	Incoming Communication Barring except for a specific user	Rel-7	C24	UE supporting MTSI and Communication Barring
15.17	Creating and leaving a conference	Rel-7	C32	UE supporting MTSI and Conference
15.23	MO Explicit Communication Transfer - Blind Call Transfer	Rel-7	C25	UE supporting MTSI and speech and Explicit Communication Transfer - blind transfer
15.24	MT Explicit Communication Transfer - Blind Call Transfer	Rel-7	C25	UE supporting MTSI and speech and Explicit Communication Transfer - blind transfer
15.25	MO Explicit Communication Transfer – Consultative Call Transfer	Rel-7	C29	UE supporting MTSI and speech and Explicit Communication Transfer - consultative transfer
15.26	MT Explicit Communication Transfer – Consultative Call Transfer	Rel-7	C29	UE supporting MTSI and speech and Explicit Communication Transfer - consultative transfer
Codec selecting				
16.1	Speech AMR, indicate all codec modes	Rel-7	C27	UE supporting Initiating session and MTSI speech
16.2	Speech AMR, indicate selective codec modes	Rel-7	C27	UE supporting MTSI and Initiating session and MTSI speech
16.3	Speech AMR-WB, indicate all codec modes	Rel-7	C28	UE supporting Initiating session and MTSI speech and MTSI speech, AMR wideband
16.4	Speech AMR-WB, indicate all codec modes	Rel-7	C28	UE supporting MTSI and Initiating session and MTSI speech and MTSI speech, AMR wideband
Media use cases				

Clause	Title	Release	Applicability	Comments
17.1	MO Speech, add video remove video	Rel-7	C33	UE supporting MTSI and speech, add/remove video
17.2	MT Speech, add video remove video	Rel-7	C35	UE supporting MTSI and Initiating session and MTSI speech and MTSI video and speech, add/remove video
17.4	MT Speech, add video remove speech	Rel-7	C36	UE supporting MTSI and Initiating session and MTSI speech and MTSI video and speech, add video remove speech
17.8	MT Video, add speech remove speech	Rel-7	FFS	FFS (see Note2 below)
	Conditions/Options			
C00	Void			
C01	IF A.4/2B THEN R ELSE N/A (condition unused, see Note1 below)			Initiating session
C02	Void			
C03	IF A.4/2B AND A.4/16 THEN R ELSE N/A (condition unused, see Note1)			Initiating session AND preconditions
C04	IF A.12/4 THEN R ELSE N/A			Dedicated PDP Context
C05	IF A.12/5 THEN R ELSE N/A			P-CSCF Discovery via PCO
C06	IF A.7/1 AND A.13/1 THEN R ELSE N/A			IPv4 AND configured to initiate P-CSCF discovery via DHCPv4
C07	IF A.7/1 AND A.12/8 AND A.13/2 AND A.12/5 THEN R ELSE N/A			IPv4 AND P-CSCF discovery via PCO AND P-CSCF discovery via DHCPv4 AND configured to initiate P-CSCF discovery via PCO
C08	IF A.12/7 THEN R ELSE N/A			Configured to initiate P-CSCF discovery via DHCPv6
C09	IF A.12/8 AND A.12/10 AND A.12/5 THEN R ELSE N/A			P-CSCF Discovery via PCO AND P-CSCF discovery via DHCPv6 AND configured to initiate P-CSCF discovery via PCO
C10	IF A.12/8 AND A.12/10 AND A.12/7 THEN R ELSE N/A			P-CSCF Discovery via PCO AND P-CSCF discovery via DHCPv6 AND configured to initiate P-CSCF discovery via DHCPv6
C11	IF [3] A.2/2 THEN R ELSE N/A			Emergency speech call
C12	IF A.7/1 THEN R ELSE N/A			IPv4
C13	IF A.2/2 AND A.12/12 THEN R ELSE N/A			Emergency speech call AND initiating a bidirectional voice session over IMS
C14	Void			
C15	Void			
C16	Void			
C17	IF A.6a/2 THEN R ELSE N/A			IMS security
C18	IF A.6a/1 AND NOT A.6a/2 THEN R ELSE N/A			Early IMS security AND NOT IMS security
C19	IF A.6a/2 AND A.6a/1 THEN R ELSE N/A			IMS security AND Early IMS security
C20	IF A.6a/2 AND A.8/5 THEN R ELSE N/A			IMS security AND indication of the willingness to receive the responses and requests compressed from initial REGISTER onwards by using the "comp=sigcomp" parameter
C21	IF A. 12/18 THEN R ELSE N/A			MTSI
C22	IF A. 12/18 AND A.15/1 THEN R ELSE N/A			MTSI and speech
C23	IF A. 12/18 AND A.15/1 AND A.16/6 THEN R ELSE N/A			MTSI and speech and Communication Hold
C24	IF A. 12/18 AND A.16/7 THEN R ELSE N/A			MTSI and Communication Barring
C25	IF A. 12/18 AND A.15/1 AND A.16/10 THEN R ELSE N/A			MTSI and speech and Explicit Communication Transfer - blind transfer
C26	IF A.4/2B AND A.4/16 AND A.15/7 THEN R ELSE N/A			Initiating session AND preconditions AND MTSI text, RTP
C27	IF A.12/18 AND A.4/2B AND A.15/1 THEN R ELSE N/A			MTSI AND Initiating session AND MTSI speech
C28	IF A.12/18 AND A.4/2B AND A.15/1 AND A.15/2 THEN R ELSE N/A			MTSI AND Initiating session AND MTSI speech AND MTSI speech, AMR wideband
C29	IF A. 12/18 AND A.15/1 AND A.16/11 THEN R ELSE N/A			MTSI and speech and Explicit Communication Transfer - consultative transfer
C30	IF A.12/18 AND A.16/5 THEN R ELSE N/A			MTSI and Communication Diversion
C31	IF A.12/18 AND A.16/5 AND A.15/1 THEN R ELSE N/A			MTSI and speech and Communication Diversion
C32	IF A.12/18 AND A.16/9 THEN R ELSE N/A			MTSI and Conference
C33	IF A.12/18 AND A.17/1 THEN R ELSE N/A			MTSI and speech, add/remove video
C34	IF A.12/18 AND A.4/2B AND A.15/3 THEN R ELSE N/A			MTSI AND Initiating session AND MTSI video

Clause	Title	Release	Applicability	Comments
C35	IF A.12/18 AND A.4/2B AND A.15/1 AND A.15/3 AND A.17/1 THEN R ELSE N/A			MTSI AND Initiating session AND MTSI speech AND MTSI video AND speech, add/remove video
C36	IF A.12/18 AND A.4/2B AND A.15/1 AND A.15/3 AND A.17/2 THEN R ELSE N/A			MTSI AND Initiating session AND MTSI speech AND MTSI video AND speech, add video remove speech

Note1: Applicability of test cases in clauses 12, 13.2 and 13.3 are currently marked as FFS. The reason to this is that the contents of the specific messages sent by the SS (as currently specified within those Call Control test cases) do not match the contents of those messages as expected by any specific IMS application known. Further on the test specification apparently lacks support for certain application specific message exchanges which are however mandatory for a few specific IMS applications specified outside of TS 24.229. It is necessary to fully resolve the problem (by e.g. defining the applications for which the Call Control test cases would be applicable, possibly specifying the extensions to the test cases like required by those applications and creating the corresponding application profiles) before the applicability statements of Call Control test cases can be unambiguously defined.

Note 2: Applicability of test case 17.8 and 17.10 are currently marked as FFS. The capability for an application to add and remove media has to be further investigated.

Annex A (normative): ICS proforma for 3rd Generation User Equipment supporting IP multimedia call control based on SIP and SDP

A.1 Guidance for completing the ICS proforma

A.1.1 Purposes and structure

The purpose of this ICS proforma is to provide a mechanism whereby a supplier of an implementation of the requirements defined in relevant specifications may provide information about the implementation in a standardised manner.

The ICS proforma is subdivided into clauses for the following categories of information:

- instructions for completing the ICS proforma;
- identification of the implementation;
- identification of the protocol;
- ICS proforma tables (for example: UE roles specific to additional capabilities, Major capabilities etc).

A.1.2 Abbreviations and conventions

This annex does not reflect dynamic conformance requirements but static ones. In particular, a condition for support of a PDU parameter does not reflect requirements about the syntax of the PDU (i.e. the presence of a parameter) but the capability of the implementation to support the parameter.

In the sending direction, the support of a parameter means that the implementation is able to send this parameter (but it does not mean that the implementation always sends it).

In the receiving direction, it means that the implementation supports the whole semantic of the parameter that is described in the main part of this specification.

As a consequence, PDU parameter tables in this annex are not the same as the tables describing the syntax of a PDU in the reference specification, e.g. RFC 3261 [15] tables 2 and 3. It is not rare to see a parameter which is optional in the syntax but mandatory in subclause below.

The ICS proforma contained in this annex is comprised of information in tabular form in accordance with the guidelines presented in ISO/IEC 9646-7 [8].

Item column

The item column contains a number which identifies the item in the table.

Item description column

The item description column describes in free text each respective item (e.g. parameters, timers, etc.). It implicitly means 'is <item description> supported by the implementation?'.

Reference column

The reference column gives reference to the relevant 3GPP core specifications.

Status column

The various statii used in this annex are in accordance with the rules in table A.1.

Table A.1: Key to status codes

Table A.1: Key to status codes

Status code	Status name	Meaning
m	mandatory	the capability shall be supported. It is a static view of the fact that the conformance requirements related to the capability in the reference specification are mandatory requirements. This does not mean that a given behaviour shall always be observed (this would be a dynamic view), but that it shall be observed when the implementation is placed in conditions where the conformance requirements from the reference specification compel it to do so. For instance, if the support for a parameter in a sent PDU is mandatory, it does not mean that it shall always be present, but that it shall be present according to the description of the behaviour in the reference specification (dynamic conformance requirement).
o	optional	the capability may or may not be supported. It is an implementation choice.
n/a	not applicable	it is impossible to use the capability. No answer in the support column is required.
x	prohibited (excluded)	It is not allowed to use the capability. This is more common for a profile.
c <integer>	conditional	the requirement on the capability ("m", "o", "n/a" or "x") depends on the support of other optional or conditional items. <integer> is the identifier of the conditional expression.
o.<integer>	qualified optional	for mutually exclusive or selectable options from a set. <integer> is the identifier of the group of options, and the logic of selection of the options.

Release column

The release column indicates the earliest release from which the capability or option is relevant.

Mnemonic column

The Mnemonic column contains mnemonic identifiers for each item.

Support column

The support column shall be filled in by the supplier of the implementation. The following common notations, defined in ISO/IEC 9646-7 [8], are used for the support column:

Y or y — supported by the implementation

N or n — not supported by the implementation

N/A, n/a or - — no answer required (allowed only if the status is N/A, directly or after evaluation of a conditional status)

References to items

For each possible item answer (answer in the support column) within the ICS proforma there exists a unique reference, used, for example, in the conditional expressions. It is defined as the table identifier, followed by a solidus character "/", followed by the item number in the table.

EXAMPLE: A.5/4 is the reference to the answer of item 4 in table A.5.

A.1.3 Instructions for completing the ICS proforma

The supplier of the implementation may complete the ICS proforma in each of the spaces provided. More detailed instructions are given at the beginning of the different clauses of the ICS proforma.

A.2 Identification of the User Equipment

Identification of the User Equipment should be filled in so as to provide as much detail as possible regarding version numbers and configuration options.

The product supplier information and client information should both be filled in if they are different.

A person who can answer queries regarding information supplied in the ICS should be named as the contact person.

A.2.1 Date of the statement

.....

A.2.2 User Equipment Under Test (UEUT) identification

UEUT name:

.....

.....

Hardware configuration:

.....

.....

.....

Software configuration:

.....

.....

.....

A.2.3 Product supplier

Name:

.....

Address:

.....

.....

.....

Telephone number:

.....

Facsimile number:

.....

E-mail address:

.....

Additional information:

.....

.....

.....

A.2.4 Client

Name:

.....

Address:

.....

.....

.....

Telephone number:

.....

Facsimile number:

.....

E-mail address:

.....

Additional information:

.....

.....

.....

A.2.5 ICS contact person

Name:

.....

Telephone number:

.....

Facsimile number:

.....

E-mail address:

.....

Additional information:

.....

.....

A.3 Identification of the protocol

This ICS proforma applies to the 3GPP standards listed in the normative references clause of the present document.

A.4 ICS proforma tables

NOTE: Tables A.2 to A.5, A.317 and A.318 have been based on tables with the same number in TS 24.229 [10]. In order to facilitate traceability, table and item numbers are the same as those in the corresponding tables in TS 24.229 [10].

A.4.1 Roles

Table A.2: Roles

Item	UE roles	Reference	Status	Release	Support
1	User agent	24.229 [10], A.2.1 RFC 3261 [15]	m	Rel-5	

Table A.3A: UE roles specific to additional capabilities

Item	UE roles	Reference	Status	Release	Support
2	Presence user agent	24.141 [16]	o	Rel-6	
4	Watcher	24.141 [16]	o	Rel-6	
12	Conference participant	24.147 [19]	o	Rel-6	
13	Messaging conference participant	24.247 [17], 5,3	o	Rel-6	

A.4.2 ICS related to SIP

A.4.2.1 Major capabilities

Table A.4: Major capabilities

Item	Does the implementation support	Reference	Status	Release	Support
	Capabilities within main protocol				
1	client behaviour for registration?	24.229 [10], A.2.1.2 RFC 3261 [15], 10.2	m	Rel-5	
2A	registration of multiple contacts for a single address of record	24.229 [10], A.2.1.2 RFC 3261 [15], 10.2.1.2, 16.6	o	Rel-6	
2B	initiating a session?	24.229 [10], A.2.1.2 RFC 3261 [15], 13	o	Rel-5	
2C	initiating a session which require local and/or remote resource reservation?	24.229 [10], A.2.1.2 RFC 3262 [27]	c19	Rel-6	
3	client behaviour for INVITE requests?	24.229 [10], A.2.1.2 RFC 3261 [15], 13.2	c18	Rel-5	
4	server behaviour for INVITE requests?	24.229 [10], A.2.1.2 RFC 3261 [15], 13.3	c18	Rel-5	
5	session release?	24.229 [10], A.2.1.2 RFC 3261 [15], 15.1	c18	Rel-5	
6	timestamping of requests?	24.229 [10], A.2.1.2 RFC 3261 [15], 8.2.6.1	o	Rel-5	
7	authentication between UA and UA?	24.229 [10], A.2.1.2 RFC 3261 [15], 22.2	o	Rel-5	
8A	authentication between UA and proxy?	24.229 [10], A.2.1.2 RFC 3261 [15], 20.28, 22.3	o	Rel-5	
9	server handling of merged requests due to forking?	24.229 [10], A.2.1.2 RFC 3261 [15], 8.2.2.2	m	Rel-5	
10	client handling of multiple responses due to forking?	24.229 [10], A.2.1.2 RFC 3261 [15], 13.2.2.4	m	Rel-5	
11	insertion of date in requests and responses?	24.229 [10], A.2.1.2 RFC 3261 [15], 20.17	o	Rel-5	
12	downloading of alerting information?	24.229 [10], A.2.1.2 RFC 3261 [15], 20.4	o	Rel-5	
	Extensions				
14	reliability of provisional responses in SIP?	24.229 [10], A.2.1.2 RFC 3262 [27]	c18	Rel-5	
15	the REFER method?	24.229 [10], A.2.1.2 RFC 3515 [29]	o	Rel-5	
			c33	Rel-6	
16	integration of resource management and SIP? (use of preconditions)	24.229 [10], A.2.1.2 RFC 3312 [26]	m	Rel-5	
			c44	Rel-6	
17	the SIP UPDATE method?	24.229 [10], A.2.1.2 RFC 3311 [30]	c18	Rel-5 [FFS for Rel-6]	
19	SIP extensions for media authorization?	24.229 [10], A.2.1.2 RFC 3313 [31]	o	Rel-5	
20	SIP specific event notification?	24.229 [10], A.2.1.2 RFC 3265 [28]	m	Rel-5	
22	acting as the notifier of event information?	24.229 [10], A.2.1.2 RFC 3265 [28]	o	Rel-5	
23	acting as the subscriber to event information?	24.229 [10], A.2.1.2 RFC 3265 [28]	m	Rel-5	
24	session initiation protocol extension header field for registering non-adjacent contacts?	24.229 [10], A.2.1.2 RFC 3327 [22]	m	Rel-5	
25	private extensions to the Session Initiation Protocol (SIP) for network asserted identity within trusted networks?	24.229 [10], A.2.1.2 RFC 3325 [33]	m	Rel-5	
26	a privacy mechanism for the Session	24.229 [10], A.2.1.2	m	Rel-5	

	Initiation Protocol (SIP)?	RFC 3323 [32]			
26A	request of privacy by the inclusion of a Privacy header indicating any privacy option?	24.229 [10], A.2.1.2 RFC 3323 [32]	o	Rel-5	
27	a messaging mechanism for the Session Initiation Protocol (SIP)?	24.229 [10], A.2.1.2 RFC 3428 [34]	o	Rel-5	
28	session initiation protocol extension header field for service route discovery during registration?	24.229 [10], A.2.1.2 RFC 3608 [21]	m	Rel-5	
29	compressing the session initiation protocol?	24.229 [10], A.2.1.2 RFC 3486 [25]	m	Rel-5	
30	private header extensions to the session initiation protocol for the 3rd-Generation Partnership Project (3GPP)?	24.229 [10], A.2.1.2 RFC 3455 [20]	m	Rel-5	
31	the P-Associated-URI header extension?	24.229 [10], A.2.1.2 RFC 3455 [20], 4.1	m	Rel-5	
32	the P-Called-Party-ID header extension?	24.229 [10], A.2.1.2 RFC 3455 [20], 4.2	o	Rel-5	
34	the P-Access-Network-Info header extension?	24.229 [10], A.2.1.2 RFC 3455 [20], 4.4	m	Rel-5	
37	security mechanism agreement for the session initiation protocol?	24.229 [10], A.2.1.2 RFC 3329 [23]	m	Rel-5	
38	the Reason header field for the session initiation protocol?	24.229 [10], A.2.1.2 RFC 3326 [35]	o	Rel-6	
40	caller preferences for the session initiation protocol?	24.229 [10], A.2.1.2 RFC 3841 [36]	c29	Rel-6	
40A	the proxy-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	o.5	Rel-6	
40B	the cancel-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	o.5	Rel-6	
40C	the fork-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	m	Rel-6	
40D	the recurse-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	o.5	Rel-6	
40E	the parallel-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	m	Rel-6	
40F	the queue-directive within caller-preferences?	24.229 [10], A.2.1.2 RFC 3841 [36], 9.1	o.5	Rel-6	
41	an event state publication extension to the session initiation protocol?	24.229 [10], A.2.1.2 RFC 3903 [37]	c30	Rel-6	
42	SIP session timer?	24.229 [10], A.2.1.2 RFC 4028 [38]	c19	Rel-6	
43	the SIP Referred-By mechanism?	24.229 [10], A.2.1.2 RFC 3892 [39]	c33	Rel-6	
44	the Session Inititation Protocol (SIP) 'Replaces' header?	24.229 [10], A.2.1.2 RFC 3891 [40]	c19	Rel-6	
45	the Session Inititation Protocol (SIP) 'Join' header?	24.229 [10], A.2.1.2 RFC 3911 [41]	c19	Rel-6	
46	the callee capabilities?	24.229 [10], A.2.1.2 RFC 3840 [42]	o	Rel-6	
47	an extension to the session initiation protocol for request history information?	24.229 [10], A.2.1.2	o	Rel-7	
48	Rejecting anonymous requests in the session initiation protocol?	24.229 [10], A.2.1.2	o	Rel-7	
49	session initiation protocol URIs for applications such as voicemail and interactive voice response	24.229 [10], A.2.1.2	o	Rel-7	
50	Session Initiation Protocol's (SIP) non-INVITE transactions?	24.229 [10], A.2.1.2	m	Rel-7	
51	the P-User-Database private header extension?	24.229 [10], A.2.1.2	o	Rel-7	
52	a uniform resource name for services	24.229 [10], A.2.1.2	m	Rel-7	
53	obtaining and using GRUUs in the Session Initiation Protocol (SIP)	24.229 [10], A.2.1.2	m (note 2)	Rel-7	
54	an extension to the session initiation protocol for request cpc information?	24.229 [10], A.2.1.2	n/a	Rel-7	
55	the Stream Control Transmission Protocol	24.229 [10], A.2.1.2	n/a	Rel-7	

	(SCTP) as a Transport for the Session Initiation Protocol (SIP)?				
56	the SIP P-Profle-Key private header extension?	24.229 [10], A.2.1.2	n/a	Rel-7	
57	managing client initiated connections in SIP?	24.229 [10], A.2.1.2	o	Rel-7	
58	indicating support for interactive connectivity establishment in SIP?	24.229 [10], A.2.1.2	o	Rel-7	
59	multiple-recipient MESSAGE requests in the session initiation protocol?	24.229 [10], A.2.1.2	c48	Rel-6	
60	SIP location conveyance	24.229 [10], A.2.1.2	m	Rel-7	
61	referring to multiple resources in the session initiation protocol?	24.229 [10], A.2.1.2	c50	Rel-7	
62	conference establishment using request-contained lists in the session initiation protocol?	24.229 [10], A.2.1.2	c18	Rel-7	
63	subscriptions to request-contained resource lists in the session initiation protocol?	24.229 [10], A.2.1.2	c53	Rel-7	
64	dialstring parameter for the session initiation protocol uniform resource identifier?	24.229 [10], A.2.1.2	c19	Rel-7	
65	the P-Answer-State header extension to the session initiation protocol for the open mobile alliance push to talk over cellular?	24.229 [10], A.2.1.2	o	Rel-7	
66	the SIP P-Early-Media private header extension for authorization of early media?	24.229 [10], A.2.1.2	o	Rel-7	
71	addressing an amplification vulnerability in session initiation protocol forking proxies?	24.229 [10], A.2.1.2	n/a	Rel-6	
72	the remote application identification of applying signaling compression to SIP	24.229 [10], A.2.1.2	m	Rel-7	
73	a session initiation protocol media feature tag for MIME application sub-types?	24.229 [10], A.2.1.2	o	Rel-7	
74	Identification of communication services in the session initiation protocol?	24.229 [10], A.2.1.2	o	Rel-7	

	Conditions/Options	
c18	IF A.4/2B THEN m ELSE n/a	initiating sessions.
c29	IF A.4/40A OR A.4/40B OR A.4/40C OR A.4/40D OR A.4/40E OR A.4/40F THEN m ELSE n/a	support of any directives within caller preferences for the session initiation protocol.
c30	IF A.3A/2 THEN m ELSE o	presence user agent.
c19	IF A.4/2B THEN o ELSE n/a	initiating sessions.
c33	IF A.3A/12 OR A.4/44 THEN m ELSE o	conference participant or the Session Inititation Protocol (SIP) "Replaces" header.
c44	IF A.4/2C THEN m ELSE o	initiating a session which require local and/or remote resource reservation
c48	IF A.4/27 THEN o ELSE n/	support for messaging
c50	IF A.4/15 THEN o ELSE n/a	the REFER method
c53	IF A.4/20 THEN o ELSE n/a	SIP specific event notification.
o.5	At least one of these capabilities is supported.	

NOTE 2: If a UE is unable to become engaged in a service that potentially requires the ability to identify and interact with a specific UE even when multiple UEs share the same single Public User Identity then the UE support can be "o" instead of "m". Examples include telemetry applications, where point-to-point communication is desired between two users.

Table A.4A: Supported event packages

Item	Does the implementation support	Reference	Subscriber			Notifier		
			Status	Release	Support	Status	Release	Support
1	reg event package?	24.229 [10], 5.1.1.3, A.2.1.2 RFC 3680 [24]	m	Rel-5		n/a	Rel-5	
2	refer package?	24.229 [10], A.2.1.2 RFC 3515 [29], 3	c13	Rel-6		c13	Rel-6	
3	presence package?	24.229 [10], A.2.1.2 RFC 3856 [44], 6	c5	Rel-6		c2	Rel-6	
4	eventlist with underlying presence package?	24.229 [10], A.2.1.2 RFC 3856 [44], 6	c5	Rel-6		c2	Rel-6	
5	presence.winfo template-package?	24.229 [10], A.2.1.2 RFC 3857 [43], 4	c9	Rel-6		c2	Rel-6	
6	ua-profile package?	24.229 [10], A.2.1.2 [45], 3	o	Rel-6		c2	Rel-6	
7	conference package?	24.229 [10], A.2.1.2 [46], 3	c21	Rel-6		c2	Rel-6	
	Conditions/Options							
c2	IF A.4/22 THEN o ELSE n/a					acting as the notifier of event information.		
c5	IF A.3A/4 THEN m ELSE o					watcher.		
c9	IF A.3A/2 THEN m ELSE o					presence user agent		
c13	IF A.4/15 THEN m ELSE n/a					the REFER method		
c21	IF A.3A/12 THEN m ELSE o					conference participant		

A.4.2.2 PDUs

Table A.5: Supported methods

Item	PDU	Reference	Sending			Receiving		
			Status	Release	Support	Status	Release	Support
1	ACK request	RFC 3261 [15], 13	c10	Rel-5		c11	Rel-5	
2	BYE request	RFC 3261 [15], 15.1	c12	Rel-5		c12	Rel-5	
3	BYE response	RFC 3261 [15], 15.1	c12	Rel-5		c12	Rel-5	
4	CANCEL request	RFC 3261 [15], 9	m	Rel-5		m	Rel-5	
5	CANCEL response	RFC 3261 [15], 9	m	Rel-5		m	Rel-5	
8	INVITE request	RFC 3261 [15], 13	c10	Rel-5		c11	Rel-5	
9	INVITE response	RFC 3261 [15], 13	c11	Rel-5		c10	Rel-5	
9A	MESSAGE request	RFC 3428 [34], 4	m	Rel-5		m	Rel-5	
9B	MESSAGE response	RFC 3428 [34], 4	m	Rel-5		m	Rel-5	
10	NOTIFY request	RFC 3265 [28], 8.1.2	c4	Rel-5		m	Rel-5	
11	NOTIFY response	RFC 3265 [28], 8.1.2	m	Rel-5		c4	Rel-5	
12	OPTIONS request	RFC 3261 [15], 11	m	Rel-5		m	Rel-5	
13	OPTIONS response	RFC 3261 [15], 11	m	Rel-5		m	Rel-5	
14	PRACK request	RFC 3262 [27], 6	c5	Rel-5		c5	Rel-5	
15	PRACK response	RFC 3262 [27], 6	c5	Rel-5		c5	Rel-5	
16	REFER request	RFC 3515 [29], 3	c1	Rel-5		c1	Rel-5	
17	REFER response	RFC 3515 [29], 3	c1	Rel-5		c1	Rel-5	
18	REGISTER request	RFC 3261 [15], 10	m (note)	Rel-5		n/a (note)	Rel-5	
19	REGISTER response	RFC 3261 [15], 10	n/a (note)	Rel-5		m (note)	Rel-5	
20	SUBSCRIBE request	RFC 3265 [28], 8.1.1	m	Rel-5		c4	Rel-5	
21	SUBSCRIBE response	RFC 3265 [28], 8.1.1	c4	Rel-5		m	Rel-5	
22	UPDATE request	RFC 3312 [26], 6.1	c6	Rel-5		c6	Rel-5	
23	UPDATE response	RFC 3312 [26], 6.2	c6	Rel-5		c6	Rel-5	

	Conditions/Options	
c1	IF A.4/15 THEN m ELSE n/a	the REFER method extension.
c4	IF A.4/22 THEN m ELSE n/a	notifier of event information.
c5	IF A.4/14 THEN m ELSE n/a	reliability of provisional responses extension.
c6	IF A.4/17 THEN m ELSE n/a	the SIP update method extension.
c10	IF A.4/3 THEN m ELSE n/a	client behaviour for INVITE requests.
c11	IF A.4/4 THEN m ELSE n/a	server behaviour for INVITE requests.
c12	IF A.4/5 THEN m ELSE n/a	session release.
NOTE:	No statement is included in TS 24.229 [10], Rel-5. It is assume to be the same as in TS 24.229 [10], Rel-6	

A.4.2.3 Security

Table A.6a: Security scheme

Item	Security scheme	Reference	Status	Release	Support
1	Early IMS security	33.978 [52]	o.1	Rel-5	
2	IMS security	24.229 [10]	o.1	Rel-5	
	Conditions/Options				
o.1	At least one of these options has to be supported				

NOTE: Support of early IMS is considered as the replacement for IMS security (mandatory requirement as specified in TS 24.229).

Table A.6b: Security capabilities

Item	Security capabilities	Reference	Status	Release	Support
1	'ipsec-3gpp' security mechanism	RFC 3329 [23] 24.229 [10], 5.1.1.2	c1	Rel-5	
2	IMS-AKA authentication protocol	33.203 [12], 5.1.1	c1	Rel-5	
3	IPSec ESP integrity protection	33.203 [12], 6.3	c1	Rel-5	
4	HMAC-MD5-96 integrity algorithm	RFC 2403 [47] 24.229 [10], 5.1.1.2	c1	Rel-5	
5	HMAC-SHA-1-96 integrity algorithm	RFC 2404 [48] 24.229 [10], 5.1.1.2	c1	Rel-5	
6	IPSec protocol Transport mode	33.203 [12], annex H	c1	Rel-5	
7	Setup of two pairs of security associations	33.203 [12], 6.1 24.229 [10], 5.1.1.2	c1	Rel-5	
8	Procedures to announce support of IPSec algorithms	RFC 3329 [23] 24.229 [10], 5.1.1.2	c1	Rel-5	
9	Void				
10	IPSec ESP confidentiality protection	33.203 [12], 6.2	c2	Rel-6	
11	DES-EDE3-CBC encryption algorithm	RFC 2451 [53] 24.229 [10], 5.1.1.2	c2	Rel-6	
12	AES-CBC encryption algorithm	RFC 3602 [54] 24.229 [10], 5.1.1.2	c2	Rel-6	
	Conditions/Options				
c1	IF A.6a/2 THEN m else n/a			IMS security	
c2	IF A.6a/2 THEN o else n/a			IMS security	

A.4.2.4 Addressing

Table A.7: IP address format

Item	IP address format	Reference	Status	Release	Mnemonic	Support
1	IPv4	23.221 [13], 5.1	o	Rel-5		
2	IPv6	23.221 [13], 5.1	m	Rel-5		
NOTE 1: For testing purposes, at least one of these IP address format has to be supported by the UE.						

A.4.2.5 SIP Compression

Table A.8: SIP Compression

Item		Reference	Status	Release	Support
1	SigComp	24.229 [10], 8.1.1	m	Rel-5	
2	SIP dictionary	24.229 [10], 8.1.1	m	Rel-5	
3	Compression of transmitted SIP messages	24.229 [10], 8.1.2	o	Rel-5	
4	Decompression of received SIP messages	24.229 [10], 8.1.2	m	Rel-5	
5	Indicate the willingness to receive the responses and requests compressed from initial REGISTER onwards by using the "comp=sigcomp" parameter	24.229 [10], 8.1.1	o	Rel-5	

A.4.3 ICS related to SDP

The SDP tables A.317-319 are copied and updated from TS 24.229 [10] clause A.3.2.1 and A.3.2.2. Non UE user agent role (A.2/1) requirements are removed, the RFC status columns are renamed to include a release indication and the references are according to TS 34.229-2.

A.4.3.1 Major capabilities

Table A.317: Major capabilities

Item	Does the implementation support	Reference	Release	Profile status
	Capabilities within main protocol			
	Extensions			
22	integration of resource management and SIP?	[26] [57]	Rel-7	m
23	grouping of media lines	[49]	Rel-7	m
24	mapping of media streams to resource reservation flows	[50]	Rel-7	m
25	SDP bandwidth modifiers for RTCP bandwidth	[51]	Rel-7	o (NOTE 1)
26	TCP-based media transport in the dession description protocol	[58]	Rel-7	o
27	interactive connectivity establishment?	[59]	Rel-7	o
28	session description protocol format for binary floor control protocol streams?	[60]	Rel-7	o
NOTE 1: For "video" and "audio" media types that utilise RTP/RTCP, if the RTCP bandwidth level for the session is different than the default RTCP bandwidth as specified in RFC 3556 [56], then, it shall be specified. For other media types, it may be specified.				

A.4.3.2 SDP types

Table A.318: SDP types

Item	Type	Sending			Receiving		
		Ref.	Release	Profile status	Ref.	Release	Profile status
	Session level description						
1	v= (protocol version)	[61] 5.1	Rel-7	m	[61] 5.1	Rel-7	m
2	o= (owner/creator and session identifier)	[61] 5.2	Rel-7	m	[61] 5.2	Rel-7	m
3	s= (session name)	[61] 5.3	Rel-7	m	[61] 5.3	Rel-7	m
4	i= (session information)	[61] 5.4	Rel-7	o	[61] 5.4	Rel-7	m
5	u= (URI of description)	[61] 5.5	Rel-7	n/a	[61] 5.5	Rel-7	n/a
6	e= (email address)	[61] 5.6	Rel-7	n/a	[61] 5.6	Rel-7	n/a
7	p= (phone number)	[61] 5.6	Rel-7	n/a	[61] 5.6	Rel-7	n/a
8	c= (connection information)	[61] 5.7	Rel-7	c5	[61] 5.7	Rel-7	m
9	b= (bandwidth information)	[61] 5.8	Rel-7	o (NOTE 1)	[61] 5.8	Rel-7	m
	Time description (one or more per description)						
10	t= (time the session is active)	[61] 5.9	Rel-7	m	[61] 5.9	Rel-7	m
11	r= (zero or more repeat times)	[61] 5.10	Rel-7	n/a	[61] 5.10	Rel-7	n/a
	Session level description (continued)						
12	z= (time zone adjustments)	[61] 5.11	Rel-7	n/a	[61] 5.11	Rel-7	n/a
13	k= (encryption key)	[61] 5.12	Rel-7	x	[61] 5.12	Rel-7	n/a
14	a= (zero or more session attribute lines)	[61] 5.13	Rel-7	o	[61] 5.13	Rel-7	m
	Media description (zero or more per description)						
15	m= (media name and transport address)	[61] 5.14	Rel-7	o	[61] 5.14	Rel-7	m
16	i= (media title)	[61] 5.4	Rel-7	o	[61] 5.4	Rel-7	m
17	c= (connection information)	[61] 5.7	Rel-7	c1	[61] 5.7	Rel-7	c1
18	b= (bandwidth information)	[61] 5.8	Rel-7	o (NOTE 1)	[61] 5.8	Rel-7	
19	k= (encryption key)	[61] 5.12	Rel-7	x	[61] 5.12	Rel-7	n/a
20	a= (zero or more media attribute lines)	[61] 5.13	Rel-7	o	[61] 5.13	Rel-7	m
c1:	IF A.318/15 THEN m ELSE n/a.						
c5:	IF A.318/17 THEN o ELSE m - - "c=" contained in all media description.						
NOTE 1:	For "video" and "audio" media types that utilise RTP/RTCP, it shall be specified. For other media types, it may be specified.						

Prerequisite A.318/14 OR A.318/20 - - a= (zero or more session/media attribute lines)

Table A.319: zero or more session / media attribute lines (a=)

Item	Field	Sending			Receiving		
		Ref.	Release	Profile status	Ref.	Release	Profile status
1	category (a=cat)	[61] 6	Rel-7	c8	[61] 6	Rel-7	c9
2	keywords (a=keywds)	[61] 6	Rel-7	c8	[61] 6	Rel-7	c9
3	name and version of tool (a=tool)	[61] 6	Rel-7	c8	[61] 6	Rel-7	c9
4	packet time (a=ptime)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
5	maximum packet time (a=maxptime)	[61] 6, [62] 8	Rel-7	c10	[61] 6, [62] 8	Rel-7	c11
6	receive-only mode (a=recvonly)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
7	send and receive mode (a=sendrecv)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
8	send-only mode (a=sendonly)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
8A	Inactive mode (a=inactive)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
9	whiteboard orientation (a=orient)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
10	conference type (a=type)	[61] 6	Rel-7	c8	[61] 6	Rel-7	c9
11	character set (a=charset)	[61] 6	Rel-7	c8	[61] 6	Rel-7	c9
12	language tag (a=sdplang)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
13	language tag (a=lang)	[61] 6	Rel-7	o	[61] 6	Rel-7	m
14	frame rate (a=framerate)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
15	quality (a=quality)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
16	format specific parameters (a=fmtp)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
17	rtpmap attribute (a=rtpmap)	[61] 6	Rel-7	c10	[61] 6	Rel-7	c11
18	current-status attribute (a=curr)	[26] 5	Rel-7	c1	[26] 5	Rel-7	c2
19	desired-status attribute (a=des)	[26] 5	Rel-7	c1	[26] 5	Rel-7	c2
20	confirm-status attribute (a=conf)	[26] 5	Rel-7	c1	[26] 5	Rel-7	c2
21	media stream identification attribute (a=mid)	[49] 3	Rel-7	c3	[49] 3	Rel-7	c4
22	group attribute (a=group)	[49] 4	Rel-7	c5	[49] 3	Rel-7	c6
23	setup attribute (a=setup)	[58] 4	Rel-7	c7	[58] 4	Rel-7	c7
24	connection attribute (a=connection)	[58] 5	Rel-7	c7	[58] 5	Rel-7	c7
25	candidate IP addresses (a=candidate)	[59]	Rel-7	c12	[59]	Rel-7	c13
26	floor control server determination (a=floorctrl)	[60] 4	Rel-7	c14	[60] 4	Rel-7	c14
27	conference id (a=confid)	[60] 5	Rel-7	c14	[60] 5	Rel-7	c14
28	user id (a=userid)	[60] 5	Rel-7	c14	[60] 5	Rel-7	c14
29	association between streams and floors (a=floorid)	[60] 6	Rel-7	c14	[60] 6	Rel-7	c14

c1:	IF A.317/22 AND A.318/20 THEN o ELSE n/a - - integration of resource management and SIP, media level attribute name "a=".
c2:	IF A.317/22 AND A.318/20 THEN m ELSE n/a - - integration of resource management and SIP, media level attribute name "a=".
c3:	IF A.317/23 AND A.318/20 THEN o ELSE n/a - - grouping of media lines, media level attribute name "a=".
c4:	IF A.317/23 AND A.318/20 THEN m ELSE n/a - - grouping of media lines, media level attribute name "a=".
c5:	IF A.317/23 AND A.318/14 THEN o ELSE n/a - - grouping of media lines, session level attribute name "a=".
c6:	IF A.317/23 AND A.318/14 THEN m ELSE n/a - - grouping of media lines, session level attribute name "a=".
c7:	IF A.317/26 AND A.318/20 THEN m ELSE n/a - - TCP-based media transport in the dession description protocol, media level attribute name "a=".
c8:	IF A.318/14 THEN o ELSE x - - session level attribute name "a=".
c9:	IF A.318/14 THEN m ELSE n/a - - session level attribute name "a=".
c10:	IF A.318/20 THEN o ELSE x - - media level attribute name "a=".
c11:	IF A.318/20 THEN m ELSE n/a - - media level attribute name "a=".
c12:	IF A.317/27 AND A.318/20 THEN o ELSE n/a - - candidate IP addresses, media level attribute name "a=".
c13:	IF A.317/27 AND A.318/20 THEN m ELSE n/a - - candidate IP addresses, media level attribute name "a=".
c14:	IF A.317/28 AND A.318/20 THEN m ELSE n/a - - session description protocol format for binary floor control protocol streams, media level attribute name "a=".

A.4.4 ICS related to Packet-switched Streaming Service (PSS) media types

A.4.4.1 PSS media types supported by the UE

Table A.9: PSS media types supported by the UE

Item	PSS media types supported by the UE	Ref.	Status	Release	Mnemonic	Support
1	Narrow-band speech	26.234 [11], 7.2	o	Rel-5		
2	Wideband speech	26.234 [11], 7.2	o	Rel-5		
3	Audio	26.234 [11], 7.3	o	Rel-5		
4	Synthetic audio	26.234 [11], 7.3a	o	Rel-5		
5	Video	26.234 [11], 7.4	o	Rel-5		
6	Still images	26.234 [11], 7.5	o	Rel-5		
7	Bitmap graphics	26.234 [11], 7.6	o	Rel-5		
8	Vector graphics	26.234 [11], 7.7	o	Rel-5		
9	Text	26.234 [11], 7.8	o	Rel-5		
10	Timed text	26.234 [11], 7.9	o	Rel-5		
11	Real time text	26.235 [14], 6.3	o	Rel-5		
12	Speech Enabled Service	26.235 [14], 6.5	o	Rel-6		

A.4.4.2 Media Data Transport

Table A.10: Media Data Transport

Item	Media Data Transport	Reference	Status	Release	Mnemonic	Support
1	UDP	26.234 [11], 6.2	c01	Rel-5		
2	TCP	26.234 [11], 6.3	c02	Rel-5		
	Conditions/Options					
c01	IF A.9/1 OR A.9/2 OR A.9/3 OR A.9/5 THEN m ELSE o				speech, audio, video	
c02	IF A.9/4 OR A.9/6 OR A.9/7 OR A.9/8 OR A.9/9 OR A.9/10 THEN m ELSE o				synthetic audio, still images, bitmap graphics, vector graphics, text, timed text.	

A.4.4.3 Codecs supported by the UE

Table A.11: Codecs supported by the UE

Item	Codecs supported by the UE	Ref.	Status	Release	Mnemonic	Support
1	AMR narrowband	26.234 [11], 7.2 26.235 [14], 6.2	c01	Rel-5		
2	AMR wideband	26.234 [11], 7.2	c02	Rel-5		
3	MPEG-4 AAC Low Complexity (AAC-LC)	26.234 [11], 7.3	o03	Rel-5		
4	MPEG-4 AAC Long Term Prediction (AAC-LTP)	26.234 [11], 7.3	o03	Rel-5		
5	Enhanced aacPlus	26.234 [11], 7.3	o03	Rel-6		
6	Extended AMR-WB	26.234 [11], 7.3	o03	Rel-6		
7	Scalable Polyphony MIDI (SP-MIDI)	26.234 [11], 7.3a	o04	Rel-5		
8	Mobile DLS	26.234 [11], 7.3a	o04	Rel-6		
9	Mobile XMF	26.234 [11], 7.3a	o04	Rel-6		
10	ITU-T H.263 Profile 0 Level 10	26.234 [11], 7.4 26.235 [14], 6.2	o05	Rel-5 only		
11	ITU-T H.263 Profile 3 Level 10	26.234 [11], 7.4 26.235 [14], 6.2	o06	Rel-5 only		
12	MPEG-4 Visual Simple Profile Level 0	26.234 [11], 7.4	o06	Rel-5 only		
13	ITU-T H.263 Profile 0 Level 45	26.234 [11], 7.4 26.235 [14], 6.2	c05	Rel-6		
14	ITU-T H.263 Profile 3 Level 45	26.234 [11], 7.4 26.235 [14], 6.2	o06	Rel-6		
15	MPEG-4 Visual Simple Profile Level 0b	26.234 [11], 7.4	o06	Rel-6		
16	ITU-T H.264 (AVC) Baseline Profile Level 1b	26.234 [11], 7.4 26.235 [14], 6.2	o06	Rel-6		
17	ISO/IEC JPEG	26.234 [11], 7.5	c07	Rel-5		
18	JFIF	26.234 [11], 7.5	c07	Rel-5		
19	GIF87a	26.234 [11], 7.6	o08	Rel-5		
20	GIF89a	26.234 [11], 7.6	o08	Rel-5		
21	PNG	26.234 [11], 7.6	o08	Rel-5		
22	SVG Tiny 1.1	26.234 [11], 7.7	c09	Rel-5 only		
23	SVG Basic profile	26.234 [11], 7.7	o10	Rel-5 only		
24	SVG Tiny 1.2	26.234 [11], 7.7	c09	Rel-6		
25	ECMAScript	26.234 [11], 7.7	c09	Rel-6		
26	XHTML Mobile Profile	26.234 [11], 7.8	c11	Rel-5		
27	SMIL 2.0	26.234 [11], 7.8	c11	Rel-5		
28	UTF-8	26.234 [11], 7.8	c11	Rel-5		
29	UCS-2	26.234 [11], 7.8	c11	Rel-5		
30	Timed text format	26.234 [11], 7.9	c12	Rel-5		
31	ITU-T T.140	26.235 [14], 6.3	o13	Rel-5		
32	DSR	26/235 [14]. 6.5	o14	Rel-6		
	Conditions/Options					
c01	IF A.9/1 OR A.9/3 THEN m ELSE IF A.9/12 THEN o ELSE n/a				Narrow-band speech, Audio, Speech Enabled Service	
c02	IF A.9/2 THEN m ELSE IF A.9/12 THEN o ELSE n/a				Wideband speech, Speech Enabled Service	
o03	IF A.9/3 THEN o ELSE n/a A				Audio	
o04	IF A.9/4 THEN o ELSE n/a				Synthetic audio	
o05	IF A.9/5 THEN m ELSE n/a				Video	
o06	IF A.9/5 THEN o ELSE n/a				Video	
c07	IF A.9/6 THEN m ELSE n/a				Still images	
o08	IF A.9/7 THEN o ELSE n/a				Bitmap graphics	
c09	IF A.9/8 THEN m ELSE n/a A				Vector graphics	
o10	IF A.9/8 THEN o ELSE n/a				Vector graphics	
c11	IF A.9/9 THEN m ELSE n/a				Text	
c12	IF A.9/10 THEN m ELSE n/a				Timed text	
o13	IF A.9/11 THEN o ELSE n/a				Real time text	

o14	IF A.9/12 THEN o ELSE n/a	Speech Enabled Service

A.4.5 Additional information

Table A.12: Additional information

Item	Additional information	Ref.	Status	Release	Mnemonic	Support
	Void					
2	UE compresses the initial REGISTER message	24.229 [10], 8.1.1 RFC 3486 [25]	o	Rel-5		
3	UE compresses upon receiving the first compressed message	24.229 [10], 8.1.1 RFC 3486 [25]	o	Rel-5		
4	UE capable of being configured to initiate Dedicated PDP Context	24.229 [10], 9.2.1	o	Rel-5		
5	UE capable of being configured to initiate P-CSCF discovery via PCO	24.229 [10], 9.2.1	o	Rel-5		
6	Void					
7	UE capable of being configured to initiate P-CSCF discovery via DHCPv6	24.229 [10], 9.2.1	o	Rel-5		
8	UE supports P-CSCF discovery via PCO	24.229 [10], 9.2.1	o	Rel-5		
9	Void					
10	UE supports P-CSCF discovery via DHCPv6	24.229 [10], 9.2.1	o	Rel-5		
	Void					
13	UE requires the usage of preconditions by Require header	24.229 [10], 5.1.3	o	Rel-5		
14	UE indicates the support for preconditions by Supported header	24.229 [10], 5.1.3	o	Rel-6		
15	UE supports a=inactive	24.229 [10], 6.1.2	o	Rel-6		
16	UE Supports "IPv6 address with embedded IPv4 address" in PCO IE	23.981 [18], 5.2.1	o	Rel-6		
17	UE Supports IPv4 address in PCO IE	23.981 [18], 5.2.1	o	Rel-6		
18	UE supports MTSI	24.173 [55]	o	Rel-7		

A.4.6 Additional information for Early IMS

Table A.13: Additional information for IPv4

Precondition: This table is only applicable if A.7/1 IPv4 is supported						
Item	**Additional information for IPv4**	**Ref.**	**Status**	**Release**	**Mnemonic**	**Support**
1	UE capable of being configured to initiate P-CSCF discovery via DHCPv4	23.981 [18], 5.2.1	o	Rel-5		
2	UE supports P-CSCF discovery via DHCPv4	23.981 [18], 5.2.1	o	Rel-5		

Table A.14: Additional information for Early IMS security

Precondition: This table is only applicable if A.6/9 Early IMS security is supported						
Item	**Additional information for Early IMS security**	**Ref.**	**Status**	**Release**	**Mnemonic**	**Support**
	FFS					

A.4.7 MTSI media

Table A.15: MTSI media

Item	Media	Ref.	Status	Release	Mnemonic	Support
1	Speech	26.114 [56], 5.2.1	o	Rel-7		
2	Speech, AMR wideband	26.114 [56], 5.2.1	o	Rel-7		
3	Video	26.114 [56], 5.2.2	o	Rel-7		
4	Video, H.263 Profile 3	26.114 [56], 5.2.2	o	Rel-7		
5	Video, MPEG-4	26.114 [56], 5.2.2	o	Rel-7		
6	Video, H.264	26.114 [56], 5.2.2	o	Rel-7		
7	Text, RTP	26.114 [56], 5.2.3	o	Rel-7		

A.4.8 MTSI supplementary services

Table A.16: MTSI supplementary services

Item	Service	Ref.	Status	Release	Mnemonic	Support
1	Originating Identification Presentation	24.173 [55], Annex A	o	Rel-7	OIP	
2	Originating Identification Restriction	24.173 [55], Annex A	o	Rel-7	OIR	
3	Terminating Identification Presentation	24.173 [55], Annex B	o	Rel-7	TIP	
4	Terminating Identification Restriction	24.173 [55], Annex B	o	Rel-7	TIR	
5	Communication Diversion	24.173 [55], Annex C	o	Rel-7	CDIV	
6	Communication Hold	24.173 [55], Annex D	o	Rel-7	HOLD	
7	Communication Barring	24.173 [55], Annex E	o	Rel-7	CB	
8	Message Waiting Indication	24.173 [55], Annex F	o	Rel-7	MWI	
9	Conference	24.173 [55], Annex G	o	Rel-7	CONF	
10	Explicit Communication Transfer - blind transfer	24.173 [55], Annex H	o	Rel-7	ECT-b	
11	Explicit Communication Transfer - consultative transfer	24.173 [55], Annex H	o	Rel-7	ECT-c	

A.4.9 MTSI media change

Table A.17: MTSI media change

Item	Media change	Ref.	Status	Release	Mnemonic	Support
1	Speech, add/remove video		o	Rel-7		
2	Speech, add video remove speech		o	Rel-7		
3	Speech, add text		o	Rel-7		
4	Video, add/remove speech		o	Rel-7		
5	Video, add speech remove video		o	Rel-7		
6	Video, add text		o	Rel-7		
7	Text, add/remove speech		o	Rel-7		
8	Text, add speech remove text		o	Rel-7		
9	Text, add video		o	Rel-7		

Annex B (informative): Change history

Meeting -1st-Level	Doc-1st-Level	CR	Rev	Subject	Cat	Version -Current	Version -New	Doc-2nd-Level
RP-31	RP-060053	-	-	Update to version 1.0.0 and present to RAN#31 for information	-	0.0.1	1.0.0	R5-060523
-	-	-	-	Update to version 2.0.0 during RAN5#31 e-mail agreement procedure	-	1.0.0	2.0.0	R5-061399
RP-32	RP-060320	-	-	MCC Editorial clean up version 2.0.1 - and present to RAN#32 for approval to go under revision control (as version 5.0.0)	-	2.0.0	2.0.1	-
-	-	-	-	Update to version 5.0.0 after RAN#32	-	2.0.1	5.0.0	-
RP-33	RP-060565	0001	-	Applicability for new P-CSCF Discovery List test cases	F	5.0.0	5.1.0	R5-062365
RP-33	RP-060565	0002	-	CR to 34.229-2: Update applicability table for IMSCC test	F	5.0.0	5.1.0	R5-062026
RP-34	RP-060746	0003	-	Updating of test cases to cover both IMS support and early IMS security scenarios, ICS part	F	5.1.0	5.2.0	R5-063528
RP-34	RP-060746	0004	-	ICS part for new registration test cases 8.5, 8.6 and 8.7 for early IMS security	F	5.1.0	5.2.0	R5-063527
RP-34	RP-060746	0005	-	Removal of MO Call - 488 not accepted here for rel 5, ICS part	F	5.1.0	5.2.0	R5-063331
RP-34	RP-060746	0006	-	Production of pointer version 5.2.0 of TS 34.229-2 with no technical contents	F	5.1.0	5.2.0	R5-063292
RP-34	RP-060748	0007	-	Update to 34.229-2 : Major capabilities	F	5.1.0	6.0.0	R5-063571
RP-35	RP-070089	0008	-	IMS security and early IMS security capability update	F	6.0.0	6.1.0	R5-070426
RP-35	RP-070089	0009	-	Removal of applicability statements for IMS test cases 7.7 and 7.8	F	6.0.0	6.1.0	R5-070330
RP-36	RP-070362	0010		Applicability of IMS TC 13.4	F	6.1.0	6.2.0	R5-071060
RP-36	RP-070362	0011		Coding options for the IPv4 address in PCO IE	F	6.1.0	6.2.0	R5-071438
RP-36	RP-070362	0013		Applicability of Call Control TCs	F	6.1.0	6.2.0	R5-071507
RP-37	RP-070607	0014	-	Applicability of re- and de-registration TCs for early IMS	F	6.2.0	6.3.0	R5-072115
RP-38	RP-070874	0017		Production of 34.229-2 pointer version in Rel-6 pointing to Rel-7 version	F	6.3.0	6.4.0	R5-073279
RP-38	RP-070882	0015		Applicability of new MTSI MO Call and Call Hold test cases	F	6.3.0	7.0.0	R5-073445
RP-38	RP-070882	0016		Add MTSI media capabilities	F	6.3.0	7.0.0	R5-073096
RP-39	RP-080113	0018		Applicability for new MTSI test cases 15.12, 15.13 and 15.23	F	7.0.0	7.1.0	R5-080597
RP-39	RP-080113	0019		Applicability for MTSI test case MO MTSI Text call	F	7.0.0	7.1.0	R5-080562
RP-39	RP-080114	0020		Applicability for MTSI test case Speech AMR, indicate all codec modes	F	7.0.0	7.1.0	R5-080081
RP-39	RP-080114	0021		Applicability for MTSI test case Speech AMR-WB, indicate all codec modes	F	7.0.0	7.1.0	R5-080083
RP-39	RP-080114	0022		Applicability for MTSI test case MT Video, add speech remove speech	F	7.0.0	7.1.0	R5-080590
RP-39	RP-080114	0023		Update SDP applicability tables	F	7.0.0	7.1.0	R5-080578
RP-39	RP-080114	0024		Update references in TS 34.229-2	F	7.0.0	7.1.0	R5-080090
RP-39	RP-080114	0025		Update key to status codes	F	7.0.0	7.1.0	R5-080091
RP-39	RP-080114	0026		Addition of Applicability Statement for new MTSI test cases	F	7.0.0	7.1.0	R5-080603
RP-40	RP-080376	0027		Applicability statements of new MTSI test cases	F	7.1.0	7.20	R5-081500
RP-40	RP-080376	0028		Media change capabilities	F	7.1.0	7.20	R5-081084
RP-40	RP-080376	0029		Applicability for new MTSI test case MT MTSI Speech call	F	7.1.0	7.20	R5-081085
RP-40	RP-080376	0030		Applicability for new MTSI test case MT MTSI Video call	F	7.1.0	7.20	R5-081086
RP-40	RP-080376	0031		Applicability for new MTSI test case Speech AMR indicate selective codec modes	F	7.1.0	7.20	R5-081088
RP-40	RP-080376	0032		Applicability for new MTSI test case Speech AMR-WB indicate selective codec modes	F	7.1.0	7.20	R5-081089
RP-40	RP-080376	0033		Applicability for new MTSI test case MT Speech add video remove video	F	7.1.0	7.20	R5-081090
RP-40	RP-080376	0034		Applicability for new MTSI test case MT Speech add video remove speech	F	7.1.0	7.20	R5-081091

History

Document history		
V7.0.0	January 2008	Publication
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