INTERNATIONAL STANDARDIZED PROFILE

ISO/IEC ISP 10609-25

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1995-12-15

Information technology — International Standardized Profiles TB, TC, TD and TE — Connection-mode Transport Service over connection-mode Network Service —

Part 25:
Subnetwork-type dependent requirements for Q.931 circuit-switched operation

Technologies de l'information — Profils normalisés internationaux TB, TC, TD et TE — Service de transport en mode connexion sur service de réseau en mode connexion —

Partie 25: Prescriptions dépendantes du type de sous-réseau pour la couche réseau pour une opération commutée à un circuit Q.931

Reference number
ISO/IEC ISP 10609-25:1995(E)

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Foreword

ISO (the International Organization for Standardization) and IEC (the International Electrotechnical Commission) form the specialized system for worldwide standardization. National bodies that are members of ISO or IEC participate in the development of International Standards through technical committees established by the respective organization to deal with particular fields of technical activity. ISO and IEC technical committees collaborate in fields of mutual interest. Other international organizations, governmental and non-governmental, in liaison with ISO and IEC, also take part in the work.

In the field of information technology, ISO and IEC have established a joint technical committee, ISO/IEC JTC 1. In addition to developing International Standards, ISO/IEC JTC 1 has created a Special Group on Functional Standardization for the processing of International Standardized Profiles.

An International Standardized Profile is an internationally agreed, harmonized document which identifies a standard or group of standards, together with options and parameters, necessary to accomplish a function or set of functions.

Draft International Standardized Profiles are circulated to national bodies for voting. Publication as an International Standardized Profile requires approval by at least 75% of the national bodies casting a vote.

International Standardized Profile ISO/IEC ISP 10609-25 was prepared with the collaboration of

- Asia-Oceania Workshop (AOW);
- European Workshop for Open Systems (EWOS);
- Open Systems Environment Implementors' Workshop (OIW).

ISO/IEC ISP 10609 consists of the following parts, under the general title *Information technology - International Standardized Profiles TB, TC, TD and TE - Connection-mode Transport Service over connection-mode Network Service*:

Part 1: Subnetwork-type independent requirements for Group TB

Part 2: Subnetwork-type independent requirements for Group TC

Part 3: Subnetwork-type independent requirements for Group TD

Part 4: Subnetwork-type independent requirements for Group TE

Part 5: Definition of profiles TB1111/TB1121

Part 6: Definition of profiles TC1111/TC1121

Part 7: Definition of profiles TD1111/TD1121

Part 8: Definition of profiles TE1111/TE1121

Part 9: Subnetwork-type dependent requirements for Network Layer, Data Link Layer and Physical Layer concerning permanent access to a packet switched data network using virtual calls

Part 10: LAN subnetwork-dependent, media-independent requirements

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Part 11: CSMA/CD LAN subnetwork-dependent, media-dependent requirements

Part 12: Definition of profile TC51, provision of the OSI connection-mode Transport Service using the OSI connection-mode Network Service in an End System attached to a CSMA/CD LAN

Part 14: Definition of profile TC53, provision of the OSI connection-mode Transport Service using the OSI connection-mode Network Service in an End System attached to a Token Ring LAN

Part 15: Definition of profile TC54, provision of the OSI connection-mode Transport Service using the OSI connection-mode Network Service in an End System attached to an FDDI LAN

Part 20: Overview of the generalized multi-part ISP structure for TC and TD Group profiles for OSI usage of ISDN

Part 21: Subnetwork-type dependent requirements for Network Layer and Data Link Layer for ISDN B-channel X.25 DTE to DTE operation

Part 22: Subnetwork-type dependent requirements for Network Layer and Data Link Layer for ISDN B-channel X.25 DTE to DCE operation

Part 23: Subnetwork-type dependent requirements for Network Layer and Data Link Layer for Data Transfer concerning a packet switched mode Integrated Services Digital Network using virtual calls: B-channel access case

Part 24: Subnetwork-type dependent requirements for Network Layer and Data Link Layer for Data Transfer concerning a packet switched mode Integrated Services Digital Network using virtual calls: D-channel access case

Part 25: Subnetwork-type dependent requirements for Q.931 circuit-switched operation

Part 26: Subnetwork-type dependent requirements for Network Layer for Call Control procedures concerning the outgoing call of a packet switched mode Integrated Services Digital Network in case B using virtual calls

Part 27: Subnetwork-type dependent requirements for Network Layer for Call Control procedures concerning the incoming call of a packet switched mode Integrated Services Digital Network in case B using virtual calls

Part 28: Subnetwork-type dependent requirements for Data Link Layer for end systems attached to an ISDN subnetwork

Part 30: Definition of profile TC1131

Part 31: Definition of profile TC1231

Part 32: Definition of profile TC4111

Part 33: Definition of profile TC4211

Part 34: Definition of profile TC43111

Part 35: Definition of profile TC43112

Part 36: Definition of profile TC43211

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Part 37: Definition of profile TC43212

Part 38: Definition of profile TC4331

Part 40: Definition of profile TD1131

Part 41: Definition of profile TD1231

Part 42: Definition of profile TD4111

Part 43: Definition of profile TD4211

Part 44: Definition of profile TD43111

Part 45: Definition of profile TD43112

Part 46: Definition of profile TD43211

Part 47: Definition of profile TD43212

Part 48: Definition of profile TD4331

Annexes A and B form an integral part of this part of ISO/IEC ISP 10609.

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Introduction

This International Standardized Profile (ISP) is defined in accordance with the principles specified by ISO/IEC Technical Report 10000, "Information technology - Framework and taxonomy of International Standardized Profiles".

The context of Functional Standardization is one area in the overall field of Information Technology (IT) standardization activities, covering base standards, profiles, and registration mechanisms. A profile defines a combination of base standards that collectively perform a specific well-defined IT function. Profiles standardize the use of options and other variations in the base standards, and provide a base for the development of uniform, internationally recognized system tests.

ISPs are produced not simply to "legitimize" a particular choice of base standards and options, but to promote real system interoperability. One of the most important roles for an ISP is to serve as the basis for the development (by organizations other than ISO and IEC) of internationally recognized test methods. The development and widespread acceptance of tests based on this and other ISPs is crucial to the successful realization of this goal.

ISO/IEC ISP 10609 consists of several parts of which this is part 25. This part of ISO/IEC ISP 10609 specifies subnetwork-dependent requirements. There are further parts which specify profile requirements that are subnetwork-independent. In addition, for each individual profile there is a part of ISO/IEC ISP 10609 which identifies the specific requirements of that profile, making reference to appropriate material from parts 2 or 3, and from the subnetwork dependent parts of ISO/IEC ISP 10609.

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Information technology — International Standardized Profiles TB, TC, TD and TE — Connection-mode Transport Service over connection-mode Network Service —

Part 25:
Subnetwork-type dependent requirements for Q.931 circuit-switched operation

1 Scope

ISO/IEC ISP 10609 is applicable to end systems concerned with operating in the Open Systems Interconnection (OSI) environment. It specifies a combination of OSI standards, which collectively provide the connection-mode Transport Service using the connection-mode Network Service.

This part of ISO/IEC ISP 10609 specifies the requirements for Network Layer that apply specifically to configurations involving access to an ISDN subnetwork using a circuit-mode bearer service.

2 Normative references

The following documents contain provisions which, through reference in this text, constitute provisions of this part of ISO/IEC ISP 10609. At the time of publication, the editions indicated were valid. All documents are subject to revision, and parties to agreements based on this part of ISO/IEC ISP 10609 are warned against automatically applying any more recent editions of the documents listed below, since the nature of references made by ISPs to such documents is that they may be specific to a particular edition. Members of IEC and ISO maintain registers of currently valid International Standards and ISPs, and ITU-T maintains published editions of its current Recommendations.

CCITT Rec. Q.930 (1988), *ISDN User-network Interface Layer 3 - General Aspects.*

CCITT Rec. Q.931 (1988), *ISDN User-network Interface Layer 3 Specification for Basic Call Control.*

3 Definitions

The terms used in this part of ISO/IEC ISP 10609 are defined in the referenced base standards (see clause 2).

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4 Abbreviations

The following abbreviations are used in this part of ISO/IEC ISP 10609:

AEF	Address Extension Facility
BCD	Binary Coded Decimal
DCE	Data Circuit-terminating Equipment
DTE	Data Terminating Equipment
HIC	Highest Incoming Channel
HOC	Highest Outgoing Channel
HTC	Highest Two-way Channel
LIC	Lowest Incoming Channel
LOC	Lowest Outgoing Channel
LTC	Lowest Two-way Channel
LAPB	Link Access Protocol Balanced
NSAP	Network Service Access Point
OSI	Open Systems Interconnection
SABM	Set Asynchronous Balanced Mode
SABME	Set Asynchronous Balanced Mode Extended
VC	Virtual Call
XID	eXchange Identification

5 Subnetwork-type dependent requirements for Network Layer

5.1 Static conformance requirements

5.1.1 Overall requirements

An implementation conforming to this part of ISO/IEC ISP 10609 shall:

(a) meet the static conformance requirements in accordance with CCITT Q.931 (and detailed in the Q.931 PICS proforma) and provide OSI Network Service;
(b) comply with the additional static conformance requirements for CCITT Q.931 in 5.1.2 below and as described in ISO/IEC 9574;
(c) implement all the features identified as requirements in the ISPICS Requirements List in Annex A.

5.1.2 Additional static conformance requirements

The additional static conformance requirements are defined in the IPRL in Annex A.3.

5.2 Dynamic conformance requirements

5.2.1 Overall requirements

An implementation conforming to this part of ISO/IEC ISP 10609 shall:

(a) implement the Protocol procedures as described in CCITT Q.931;
(b) meet the additional dynamic conformance requirements for CCITT Q.931 in 5.2.2 below;
(c) behave in accordance with the requirements of the ISPICS Requirements List in Annex A.

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5.2.2 Additional dynamic conformance requirements

Additional requirements other than clause A.3 are specified as follows:

a) Encoding of the field values of Information elements;
The value of the field "Coding Standard" in the following information elements shall be encoded as the "CCITT standardized coding."

Information elements

Cause, Call state, Channel Identification and Progress indicator.

b) Treatment of the field values of Information elements:
On the receipt of the following information elements, the field "Coding Standard" encoded as "CCITT standardized coding" shall be accepted.

Information elements

Cause, Call state, Channel Identification and Progress indicator.

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Annex A
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ISPICS requirements list

A.1 Introduction

The IPRLs in this annex specify requirements for implementation of the Network Layer.

Network Layer IPRL in clause A.3 specifies the additional requirements for CCITT Q.931 PICS Proforma. The requirements of the CCITT Q.931 PICS Proforma apply to each item for which there is no entry in the IPRL (clause A.3).

These IPRLs specify subnetwork-type dependent requirements for an end system attached to an ISDN subnetwork using a circuit-mode bearer service.

A conforming implementation shall satisfy the mandatory conformance requirements of the base standards referenced in this part of ISO/IEC ISP 10609.

A.2 Notation

The following symbols are used to identify the capabilities to be supported by a conforming implementation:

a) Base Standard Status Notation

M	mandatory
O	optional
C	conditional
cp <n>	If the capability <n> stated in the predicate list is supported, then the support of the capability under question is "Optional". Otherwise (i.e., if the capability <n> stated in the predicate list is not supported), then the support of the capability under question is "Not Applicable N/A".
sp <n>	If the capability <n> stated in the predicate list is supported, then the support of the capability under question is "Mandatory". Otherwise (i.e., if the capability <n> stated in the predicate list is not supported), then the support of the capability under question is "Not Applicable N/A".

b) IPRL Status Notation

The Status column of Profile features is entered using the one character or the two character notation. The one character notation indicates the static conformance requirements only. For the two character notation, the first character indicates the static conformance requirements and the second indicates the dynamic conformance requirements.

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1) Static

m mandatory, mandatory to be implemented
o optional, optional to be implemented
o.<n> optional, but at least one of the group of options labelled by the same numeral <n> is required
i out of scope, not relevant to this part of ISO/IEC ISP 10609

2) Dynamic

m mandatory, mandatory to be used
x excluded, prohibited to be used in the context of this part of ISO/IEC ISP 10609.

A.3 IPRL for CCITT Q.931

Base Standard Features					Profile Features	
Major Capabilities (MC)						
Item	**Name of item**	**Status**	**Predicate**	**Reference**	**ISP reference**	**Status**
MC 1.5	interpret in-band information sent from the network on outgoing calls?	O	cp 1	5.1.2, 5.1.3, 5.1.7, 5.4		ox
MC 1.7	generate local tones and local alerting indications?	O	cp 1	5.1.2, 5.1.7		ox
MC 2.4	send in-band information on incoming calls?	O	cp 2	5.2.6		ox
MC 6	support call rearrangement procedures (for the coincidence of S and T interfaces only)?	O		5.6		ox
MC 4.1	wait for the network to send a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1		ox
MC 4.2	respond with a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1		ox
MC 12	support procedures for establishment of bearer connection prior to call acceptance?	O		Annex N		ox
MC 15	support procedures for bearer service change?	O		Annex O		ox

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Base Standard Features					Profile features	
Supported Messages (Message Structure)						
Item	**Name of item**	**Status**	**Direction**	**Reference**	**ISP reference**	**Status**
MS 1	**Alerting**					
MS 1.6	Signal?	O	NW to User			ox Note 1
MS 4	**Connect**					
MS 4.6	Signal?	O	NW to User			ox Note 1
MS 5	**Connect acknowledge**					
MS 5.4	Signal?	O	NW to User			ox Note 1
MS 6	**Disconnect**					
MS 6.4	Progress Indicator?	O	Both			ox Note 1
MS 6.6	Signal?	O	NW to User			ox Note 1
MS 8	**Information**					
MS 8.6	Signal?	O	NW to User			ox Note 1
MS 11	**Release**					
MS 11.5	Signal?	O	NW to User			ox Note 1
MS 12	**Release complete**					
MS 12.5	Signal?	O	NW to User			ox Note 1
MS 19	**Setup**					
MS 19.11	Signal?	O	NW to User			ox Note 1
MS 20	**Setup acknowledge**					
MS 20.5	Signal?	O	NW to User			ox Note 1
Implemented Information Elememts : Bearer Capability - Transmission						
BT3.2	Octet 3 bit 6 and 7			4.5.5		
	Coding, CCITT	O				mm

NOTE 1 - For reception, this IE shall be ignored (as if it did not appear in the message), if present.

Base Standard Features				Profile Features	
Information Element Structure					
Item	**Name of item**	**Reference**	**Status**	**ISP reference**	**Status**
IS 1	**Bearer Capability**				
IS 1.2	information transfer capability, 2. Unrestricted digital		O	5.1.2	mm
IS 1.3	transfer mode, 1. Circuit		O	5.1.2	mm
IS 1.4	information transfer rate, 2. 64kbit/s		O	5.1.2	mm
IS 1.10	Octet 5, user information layer 1 protocol		O	5.1.2	ox
IS 1.30	Octet 6, user information layer 2 protocol		O	5.1.2	ox
IS 1.31	Octet 7, user information layer 3 protocol		O	5.1.2	ox

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Annex B[1]
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Assumed base standard PICS proformas

B.1 Introduction

This annex contains the PICS proforma information for the base standard, CCITT Q.931, which does not yet have an internationally stable PICS proforma.

B.1.1 Purpose

To evaluate conformance of a particular implementation, it is necessary to have a statement of which capabilities and options have been implemented for a given OSI protocol. Such a statement is called a Protocol Implementation Conformance Statement (PICS).

B.1.2 Scope

Annex B.2 provides the PICS proforma for the Basic Rate ISDN Network Layer protocol (Basic Rate Interface, User side, circuit mode, on demand case) as specified in CCITT Recommendation Q.931 in compliance with the relevant requirements and in accordance with the relevant guidance given in ISO/IEC 9646-2.

Annex B.3 provides the PICS proforma for the Primary Rate ISDN Network Layer protocol (Primary Rate Interface, User side, circuit mode, on demand case) as specified in CCITT Recommendation Q.931 in compliance with the relevant requirements and in accordance with the relevant guidance given in ISO/IEC 9646-2.

It is however clarified that the packet interworking (section 6 of Recommendation Q.931) and the user-to-user signalling (section 7 of Recommendation Q.931) are excluded from the present PICS proforma.

B.1.3 Normative references

- ISO/IEC 9646-1:1994, *Information technology - Open Systems Interconnection - Conformance testing methodology and framework - Part 1: General concepts.*
  (see also ITU-T Recommendation X.290 (1995)).

- ISO/IEC 9646-2:1994, *Information technology - Open Systems Interconnection - Conformance testing methodology and framework - Part 2: Abstract Test Suite specification.*
  (see also ITU-T Recommendation X.291 (1995)).

- CCITT Recommendation Q.931:1988, *Digital Subscriber Signalling System No. 1, Network Layer, ISDN User-Network Interface Layer 3 Specification for Basic Call Control.*

[1] Copyright release for PICS proformas.

Users of this International Standardized Profile may freely reproduce the PICS proforma in this annex so that it can be used for its intended purpose and may further freely publish the completed PICS.

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B.1.4 Definitions

The PICS proforma in this annex uses the following terms defined in ISO/IEC 9646-1:

1. A Protocol Implementation Conformance Statement (PICS) is a statement made by the supplier of an OSI implementation or system, stating which capabilities have been implemented for a given OSI protocol.

2. A PICS proforma is a document, in the form of a questionnaire, designed by the protocol specifier or conformance test suite specifier, which when completed for an OSI implementation or system becomes the PICS.

3. A static conformance review is a review of the extent to which the static conformance requirements are met by the IUT, accomplished by comparing the PICS with the static conformance requirements expressed in the relevant CCITT Recommendation(s).

B.1.5 Symbols and conventions

M	Mandatory requirement (to be observed in all cases).
C	Conditional requirement (to be observed if the relevant conditions apply).
O	Option (may be selected to suit the implementation, provided that any requirements applicable to the option are observed).
O.<n>	Options, but support is required for either at least one or only one of the options in the group labelled by the same numeral <n>.
IUT	Implementation under test.
SUT	System under test.
SCS	System conformance statement.
N/A	Not applicable.
NW	Network.
Yes	Supported.
No	Not supported.
cp <n>	Completion predicate - If the Major Capability <n> stated in the predicate list is supported, then the support of this capability is optional. Otherwise the support of the capability is N/A.
sp<n>	Status predicate - If the Major Capability <n> stated in the predicate list is supported, then the support of this capability is Mandatory. Otherwise the support of the capability is N/A.

B.1.6 Conformance

The supplier of a protocol implementation which is claimed to conform to CCITT Recommendation Q.931 is required to complete a copy of the PICS proforma provided in the following sections and is required to provide the information necessary to identify both the supplier and the implementation.

B.1.7 Instructions for completing the PICS proforma

Identification of the implementation

Identification of the Implementation Under test (IUT) and the system in which it resides (the System Under Test, or SUT) should be filled out so as to provide as much detail as possible regarding version numbers and configuration options. The product supplier and client information should both be filled out if they are not one and the same.

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

The System Conformance Statement (SCS) as defined in ISO/IEC 9646-1 is a document supplied by the client or product supplier that summarises which OSI International Standards or CCITT Recommendations are implemented and to which conformance is claimed. The PICS/SCS section should describe the relationship of the PICS to the SCS.

Global statement of conformance

If the answer to the statement in this section is 'Yes', all subsequent sections shall be completed to facilitate selection of test cases for optional functions.

If the answer to the statement in this section is 'No', all subsequent sections should be completed, and all non-supported mandatory capabilities shall be identified and explained in the Comments section of each table.

Major capabilities

Each question in this section refers to a major function of the protocol. Answering 'Yes' to a particular question states that the implementation supports all the mandatory procedures for that function defined in the referenced sections of the Recommendation. Answering 'No' to particular question in this section states that the implementation does not support that function of the protocol.

Subsidiary capabilities

Indicating support for an item in this section states that the implementation has the ability to support other functions of the protocol beyond the major ones.

Call states

Indicating support for an item in this section states that the implementation has the capability to support the call states that may exist on the user-side of the user-network interface. The status of some call states is conditional based on whether or not a major capability is supported.

Supported messages received by the IUT

Indicating support for an item in this section states that the implementation has the ability to recognise and interpret the message listed in that item. The status of some messages is conditional based on whether or not a major capability is supported. The table also provides the identity value of each message in decimal notation.

Supported messages transmitted by the IUT

Indicating support for an item in this section states that the implementation has the ability of transmitting the message listed in that item. The status of some messages is conditional based on whether or not a major capability is supported. The table also provides the identity value of each message in decimal notation.

Message structure

Indicating support for an item in this section states that the implementation has the ability to support the message structures described in terms of the information elements to be included and the direction in which the message is sent. Some of these items may be optionally included.

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Information elements received by the IUT

Indicating support for an item in this section states that the implementation has the ability to recognise and interpret the information elements contained in the received messages. The status of some information elements is conditional based on whether or not a major capability is supported. The tabulation indicates the length of the information element and its identity value in decimal notation.

Information elements transmitted by the IUT

Indicating support for an item in this section states that the implementation has the ability of transmitting the information elements listed in the items, contained in the transmitted messages. The status of some information elements is conditional based on whether or not a major capability is supported. The tabulation indicates the length of the information element and its identity value in decimal notation.

Information elements structure

Indicating support for an item in this section states that the implementation has the ability to support the contents of the main information elements, particularly those which affect interworking (Bearer capability, Channel identification, High layer compatibility, Low layer compatibility) listed in the items. Additional information is provided against those items for which an indication of support is not required. This is emphasised by shading the appropriate areas in the table.

Supported timers

Indicating support for an item in this section states that the implementation has a timer that operates in accordance with the description in section 9.2 of Q.931 and the relevant behaviour in section 5. Specific values for the timers implemented should be stated in the PIXIT.

B.1.8 Identification of the implementation

Implementation Under Test (IUT) identification

IUT name:

_____

_____

IUT version:

_____

System Under Test (SUT) identification

SUT name:

_____

_____

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Hardware configuration:

Operating system:

Product supplier

Name:

Address:

Telephone number:

Facsimile number:

Additional information:

Client

Name:

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Address:

Telephone number:

Facsimile number:

Additional information:

PICS contact person

Name:

Telephone number:

Facsimile number:

Additional information:

PICS/System Conformance Statement

Provide the relationship of the PICS with the System Conformance Statement for the system:

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Identification of the protocol

This PICS proforma applies to the following Recommendation:

- CCITT Recommendation Q.931:1988, *Digital Subscriber Signalling System No. 1, Network Layer, ISDN User-Network Interface Layer 3 Specification for Basic Call Control.*

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B.2 Q.931 PICS proforma, basic rate

B.2.1 Global statement of conformance

The implementation described in this PICS meets all the mandatory requirements of the referenced Recommendation:

☐ Yes
☐ No

NOTE - Answering 'No' indicates non-conformance to the specified protocol Recommendation. Non-supported mandatory capabilities are to be identified in the following tables with an explanation by the implementor explaining why the implementation is non-conforming.

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B.2.2 Major capabilities

Item	Major capability Does the implementation...	Status	Predicate	Reference	Support
MC 1	support outgoing calls?	O.1		5.1	☐ Yes ☐ No
MC 1.1	support procedures of en-bloc sending?	O.2	cp 1	5.1.1, 5.1.5.1, 5.1.8	☐ Yes ☐ No
MC 1.2	support procedures of overlap sending?	O.2	cp 1	5.1.3, 5.1.5.2, 5.1.8	☐ Yes ☐ No
MC 1.3	send notification of interworking in an outgoing Setup message if the implementation is the point at which a call enters an ISDN environment from a non-ISDN environment?	C	sp 1	5.1.6	☐ Yes ☐ No
MC 1.4	support transit network selection?	O	cp 1	5.1.10, Annex C	☐ Yes ☐ No
MC 1.5	interpret in-band information sent from the network on outgoing calls?	O	cp 1	5.1.2, 5.1.3, 5.1.7, 5.4	☐ Yes ☐ No
MC 1.6	interpret notification of interworking sent from the network on outgoing calls?	O	cp 1	5.1.6	☐ Yes ☐ No
MC 1.7	generate local tones and local alerting indications?	O	cp 1	5.1.2, 5.1.7	☐ Yes ☐ No
MC 2	support incoming calls?	O.1		5.2	☐ Yes ☐ No
MC 2.1	support procedures of en-bloc receiving?	C	sp 2	5.2.1, 5.2.5.1	☐ Yes ☐ No
MC 2.2	support procedures of overlap receiving?	O	cp 2	5.2.1, 5.2.4	☐ Yes ☐ No
MC 2.3	send notification of interworking on incoming calls if the implementation is the point at which a call leaves an ISDN environment for a non-ISDN environment?	C	sp 2	5.2.6	☐ Yes ☐ No
MC 2.4	send in-band information on incoming calls?	O	cp 2	5.2.6	☐ Yes ☐ No
MC 2.5	accept the Setup message on the point-to-point data link?	O.3	cp 2	5.2.1, 5.2.3.1	☐ Yes ☐ No
MC 2.6	accept the Setup message on the broadcast data link?	O.3	cp 2	5.2.1, 5.2.3.1	☐ Yes ☐ No
MC 2.7	check the High layer compatibility information element?	O	cp 2	5.2.2, Annex B.3.3	☐ Yes ☐ No
MC 3	support user-initiated call clearing?	M		5.3.3	☐ Yes ☐ No
MC 4.1	wait for the network to send a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1	☐ Yes ☐ No
MC 4.2	respond with a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1	☐ Yes ☐ No
MC 4.3	support call clearing initiated by the network with tones/announcements not provided?	M		5.3.4.2	☐ Yes ☐ No

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Item	Major capability Does the implementation...	Status	Predicate	Reference	Support
MC 5	support restart procedure? Note.	O		5.5	☐ Yes ☐ No
MC 6	support call rearrangement procedures?	O		5.6	☐ Yes ☐ No
MC 7.1	support response to Status enquiry message?	M		5.8.10	☐ Yes ☐ No
MC 7.2	support sending of Status enquiry message?	O		5.8.10	☐ Yes ☐ No
MC 8	support symmetric call operation?	O		Annex D	☐ Yes ☐ No
MC 9	support network specific facility selection?	O	cp 1	Annex E	☐ Yes ☐ No
MC 10	support Low layer compatibility information element negotiation?	O		Annex M	☐ Yes ☐ No
MC 11.1	support user-to-user signalling during the set-up and clearing phases of a call (service 1)?	O		7.1.1, 7.1.3	☐ Yes ☐ No
MC 11.2	support user-to-user signalling during call establishment (service 2)?	O		7.1.1, 7.1.4	☐ Yes ☐ No
MC 11.3	support user-to-user signalling in the Active state of a call (service 3)?	O		7.1.1, 7.1.5	☐ Yes ☐ No
MC 12	support procedures for establishment of bearer connection prior to call acceptance?	O		Annex N	☐ Yes ☐ No
MC 13	support message segmentation procedures?	O		Annex K	☐ Yes ☐ No
MC 15	support procedures for bearer service change?	O		Annex O	☐ Yes ☐ No

O.1 Support of at least one of these options is required.
O.2 Support of at least one of these options is required.
O.3 Support of at least one of these options is required.
O.4 Support of one, and only one, of these options is required.

NOTE - Mandatory if the user is aware that the configuration of the interface is point-to-point.

Comments:

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B.2.3 Subsidiary capabilities

Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
	Call procedures				
SC 1	send the called party address information in the Called party number information element?	O.1	cp 1	5.1.1, 5.1.3	☐ Yes ☐ No
SC 2	send the called party address information in the Keypad facility information element?	O.1	cp 1	5.1.1, 5.1.3	☐ Yes ☐ No
SC 3	support the sending of Connect acknowledge message during outgoing call establishment?	O	cp 1	5.1.8	☐ Yes ☐ No
SC 4	monitor the status of B-channels?	O	cp 1	5.1.1	☐ Yes ☐ No
SC 5	check the bearer service provided?	C	sp 2	5.2.2, Annex B.3.2	☐ Yes ☐ No
SC 6	check the Low layer compatibility information element if available?	C	sp 2	5.2.2	☐ Yes ☐ No
SC 7	use the Bearer capability information element for Low layer compatibility information element checking if the Setup message received does not include the Low layer compatibility information element?	C	sp 2	Annex B.3.3	☐ Yes ☐ No
SC 8	attempt Low layer compatibility information element negotiation when a mismatch is found in Low or High layer compatibility information element checking?	C	sp 2 and sp 10	Annex B.3.4, Annex M	☐ Yes ☐ No
	General errors				
SC 9	Ignore a received message with protocol discrimination error?	M		5.8.1	☐ Yes ☐ No
SC 10	ignore a received message too short to contain a complete information element?	M		5.8.2	☐ Yes ☐ No
	Call reference errors				
SC 11	ignore a received message with Call reference bits 5 to 8 not equal to 0?	M		5.8.3.1	☐ Yes ☐ No
SC 12	ignore a received message if the call reference information element octet 1, bits 1 through 4 indicates a length greater than the maximum length supported?	M		5.8.3.1	☐ Yes ☐ No
SC 13	clear call on receiving any message other than Setup, Release, Release complete, Status, Resume, with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 14	ignore a received Setup or Resume message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 15	take no action on receiving a Release complete message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
SC 16	transmit a Release complete message on receiving a Release message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 17	transmit a Status message on receiving any message other than Restart, Restart acknowledge, Status, with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 18	ignore a Setup message containing a Call reference value relating to an existing call?	M		5.8.3.2	☐ Yes ☐ No
	Message type, message sequence errors				
SC 19	transmit a Status message on receipt of an unexpected message other than Release, Release complete or of an unrecognisable message in any other state than the Null state?	O.2		5.8.4	☐ Yes ☐ No
SC 20	transmit a Status enquiry message on receipt of an unexpected message other than Release, Release complete or of an unrecognisable message in any other state than the Null state?	O.2		5.8.4	☐ Yes ☐ No
SC 21	clear call on receipt of an unexpected Release, Release complete message?	M		5.8.4	☐ Yes ☐ No
	General information errors				
SC 22	support general information element error procedures in codesets other than 0?	O		5.8.5	☐ Yes ☐ No
SC 23	process information elements regardless of their order in the message?	O.3		5.8.5.1	☐ Yes ☐ No
SC 24	ignore out of sequence information elements?	O.3		5.8.5.1	☐ Yes ☐ No
SC 25	ignore not permitted repetitions of an information element?	M		5.8.5.2	☐ Yes ☐ No
SC 26	handle permitted repetitions (up to a limit) of an information element?	M		5.8.5.2	☐ Yes ☐ No
	Mandatory information elements errors				
SC 27	take no action, except for the sending of a Status message, on receipt of a message other than Setup, Disconnect, Release, Release complete, with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 28	return a Release complete message, on receipt of a Setup or Release message with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
SC 29	clear the call on receipt of a Disconnect message with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 30	handle a Release complete message as normal even if it has mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 31	treat information elements with length exceeding the maximum as with invalid content?	M		5.8.6.2	☐ Yes ☐ No
	Non-mandatory information elements errors				
SC 32	transmit a Status message on receipt of a message other than Disconnect, Release, Release complete, with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 33	transmit a Release message on receipt of a Disconnect message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 34	transmit a Release complete message on receipt of a Release message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 35	take no action on receipt of a Release complete message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 36	ignore incorrect or unrecognisable non-mandatory information elements?	O.4		5.8.7.2	☐ Yes ☐ No
SC 37	transmit a Status message on receipt of a message with incorrect non-mandatory information elements?	O.4		5.8.7.2	☐ Yes ☐ No
SC 38	truncate and process non-mandatory information elements which are too long?	O.5		5.8.7.2	☐ Yes ☐ No
SC 39	treat as incorrect non-mandatory information elements which are too long?	O.5		5.8.7.2	☐ Yes ☐ No
SC 40	truncate and process a Call identity information element too long?	M		5.8.7.2	☐ Yes ☐ No
	Data link reset				
SC 41	clear calls in overlap sending/receiving?	C	sp 1.2 or sp 2.2	5.8.8	☐ Yes ☐ No
SC 42	maintain calls in the establishment phase or Active Phase?	M		5.8.8	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
	Data link failure				
SC 43	clear calls in overlap sending/receiving?	C	sp 1.2 or sp 2.2	5.8.9	☐ Yes ☐ No
SC 44	clear calls in the Active state?	M		5.8.9	☐ Yes ☐ No
SC 45	proceed to layer 2 re-establishment?	O		5.8.9	☐ Yes ☐ No
SC 46	transmit either a Status enquiry or a Status message when layer 2 is re-established?	M		5.8.9	☐ Yes ☐ No
SC 47	clear all the calls if layer 2 fails to be re-established?	M		5.8.9	☐ Yes ☐ No
	Status enquiry procedure				
SC 48	retransmit Status enquiry message a number of times up to a limit?	O	cp 7.2	5.8.10	☐ Yes ☐ No
SC 49	clear call if the limit of SC 48 is reached?	M		5.8.10	☐ Yes ☐ No

O.1 Support of at least one of these options is required.
O.2 Support of one, and only one, of these items is required.
O.3 Support of one, and only one, of these items is required.
O.4 Support of one, and only one, of these items is required.
O.5 Support of one, and only one, of these items is required.

Comments:

B.2.4 Call states

Item	Call states Does the implementation support the...	Status	Predicate	Reference	Support
CS 1	Null state (U0)?	M		2.1.2.1	☐ Yes ☐ No
CS 2	Call initiated state (U1)?	C	sp 1	2.1.2.2	☐ Yes ☐ No
CS 3	Overlap sending state (U2)?	C	sp 1.2	2.1.2.3	☐ Yes ☐ No
CS 4	Outgoing call proceeding state (U3)?	C	sp 1	2.1.2.4	☐ Yes ☐ No
CS 5	Call delivered state (U4)?	C	sp 1	2.1.2.5	☐ Yes ☐ No
CS 6	Call present state (U6)?	C	sp 2	2.1.2.6	☐ Yes ☐ No
CS 7	Call received state (U7)?	O	cp 2	2.1.2.7	☐ Yes ☐ No
CS 8	Connect request state (U8)?	C	sp 2	2.1.2.8	☐ Yes ☐ No
CS 9	Incoming call proceeding state (U9)?	O	cp 2	2.1.2.9	☐ Yes ☐ No
CS 10	Active state (U10)?	M		2.1.2.10	☐ Yes ☐ No
CS 11	Disconnect request state (U11)?	M		2.1.2.11	☐ Yes ☐ No
CS 12	Disconnect indication state (U12)?	M		2.1.2.12	☐ Yes ☐ No
CS 13	Suspend request state (U15)?	C	sp 6	2.1.2.13	☐ Yes ☐ No
CS 14	Resume request state (U17)?	C	sp 6	2.1.2.14	☐ Yes ☐ No
CS 15	Release request state (U19)?	M		2.1.2.15	☐ Yes ☐ No
CS 17	Overlap receiving state (U25)?	C	sp 2.2	2.1.2.17	☐ Yes ☐ No
CS 18	Null state (Rest 0)?	C	sp 5	2.4.1.1	☐ Yes ☐ No
CS 19	Restart request state (Rest 1)?	C	sp 5	2.4.1.2	☐ Yes ☐ No
CS 20	Restart state (Rest 2)?	C	sp 5	2.4.1.3	☐ Yes ☐ No

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B.2.5 Supported messages

B.2.5.1 Network to user (received by the user)

Item	Supported messages Does the implementation support...	Status	Predicate	Reference	Support
MR 1	Alerting (1)?	C	sp 1	3.1.1, 5.1.7	☐ Yes ☐ No
MR 2	Call proceeding (2)?	C	sp 1	3.1.2, 5.1.5	☐ Yes ☐ No
MR 3	Congestion control (121)?	C	sp 11.3	3.1.3, 7.1.5.7	☐ Yes ☐ No
MR 4	Connect (7)?	C	sp 1	3.1.4, 5.1.8	☐ Yes ☐ No
MR 5	Connect acknowledge (15)?	C	sp 2	3.1.5, 5.2.8	☐ Yes ☐ No
MR 6	Disconnect (69)?	M		3.1.6, 5.3.4	☐ Yes ☐ No
MR 7	Facility (98)?	O		3.1.7	☐ Yes ☐ No
MR 8	Information (123)?	C	sp 2.2	3.1.8, 5.2.4	☐ Yes ☐ No
MR 9	Notify (110)?	C	sp 6 or sp 15	3.1.9, 5.6.7, 5.6.4, Annex O	☐ Yes ☐ No
MR 10	Progress (3)?	M		3.1.10, 5.1.6, 5.2.6	☐ Yes ☐ No
MR 11	Release (77)?	M		3.1.11, 5.3	☐ Yes ☐ No
MR 12	Release complete (90)?	M		3.1.12, 5.3	☐ Yes ☐ No
MR 13	Restart (70)?	C	sp 5	3.4.1, 5.5.2	☐ Yes ☐ No
MR 14	Restart acknowledge (78)?	C	sp 5	3.4.2, 5.5.1	☐ Yes ☐ No
MR 15	Resume (38)?	N/A		3.1.13, 5.6.4	
MR 16	Resume acknowledge (46)?	C	sp 6	3.1.14, 5.6.4	☐ Yes ☐ No
MR 17	Resume reject (34)?	C	sp 6	3.1.15, 5.6.5	☐ Yes ☐ No
MR 18	Segment (96)?	C	sp 13	Annex K	☐ Yes ☐ No
MR 19	Setup (5)?	C	sp 2	3.1.16, 5.2.1	☐ Yes ☐ No
MR 20	Setup acknowledge (13)?	C	sp 1.2	3.1.17, 5.1.3	☐ Yes ☐ No
MR 21	Status (125)?	M		3.1.18, 3.4.3, 5.8.11	☐ Yes ☐ No
MR 22	Status enquiry (117)?	M		3.1.19, 5.8.10	☐ Yes ☐ No
MR 23	Suspend (37)?	N/A		3.1.20, 5.6.1	
MR 24	Suspend acknowledge (45)?	C	sp 6	3.1.21, 5.6.2	☐ Yes ☐ No
MR 25	Suspend reject (33)?	C	sp 6	3.1.22, 5.6.3	☐ Yes ☐ No
MR 26	User information (32)?	C	sp 11.2 or sp 11.3	3.1.23, 7.1.4, 7.1.5	☐ Yes ☐ No

NOTE - The value of each message is expressed in decimal number into the parentheses.

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B.2.5.2 User to network (transmitted by the user)

Item	Supported messages Does the implementation support...	Status	Predicate	Reference	Support
MT 1	Alerting (1)?	O	cp 2	3.1.1, 5.2.5.2	☐ Yes ☐ No
MT 2	Call proceeding (2)?	O	cp 2	3.1.2, 5.2.5.2	☐ Yes ☐ No
MT 3	Congestion control (121)?	C	sp 11.3	3.1.3, 7.1.5.7	☐ Yes ☐ No
MT 4	Connect (7)?	C	sp 2	3.1.4, 5.2.7	☐ Yes ☐ No
MT 5	Connect acknowledge (15)?	O	cp 1	3.1.5, 5.1.8	☐ Yes ☐ No
MT 6	Disconnect (69)?	M		3.1.6, 5.3.3	☐ Yes ☐ No
MT 7	Facility (98)?	O		3.1.7	☐ Yes ☐ No
MT 8	Information (123)?	C	sp 1.2	3.1.8, 5.1.3	☐ Yes ☐ No
MT 9	Notify (110)?	C	sp 6	3.1.9, 5.6.7	☐ Yes ☐ No
MT 10	Progress (3)?	C	sp 2.3	3.1.10, 5.2.6	☐ Yes ☐ No
MT 11	Release (77)?	M		3.1.11, 5.3	☐ Yes ☐ No
MT 12	Release complete (90)?	M		3.1.12, 5.3	☐ Yes ☐ No
MT 13	Restart (70)?	C	sp 5	3.4.1, 5.5	☐ Yes ☐ No
MT 14	Restart acknowledge (78)?	C	sp 5	3.4.2, 5.5	☐ Yes ☐ No
MT 15	Resume (38)?	C	sp 6	3.1.13, 5.6.4	☐ Yes ☐ No
MT 16	Resume acknowledge (46)?	N/A		3.1.14, 5.6.4	
MT 17	Resume reject (34)?	N/A		3.1.15, 5.6.5	
MT 18	Segment (96)?	C	sp 13	Annex K	☐ Yes ☐ No
MT 19	Setup (5)?	C	sp 1	3.1.16, 5.1.1	☐ Yes ☐ No
MT 20	Setup acknowledge (13)?	C	sp 2.2	3.1.17, 5.2.4	☐ Yes ☐ No
MT 21	Status (125)?	M		3.1.18, 3.4.3, 5.8.11	☐ Yes ☐ No
MT 22	Status enquiry (117)?	C	sp 7.2	3.1.19, 5.8.10	☐ Yes ☐ No
MT 23	Suspend (37)?	C	sp 6	3.1.20, 5.6.1	☐ Yes ☐ No
MT 24	Suspend acknowledge (45)?	N/A		3.1.21, 5.6.2	
MT 25	Suspend reject (33)?	N/A		3.1.22, 5.6.3	
MT 26	User information (32)?	C	sp 11.2 or sp 11.3	3.1.23, 7.1.4, 7.1.5	☐ Yes ☐ No

NOTE - The value of each message is expressed in decimal number into the parentheses.

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B.2.5.3 Message structure

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 1	**Alerting** (3.1.1)				
MS 1.1	Pre-amble (Note 1)?	M	Both		☐ Yes ☐ No
MS 1.2	Channel identification?	O Note 2	Both		☐ Yes ☐ No
MS 1.3	Facility?	O	Both		☐ Yes ☐ No
MS 1.4	Progress indicator?	O Note 3	Both		☐ Yes ☐ No
MS 1.5	Display?	O	NW to User		☐ Yes ☐ No
MS 1.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 1.7	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Pre-amble is composed of Protocol discriminator, Call reference and Message type.

NOTE 2 - Mandatory if this message is the first in response to Setup, unless the user accepts the B-channel indicated in the Setup message.

NOTE 3 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 2	**Call proceeding** (3.1.2)				
MS 2.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 2.2	Channel identification?	M	Both		☐ Yes ☐ No
MS 2.3	Progress indicator?	O Note	Both		☐ Yes ☐ No
MS 2.4	Display?	O	NW to User		☐ Yes ☐ No

NOTE - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 3	**Congestion control** (3.1.3)				
MS 3.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 3.2	Congestion level?	M	Both		☐ Yes ☐ No
MS 3.3	Cause?	O	Both		☐ Yes ☐ No
MS 3.4	Display?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 4	**Connect** (3.1.4)				
MS 4.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 4.2	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 4.3	Facility?	O	Both		☐ Yes ☐ No
MS 4.4	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 4.5	Display?	O	NW to User		☐ Yes ☐ No
MS 4.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 4.7	Low layer compatibility?	O	Both		☐ Yes ☐ No
MS 4.8	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Mandatory if this message is the first in response to Setup, unless the user accepts the B-channel indicated in the Setup message.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 5	**Connect acknowledge** (3.1.5)				
MS 5.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 5.2	Channel identification?	O	NW to User		☐ Yes ☐ No
MS 5.3	Display?	O	NW to User		☐ Yes ☐ No
MS 5.4	Signal?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 6	**Disconnect** (3.1.6)				
MS 6.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 6.2	Cause?	M	Both		☐ Yes ☐ No
MS 6.3	Facility?	O	Both		☐ Yes ☐ No
MS 6.4	Progress indicator?	O	Both		☐ Yes ☐ No
MS 6.5	Display?	O	NW to User		☐ Yes ☐ No
MS 6.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 6.7	User-to-user?	O	Both		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 7	**Facility** (3.1.7)				
MS 7.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 7.2	Facility?	M	Both		☐ Yes ☐ No
MS 7.3	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 8	**Information** (3.1.8)				
MS 8.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 8.2	Sending complete?	O	Both		☐ Yes ☐ No
MS 8.3	Cause?	O	NW to User		☐ Yes ☐ No
MS 8.4	Display?	O	NW to User		☐ Yes ☐ No
MS 8.5	Keypad facility?	O	User to NW		☐ Yes ☐ No
MS 8.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 8.7	Called party number?	O	Both		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 9	**Notify** (3.1.9)				
MS 9.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 9.2	Bearer capability?	O	NW to user		☐ Yes ☐ No
MS 9.3	Notification indicator?	M	Both		☐ Yes ☐ No
MS 9.4	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 10	**Progress** (3.1.10)				
MS 10.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 10.2	Cause?	O	Both		☐ Yes ☐ No
MS 10.3	Progress indicator?	M	Both		☐ Yes ☐ No
MS 10.4	Display?	O	NW to User		☐ Yes ☐ No
MS 10.5	User-to-user?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 11	**Release** (3.1.11)				
MS 11.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 11.2	Cause?	O Note	Both		☐ Yes ☐ No
MS 11.3	Facility?	O	Both		☐ Yes ☐ No
MS 11.4	Display?	O	NW to User		☐ Yes ☐ No
MS 11.5	Signal?	O	NW to User		☐ Yes ☐ No
MS 11.6	User-to user?	O	Both		☐ Yes ☐ No

NOTE - Mandatory if this message is the first call clearing message.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 12	**Release complete** (3.1.12)				
MS 12.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 12.2	Cause?	O Note	Both		☐ Yes ☐ No
MS 12.3	Facility?	O	Both		☐ Yes ☐ No
MS 12.4	Display?	O	NW to User		☐ Yes ☐ No
MS 12.5	Signal?	O	NW to User		☐ Yes ☐ No
MS 12.6	User-to user?	O	User to NW		☐ Yes ☐ No

NOTE - Mandatory if this message is the first call clearing message.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 13	**Restart** (3.4.1)				
MS 13.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 13.2	Channel identification?	O Note	Both		☐ Yes ☐ No
MS 13.3	Display?	O	NW to User		☐ Yes ☐ No
MS 13.4	Restart indicator?	M	Both		☐ Yes ☐ No

NOTE - Mandatory to interpret when received.

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 14	**Restart acknowledge** (3.4.2)				
MS 14.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 14.2	Channel identification?	O	Both		☐ Yes ☐ No
MS 14.3	Display?	O	NW to User		☐ Yes ☐ No
MS 14.4	Restart indicator?	M	Both		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 15	**Resume** (3.1.13)				
MS 15.1	Pre-amble (see MS 1.1)?	M	User to NW		☐ Yes ☐ No
MS 15.2	Call identity?	O	User to NW		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 16	**Resume acknowledge** (3.1.14)				
MS 16.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 16.2	Channel identification?	M	NW to User		☐ Yes ☐ No
MS 16.3	Display	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 17	**Resume reject** (3.1.15)				
MS 17.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 17.2	Cause?	M	NW to User		☐ Yes ☐ No
MS 17.3	Display	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 18	**Segment** (Annex K)				
MS 18.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 18.2	Segmented message?	M	Both		☐ Yes ☐ No
MS 18.3	Information elements?	O	Both		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 19	**Setup** (3.1.16)				
MS 19.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 19.2	Sending complete?	O	Both		☐ Yes ☐ No
MS 19.3	Repeat indicator?	O	Both		☐ Yes ☐ No
MS 19.4	Bearer capability?	M	Both		☐ Yes ☐ No
MS 19.5	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 19.6	Facility?	O	Both		☐ Yes ☐ No
MS 19.7	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 19.8	Network specific facilities?	O	Both		☐ Yes ☐ No
MS 19.9	Display?	O	NW to User		☐ Yes ☐ No
MS 19.10	Keypad facility?	O	User to NW		☐ Yes ☐ No
MS 19.11	Signal?	O	NW to User		☐ Yes ☐ No
MS 19.12	Calling party number?	O	Both		☐ Yes ☐ No
MS 19.13	Calling party subaddress?	O	Both		☐ Yes ☐ No
MS 19.14	Called party number?	O	Both		☐ Yes ☐ No
MS 19.15	Called party subaddress?	O	Both		☐ Yes ☐ No
MS 19.16	Transit network selection?	O	User to NW		☐ Yes ☐ No
MS 19.17	Low layer compatibility?	O	Both		☐ Yes ☐ No
MS 19.18	High layer compatibility?	O	Both		☐ Yes ☐ No
MS 19.19	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Mandatory to interpret when received.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 20	**Setup acknowledge** (3.1.17)				
MS 20.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 20.2	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 20.3	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 20.4	Display?	O	NW to User		☐ Yes ☐ No
MS 20.5	Signal?	O	NW to User		☐ Yes ☐ No

NOTE 1 - Mandatory to interpret when received.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 21	**Status** (3.1.18, 3.4.3)				
MS 21.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 21.2	Cause?	M	Both		☐ Yes ☐ No
MS 21.3	Call state?	M	Both		☐ Yes ☐ No
MS 21.4	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 22	**Status enquiry** (3.1.19)				
MS 22.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 22.2	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 23	**Suspend** (3.1.20)				
MS 23.1	Pre-amble (see MS 1.1)?	M	User to NW		☐ Yes ☐ No
MS 23.2	Call identity?	O	User to NW		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 24	**Suspend acknowledge** (3.1.21)				
MS 24.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 24.2	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 25	**Suspend reject** (3.1.22)				
MS 25.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 25.2	Cause?	M	NW to User		☐ Yes ☐ No
MS 25.3	Display?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 26	**User information** (3.1.23)				
MS 26.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 26.2	More data?	O	Both		☐ Yes ☐ No
MS 26.3	User-to-user?	M	Both		☐ Yes ☐ No

Comments:

B.2.6 Information elements

B.2.6.1 Network to user (received by the user)

Item	Information element Does the implementation support...	Status	Predicate	Reference	Support
IER 1	Bearer capability (4, 2-13)?	M		4.5.5	☐ Yes ☐ No
IER 2	Call identity (16, 2-10)?	C	sp 6	4.5.6	☐ Yes ☐ No
IER 3	Call state (20, 2-3)?	M		4.5.7	☐ Yes ☐ No
IER 4	Called party number (112, 2-any)?	O	cp 2	4.5.8	☐ Yes ☐ No
IER 5	Called party subaddress (113, 2-23)?	O	cp 2	4.5.9	☐ Yes ☐ No
IER 6	Calling party number (108, 2-any)?	O	cp 2	4.5.10	☐ Yes ☐ No
IER 7	Calling party subaddress (109, 2-23)?	O	cp 2	4.5.11	☐ Yes ☐ No
IER 8	Cause (8, 2-32)?	M		4.5.12	☐ Yes ☐ No
IER 9	Channel identification (24, 2-any)?	M		4.5.13	☐ Yes ☐ No
IER 10	Congestion level (3, 1)?	C	sp 11.3	4.5.14	☐ Yes ☐ No
IER 11	Date/Time (41, 2-8)?	O		4.6.1	☐ Yes ☐ No
IER 12	Display (40, 2-34/82)?	O		4.5.15	☐ Yes ☐ No
IER 13	Facility (28, 2-any)?	C	sp 11.1	4.6.2, 7.1.2	☐ Yes ☐ No
IER 14	High layer compatibility (125, 2-5)?	O	cp 2	4.5.16	☐ Yes ☐ No
IER 15	Keypad facility (44, 2-34)?	O		4.5.17, 7.1.2	☐ Yes ☐ No
IER 17	Low layer compatibility (124, 2-16)?	O	cp 2	4.5.18	☐ Yes ☐ No
IER 18	More data (160, 1)?	C	sp 11.2 or sp 11.3	4.5.19	☐ Yes ☐ No
IER 19	Network specific facilities (32, 2-any)?	C	sp 9	4.5.20	☐ Yes ☐ No
IER 21	Notification indicator (39, 3)?	C	sp 6 or sp 15	4.5.21, Annex O	☐ Yes ☐ No
IER 22	Progress indicator (30, 4)?	M		4.5.22	☐ Yes ☐ No
IER 23	Repeat indicator (80, 1)?	O		4.5.23	☐ Yes ☐ No
IER 24	Restart indicator (121, 2-3)?	C	sp 5	4.5.24	☐ Yes ☐ No
IER 25	Segmented message (0, 2-4)?	C	sp 13	4.5.25	☐ Yes ☐ No
IER 26	Sending complete (145, 1)?	C	sp 2.2	4.5.26	☐ Yes ☐ No
IER 27	Shift (-, 1)?	M		4.5.3, 4.5.4	☐ Yes ☐ No
IER 28	Signal (36, 2-3)?	C	sp 1.5 or sp 11.2	4.5.27, 7.1.2	☐ Yes ☐ No
IER 29	Transit network selection (120, 2-any)?	N/A		4.5.28	
IER 30	User-to-user (126, 2-35/131)?	C	sp 11.	4.5.29	☐ Yes ☐ No

NOTE - The first decimal number inside the parentheses gives the value of the information element, the second gives the minimum number of octets and the third - if it exists - the maximum number of octets.

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B.2.6.2 User to network (transmitted by the user)

Item	Information element Does the implementation support...	Status	Predicate	Reference	Support
IET 1	Bearer capability (4, 2-13)?	M		4.5.5	☐ Yes ☐ No
IET 2	Call identity (16, 2-10)?	C	sp 6	4.5.6	☐ Yes ☐ No
IET 3	Call state (20, 2-3)?	M		4.5.7	☐ Yes ☐ No
IET 4	Called party number (112, 2-any)?	C	sp 1	4.5.8	☐ Yes ☐ No
IET 5	Called party subaddress (113, 2-23)?	O	cp 1	4.5.9	☐ Yes ☐ No
IET 6	Calling party number (108, 2-any)?	O	cp 1	4.5.10	☐ Yes ☐ No
IET 7	Calling party subaddress (109, 2-23)?	O	cp 1	4.5.11	☐ Yes ☐ No
IET 8	Cause (8, 2-32)?	M		4.5.12	☐ Yes ☐ No
IET 9	Channel identification (24, 2-any)?	C	sp 1 or sp 6	4.5.13	☐ Yes ☐ No
IET 10	Congestion level (3, 1)?	C	sp 11.3	4.5.14	☐ Yes ☐ No
IET 11	Date/Time (41, 2-8)?	N/A		4.6.1	
IET 12	Display (40, 2-34/82)?	N/A		4.5.15	
IET 13	Facility (28, 2-any)?	N/A		4.6.2, 7.1.2	
IET 14	High layer compatibility (125, 2-5)?	O	cp 1	4.5.16	☐ Yes ☐ No
IET 15	Keypad facility (44, 2-34)?	C	sp SC 2 or sp 11.2	4.5.17	☐ Yes ☐ No
IET 16	Locking shift (-, 1)?	O		4.5.3	☐ Yes ☐ No
IET 17	Low layer compatibility (124, 2-16)?	O		4.5.18	☐ Yes ☐ No
IET 18	More data (160, 1)?	C	sp 11.2 or sp 11.3	4.5.19	☐ Yes ☐ No
IET 19	Network specific facilities (32, 2-any)?	C	sp 9	4.5.20	☐ Yes ☐ No
IET 20	Non-locking shift (-, 1)?	O		4.5.4	☐ Yes ☐ No
IET 21	Notification indicator (39, 3)?	C	sp 6	4.5.21, Annex O	☐ Yes ☐ No
IET 22	Progress indicator (30, 4)?	M Note 1		4.5.22	☐ Yes ☐ No
IET 23	Repeat indicator (80, 1)?	M		4.5.23	☐ Yes ☐ No
IET 24	Restart indicator (121, 2-3)?	C	sp 5	4.5.24	☐ Yes ☐ No
IET 25	Segmented message (0, 2-4)?	C	sp 13	4.5.25	☐ Yes ☐ No
IET 26	Sending complete (145, 1)?	C	sp 1.2	4.5.26	☐ Yes ☐ No
IET 28	Signal (36, 2-3)?	N/A		4.5.27, 7.1.2	
IET 29	Transit network selection (120, 2-any)?	C	sp 1.4	4.5.28	☐ Yes ☐ No
IET 30	User-to-user (126, 2-35/131)?	C	sp 11.	4.5.29	☐ Yes ☐ No

NOTE 1 - Mandatory if terminal can perform interworking.

NOTE 2 - The first decimal number inside the parentheses gives the value of the information element, the second gives the minimum number of octets and the third - if it exists - the maximum number of octets.

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B.2.6.3 Information element structure

Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT 2. International 3. National 4. Network		0 1 2 3	
IS 1.2	Octet 3 bits 1 to 5, information transfer capability?	M		☐ Yes ☐ No
	1. Speech 2. Unrestricted digital 3. Restricted digital 4. 3.1 kHz audio 5. 7 kHz audio 6 Video		0 8 9 16 17 24	
IS 1.3	Octet 4 bits 6 and 7, transfer mode?	M		☐ Yes ☐ No
	1. Circuit		0	
IS 1.4	Octet 4 bits 1 to 5, information transfer rate, origination to destination if octet 4b is present, bi-directional otherwise?	M		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s		16 17	
IS 1.5	Octet 4a bits 5 to 7, structure?	O		☐ Yes ☐ No
	1. Default 2. 8 kHz integrity 3. Service data unit integrity 4. Unstructured		0 1 4 7	
IS 1.6	Octet 4a bits 3 and 4, configuration?	O		☐ Yes ☐ No
	1. Point-to-point		0	
IS 1.7	Octet 4a bits 1 and 2, establishment?	O		☐ Yes ☐ No
	1. Demand		0	
IS 1.8	Octet 4b bits 6 and 7, symmetry?	O		☐ Yes ☐ No
	1. Bi-directional symmetric		0	
IS 1.9	Octet 4b bits 1 to 5, information transfer rate, destination to origination?	O		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s		16 17	
IS 1.10	Octet 5 bits 1 to 5, user information layer 1 protocol?	O		☐ Yes ☐ No
	1. V.110/X.30 2. G.711 μ-law 3. G.711 A-law 4. G.721 32 kbit/s ADPCM and I.460 5. G.722 and G.725 7 kHz audio 6. G.7xx 384 kbit/s video 7. Non-CCITT rate adaption 8. V.120 9. X.31 HDLC		1 2 3 4 5 6 7 8 9	
IS 1.11	Octet 5a bit 7, synchronous/asynchronous?	O		☐ Yes ☐ No
	1. Synchronous 2. Asynchronous		0 1	
IS 1.12	Octet 5a bit 6, negotiation indicator?	O		☐ Yes ☐ No
	1. In-band negotiation not possible 2. In-band negotiation possible		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.13	Octet 5a bits 1 to 5, user rate?	O		☐ Yes ☐ No
	1. Rate indicated by E-bits (I.460)		0	
	2. 0.6 kbit/s CCITT V.6 and X.1		1	
	3. 1.2 kbit/s CCITT V.6		2	
	4. 2.4 kbit/s CCITT V.6 and X.1		3	
	5. 3.6 kbit/s CCITT V.6		4	
	6. 4.8 kbit/s CCITT V.6 and X.1		5	
	7. 7.2 kbit/s CCITT V.6		6	
	8. 8 kbit/s CCITT I.460		7	
	9. 9.6 kbit/s CCITT V.6 and X.1		8	
	10. 14.4 kbit/s CCITT V.6		9	
	11. 16 kbit/s CCITT I.460		10	
	12. 19.2 kbit/s CCITT V.6		11	
	13. 32 kbit/s CCITT I.460		12	
	14. 48 kbit/s CCITT V.6 and X.1		14	
	15. 56 kbit/s CCITT V.6		15	
	16. 64 kbit/s CCITT X.1		16	
	17. 0.1345 kbit/s CCITT X.1		21	
	18. 0.100 kbit/s CCITT X.1		22	
	19. 0.075/1.2 kbit/s CCITT V.6 and X.1		23	
	20. 1.2/0.075 kbit/s CCITT V.6 and X.1		24	
	21. 0.050 kbit/s CCITT V.6 and X.1		25	
	22. 0.075 kbit/s CCITT V.6 and X.1		26	
	23. 0.110 kbit/s CCITT V.6 and X.1		27	
	24. 0.150 kbit/s CCITT V.6 and X.1		28	
	25. 0.200 kbit/s CCITT V.6 and X.1		29	
	26. 0.300 kbit/s CCITT V.6 and X.1		30	
	27. 12 kbit/s CCITT V.6		31	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
	Octet 5b, case 1 (Note)			
IS 1.14	Octet 5b bits 6 and 7, intermediate rate?	O		☐ Yes ☐ No
	1. Not used 2. 8 kbit/s 3. 16 kbit/s 4. 32 kbit/s		0 1 2 3	
IS 1.15	Octet 5b bit 5, network independent clock (NIC) on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with NIC 2. Required to send data with NIC		0 1	
IS 1.16	Octet 5b bit 4, NIC on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with NIC 2. Can accept data with NIC		0 1	
IS 1.17	Octet 5b bit 3, flow control on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with flow control 2. Required to send data with flow control		0 1	
IS 1.18	Octet 5b bit 2, flow control on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with flow control mechanism 2. Can accept data with flow control mechanism		0 1	
	Octet 5b, case 2 (Note)			
IS 1.19	Octet 5b bit 7, rate adaption header?	O		☐ Yes ☐ No
	1. Header not included 2. Header included		0 1	
IS 1.20	Octet 5b bit 6, multiple frame establishment (MFE) support in data link?	O		☐ Yes ☐ No
	1. MFE not supported, only UI frames allowed 2. MFE supported		0 1	
IS 1.21	Octet 5b bit 5, mode of operation?	O		☐ Yes ☐ No
	1. Bit transparent mode 2. Protocol sensitive mode		0 1	

NOTE - Octet 5b case 1 is for V.110/X.30 rate adaption, octet 5b case 2 is for V.120 rate adaption.

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.22	Octet 5b bit 4, logical link identifier (LLI) negotiation?	O		☐ Yes ☐ No
	1. Default LLI = 256 only 2. Full protocol negotiation		0 1	
IS 1.23	Octet 5b bit 3, assignor/assignee?	O		☐ Yes ☐ No
	1. Message originator is 'default assignee' 2. Message originator is 'assignor only'		0 1	
IS 1.24	Octet 5b bit 2, in-band/out-band negotiation?	O		☐ Yes ☐ No
	1. Negotiation performed with USER INFORMATION messages 2. Negotiation performed in-band		0 1	
IS 1.25	Octet 5c bits 6 and 7, number of stop bits?	O		☐ Yes ☐ No
	1. Not used 2. 1 bit 3. 1.5 bits 4. 2 bits		0 1 2 3	
IS 1.26	Octet 5c bits 4 and 5, number of data bits excluding parity?	O		☐ Yes ☐ No
	1. Not used 2. 5 bits 3. 7 bits 4. 8 bits		0 1 2 3	
IS 1.27	Octet 5c bits 1 to 3, parity information?	O		☐ Yes ☐ No
	1. Odd 2. Even 3. None 4. Forced to 0 5. Forced to 1		0 2 3 4 5	
IS 1.28	Octet 5d bit 7, duplex mode?	O		☐ Yes ☐ No
	1. Half duplex 2. Full duplex		0 1	
IS 1.29	Octet 5d bits 1 to 6, modem type?	O		☐ Yes ☐ No
	1. V.21 2. V.22 3. V.22 bis 4. V.23 5. V.26 6. V.26 bis 7. V.26 ter 8. V.27 9. V.27 bis 10. V.27 ter 11. V.29 12. V.32 13. V.35		1 2 3 4 5 6 7 8 9 10 11 12 13	
IS 1.30	Octet 6 bits 1 to 5, user information layer 2 protocol?	O		☐ Yes ☐ No
	1. Q.921 2. X.25 link level		2 6	
IS 1.31	Octet 7 bits 1 to 5, user information layer 3 protocol?	O		☐ Yes ☐ No
	1. Q.931 2. X.25 packet layer		2 6	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 2	**Channel identification** (Table 4-15, Figure 4-20)			
IS 2.1	Octet 3 bit 7, interface identifier present?	M		☐ Yes ☐ No
	1. Interface implicitly identified 2. Interface explicitly identified		0 1	
IS 2.2	Octet 3 bit 6, interface type?	M		☐ Yes ☐ No
	1. Other interface		1	
IS 2.3	Octet 3 bit 4, preferred/exclusive?	M		☐ Yes ☐ No
	1. Indicated channel preferred 2. Exclusive, indicated channel only accepted		0 1	
IS 2.4	Octet 3 bit 3, D-channel indicator?	M		☐ Yes ☐ No
	1. Channel not the D-channel 2. Channel is the D-channel		0 1	
IS 2.5	Octet 3 bits 1 and 2, information channel selection?	M		☐ Yes ☐ No
	1. No channel 2. B1 channel 3. B2 channel 4. Any channel		0 1 2 3	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 3	**High layer compatibility** (Table 4-17, Figure 4-24)			
IS 3.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT standardized 2. International 3. National 4. Network		0 1 2 3	
IS 3.2	Octet 4 bits 1 to 7, HL characteristics?	M		☐ Yes ☐ No
	1. Telephony G.711 2. Fax group 4 T.62 3. Document application profile (fax group 4 class 1 T.503) 4. Document application profile mixed mode T.502 5. Document application profile processable form T.502 6. Teletex T.62, T.70 7. Document application profile videotex T.504 8. Telex 9. MHS X.400 10. OSI application X.200 11. Maintenance 12. Management		1 4 33 36 40 49 50 53 56 65 94 95	
IS 3.3	Octet 4a bits 1 to 7, extended HL characteristics?	O		☐ Yes ☐ No
	1. Telephony G.711 2. Fax group 4 T.62 3. Document application profile (fax group 4 class 1 T.503) 4. Document application profile mixed mode T.502 5. Document application profile processable form T.502 6. Teletex T.62, T.70 7. Document application profile videotex T.504 8. Telex 9. MHS X.400 10. OSI application X.200		1 4 33 36 40 49 50 53 56 65	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT 2. International 3. National 4. Network		0 1 2 3	
IS 4.2	Octet 3 bits 1 to 5, information transfer capability?	M		☐ Yes ☐ No
	1. Speech 2. Unrestricted digital 3. Restricted digital 4. 3.1 kHz audio 5. 7 kHz audio 6. Video		0 8 9 16 17 24	
IS 4.3	Octet 3a bit 7, negotiation indicator?	O		☐ Yes ☐ No
	1. Outband negotiation not possible 2. Outband negotiation possible		0 1	
IS 4.4	Octet 4 bits 6 and 7, transfer mode?	M		☐ Yes ☐ No
	1. Circuit		0	
IS 4.5	Octet 4 bits 1 to 5, information transfer rate, origination to destination if octet 4b is present, bi-directional otherwise?	M		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s		16 17	
IS 4.6	Octet 4a bits 5 to 7, structure?	O		☐ Yes ☐ No
	1. Default 2. 8 kHz integrity 3. Service data unit integrity 4. Unstructured		0 1 4 7	
IS 4.7	Octet 4a bits 3 and 4, configuration?	O		☐ Yes ☐ No
	1. Point-to-point		0	
IS 4.8	Octet 4a bits 1 and 2, establishment?	O		☐ Yes ☐ No
	1. Demand		0	
IS 4.9	Octet 4b bits 6 and 7, symmetry?	O		☐ Yes ☐ No
	1. Bi-directional symmetric		0	
IS 4.10	Octet 4b bits 1 to 5, information transfer rate, destination to origination?	O		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s		16 17	
IS 4.11	Octet 5 bits 1 to 5, user information layer 1 protocol?	O		☐ Yes ☐ No
	1. V.110/X.30 2. G.711 μ-law 3. G.711 A-law 4. G.721 32 kbit/s ADPCM and I.460 5. G.722 and G.725 7 kHz audio 6. G.7xx 384 kbit/s video 7. Non-CCITT rate adaption 8. V.120 9. X.31 HDLC		1 2 3 4 5 6 7 8 9	
IS 4.12	Octet 5a bit 7, synchronous/asynchronous?	O		☐ Yes ☐ No
	1. Synchronous 2. Asynchronous		0 1	
IS 4.13	Octet 5a bit 6, negotiation indicator?	O		☐ Yes ☐ No
	1. In-band negotiation not possible 2. In-band negotiation possible		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.14	Octet 5a bits 1 to 5, user rate?	O		☐ Yes ☐ No
	1. Rate indicated by E-bits (I.460)		0	
	2. 0.6 kbit/s CCITT V.6 and X.1		1	
	3. 1.2 kbit/s CCITT V.6		2	
	4. 2.4 kbit/s CCITT V.6 and X.1		3	
	5. 3.6 kbit/s CCITT V.6		4	
	6. 4.8 kbit/s CCITT V.6 and X.1		5	
	7. 7.2 kbit/s CCITT V.6		6	
	8. 8 kbit/s CCITT I.460		7	
	9. 9.6 kbit/s CCITT V.6 and X.1		8	
	10. 14.4 kbit/s CCITT V.6		9	
	11. 16 kbit/s CCITT I.460		10	
	12. 19.2 kbit/s CCITT V.6		11	
	13. 32 kbit/s CCITT I.460		12	
	14. 48 kbit/s CCITT V.6 and X.1		14	
	15. 56 kbit/s CCITT V.6		15	
	16. 64 kbit/s CCITT X.1		16	
	17. 0.1345 kbit/s CCITT X.1		21	
	18. 0.100 kbit/s CCITT X.1		22	
	19. 0.075/1.2 kbit/s CCITT V.6 and X.1		23	
	20. 1.2/0.075 kbit/s CCITT V.6 and X.1		24	
	21. 0.050 kbit/s CCITT V.6 and X.1		25	
	22. 0.075 kbit/s CCITT V.6 and X.1		26	
	23. 0.110 kbit/s CCITT V.6 and X.1		27	
	24. 0.150 kbit/s CCITT V.6 and X.1		28	
	25. 0.200 kbit/s CCITT V.6 and X.1		29	
	26. 0.300 kbit/s CCITT V.6 and X.1		30	
	27. 12 kbit/s CCITT V.6		31	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
	Octet 5b, case 1 (Note)			
IS 4.15	Octet 5b bits 6 and 7, V.110/X.30 rate adaption?	O		☐ Yes ☐ No
	1. Not used 2. 8 kbit/s 3. 16 kbit/s 4. 32 kbit/s		0 1 2 3	
IS 4.16	Octet 5b bit 5, network independent clock (NIC) on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with NIC 2. Required to send data with NIC		0 1	
IS 4.17	Octet 5b bit 4, NIC on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with NIC 2. Can accept data with NIC		0 1	
IS 4.18	Octet 5b bit 3, flow control on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with flow control 2. Required to send data with flow control		0 1	
IS 4.19	Octet 5b bit 2, flow control on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with flow control mechanism 2. Can accept data with flow control mechanism		0 1	
	Octet 5b, case 2 (Note)			
IS 4.20	Octet 5b bit 7, V.120 rate adaption header?	O		☐ Yes ☐ No
	1. Header not included 2. Header included		0 1	
IS 4.21	Octet 5b bit 6, multiple frame establishment (MFE) support in data link?	O		☐ Yes ☐ No
	1. MFE not supported, only UI frames allowed 2. MFE supported		0 1	
IS 4.22	Octet 5b bit 5, mode of operation?	O		☐ Yes ☐ No
	1. Bit transparent mode 2. Protocol sensitive mode		0 1	

NOTE - Octet 5b case 1 is for V.110/X.30 rate adaption, octet 5b case 2 is for V.120 rate adaption.

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.23	Octet 5b bit 4, logical link identifier (LLI) negotiation?	O		☐ Yes ☐ No
	1. Default LLI = 256 only 2. Full protocol negotiation		0 1	
IS 4.24	Octet 5b bit 3, assignor/assignee?	O		☐ Yes ☐ No
	1. Message originator is 'default assignee' 2. Message originator is 'assignor only'		0 1	
IS 4.25	Octet 5b bit 2, in-band/out-band negotiation?	O		☐ Yes ☐ No
	1. Negotiation performed with USER INFORMATION messages 2. Negotiation performed in-band		0 1	
IS 4.26	Octet 5c bits 6 and 7, number of stop bits?	O		☐ Yes ☐ No
	1. Not used 2. 1 bit 3. 1.5 bits 4. 2 bits		0 1 2 3	
IS 4.27	Octet 5c bits 4 and 5, number of data bits excluding parity?	O		☐ Yes ☐ No
	1. Not used 2. 5 bits 3. 7 bits 4. 8 bits		0 1 2 3	
IS 4.28	Octet 5c bits 1 to 3, parity information?	O		☐ Yes ☐ No
	1. Odd 2. Even 3. None 4. Forced to 0 5. Forced to 1		0 2 3 4 5	
IS 4.29	Octet 5d bit 7, duplex mode?	O		☐ Yes ☐ No
	1. Half duplex 2. Full duplex		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.30	Octet 5d bits 1 to 6, modem type?	O		☐ Yes ☐ No
	1. V.21		1	
	2. V.22		2	
	3. V.22 bis		3	
	4. V.23		4	
	5. V.26		5	
	6. V.26 bis		6	
	7. V.26 ter		7	
	8. V.27		8	
	9. V.27 bis		9	
	10. V.27 ter		10	
	11. V.29		11	
	12. V.32		12	
	13. V.35		13	
IS 4.31	Octet 6 bits 1 to 5, user information layer 2 protocol?	O		☐ Yes ☐ No
	1. Basic mode ISO 1745		1	
	2. Q.921		2	
	3. X.25 link level		6	
	4. X.25 multi-link		7	
	5. Extended LAPB for half duplex (T.71)		8	
	6. HDLC ARM (ISO 4335)		9	
	7. HDLC NRM (ISO 4335)		10	
	8. HDLC ABM (ISO 4335)		11	
	9. LAN LLC ISO 8802-2		12	
	10. CCITT X.75 single link procedure		13	
IS 4.32	Octet 7 bits 1 to 5, user information layer 3 protocol?	O		☐ Yes ☐ No
	1. Q.931		2	
	2. X.25 packet layer		6	
	3. ISO 8208 (X.25 for DTE)		7	
	4. ISO 8348 (OSI connection oriented service)		8	
	5. ISO 8473 (OSI connectionless service)		9	
	6. CCITT T.70 minimum network layer		10	

Comments:

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B.2.7 Timers

Item	Timer Does the implementation support...	Status	Predicate	Reference	Support
TM 1	T301?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 2	T302?	M		Table 9.2	☐ Yes ☐ No
TM 3	T303?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 4	T304?	O	cp 1.2	Table 9.2	☐ Yes ☐ No
TM 5	T305?	M		Table 9.2	☐ Yes ☐ No
TM 8	T308?	M		Table 9.2	☐ Yes ☐ No
TM 9	T309?	O		Table 9.2	☐ Yes ☐ No
TM 10	T310?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 12	T313?	M		Table 9.2	☐ Yes ☐ No
TM 13	T314?	C	sp 13	Table 9.2	☐ Yes ☐ No
TM 14	T316?	C	sp 5	Table 9.2	☐ Yes ☐ No
TM 15	T317?	C	sp 5	Table 9.2	☐ Yes ☐ No
TM 16	T318?	C	sp 6	Table 9.2	☐ Yes ☐ No
TM 17	T319?	C	sp 6	Table 9.2	☐ Yes ☐ No
TM 19	T322?	C	sp 7.2	Table 9.2	☐ Yes ☐ No

Comments:

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B.3 Q.931 PICS proforma, primary rate

B.3.1 Global statement of conformance

The implementation described in this PICS meets all the mandatory requirements of the referenced Recommendation:

☐ Yes
☐ No

NOTE - Answering 'No' indicates non-conformance to the specified protocol Recommendation. Non-supported mandatory capabilities are to be identified in the following tables with an explanation by the implementor explaining why the implementation is non-conforming.

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B.3.2 Major capabilities

Item	Major capability Does the implementation...	Status	Predicate	Reference	Support
MC 1	support outgoing calls?	O.1		5.1	☐ Yes ☐ No
MC 1.1	support procedures of en-bloc sending?	O.2	cp 1	5.1.1, 5.1.5.1, 5.1.8	☐ Yes ☐ No
MC 1.2	support procedures of overlap sending?	O.2	cp 1	5.1.3, 5.1.5.2, 5.1.8	☐ Yes ☐ No
MC 1.3	send notification of interworking in an outgoing Setup message if the implementation is the point at which a call enters an ISDN environment from a non-ISDN environment?	C	sp 1	5.1.6	☐ Yes ☐ No
MC 1.4	support transit network selection?	O	cp 1	5.1.10, Annex C	☐ Yes ☐ No
MC 1.5	interpret in-band information sent from the network on outgoing calls?	O	cp 1	5.1.2, 5.1.3, 5.1.7, 5.4	☐ Yes ☐ No
MC 1.6	interpret notification of interworking sent from the network on outgoing calls?	O	cp 1	5.1.6	☐ Yes ☐ No
MC 1.7	generate local tones and local alerting indications?	O	cp 1	5.1.2, 5.1.7	☐ Yes ☐ No
MC 2	support incoming calls?	O.1		5.2	☐ Yes ☐ No
MC 2.1	support procedures of en-bloc receiving?	C	sp 2	5.2.1, 5.2.5.1	☐ Yes ☐ No
MC 2.2	support procedures of overlap receiving?	O	cp 2	5.2.1, 5.2.4	☐ Yes ☐ No
MC 2.3	send notification of interworking on incoming calls if the implementation is the point at which a call leaves an ISDN environment for a non-ISDN environment?	C	sp 2	5.2.6	☐ Yes ☐ No
MC 2.4	send in-band information on incoming calls?	O	cp 2	5.2.6	☐ Yes ☐ No
MC 2.5	accept the Setup message on the point-to-point data link?	C	sp 2	5.2.1, 5.2.3.1	☐ Yes ☐ No
MC 2.7	check the High layer compatibility information element?	O	cp 2	5.2.2, Annex B.3.3	☐ Yes ☐ No
MC 3	support user-initiated call clearing?	M		5.3.3	☐ Yes ☐ No
MC 4.1	wait for the network to send a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1	☐ Yes ☐ No
MC 4.2	respond with a RELEASE message on the receipt of a DISCONNECT message with Progress indicator information element #8?	O	cp 2	5.3.4.1	☐ Yes ☐ No
MC 4.3	support call clearing initiated by the network with tones/announcements not provided?	M		5.3.4.2	☐ Yes ☐ No

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Item	Major capability Does the implementation...	Status	Predicate	Reference	Support
MC 5	support restart procedure?	O Note		5.5	☐ Yes ☐ No
MC 6	support call rearrangement procedures (for the coincidence of S and T interfaces only)?	O		5.6	☐ Yes ☐ No
MC 7.1	support response to Status enquiry message?	M		5.8.10	☐ Yes ☐ No
MC 7.2	support sending of Status enquiry message?	O		5.8.10	☐ Yes ☐ No
MC 8	support symmetric call operation?	O		Annex D	☐ Yes ☐ No
MC 9	support network specific facility selection?	O	cp 1	Annex E	☐ Yes ☐ No
MC 10	support Low layer compatibility information element negotiation?	O		Annex M	☐ Yes ☐ No
MC 11.1	support user-to-user signalling during the set-up and clearing phases of a call (service 1)?	O		7.1.1, 7.1.3	☐ Yes ☐ No
MC 11.2	support user-to-user signalling during call establishment (service 2)?	O		7.1.1, 7.1.4	☐ Yes ☐ No
MC 11.3	support user-to-user signalling in the Active state of a call (service 3)?	O		7.1.1, 7.1.5	☐ Yes ☐ No
MC 12	support procedures for establishment of bearer connection prior to call acceptance?	O		Annex N	☐ Yes ☐ No
MC 13	support message segmentation procedures?	O		Annex K	☐ Yes ☐ No
MC 14	support D-channel back-up procedure?	O		Annex F	☐ Yes ☐ No
MC 15	support procedures for bearer service change?	O		Annex O	☐ Yes ☐ No

O.1 Support of at least one of these options is required.
O.2 Support of at least one of these options is required.
O.3 Support of one, and only one, of these options is required.

NOTE - Mandatory if the user is aware that the configuration of the interface is point-to-point.

Comments:

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B.3.3 Subsidiary capabilities

Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
	Call procedures				
SC 1	send the called party address information in the Called party number information element?	O.1	cp 1	5.1.1, 5.1.3	☐ Yes ☐ No
SC 2	send the called party address information in the Keypad facility information element?	O.1	cp 1	5.1.1, 5.1.3	☐ Yes ☐ No
SC 3	support the sending of Connect acknowledge message during outgoing call establishment?	O	cp 1	5.1.8	☐ Yes ☐ No
SC 4	monitor the status of B-channels?	O	cp 1	5.1.1	☐ Yes ☐ No
SC 5	check the bearer service provided?	C	sp 2	5.2.2, Annex B.3.2	☐ Yes ☐ No
SC 6	check the Low layer compatibility information element if available?	C	sp 2	5.2.2	☐ Yes ☐ No
SC 7	use the Bearer capability information element for Low layer compatibility information element checking if the Setup message received does not include the Low layer compatibility information element?	C	sp 2	Annex B.3.3	☐ Yes ☐ No
SC 8	attempt Low layer compatibility information element negotiation when a mismatch is found in Low or High layer compatibility information element checking?	C	sp 2 and sp 10	Annex B.3.4, Annex M	☐ Yes ☐ No
	General errors				
SC 9	Ignore a received message with protocol discrimination error?	M		5.8.1	☐ Yes ☐ No
SC 10	ignore a received message too short to contain a complete information element?	M		5.8.2	☐ Yes ☐ No
	Call reference errors				
SC 11	ignore a received message with Call reference bits 5 to 8 not equal to 0?	M		5.8.3.1	☐ Yes ☐ No
SC 12	ignore a received message if the call reference information element octet 1, bits 1 through 4 indicates a length greater than the maximum length supported?	M		5.8.3.1	☐ Yes ☐ No
SC 13	clear call on receiving any message other than Setup, Release, Release complete, Status, Resume, with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 14	ignore a received Setup or Resume message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 15	take no action on receiving a Release complete message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
SC 16	transmit a Release complete message on receiving a Release message with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 17	transmit a Status message on receiving any message other than Restart, Restart acknowledge, Status, with unrecognisable Call reference value?	M		5.8.3.2	☐ Yes ☐ No
SC 18	ignore a Setup message containing a Call reference value relating to an existing call?	M		5.8.3.2	☐ Yes ☐ No
	Message type, message sequence errors				
SC 19	transmit a Status message on receipt of an unexpected message other than Release, Release complete or of an unrecognisable message in any other state than the Null state?	O.2		5.8.4	☐ Yes ☐ No
SC 20	transmit a Status enquiry message on receipt of an unexpected message other than Release, Release complete or of an unrecognisable message in any other state than the Null state?	O.2		5.8.4	☐ Yes ☐ No
SC 21	clear call on receipt of an unexpected Release, Release complete message?	M		5.8.4	☐ Yes ☐ No
	General information errors				
SC 22	support general information element error procedures in codesets other than 0?	O		5.8.5	☐ Yes ☐ No
SC 23	process information elements regardless of their order in the message?	O.3		5.8.5.1	☐ Yes ☐ No
SC 24	ignore out of sequence information elements?	O.3		5.8.5.1	☐ Yes ☐ No
SC 25	ignore not permitted repetitions of an information element?	M		5.8.5.2	☐ Yes ☐ No
SC 26	handle permitted repetitions (up to a limit) of an information element?	M		5.8.5.2	☐ Yes ☐ No
	Mandatory information elements errors				
SC 27	take no action, except for the sending of a Status message, on receipt of a message other than Setup, Disconnect, Release, Release complete, with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 28	return a Release complete message, on receipt of a Setup or Release message with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
SC 29	clear the call on receipt of a Disconnect message with mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 30	handle a Release complete message as normal even if it has mandatory information elements missing or with invalid content?	M		5.8.6.1, 5.8.6.2	☐ Yes ☐ No
SC 31	treat information elements with length exceeding the maximum as with invalid content?	M		5.8.6.2	☐ Yes ☐ No
	Non-mandatory information elements errors				
SC 32	transmit a Status message on receipt of a message other than Disconnect, Release, Release complete, with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 33	transmit a Release message on receipt of a Disconnect message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 34	transmit a Release complete message on receipt of a Release message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 35	take no action on receipt of a Release complete message with unrecognised non-mandatory information elements?	M		5.8.7.1	☐ Yes ☐ No
SC 36	ignore incorrect or unrecognisable non-mandatory information elements?	O.4		5.8.7.2	☐ Yes ☐ No
SC 37	transmit a Status message on receipt of a message with incorrect non-mandatory information elements?	O.4		5.8.7.2	☐ Yes ☐ No
SC 38	truncate and process non-mandatory information elements which are too long?	O.5		5.8.7.2	☐ Yes ☐ No
SC 39	treat as incorrect non-mandatory information elements which are too long?	O.5		5.8.7.2	☐ Yes ☐ No
SC 40	truncate and process a Call identity information element too long?	M		5.8.7.2	☐ Yes ☐ No
	Data link reset				
SC 41	clear calls in overlap sending/receiving?	C	sp 1.2 or sp 2.2	5.8.8	☐ Yes ☐ No
SC 42	maintain calls in the establishment phase or in Active States?	M		5.8.8	☐ Yes ☐ No

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Item	Subsidiary capability Does the implementation...	Status	Predicate	Reference	Support
	Data link failure				
SC 43	clear calls in overlap sending/receiving?	C	sp 1.2 or sp 2.2	5.8.9	☐ Yes ☐ No
SC 44	clear calls in the Active state?	M		5.8.9	☐ Yes ☐ No
SC 45	proceed to layer 2 re-establishment?	O		5.8.9	☐ Yes ☐ No
SC 46	transmit either a Status enquiry or a Status message when layer 2 is re-established?	M		5.8.9	☐ Yes ☐ No
SC 47	clear all the calls if layer 2 fails to be re-established?	M		5.8.9	☐ Yes ☐ No
	Status enquiry procedure				
SC 48	retransmit Status enquiry message a number of times up to a limit?	O	cp 7.2	5.8.10	☐ Yes ☐ No
SC 49	clear call if the limit of SC 48 is reached?	M		5.8.10	☐ Yes ☐ No

O.1 Support of at least one of these options is required.
O.2 Support of one, and only one, of these items is required.
O.3 Support of one, and only one, of these items is required.
O.4 Support of one, and only one, of these items is required.
O.5 Support of one, and only one, of these items is required.

Comments:

B.3.4 Call states

Item	Call states Does the implementation support the...	Status	Predicate	Reference	Support
CS 1	Null state (U0)?	M		2.1.2.1	☐ Yes ☐ No
CS 2	Call initiated state (U1)?	C	sp 1	2.1.2.2	☐ Yes ☐ No
CS 3	Overlap sending state (U2)?	C	sp 1.2	2.1.2.3	☐ Yes ☐ No
CS 4	Outgoing call proceeding state (U3)?	C	sp 1	2.1.2.4	☐ Yes ☐ No
CS 5	Call delivered state (U4)?	C	sp 1	2.1.2.5	☐ Yes ☐ No
CS 6	Call present state (U6)?	C	sp 2	2.1.2.6	☐ Yes ☐ No
CS 7	Call received state (U7)?	O	cp 2	2.1.2.7	☐ Yes ☐ No
CS 8	Connect request state (U8)?	C	sp 2	2.1.2.8	☐ Yes ☐ No
CS 9	Incoming call proceeding state (U9)?	O	cp 2	2.1.2.9	☐ Yes ☐ No
CS 10	Active state (U10)?	M		2.1.2.10	☐ Yes ☐ No
CS 11	Disconnect request state (U11)?	M		2.1.2.11	☐ Yes ☐ No
CS 12	Disconnect indication state (U12)?	M		2.1.2.12	☐ Yes ☐ No
CS 13	Suspend request state (U15)?	C	sp 6	2.1.2.13	☐ Yes ☐ No
CS 14	Resume request state (U17)?	C	sp 6	2.1.2.14	☐ Yes ☐ No
CS 15	Release request state (U19)?	M		2.1.2.15	☐ Yes ☐ No
CS 17	Overlap receiving state (U25)?	C	sp 2.2	2.1.2.17	☐ Yes ☐ No
CS 18	Null state (Rest 0)?	M		2.4.1.1	☐ Yes ☐ No
CS 19	Restart request state (Rest 1)?	M		2.4.1.2	☐ Yes ☐ No
CS 20	Restart state (Rest 2)?	M		2.4.1.3	☐ Yes ☐ No

Comments:

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B.3.5 Supported messages

B.3.5.1 Network to user (received by the user)

Item	Supported messages Does the implementation support...	Status	Predicate	Reference	Support
MR 1	Alerting (1)?	C	sp 1	3.1.1, 5.1.7	☐ Yes ☐ No
MR 2	Call proceeding (2)?	C	sp 1	3.1.2, 5.1.5	☐ Yes ☐ No
MR 3	Congestion control (121)?	C	sp 11.3	3.1.3, 7.1.5.7	☐ Yes ☐ No
MR 4	Connect (7)?	C	sp 1	3.1.4, 5.1.8	☐ Yes ☐ No
MR 5	Connect acknowledge (15)?	C	sp 2	3.1.5, 5.2.8	☐ Yes ☐ No
MR 6	Disconnect (69)?	M		3.1.6, 5.3.4	☐ Yes ☐ No
MR 7	Facility (98)?	O		3.1.7	☐ Yes ☐ No
MR 8	Information (123)?	C	sp 2.2	3.1.8, 5.2.4	☐ Yes ☐ No
MR 9	Notify (110)?	C	sp 6 or sp 15	3.1.9, 5.6.7, 5.6.4, Annex O	☐ Yes ☐ No
MR 10	Progress (3)?	M		3.1.10, 5.1.6, 5.2.6	☐ Yes ☐ No
MR 11	Release (77)?	M		3.1.11, 5.3	☐ Yes ☐ No
MR 12	Release complete (90)?	M		3.1.12, 5.3	☐ Yes ☐ No
MR 13	Restart (70)?	M		3.4.1, 5.5.2	☐ Yes ☐ No
MR 14	Restart acknowledge (78)?	M		3.4.2, 5.5.1	☐ Yes ☐ No
MR 15	Resume (38)?	N/A		3.1.13, 5.6.4	
MR 16	Resume acknowledge (46)?	C	sp 6	3.1.14, 5.6.4	☐ Yes ☐ No
MR 17	Resume reject (34)?	C	sp 6	3.1.15, 5.6.5	☐ Yes ☐ No
MR 18	Segment (96)?	C	sp 13	Annex K	☐ Yes ☐ No
MR 19	Setup (5)?	C	sp 2	3.1.16, 5.2.1	☐ Yes ☐ No
MR 20	Setup acknowledge (13)?	C	sp 1.2	3.1.17, 5.1.3	☐ Yes ☐ No
MR 21	Status (125)?	M		3.1.18, 3.4.3, 5.8.11	☐ Yes ☐ No
MR 22	Status enquiry (117)?	M		3.1.19, 5.8.10	☐ Yes ☐ No
MR 23	Suspend (37)?	N/A		3.1.20, 5.6.1	
MR 24	Suspend acknowledge (45)?	C	sp 6	3.1.21, 5.6.2	☐ Yes ☐ No
MR 25	Suspend reject (33)?	C	sp 6	3.1.22, 5.6.3	☐ Yes ☐ No
MR 26	User information (32)?	C	sp 11.2 or sp 11.3	3.1.23, 7.1.4, 7.1.5	☐ Yes ☐ No

NOTE - The value of each message is expressed in decimal number into the parentheses.

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B.3.5.2 User to network (transmitted by the user)

Item	Supported messages Does the implementation support...	Status	Predicate	Reference	Support
MT 1	Alerting (1)?	O	cp 2	3.1.1, 5.2.5.2	☐ Yes ☐ No
MT 2	Call proceeding (2)?	O	cp 2	3.1.2, 5.2.5.2	☐ Yes ☐ No
MT 3	Congestion control (121)?	C	sp 11.3	3.1.3, 7.1.5.7	☐ Yes ☐ No
MT 4	Connect (7)?	C	sp 2	3.1.4, 5.2.7	☐ Yes ☐ No
MT 5	Connect acknowledge (15)?	O	cp 1	3.1.5, 5.1.8	☐ Yes ☐ No
MT 6	Disconnect (69)?	M		3.1.6, 5.3.3	☐ Yes ☐ No
MT 7	Facility (98)?	O		3.1.7	☐ Yes ☐ No
MT 8	Information (123)?	C	sp 1.2	3.1.8, 5.1.3	☐ Yes ☐ No
MT 9	Notify (110)?	C	sp 6	3.1.9, 5.6.7	☐ Yes ☐ No
MT 10	Progress (3)?	C	sp 2.3	3.1.10, 5.2.6	☐ Yes ☐ No
MT 11	Release (77)?	M		3.1.11, 5.3	☐ Yes ☐ No
MT 12	Release complete (90)?	M		3.1.12, 5.3	☐ Yes ☐ No
MT 13	Restart (70)?	M		3.4.1, 5.5	☐ Yes ☐ No
MT 14	Restart acknowledge (78)?	M		3.4.2, 5.5	☐ Yes ☐ No
MT 15	Resume (38)?	C	sp 6	3.1.13, 5.6.4	☐ Yes ☐ No
MT 16	Resume acknowledge (46)?	N/A		3.1.14, 5.6.4	
MT 17	Resume reject (34)?	N/A		3.1.15, 5.6.5	
MT 18	Segment (96)?	C	sp 13	Annex K	☐ Yes ☐ No
MT 19	Setup (5)?	C	sp 1	3.1.16, 5.1.1	☐ Yes ☐ No
MT 20	Setup acknowledge (13)?	C	sp 2.2	3.1.17, 5.2.4	☐ Yes ☐ No
MT 21	Status (125)?	M		3.1.18, 3.4.3, 5.8.11	☐ Yes ☐ No
MT 22	Status enquiry (117)?	C	sp 7.2	3.1.19, 5.8.10	☐ Yes ☐ No
MT 23	Suspend (37)?	C	sp 6	3.1.20, 5.6.1	☐ Yes ☐ No
MT 24	Suspend acknowledge (45)?	N/A		3.1.21, 5.6.2	
MT 25	Suspend reject (33)?	N/A		3.1.22, 5.6.3	
MT 26	User information (32)?	C	sp 11.2 or sp 11.3	3.1.23, 7.1.4, 7.1.5	☐ Yes ☐ No

NOTE - The value of each message is expressed in decimal number into the parentheses.

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B.3.5.3 Message structure

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 1	**Alerting** (3.1.1)				
MS 1.1	Pre-amble (Note 1)?	M	Both		☐ Yes ☐ No
MS 1.2	Channel identification?	O Note 2	Both		☐ Yes ☐ No
MS 1.3	Facility?	O	Both		☐ Yes ☐ No
MS 1.4	Progress indicator?	O Note 3	Both		☐ Yes ☐ No
MS 1.5	Display?	O	NW to User		☐ Yes ☐ No
MS 1.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 1.7	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Pre-amble is composed of Protocol discriminator, Call reference and Message type.

NOTE 2 - Mandatory if this message is the first in response to Setup, unless the user accepts the B-channel indicated in the Setup message.

NOTE 3 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 2	**Call proceeding** (3.1.2)				
MS 2.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 2.2	Channel identification?	M	Both		☐ Yes ☐ No
MS 2.3	Progress indicator?	O Note	Both		☐ Yes ☐ No
MS 2.4	Display?	O	NW to User		☐ Yes ☐ No

NOTE - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 3	**Congestion control** (3.1.3)				
MS 3.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 3.2	Congestion level?	M	Both		☐ Yes ☐ No
MS 3.3	Cause?	O	Both		☐ Yes ☐ No
MS 3.4	Display?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 4	**Connect** (3.1.4)				
MS 4.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 4.2	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 4.3	Facility?	O	Both		☐ Yes ☐ No
MS 4.4	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 4.5	Display?	O	NW to User		☐ Yes ☐ No
MS 4.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 4.7	Low layer compatibility?	O	Both		☐ Yes ☐ No
MS 4.8	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Mandatory if this message is the first in response to Setup, unless the user accepts the B-channel indicated in the Setup message.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 5	**Connect acknowledge** (3.1.5)				
MS 5.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 5.2	Channel identification?	O	NW to User		☐ Yes ☐ No
MS 5.3	Display?	O	NW to User		☐ Yes ☐ No
MS 5.4	Signal?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 6	**Disconnect** (3.1.6)				
MS 6.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 6.2	Cause?	M	Both		☐ Yes ☐ No
MS 6.3	Facility?	O	Both		☐ Yes ☐ No
MS 6.4	Progress indicator?	O	Both		☐ Yes ☐ No
MS 6.5	Display?	O	NW to User		☐ Yes ☐ No
MS 6.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 6.7	User-to-user?	O	Both		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 7	**Facility** (3.1.7)				
MS 7.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 7.2	Facility?	M	Both		☐ Yes ☐ No
MS 7.3	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 8	**Information** (3.1.8)				
MS 8.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 8.2	Sending complete?	O	Both		☐ Yes ☐ No
MS 8.3	Cause?	O	NW to User		☐ Yes ☐ No
MS 8.4	Display?	O	NW to User		☐ Yes ☐ No
MS 8.5	Keypad facility?	O	User to NW		☐ Yes ☐ No
MS 8.6	Signal?	O	NW to User		☐ Yes ☐ No
MS 8.7	Called party number?	O	Both		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 9	**Notify** (3.1.9)				
MS 9.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 9.2	Bearer capability?	O	NW to user		☐ Yes ☐ No
MS 9.3	Notification indicator?	M	Both		☐ Yes ☐ No
MS 9.4	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 10	**Progress** (3.1.10)				
MS 10.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 10.2	Cause?	O	Both		☐ Yes ☐ No
MS 10.3	Progress indicator?	M	Both		☐ Yes ☐ No
MS 10.4	Display?	O	NW to User		☐ Yes ☐ No
MS 10.5	User-to-user?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 11	**Release** (3.1.11)				
MS 11.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 11.2	Cause?	O Note	Both		☐ Yes ☐ No
MS 11.3	Facility?	O	Both		☐ Yes ☐ No
MS 11.4	Display?	O	NW to User		☐ Yes ☐ No
MS 11.5	Signal?	O	NW to User		☐ Yes ☐ No
MS 11.6	User-to user?	O	Both		☐ Yes ☐ No

NOTE - Mandatory if this message is the first call clearing message.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 12	**Release complete** (3.1.12)				
MS 12.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 12.2	Cause?	O Note	Both		☐ Yes ☐ No
MS 12.3	Facility?	O	Both		☐ Yes ☐ No
MS 12.4	Display?	O	NW to User		☐ Yes ☐ No
MS 12.5	Signal?	O	NW to User		☐ Yes ☐ No
MS 12.6	User-to user?	O	User to NW		☐ Yes ☐ No

NOTE - Mandatory if this message is the first call clearing message.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 13	**Restart** (3.4.1)				
MS 13.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 13.2	Channel identification?	O Note	Both		☐ Yes ☐ No
MS 13.3	Display?	O	NW to User		☐ Yes ☐ No
MS 13.4	Restart indicator?	M	Both		☐ Yes ☐ No

NOTE - Mandatory to interpret when received.

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 14	**Restart acknowledge** (3.4.2)				
MS 14.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 14.2	Channel identification?	O	Both		☐ Yes ☐ No
MS 14.3	Display?	O	NW to User		☐ Yes ☐ No
MS 14.4	Restart indicator?	M	Both		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 15	**Resume** (3.1.13)				
MS 15.1	Pre-amble (see MS 1.1)?	M	User to NW		☐ Yes ☐ No
MS 15.2	Call identity?	O	User to NW		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 16	**Resume acknowledge** (3.1.14)				
MS 16.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 16.2	Channel identification?	M	NW to User		☐ Yes ☐ No
MS 16.3	Display	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 17	**Resume reject** (3.1.15)				
MS 17.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 17.2	Cause?	M	NW to User		☐ Yes ☐ No
MS 17.3	Display	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 18	**Segment** (Annex K)				
MS 18.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 18.2	Segmented message?	M	Both		☐ Yes ☐ No
MS 18.3	Information elements?	O	Both		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 19	**Setup** (3.1.16)				
MS 19.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 19.2	Sending complete?	O	Both		☐ Yes ☐ No
MS 19.3	Repeat indicator?	O	Both		☐ Yes ☐ No
MS 19.4	Bearer capability?	M	Both		☐ Yes ☐ No
MS 19.5	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 19.6	Facility?	O	Both		☐ Yes ☐ No
MS 19.7	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 19.8	Network specific facilities?	O	Both		☐ Yes ☐ No
MS 19.9	Display?	O	NW to User		☐ Yes ☐ No
MS 19.10	Keypad facility?	O	User to NW		☐ Yes ☐ No
MS 19.11	Signal?	O	NW to User		☐ Yes ☐ No
MS 19.12	Calling party number?	O	Both		☐ Yes ☐ No
MS 19.13	Calling party subaddress?	O	Both		☐ Yes ☐ No
MS 19.14	Called party number?	O	Both		☐ Yes ☐ No
MS 19.15	Called party subaddress?	O	Both		☐ Yes ☐ No
MS 19.16	Transit network selection?	O	User to NW		☐ Yes ☐ No
MS 19.17	Low layer compatibility?	O	Both		☐ Yes ☐ No
MS 19.18	High layer compatibility?	O	Both		☐ Yes ☐ No
MS 19.19	User-to-user?	O	Both		☐ Yes ☐ No

NOTE 1 - Mandatory to interpret when received.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 20	**Setup acknowledge** (3.1.17)				
MS 20.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 20.2	Channel identification?	O Note 1	Both		☐ Yes ☐ No
MS 20.3	Progress indicator?	O Note 2	Both		☐ Yes ☐ No
MS 20.4	Display?	O	NW to User		☐ Yes ☐ No
MS 20.5	Signal?	O	NW to User		☐ Yes ☐ No

NOTE 1 - Mandatory to interpret when received.

NOTE 2 - Mandatory in the User to Network direction when interworking occurs (MC 1.3, MC 2.3). Mandatory in the Network to User direction.

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 21	**Status** (3.1.18, 3.4.3)				
MS 21.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 21.2	Cause?	M	Both		☐ Yes ☐ No
MS 21.3	Call state?	M	Both		☐ Yes ☐ No
MS 21.4	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 22	**Status enquiry** (3.1.19)				
MS 22.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 22.2	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 23	**Suspend** (3.1.20)				
MS 23.1	Pre-amble (see MS 1.1)?	M	User to NW		☐ Yes ☐ No
MS 23.2	Call identity?	O	User to NW		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 24	**Suspend acknowledge** (3.1.21)				
MS 24.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 24.2	Display?	O	NW to User		☐ Yes ☐ No

Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 25	**Suspend reject** (3.1.22)				
MS 25.1	Pre-amble (see MS 1.1)?	M	NW to User		☐ Yes ☐ No
MS 25.2	Cause?	M	NW to User		☐ Yes ☐ No
MS 25.3	Display?	O	NW to User		☐ Yes ☐ No

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Item	Message structure Does the implementation support inclusion/interpretation of...	Status	Direction	Reference	Support
MS 26	**User information** (3.1.23)				
MS 26.1	Pre-amble (see MS 1.1)?	M	Both		☐ Yes ☐ No
MS 26.2	More data?	O	Both		☐ Yes ☐ No
MS 26.3	User-to-user?	M	Both		☐ Yes ☐ No

Comments:

B.3.6 Information elements

B.3.6.1 Network to user (received by the user)

Item	Information element Does the implementation support...	Status	Predicate	Reference	Support
IER 1	Bearer capability (4, 2-13)?	M		4.5.5	☐ Yes ☐ No
IER 2	Call identity (16, 2-10)?	C	sp 6	4.5.6	☐ Yes ☐ No
IER 3	Call state (20, 2-3)?	M		4.5.7	☐ Yes ☐ No
IER 4	Called party number (112, 2-any)?	O	cp 2	4.5.8	☐ Yes ☐ No
IER 5	Called party subaddress (113, 2-23)?	O	cp 2	4.5.9	☐ Yes ☐ No
IER 6	Calling party number (108, 2-any)?	O	cp 2	4.5.10	☐ Yes ☐ No
IER 7	Calling party subaddress (109, 2-23)?	O	cp 2	4.5.11	☐ Yes ☐ No
IER 8	Cause (8, 2-32)?	M		4.5.12	☐ Yes ☐ No
IER 9	Channel identification (24, 2-any)?	M		4.5.13	☐ Yes ☐ No
IER 10	Congestion level (3, 1)?	C	sp 11.3	4.5.14	☐ Yes ☐ No
IER 11	Date/Time (41, 2-8)?	O		4.6.1	☐ Yes ☐ No
IER 12	Display (40, 2-34/82)?	O		4.5.15	☐ Yes ☐ No
IER 13	Facility (28, 2-any)?	C	sp 11.1	4.6.2, 7.1.2	☐ Yes ☐ No
IER 14	High layer compatibility (125, 2-5)?	O	cp 2	4.5.16	☐ Yes ☐ No
IER 15	Keypad facility (44, 2-34)?	O		4.5.17, 7.1.2	☐ Yes ☐ No
IER 17	Low layer compatibility (124, 2-16)?	O	cp 2	4.5.18	☐ Yes ☐ No
IER 18	More data (160, 1)?	C	sp 11.2 or sp 11.3	4.5.19	☐ Yes ☐ No
IER 19	Network specific facilities (32, 2-any)?	C	sp 9	4.5.20	☐ Yes ☐ No
IER 21	Notification indicator (39, 3)?	C	sp 6 or sp 15	4.5.21, Annex O	☐ Yes ☐ No
IER 22	Progress indicator (30, 4)?	M		4.5.22	☐ Yes ☐ No
IER 23	Repeat indicator (80, 1)?	O		4.5.23	☐ Yes ☐ No
IER 24	Restart indicator (121, 2-3)?	M		4.5.24	☐ Yes ☐ No
IER 25	Segmented message (0, 2-4)?	C	sp 13	4.5.25	☐ Yes ☐ No
IER 26	Sending complete (145, 1)?	C	sp 2.2	4.5.26	☐ Yes ☐ No
IER 27	Shift (-, 1)?	M		4.5.3, 4.5.4	☐ Yes ☐ No
IER 28	Signal (36, 2-3)?	C	sp 1.5 or sp 11.2	4.5.27, 7.1.2	☐ Yes ☐ No
IER 29	Transit network selection (120, 2-any)?	N/A		4.5.28	
IER 30	User-to-user (126, 2-35/131)?	C	sp 11.	4.5.29	☐ Yes ☐ No

NOTE - The first decimal number inside the parentheses gives the value of the information element, the second gives the minimum number of octets and the third - if it exists - the maximum number of octets.

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B.3.6.2 User to network (transmitted by the user)

Item	Information element Does the implementation support...	Status	Predicate	Reference	Support
IET 1	Bearer capability (4, 2-13)?	M		4.5.5	☐ Yes ☐ No
IET 2	Call identity (16, 2-10)?	C	sp 6	4.5.6	☐ Yes ☐ No
IET 3	Call state (20, 2-3)?	M		4.5.7	☐ Yes ☐ No
IET 4	Called party number (112, 2-any)?	C	sp 1	4.5.8	☐ Yes ☐ No
IET 5	Called party subaddress (113, 2-23)?	O	cp 1	4.5.9	☐ Yes ☐ No
IET 6	Calling party number (108, 2-any)?	O	cp 1	4.5.10	☐ Yes ☐ No
IET 7	Calling party subaddress (109, 2-23)?	O	cp 1	4.5.11	☐ Yes ☐ No
IET 8	Cause (8, 2-32)?	M		4.5.12	☐ Yes ☐ No
IET 9	Channel identification (24, 2-any)?	C	sp 1 or sp 6	4.5.13	☐ Yes ☐ No
IET 10	Congestion level (3, 1)?	C	sp 11.3	4.5.14	☐ Yes ☐ No
IET 11	Date/Time (41, 2-8)?	N/A		4.6.1	
IET 12	Display (40, 2-34/82)?	N/A		4.5.15	
IET 13	Facility (28, 2-any)?	N/A		4.6.2, 7.1.2	
IET 14	High layer compatibility (125, 2-5)?	O	cp 1	4.5.16	☐ Yes ☐ No
IET 15	Keypad facility (44, 2-34)?	C	sp SC 2 or sp 11.2	4.5.17	☐ Yes ☐ No
IET 16	Locking shift (-, 1)?	O		4.5.3	☐ Yes ☐ No
IET 17	Low layer compatibility (124, 2-16)?	O		4.5.18	☐ Yes ☐ No
IET 18	More data (160, 1)?	C	sp 11.2 or sp 11.3	4.5.19	☐ Yes ☐ No
IET 19	Network specific facilities (32, 2-any)?	C	sp 9	4.5.20	☐ Yes ☐ No
IET 20	Non-locking shift (-, 1)?	O		4.5.4	☐ Yes ☐ No
IET 21	Notification indicator (39, 3)?	C	sp 6	4.5.21, Annex O	☐ Yes ☐ No
IET 22	Progress indicator (30, 4)?	O Note 1		4.5.22	☐ Yes ☐ No
IET 23	Repeat indicator (80, 1)?	M		4.5.23	☐ Yes ☐ No
IET 24	Restart indicator (121, 2-3)?	M		4.5.24	☐ Yes ☐ No
IET 25	Segmented message (0, 2-4)?	C	sp 13	4.5.25	☐ Yes ☐ No
IET 26	Sending complete (145, 1)?	C	sp 1.2	4.5.26	☐ Yes ☐ No
IET 28	Signal (36, 2-3)?	N/A		4.5.27, 7.1.2	
IET 29	Transit network selection (120, 2-any)?	C	sp 1.4	4.5.28	☐ Yes ☐ No
IET 30	User-to-user (126, 2-35/131)?	C	sp 11.	4.5.29	☐ Yes ☐ No

NOTE 1 - Mandatory if terminal can perform interworking.

NOTE 2 - The first decimal number inside the parentheses gives the value of the information element, the second gives the minimum number of octets and the third - if it exists - the maximum number of octets.

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B.3.6.3 Information element structure

Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT 2. International 3. National 4. Network		0 1 2 3	
IS 1.2	Octet 3 bits 1 to 5, information transfer capability?	M		☐ Yes ☐ No
	1. Speech 2. Unrestricted digital 3. Restricted digital 4. 3.1 kHz audio 5. 7 kHz audio 6 Video		0 8 9 16 17 24	
IS 1.3	Octet 4 bits 6 and 7, transfer mode?	M		☐ Yes ☐ No
	1. Circuit		0	
IS 1.4	Octet 4 bits 1 to 5, information transfer rate, origination to destination if octet 4b is present, bi-directional otherwise?	M		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s 3. 384 kbit/s 4. 1536 kbit/s 5. 1920 kbit/s		16 17 19 21 23	
IS 1.5	Octet 4a bits 5 to 7, structure?	O		☐ Yes ☐ No
	1. Default 2. 8 kHz integrity 3. Service data unit integrity 4. Unstructured		0 1 4 7	
IS 1.6	Octet 4a bits 3 and 4, configuration?	O		☐ Yes ☐ No
	1. Point-to-point		0	
IS 1.7	Octet 4a bits 1 and 2, establishment?	O		☐ Yes ☐ No
	1. Demand		0	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.8	Octet 4b bits 6 and 7, symmetry?	O		☐ Yes ☐ No
	1. Bi-directional symmetric		0	
IS 1.9	Octet 4b bits 1 to 5, information transfer rate, destination to origination?	O		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s 3. 384 kbit/s 4. 1536 kbit/s 5. 1920 kbit/s		16 17 19 21 23	
IS 1.10	Octet 5 bits 1 to 5, user information layer 1 protocol?	O		☐ Yes ☐ No
	1. V.110/X.30 2. G.711 μ-law 3. G.711 A-law 4. G.721 32 kbit/s ADPCM and I.460 5. G.722 and G.725 7 kHz audio 6. G.7xx 384 kbit/s video 7. Non-CCITT rate adaption 8. V.120 9. X.31 HDLC		1 2 3 4 5 6 7 8 9	
IS 1.11	Octet 5a bit 7, synchronous/asynchronous?	O		☐ Yes ☐ No
	1. Synchronous 2. Asynchronous		0 1	
IS 1.12	Octet 5a bit 6, negotiation indicator?	O		☐ Yes ☐ No
	1. In-band negotiation not possible 2. In-band negotiation possible		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.13	Octet 5a bits 1 to 5, user rate?	O		☐ Yes ☐ No
	1. Rate indicated by E-bits (I.460)		0	
	2. 0.6 kbit/s CCITT V.6 and X.1		1	
	3. 1.2 kbit/s CCITT V.6		2	
	4. 2.4 kbit/s CCITT V.6 and X.1		3	
	5. 3.6 kbit/s CCITT V.6		4	
	6. 4.8 kbit/s CCITT V.6 and X.1		5	
	7. 7.2 kbit/s CCITT V.6		6	
	8. 8 kbit/s CCITT I.460		7	
	9. 9.6 kbit/s CCITT V.6 and X.1		8	
	10. 14.4 kbit/s CCITT V.6		9	
	11. 16 kbit/s CCITT I.460		10	
	12. 19.2 kbit/s CCITT V.6		11	
	13. 32 kbit/s CCITT I.460		12	
	14. 48 kbit/s CCITT V.6 and X.1		14	
	15. 56 kbit/s CCITT V.6		15	
	16. 64 kbit/s CCITT X.1		16	
	17. 0.1345 kbit/s CCITT X.1		21	
	18. 0.100 kbit/s CCITT X.1		22	
	19. 0.075/1.2 kbit/s CCITT V.6 and X.1		23	
	20. 1.2/0.075 kbit/s CCITT V.6 and X.1		24	
	21. 0.050 kbit/s CCITT V.6 and X.1		25	
	22. 0.075 kbit/s CCITT V.6 and X.1		26	
	23. 0.110 kbit/s CCITT V.6 and X.1		27	
	24. 0.150 kbit/s CCITT V.6 and X.1		28	
	25. 0.200 kbit/s CCITT V.6 and X.1		29	
	26. 0.300 kbit/s CCITT V.6 and X.1		30	
	27. 12 kbit/s CCITT V.6		31	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
	Octet 5b, case 1 (Note)			
IS 1.14	Octet 5b bits 6 and 7, intermediate rate?	O		☐ Yes ☐ No
	1. Not used 2. 8 kbit/s 3. 16 kbit/s 4. 32 kbit/s		0 1 2 3	
IS 1.15	Octet 5b bit 5, network independent clock (NIC) on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with NIC 2. Required to send data with NIC		0 1	
IS 1.16	Octet 5b bit 4, NIC on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with NIC 2. Can accept data with NIC		0 1	
IS 1.17	Octet 5b bit 3, flow control on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with flow control 2. Required to send data with flow control		0 1	
IS 1.18	Octet 5b bit 2, flow control on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with flow control mechanism 2. Can accept data with flow control mechanism		0 1	
	Octet 5b, case 2 (Note)			
IS 1.19	Octet 5b bit 7, rate adaption header?	O		☐ Yes ☐ No
	1. Header not included 2. Header included		0 1	
IS 1.20	Octet 5b bit 6, multiple frame establishment (MFE) support in data link?	O		☐ Yes ☐ No
	1. MFE not supported, only UI frames allowed 2. MFE supported		0 1	
IS 1.21	Octet 5b bit 5, mode of operation?	O		☐ Yes ☐ No
	1. Bit transparent mode 2. Protocol sensitive mode		0 1	

NOTE - Octet 5b case 1 is for V.110/X.30 rate adaption, octet 5b case 2 is for V.120 rate adaption.

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Item	Information element parts Does the message include...	Status	Values	Support
IS 1	**Bearer capability** (Table 4-6, Figure 4-11)			
IS 1.22	Octet 5b bit 4, logical link identifier (LLI) negotiation?	O		☐ Yes ☐ No
	1. Default LLI = 256 only 2. Full protocol negotiation		0 1	
IS 1.23	Octet 5b bit 3, assignor/assignee?	O		☐ Yes ☐ No
	1. Message originator is 'default assignee' 2. Message originator is 'assignor only'		0 1	
IS 1.24	Octet 5b bit 2, in-band/out-band negotiation?	O		☐ Yes ☐ No
	1. Negotiation performed with USER INFORMATION messages 2. Negotiation performed in-band		0 1	
IS 1.25	Octet 5c bits 6 and 7, number of stop bits?	O		☐ Yes ☐ No
	1. Not used 2. 1 bit 3. 1.5 bits 4. 2 bits		0 1 2 3	
IS 1.26	Octet 5c bits 4 and 5, number of data bits excluding parity?	O		☐ Yes ☐ No
	1. Not used 2. 5 bits 3. 7 bits 4. 8 bits		0 1 2 3	
IS 1.27	Octet 5c bits 1 to 3, parity information?	O		☐ Yes ☐ No
	1. Odd 2. Even 3. None 4. Forced to 0 5. Forced to 1		0 2 3 4 5	
IS 1.28	Octet 5d bit 7, duplex mode?	O		☐ Yes ☐ No
	1. Half duplex 2. Full duplex		0 1	
IS 1.29	Octet 5d bits 1 to 6, modem type?	O		☐ Yes ☐ No
	1. V.21 2. V.22 3. V.22 bis 4. V.23 5. V.26 6. V.26 bis 7. V.26 ter 8. V.27 9. V.27 bis 10. V.27 ter 11. V.29 12. V.32 13. V.35		1 2 3 4 5 6 7 8 9 10 11 12 13	
IS 1.30	Octet 6 bits 1 to 5, user information layer 2 protocol?	O		☐ Yes ☐ No
	1. Q.921 2. X.25 link level		2 6	
IS 1.31	Octet 7 bits 1 to 5, user information layer 3 protocol?	O		☐ Yes ☐ No
	1. Q.931 2. X.25 packet layer		2 6	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 2	**Channel identification** (Table 4-15, Figure 4-20)			
IS 2.1	Octet 3 bit 7, interface identifier present?	M		☐ Yes ☐ No
	1. Interface implicitly identified 2. Interface explicitly identified		0 1	
IS 2.2	Octet 3 bit 6, interface type?	M		☐ Yes ☐ No
	1. Other interface		1	
IS 2.3	Octet 3 bit 4, preferred/exclusive?	M		☐ Yes ☐ No
	1. Indicated channel preferred 2. Exclusive, indicated channel only accepted		0 1	
IS 2.4	Octet 3 bit 3, D-channel indicator?	M		☐ Yes ☐ No
	1. Channel not the D-channel 2. Channel is the D-channel		0 1	
IS 2.5	Octet 3 bits 1 and 2, information channel selection?	M		☐ Yes ☐ No
	1. No channel 2. As included in the following octets 3. Any channel		0 1 3	
IS 2.6	Octet 3.1, bits 1 to 7, interface identifier?	O		☐ Yes ☐ No
IS 2.7	Octet 3.2, bits 1 to 4, channel type/map element type?	O		☐ Yes ☐ No
IS 2.8	Octet 3.3, channel number/slot number?	O		☐ Yes ☐ No

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Item	Information element parts Does the message include...	Status	Values	Support
IS 3	**High layer compatibility** (Table 4-17, Figure 4-24)			
IS 3.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT standardized 2. International 3. National 4. Network		0 1 2 3	
IS 3.2	Octet 4 bits 1 to 7, HL characteristics?	M		☐ Yes ☐ No
	1. Telephony G.711 2. Fax group 4 T.62 3. Document application profile (fax group 4 class 1 T.503) 4. Document application profile mixed mode T.502 5. Document application profile processable form T.502 6. Teletex T.62, T.70 7. Document application profile videotex T.504 8. Telex 9. MHS X.400 10. OSI application X.200 11. Maintenance 12. Management		1 4 33 36 40 49 50 53 56 65 94 95	
IS 3.3	Octet 4a bits 1 to 7, extended HL characteristics?	O		☐ Yes ☐ No
	1. Telephony G.711 2. Fax group 4 T.62 3. Document application profile (fax group 4 class 1 T.503) 4. Document application profile mixed mode T.502 5. Document application profile processable form T.502 6. Teletex T.62, T.70 7. Document application profile videotex T.504 8. Telex 9. MHS X.400 10. OSI application X.200		1 4 33 36 40 49 50 53 56 65	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.1	Octet 3 bits 6 and 7, coding standard?	M		☐ Yes ☐ No
	1. CCITT 2. International 3. National 4. Network		0 1 2 3	
IS 4.2	Octet 3 bits 1 to 5, information transfer capability?	M		☐ Yes ☐ No
	1. Speech 2. Unrestricted digital 3. Restricted digital 4. 3.1 kHz audio 5. 7 kHz audio 6. Video		0 8 9 16 17 24	
IS 4.3	Octet 3a bit 7, negotiation indicator?	O		☐ Yes ☐ No
	1. Outband negotiation not possible 2. Outband negotiation possible		0 1	
IS 4.4	Octet 4 bits 6 and 7, transfer mode?	M		☐ Yes ☐ No
	1. Circuit		0	
IS 4.5	Octet 4 bits 1 to 5, information transfer rate, origination to destination if octet 4b is present, bi-directional otherwise?	M		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s 3. 384 kbit/s 4. 1536 kbit/s 5. 1920 kbit/s		16 17 19 21 23	
IS 4.6	Octet 4a bits 5 to 7, structure?	O		☐ Yes ☐ No
	1. Default 2. 8 kHz integrity 3. Service data unit integrity 4. Unstructured		0 1 4 7	
IS 4.7	Octet 4a bits 3 and 4, configuration?	O		☐ Yes ☐ No
	1. Point-to-point		0	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.8	Octet 4a bits 1 and 2, establishment?	O		☐ Yes ☐ No
	1. Demand		0	
IS 4.9	Octet 4b bits 6 and 7, symmetry?	O		☐ Yes ☐ No
	1. Bi-directional symmetric		0	
IS 4.10	Octet 4b bits 1 to 5, information transfer rate, destination to origination?	O		☐ Yes ☐ No
	1. 64 kbit/s 2. 2 x 64 kbit/s 3. 384 kbit/s 4. 1536 kbit/s 5. 1920 kbit/s		16 17 19 21 23	
IS 4.11	Octet 5 bits 1 to 5, user information layer 1 protocol?	O		☐ Yes ☐ No
	1. V.110/X.30 2. G.711 μ-law 3. G.711 A-law 4. G.721 32 kbit/s ADPCM and I.460 5. G.722 and G.725 7 kHz audio 6. G.7xx 384 kbit/s video 7. Non-CCITT rate adaption 8. V.120 9. X.31 HDLC		1 2 3 4 5 6 7 8 9	
IS 4.12	Octet 5a bit 7, synchronous/asynchronous?	O		☐ Yes ☐ No
	1. Synchronous 2. Asynchronous		0 1	
IS 4.13	Octet 5a bit 6, negotiation indicator?	O		☐ Yes ☐ No
	1. In-band negotiation not possible 2. In-band negotiation possible		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.14	Octet 5a bits 1 to 5, user rate?	O		☐ Yes ☐ No
	1. Rate indicated by E-bits (I.460)		0	
	2. 0.6 kbit/s CCITT V.6 and X.1		1	
	3. 1.2 kbit/s CCITT V.6		2	
	4. 2.4 kbit/s CCITT V.6 and X.1		3	
	5. 3.6 kbit/s CCITT V.6		4	
	6. 4.8 kbit/s CCITT V.6 and X.1		5	
	7. 7.2 kbit/s CCITT V.6		6	
	8. 8 kbit/s CCITT I.460		7	
	9. 9.6 kbit/s CCITT V.6 and X.1		8	
	10. 14.4 kbit/s CCITT V.6		9	
	11. 16 kbit/s CCITT I.460		10	
	12. 19.2 kbit/s CCITT V.6		11	
	13. 32 kbit/s CCITT I.460		12	
	14. 48 kbit/s CCITT V.6 and X.1		14	
	15. 56 kbit/s CCITT V.6		15	
	16. 64 kbit/s CCITT X.1		16	
	17. 0.1345 kbit/s CCITT X.1		21	
	18. 0.100 kbit/s CCITT X.1		22	
	19. 0.075/1.2 kbit/s CCITT V.6 and X.1		23	
	20. 1.2/0.075 kbit/s CCITT V.6 and X.1		24	
	21. 0.050 kbit/s CCITT V.6 and X.1		25	
	22. 0.075 kbit/s CCITT V.6 and X.1		26	
	23. 0.110 kbit/s CCITT V.6 and X.1		27	
	24. 0.150 kbit/s CCITT V.6 and X.1		28	
	25. 0.200 kbit/s CCITT V.6 and X.1		29	
	26. 0.300 kbit/s CCITT V.6 and X.1		30	
	27. 12 kbit/s CCITT V.6		31	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
	Octet 5b, case 1 (Note)			
IS 4.15	Octet 5b bits 6 and 7, V.110/X.30 rate adaption?	O		☐ Yes ☐ No
	1. Not used 2. 8 kbit/s 3. 16 kbit/s 4. 32 kbit/s		0 1 2 3	
IS 4.16	Octet 5b bit 5, network independent clock (NIC) on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with NIC 2. Required to send data with NIC		0 1	
IS 4.17	Octet 5b bit 4, NIC on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with NIC 2. Can accept data with NIC		0 1	
IS 4.18	Octet 5b bit 3, flow control on transmission?	O		☐ Yes ☐ No
	1. Not required to send data with flow control 2. Required to send data with flow control		0 1	
IS 4.19	Octet 5b bit 2, flow control on reception?	O		☐ Yes ☐ No
	1. Cannot accept data with flow control mechanism 2. Can accept data with flow control mechanism		0 1	
	Octet 5b, case 2 (Note)			
IS 4.20	Octet 5b bit 7, V.120 rate adaption header?	O		☐ Yes ☐ No
	1. Header not included 2. Header included		0 1	
IS 4.21	Octet 5b bit 6, multiple frame establishment (MFE) support in data link?	O		☐ Yes ☐ No
	1. MFE not supported, only UI frames allowed 2. MFE supported		0 1	
IS 4.22	Octet 5b bit 5, mode of operation?	O		☐ Yes ☐ No
	1. Bit transparent mode 2. Protocol sensitive mode		0 1	

NOTE - Octet 5b case 1 is for V.110/X.30 rate adaption, octet 5b case 2 is for V.120 rate adaption.

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.23	Octet 5b bit 4, logical link identifier (LLI) negotiation?	O		☐ Yes ☐ No
	1. Default LLI = 256 only 2. Full protocol negotiation		0 1	
IS 4.24	Octet 5b bit 3, assignor/assignee?	O		☐ Yes ☐ No
	1. Message originator is 'default assignee' 2. Message originator is 'assignor only'		0 1	
IS 4.25	Octet 5b bit 2, in-band/out-band negotiation?	O		☐ Yes ☐ No
	1. Negotiation performed with USER INFORMATION messages 2. Negotiation performed in-band		0 1	
IS 4.26	Octet 5c bits 6 and 7, number of stop bits?	O		☐ Yes ☐ No
	1. Not used 2. 1 bit 3. 1.5 bits 4. 2 bits		0 1 2 3	
IS 4.27	Octet 5c bits 4 and 5, number of data bits excluding parity?	O		☐ Yes ☐ No
	1. Not used 2. 5 bits 3. 7 bits 4. 8 bits		0 1 2 3	
IS 4.28	Octet 5c bits 1 to 3, parity information?	O		☐ Yes ☐ No
	1. Odd 2. Even 3. None 4. Forced to 0 5. Forced to 1		0 2 3 4 5	
IS 4.29	Octet 5d bit 7, duplex mode?	O		☐ Yes ☐ No
	1. Half duplex 2. Full duplex		0 1	

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Item	Information element parts Does the message include...	Status	Values	Support
IS 4	**Low layer compatibility** (Table 4-18, Figure 4-26)			
IS 4.30	Octet 5d bits 1 to 6, modem type?	O		☐ Yes ☐ No
	1. V.21		1	
	2. V.22		2	
	3. V.22 bis		3	
	4. V.23		4	
	5. V.26		5	
	6. V.26 bis		6	
	7. V.26 ter		7	
	8. V.27		8	
	9. V.27 bis		9	
	10. V.27 ter		10	
	11. V.29		11	
	12. V.32		12	
	13. V.35		13	
IS 4.31	Octet 6 bits 1 to 5, user information layer 2 protocol?	O		☐ Yes ☐ No
	1. Basic mode ISO 1745		1	
	2. Q.921		2	
	3. X.25 link level		6	
	4. X.25 multi-link		7	
	5. Extended LAPB for half duplex (T.71)		8	
	6. HDLC ARM (ISO 4335)		9	
	7. HDLC NRM (ISO 4335)		10	
	8. HDLC ABM (ISO 4335)		11	
	9. LAN LLC ISO 8802-2		12	
	10. CCITT X.75 single link procedure		13	
IS 4.32	Octet 7 bits 1 to 5, user information layer 3 protocol?	O		☐ Yes ☐ No
	1. Q.931		2	
	2. X.25 packet layer		6	
	3. ISO 8208 (X.25 for DTE)		7	
	4. ISO 8348 (OSI connection oriented service)		8	
	5. ISO 8473 (OSI connectionless service)		9	
	6. CCITT T.70 minimum network layer		10	

Comments:

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B.3.7 Timers

Item	Timer Does the implementation support...	Status	Predicate	Reference	Support
TM 1	T301?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 2	T302?	M		Table 9.2	☐ Yes ☐ No
TM 3	T303?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 4	T304?	O	cp 1.2	Table 9.2	☐ Yes ☐ No
TM 5	T305?	M		Table 9.2	☐ Yes ☐ No
TM 8	T308?	M		Table 9.2	☐ Yes ☐ No
TM 9	T309?	O		Table 9.2	☐ Yes ☐ No
TM 10	T310?	O	cp 1	Table 9.2	☐ Yes ☐ No
		C	sp 1 and sp 8		
TM 12	T313?	M		Table 9.2	☐ Yes ☐ No
TM 13	T314?	C	sp 13	Table 9.2	☐ Yes ☐ No
TM 14	T316?	C	sp 5	Table 9.2	☐ Yes ☐ No
TM 15	T317?	C	sp 5	Table 9.2	☐ Yes ☐ No
TM 16	T318?	C	sp 6	Table 9.2	☐ Yes ☐ No
TM 17	T319?	C	sp 6	Table 9.2	☐ Yes ☐ No
TM 18	T321?	C	sp 14	Table 9.2	☐ Yes ☐ No
TM 19	T322?	C	sp 7.2	Table 9.2	☐ Yes ☐ No

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