

Suppliers' Information Note

For The Openreach Network

Protocol Implementation Conformance Statements (PICS) for ISDN 2e: Basic Access - Layer 3 Coincident S and T Reference Point Point-to-Multipoint Configuration TECHNICAL INFORMATION FOR SUPPLIERS

Each SIN is the copyright of British Telecommunications plc. Reproduction of the SIN is permitted only in its entirety, to disseminate information on the Openreach Network within your organisation. You must not edit or amend any SIN or reproduce extracts. You must not remove Openreach trademarks, notices, headings or copyright markings.

This document does not form a part of any contract with Openreach customers or suppliers.

Users of this document should not rely solely on the information in this document, but should carry out their own tests to satisfy themselves that terminal equipment will work with the Openreach network.

Openreach reserves the right to amend or replace any or all of the information in this document.

Openreach shall have no liability in contract, tort or otherwise for any loss or damage, howsoever arising from use of, or reliance upon, the information in this document by any person.

Due to technological limitations a very small percentage of customer interfaces may not comply with some of the individual characteristics which may be defined in this document.

Publication of this Suppliers' Information Note does not give or imply any licence to any intellectual property rights belonging to British Telecommunications plc or others. It is your sole responsibility to obtain any licences, permissions or consents which may be necessary if you choose to act on the information supplied in the SIN.

Those BT services marked ® indicates it is a registered trade mark of British Telecommunications plc.

Those BT services marked ™ indicates it is a trade mark of British Telecommunications plc.

This SIN is available in Portable Document Format (pdf) from:
<https://www.openreach.co.uk/orpg/home/helpandsupport/sins/sins.do>

Enquiries relating to this document should be directed to: orsinsfa@openreach.co.uk

1. Introduction

This document states the capabilities and options of the DSS1 Layer 3 protocol for basic call control at the coincident S and T reference point on the basic access interface (point-to-multipoint configuration) which has been implemented in the ISDN 2e network.

The ETSI protocol specification used as a basis for this PICS proforma is ETS 300 403-1, edition November 1995.

The ETSI PICS proforma used as a basis for this PICS is ETS 300 403-3, edition November 1996.

2. References

- 1 ETS 300 403-1 (1995) Integrated Services Digital Network (ISDN); Digital Subscriber Signalling System No. one (DSS1) protocol; Signalling network layer for circuit-mode basic call control; Part 1: Protocol specification [ITU-T Recommendation Q.931 (1993), modified]
- 2 ETS 300 403-2 (1995) Integrated Services Digital Network (ISDN); Digital Subscriber Signalling System No. one (DSS1) protocol; Signalling network layer for circuit-mode basic call control; Part 2: Specification and Description Language (SDL) diagrams
- 3 ETS 300 403-3 (1996) Integrated Services Digital Network (ISDN); Digital Subscriber Signalling System No. one (DSS1) protocol; Signalling network layer for circuit-mode basic call control; Part 3: Protocol Implementation Conformance Statement (PICS) proforma specification

For further information or copies of referenced sources, please see document sources at <http://www.btplc.com/sinet/>

3. Protocol Implementation Conformance Statement (PICS)

Using the relevant standard (see ref. 3), the PICS is given below. The section and table numbering as used in the ETSI standard has been maintained. Only those parts of the standard relevant to the network implementation are given. For guidance on the abbreviations and meaning of the completed PICS tables, see SIN 369, Part A.

Unless stated otherwise, the standard referred to in the **reference** column is the ETS given in reference 1. For glossary of terms used, see the referenced standards [1, 3].

A.6 Roles

Table A.1: Roles

Item	Role Does the implementation support...	Conditions for status	Status	Reference	Support
R 1	not used				
Major role					
R 2.1	the user role		O.1		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
R 2.2	the network role		O.1		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Type of interface					
R 3.1	requirements at the coincident S and T reference point		O.2		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
R 3.2	requirements for interworking with private ISDNs at the T reference point		O.2		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
R 4	not used				
R 5	not used				
R 6.1	basic access		O.3		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
R 6.2	primary rate access		O.3		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
R 7.1	point-to-point configuration	R 6.1 R 6.2	O.4 M		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
R 7.2	multi-point configuration	R 6.1 R 6.2	O.4 N/A		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
O.1	Support of one, and only one, of these options is required.				
O.2	Support of one, and only one, of these options is required.				
O.3	Support of one, and only one, of these options is required.				
O.4	Support of one, and only one, of these options is required.				
Comments:					

A.7 User

Not applicable.

A.8 Network

The tables provided in this subclause need only to be completed for network implementations.
Prerequisite: R 2.2

A.8.1 Type of implementation

Answers to the questions in table A.61 are required to permit the conditions for status for the network role to be properly evaluated for a specific IUT. The questions refer to aspects outside the scope of ETS 300 403-1 [1], but which affect the behaviour of the basic call protocol.

Table A.61: Type of implementation

Item	Type of implementation Does the implementation...	Conditions for status	Status	Reference	Support
TIn 3	provide in-band tones/announcements		I	5.1.2, 5.1.3, 5.1.7, 5.3.4.1, 5.4	[<input checked="" type="checkbox"/>]Yes []No
TIn 4	support one or more "existing services" (note)		I	5.13	[]Yes [<input checked="" type="checkbox"/>]No <i>Note 1</i>
TIn 5	support services other than "existing services" (note)		I	5.13	[]Yes [<input checked="" type="checkbox"/>]No <i>Note 1</i>
TIn 6	provide an internal alerting supervision timing function		I	9.1, table 9.1	[<input checked="" type="checkbox"/>]Yes []No
NOTE:	"Existing services" are those basic telecommunication services associated with the speech, 3,1 kHz audio and 64 kbit/s unrestricted bearer capabilities. Services other than the existing services include services based on, for example, the unrestricted digital information with tones / announcements bearer capability.				
Comments:	<i>Note 1: There are currently no services that require use of this procedure.</i>				

A.8.2 Major capabilities

Each question in table A.62 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 clauses and subclauses of ETS 300 403-1 [1]. Answering "No" to a particular question states that the implementation does not support that function of the protocol.

Table A.62: Major capabilities of the network role

Item	Major capability Does the implementation support...	Conditions for status	Status	Reference	Support	
Call establishment at the originating interface						
MCn 1	call establishment at the originating interface (outgoing calls from the user's point of view)		M	5.1	[<input checked="" type="checkbox"/>]Yes []No	
MCn 1.1	the procedures for en-bloc sending (sending from the user's point of view)		M	5.1.1, 5.1.5.1	[<input checked="" type="checkbox"/>]Yes []No	
MCn 1.2	the procedures for overlap sending (sending from the user's point of view)		M	5.1.3, 5.1.5.2	[<input checked="" type="checkbox"/>]Yes []No	
MCn 1.3	interpretation of a notification of interworking on an outgoing call (notification sent by the calling user)		M	5.1.6 (last paragraph)	[<input checked="" type="checkbox"/>]Yes []No	
MCn 1.4	transit network selection		O	5.1.10, annex C	[]Yes [<input checked="" type="checkbox"/>]No.	
MCn 1.5	provision of in-band tones/announcements, during call establishment at the originating interface	TIn 3 NOT TIn 3	M N/A	5.1.2, 5.1.3, 5.1.7, 5.4	[<input checked="" type="checkbox"/>]Yes []No	
MCn 1.6	sending of a notification of interworking on an outgoing call (notification received by the calling user)		M	5.1.6 (first to third paragraph)	[<input checked="" type="checkbox"/>]Yes []No	
Call establishment at the destination interface						
MCn 2	call establishment at the destination interface (incoming calls from the user's point of view)		M	5.2	[<input checked="" type="checkbox"/>]Yes []No	
MCn 2.1	called party addressing information sent only in the SETUP message (en-bloc receiving from the user's point of view)		O.20	5.2.1, 5.2.5.1	[<input checked="" type="checkbox"/>]Yes []No	
MCn 2.2	called party addressing information split across, and sent in, SETUP and INFORMATION messages (overlap receiving from the user's point of view)		O.20	5.2.1, 5.2.4, 5.2.5.1	[]Yes [<input checked="" type="checkbox"/>]No	
	MCn 2.3	sending of a notification of interworking on an incoming call (notification sent to the called user)		M	5.2.6 (first paragraph)	[<input checked="" type="checkbox"/>]Yes []No
	MCn 2.4	delivery of the SETUP message on a point-to- point data link	R 7.1 NOT R 7.1	M X	5.2.1, 5.2.3.1	[]Yes []No [<input checked="" type="checkbox"/>] N/A
	MCn 2.5	delivery of the SETUP message on a broadcast data link	R 7.2 NOT R 7.2	M X	5.2.1, 5.2.3.2	[<input checked="" type="checkbox"/>]Yes []No [] N/A

(continued)

Table A.62 (concluded): Major capabilities of the network role

Item	Major capability Does the implementation support...	Conditions for status	Status	Reference	Support
MCn 2.6	interpretation of a notification of interworking on an incoming call (notification received from the called user)		M	5.2.6 (second to fourth paragraph)	[]Yes []No <i>Note 1</i>
MCn 3	accept call clearing initiated by the user		M	5.3.3	[✓]Yes []No
MCn 4.1	call clearing initiated by the network when tones/announcements provided	TIn 3 NOT TIn 3	M N/A	5.3.4.1	[✓]Yes []No [] N/A
MCn 4.2	call clearing initiated by the network when tones/announcements not provided		M	5.3.4.2	[✓]Yes []No
MCn 5.1	restart procedure (interpretation of a received RESTART message)	R 7.1 NOT R 7.1	M O	5.5.2	[]Yes [✓]No
MCn 5.2	initiation of restart procedure	R 7.1 NOT R 7.1	M O	5.5.1	[]Yes [✓]No
MCn 6	processing of a call rearrangement request	R 6.1 R 6.2	O N/A	5.6	[✓]Yes []No [] N/A
MCn 7.1	response to status enquiry request		M	5.8.10	[✓]Yes []No
MCn 7.2	initiation of status enquiry procedure		M	5.8.10	[✓]Yes []No
MCn 8	symmetric call operation		X	2.1, annex D	[]Yes [✓]No
MCn 9	processing of network specific facility request		O	annex E	[]Yes [✓]No
MCn 11	procedures for the control of the user signalling bearer service		I	1.1, 2.2, 3.2, 7	[]Yes [✓]No
MCn 12	procedures for establishment of bearer connection prior to call acceptance		O	annex K	[]Yes [✓]No
MCn 12.1	establishment of bearer connection prior to call acceptance, on completion of successful channel negotiation	MCn 12 NOT MCn 12	O.21 N/A	annex K	[]Yes []No [✓]N/A
MCn 12.2	establishment of bearer connection prior to call acceptance, on receipt of a message containing an indication that in-band information is provided	MCn 12 NOT MCn 12	O.21 N/A	annex K	[]Yes []No [✓]N/A
MCn 13	message segmentation procedures		O	annex H	[]Yes [✓]No
MCn 14	D-channel backup procedure		X	annex F	[]Yes [✓]No
MCn 15	procedures for bearer service change		X	annex L	[]Yes [✓]No
MCn 16	procedures for the control of packet communications		I	1.1, 3.3, 6	[]Yes [✓]No
MCn 17	procedures for the control of circuit-mode multirate connections		O	8	[]Yes [✓]No
MCn 18	resolution of call collisions		M	5.7	[✓]Yes []No
MCn 19	handling of error conditions		M	5.8	[✓]Yes []No
MCn 20.1	initiation of a user notification procedure	MCn 6 NOT MCn 6	M N/A	5.9	[✓]Yes []No []N/A
MCn 20.2	forwarding of user notification		M	5.9	[✓]Yes []No
MCn 21.1	forwarding of BC selection request across the network (procedures at the originating side)		O	5.10, 5.11.1	[✓]Yes []No
MCn 21.2	procedures for BC selection at the destination side		O	5.10, 5.11.2, 5.11.3	[✓]Yes []No
MCn 22.1	forwarding of HLC selection request across the network (procedures at the originating side)		O	5.10, 5.12.1	[✓]Yes []No
MCn 22.2	procedures for HLC selection at the destination side		O	5.10, 5.12.2, 5.12.3	[✓]Yes []No
MCn 23.1	status request procedures for "existing services"	TIn 4 NOT TIn 4	M N/A	5.13	[]Yes []No [✓]N/A
MCn 23.2	status request procedures for services other than "existing services"	TIn 5 NOT TIn 5	M N/A	5.13	[]Yes []No [✓]N/A

O.20 Support of at least one of these options is required.

O.21 Support of at least one of these options is required.

Comments:

Note 1: Depending on switch implementation, this capability is either fully support or else:

- if the Progress indicator information element is received in an ALERTING or CALL PROCEEDING message, it will be ignored.
- the PROGRESS message will be ignored.

A.8.3 Subsidiary capabilities

Indicating support for an item in table A.63 states that the implementation supports special cases or options within a major capability.

Table A.63: Subsidiary capabilities of the network role

Item	Subsidiary capability Does the implementation support...	Conditions for status	Status	Reference	Support
General					
SCn 3.1	use of a 1 octet call reference value for Basic access	R 6.1 NOT R 6.1	M N/A	4.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
SCn 3.2	use of a 2 octet call reference value for Primary rate access	R 6.2 NOT R 6.2	M N/A	4.3	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 3.3	use of a 1 octet call reference value for Primary rate access	R 6.2 NOT R 6.2	X N/A	4.3	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Call establishment at the originating interface					
SCn 101	recognition of the Sending complete information element		M	5.1.1, 5.1.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
SCn 102	recognition of "#" as a sending complete indication		O	5.1.1, 5.1.3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Call establishment at the destination interface					
SCn 110	permanent data link connection (establishment as soon as the TEI is assigned, and retained indefinitely)		O	5.2	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
SCn 111	transmission of a sending complete indication		O	5.2.1, 5.2.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
SCn 112.1	use of the Sending complete information element as the sending complete indication	SCn 111 NOT SCn 111	M N/A	5.2.1, 5.2.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
SCn 112.2	use of "#" as the sending complete indication	SCn 111 NOT SCn 111	X N/A	5.2.1	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A
SCn 2	the indication "no B-channel available" in the SETUP message to the called user		O	5.2.1, 5.2.3.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
SCn 113	a limitation on the number of calls presented to the called user with the indication "no B-channel available"	SCn 2 NOT SCn 2	O N/A	5.2.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
SCn 4.1	acceptance of only one SETUP ACKNOWLEDGE message from the called user (point-to-point data link case)	MCn 2.4 AND MCn 2.2 NOT MCn 2.4 OR NOT MCn 2.2	M N/A	5.2.4	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 4.2	acceptance of up to 8 SETUP ACKNOWLEDGE messages from the called user (broadcast data link case)	MCn 2.5 AND MCn 2.2 NOT MCn 2.5 OR NOT MCn 2.2	O.22 N/A	5.2.4	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 5	clearing of subsequent responding users after the first SETUP ACKNOWLEDGE message (broadcast data link case)	MCn 2.5 AND MCn 2.2 NOT MCn 2.5 OR NOT MCn 2.2	O.22 N/A	5.2.4	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 6	clearing of non-selected users (on a broadcast data link)	MCn 2.5 NOT MCn 2.5	M N/A	5.2.9	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
Call clearing					
SCn 120.1	inclusion of a second Cause information element (cause no. 102 "recovery on timer expiry") in the RELEASE message sent by the network on expiry of T305/T306		O	5.3.4bis	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <i>Note 1</i>
SCn 120.2	inclusion of a diagnostic field in the second Cause information element (cause no. 102 "recovery on timer expiry") of the RELEASE message sent by the network on expiry of T305/T306	SCn 120.1 NOT SCn 120.1	O N/A	5.3.4bis	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A <i>Note 1</i>
Call rearrangements					
SCn 124	maximum length of 2 octets for the call identity	MCn 6 NOT MCn 6	O N/A	5.6.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A

(continued)

Table A.63 (continued): Subsidiary capabilities of the network role

Item	Subsidiary capability Does the implementation support...	Conditions for status	Status	Reference	Support
Restart					
SCn 125.1	initiation of restart procedure on "indicated channel"	MCn 5.2 NOT MCn 5.2	M N/A	5.5.1	[]Yes []No [✓]N/A
SCn 125.2	initiation of restart procedure on "single interface" (or "all interfaces")	MCn 5.2 NOT MCn 5.2	M N/A	5.5.1	[]Yes []No [✓]N/A
Handling of error conditions					
SCn 130.1	discarding an "inappropriate" message received in a DL-UNIT DATA-INDICATION primitive (note)		O.23	5.8	[✓]Yes []No
SCn 130.2	processing of an "inappropriate" message received in a DL-UNIT DATA-INDICATION primitive as if it had been received in a DL-DATA-INDICATION primitive (note)		O.23	5.8	[]Yes [✓]No
SCn 131.1	call clearing with a RELEASE message, on receiving any message other than SETUP, RELEASE, RELEASE COMPLETE, STATUS, STATUS ENQUIRY, or RESUME with an unrecognizable Call reference value.		O.24	5.8.3.2.a)	[]Yes []No Note 2
SCn 131.2	call clearing with a RELEASE COMPLETE message, on receiving any message other than SETUP, RELEASE, RELEASE COMPLETE, STATUS, STATUS ENQUIRY, or RESUME with an unrecognizable Call reference value.		O.24	5.8.3.2.a)	[]Yes []No Note 2
SCn 19	on occurrence of a message type or message sequence error, transmission of a STATUS message		O.25	5.8.4	[✓]Yes []No
SCn 20	on occurrence of a message type or message sequence error, initiation of the status enquiry procedure		O.25	5.8.4, 5.8.10	[]Yes [✓]No
SCn 23	processing of information elements regardless of their order in the message		O.26	5.8.5.1	[]Yes []No Note 3
SCn 24	ignoring out of sequence information elements		O.26	5.8.5.1	[]Yes [✓]No
SCn 32	on occurrence of unrecognized information element error with information element not encoded to indicate "comprehension required", transmission of a STATUS message		O	5.8.7.1	[✓]Yes []No
SCn 132	Cause no. 99 "Information element non-existent or not implemented" with diagnostic(s)		O	note in 5.8.7.1	[✓]Yes []No
SCn 37	on occurrence of non-mandatory information element content error, transmission of a STATUS message		O	5.8.7.2	[✓]Yes []No
SCn 38	truncation and processing of non-mandatory access information elements that are too long		O	5.8.7.2	[]Yes [✓]No Note 4
Data link failure					
SCn 140	use of Cause no. 41 "temporary failure"		O	5.8.9 a)	[✓]Yes []No
SCn 141.1	re-establishment of the data link connection if DL-RELEASE-INDICATION received after sending SETUP	MCn 2.4 NOT MCn 2.4	O.27 N/A	5.2.1, 5.8.9 a)	[]Yes []No [✓]N/A
SCn 141.2	clearing of any calls that are not in the Active state if DL-RELEASE-INDICATION received after sending SETUP	MCn 2.4 MCn 2.5	O.27 M	5.2.1, 5.8.9 a)	[✓]Yes []No
SCn 45.1	transmission of a STATUS message		O.28	5.8.9 b)	[]Yes [✓]No
SCn 45.2	initiation of the status enquiry procedure		O.28	5.8.9 b)	[✓]Yes []No
Status enquiry procedure					
SCn 47	retransmission of STATUS ENQUIRY message one or more times, up to an implementation dependent limit		O	5.8.10	[✓]Yes []No
(continued)					

Table A.63 (concluded): Subsidiary capabilities of the network role

Item	Subsidiary capability Does the implementation support...	Conditions for status	Status	Reference	Support
Receiving a STATUS message					
SCn 160.1	clearing the call on a call state mismatch		O.29	5.8.11	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No Note 5
SCn 160.2	attempt to recover from a call state mismatch by implementation dependent means		O.29	5.8.11	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No Note 5
Multirate procedures					
SCn 170.1	contiguous channel assignment	MCn 17 NOT MCn 17	O.30 N/A	8.1.2, 8.2.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 170.2	non-contiguous channel assignment	MCn 17 NOT MCn 17	O.30 N/A	8.1.2, 8.2.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 171.1	a restriction that the 384 kbit/s rate occupies specified contiguous time slots	MCn 17 AND R 6.2 NOT MCn 17 OR NOT R 6.2	O N/A	8.1.2, 8.2.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 171.2	a restriction that the 1536 kbit/s rate occupies specified contiguous time slots	MCn 17 AND R 6.2 NOT MCn 17 OR NOT R 6.2	O N/A	8.1.2, 8.2.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 172.1	selection of any other available B-channels associated with the D -channel and on the same access	MCn 17 NOT MCn 17	M N/A	8.1.2, 8.2.2.1	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 172.2	selection of all the B-channels on another interface controlled by the D-channel	MCn 17 NOT MCn 17	X N/A	8.1.2, 8.2.2.1	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
SCn 173	interworking between circuit-mode multirate bearer capability and other bearer capabilities	MCn 17 NOT MCn 17	X N/A	8.1.3, 8.2.3	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
O.22	Support of one, and only one, of these options is required.				
O.23	Support of one, and only one, of these options is required.				
O.24	Support of at least one of these options is required.				
O.25	Support of at least one of these options is required.				
O.26	Support of at least one of these options is required.				
O.27	Support of at least one of these options is required.				
O.28	Support of at least one of these options is required.				
O.29	Support of at least one of these options is required.				
O.30	Support of at least one of these options is required.				
NOTE:	"Inappropriate" messages are those that are neither a SETUP message nor a message specified to use the data link unacknowledged information transfer service in support of another implemented application.				
Comments:					
<p>Note 1: Under some circumstances, a second Cause information element may not be provided.</p> <p>Note 2: Depending on switch implementation, either a RELEASE or RELEASE COMPLETE will be sent.</p> <p>Note 3: Depending on switch implementation, information elements out of sequence will either be processed or treated as an error condition.</p> <p>Note 4: Depending on switch implementation, the Call identity information element will be truncated, whereas other optional information elements will be treated as information elements with content error.</p> <p>Note 5: Depending on situation the call can either be cleared or not in case of status mismatch.</p>					

A.8.4 Protocol data units

The tables in this subclause ask questions related to the supported PDUs in the network role. In the DSS1 protocol, PDUs are known by the term "messages".

A.8.4.1 Messages received by the network

Indicating support for an item in table A.64 states that the implementation has the ability to recognize the message listed in that item. Support for the receipt of a particular type of PDU means support for recognizing and acting upon all valid instances of that PDU type, including all valid PDU parameters, to the extent required by ETS 300 403-1 [1].

Table A.64: Messages received by the network

Item	Message Does the implementation support the receipt of...	Conditions for status	Status	Reference	Support
MRn 1	ALERTING		M	3.1.1, 5.2.5.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 2	CALL PROCEEDING		M	3.1.2, 5.2.5.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 4	CONNECT		M	3.1.3, 5.2.7	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 5	CONNECT ACKNOWLEDGE		M	3.1.4, 5.1.8	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 6	DISCONNECT		M	3.1.5, 5.3.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 8	INFORMATION		M	3.1.6, 5.1.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 9	NOTIFY		M	3.1.7, 5.6.2, 5.6.4, 5.6.7, 5.9	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 10	PROGRESS		M	3.1.8, 5.1.6	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 11	RELEASE		M	3.1.9, 5.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 12	RELEASE COMPLETE		M	3.1.10, 5.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 13	RESTART	MCn 5.1 NOT MCn 5.1	M N/A	3.4.1, 5.5.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MRn 14	RESTART ACKNOWLEDGE	MCn 5.2 NOT MCn 5.2	M N/A	3.4.2, 5.5.1	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MRn 15	RESUME	MCn 6 NOT MCn 6	M N/A	3.1.11, 5.6.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MRn 16	RESUME ACKNOWLEDGE		N/A		N/A
MRn 17	RESUME REJECT		N/A		N/A
MRn 18	SEGMENT	MCn 13 NOT MCn 13	M N/A	3.5.1, annex H	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MRn 19	SETUP		M	3.1.14, 5.1.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 20	SETUP ACKNOWLEDGE		M	3.1.15, 5.2.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <i>Note 1</i>
MRn 21	STATUS		M	3.1.16, 3.4.3, 5.8.11	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 22	STATUS ENQUIRY		M	3.1.17, 5.8.10	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn 23	SUSPEND	MCn 6 NOT MCn 6	M N/A	3.1.18, 5.6.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MRn 24	SUSPEND ACKNOWLEDGE		N/A		N/A
MRn 25	SUSPEND REJECT		N/A		N/A

Comments:

Note 1: Overlap receiving procedures are not used (see MCn 2.2) and hence a SETUP ACKNOWLEDGE message would not be expected from a user

A.8.4.2 Messages transmitted by the network

Indicating support for an item in table A.65 states that the implementation has the ability to transmit the message listed in that item.

Table A.65: Messages transmitted by the network

Item	Message Does the implementation support the transmission of...	Conditions for status	Status	Reference	Support
MTn 1	ALERTING		M	3.1.1, 5.1.7	[<input checked="" type="checkbox"/>]Yes []No
MTn 2	CALL PROCEEDING		M	3.1.2, 5.1.5	[<input checked="" type="checkbox"/>]Yes []No
MTn 4	CONNECT		M	3.1.3, 5.1.8	[<input checked="" type="checkbox"/>]Yes []No
MTn 5	CONNECT ACKNOWLEDGE		M	3.1.4, 5.2.8	[<input checked="" type="checkbox"/>]Yes []No
MTn 6	DISCONNECT		M	3.1.5, 5.3.4	[<input checked="" type="checkbox"/>]Yes []No
MTn 8	INFORMATION	MCn 2.2 NOT MCn 2.2	M O	3.1.6, 5.2.4	[]Yes [<input checked="" type="checkbox"/>]No
MTn 9	NOTIFY		M	3.1.7, 5.9	[<input checked="" type="checkbox"/>]Yes []No
MTn 10	PROGRESS		M	3.1.8, 5.1.6, 5.2.6, 5.4, annex K	[<input checked="" type="checkbox"/>]Yes []No
MTn 11	RELEASE		M	3.1.9, 5.3	[<input checked="" type="checkbox"/>]Yes []No
MTn 12	RELEASE COMPLETE		M	3.1.10, 5.3	[<input checked="" type="checkbox"/>]Yes []No
MTn 13	RESTART	MCn 5.2 NOT MCn 5.2	M N/A	3.4.1, 5.5.1	[]Yes []No [<input checked="" type="checkbox"/>]N/A
MTn 14	RESTART ACKNOWLEDGE	MCn 5.1 NOT MCn 5.1	M N/A	3.4.2, 5.5.2	[]Yes []No [<input checked="" type="checkbox"/>]N/A
MTn 15	RESUME		N/A		N/A
MTn 16	RESUME ACKNOWLEDGE	MCn 6 NOT MCn 6	M N/A	3.1.12, 5.6.4	[<input checked="" type="checkbox"/>]Yes []No []N/A
MTn 17	RESUME REJECT	MCn 6 NOT MCn 6	M N/A	3.1.13, 5.6.5	[<input checked="" type="checkbox"/>]Yes []No []N/A
MTn 18	SEGMENT	MCn 13 NOT MCn 13	M N/A	annex H	[]Yes []No [<input checked="" type="checkbox"/>]N/A
MTn 19	SETUP		M	3.1.14, 5.2.1	[<input checked="" type="checkbox"/>]Yes []No
MTn 20	SETUP ACKNOWLEDGE		M	3.1.15, 5.1.3	[<input checked="" type="checkbox"/>]Yes []No
MTn 21	STATUS		M	3.1.16, 3.4.3, 5.8.10, 5.8.10, 5.8.11	[<input checked="" type="checkbox"/>]Yes []No
MTn 22	STATUS ENQUIRY		M	3.1.17, 5.8.10	[<input checked="" type="checkbox"/>]Yes []No
MTn 23	SUSPEND		N/A		N/A
MTn 24	SUSPEND ACKNOWLEDGE	MCn 6 NOT MCn 6	M N/A	3.1.19, 5.6.2	[<input checked="" type="checkbox"/>]Yes []No []N/A
MTn 25	SUSPEND REJECT	MCn 6 NOT MCn 6	M N/A	3.1.20, 5.6.3	[<input checked="" type="checkbox"/>]Yes []No []N/A
Comments:					

A.8.5 PDU parameters

The tables in this subclause ask questions related to the support of PDU parameters in messages received and transmitted by the IUT in the network role. In the DSS1 protocol, PDU parameters are known by the term "information elements".

Subclause A.8.5.1 contains tables relating to messages received by the IUT in the network role. Subclause A.8.5.2 contains tables relating to messages transmitted by the IUT in the network role.

Tables A.66 and A.67 deal with four information elements that appear in all messages that are either received or transmitted (respectively) by the IUT in the network role.

Table A.66: Information elements in all messages received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn-IE29	Protocol discriminator		M	3.1, 4.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn-IE30	Call reference		M	3.1, 4.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn-IE31	Message type		M	3.1, 4.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MRn-IE25	Shift		M	3.1, 4.5.2, 4.5.3, 4.5.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.67: Information elements in all messages transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn-IE29	Protocol discriminator		M	3.1, 4.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn-IE30	Call reference		M	3.1, 4.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn-IE31	Message type		M	3.1, 4.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn-IE25	Shift		O	3.1, 4.5.2, 4.5.3, 4.5.4	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.68 covers those information elements defined by ITU-T Recommendation Q.931, the use of which is not permitted by ETS 300 403-1 [1].

Table A.68: Information elements not permitted by ETS 300 403-1 [1]

Item	Information element	Conditions for status	Status	Reference	Support
Mn-IE21	Repeat indicator		X	3.3, 4.5.24	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE26	Signal		X	4.5.28	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.69 covers those information elements defined by ITU-T Recommendation Q.931, the use of which is outside the scope of ETS 300 403-1 [1].

Table A.69: Information elements outside the scope of ETS 300 403-1 [1]

Item	Information element	Conditions for status	Status	Reference	Support
Mn-IE17	More data		I	3.3, 4.5.20	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE10	Congestion level		I	3.3, 4.5.14	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE32	Information rate		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE33	End-to-end transit delay		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE34	Transit delay selection and indication		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE35	Packet layer binary parameters		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE36	Packet layer window size		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE37	Packet size		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE38	Closed user group		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE39	Reverse charge indication		I	3.2, 4.6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Mn-IE40	Redirecting number		I	3.2, 4.6	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <i>Note 1</i>
Mn-IE28	User-user		I	3.3, 4.5.30	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					
<i>Note 1: Mn-IE40 - only provided in association with diversion supplementary services.</i>					

A.8.5.1 Information elements in messages received by the network

Indicating support for an item in the tables in this subclause states that the implementation has the ability to process the information elements listed in the specified received messages. Such support does not necessarily mean that the indicated information element is included in every instance of the received message.

Table A.70: Information elements in ALERTING received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn1-IE1	Bearer capability	MCn 21.2 NOT MCn 21.2	M N/A	3.1.1, 5.11.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
MRn1-IE9	Channel identification		M	3.1.1, 5.2.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn1-IE20	Progress indicator		M	3.1.1, 5.2.6, 5.11.3, 5.12.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn1-IE12	Display		N/A		N/A
MRn1-IE14	High layer compatibility (T) (note)	MCn 22.2 NOT MCn 22.2	M N/A	3.1.1, 5.12.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
NOTE:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) interpret this information to provide a particular service.				
Comments:					

Table A.71: Information elements in CALL PROCEEDING received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn2-IE1	Bearer capability	MCn 21.2 NOT MCn 21.2	M N/A	3.1.2, 5.11.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
MRn2-IE9	Channel identification		M	3.1.2, 5.2.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn2-IE20	Progress indicator		M	3.1.2, 5.2.6, 5.11.3, 5.12.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn2-IE12	Display		N/A		N/A
MRn2-IE14	High layer compatibility (T) (note)	MCn 22.2 NOT MCn 22.2	M N/A	3.1.2, 5.12.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
NOTE:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) interpret this information to provide a particular service.				
Comments:					

Table A.72: Information elements in CONNECT received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn4-IE1	Bearer capability	MCn 21.2 NOT MCn 21.2	M N/A	3.1.3, 5.11.2, 5.11.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
MRn4-IE9	Channel identification		M	3.1.3, 5.2.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn4-IE20	Progress indicator		M	3.1.3, 5.2.6, 5.11.3, 5.12.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn4-IE12	Display		N/A		N/A
MRn4-IE11	Date/time		N/A		N/A
MRn4-IE16	Low layer compatibility (T) (note 1)		M	3.1.3, annex J	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn4-IE14	High layer compatibility (T) (note 2)	MCn 22.2 NOT MCn 22.2	M N/A	3.1.3, 5.12.2	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No [<input type="checkbox"/>]N/A
NOTE 1:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) pass this parameter to a non-protocol entity so that it be transported transparently between an addressed entity and call originating entity (during Low layer compatibility negotiation, if allowed).				
NOTE 2:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) interpret this information to provide a particular service.				
Comments:					

Table A.73: Information elements in CONNECT ACKNOWLEDGE received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn5-IE12	Display		N/A		N/A
Comments:					

Table A.74: Information elements in DISCONNECT received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn6-IE8	Cause (T)		I	3.1.5, 5.3.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn6-IE20	Progress indicator		N/A		N/A
MRn6-IE12	Display		N/A		N/A
Comments:					

Table A.75: Information elements in INFORMATION received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn8-IE24	Sending complete		M	3.1.6, 5.1.1, 5.1.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn8-IE8	Cause		N/A		N/A
MRn8-IE12	Display		N/A		N/A
MRn8-IE15	Keypad facility (T) (note)		O	3.1.6, 5, 5.1.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
MRn8-IE4	Called party number		M	3.1.6, 5.1.1, 5.1.3	[<input checked="" type="checkbox"/>]Yes [<input type="checkbox"/>]No
NOTE:	The support of this parameter implies the use of the information supplied in connection with one or more supplementary services.				
Comments:					

Table A.76: Information elements in NOTIFY received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn9-IE19	Notification indicator (T)		I	3.1.7, 5.9	[<input checked="" type="checkbox"/>]Yes []No
MRn9-IE12	Display		N/A		N/A
Comments:					

Table A.77: Information elements in PROGRESS received by the network

Item	Information element	Conditions for status	Status	Reference	Support <i>Note 1</i>
MRn10-IE1	Bearer capability	MCn 21.2 NOT MCn 21.2	M N/A	3.1.8, 5.11.3	[<input checked="" type="checkbox"/>]Yes []No []N/A
MRn10-IE8	Cause (T)		I	3.1.8	[<input checked="" type="checkbox"/>]Yes []No
MRn10-IE20	Progress indicator		M	3.1.8, 5.2.6, 5.11.3, 5.12.3	[<input checked="" type="checkbox"/>]Yes []No
MRn10-IE12	Display		N/A		N/A
MRn10-IE14	High layer compatibility (T) (note)	MCn 22.2 NOT MCn 22.2	M N/A	3.1.8, 5.12.3	[<input checked="" type="checkbox"/>]Yes []No []N/A
NOTE: The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) interpret this information to provide a particular service.					
Comments:					
<i>Note 1</i> See also Note 1 against MCn2.6 in Table A.62.					

Table A.78: Information elements in RELEASE received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn11-IE8	Cause (T)		I	3.1.9, 5.3	[<input checked="" type="checkbox"/>]Yes []No
MRn11-IE12	Display		N/A		N/A
Comments:					

Table A.79: Information elements in RELEASE COMPLETE received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn12-IE8	Cause (T)		I	3.1.10, 5.3	[<input checked="" type="checkbox"/>]Yes []No
MRn12-IE12	Display		N/A		N/A
Comments:					

Table A.80: Information elements in RESTART received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn13-IE9	Channel identification	MRn 13 NOT MRn 13	M N/A	3.4.1, 5.5	[]Yes []No [✓]N/A
MRn13-IE12	Display		N/A		N/A
MRn13-IE22	Restart indicator	MRn 13 NOT MRn 13	M N/A	3.4.1, 5.5	[]Yes []No [✓]N/A
Comments:					

Table A.81: Information elements in RESTART ACKNOWLEDGE received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn14-IE9	Channel identification	MRn 14 NOT MRn 14	M N/A	3.4.2, 5.5	[]Yes []No [✓]N/A
MRn14-IE12	Display		N/A		N/A
MRn14-IE22	Restart indicator	MRn 14 NOT MRn 14	M N/A	3.4.2, 5.5	[]Yes []No [✓]N/A
Comments:					

Table A.82: Information elements in RESUME received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn15-IE2	Call identity	MRn 15 NOT MRn 15	M N/A	3.1.11, 5.6.4, 5.6.5	[✓]Yes []No []N/A
Comments:					

Table A.83: Information elements in SEGMENT received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn18-IE23	Segmented message	MRn 18 NOT MRn 18	M N/A	3.5.1, annex H	[]Yes []No [✓]N/A
MRn18-IEx	"Segment"	MRn 18 NOT MRn 18	M N/A	3.5.1, annex H	[]Yes []No [✓]N/A
Comments:					

Table A.84: Information elements in SETUP received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn19-IE24	Sending complete		M	3.1.14, 5.1.1, 5.1.3	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE1	Bearer capability		M	3.1.14, 5.1.1, 5.11.1	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE9	Channel identification		M	3.1.14, 5.1.2	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE20	Progress indicator		M	3.1.14, 5.1.6	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE18	Network specific facilities	MCn 9 NOT MCn 9	M N/A	3.1.14, annex E	[]Yes []No [<input checked="" type="checkbox"/>]N/A
MRn19-IE12	Display		N/A		N/A
MRn19-IE15	Keypad facility (T) (note 1)		O	3.1.14, 5, 5.1.3	[]Yes [<input checked="" type="checkbox"/>]No
MRn19-IE6	Calling party number		M	3.1.14	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE7	Calling party subaddress		M	3.1.14	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE4	Called party number		M	3.1.14, 5.1.1, 5.1.3	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE5	Called party subaddress (T) (note 2)		M	3.1.14, 5.1.1, 5.1.3	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE27	Transit network selection	MCn 1.4 NOT MCn 1.4	M N/A	3.1.14, 5.1.10, annex C	[]Yes []No [<input checked="" type="checkbox"/>]N/A
MRn19-IE16	Low layer compatibility (T) (note 3)		M	3.1.14, annex I, annex J	[<input checked="" type="checkbox"/>]Yes []No
MRn19-IE14	High layer compatibility (T) (note 4)		M	3.1.14, 5.12.1	[<input checked="" type="checkbox"/>]Yes []No
NOTE 1:	The support of this parameter implies the use of the information supplied in connection with one or more supplementary services.				
NOTE 2:	The support of this parameter implies the ability to pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity.				
NOTE 3:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) pass this parameter to a non-protocol entity so that it be transported transparently between an addressed entity and call originating entity (during Low layer compatibility negotiation, if allowed).				
NOTE 4:	The support of this parameter implies the ability to either a) pass this parameter to a non-protocol entity (e.g. call control) so that it be transported transparently between a call originating entity and the addressed entity; or b) interpret this information to provide a particular service.				
Comments:					

Table A.85: Information elements in SETUP ACKNOWLEDGE received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn20-IE9	Channel identification		M	3.1.15, 5.2.3	[]Yes []No <i>Note 1</i>
MRn20-IE20	Progress indicator		M	3.1.15, 5.2.6, 5.11.3, 5.12.3	[]Yes []No <i>Note 1</i>
MRn20-IE12	Display		N/A		N/A
Comments:					
<i>Note 1: Since en-bloc procedure is always used on a point-to-multipoint data-link, receipt of SETUP ACKNOWLEDGE message would be treated as an unexpected message (see MRn 20).</i>					

Table A.86: Information elements in STATUS received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn21-IE8	Cause (T)		I	3.1.16, 3.4.3, 5.8.10, 5.8.11	[<input checked="" type="checkbox"/>]Yes []No
MRn21-IE3	Call state		M	3.1.16, 3.4.3, 5.8.3.2, 5.8.10, 5.8.11	[<input checked="" type="checkbox"/>]Yes []No
MRn21-IE12	Display		N/A		N/A
Comments:					

Table A.87: Information elements in STATUS ENQUIRY received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn22-IE12	Display		N/A		N/A
Comments:					

Table A.88: Information elements in SUSPEND received by the network

Item	Information element	Conditions for status	Status	Reference	Support
MRn23-IE2	Call identity	MRn 23 NOT MRn 23	M N/A	3.1.18, 5.6.1, 5.6.2, 5.6.3	[<input checked="" type="checkbox"/>]Yes []No []N/A
Comments:					

A.8.5.2 Information elements in messages transmitted by the network

Indicating support for an item in the tables in this subclause states that the implementation has the ability to generate, and to transmit in the specified message, the information elements listed. Such support does not necessarily mean that the indicated information element is included in every instance of the transmitted message.

Table A.89: Information elements in ALERTING transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn1-IE1	Bearer capability	MCn 21.1 NOT MCn 21.1	M N/A	3.1.1, 5.11.1	[<input checked="" type="checkbox"/>]Yes []No []N/A
MTn1-IE9	Channel identification		X		[]Yes [<input checked="" type="checkbox"/>]No <i>Note 1</i>
MTn1-IE20	Progress indicator		M	3.1.1, 5.1.6, 5.11.1, 5.12.1, annex K	[<input checked="" type="checkbox"/>]Yes []No
MTn1-IE12	Display		O	3.1.1	[]Yes [<input checked="" type="checkbox"/>]No
MTn1-IE14	High layer compatibility	MCn 22.1 NOT MCn 22.1	M N/A	3.1.1, 5.12.1	[<input checked="" type="checkbox"/>]Yes []No []N/A
Comments:					
<i>Note 1: The indicated capability is not supported, which is in accordance with ETS 300 403-1.</i>					

Table A.90: Information elements in CALL PROCEEDING transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn2-IE1	Bearer capability	MCn 21.1 NOT MCn 21.1	M N/A	3.1.2, 5.11.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn2-IE9	Channel identification		M	3.1.2, 5.1.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn2-IE20	Progress indicator		M	3.1.2, 5.1.6, 5.11.1, 5.12.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn2-IE12	Display		O	3.1.2	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn2-IE14	High layer compatibility	MCn 22.1 NOT MCn 22.1	M N/A	3.1.2, 5.12.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
Comments:					

Table A.91: Information elements in CONNECT transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn4-IE1	Bearer capability	MCn 21.1 NOT MCn 21.1	M N/A	3.1.3, 5.11.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn4-IE9	Channel identification		X		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn4-IE20	Progress indicator		M	3.1.3, 5.1.6, 5.11.1, 5.12.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn4-IE12	Display		O	3.1.3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn4-IE11	Date/time		O	3.1.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn4-IE16	Low layer compatibility		O	3.1.3, annex J	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn4-IE14	High layer compatibility	MCn 22.1 NOT MCn 22.1	M N/A	3.1.3, 5.12.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
Comments:					

Table A.92: Information elements in CONNECT ACKNOWLEDGE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn5-IE12	Display		O	3.1.4	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.93: Information elements in DISCONNECT transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn6-IE8	Cause		M	3.1.5, 5.3.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn6-IE20	Progress indicator		M	3.1.5, 5.3.4.1,	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn6-IE12	Display		O	3.1.5	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.94: Information elements in INFORMATION transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn8-IE24	Sending complete	MTn 8 AND SCn 112.1 NOT MTn 8 OR NOT SCn 112.1	O N/A	3.1.6, 5.2.4	[]Yes []No [✓]N/A
MTn8-IE8	Cause	MTn 8 NOT MTn 8	O N/A	3.1.6	[]Yes []No [✓]N/A
MTn8-IE12	Display	MTn 8 NOT MTn 8	O N/A	3.1.6	[]Yes []No [✓]N/A
MTn8-IE15	Keypad facility	MTn 8 NOT MTn 8	O N/A	3.1.6	[]Yes []No [✓]N/A
MTn8-IE4	Called party number	MTn 8 NOT MTn 8	M N/A	3.1.6, 5.2.4	[]Yes []No [✓]N/A
Comments:					

Table A.95: Information elements in NOTIFY transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn9-IE19	Notification indicator		M	3.1.7, 5.6.2, 5.6.4, 5.9	[✓]Yes []No
MTn9-IE12	Display		O	3.1.7	[]Yes [✓]No
Comments:					

Table A.96: Information elements in PROGRESS transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn10-IE1	Bearer capability	MCn 21.1 NOT MCn 21.1	M N/A	3.1.8, 5.11.1	[✓]Yes []No []N/A
MTn10-IE8	Cause		O	3.1.8	[✓]Yes []No
MTn10-IE20	Progress indicator		M	3.1.8, 5.1.6, 5.2.6, 5.11.1, 5.12.1	[✓]Yes []No
MTn10-IE12	Display		O	3.1.8	[]Yes [✓]No
MTn10-IE14	High layer compatibility	MCn 22.1 NOT MCn 22.1	M N/A	3.1.8, 5.12.1	[✓]Yes []No []N/A
Comments:					

Table A.97: Information elements in RELEASE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn11-IE8	Cause		M	3.1.9, 5.3	[✓]Yes []No
MTn11-IE12	Display		O	3.1.9	[]Yes [✓]No
Comments:					

Table A.98: Information elements in RELEASE COMPLETE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn12-IE8	Cause		M	3.1.10, 5.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn12-IE12	Display		O	3.1.10	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.99: Information elements in RESTART transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn13-IE9	Channel identification	MTn 13 NOT MTn 13	M N/A	3.4.1, 5.5	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MTn13-IE12	Display	MTn 13 NOT MTn 13	O N/A	3.4.1	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MTn13-IE22	Restart indicator	MTn 13 NOT MTn 13	M N/A	3.4.1, 5.5	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

Table A.100: Information elements in RESTART ACKNOWLEDGE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn14-IE9	Channel identification	MTn 14 NOT MTn 14	M N/A	3.4.2, 5.5	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MTn14-IE12	Display	MTn 14 NOT MTn 14	O N/A	3.4.2	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MTn14-IE22	Restart indicator	MTn 14 NOT MTn 14	M N/A	3.4.2, 5.5	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

Table A.101: Information elements in RESUME ACKNOWLEDGE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn16-IE9	Channel identification	MTn 16 NOT MTn 16	M N/A	3.1.12, 5.6.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn16-IE12	Display	MTn 16 NOT MTn 16	O N/A	3.1.12	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A
Comments:					

Table A.102: Information elements in RESUME REJECT transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn17-IE8	Cause	MTn 17 NOT MTn 17	M N/A	3.1.13, 5.6.5	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn17-IE12	Display	MTn 17 NOT MTn 17	O N/A	3.1.13	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A
Comments:					

Table A.103: Information elements in SEGMENT transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn18-IE23	Segmented message	MTn 18 NOT MTn 18	M N/A	3.5.1, annex H	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
MTn18-IEEx	"Segment"	MTn 18 NOT MTn 18	M N/A	3.5.1, annex H	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

Table A.104: Information elements in SETUP transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn19-IE24	Sending complete	SCn 112.1 NOT SCn 112.1	M N/A	3.1.14, 5.2.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn19-IE1	Bearer capability		M	3.1.14, 5.2.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE9	Channel identification		M	3.1.14, 5.2.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE20	Progress indicator		M	3.1.14, 5.2.6	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE18	Network specific facilities		O	3.1.14, annex E	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn19-IE12	Display		O	3.1.14, 5.2.1	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn19-IE15	Keypad facility		O		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn19-IE6	Calling party number		O	3.1.14	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE7	Calling party subaddress		O	3.1.14	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE4	Called party number		M	3.1.14, 5.2.1, 5.2.2, 5.2.3, 5.2.4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE5	Called party subaddress		M	3.1.14	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE27	Transit network selection		X		<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
MTn19-IE16	Low layer compatibility		M	3.1.14, 5.2.1, annex I, annex J	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn19-IE14	High layer compatibility		M	3.1.14, 5.2.1, 5.12.1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.105: Information elements in SETUP ACKNOWLEDGE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn20-IE9	Channel identification		M	3.1.15, 5.1.2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn20-IE20	Progress indicator		M	3.1.15, 5.1.6, 5.11.1, 5.12.1, annex K	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn20-IE12	Display		O	3.1.15	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.106: Information elements in STATUS transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn21-IE8	Cause		M	3.1.16, 3.4.3, 5.8	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn21-IE3	Call state		M	3.1.16, 3.4.3, 5.8	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
MTn21-IE12	Display		O	3.1.16	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.107: Information elements in STATUS ENQUIRY transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn22-IE12	Display		O	3.1.17	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Comments:					

Table A.108: Information elements in SUSPEND ACKNOWLEDGE transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn24-IE12	Display	MTn 24 NOT MTn 24	O N/A	3.1.19	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

Table A.109: Information elements in SUSPEND REJECT transmitted by the network

Item	Information element	Conditions for status	Status	Reference	Support
MTn25-IE8	Cause	MTn 25 NOT MTn 25	M N/A	3.1.20, 5.6.3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
MTn25-IE12	Display	MTn 25 NOT MTn 25	O N/A	3.1.20	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

A.8.6 Timers

Indicating support for an item in table A.110 states that the implementation has a timer that operates in accordance with the description in clause 9 of ITU-T Recommendation Q.931 as modified by ETS 300 403-1 [1] and with the relevant behaviour specified in clause 5 of ITU-T Recommendation Q.931 as modified by ETS 300 403-1 [1].

The table indicates the permitted range of values for each timer. The supplier shall state the values supported by their implementation.

Table A.110: Timers in the network role

Item	Timer Does the implementation support...	Conditions for status	Status	Reference	Support	Values allowed	Value supported
TMn 1	T301	NOT TIn 6 TIn 6	M N/A	Table 9.1	[]Yes []No [✓]N/A	> 180 s	
TMn 2	T302		M	Table 9.1	[✓]Yes []No	10 - 15 s	10-15 s
TMn 3	T303		M	Table 9.1	[✓]Yes []No	4 s	4 s
TMn 4	T304	MCn 2.2 NOT MCn 2.2	M N/A	Table 9.1	[]Yes []No [✓]N/A	20 s	
TMn 5	T305		M	Table 9.1	[✓]Yes []No	30 s	30 s
TMn 6	T306	MCn 1.5 NOT MCn 1.5	M N/A	Table 9.1	[✓]Yes []No []N/A	30 s	Note 1
TMn 7	T307		M	Table 9.1	[✓]Yes []No	180 s	180 s
TMn 8	T308		M	Table 9.1	[✓]Yes []No	4 s	4 s
TMn 9	T309		M	Table 9.1	[✓]Yes []No	6 - 12 s (note)	6-12 s
TMn 10	T310		M	Table 9.1	[✓]Yes []No	30 - 40 s	30-40 s
TMn 11	T312		M	Table 9.1	[✓]Yes []No	T303 + 2 s	T303 + 2 s
TMn 13	T314	MCn 13 NOT MCn 13	M N/A	Table 9.1	[]Yes []No [✓]N/A	4 s	
TMn 14	T316	MCn 5.2 NOT MCn 5.2	M N/A	Table 9.1	[]Yes []No [✓]N/A	120 s	
TMn 15	T317	MCn 5.1 NOT MCn 5.1	M N/A	Table 9.1	[]Yes []No [✓]N/A	< T316	
TMn 18	T321		I		[]Yes [✓]No	N/A	N/A
TMn 19	T322		M	Table 9.1	[✓]Yes []No	4 s	4 s
TMn 20	T320		I		[]Yes [✓]No	N/A	N/A

NOTE: The value of T309 is calculated according to the formula: $T309 = (N200+1)*T200+2$ s.

Comments:

Note 1: T306 is dependent on the length of the announcement.

A.8.7 Compatibility information elements structure

Table A.111 shall be completed in order to evaluate the chance of interoperability of two implementations.

NOTE: Because LLC and the HLC are transferred transparently by the network, there is no table dealing with them.

Table A.111: Bearer Capability structure

Item	Information element field	Status	Values	Support
ISn 1.1	Octet 3 bits 6 and 7, coding standard	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. CCITT standardized coding	M	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. ISO/IEC standard	N/A	1	
	3. National standard	N/A	2	
	4. Network specific standard	N/A	3	
ISn 1.2	Octet 3 bits 1 to 5, information transfer capability	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Speech	O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. Unrestricted digital	O	8	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	3. Restricted digital	N/A	9	
	4. 3,1 kHz audio	O	16	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	5. Unrestricted digital information with tones/announcements	O	17	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	6. Video	N/A	24	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
ISn 1.3	Octet 4 bits 6 and 7, transfer mode	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Circuit	O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. Packet	N/A	2	<input type="checkbox"/> Yes <input type="checkbox"/> No
				<input checked="" type="checkbox"/> N/A
ISn 1.4	Octet 4 bits 1 to 5, information transfer rate	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. 64 kbit/s	O	16	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. 2 x 64 kbit/s	N/A	17	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	3. 384 kbit/s	N/A	19	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	4. 1536 kbit/s	N/A	21	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	5. 1920 kbit/s	N/A	23	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	6. Multirate	O	24	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
ISn 1.9	Octet 4.1 Rate multiplier	O	2 up to the maximum number of B-channels	Values: N/A
ISn 1.10	Octet 5 bits 1 to 5, user information layer 1 protocol	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. V.110/X.30	O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. G.711 μ -law	N/A	2	
	3. G.711 A-law	O	3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	4. G.721 32 kbit/s ADPCM and I.460	O	4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	5. G.722 and G.725 7kHz audio	O	5	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	7. Non-CCITT rate adaption	O	7	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	8. V.120	N/A	8	
	9. X.31 HDLC	O	9	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
ISn 1.11	Octet 5a bit 7, synchronous/asynchronous	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Synchronous	O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. Asynchronous	O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
ISn 1.12	Octet 5a bit 6, negotiation indicator	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. In-band negotiation not possible	O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. In-band negotiation possible	O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
ISn 1.13	Octet 5a bits 1 to 5, user rate	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Rate indicated by E bits (I.460)	O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. 0,6 kbit/s CCITT V.6 and X.1	O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	3. 1,2 kbit/s CCITT V.6	O	2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	4. 2,4 kbit/s CCITT V.6 and X.1	O	3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	5. 3,6 kbit/s CCITT V.6	O	4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	6. 4,8 kbit/s CCITT V.6 and X.1	O	5	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	7. 7,2 kbit/s CCITT V.6	O	6	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	8. 8 kbit/s CCITT I.460	O	7	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	9. 9,6 kbit/s CCITT V.6 and X.1	O	8	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	10. 14,4 kbit/s CCITT V.6	O	9	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	11. 16 kbit/s CCITT I.460	O	10	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	12. 19,2 kbit/s CCITT V.6	O	11	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	13. 32 kbit/s CCITT I.460	O	12	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	14. 48 kbit/s CCITT V.6 and X.1	O	14	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	15. 56 kbit/s CCITT V.6	O	15	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	16. 64 kbit/s CCITT X.1	O	16	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	17. 0,1345 kbit/s CCITT X.1	O	21	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	18. 0,100 kbit/s CCITT X.1	O	22	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	19. 0,075/1,2 kbit/s CCITT V.6 and X.1	O	23	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	20. 1,2/0,075 kbit/s CCITT V.6 and X.1	O	24	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	21. 0,050 kbit/s CCITT V.6 and X.1	O	25	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	22. 0,075 kbit/s CCITT V.6 and X.1	O	26	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	23. 0,110 kbit/s CCITT V.6 and X.1	O	27	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	24. 0,150 kbit/s CCITT V.6 and X.1	O	28	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

(continued)

Table A.111 (concluded): Bearer Capability structure

Item	Information element field	Status	Values	Support
	25. 0,200 kbit/s CCITT V.6 and X.1	O	29	[✓]Yes []No
	26. 0,300 kbit/s CCITT V.6 and X.1	O	30	[✓]Yes []No
	27. 12 kbit/s CCITT V.6	O	31	[✓]Yes []No
	Octet 5b, for V.110/X.30 rate adaption			
ISn 1.14	Octet 5b bits 6 and 7, intermediate rate	O		[✓]Yes []No
	1. Not used	O	0	[✓]Yes []No
	2. 8 kbit/s	O	1	[✓]Yes []No
	3. 16 kbit/s	O	2	[✓]Yes []No
	4. 32 kbit/s	O	3	[✓]Yes []No
ISn 1.15	Octet 5b bit 5, network independent clock (NIC) on transmission	O		[✓]Yes []No
	1. Not required to send data with NIC	O	0	[✓]Yes []No
	2. Required to send data with NIC	O	1	[✓]Yes []No
ISn 1.16	Octet 5b bit 4, NIC on reception	O		[✓]Yes []No
	1. Cannot accept data with NIC	O	0	[✓]Yes []No
	2. Can accept data with NIC	O	1	[✓]Yes []No
ISn 1.17	Octet 5b bit 3, flow control on transmission	O		[✓]Yes []No
	1. Not required to send data with flow control	O	0	[✓]Yes []No
	2. Required to send data with flow control	O	1	[✓]Yes []No
ISn 1.18	Octet 5b bit 2, flow control on reception	O		[✓]Yes []No
	1. Cannot accept data with flow control mechanism	O	0	[✓]Yes []No
	2. Can accept data with flow control mechanism	O	1	[✓]Yes []No
	Octet 5b, for V.120 rate adaption	N/A		
ISn 1.25	Octet 5c bits 6 and 7, number of stop bits?	O		[✓]Yes []No
	1. Not used	O	0	[✓]Yes []No
	2. 1 bit	O	1	[✓]Yes []No
	3. 1,5 bits	O	2	[✓]Yes []No
	4. 2 bits	O	3	[✓]Yes []No
ISn 1.26	Octet 5c bits 4 and 5, number of data bits excluding parity	O		[✓]Yes []No
	1. Not used	O	0	[✓]Yes []No
	2. 5 bits	O	1	[✓]Yes []No
	3. 7 bits	O	2	[✓]Yes []No
	4. 8 bits	O	3	[✓]Yes []No
ISn 1.27	Octet 5c bits 1 to 3, parity information	O		[✓]Yes []No
	1. Odd	O	0	[✓]Yes []No
	2. Even	O	2	[✓]Yes []No
	3. None	O	3	[✓]Yes []No
	4. Forced to 0	O	4	[✓]Yes []No
	5. Forced to 1	O	5	[✓]Yes []No
ISn 1.28	Octet 5d bit 7, duplex mode	O		[✓]Yes []No
	1. Half duplex	O	0	[✓]Yes []No
	2. Full duplex	O	1	[✓]Yes []No
ISn 1.29	Octet 5d bits 1 to 6, modem type	O		[✓]Yes []No
	1. V.21	O	17	[✓]Yes []No
	2. V.22	O	18	[✓]Yes []No
	3. V.22 bis	O	19	[✓]Yes []No
	4. V.23	O	20	[✓]Yes []No
	5. V.26	O	21	[✓]Yes []No
	6. V.26 bis	O	22	[✓]Yes []No
	7. V.26 ter	O	23	[✓]Yes []No
	8. V.27	O	24	[✓]Yes []No
	9. V.27 bis	O	25	[✓]Yes []No
	10. V.27 ter	O	26	[✓]Yes []No
	11. V.29	O	27	[✓]Yes []No
	12. V.32	O	28	[✓]Yes []No
ISn 1.30	Octet 6 bits 1 to 5, user information layer 2 protocol	O		[✓]Yes []No
	1. Q.921	O	2	[✓]Yes []No
	2. X.25 link level	O	6	[✓]Yes []No
ISn 1.31	Octet 7 bits 1 to 5, user information layer 3 protocol	O		[✓]Yes []No
	1. Q.931	O	2	[✓]Yes []No
	2. X.25 packet layer	O	6	[✓]Yes []No
Comments:				

A.8.8 Numbering information elements structure

The following tables concern the Calling Party Number and Called Party Number information elements. These tables shall be completed in order to evaluate the chance of interoperability of two implementations.

Table A.112: Calling party number information element in SETUP received by the network

Item	Does the implementation support Calling party number information element parameters and values...	Conditions for status	Status	Values	Support
CGPrn 1.1	TON (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CGPrn 1.2	NPI (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CGPrn 1.3	Presentation indicator (octet 3a)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CGPrn 1.4	Screening indicator (octet 3a)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CGPrn 1.5	Number digits (octet 4 onwards)		M	Up to 20 digits; max. value supported:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.113: Calling party number information element in SETUP transmitted by the network

Item	Does the implementation support Calling party number information element parameters...	Conditions for status	Status	Values	Support
CGPtn 1.1	TON (octet 3) 1. Unknown 2. International number 3. National number 4. Network specific number 5. Subscriber number 6. Abbreviated number	MTn 19-IE6 NOT MTn 19-IE6	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			N/A		<input type="checkbox"/> N/A
			O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
			O	4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
X	6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No			
CGPtn 1.2	NPI (octet 3) 1. Unknown 2. ISDN/telephony numbering plan 3. Data numbering plan 4. Telex numbering plan 5. National standard numbering plan 6. Private numbering plan	MTn 19-IE6 NOT MTn 19-IE6	M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			N/A		<input type="checkbox"/> N/A
			O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
			O	4	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
			O	8	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
O	9	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No			
CGPtn 1.3	Presentation indicator (octet 3a) 1. Presentation allowed 2. Presentation restricted 3. Number not available due to interworking	MTn 19-IE6 NOT MTn 19-IE6	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			N/A		<input type="checkbox"/> N/A
			O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
O	2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No			
CGPtn 1.4	Screening indicator (octet 3a) 1. User-provided, not screened 2. User-provided, verified and passed 3. User-provided, verified and failed 4. Network provided	MTn 19-IE6 NOT MTn 19-IE6	O		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			N/A		<input type="checkbox"/> N/A
			O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
			X	2	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
O	3	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No			
CGPtn 1.5	Number digits (octet 4 onwards)	MTn 19-IE6 NOT MTn 19-IE6	O N/A	Up to 20 digits; max. value supported:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A
Comments:					

Table A.114: Called party number information element in SETUP received by the network

Item	Does the implementation support Called party number information element parameters...	Conditions for status	Status	Values	Support
CDP1rn 1.1	TON (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CDP1rn 1.2	NPI (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CDP1rn 1.3	Number digits (octet 4 onwards)		M	Up to 20 digits; max. value supported:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.115: Called party number information element in SETUP transmitted by the network

Item	Does the implementation support Called party number information element parameters...	Conditions for status	Status	Values	Support
CDP1tn 1.1	TON (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Unknown		O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. International number		O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	3. National number		O	2	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	4. Network specific number		O	3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	5. Subscriber number		O	4	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	6. Abbreviated number		O	6	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
CDP1tn 1.2	NPI (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	1. Unknown		O	0	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	2. ISDN/telephony numbering plan		O	1	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
	3. Data numbering plan		O	3	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	4. Telex numbering plan		O	4	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	5. National standard numbering plan		O	8	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
	6. Private numbering plan		O	9	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
CDP1tn 1.3	Number digits (octet 4 onwards)		O	Up to 20 digits; max. value supported:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.116: Called party number information element in INFORMATION received by the network

Item	Does the implementation support Called party number information element parameters...	Conditions for status	Status	Values	Support
CDP2rn 1.1	TON (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CDP2rn 1.2	NPI (octet 3)		M		<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
CDP2rn 1.3	Number digits (octet 4 onwards)		M	Up to 20 digits; max. value supported:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Comments:					

Table A.117: Called party number information element in INFORMATION transmitted by the network

Item	Does the implementation support Called party number information element parameters...	Conditions for status	Status	Values	Support
CDP2tn 1.1	TON (octet 3) 1. Unknown 2. International number 3. National number 4. Network specific number 5. Subscriber number 6. Abbreviated number	MTn 8-IE4 NOT MTn 8-IE4	M N/A O O O O O O	0 1 2 3 4 6	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No
CDP2tn 1.2	NPI (octet 3) 1. Unknown 2. ISDN/telephony numbering plan 3. Data numbering plan 4. Telex numbering plan 5. National standard numbering plan 6. Private numbering plan	MTn 8-IE4 NOT MTn 8-IE4	M N/A O O O O O O	0 1 3 4 8 9	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> Yes <input type="checkbox"/> No
CDP2tn 1.3	Number digits (octet 4 onwards)	MTn 8-IE4 NOT MTn 8-IE4	O N/A	Up to 20 digits; max. value supported:	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A
Comments:					

4. History

Issue 1	Error! Reference source not found.	First Issue
Issue 1.1	July 2014	Change SINet site references from http://www.sinet.bt.com to http://www.btplc.com/sinet/
Issue 1.2	October 2020	Changes to branding, from BT to Openreach including changes to reflect new Openreach SIN site and Openreach SIN email address
Issue 1.2	October 2021	Annual Review – no changes required – issue remains unchanged.