

**Telecommunications and Internet converged Services and
Protocols for Advanced Networking (TISPAN);
PSTN/ISDN simulation services;
Anonymous Communication Rejection (ACR) and
Communication Barring (CB);
Part 2: Test Suite Structure and Test Purposes (TSS&TP)**



Reference

DTS/TISPAN-06038-2-NGN

Keywords

CB, IMS, testing, TSS&TP

ETSI

650 Route des Lucioles
F-06921 Sophia Antipolis Cedex - FRANCE

Tel.: +33 4 92 94 42 00 Fax: +33 4 93 65 47 16

Siret N° 348 623 562 00017 - NAF 742 C
Association à but non lucratif enregistrée à la
Sous-Préfecture de Grasse (06) N° 7803/88

Important notice

Individual copies of the present document can be downloaded from:

<http://www.etsi.org>

The present document may be made available in more than one electronic version or in print. In any case of existing or perceived difference in contents between such versions, the reference version is the Portable Document Format (PDF). In case of dispute, the reference shall be the printing on ETSI printers of the PDF version kept on a specific network drive within ETSI Secretariat.

Users of the present document should be aware that the document may be subject to revision or change of status. Information on the current status of this and other ETSI documents is available at

<http://portal.etsi.org/tb/status/status.asp>

If you find errors in the present document, please send your comment to one of the following services:

http://portal.etsi.org/chaicor/ETSI_support.asp

Copyright Notification

No part may be reproduced except as authorized by written permission.
The copyright and the foregoing restriction extend to reproduction in all media.

© European Telecommunications Standards Institute 2008.
All rights reserved.

DECTTM, **PLUGTESTS**TM, **UMTS**TM, **TIPHON**TM, the TIPHON logo and the ETSI logo are Trade Marks of ETSI registered for the benefit of its Members.

3GPPTM is a Trade Mark of ETSI registered for the benefit of its Members and of the 3GPP Organizational Partners.

Contents

Intellectual Property Rights	4
Foreword.....	4
1 Scope	5
2 References	5
2.1 Normative references	5
2.2 Informative references.....	6
3 Definitions and abbreviations.....	6
3.1 Definitions.....	6
3.2 Abbreviations	6
4 Test Suite Structure (TSS).....	7
5 Test Purposes (TP)	7
5.1 Introduction	7
5.1.1 TP naming convention	7
5.1.2 Test strategy.....	7
5.2 TPs for Anonymous Communication Rejection (ACR)	8
5.2.1 Action for ACR at the terminating AS.....	8
5.3 TPs for Communication Barring (CB)	14
5.3.1 Actions for OCB at the originating AS	14
5.3.2 Actions for ICB at the terminating AS.....	15
5.4 Interaction with other simulation services.....	16
5.4.1 Originating Identification Presentation (OIP).....	16
5.4.2 Communication Diversion services (CDIV).....	16
5.5 Test purposes for the ISUP/SIP Interworking	18
5.5.1 Interworking from ISUP to SIP (Outgoing Call)	18
5.5.2 Interworking from SIP to ISUP (Incoming Call).....	18
History	19

Intellectual Property Rights

IPRs essential or potentially essential to the present document may have been declared to ETSI. The information pertaining to these essential IPRs, if any, is publicly available for **ETSI members and non-members**, and can be found in ETSI SR 000 314: "*Intellectual Property Rights (IPRs); Essential, or potentially Essential, IPRs notified to ETSI in respect of ETSI standards*", which is available from the ETSI Secretariat. Latest updates are available on the ETSI Web server (<http://webapp.etsi.org/IPR/home.asp>).

Pursuant to the ETSI IPR Policy, no investigation, including IPR searches, has been carried out by ETSI. No guarantee can be given as to the existence of other IPRs not referenced in ETSI SR 000 314 (or the updates on the ETSI Web server) which are, or may be, or may become, essential to the present document.

Foreword

This Technical Specification (TS) has been produced by ETSI Technical Committee Telecommunications and Internet converged Services and Protocols for Advanced Networking (TISPAN).

The present document is part 2 of a multi-part deliverable covering the Anonymous Communication Rejection (ACR) and Communication Barring (CB) simulation services, as identified below:

- Part 1: "Protocol Implementation Conformance Statement (PICS)";
- Part 2: "Test Suite Structure and Test Purposes (TSS&TP)";**
- Part 3: "Abstract Test Suite (ATS) and Protocol Implementation eXtra Information for Testing (PIXIT)".

1 Scope

The present document specifies the test suite structure and test purposes of the Anonymous Communication Rejection (ACR) and Communication Barring (CB) simulation service, based on stage three of the IMS simulation service Anonymous Call Rejection (ACR), Incoming Communication Barring (ICB) and Outgoing Communication Barring (OCB). Within the Next Generation Network (NGN) the stage 3 description is specified using the IP-Multimedia Call Control Protocol based on Session Initiation Protocol (SIP) and Session Description Protocol (SDP).

2 References

References are either specific (identified by date of publication and/or edition number or version number) or non-specific.

- For a specific reference, subsequent revisions do not apply.
- Non-specific reference may be made only to a complete document or a part thereof and only in the following cases:
 - if it is accepted that it will be possible to use all future changes of the referenced document for the purposes of the referring document;
 - for informative references.

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

For online referenced documents, information sufficient to identify and locate the source shall be provided. Preferably, the primary source of the referenced document should be cited, in order to ensure traceability. Furthermore, the reference should, as far as possible, remain valid for the expected life of the document. The reference shall include the method of access to the referenced document and the full network address, with the same punctuation and use of upper case and lower case letters.

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

2.1 Normative references

The following referenced documents are indispensable for the application of the present document. For dated references, only the edition cited applies. For non-specific references, the latest edition of the referenced document (including any amendments) applies.

- [1] ETSI TS 183 011: "Telecommunications and Internet converged Services and Protocols for Advanced Networking (TISPAN); PSTN/ISDN simulation services: Anonymous Communication Rejection (ACR) and Communication Barring (CB); Protocol specification".
- [2] ETSI TS 181 002: "Telecommunications and Internet converged Services and Protocols for Advanced Networking (TISPAN); Multimedia Telephony with PSTN/ISDN simulation services".
- [3] IETF RFC 3261: "SIP: Session Initiation Protocol".

2.2 Informative references

The following referenced documents are not essential to the use of the present document but they assist the user with regard to a particular subject area. For non-specific references, the latest version of the referenced document (including any amendments) applies.

- [i.1] ETSI TS 186 017-1: "Telecommunications and Internet Converged Services and Protocols for Advanced Networking (TISPAN); PSTN/ISDN simulation services: Anonymous Communication Rejection (ACR) and Communication Barring (CB); Part 1: Protocol Implementation Conformance Statement (PICS)".

3 Definitions and abbreviations

3.1 Definitions

For the purposes of the present document, the terms and definitions given in TS 181 002 [2] and the following apply:

escaped character: See RFC 3261 [3].

NOTE: This may contain additional information.

3.2 Abbreviations

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

ACK	ACKnowledgement
ACR	Anonymous Communication Rejection
AS	Application Server
CB	Communication Barring
CDIV	Communication DIVersion services
HOLD	communication HOLD
ICB	Incoming Communication Barring
IMS	IP Multimedia Subsystem
IP	Internet Protocol
ISUP	ISDN User Part
ISDN	Integrated Service Data Network
NGN	Next Generation Network
OCB	Outgoing Communication Barring
OIP	Originating Identification Presentation
PSTN	Public Switched Telephone Network
SDP	Session Description Protocol
SIP	Session Initiation Protocol
SUB	SUBaddressing
TP	Test Purposes
TSS	Test Suite Structure
UA	User Agent

4 Test Suite Structure (TSS)

ACR-CB	ACR_terminating_AS		ACR-CB_N01_xxx
	OBC_originating_AS		ACR-CB_N02_xxx
	IBC_terminating_AS		ACR-CB_N03_xxx
	interaction_OIP		ACR-CB_N04_xxx
	interaction_CDIV		ACR-CB_N05_xxx
ISUP-SIP	SS	ACR	TP612xxx
	SS	ACR	TP515xxx

5 Test Purposes (TP)

5.1 Introduction

For each test requirement a TP is defined.

5.1.1 TP naming convention

TPs are numbered, starting at 001, within each group. Groups are organized according to the TSS. Additional references are added to identify the actual test suite and whether it applies to the network or the user (see table 1).

Table 1: TP identifier naming convention scheme

Identifier: <ss>_<iut><group>_<nnn>			
<ss>	=	supplementary service:	e.g. "ACR-CB"
<iut>	=	type of IUT:	U User – equipment N Network
<group>	=	group	2 digit field representing group reference according to TSS
<nnn>	=	sequential number	(001-999)

5.1.2 Test strategy

As the base standard TS 183 011 [1] contains no explicit requirements for testing, the TPs were generated as a result of an analysis of the base standard and the PICS specification TS 186 017-1 [i.1]. The criteria applied include the following:

- whether or not a test case can be built from the TP is not considered.

5.2 TPs for Anonymous Communication Rejection (ACR)

5.2.1 Action for ACR at the terminating AS

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_001	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2															
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is id.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "id". Ensure that the ACR is sending a 433 (Anonymity Disallowed) response when the communication is rejected.																		
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																		
Comments: <table style="width:100%; border:none;"> <thead> <tr> <th style="text-align:left;">UA C</th> <th style="text-align:center;">SUT</th> <th style="text-align:right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align:center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align:center;">←</td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td style="text-align:center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align:center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		433 Anonymity Disallowed	←		ACK	→	
UA C	SUT	UA S																
INVITE	→																	
100 Trying	←																	
433 Anonymity Disallowed	←																	
ACK	→																	

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_002	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/4																		
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is id. An announcement is provided.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "id". Ensure that the ACR service provides an announcement to the originating user before sending a 433 (Anonymity Disallowed) response when the communication is rejected.																					
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																					
Comments: <table style="width:100%; border:none;"> <thead> <tr> <th style="text-align:left;">UA C</th> <th style="text-align:center;">SUT</th> <th style="text-align:right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align:center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align:center;">←</td> <td></td> </tr> <tr> <td style="text-align:right;">Announcement</td> <td></td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td style="text-align:center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align:center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		Announcement			433 Anonymity Disallowed	←		ACK	→	
UA C	SUT	UA S																			
INVITE	→																				
100 Trying	←																				
Announcement																					
433 Anonymity Disallowed	←																				
ACK	→																				

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_003	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/5																								
Test purpose <i>ACR service forwards an anonymous communication, Privacy value is id.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "id". Ensure that the communication is forwarded to voice message service instead of rejecting the communication with a 433 (Anonymity Disallowed) final response.																											
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																											
Comments: <table border="0" style="width: 100%;"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>200 OK INVITE</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td></td> <td style="text-align: center;"><i>Voice message</i></td> <td></td> </tr> <tr> <td>BYE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>200 OK BYE</td> <td style="text-align: center;">←</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		200 OK INVITE	←		ACK	→			<i>Voice message</i>		BYE	→		200 OK BYE	←	
UA C	SUT	UA S																									
INVITE	→																										
100 Trying	←																										
200 OK INVITE	←																										
ACK	→																										
	<i>Voice message</i>																										
BYE	→																										
200 OK BYE	←																										

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_004	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2															
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is header.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating " header ". Ensure that the ACR is sending a 433 (Anonymity Disallowed) response when the communication is rejected.																		
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																		
Comments: <table border="0" style="width: 100%;"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		433 Anonymity Disallowed	←		ACK	→	
UA C	SUT	UA S																
INVITE	→																	
100 Trying	←																	
433 Anonymity Disallowed	←																	
ACK	→																	

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_005	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/4
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is header. An announcement is provided.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "header" . Ensure that the ACR service provides an announcement to the originating user before sending a 433 (Anonymity Disallowed) response when the communication is rejected.			
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
	Announcement		
433 Anonymity Disallowed	←		
ACK	→		

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_006	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/5
Test purpose <i>ACR service forwards an anonymous communication, Privacy value is header</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "header" . Ensure that the communication is forwarded to voice message service instead of rejecting the communication with a 433 (Anonymity Disallowed) final response.			
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
200 OK INVITE	←		
ACK	→		
	Voice message		
BYE	→		
200 OK BYE	←		

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_007	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is user.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "user". Ensure that the ACR is sending a 433 (Anonymity Disallowed) response when the communication is rejected.			
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
433 Anonymity Disallowed	←		
ACK	→		

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_008	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/4
Test purpose <i>ACR service rejects an anonymous communication, Privacy value is user. An announcement is provided.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "user". Ensure that the ACR service provides an announcement to the originating user before sending a 433 (Anonymity Disallowed) response when the communication is rejected.			
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
	Announcement		
433 Anonymity Disallowed	←		
ACK	→		

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_009	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/5																																								
Test purpose ACR service forwards an anonymous communication, Privacy value is user. Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "user". Ensure that the communication is forwarded to voice message service instead of rejecting the communication with a 433 (Anonymity Disallowed) final response.																																											
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																																											
Comments: <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td>→</td> <td></td> <td></td> <td></td> </tr> <tr> <td>100 Trying</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>200 OK INVITE</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>ACK</td> <td>→</td> <td></td> <td></td> <td></td> </tr> <tr> <td></td> <td></td> <td style="text-align: center;"><i>Voice message</i></td> <td></td> <td></td> </tr> <tr> <td>BYE</td> <td>→</td> <td></td> <td></td> <td></td> </tr> <tr> <td>200 OK BYE</td> <td>←</td> <td></td> <td></td> <td></td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE	→				100 Trying	←				200 OK INVITE	←				ACK	→						<i>Voice message</i>			BYE	→				200 OK BYE	←			
UA C		SUT		UA S																																							
INVITE	→																																										
100 Trying	←																																										
200 OK INVITE	←																																										
ACK	→																																										
		<i>Voice message</i>																																									
BYE	→																																										
200 OK BYE	←																																										

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_010	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2																									
Test purpose ACR service rejects an anonymous communication, Privacy value is critical. An. Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "critical". Ensure that the ACR is sending a 433 (Anonymity Disallowed) response when the communication is rejected.																												
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																												
Comments: <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td>→</td> <td></td> <td></td> <td></td> </tr> <tr> <td>100 Trying</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>ACK</td> <td>→</td> <td></td> <td></td> <td></td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE	→				100 Trying	←				433 Anonymity Disallowed	←				ACK	→			
UA C		SUT		UA S																								
INVITE	→																											
100 Trying	←																											
433 Anonymity Disallowed	←																											
ACK	→																											

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_011	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/4																														
<p>Test purpose <i>ACR service rejects an anonymous communication, Privacy value is critical. announcement is provided.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "critical". Ensure that the ACR service provides an announcement to the originating user before sending a 433 (Anonymity Disallowed) response when the communication is rejected.</p>																																	
<p>Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"</p>																																	
<p>Comments:</p> <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td></td> <td></td> <td>→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td></td> <td></td> <td>←</td> <td></td> </tr> <tr> <td></td> <td></td> <td>Announcement</td> <td></td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td></td> <td></td> <td>←</td> <td></td> </tr> <tr> <td>ACK</td> <td></td> <td></td> <td>→</td> <td></td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE			→		100 Trying			←				Announcement			433 Anonymity Disallowed			←		ACK			→	
UA C		SUT		UA S																													
INVITE			→																														
100 Trying			←																														
		Announcement																															
433 Anonymity Disallowed			←																														
ACK			→																														

TSS ACR_CB/ACR_terminating_AS	TP ACR-CB_N01_012	CB reference TS 183 011, clause 4.5.2.6.2 [1]	Selection expression PICS 1/2 AND PICS 1/5																																								
<p>Test purpose <i>ACR service forwards an anonymous communication, Privacy value is critical.</i> Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "critical". Ensure that the communication is forwarded to voice message service instead of rejecting the communication with a 433 (Anonymity Disallowed) final response.</p>																																											
<p>Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"</p>																																											
<p>Comments:</p> <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td></td> <td></td> <td>→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td></td> <td></td> <td>←</td> <td></td> </tr> <tr> <td>200 OK INVITE</td> <td></td> <td></td> <td>←</td> <td></td> </tr> <tr> <td>ACK</td> <td></td> <td></td> <td>→</td> <td></td> </tr> <tr> <td></td> <td></td> <td>Voice message</td> <td></td> <td></td> </tr> <tr> <td>BYE</td> <td></td> <td></td> <td>→</td> <td></td> </tr> <tr> <td>200 OK BYE</td> <td></td> <td></td> <td>←</td> <td></td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE			→		100 Trying			←		200 OK INVITE			←		ACK			→				Voice message			BYE			→		200 OK BYE			←	
UA C		SUT		UA S																																							
INVITE			→																																								
100 Trying			←																																								
200 OK INVITE			←																																								
ACK			→																																								
		Voice message																																									
BYE			→																																								
200 OK BYE			←																																								

5.3 TPs for Communication Barring (CB)

5.3.1 Actions for OCB at the originating AS

TSS ACR-CB/OBC_originating_AS	TP ACR-CB_N02_001	CB reference TS 183 011, clauses 4.5.2.4.1 and 4.9.1.4 [1]	Selection expression PICS 1/2 AND NOT PICS 1/4															
Test purpose <i>Outgoing communication barring evaluates media.</i> Ensure that a outgoing communication is rejected when the evaluation of the media field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR is sending a 603 (Decline) final response when the communication is rejected.																		
Preconditions: outgoing-communication-barring active=true conditions: sub element media is evaluate to "true" actions: sub element allow is evaluate to "false"																		
Comments: <table style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>603 Decline</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		603 Decline	←		ACK	→	
UA C	SUT	UA S																
INVITE	→																	
100 Trying	←																	
603 Decline	←																	
ACK	→																	

TSS ACR-CB/OBC_originating_AS	TP ACR-CB_N02_002	CB reference TS 183 011, clauses 4.5.2.4.1 and 4.9.1.4 [1]	Selection expression PICS 1/2 AND PICS 1/4																		
Test purpose <i>Outgoing communication barring evaluates media.</i> Ensure that a outgoing communication is rejected when the evaluation of the media field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR service provides an announcement to the originating user before sending a 603 (Decline) final response when the communication is rejected.																					
Preconditions: outgoing-communication-barring active=true conditions: sub element media is evaluate to "true" actions: sub element allow is evaluate to "false"																					
Comments: <table style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td style="text-align: center;">Announcement</td> <td></td> <td></td> </tr> <tr> <td>603 Decline</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		Announcement			603 Decline	←		ACK	→	
UA C	SUT	UA S																			
INVITE	→																				
100 Trying	←																				
Announcement																					
603 Decline	←																				
ACK	→																				

5.3.2 Actions for ICB at the terminating AS

TSS ACR-CB/IBC_terminating_AS	TP ACR-CB_N03_001	CB reference TS 183 011 clause 4.5.2.6.1 [1]	Selection expression PICS 1/2 AND NOT PICS 1/4
Test purpose <i>Outgoing communication barring evaluates media.</i> Ensure that a outgoing communication is rejected when the evaluation of the presence-status field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR is sending a 603 (Decline) final response when the communication is rejected.			
Preconditions: incoming-communication-barring active=true conditions: sub element presence-status is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
433 Anonymity Disallowed	←		
ACK	→		

TSS ACR-CB/IBC_terminating_AS	TP ACR-CB_N03_002	CB reference TS 183 011 clause 4.5.2.6.1 [1]	Selection expression PICS 1/2 AND PICS 1/4
Test purpose <i>Outgoing communication barring evaluates media.</i> Ensure that a outgoing communication is rejected when the evaluation of the presence-status field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR service provides an announcement to the originating user before sending a 603 (Decline) final response when the communication is rejected.			
Preconditions: incoming-communication-barring active=true conditions: sub element presence-status is evaluate to "true" actions: sub element allow is evaluate to "false"			
Comments:			
UA C	SUT	UA S	
INVITE	→		
100 Trying	←		
Announcement			
433 Anonymity Disallowed	←		
ACK	→		

5.4 Interaction with other simulation services

5.4.1 Originating Identification Presentation (OIP)

TSS	TP	CB reference	Selection expression																																													
ACR-CB/interaction_OIP	ACR-CB_N04_001	TS 183 011, clause 4.6.4 [1]																																														
Test purpose <i>ACR does not apply to due override category according to the OIP service.</i> Ensure that the ACR service shall not apply If the called user has subscribed to the override category according to the OIP service.																																																
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																																																
Comments: <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td>→</td> <td></td> <td></td> <td>INVITE</td> </tr> <tr> <td>100 Trying</td> <td>←</td> <td></td> <td></td> <td>100 Trying</td> </tr> <tr> <td>180 Ringing</td> <td>←</td> <td></td> <td></td> <td>180 Ringing</td> </tr> <tr> <td>200 OK INVITE</td> <td>←</td> <td></td> <td></td> <td>200 OK INVITE</td> </tr> <tr> <td>ACK</td> <td>→</td> <td></td> <td></td> <td>ACK</td> </tr> <tr> <td></td> <td></td> <td>Communication</td> <td></td> <td></td> </tr> <tr> <td>BYE</td> <td>→</td> <td></td> <td>→</td> <td>BYE</td> </tr> <tr> <td>200 OK BYE</td> <td>←</td> <td></td> <td>←</td> <td>200 OK BYE</td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE	→			INVITE	100 Trying	←			100 Trying	180 Ringing	←			180 Ringing	200 OK INVITE	←			200 OK INVITE	ACK	→			ACK			Communication			BYE	→		→	BYE	200 OK BYE	←		←	200 OK BYE
UA C		SUT		UA S																																												
INVITE	→			INVITE																																												
100 Trying	←			100 Trying																																												
180 Ringing	←			180 Ringing																																												
200 OK INVITE	←			200 OK INVITE																																												
ACK	→			ACK																																												
		Communication																																														
BYE	→		→	BYE																																												
200 OK BYE	←		←	200 OK BYE																																												

5.4.2 Communication Diversion services (CDIV)

TSS	TP	CB reference	Selection expression																									
ACR-CB/interaction_CDIV	ACR-CB_N05_001	TS 183 011, clause 4.6.7 [1]																										
Test purpose <i>ACR has precedence if the served user has activated the communication diversion service.</i> Ensure that the ACR service shall take precedence over the Communication Diversion service for the served user If the served user has activated the ACR. Ensure that the ACR service rejects the incoming communication where the request includes the P-Asserted-Identity header AND the Privacy header indicating "id". Ensure that the ACR is sending a 433 (Anonymity Disallowed) response when the communication is rejected.																												
Preconditions: incoming-communication-barring active=true conditions: sub element anonymous is evaluate to "true" actions: sub element allow is evaluate to "false"																												
Comments: <table border="0"> <thead> <tr> <th>UA C</th> <th></th> <th>SUT</th> <th></th> <th>UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td>→</td> <td></td> <td></td> <td></td> </tr> <tr> <td>100 Trying</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>ACK</td> <td>→</td> <td></td> <td></td> <td></td> </tr> </tbody> </table>				UA C		SUT		UA S	INVITE	→				100 Trying	←				433 Anonymity Disallowed	←				ACK	→			
UA C		SUT		UA S																								
INVITE	→																											
100 Trying	←																											
433 Anonymity Disallowed	←																											
ACK	→																											

TSS ACR-CB/interaction_CDIV	TP ACR-CB_N05_002	CB reference TS 183 011, clause 4.6.7 [1]	Selection expression															
<p>Test purpose <i>ICB has precedence if the served user has activated the communication diversion service.</i> Ensure that the ICB service shall take precedence over the Communication Diversion service for the served user If the served user has activated the ICB. Ensure that a outgoing communication is rejected when the evaluation of the presence-status field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR is sending a 603 (Decline) final response when the communication is rejected.</p>																		
<p>Preconditions: incoming-communication-barring active=true conditions: sub element presence-status is evaluate to "true" actions: sub element allow is evaluate to "false"</p>																		
<p>Comments:</p> <table border="0"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>603 Decline</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		603 Decline	←		ACK	→	
UA C	SUT	UA S																
INVITE	→																	
100 Trying	←																	
603 Decline	←																	
ACK	→																	

TSS ACR-CB/interaction_CDIV	TP ACR-CB_N05_003	CB reference TS 183 011, clause 4.6.7 [1]	Selection expression															
<p>Test purpose <i>OBC has precedence if the served user has activated the communication diversion service.</i> Ensure that the OCB service shall take precedence over the Communication Diversion service for the served user. Ensure that a outgoing communication is rejected when the evaluation of the media field condition matches in one of the "m=" lines of the served users outgoing communication barring rules. Ensure that the ACR is sending a 603 (Decline) final response when the communication is rejected.</p>																		
<p>Preconditions: outgoing-communication-barring active=true conditions: sub element media is evaluate to "true" actions: sub element allow is evaluate to "false"</p>																		
<p>Comments:</p> <table border="0"> <thead> <tr> <th style="text-align: left;">UA C</th> <th style="text-align: center;">SUT</th> <th style="text-align: right;">UA S</th> </tr> </thead> <tbody> <tr> <td>INVITE</td> <td style="text-align: center;">→</td> <td></td> </tr> <tr> <td>100 Trying</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>603 Decline</td> <td style="text-align: center;">←</td> <td></td> </tr> <tr> <td>ACK</td> <td style="text-align: center;">→</td> <td></td> </tr> </tbody> </table>				UA C	SUT	UA S	INVITE	→		100 Trying	←		603 Decline	←		ACK	→	
UA C	SUT	UA S																
INVITE	→																	
100 Trying	←																	
603 Decline	←																	
ACK	→																	

5.5 Test purposes for the ISUP/SIP Interworking

5.5.1 Interworking from ISUP to SIP (Outgoing Call)

TP612001	ACR-CB Reference: TS 183 011 clause 4.7.1.3.1 [1]	Selection criteria:																									
TSS reference:	ISUP-SIP/SS/ACR																										
Preconditions:																											
Test purpose:	<i>Mapping of 433 Anonymity Disallowed to REL cause 24.</i> Ensure that the 433 Anonymity Disallowed final response received to due the ACR service is mapped into a REL cause 24 "call rejected due to ACR supplementary service".																										
SIP Parameter values:	433 Anonymity Disallowed																										
ISUP Parameter values:	REL cause value 24 "call rejected due to ACR supplementary service"																										
Comments:	<table border="0"> <tr> <td>ISUP</td> <td></td> <td>MGCF</td> <td></td> <td>SIP</td> </tr> <tr> <td>IAM</td> <td>→</td> <td></td> <td>→</td> <td>INVITE</td> </tr> <tr> <td></td> <td></td> <td></td> <td>←</td> <td>100 Trying</td> </tr> <tr> <td>REL(24)</td> <td>←</td> <td></td> <td>←</td> <td>433 Anonymity Disallowed</td> </tr> <tr> <td>RLC</td> <td>→</td> <td></td> <td>→</td> <td>ACK</td> </tr> </table>	ISUP		MGCF		SIP	IAM	→		→	INVITE				←	100 Trying	REL(24)	←		←	433 Anonymity Disallowed	RLC	→		→	ACK	
ISUP		MGCF		SIP																							
IAM	→		→	INVITE																							
			←	100 Trying																							
REL(24)	←		←	433 Anonymity Disallowed																							
RLC	→		→	ACK																							

5.5.2 Interworking from SIP to ISUP (Incoming Call)

TP515001	ACR-CB Reference: TS 183 011 clause 4.7.1.2.1 [1]	Selection criteria:																									
TSS reference:	SIP-ISUP/SS/ACR/																										
Preconditions:																											
Test purpose:	<i>Mapping of REL cause 24 to 433 Anonymity Disallowed.</i> Ensure that the SUT, if a destination user has subscribed the ACR supplementary service: the call attempt is rejected with a REL cause value 24 "call rejected due to ACR supplementary service". The REL cause 24 is mapped into a 433 Anonymity Disallowed final response.																										
SIP Parameter values:	433 Anonymity Disallowed																										
ISUP Parameter values:	REL cause value 24 "call rejected due to ACR supplementary service"																										
Comments:	<table border="0"> <tr> <td>SIP</td> <td></td> <td>MGCF</td> <td></td> <td>ISUP</td> </tr> <tr> <td>INVITE</td> <td>→</td> <td></td> <td>→</td> <td>IAM</td> </tr> <tr> <td>100 Trying</td> <td>←</td> <td></td> <td></td> <td></td> </tr> <tr> <td>433 Anonymity Disallowed</td> <td>←</td> <td></td> <td>←</td> <td>REL(24)</td> </tr> <tr> <td>ACK</td> <td>→</td> <td></td> <td>→</td> <td>RLC</td> </tr> </table>	SIP		MGCF		ISUP	INVITE	→		→	IAM	100 Trying	←				433 Anonymity Disallowed	←		←	REL(24)	ACK	→		→	RLC	
SIP		MGCF		ISUP																							
INVITE	→		→	IAM																							
100 Trying	←																										
433 Anonymity Disallowed	←		←	REL(24)																							
ACK	→		→	RLC																							

History

Document history		
V1.0.0	June 2008	Publication