SIPconnect 1.1

Certification Test Decision Guidelines

Version 1

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MODIFICATION RECORD

Version 1.0	February 1, 2016	• Published after peer reviews.
Version 0.3	January 24, 2016	• 3rd draft for review
Version 0.2	January 5, 2016	• 2nd draft
Version 0.1	December 18, 2015	• Initial version

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INTRODUCTION

This document establishes the SIPconnect 1.1. Certification Committee decision guidelines to determine if a product or service has demonstrated compliance per the Certification Test Plan as scored in the SIPconnect 1.1 Certification Test Report produced by UNH-IOL. The application of these guidelines will result in fair and unbiased decisions based solely on the Test Report results.

Certification Test Plan

The SIPconnect 1.1 Certification Test Plan (CTP) is for testing conformance of a vendor product to the SIPconnect 1.1 Technical Recommendation. The CTP contains test cases for the "MUST" and "shall" requirements of the SIPconnect 1.1 Technical Recommendation and other applicable SIP RFCs.

Based on prior written agreement by the SIPconnect 1.1 Certification Task Group, the "MUST" and "shall" requirements were assigned one of two categories in the CTP:

1. **Required** – the requirement is Mandatory for certification.
2. **Optional** – the requirement may be tested if supported or requested, but is eligible for an automatic Waiver should the test fail or was not exercised. Optional requirements not universally implemented, have minimal impact on interoperability and include TLS, Privacy Header RFC 6140, T.38 fax, SP-SSE public DNS and the Path Extension Header.

SIPconnect 1.1 Certification Test Report

The University of New Hampshire – InterOperability Laboratory (UNH-IOL) is an independent testing facility that conducts SIPconnect 1.1 testing on behalf of the SIP Forum. UNH-IOL produces a "SIPconnect 1.1. Certification Test Report" which itemizes the result of each test case in the CTP that contains the following outcomes:

Result	Meaning	Interpretation
PASS	Pass	The Device Under Test (DUT) was observed to exhibit conformant behavior.
FAIL	Fail	The Device Under Test (DUT) was observed to exhibit non-conformant behavior.
N/A	Not Applicable	This test does not apply to the device type or is not applicable to the testing program selected.
N/S	Not Supported	The Device Under Test (DUT) was not observed to support the necessary functionality required to perform these tests or the requirement is optional and not supported by this device.
UA	Unavailable	The test was not performed due to limitation of the test tool(s) or interoperable systems, or the test methodology is still under development.

Certification Decision Criteria

The Certification Committee will apply the following decision making criteria when reviewing the Test Report results:

1. **PASS** – result is required for all Mandatory requirements/test cases that are <u>applicable</u> to the product or service under test.
2. **FAIL** – if the requirement/test case is applicable and Mandatory but exhibited non-conformant behavior. The test report will explain why the test failed. A FAIL result shall cause the product or service to be **ineligible for certification**.
3. **N/A** – Not Applicable is a valid result and is not a factor in the certification decision.
   - CTP Test Section 1 only applies to a SIP-PBX and Test Section 2 only applies to SP-SSE (SIP Trunk).
   - SIP-PBXs MUST support either Registration mode, as specified in SIPconnect 1.1 Annex A, or Static mode, as described in Annex B. A PBX must only support one (1) mode and receive a **PASS** result for that test. Some PBXs support both Registration and Static modes - the testee will decide which mode(s) are tested.
4. **N/S** – Not Supported is assigned to the test result only if the requirement/test is **Optional** and/or not implemented by the product or service.
   - If the requirement/test is **Mandatory** but not supported then a **FAIL** result is assigned.
   - For Optional requirements an automatic **Waiver** is granted.
5. **UA** – Unavailable test result may be assigned only for **Optional** tests due to an unforeseen issue with the test environment, methodology, time involved or technical problem. UNH-IOL and the SIP Forum will work to resolve the issues however a solution may not be immediately available. An automatic **Waiver** will be granted because the requirement/test is Optional.

Required and Optional Tests

The following table is repeated from the Certification Test Plan for quick reference and summarizes the Test Case, Applicable Device and whether the test is Required or Optional for certification:

Certification Test Plan – Test Case	Applicable Device	Required for Certification
SC-IT.Conf.1.1.1: Registration Setup	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.1.2: Registration Failure	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.1.3: Maintaining Registration	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.1.4: Authentication	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.1.5: TLS Server Mode	SIP-PBX	OPTIONAL/Waiver
SC-IT.Conf.1.1.6: TLS Certificate Validation	SIP-PBX	OPTIONAL/Waiver
SC-IT.Conf.1.2.1: SP-SSE Address Acquisition by SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.2.2: Static Mode Failure Detection	SIP-PBX	OPTIONAL/Waiver
SC-IT.Conf.1.2.3: TLS Authentication	SIP-PBX	OPTIONAL/Waiver
SC-IT.Conf.1.3.1: Verification of INVITE Message Parameters When Originating a DOD Call	SIP-PBX	**REQUIRED**

SC-IT.Conf.1.3.2: INVITE Message Processing When Terminating a DID Call	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.3.3: SIP-PBX Support for Privacy when processing INVITE for Terminating DID Call	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.3.4: SIP-PBX Support for Privacy when generating INVITE message for Originating DOD Call	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.1: Call Forwarding	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.2: Blind Call Transfer - Transferor in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.3: Blind Call Transfer - Transferee in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.4: Blind Call Transfer – Transferee and Transfer-To in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.5: Blind Call Transfer with Early Media – Transferee in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.6: Attended Call Transfer – Transferor in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.7: Blind Call Transfer – Transferor and Transferee in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.8: Blind Call Transfer – Transferor and Transfer-to in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.9: Blind Call Transfer -- Transferee and Transfer-to in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.1.4.10: Blind Call Transfer with Early Media – Transferee and Transfer-to in SIP-PBX	SIP-PBX	**REQUIRED**
SC-IT.Conf.2.1.1: Registration Setup	SP-SSE	**REQUIRED**
SC-IT.Conf.2.1.2: Registration Failure	SP-SSE	**REQUIRED**
SC-IT.Conf.2.1.3: Inbound Requests	SP-SSE	**REQUIRED**
SC-IT.Conf.2.1.4: Authentication	SP-SSE	**REQUIRED**
SC-IT.Conf.2.3.1: Verification of INVITE Message Parameters When Terminating a DID Call	SP-SSE	**REQUIRED**
SC-IT.Conf.2.3.2: INVITE Processing for Originating a DOD Call	SP-SSE	**REQUIRED**
SC-IT.Conf.2.3.3: Verification of INVITE Parameters for Terminating DID Anonymous Calls	SP-SSE	**REQUIRED**
SC-IT.Conf.2.3.4: Verification of INVITE Parameters for Terminating DID Unknown/Public Calls	SP-SSE	OPTIONAL/Waiver
SC-IT.Conf.2.4.1: SP-SSE Support for Privacy when generating an INVITE message to Terminate a DID Call	SP-SSE	**REQUIRED**
SC-IT.Conf.2.4.2: SP-SSE Support for Privacy when processing an INVITE message to Originate a DOD Call	SP-SSE	**REQUIRED**
SC-IT.Conf.2.4.3: SP-SSE Call Forwarding	SP-SSE	**REQUIRED**
SC-IT.Conf.3.1.1: Basic Signaling and SDP Exchange	BOTH	**REQUIRED**
SC-IT.Conf.3.1.2: SDP Version Number	BOTH	**REQUIRED**
SC-IT.Conf.3.4.1: Session Hold	BOTH	**REQUIRED**

Sample SIPconnect 1.1. Certification Test Report

A sample SIPconnect 1.1 Certification Test Report produced by UHN-IOL is attached. Each report is cryptographically signed for authentication and to prevent tampering. Reports are **HIGHLY CONFIDENTIAL** and must NOT be discussed or disclosed to any party outside of the Certification Committee, SIP Forum Board of Directors and UNH-IOL.

Click here to open the UNH-IOL SIPconnect Test Report Sample