

ITU Conformity Database

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Consultant**

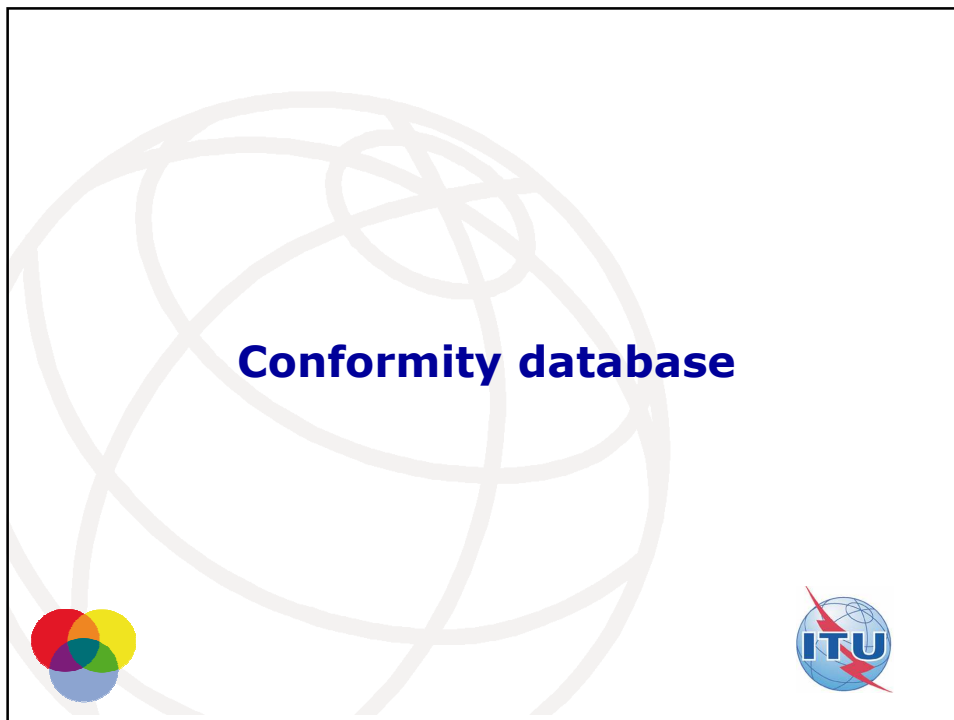
Accra, 4 – 6 July 2011



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The ITU Conformity Database

- Use of Current international procedures (ISO/IEC 17025, 17050, ISO Guide 65 - **CASCO toolbox**)
- Establish a database of conforming products and systems with robust credentials for participants
- Enables manufacturers and service providers to make a visible declaration that their equipment conforms to ITU Recommendations
- The database is open both to members and non-members
- The database contains only information entered directly by companies by means of an on-line tool: the Supplier's Declaration of Conformity (SDoC).
- ITU is not in a position to verify the accuracy of the information submitted by companies, who, in signing the SDoC take the full responsibility for its contents.



Supplier's Declaration of Conformity 1/2

Please complete the information requested in each field below. One may advance by tabbing from field to field. Once completed, click on the button below to **download for signature, SIGN and SCAN** completed form and send by E-Mail to: tsbconformity@itu.int

Company			
Name of Signatory:	<input type="text"/>	Title:	<input type="text"/>
Full Company Name:	<input type="text"/>		
Street/PO Box:	<input type="text"/>	Town/City:	<input type="text"/>
Post/ZIP Code:	<input type="text"/>	Country:	<input type="text" value="Afghanistan - AFG"/>
Telephone:	<input type="text"/>	Company E-Mail:	<input type="text"/>
Website:	<input type="text"/>		

PRODUCT	
Name of product:	<input type="text"/>
Enter a Category:	<input type="text"/>
	(e.g. DSLAM, modem, ADSL, optical fibre, home networking, WDM, multimedia, IPTV etc.)
Comments/Remarks:	<input type="text"/>
	(e.g. ITU-T Recommendation Edition, main functionalities implemented, etc.)

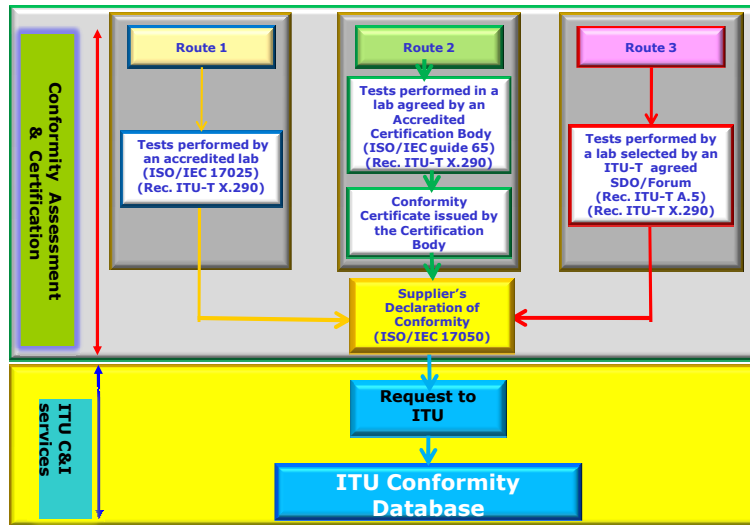
Supplier's Declaration of Conformity 2/2

ITU-T RECOMMENDATION(S) IMPLEMENTED IN THE PRODUCT	
Please select from the list below ITU-T Recommendations that are implemented in your product.	
<input type="text" value="F.162"/>	<input type="button" value="Select"/>

SDOs (ACCEPTED UNDER ITU-T A.5) WHOSE STANDARDS ARE IMPLEMENTED IN THE PRODUCT	
<input type="text" value="ABNT (Associacao Brasil)"/>	<input type="button" value="Select"/>

DECLARATION OF CONFORMITY	
By signing this SDoC I declare that all statements are true and that I have the authority to make such statements on behalf of this company.	
The present Supplier's Declaration of Conformity is issued on the basis of:	
<input checked="" type="checkbox"/> Test results conducted in Accredited Laboratory	Name: <input type="text"/>
<input type="checkbox"/> Certificate of Conformity issued by Accredited Certification Body	Name: <input type="text"/>
- Tests performed in a lab recognized by: (A.5 – SDO/Forum)	

Three routes to populate conformity db



ITU Recommendations suitable for conformity assessment & interoperability testing



ITU-T Recommendations

■ Methodology

- Recommendations X.290 Series - OSI conformance testing methodology and framework for protocol Recommendations for ITU-T applications
- X.290 General concepts
- X.291 Abstract test suite specification
- X.292 The Tree and Tabular Combined Notation (TTCN)
- X.293 Test Realization
- X.294 Requirements on test laboratories and clients for the conformance assessment process
- X.295 Protocol profile test specification
- X.296 Implementation conformance statements
- Z.100 – Z.109 Specification and Description Language (SDL)
- Z.110 – Z.119 Application of formal description techniques
- Z.120 – Z.129 Message Sequence Chart (MSC)
- Z.150 – Z.159 User Requirements Notation (URN)
- Z.160 – Z.179 Testing and Control Notation (TTCN-3)



ISDN Test Specifications

- Q.765bis – SS7 Application transport mechanism: Test suite structure and test purposes (TSS & TP)
- Q.780 Signalling System No. 7 test specification – General description
- Q.781 MTP level 2 test specification
- Q.782 MTP level 3 test specification
- Q.783 TUP test specification
- Q.784 ISUP basic call test specification
- Q.784.1 ISUP basic call test specification: Validation and compatibility for ISUP'92 and Q.767 protocols
- Q.784.2 ISUP basic call test specification: Abstract test suite for ISUP'92 basic call control procedures
- Q.784.3 ISUP basic call test specification: ISUP '97 basic call control procedures – Test suite structure and test purposes (TSS & TP)
- Q.785 ISUP protocol test specification for supplementary services
- Q.785.2 ISUP'97 supplementary services – Test suite structure and test purposes (TSS & TP)
- Q.786 SCCP test specification
- Q.787 Transaction capabilities (TC) test specification
- Q.788 User-network-interface to user-network-interface compatibility test specifications for ISDN, non-ISDN and undetermined accesses interworking over international ISUP
- Q.921bis Abstract test suite for LAPD conformance testing
- Q.933bis Abstract test suite – Signalling specification for frame mode basic call control conformance testing for permanent virtual connections (PVCs)

ISDN

- Q.703 (1996-07) MTP signaling link
- Q.704 (1996-07) MTP Signalling network functions and messages
- Q.706 (1993-03) Message transfer part signalling performance
- Q.707 (1988-11) MTP Testing and maintenance
- Q.711 (2001-03) Functional description of the signalling connection control part
- Q.712 (1996-07) Definition and function of Signalling connection control part messages
- Q.713 (2001-03) Signalling connection control part formats and codes
- Q.714 (2001-05) Signalling connection control part procedures
- Q.721 (1988-11) Functional description of the Signalling System No. 7 Telephone User Part (TUP)
- Q.722 (1988-11) General function of telephone messages and signals
- Q.723 (1988-11) Telephone user part formats and codes
- Q.724 (1988-11) Telephone user part signalling procedures
- Q.730 (1988) ISUP supplementary services (1988 version covered by test specification – latest version of Q.730 1999-12)
- Q.761 (1999-12) SS7 ISDN User Part functional description
- Q.762 (1999-12) SS7 ISDN User Part general functions of messages and signals
- Q.763 (1999-12) SS7 ISDN User Part formats and codes
- Q.764 (1999-12) SS7 ISDN User Part signalling procedures
- Q.765 (2000-06) SS7 application transport mechanism
- Q.767 (1991-02) Application of the ISDN User Part of CCITT signalling system No. 7 for international ISDN interconnections
- Q.771 (1993) Functional description of transaction capabilities (93 version covered by test specification – latest version of Q.771 – Q.774 1997-06)
- Q.772 (1993) Transaction capabilities information element definitions
- Q.773 (1993) Transaction capabilities formats and encoding
- Q.774 (1993) Transaction capabilities procedures
- Q.921 (1997-09) ISDN user-network interface – Data link layer specification

ITU-T specifications for testing of:

Optical fibre cables

- G.652 (2009-11) Characteristics of a single-mode optical fibre and cable
- G.653 (2010-07) Characteristics of a dispersion-shifted, single-mode optical fibre and cable
- G.654 (2010-07) Characteristics of a cut-off shifted, single-mode optical fibre and cable
- G.655 (2009-11) Characteristics of a non-zero dispersion-shifted single-mode optical fibre and cable
- G.656 (2010-07) Characteristics of a fibre and cable with non-zero dispersion for wideband optical transport
- G.657 (2009-11) Characteristics of a bending-loss insensitive single-mode optical fibre and cable for the access network

Characteristics of optical components and subsystems

- G.662 (2005-07) Generic characteristics of optical amplifier devices and subsystems
- G.663 (2011-04) Application related aspects of optical amplifier devices and subsystems
- G.664 (2006-03) Optical safety procedures and requirements for optical transport systems
- G.665 (2005-01) Generic characteristics of Raman amplifiers and Raman amplified systems
- G.666 (2011-02) Characteristics of PMD compensators and PMD compensating receivers
- G.667 (2006-12) Characteristics of adaptive chromatic dispersion compensators

Optical fibre submarine cable systems

- G.973 (2010-07) Characteristics of repeaterless optical fibre submarine cable systems
- G.974 (2007-07) Characteristics of regenerative optical fibre submarine cable systems
- G.975.1 (2004-02) Forward error correction for high bit-rate DWDM submarine systems
- G.977 (2011-04) Characteristics of optically amplified optical fibre submarine cable systems
- G.978 (2010-07) Characteristics of optical fibre submarine cables

and

Coding of voice and audio signals

- G.711 (1988-11) Pulse code modulation (PCM) of voice frequencies
- G.722 (1988-11) 7 kHz audio-coding within 64 kbit/s
- G.723.1 (2006-05) Dual rate speech coder for multimedia communications transmitting at 5.3 and 6.3 kbit/s
- G.726 (1990-12) 40, 32, 24, 16 kbit/s Adaptive Differential Pulse Code Modulation (ADPCM)
- G.727 (1990-12) 5-, 4-, 3- and 2-bit/sample embedded adaptive differential pulse code modulation (ADPCM)
- G.728 (1992-09) Coding of speech at 16 kbit/s using low-delay code excited linear prediction
- G.729 (2007-01) Coding of speech at 8 kbit/s using conjugate-structure algebraic-code-excited linear prediction (CS-ACELP)

Coding of moving video

- H.264 (2010-03) Advanced video coding for generic audiovisual services

Protection against interference - resistibility

- K.20 (2008-04) Resistibility of telecommunication equipment installed in a telecommunications centre to overvoltages and overcurrents
- K.21 (2008-04) Resistibility of telecommunication equipment installed in customer premises to overvoltages and overcurrents
- K.45 (2008-04) Resistibility of telecommunication equipment installed in the access and trunk networks to overvoltages and overcurrents

Voice terminal characteristics

- P.310 (2009-06) Transmission characteristics for narrow-band digital handset and headset telephones
- P.311 (2011-03) Transmission characteristics for wideband digital handset and headset telephones
- P.313 (2007-03) Transmission characteristics for cordless and mobile digital terminals

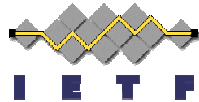
Image compression – JPEG 2000

- T.800 (2002-08) JPEG 2000 image coding system: Core coding system
- T.802 (2002-08) Motion JPEG-2000

WTSA-2008 Resolution 76

**“very few of the current ITU-T
Recommendations identify interoperability
or conformance testing requirements”**

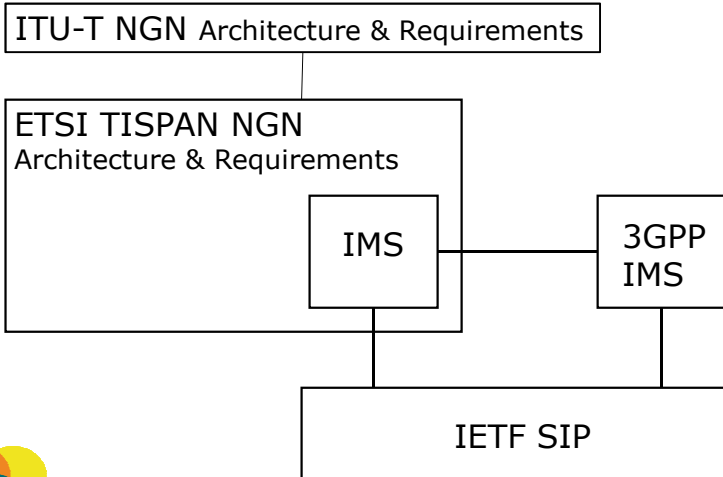
Standards Converge



Advancing open standards for the information society

Convergence on IP technology has led to a situation in which many standardisation organisations are involved

Example: Next Generation Networks & the IP Multimedia Subsystem (IMS)



Test specifications from other SDOs

- H.248 (Gateway Control Protocol) - MSF has developed some H.248 interoperability agreements
- H.262 (Generic coding of moving pictures and associated audio information: Video) – Conformance testing and software simulation are available in ISO/IEC 13818-4:2004 and ISO/IEC TR 13818-5:2005, respectively
- J-Series (Cable networks and transmission of television, sound programme and other multimedia signals) – many of these Recommendations are covered by the CableLabs certification scheme



The Future of the ITU Conformity Database

- An ITU-T conformity assessment scheme?
- Test specifications critical
- Optimisation key to success
- Degree of formality in process?
- National certification bodies / industry certification board?
- Testing laboratories nationally accredited / ITU recognised?