



# ITU Conformity & Interoperability Programme Pillar 1 & 2 Updates

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# ITU Conformity & Interoperability Programme

Pillar 1 & 2 Updates

### **C&I** basic terms

- Conformity assessment (CA): the process used to demonstrate that a product, service or system conform to specified requirements. – ISO/IEC 17000
  - 1st party CA manufactures' self-declaration of conformity
  - 2<sup>nd</sup> party CA by user, e.g. purchaser, importer, retailer...
  - → 3<sup>rd</sup> party CA ISO/IEC 17025, 17065, etc
- Interoperability: the ability of two or more systems or applications to exchange information and to mutually use the information that has been exchanged. -Rec. ITU-T Y.101
- conformance increases the probability of interoperability, but CAN NOT guarantee

## ITU C&I Programme in 4 "Pillars"

### The Standardization Sector side

- Pillar 1: Conformity Assessment
- Pillar 2: Interoperability Events

## The Development Sector side

- Pillar 3: Capacity building
- Pillar 4: Establishment of test centres in developing countries

## Pillar 1

**Conformity Assessment** 

## Pillar 1 as defined in ITU PP-10 Resolution 177

#### Res. 177

- mentioned a pilot ITU Conformity Database as informative only
- → invited ITU Sector Members to populate the pilot conformity database with details of products tested to applicable ITU-T Recommendations in accredited test laboratories (1st, 2nd or 3rd party), or by accredited certification bodies, or according to procedures adopted by a standards development organization or forum qualified in accordance with Recommendation ITU-T A.5
- Continue to study a possible ITU Mark as a voluntary conformity declaration

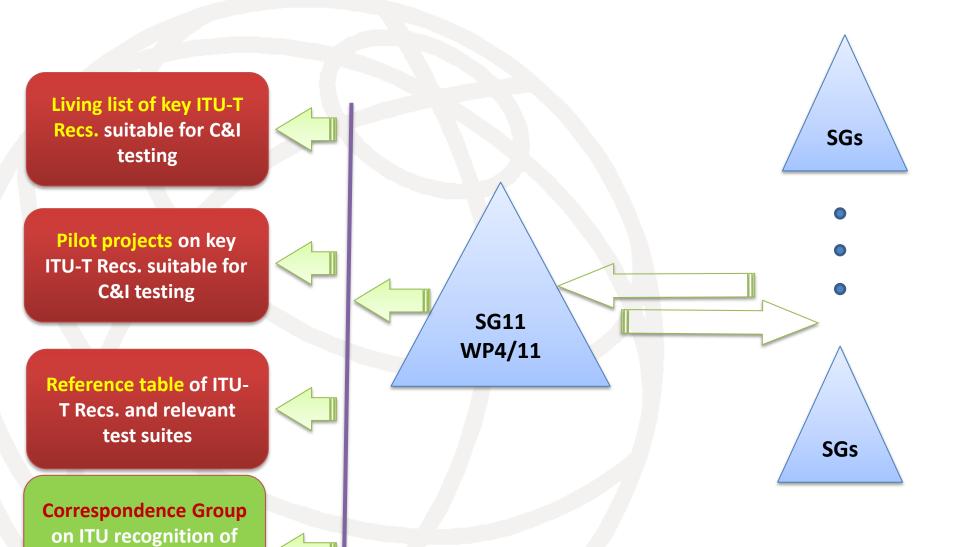
### **Pillar 1 Objectives**

- 1. Produce interoperable standards ITU-T SGs are identifying ITU-T Recommendations with demonstrated market need for C&I testing and developing testing specifications if needed, in collaboration with partner SDOs if appropriate
- Promote conformity assessment on products/services against ITU-T Recommendation(s) - ITU Conformity database



test labs







#### Living list of key ITU-T Rec. for C&I (1/2)



#### The living list of Recommendations and related specifications within key technologies suitable for **C&I** testing

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#### ITU-T SG11 output document:

TD 371 (GEN/11) (9-16 July 2014)

#	Title	Focal Point	Other SDOs	ITU-T SGs	References to SDOs docs	References to ITU-T Recs.
1	NGN Functionality	Martin Brand	ETSI	SG11	ETSI (Requirements)	ITU (Requirements)
		Vice-chairman of SG11			-	Y.2201
		(Austria)			-	Y.2012
		martin.brand@A1telekom.	at		-	Q.3909
		Andrey Koucheryavy			ETSI (Test suites)	ITU (Test suites)
		(Russia)			-	Q.3900
		akouch@mail.ru			-	Q.3901
		Dmitry Tarasov				
		(Russia)				
		tarasov@zniis.ru				
2	Functions of broadband	Dmitry Tarasov	-	SG11	-	ITU (Requirements)
	network as a part of NGN	(Russia)				Y.2012
		tarasov@zniis.ru				
						ITU (Test suites)
						Q.3906.1
3	IMS architecture, signalling	Martin Brand	ETSI/3GPP	SG11	ETSI (Requirements)	ITU (Requirements)
	protocols, interfaces	Vice-chairman of SG11			TS 124 228	-
		(Austria)			TS 124 229	-
		martin.brand@A1telekom.	at		TS 124 238	-
					TS 124 428	-



#### Living list of key ITU-T Rec. for C&I (2/2)



Network and equipment performance (benchmarking) – Req: Draft Q.39zz-1; TS:Q.3930, Q.3931.1-4, Q.3932.1-4,

**QoS/QOE/NP** – Req: Q.3925, Y.1541, Y.1542, Y.1543, draft Q.MSPQuality, Q.NP-req; TS:Q.QMS, Q.3930, Q.3931.1, Q.3931.2

**NGN Functionality** – Req: Y.2201, Y.2012; TS: Q.3909; TS: Q.3900; Q.3901

Functions of broadband network as a part of NGN – Req: Y.2012; TS: Q.3906.1

IMS architecture, signaling protocols, interfaces – Req: Y.2012; TS: Q.3904

IMS basic call – Protocol conformance testing – Req: Draft Q.39xx-1; TS: Q.3904

**IMS supplementary services. Protocol specifications** – Req: -; TS: Q.3943.1/2/4, Q.3942.1

**IMS** interconnection – Re: Q.3401; TS: -

Interoperability testing – Req: -; TS: Q.3940, Q.3941.1-4

NGN monitoring system - Req: Q.3902, Q.3910, Q.3911, Q.3912; TS: -

Interworking of signaling protocols of NGN – Req: Q.1912.5, Q.3401, Q.3402; TS: Q.1912.5

B-F

**RFID** – Req: -; TS: Q.3950

Internet speed access – Req: -; TS: Q.InSpMs

Internet Access as perceived by user - Req: G.1000; TS: -





## Pilot projects on C&I testing against ITU-T Recommendations (1/3)

Title of planned/on going Pilot Project under C&I Programme	ITU-T Recs.	SGs focal point	Interested companies	Motivations	Short-term strategy
The title of planned or ongoing Pilot Project which SG is going to start and maintain		The contact of responsible person/expert (rapporteur, editor, etc)	The companies are going or have already involved to the project	The reason and expecting results under ITU C&I Programme	The short- term strategy (one year) for achieving the goals of the Pilot Project



## Pilot projects on C&I testing against ITU-T Recommendations (2/3)



- ITU-T C&I Pilot project "Network management interface related Recommendations (ITU-T M.3170 series)" in cooperation with ITU-T SG2
- 2. ITU-T C&I Pilot project "G.hn conformance testing" (ITU-T G.9960 series) in collaboration with ITU-T SG15 and HGF



## Pilot projects on C&I testing against ITU-T Recommendations (3/3)



#### **First ITU-T Pilot project**

**Testing scope:** conformance testing of the Multi-technology network interface in accordance with series of Recs. ITU-T M.3170.x

Involved companies: China Telecom, FiberHome, ZTE, CTTL, BUPT, etc.

**Goal:** improvement of an interconnection between EMS, NMS, and OSS for the MTNM interface

#### **Short-term strategy:**

- ✓ harmonize requirements based on the inputs provided by vendors, labs, operators
- ✓ select an appropriate TL that has a competence to perform the relevant tests
- ✓ perform testing at the appointed TL
- ✓ populate ITU product conformity DB



testing (1/2)



Reference Table is a list of ITU-T Recs and applicable test suites (ITU/other SDOs) which indicate relevant parameters to be tested for conformity/interoperability

## **ITU Conformity Database**

to **showcase** products (/systems/services) implementing and conformant to ITU-T Recommendations

- voluntary and for information only
- it supports all types of CA, esp.:
  - → 1<sup>st</sup> party CA SDoC
  - 3<sup>rd</sup> party CA
    - partner with existing CA scheme IECEE,
       ILAC/IAF, etc (ITU-T SG11 CG's proposal)

## Pillar 2

**Interoperability Events** 

## **ITU Interop events**

- ITU Interoperability testing events:
  - cross-connect various manufacturers
  - evaluate of interoperability of all participants on a peer basis
  - check end to end performance at common "interfaces"

to validate different implementations of standard, and feedback to standard-making.

#### ✓ ITU conducted test events:

- ✓ IPTV Interop and showcasing events on ITU-T H.760
- ✓ NGN Interop and showcasing events
- ✓ Continua Health Alliance Interoperability event on ehealth (Geneva, Oct. 13)
- ✓ <u>Performance assessment of mobile phones in</u> <u>conjunction with HFT in a car against Recs. ITU-T</u> <u>P.1100/P.1110</u> (May. 14)
- ✓ Interoperability of IMS-NNI, IoT (Bangkok, Aug. 14)
- ✓ Future events planned:
  - ✓ Continua Health Alliance Interoperability event on ehealth (Geneva, 1st Quarter 2015)

#### ITU Test Event (1/2)



#### Performance assessment of mobile phones in conjunction with vehicle's HFT in accordance with Recs. ITU-T P.1100/P.1110 www.itu.int/go/test-event

#### **Background**

Many mobile phones do not work properly with HFT's system and thereby significantly degrading the speech quality of the complete system

#### **Findings**

- ✓ an incorrect behavior of the mobile phone in the wireless connection to a vehicle's HFT
- ✓ an unacceptable quality of a voice-call inside the car and outside the car for the conversational partner Only 30 % of phones passed the tests

#### **Key outcomes**

- √ 'Anonymized' report published on ITU website
- ✓ Updated Recs. ITU-T P.1100/P.1110 with the new Volvo, Bosch, Toyota values of performance



**Venue:** ITU Headquarters

**TL:** HEAD Acoustics

**Date:** 12-16 May 2014

Participants: Mercedes-Benz,

Number of tests: 40 (30 phones)

**ITU press-release** 

### **Conclusions**

#### We invite:

- all interested parties, esp. test labs and other SDOs, to contribute test specifications of ITU-T Recommendations;
- all interested parties, esp. test labs/accreditation bodies, to discuss and trial voluntary 3<sup>rd</sup> CA for products implementing particular ITU-T Recommendation(s) with market needs;
- Vendors (and/or test labs with their agreement) to populate the ITU Conformity Database



## Thank You!