



CxO MEETING

7 December 2021, Dubai, United Arab Emirates

COMMUNIQUÉ

High-level industry executives (CxOs) met with the senior management of the ITU Telecommunication Standardization Bureau to exchange views on industry priorities and related standardization activities in Dubai, UAE, 7 December 2021, co-hosted by Telecom Review and du.

CxOs discussed industry priorities in fields including IMT-2020/5G, open RAN, light communication, artificial intelligence (AI) and machine learning (ML), environmental efficiency, supply chain security, and network infrastructure sharing – placing emphasis on their relationship with digital transformation.

CxOs shared views on means to support and capitalize on the growing synergy between industry and academia in the development and application of information and communication technologies (ICTs), particularly in the field of AI/ML.

CxOs also received an executive briefing on the outcomes of previous CxO meetings as well as preparations for the ITU World Telecommunication Standardization Assembly in Geneva, Switzerland, 1-9 March 2022, and the preceding ITU Global Standards Symposium, 28 February 2022.

5G foundation for digital transformation

Digital industries such as online retail, media and banking have realized much of their digitalization potential, but 5G brings new digitalization opportunities to physical industries like manufacturing, healthcare, transportation, logistics, mining, and energy utilities.

Value creation and the associated monetization of 5G assets will be driven in large part by network operators' offer of differentiated services attuned to the needs of different industries, said CxOs.

CxOs highlighted the significant value generated by industry digitalization in terms of increased safety, productivity, and efficiency in view of the COVID-19 pandemic and industry's ability to respond to abrupt changes in supply and demand.

5G provides the foundation for digital transformation but a wide variety of technologies will build on this foundation, said CxOs, recognizing that the transformation of physical industries rests on the integration of 5G technologies with technologies in fields including AI/ML, big data and the Internet of Things (IoT).

This recognition motivated CxOs to highlight their support for ITU's work to support the cross-sector partnerships driving digital transformation and ITU's development of ICT standards for digital transformation in areas such as smart cities, health, energy, transportation, agriculture, and finance. CxOs also underlined the importance of this work to the pursuit of a low-carbon future and the United Nations Sustainable Development Goals.

CxOs emphasized that ‘open RAN’ – built on general-purpose hardware, standardized interfaces and virtualized network elements – should be characterized by a diverse underlying business ecosystem encouraging of innovation and new cost efficiencies. Challenges to be overcome, said CxOs, include the need to ensure interoperable standardized solutions and security across open RAN interfaces and functions. Highlighting the importance of harmonized open RAN specifications, CxOs suggested that ITU consider the work of, *inter alia*, O-RAN Alliance, Telecom Infra Project, and Open Networking Foundation to identify its impacts on ITU standardization work and explore the possibility of collaboration.

CxOs also discussed the value of light communication in complementing WiFi, noting the strengths of light communication with respect to capacity, latency, security and quality of service, as well as its value in lightening the load on increasingly crowded radio-frequency spectrum. CxOs noted the availability of products built to the ITU standard for high-speed indoor visible light communication delivered in 2019 and were briefed on the upcoming IEEE standard for light communication.

The opportunities and challenges presented by network infrastructure sharing formed another key element of CxO’s discussions around 5G deployment. CxOs discussed the potential of network infrastructure sharing to reduce operators’ CAPEX and OPEX, noting the increasing costs associated with the sophistication and density of network equipment present in 5G deployments, and suggesting that ITU standardization work could offer relevant guidance to industry in this regard.

Chaesub Lee, Director of the ITU Telecommunication Standardization Bureau, proposed that ITU establish an ad-hoc group to share experiences and challenges relevant to 5G-powered digitalization, to the benefit of all industries and governments. CxOs offered support for this proposal and agreed to discuss its implementation in further detail.

Environmental efficiency and security in a complex ICT ecosystem

CxO emphasized the importance of collaboration among industry players and associated standardization activities in reducing the environmental footprint of ICTs, pointing to key guiding questions in how to measure and control electricity consumption and how to mainstream adherence to principles of eco-design and circular economy among ICT manufacturers.

CxOs noted the relevance of associated standardization work underway in ITU and the value of supporting cooperation with GSMA and NGMN. In reviewing standardization work underway in ITU, CxOs suggested that ITU consider the development of new standards providing a simplified environmental footprint assessment system for network equipment, as well as modelling rules for network equipment lifecycle assessment.

The complexity of ICT industry supply chains – complexity amplified by the diversity of 5G applications – calls for increasing attention to supply chain security, highlighted CxOs.

CxOs were briefed on supply chain security standardization projects underway in TIA and ATIS and some CxOs encouraged further international dialogue on this topic. Recognizing the wide variety of vendors and classes of technology comprising today’s ICT supply chains, CxOs underlined the importance of building a globally harmonized understanding of the software, hardware, and supplier makeup of supply chain security.

The need to nurture AI/ML and data

Network optimization is becoming increasingly challenging, and increasingly important, as networks grow in complexity to support the coexistence of the diverse range of ICT applications and services associated with the acceleration of digital transformation across our economies.

CxOs shared the view that AI/ML will play a key part in this optimization, in parallel highlighting the value of the increasing collaboration between industry and academia in this regard and the support to this collaboration offered by initiatives such as the ITU AI/ML in 5G Challenge.

5G and beyond-5G connectivity combined with AI/ML, IoT, and advanced cloud computing environments are key enablers for future ICT use cases across industry sectors, said CxOs. This recognition motivated CxOs to call on ITU to stimulate the collaboration necessary support widespread access to computing resources and high-quality data for AI/ML training and evaluation.

CxOs encouraged the interaction of MENA and ITU AI/ML sandboxes and that ITU and GSMA strengthen collaboration on AI/ML.

The importance of collaboration within and among industry sectors remained a dominant theme in CxOs' discussions of the new possibilities emerging in multimedia and intelligent transport systems with advances in AI/ML.

CxOs highlighted their support for ITU to stimulate closer collaboration among communities contributing the development of AI/ML-enriched multimedia standards, recognizing the leading role played by ITU, ISO and IEC in the field.

CxOs also highlighted their support for ITU's work towards new standards for the continuous monitoring of the behavioural performance of AI systems in control of automated vehicles, as well as the ambitions of the new AI for Road Safety initiative led in partnership by ITU and the offices of the UN Secretary General's Special Envoy for Road Safety and Envoy on Technology.

The participating organizations were:

In Dubai: APTelecom; Benya Group; Catronic Enterprise; CommScope; du; Etisalat; Huawei Technologies; Nokia Bell Labs; Ookla; Organisation Arabe des TIC; Rohde & Schwarz; Sofrecom (Orange); Telecom Review; Trace Media; umlaut; Zenaciti.

Online: AT&T; Alliance for Telecommunications Industry Solutions (ATIS); Autonomous Drivers Alliance (ADA); China Telecom; Cisco Systems; Citibeats; Ericsson; Fujitsu; Futurewei; Hewlett Packard Enterprise; IBM; Insikt Intelligence; JSC "Kryptonite"; Juniper Networks; NBN Co; Nokia; Orange; pureLiFi; SAMA PARTNERS; Samsung Electronics; Sumitomo Electric Industries., Spark NZ; TDRA UAE; Telecommunication Technology Committee (TTC) Japan; Telecommunication Industry Association (TIA) ; Tunisie Télécom; Türk Telekom; ZTE Corporation.