



MENA Innovation 2019

Official Ministerial Forum for ICT Innovation in Education

منتدى الابتكار التقني في التعليم بمنطقة الشرق الأوسط و شمال أفريقيا ٢٠١٩

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مسقط - سلطنة عُمان ١٦-١٨ سبتمبر ٢٠١٩



ICTs for Delivering the 4th Industrial Revolution in MENA Region

Opening Comments:

Slaheddine Maaref

Senior Advisor

Arab Regional Office

International Telecommunication Union



ITU at a glance

ITU = International Telecommunication Union

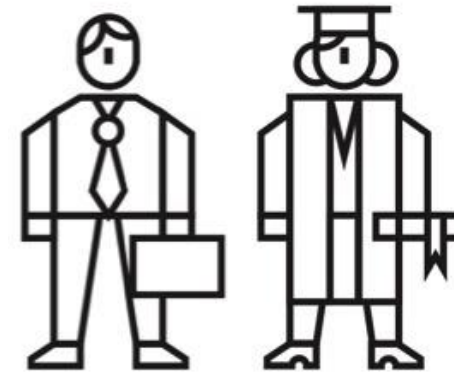
United Nations Specialized Agency for Telecommunications/Information and Communication Technologies (ICTs)

193



MEMBER STATES

900



COMPANIES, UNIVERSITIES, AND INTERNATIONAL & REGIONAL ORGANIZATIONS

3

SECTORS



Standardization

Radiocommunicatio

Development



Each sector has separate mandate, but all work cohesively towards connecting the world



What do you think of when you are told **4IR** ?



Mobile Applications

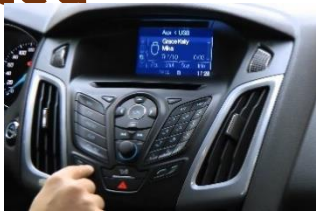


Community & Social Media



Artificial intelligence
Machine Learning

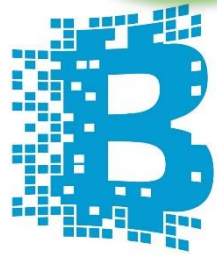
Connected Cars



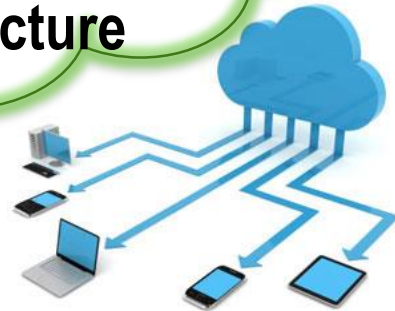
The **4IR** revolution is being built on the shoulders of ICT infrastructure



Internet of Things (IoT)
Web of Objects (WoO)



Blockchain
Digital Finance



Cloud,
Edge computing



Data & Big data analytics

BIG DATA

ICT CONNECTION FOR THE KNOWLEDGE ECONOMY

- ▶ MENA ICT sector expected to grow by more than 10% in next 5 years
- ▶ IoT technologies expected to connect 50 billion devices to the network by end 2020
- ▶ AI-powered technologies deployed on 6 billion smartphones by 2021
- ▶ Especially amongst the young population a growing demand for mobile data and applications
- ▶ How will this growth deliver digital transformation and especially how can it be leveraged to foster a culture of innovation amongst young people?
- ▶ How can the infrastructure and growth in cloud services be leveraged to improve education and create the next generation of MENA tech entrepreneurs?
- ▶ Has 4IR gained enough traction to create the desired knowledge economies in the region?



REGIONAL ICT DATA

200 million MENA internet users spend 6 hours a day online

41% compound growth in cloud traffic to 2019



This represents a 1.8% growth on 2018 with expenditure on ICT for education expected to grow by 2.4%

Is this enough to ensure students to have access to the requisite digital technologies?

Will the regional “Vision” policies see enough investment in ICTs for delivering 4IR and the needed upsurge in entrepreneurs and growth of SMEs?



READY FOR 4IR?

- Investing in digital initiatives
- Ensuring artificial intelligence is trustworthy
- Governments adopting regulatory and policy frameworks
- Investing in cybersecurity to protect privacy and mitigate risk
- Redoubling efforts to fill the skills gap
- Ensure graduates are digitally fit and cultivating technology leaders

Shift in education:
providing the
tools & skills

Better
equipped
learning
facilities

Foundational
learning via
digital
platforms

Interweaving
ICT learning
into all
aspects of the
curricula

Creative &
critical
thinking,
teamwork &
empathy

Continuous
investment in
resources to
teach STEM

TRANSFORMING THE ECOSYSTEM IN MENA REGION



KEY ACTION AREAS:



**FUTURE READY
CURRICULA**



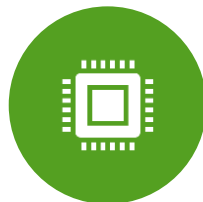
**CONTINUOUS
PROFESSIONAL
DEVELOPMENT**



DIGITAL FLUENCY



**RESKILLING &
LIFELONG LEARNING**



**OPENNESS TO ICT
INNOVATION IN
EDUCATION**



**MULTISTAKEHOLDER
LEADERSHIP &
GOVERNANCE**

Thank you

