



Technology Innovation and Regulatory Environment in the 4th Industrial Revolution Case Study of Korea

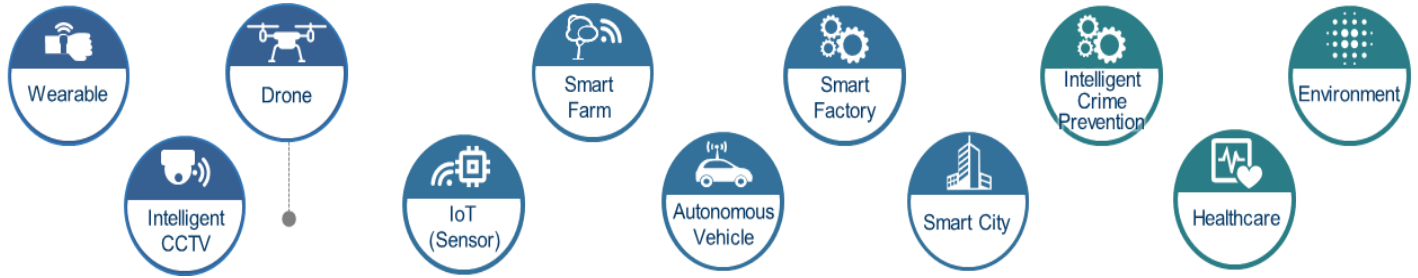
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**Jaebum Lee
ITU TSB**

Hyper-Connectivity infra= D·N·A



Services Business



BIG DATA

DATA

AI

Cloud Computing

Quantum Computing +Block chain

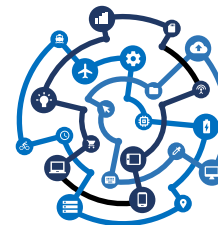


NETWORK

IoT

5G Wireless

10G Wireline



Create values of hyper-connectivity

5G in PyeongChang

CNN tech

2018 Olympics

5G is helping make Pyeongchang the most high-tech Olympics ever

by Michelle Toh @michelletoh235

Winter Olympics: Amazing pictures from the opening ceremony

© 9 February 2018 BBC

Thousands of drones used for light show during Olympics opening ceremony

By JULIA JACOBO · Feb 9, 2018, 11:00 PM ET abc NEWS



5G – Time Slice



5G – Sync View



Hydrogen-based electric self-driving



SK telecom **olleh kt**

U+ **lte™**





Regulatory Ways forward ('18)

- **Presidential Committee for 4th IR** (Sep`17~)
(www.4th-ir.go.kr/) : 26 members (5 Ministers)
- **Regulatory sandbox**
- Positive → **negative** regulations
- Ex-ante → **ex-post** regulations
- **De-identified** private data + **Opt-out**
Private **location** data: **Prior notice + Opt-out**
- **Subsidy** (e.g. new biz → licensed incumbents)

Measures for 4IR



**Services
Business**

**Private sectors +
Deregulations in various fields**

**BIG
DATA**
DATA

AI

Cloud Computing

Quantum Computing
+Block chain

Private sectors
+ deregulate 'private info'
+ introductory gov'n't use



NETWORK

IoT

5G
Wireless

10G
Wireline

Private sectors
+ Spectrum supply
+ share/joint-construct telecom facility

Division of Telecom Regulations

	MSIT	KCC
Ex-ante telecom reg. - Sharing/joint-construct telecom facility, Licensing, interconnection, CPS, network neutrality, Numbering...	O	X
Ex-post telecom reg. - User protection(penalty/injunction) - Private (location) information protection by ICT service providers	X	O
Broadcasting reg.		
- Licensing	X	O
- technical requirements for licensing	O	X
- ex post viewer protection (penalty/injunction)	X	O
Facilitation of deregulation of all sectors in the 4IR	O	X
Spectrum allocation	O	X



THANK YOU