# Digital Divides: The New Challenges and Opportunities of e-Inclusion

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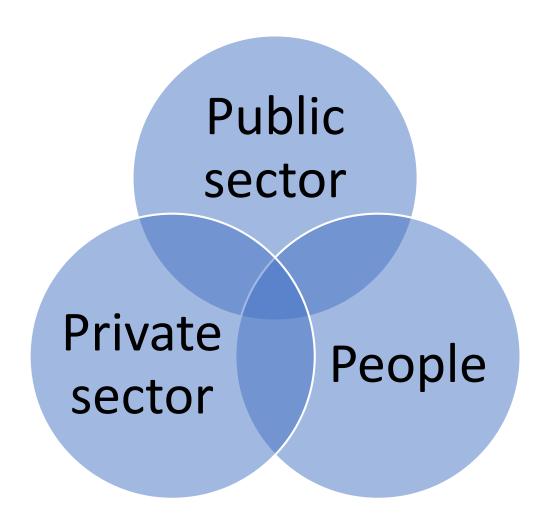


#### Digital development

Digital inclusion trends

Digital measurement

# Mutual benefits to digital development

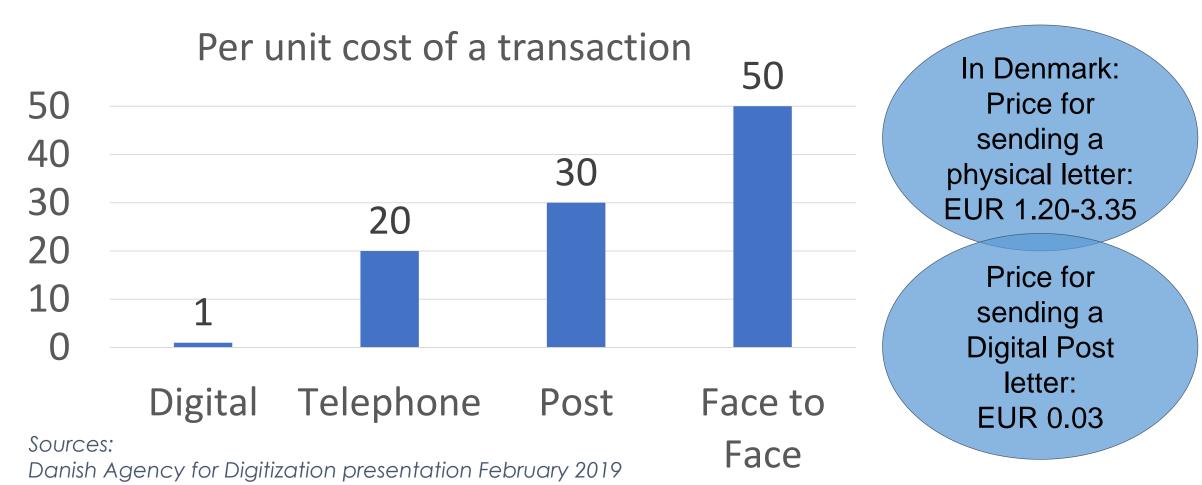


# Benefits of people digital development

- 1990: the American tax authority, the IRS, received 4m online tax filings (the first year such service was available)
- ■2000: the number rose to 35m
- 2010: online tax filings surpassed 100m
- ■2017: 127m (out of 145m) filed electronically

Source: IRS

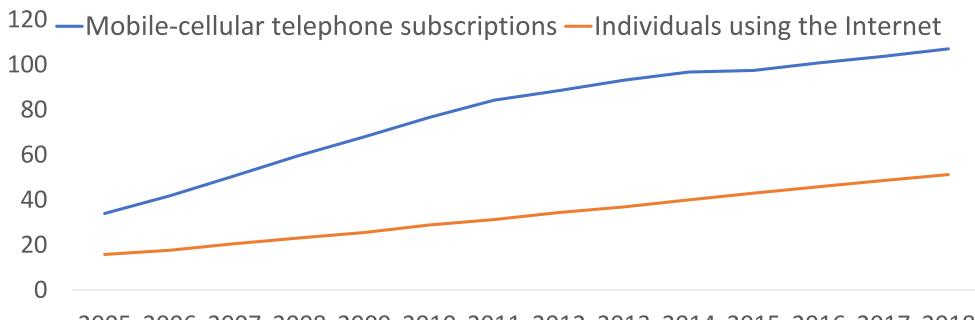
# Benefits of public sector digital development



https://www.gov.uk/government/publications/digital-efficiency-report/digital-efficiency-report#introduction

# Benefits of private sector digital development

#### Global ICT developments, 2005 - 2018\*



Value of e-commerce in 2017:
US\$29trn

2005 2006 2007 2008 2009 2010 2011 2012 2013 2014 2015 2016 2017 2018

#### Sources:

https://www.itu.int/en/ITU-D/Statistics/Pages/stat/default.aspx
https://unctad.org/en/Pages/PressRelease.aspx?OriginalVersionID=505

Digital development

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# Digital divides, a selection

- Access
- Age
- Bandwidth
- Content
- Disability
- Education
- Gender

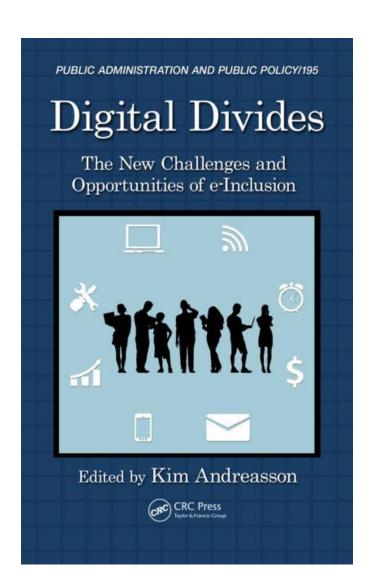
- Immigration
- Income
- Location
- Measurement
- Mobile
- Speed
- Useful usage

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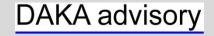
Source:

Digital Divides: The New Challenges and Opportunities of e-Inclusion, edited by Kim Andreasson

# From Digital Divides to e-Inclusion initiatives



- There are a number of different digital divides
- There is often a gap between the between the availability (supply) and use of important services (demand)
- Challenges to digital inclusion vary around the world
- Countries tackle barriers both similarly and differently



# Singapore

Digital access

Digital literacy

Digital participation



#### Sweden

 Digital strategy encompasses five areas

 Swedes and the Internet track progress

A focus on web accessibility



#### South Korea

Digital infrastructure leader

Global e-government leader

Gap in supply and demand

#### Vietnam

World Bank
 Digital Economy assessment shows strong leadership

Track local digital development across agencies

New cyber security law

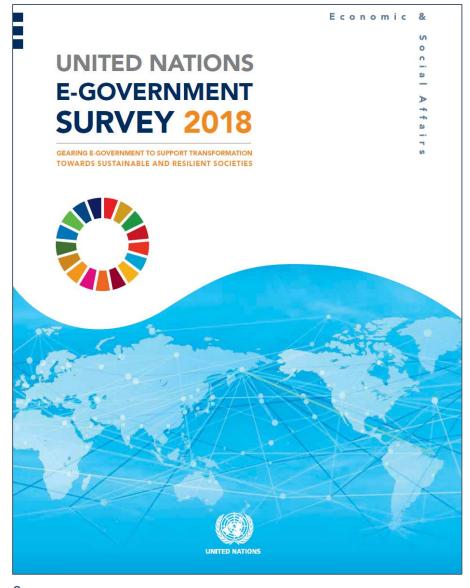
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### UN e-government survey

- Measures "the willingness and capacity of countries to use online and mobile technology in the execution of government functions" (UN 2010)
- In 2018, Denmark is number one; Singapore is number seven
- Notes that social and digital exclusion are interlinked



# Barriers towards digital inclusion

- Affordability was the biggest barrier, followed by the lack of ability/skills to use ICT, according to a survey from The Economist Intelligence Unit
- Policy-makers were twice as likely as telecoms executives to cite the lack of ability/skills while the roles were reversed in terms of the urban/rural divide and speed challenges
- A majority of survey takers pointed out that regulation is a benefit rather than a burden when it comes to digital inclusion

Source:

https://eiuperspectives.economist.com/technology-innovation/redefining-digital-divide



- Global coverage
- Measures availability, affordability, relevance, and readiness
- In 2018, Sweden was number one, followed by Singapore

Source:

https://theinclusiveinternet.eiu.com/

Digital development

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# Technology trends and digital inclusion

- AI
- AR/VR
- Big data
- Cloud computing
- Cyber security
- Smart cities
- Sustainable Development Goals (SDGs)

#### Ways forward

 There is a need to redefine digital inclusion to tackle the wide variety of divides that underpin digital exclusion

• The public, private, and people sectors must come together

• The ability and motivation to use the Internet is a key factor

Need to track progress



