



Digitalisation for Development: reducing inequalities through technology

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Impact of digital technologies for economic development, in particular in peripheral areas

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EIB approach to financing digital sector

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Conclusions

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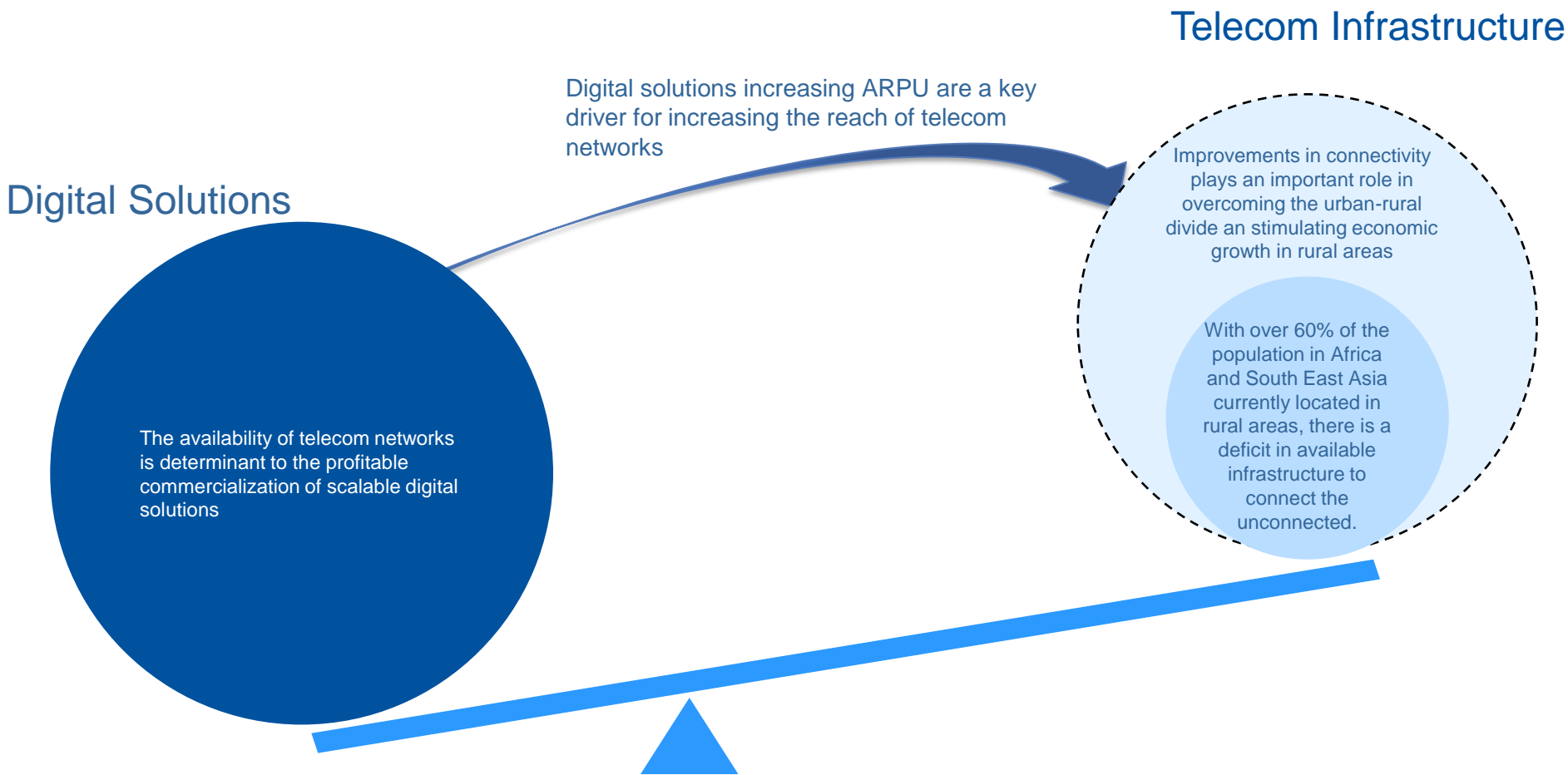
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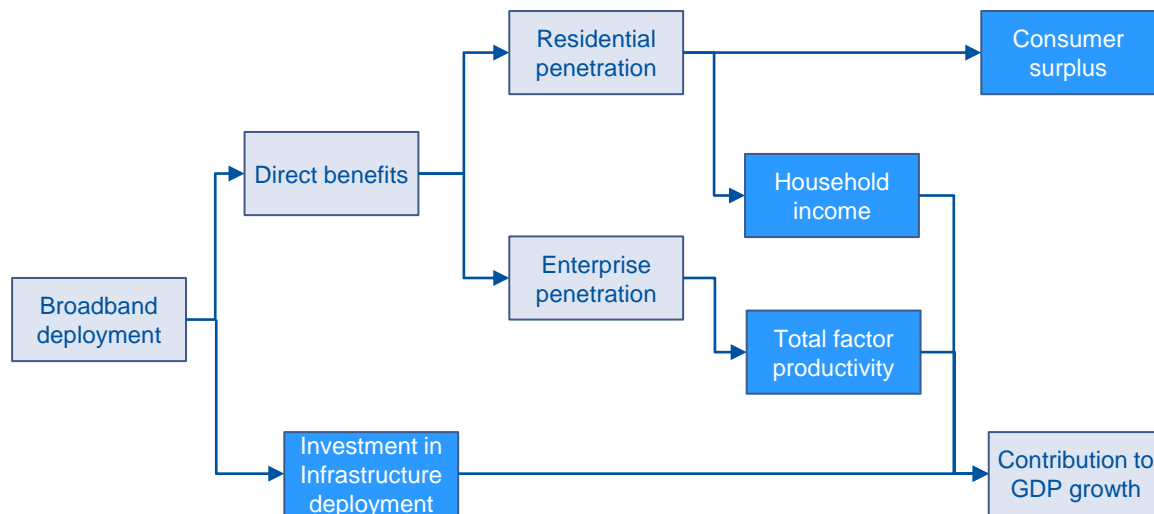
Positive externalities of telecom infrastructures: better communication provide underserved communities with digital solutions, wider markets and a variety of employment opportunities



Infrastructure: The economic impact of broadband

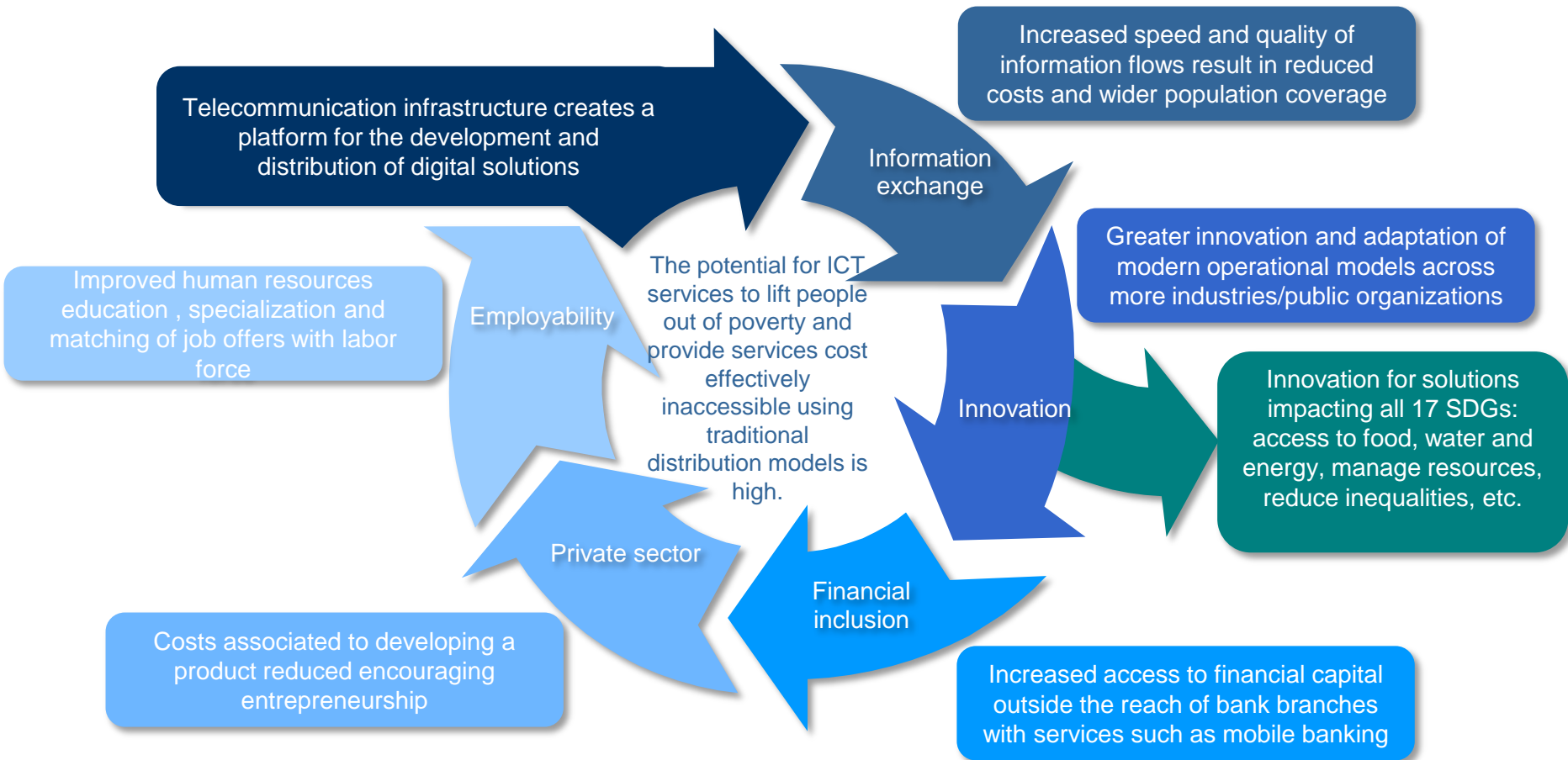
Key economic impacts

1. The construction of broadband networks: the deployment of broadband networks creates jobs and acts over the economy by means of multipliers.
2. The adoption of broadband within firms leads to a multifactor productivity gain, which in turn contributes to growth of GDP.
3. On the other hand, residential adoption drives an increase in household real income as a function of a multiplier.
4. Residential users receive a benefit in terms of consumer surplus, defined as the difference between what they would be willing to pay for broadband service and its price. This last parameter represents benefits in terms of enhanced access to information, entertainment and public services.



Impact: the case of SSA

- ICTs directly contribute around 7 per cent of Africa's GDP, which is higher than the global average.
- The ICT sector has been the major economic driver in Sub-Saharan Africa over the past decade, witnessing an annual compounded growth rate of 40%; and, although mobile and Internet penetration remains relatively low in Africa
- In Africa, mobile phones are also substitutes for many other types of service that were not available: financial credit, newspapers, games and entertainment.
- The development of mobile broadband with smartphones and affordable tablets across Africa will bring even greater social and economic impacts over the next decade.





Source: ITU, 2017

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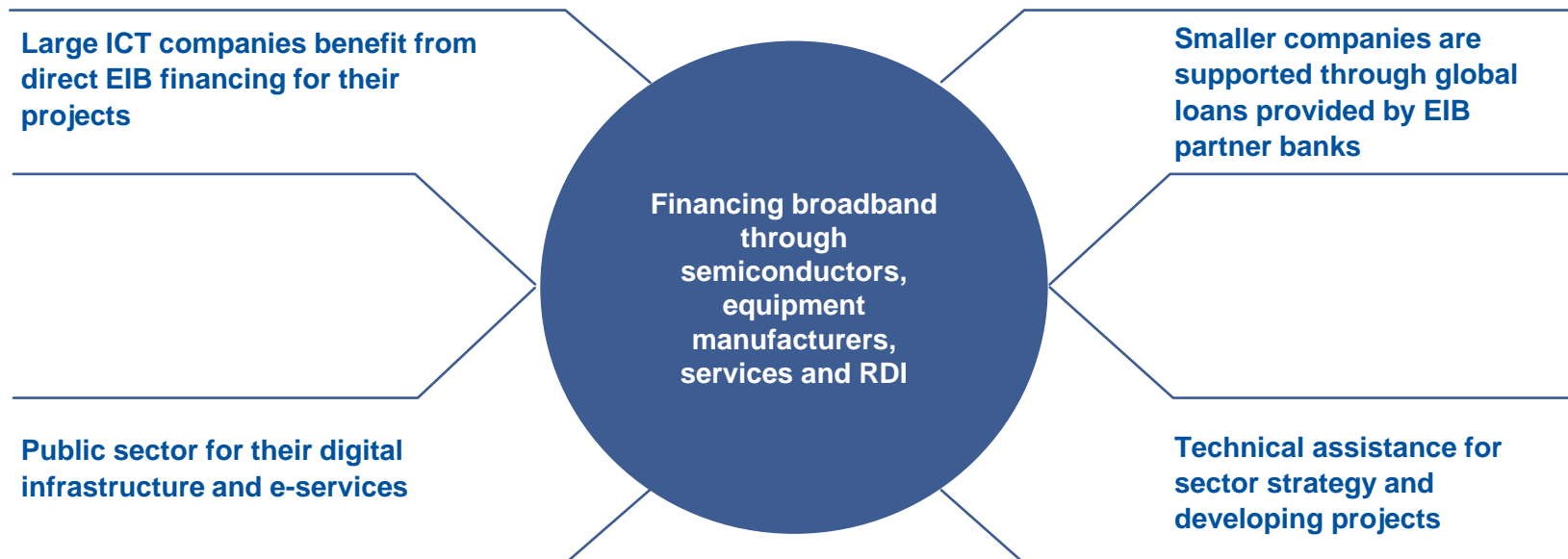
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EIB addresses the whole spectrum of digital investments in tangible and intangible assets as well as investments in ICT RDI through the Bank's various products.



Impact

- Create jobs, both in the digital domain as well as in other sectors profiting from digital input;
- Remove obstacles and improve accountability of institutions and public services by establishing e-governance systems and solutions;
- Increase proportion of population with access to affordable broadband connectivity, reducing the existing digital divide.

Additionality

- Potential to mobilise the private sector, both locally and internationally;
- Sustainability: the digital market is among the most sustainable with fast returns on investment, but one of the most risky, especially in the case of start-ups;
- Contribution to the EU's Digital4 Development policy objectives as regards to promoting affordable connectivity, digital skills, digital entrepreneurship, job creation and use of digital tools and services as an enabler in other sectors.

Risk

Risks to be mitigated may include:

- Commercial risks (repayment risk, performance risk, etc.)
- Political and country risk
- Legal and regulatory risk
- Currency risks (e.g. exchange rate fluctuation, convertibility, transferability, etc. through local currency financing)
- Climate change and environmental risks
- Sustainability: one of the most risky, especially in the case of start-up
- Often very time consuming small amount transactions which require advisory services

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Sample of digital projects financed by EIB



EUR 100m

Tunisia Telecom
(Tunisia)
Signed in 2016

- Roll-out of mobile next generation access networks, including the related investments in the backbone network and IT systems.
- 1 500 4G stations across the nation, and laying 2 000 km of fibre optic cable.



EUR 11m
TLcom
(Africa)

Signed in 2016

- Participation in TLcom TIDE Africa Fund, regional venture capital fund focusing on innovative technology-based African SMEs, across all stages of the venture capital cycle.
- Investments from early to growth stage in the USD 500k to USD10m range.



USD 27m

Rural mobile
(Cameroon &
RDC)
Signed in 2016

- By the end of 2018, the two networks are planned to provide coverage to over 3.6 m people based on 650 sites.
- The project will extend mobile telecommunication network population coverages from 75% to 80% in the DRC and from 85% to 95% in Cameroon.



EUR 20m
FTTH
(Angola)

Signed in 2015

- An incremental 83 300 new sites (businesses, institutions and homes) will be passed with Ultra High Speed Broadband access.
- The project will develop advanced telecommunications services and have various social benefits (health, education, administration, ministries and also associations and NGO's).



EUR 8m

Submarine
cable
(Seychelles)
Signed in 2010

- Connection of Mauritania to ACE (Africa Coast to Europe), a new fibre optic submarine cable that is planned to connect about 20 countries along the Western Coast of Africa and Europe.



EUR 8m
FTTH
(Sint Maarten)

Signed in 2016

- Based on this network, the promoter will be able to provide triple play (voice, internet, TV) services to around 14 500 homes.
- The project will take place from 2016 to the end of 2021.

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- 1 Economic Development** → Digital technologies can be a very powerful means to combat poverty and promote economic development
- 2 Infrastructure** → Infrastructure investment is key to ensure widespread access and for the development of appropriate digital solution in the private and public sector
- 3 Profitability** → A substantial part of the investments have insufficient financial profitability for market oriented investors, especially in non-urban areas
- 4 Public intervention** → Market forces may be too slow for socially optimal speed of adoption of digital technologies requiring public intervention
- 5 Financial instruments** → Role of support to financial instruments in redressing certain incentives for long term investments. Scope for developing new instruments for aggregation (e.g. dedicated fund)
- 6 Technical Assistance** → Need for technical assistance to generate projects that are capable to be financed in the most efficient way by broad range of financial instruments

— **THANK YOU** —