

Internet for Education

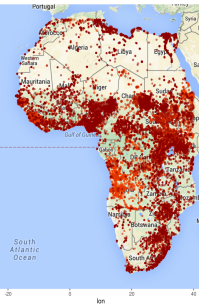
**Helping Policy Makers to Meet
the
Global Education Agenda (SDG4)**

Content

- Why the Internet is important for education?
- What is going on around the Internet and education?
- How can policy makers and other stakeholders lift the barriers of integrating the ICTs in education?

Challenges to Education in Africa

- **Access to schools** – In Burkina Faso, Chad, Congo, Mali and Niger have average class sizes with over 50 students per class?
- **Long distance to school** - walk to school of up to two hours is not uncommon.
- **Nutrition** - Children often cannot follow lessons because they did not have a meal that day.
- **Expense of schooling** - school fees, uniforms and supplies are burdens to families, with negative impact on education.
- **Conflicts** - armed conflict, both across and within national borders, with devastating impacts on the livelihoods and education of millions of children and adults.
- **Gender disparity** –million girls are out of school. In SSA, 9.3 million of which will never set foot in a classroom.



Challenges to Education in Africa

- **Exclusion due to disability** - a large proportion of the world's 93 million children with disabilities live in Africa, often without the prospect of learning.
- **Quality and quantity of teachers** - more than 7 out of 10 of SSA countries do not have enough teachers, especially in Maths, science and foreign languages.
- **Teaching and learning materials** – worn books shared among students are not uncommon.
- **Access to vocational education and technical training** – 37 million out of school youth require some form of technical and vocational education for employment.
- **Access to tertiary education** - Only 6 percent go to higher education compared to the global average of 26 percent.



SDG Goal 4 Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all

• Vision and Principles

- A single universal agenda:
Education 2030 = SDG 4
- Comprehensive, holistic, ambitious, aspirational and universal
- Transformative, leaving no one behind
- Lifelong learning approach focusing on skills for work and life
- **Focus on quality and learning outcomes**

Targets

- 4.1 Quality primary & secondary education
- 4.2 Early childhood & pre-primary education
- 4.3 Equal access to TVET & higher education
- 4.4 Relevant skills for work
- 4.5 Gender equality & equal access for all
- 4.6 Youth and adult literacy
- 4.7 Global Citizenship Education
- 4.a Learning environments
- 4.b Scholarships for higher education
- 4.c Teachers capacity and capability

Why the ICT/Internet?

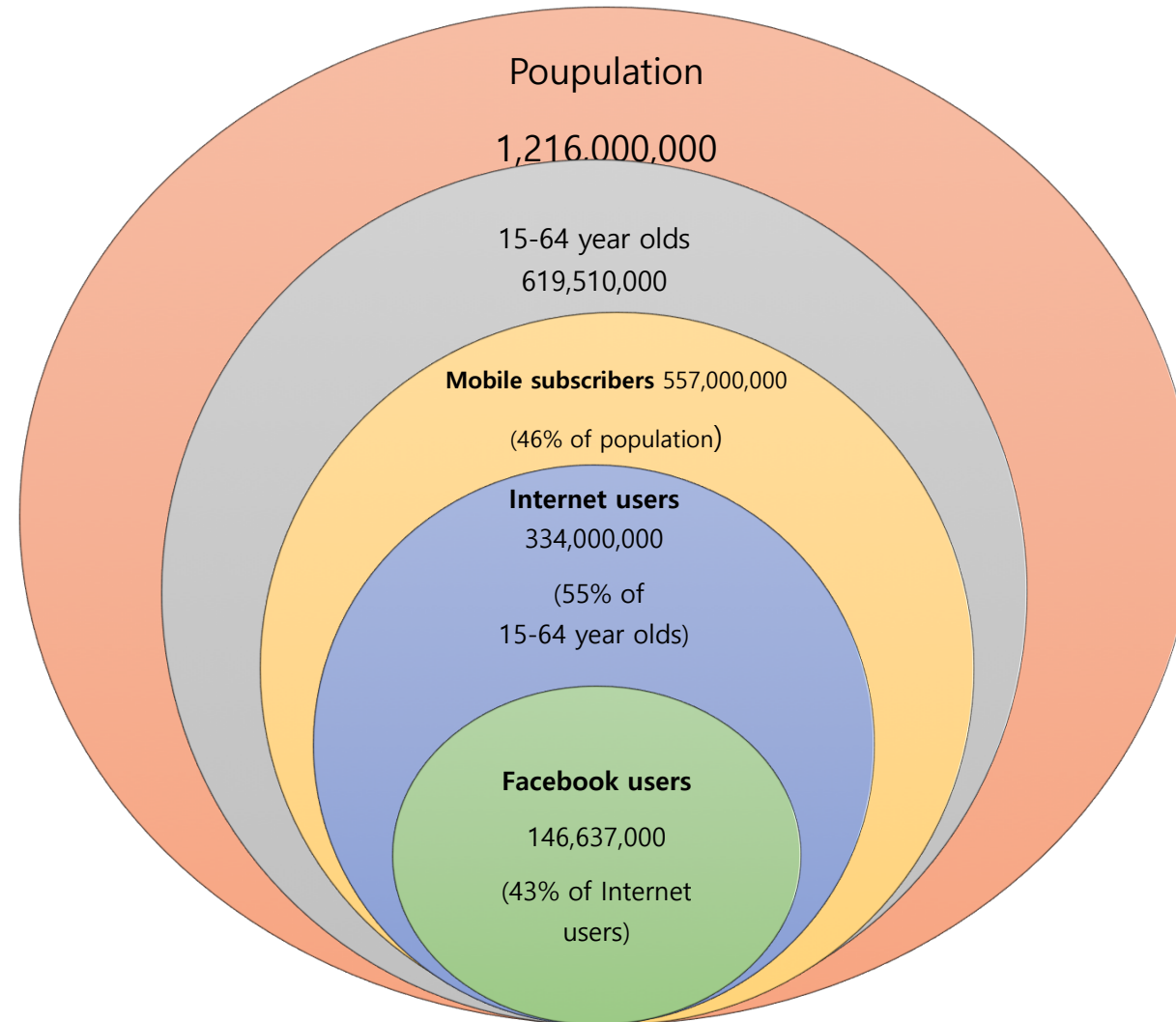
- Quality education requires diverse way of learning...
- Education budget is about 5 % of the GDP in Africa - North America and Europe at 5.3 %,
- Life long learning opportunities to those traditionally underserved or marginalized groups (i.e. girls and special needs)
- Access to learning resources, like textbooks, at a lower cost
- Gamified learning for early childhood learning is possible

Internet opportunities

- MOOCs and OERs providing access to latest insights
- Continuous learning for teachers, increasing productivity and teaching efficiency
- Research and Education Networks promote collaboration, access to knowledge, labs and instruments

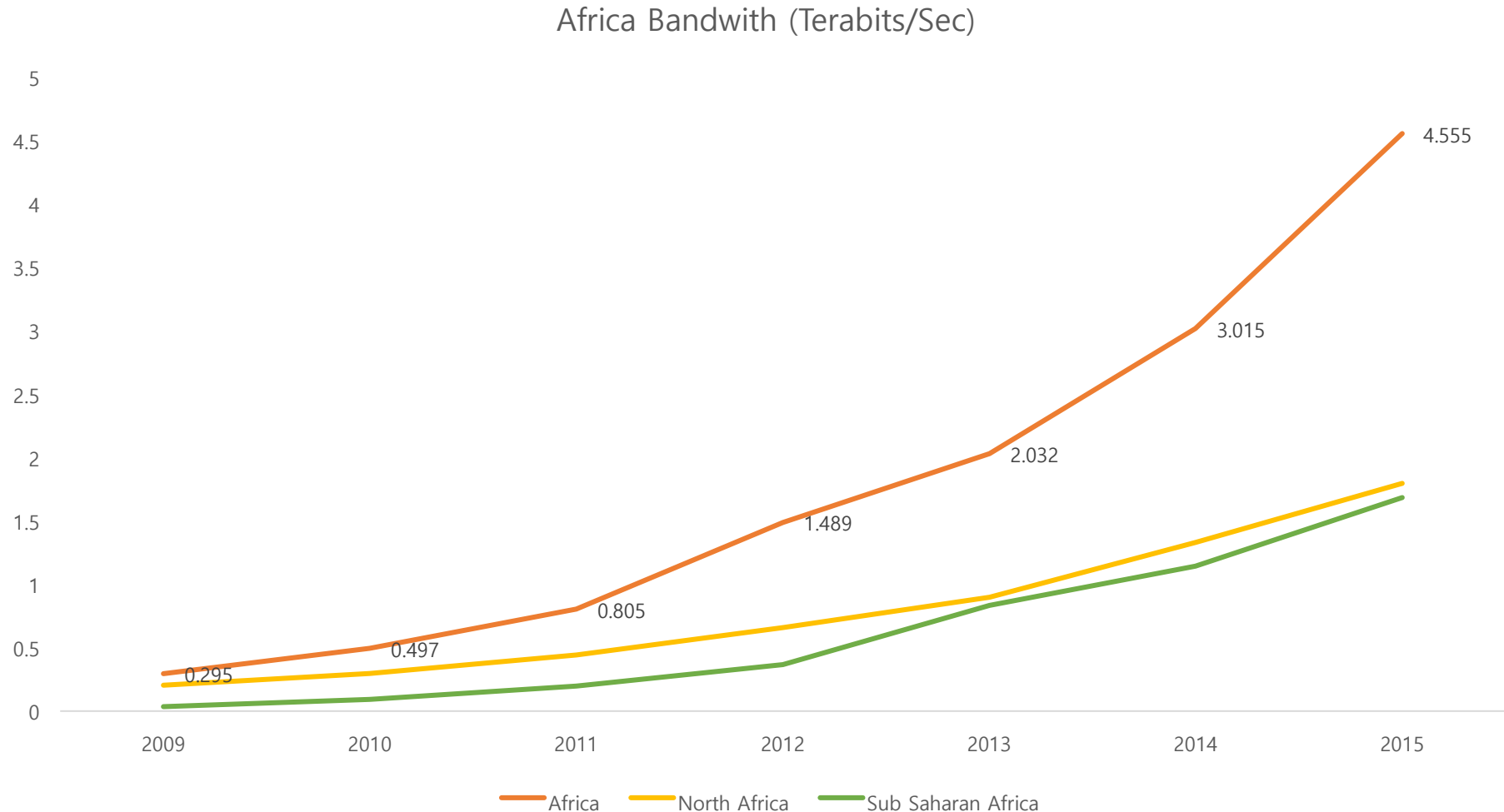
Information and Communication Environment

- 7,502,998,490 World Population
- 3,625,590,413 Internet users
- 1,241,742,891 Population of Africa
- **345,676,501, Africa Internet users**



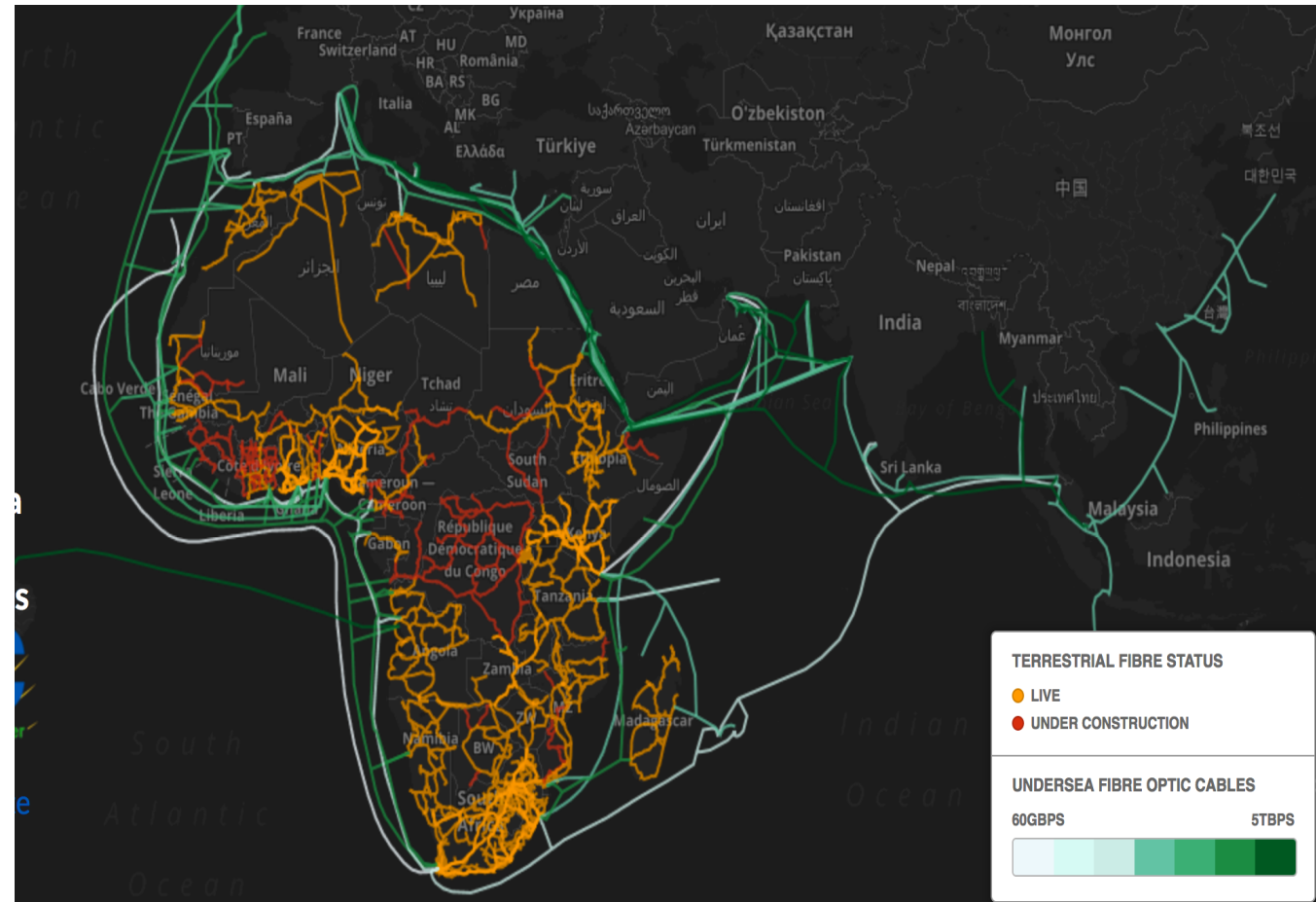
<http://www.worldometers.info/world-population/>

Bandwidth is growing, in some cases limited use of existing bandwidth

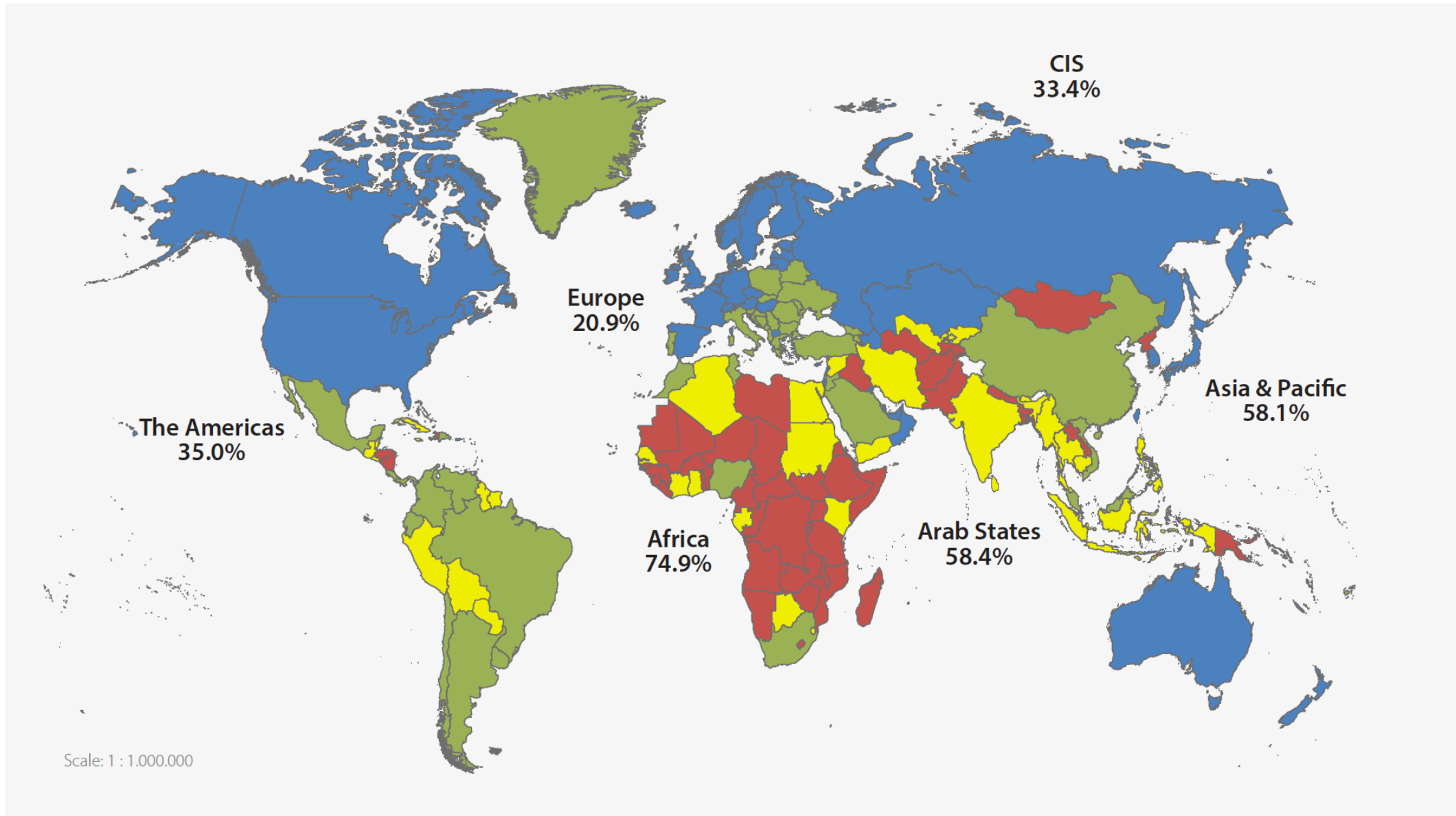


In Gambia, only 5% of available Submarine capacity Is used

In other cases, regional and local connectivity as a bottleneck - A third of population is not within the reach of fiber or wireless



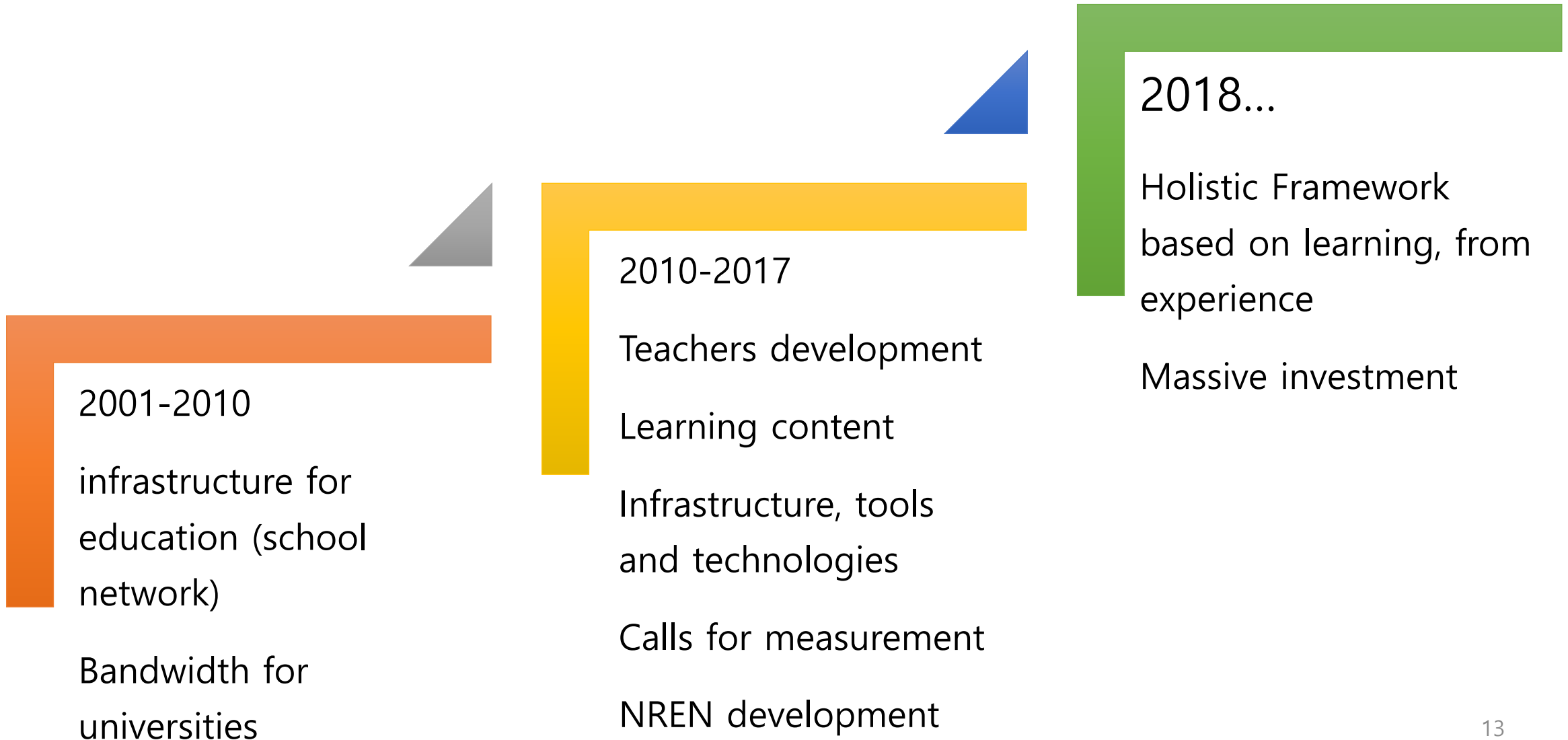
Access is not equitably distributed (ITU, 2016)

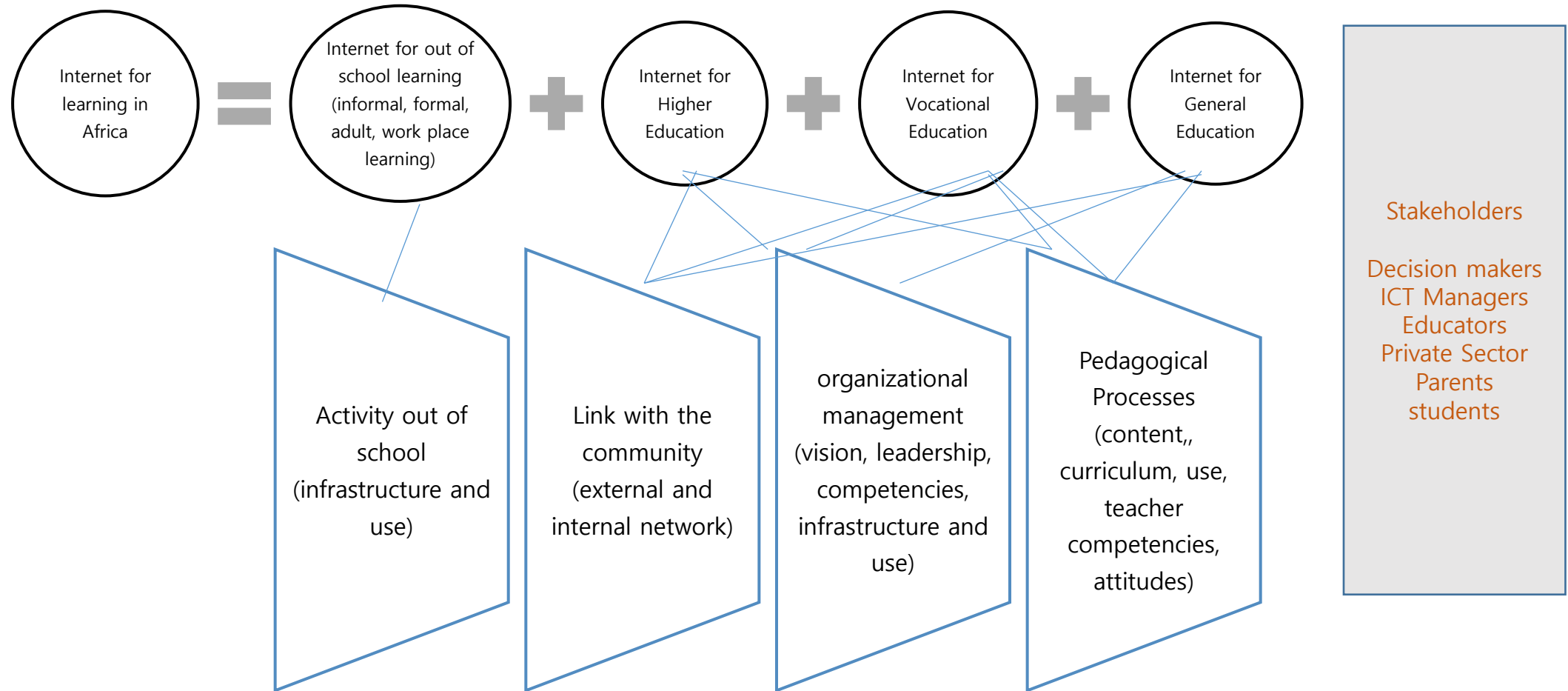


More challenges

- Limited broadband connectivity in rural areas and/or cost is high due to market structure, taxes, etc.
- Absence or limited educational content relevant local levels
- Lack of infrastructure to host and exchange locally available content
- Limited literacy and skills to develop and implement ICT projects
- Inadequate supportive infrastructure such as electricity
- Financial constraint

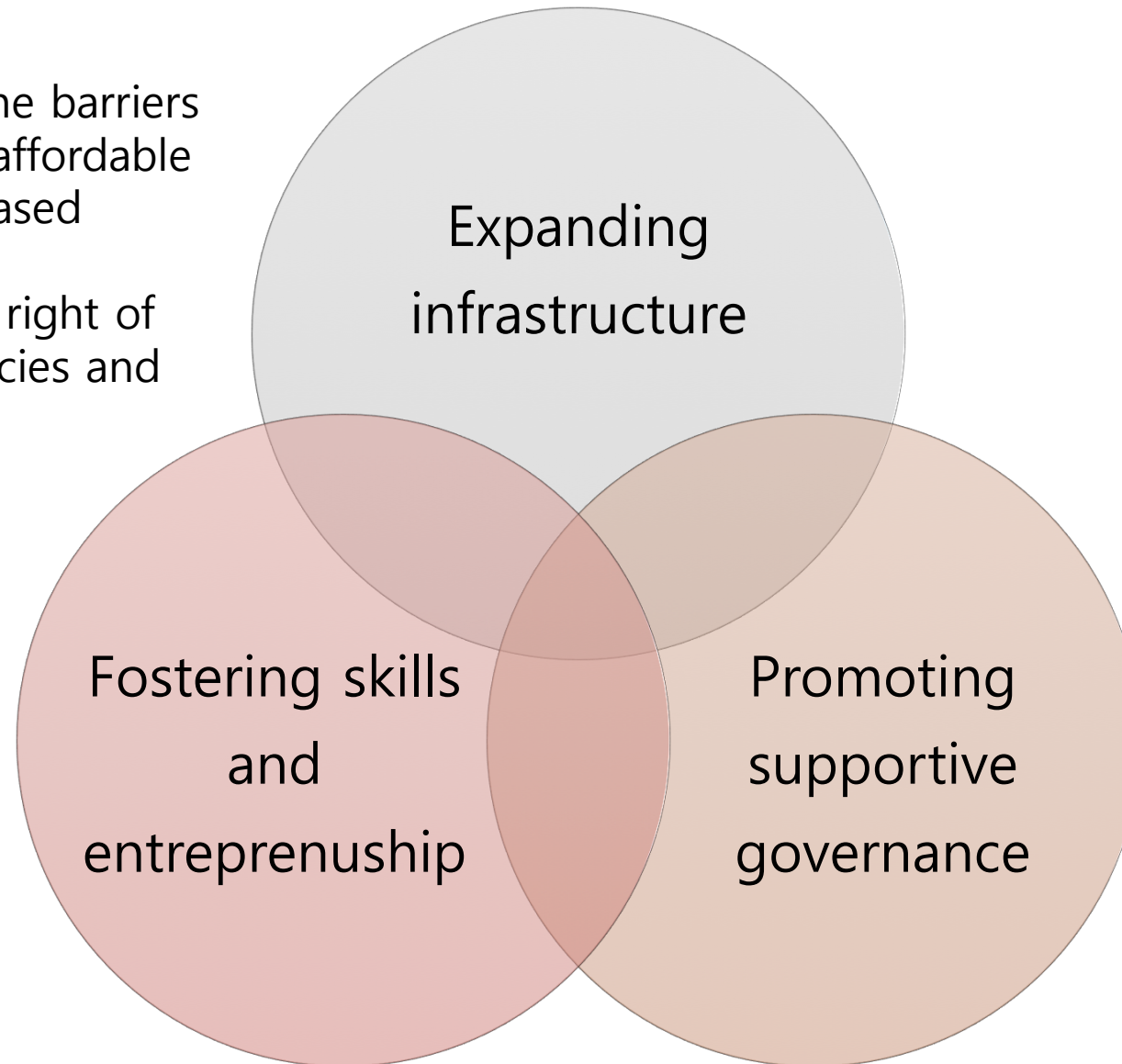
Trends in ICT integration in Education





ISOC Enabling Policy Framework

Policy makers need to remove the barriers to investment -transparent and affordable licensing, and efficient market-based spectrum allocation processes., infrastructure sharing, simplified right of way approval, and dig-once policies and processes



support human capacity development at all levels, facilitate local innovations and promote community-driven peering interconnection and IXP discussions

develop well-articulated policies and plans, and ensure that these are implemented through multi-stakeholder partnerships.

Articulation of an Education Policy Framework

- Infrastructure
- Teachers professional development
- Capacity building for decision makers, college and school leaders
- Learning resources, content and applications
- Technical vocational education, skills and youth employment
- Stimulation of national research and education networks
- Equity and inclusion
- Safety, privacy and child protection in online environments
- Data collection (EMIS), social media
- **Monitoring, evaluation, research and learning**

Investment in Education

- Universal service funds were used to connect schools – Uganda, Sudan
- Special rate for education (e-rate), was used in the US, Morocco, Portugal, Colombia and Turkey
- Corporate social responsibility from the private sector in the Philippines
- Small steps by everyone with long term impact (Rwanda)



Thank you