



Fixed and Mobile broadband adoption rates in the next decade



Changes in Fixed-Broadband penetration 2014-25

Changes in Mobile-Broadband penetration 2014-25



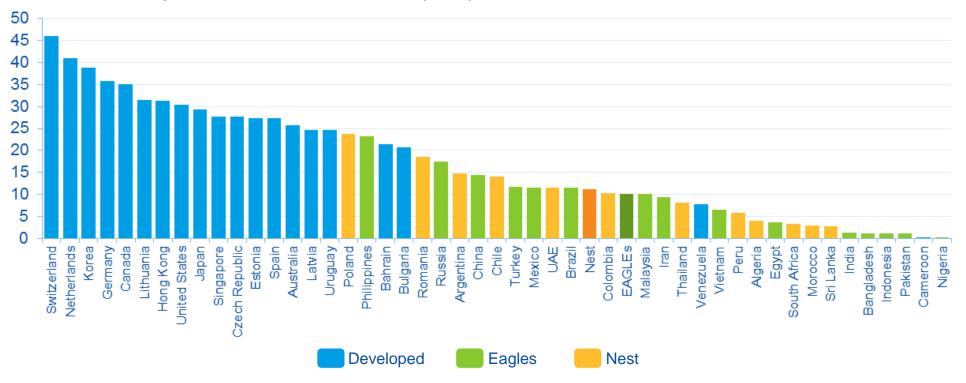
Indonesia, India, Pakistan and Paraguay will increase the most in fixed-broadband technology. In the mobile-broadband case will be Belgium, Malaysia, Spain and Chile.



Current levels of fixed-broadband adoption rates across the world



Fixed broadband penetration rate in the World (2014)*

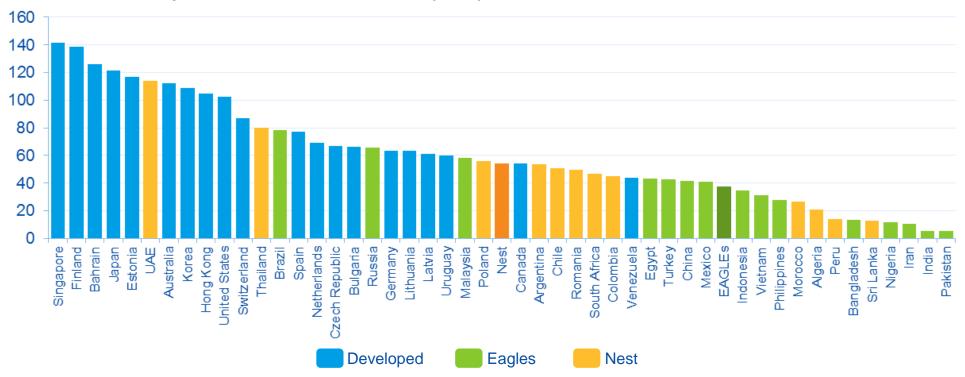


EAGLEs and Nest have currently a medium-low level of broadband penetration. EM Asia countries are particularly lagging behind, but they also have a large potential for future growth.



Current levels of mobile-broadband adoption rates across the world

Mobile broadband penetration rate in the World (2014)*



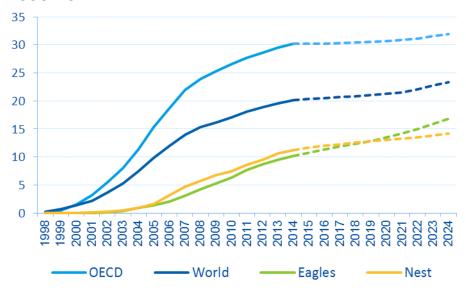
Some Nest countries have penetration levels comparable to the most advanced economies. EAGLES countries are much less advanced than Nest ones. Again, the potential for growth is quite large in EM Asia.



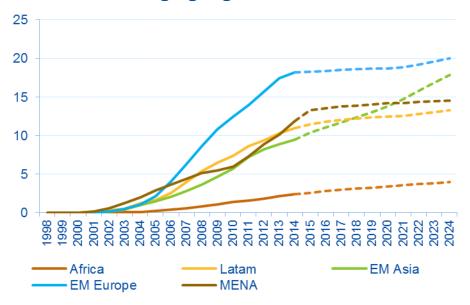
Fixed-broadband adoption rates across regions: Past and future evolution



Evolution of Fixed-Broadband penetration 1998-2024



Evolution of Fixed-Broadband penetration 1998-2024. Emerging regions.



Fixed-broadband adoption is in most regions close to its saturation level. EAGLEs countries will be the ones converging faster to the most developed nations, thanks mostly to the growth in EM Asia. The gap between DMs and EMs will remain.

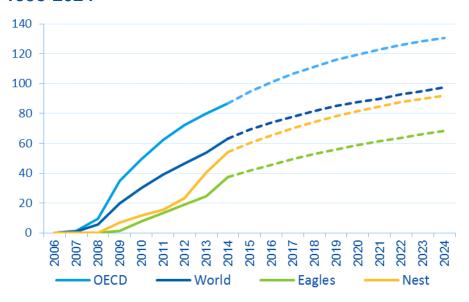
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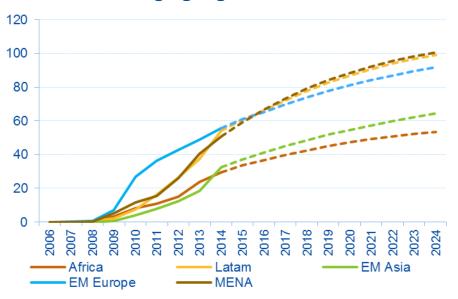
Mobile broadband adoption rates across regions: Past and future evolution



Evolution of Mobile-Broadband penetration 1998-2024



Evolution of Mobile-Broadband penetration 1998-2024. Emerging regions



Mobile adoption rates will change largely in the next decade because globally the mobile adoption process is in a much earlier phase that in the fixed-broadband case. Nest countries will keep on growing faster than EAGLEs. LatAm countries will perform remarkably well.

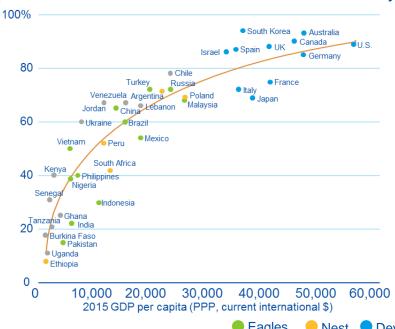




The impact of digital economy on growth

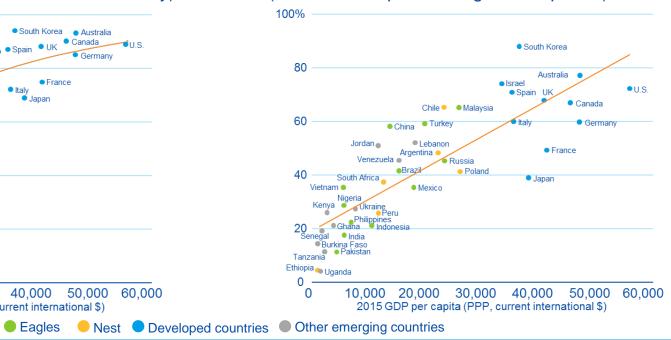
Relationship between per capita income and internet access 2015

(Adults who use the internet at least occasionally)



Relationship between per capita income and Smartphone ownership in 2015

(Adults who report owning a smartphone)



There is a strong correlation between country wealth (measured by GDP per capita PPP) and internet access, as well as with the smartphone ownership

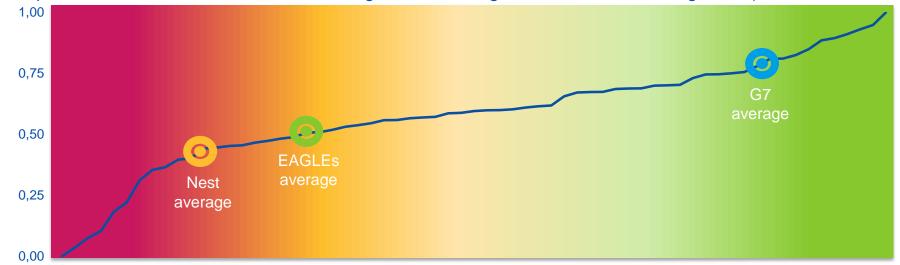




Macro perspective: Digitalization Index 2015

Cross country picture: Digitalization Index in 2015

(Composite index: ICT infrastructure, ICT usage, ICT cost, digital content, and ICT regulation)



Algeria Vietnam Qatar Peru **Nigeria Argentina Pakistan Egypt Bangladesh** Ukraine **Paraguay** Greece India **Philippines** Venezuela Indonesia

Morocco China **Thailand** Saudi Arabia Mexico Croatia Sri Lanka Colombia Italy Slovenia **Poland** Kazakhstan Bulgaria **Russian Federation** Cyprus **Slovak Republic**

Hungary Ireland **Turkey** Chile Romania **United Arab Emirates** Uruguay **Belgium** Luxembourg **Spain** Brazil **Singapore** Czech Rep. **Austria** South Africa **Portugal**

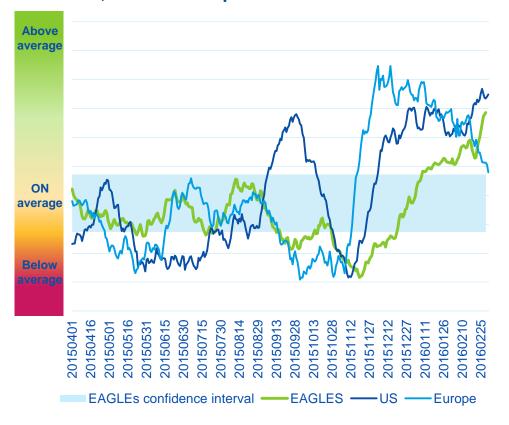
Germany Sweden Malaysia **Netherlands Finland Denmark** Latvia Lithuania Korea, Rep. Canada **Australia** Japan France **Estonia United States Hong Kong SAR United Kingdom**



EAGLEs Media Sentiment Digital Index: Significant improvement since late 2015...



Media sentiment digital index for EAGLEs countries, US and Europe 2015-16



The indices capture the average tone of digital related issues on the media on a daily basis

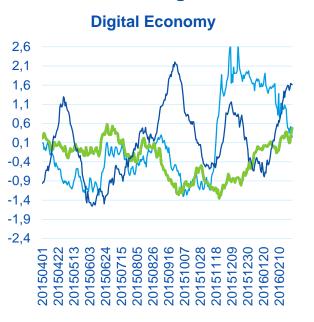
The sentiment about digital related topics in the media in the EAGLEs countries has improved significantly since November 2015, although at a slower pace than Europe and US countries and overtaking the G7 average since the beginning of 2016

The indices are composed by three main components: digital economy, digital banking transformation (fintech) and digital regulation

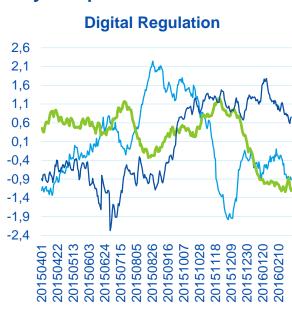


...mainly led by the banking digital transformation with regulation dragging potential

Media sentiment digital index for EAGLEs countries, US and Europe 2015-16 by components*







^{*} The digital economy component collects the news' average tone in the media for the EAGLEs countries about topics related to the use of digital technologies in business, economic and social activities, digital infrastructures and digital innovation. The digital banking transformation (fintech) component includes news' coverage about topics related to the technological innovation in the financial sector and the digital regulation component comprises topics in the media related to regulatory policies on information and communication technologies, internet and data control.

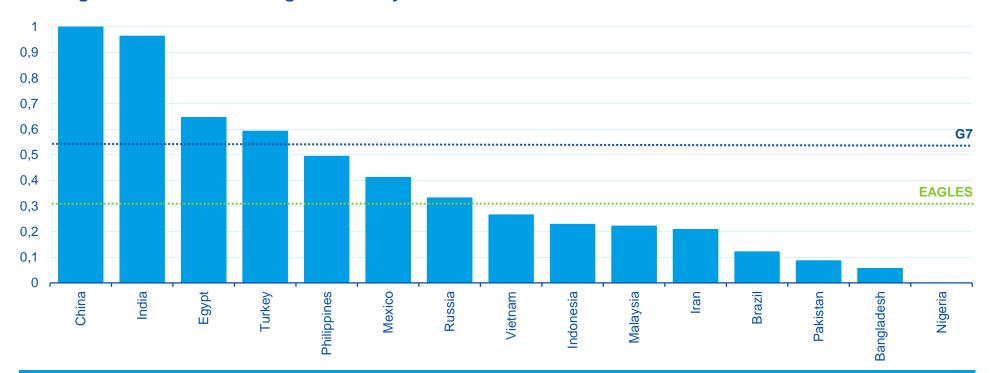
The improvement in the EAGLEs media sentiment index was mainly due to the **better performance in the Fintech digital economy components** since last semester, respectively. On the contrary, **the digital regulation component recorded a sharp decline since late 2015**, attenuating the rise on the synthetic index.



EAGLEs Media Sentiment Digital Index ranking 2016



Ranking of Media sentiment digital index by EAGLEs countries



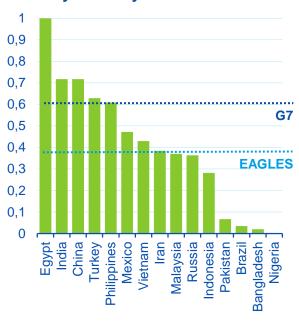
China leads the group as the better valuated country in the EAGLEs according to the media, followed by India, Egypt and Turkey, all of them outperforming the G7 average. On the other hand, Nigeria, Bangladesh and Pakistan rank as the worst performers in the EAGLEs group respectively



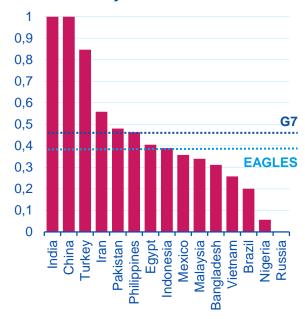
EAGLEs Media Sentiment Digital Index ranking 2016



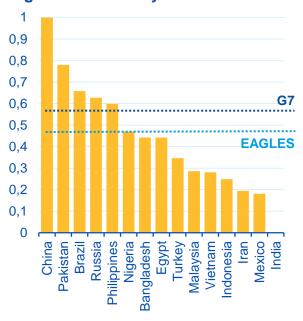
Ranking of Media sentiment digital economy index by EAGLEs countries



Ranking of Media sentiment digital fintech index by EAGLEs countries



Ranking of Media sentiment digital regulation index by EAGLEs countries



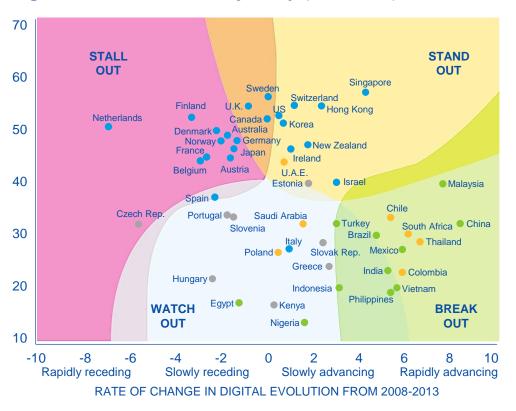
Considering the **digital economy component**, **Egypt comes to the top** of the ranking, followed by India, China and Turkey. According to **the fintech component**, **India is the better valuated**, followed by China, Turkey and Iran. Finally, taking into account the **digital regulation component**, **China records the best performance**, followed by Pakistan and Brazil, Russia and Philippines



In line with the EAGLEs digital performance in the last years



Digital evolution index trajectory (out of 100)



EaglesNestDeveloped countriesOther emerging countries

Source: BBVA Research and Digital Evolution Index (the Fletcher school at TUFTS University) See the annex for further information about the Digital Evolution Index.

The digital evolution index points the EAGLEs and Nest group as countries with a strong potential to foster its digital development process in the coming years

China, India, Mexico, Turkey,
Philippines and Vietnam evolved rapidly
in digital terms during last years with the
potential to emerge as strong digital
economies if their evolution rates continue

Challenges in the medium term lie in improving supply infrastructure and in nurturing sophisticated domestic consumers, favored by the middle classes revolution