Connectivity for the new normal

July 2020





Key takeaways

- After 25 years, 40% of Filipinos, 52% of schools, and 57% of households do not have Internet access.
- New entrants and competition are hindered by outdated policies and regulations.
- Policy reform can usher in new investors to dramatically increase Internet connectivity:
 - "Open Access in Data Transmission Act"

Economic growth & higher income

Increasing broadband penetration



1.35% to 1.38% of GDP in developing countries

Qiang & Kimura (2009); Scott (2012)

Mobile broadband adoption



0.61% of Philippines' GDP

given accelerated penetration since 2005

Katz & Koutroumpis (2012)

3 Introducing 0.5 Mbps +

1 US\$800

increased annual HH income

in LDCs, like Brazil, India, and China

Ericsson (2013)

Competitive industries & citizens





Companies
unable to
properly
embrace digital
technologies
lost 15% in
foregone annual
revenue.





The Philippines' competitiveness declined amid lower rankings in the ICT adoption & macroeconomic stability pillars.





not improve.

Efficient Government



Make use of the computer. I do not want to see people lining up under the heat of the sun. I do not want people lining up under the rain.

President Duterte, 2016 SONA

Cost of Administering a Single Government Transaction

by Channel, in selected countries (in US\$)

Channel	UK	Norway	Australia	Mexico
in-person	15.32	14.01	19.01	9.01
Telephone	5.80	7.01	7.66	2.30
Digital	0.44	0.53	0.46	0.45

Source:

Paraja et al. (2017), based on Kernaghan (2012), Local Government Association (2014), Deloitte Access Economics (2015), and Presidency of the Republic of Mexico (2014).

Pandemic and connectivity

The new normal is digital.

Those who are not connected are less likely to survive.

Are we ready?



1. Work from home

 Telecommuting among Filipinos is low due to inadequacy of necessary infrastructure, particularly the Internet – DOLE



2. Online learning

- 52% of 47,013 public schools not connected
- 80% of State Universities and Colleges <u>not</u> <u>equipped</u> for online classes

Are we ready?



3. Online shopping

- PHL share only 0.5% of \$35-B ASEAN-6 ecommerce retail market in 2015
- Online transport and food delivery market in PH at \$500M in 2018, to become \$3B in 2025

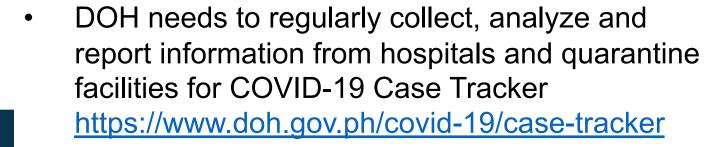


4. Financial inclusion

- E-payment use in PH still very low
 - < 5% of Filipinos regularly make digital payments
 </p>
 - NCR (49%), Luzon (28%), Min (13%), Vis (9%)

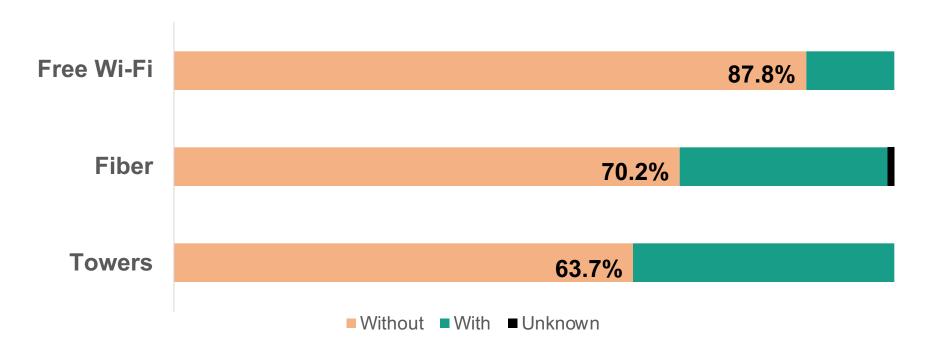
Are we ready?





- DILG instructed city and municipal governments to submit barangay-level data on COVID-19 daily through https://endcov.ph/dashboard/
- Mobile apps can fast-track contact tracing and help quickly isolate those infected

Barangay access to ICT infrastructure



Top regions w/ highest percentage of barangays without access:

Telecommunications Tower	Fiber Optic Cable	Free Wi-Fi	
BARMM – 87.2%	BARMM – 99.1%	Absence of Free Wi-Fi in	
Region V – 84.2%	Region II – 90.5%	interviewed barangays is evident	
Region VII – 83%	MIMAROPA – 90.4%	across all regions	

Inadequate Broadband Infrastructure

Total Internet Use

46%

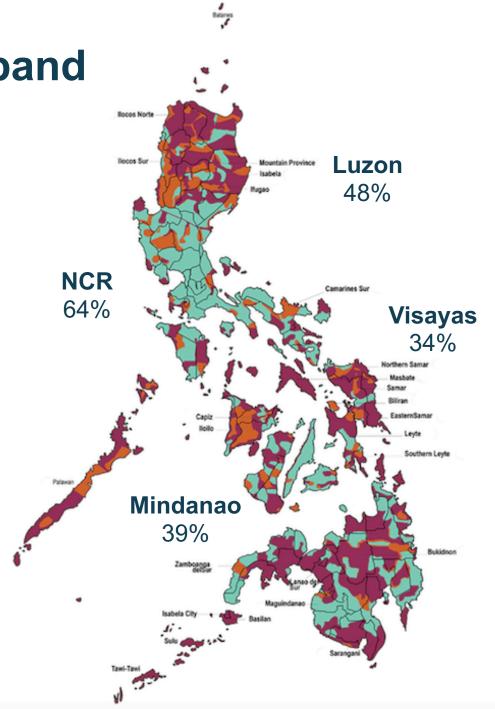
Legend:

Unserved

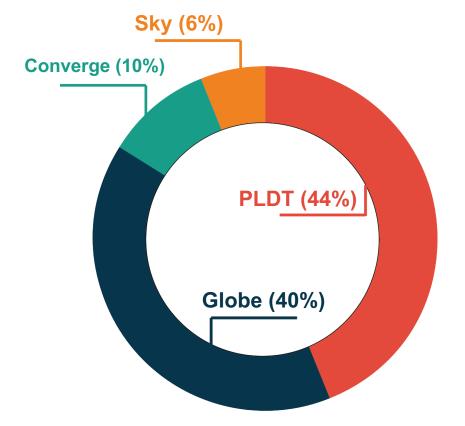
Underserved

Served

Source: National Broadband Plan, 2017 Updated by the Better Broadband Alliance

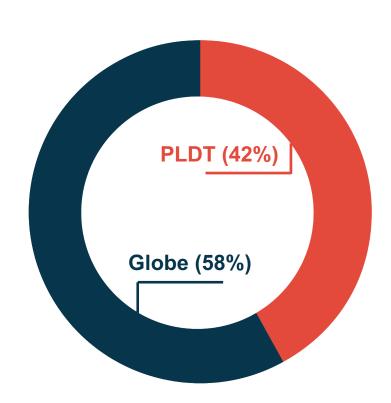


Limited Market Players



FIXED BROADBAND

Market Share includes fixed wireless broadband



MOBILE SERVICE

Market Share includes mobile broadband

Herfindahl-Hirschman Index (HHI) = "Highly concentrated"

Analog Policy in Digital Age

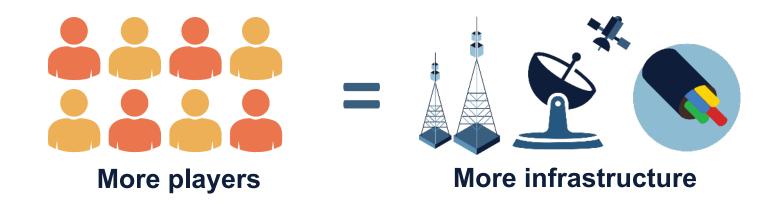






Technology we use

How to improve digital connectivity?

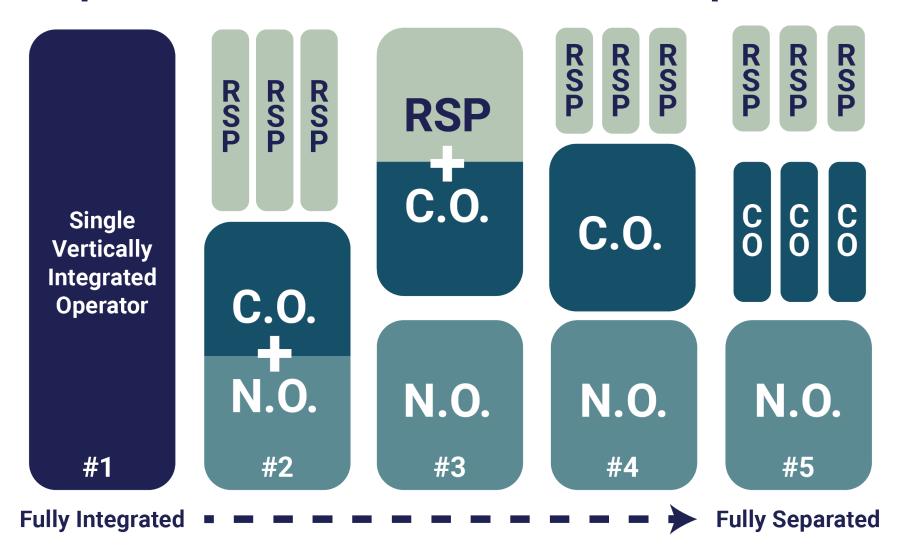




Open Access Framework

- Ensures new entrants are able to enter market that exhibits high structural barriers to entry
- Creates competition in all layers of IP network, allowing wide variety of physical networks and applications to interact in open architecture
- Separates physical infrastructure from services; wholesalers from retailers
- Anyone can connect to anyone in technology-neutral framework; encourages innovative, low-cost delivery

Open Access Business Model: Options

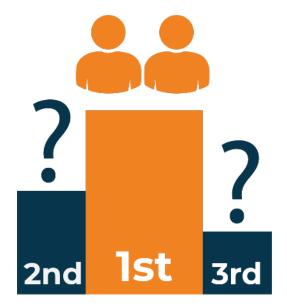


N.O. = Network operator (passive infra); C.O. = Comms operator (active infra); RSP = Retail service provider (end users)

Key reforms:

- Lower barriers to market entry for ISPs
- Fast-track and lower the cost of broadband network rollout
- Make more spectrum available for Internet connectivity

Status quo #1



High barriers to entry

Reform

- Allow more and different types of players to build and operate a data transmission network
- Remove Congressional franchise and PA/CPCN

Introduce simple and efficient registration process

Status quo #2



Expensive and tedious network rollout

Reform

- Promote infrastructure sharing and common-use facilities
- **Expedite** permits process

Rationalize requirements and fees imposed by NGAs, LGUs, others

Status quo #3



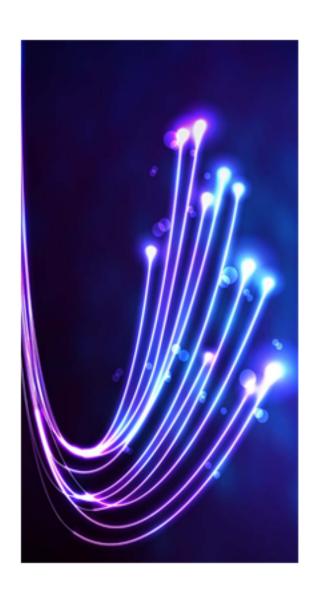
No more spectrum?

Reform

- Make **transparent** who holds which spectrum, how much, and for what?
- Make clear rules and guidelines on recall, reassignment, co-use
- Consultative decisionmaking on spectrum

Other key provisions:

- Mandated interconnection
- Service performance standards
- Penalties for violations
- Right of Internet end users



STATUS (18th Congress):

- HBN 57 filed by Cong. Victor Yap, approved in ICT Committee hearing on November 13, 2019
- SBN 45 filed by Sen. Ralph Recto; referred to Science & Technology Committee chaired by Sen. Nancy Binay; Sen. Grace Poe now co-author
- Supported by the Cabinet's Economic Team, NEDA, DICT, PCCI, Philexport, BBA, Alyansa Agrikultura, FEF, FFCCCII, IBPAP, MAP, MBC, SEIPI, and all members of the JFC (cont'd)

Supporters of Open Access in Data Transmission Bill (as of July 2020):

- Cabinet's Economic Team National Economic Development Authority (NEDA), Department of Finance (DoF); Department of Budget Management (DBM)
- Department of Information and Communications Technology (DICT)
- Regional Development Council Region X (Northern Mindanao)
- Philippine Chamber of Commerce and Industry (PCCI)
- Philippine Exporter's Confederation (Philexport)
- Alyansa Agrikultura
- Foundation for Economic Freedom (FEF)
- Federation of Filipino Chinese Chambers of Commerce & Industry (FFCCCII)
- IT and Business Process Association of the Philippines (IBPAP)
- Management Association of the Philippines (MAP)
- Makati Business Club (MBC)
- Semiconductor and Electronics Industries in the Philippines Foundation, Inc. (SEIPI)
- Joint Foreign Chamber of Commerce (JFC)
- Better Broadband Alliance (BBA)

We want better broadband.







































Thank you.

Mary Grace Mirandilla-Santos Better Broadband Alliance

