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Digital technology dominates our everyday lives, and with each passing day, even more so. How can the global community benefit from the new digital era?

The World Bank's [World Development Report 2016](#) (WDR 2016) provides a useful framework and guidance for harnessing the potential of the internet for development. "To get the most out of the digital revolution, countries also need to work on regulations, skills and institutions—by strengthening regulations that ensure competition among businesses, by adapting workers' skills to the demands of the new economy, and by ensuring that institutions are accountable," says the Report. This may sound familiar, but it is not. Let me explain.

As a co-chair of the Advisory Panel of WDR 2016, seeing the Report in the making has been a fascinating journey. Every day we read of some new digital development to make our lives easier and more convenient, and we take this very much for granted. As we should.

However, the internet is still a relatively new phenomenon. It has been only 25-odd years since Tim Berners-Lee invented the hypertext transfer protocol, or http. And it has been only 15-odd years since the first properly functional Wi-Fi protocol was created and released. If we benchmark that against the invention of the alternator, we have to admit that the first 15 years after that gave little if any indication about the eventual transformative impact that electrical power transmission was to have on the world.

The same applies, to the internet and digital technology more broadly. Although we all intuitively realize the enormous potential that the connected global community has, the actual impact of the internet to date is extremely difficult to measure.

The World Development Report team has done a tremendous job in pairing existing data with solid economic analyses. The result is a Report that refreshingly stands out in this field: instead of technological evangelism, it does not shy away from the risks, but also shows the way ahead for those willing to embrace the potential of technology. And for many less developed countries,

there are really no alternatives to that. Missing a cycle of irreversible digital development would mean further deepening the gap between the poor and the rich.

Fifteen years ago, Estonia was where the world in aggregate is today—only 32 percent of Estonians used the internet in 2001. At the time, Estonia's GDP per capita was roughly the same as Vietnam's is currently. Today, Estonia is regarded as one of the most advanced e-governments in the world. The use of technology and digital services is widespread in both the public and private sector. We can set up a new company and have it legally up and running within 20 minutes. Nearly 95 percent of Estonians declare their income online, because it takes less than five minutes and no accountants. All this brings tax administration costs down to only 0.3 percent of net tax revenues, and saves each citizen an average of 5.4 workdays a year.

That did not happen overnight, and the main reason it did happen was obvious: we felt that without taking on an ambitious digital strategy, we risked building yesterday's institutions, instead of grasping the technological opportunities of tomorrow. The conscious policy choice of the Estonian government was to promote the use of digital technologies in all spheres of society and economy.

It all starts with creating connectivity. And you cannot expect the private sector to be able to do it all. In Estonia, the solution was to bring the internet to the schools and create a network of public internet access points. By 2002, we had established 460 public access points covering Estonia—in public libraries, schools, and municipal centers. These projects aimed to bring the internet and its advantages closer to everybody, including groups that could not afford computers and network connections on their own, such as children, people in the countryside, and the elderly.

From there on, the strategy was built on three pillars: inclusion, meaning ensuring access; providing meaningful e-services, which reduce time and cost; and skills, meaning free computer and internet training through the "Come Along!" project, which has given over 10 percent of the adult population the skills to go digital.

There are number of other countries that have done the same, and the reason I am talking about Estonia is that I have been passionately involved in the digital transformation of the country since the very beginning.

What we in Estonia realized during the process was exactly what the WDR concludes: connectivity is an essential precondition, but it does not automatically result in digital dividends. In Estonia, legal and administrative reforms were the foundations of our digital development. In 2000, we introduced the ID-card, a document that can be used for establishing a person's identity in an electronic environment and for providing digital signatures. The same year we also adopted a law on digital signature giving it equal legal force as a handwritten signature.

Today, after 15 years, the digital signature is widely used by Estonian governmental offices and in private practice, as well. With the digital signature and the machine-readable ID card, we created, without fully realizing it in the beginning, a new breed of person: the e-citizen. And that is the key concept looking at the future of e-governance.

The Estonian system is set up contrary to most e-government systems: instead of the focal point being data, the focal point of the Estonian system is the citizen in his or her online incarnation, with the same rights as an analogue person, and with an equally solid and verifiable identity, armed with a legally granted right to own and control his or her online data. And the e-citizen has the same ultimate powers of representation as the physical citizen: he or she can vote online, and has done that in a number of local and Parliamentary elections.

As a result, we are now spending considerably less on maintaining the bureaucracy, we can offer businesses and people swift and transparent services, and, as of recently, through our e-residency program, we are offering a transnational digital identity for administering a location-independent business online.

What I sincerely hope readers take away from WDR 2016 (and the example of Estonia) is that despite the difficulties, investing in internet infrastructure and affiliated services pays off. It is not by accident that the countries with the best business climate are more advanced in digital services.

And for those who are still in doubt, let me put it this way: Digital Dividends, as the WDR defines them, materialize in a very analogue manner in our analogue world—with more jobs, faster growth, and a dramatically more inclusive society. But not without an effort.

Original article on the [World Bank's webpage](#) .