we may not know the future...
but we can see that technology has already dramatically changed the world around us
The world around us has changed
reduction in cost of computing

<table>
<thead>
<tr>
<th></th>
<th>1990</th>
<th>2013</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cost per M computations</td>
<td>$527</td>
<td>$0.05</td>
</tr>
<tr>
<td>Declining 33% annually</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cost per Gb storage</td>
<td>$569</td>
<td>$0.02</td>
</tr>
<tr>
<td>Declining 38% annually</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Cost per 1000 Mbps bandwidth</td>
<td>$1,245</td>
<td>$16</td>
</tr>
<tr>
<td>Declining 27% annually</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(Source: Mary Meeker @KPCB Internet trends 2014)
computing power is growing exponentially
people are more tech savvy
people are looking for better user experiences
the internet of everything
is already affecting us here
the next generation of customers
is expecting us to innovate
we need to adapt.
as an economy.
as organizations.

Julie Ask (Forrester Research)
Great Apps Pay Off, Good Apps Are Not Enough

Julie Ask, VP & Principal Analyst

Study commissioned by IBM
October 14, 2015
what does all this mean for us here in the Caribbean?
let’s look at an inspiring example...
an island similar in size as most Caribbean islands
slimme steden
SINGAPORE COMPARABLE?

- https://www.google.com/publicdata/explore
Important statements by Balakrishnan

“if we want to be relevant to the world…”

“we need to understand the internet, AI, robotics, big data, the IOE…”

“it’s about jobs, the quality of life, about the future…”

“we need to take advantage of the opportunity…”

“we are a working model for the future…”
IOT & SMART ISLANDS

• Can we become “smart islands” example?
• Can we become “the working islands model of the future”? 
IOT & SMART ISLANDS

• We may or may not have the ambition to become smart islands but...

• If we want to compete globally,

• If we want to be attractive economies to invest in,

• If we want to seize the opportunity of all the developments needed for the IOE,

• If we want to be relevant..
we need to invest in becoming smart islands
The Internet of Things is Already Here

50 Billion "Smart Objects"

Rapid Adoption rate of digital infrastructure: 5X faster than electricity and telephony

World Population

Timeline

2010 2015 2020

Inflection point

6.8 12.5 25

Source: Cisco JDSU, 2011
IOT & SMART ISLANDS: TRANSPORTATION

IoT Revenue Opportunity - Worldwide

2018

- Banking: $154 B
- Manufacturing: $913 B
- Retail: $326 B
- Healthcare: $313 B
- Transportation: $325 B
- Utilities: $201 B
- Government: $570 B
- Other: $1.79 T

Total: $4.59 T

2014

- Banking: $92 B
- Manufacturing: $472 B
- Retail: $160 B
- Healthcare: $132 B
- Transportation: $156 B
- Utilities: $100 B
- Government: $301 B
- Other: $877 B

Total: $2.29 T

IDC, Internet of Things Spending Guide by Vertical Market, 2014
IOT & SMART ISLANDS: TRANSPORTATION

Figure 2. Forecast of total miles driven in the United States

2025: Shared driver-driven vehicles account for >10% of miles driven

2040: Shared mobility accounts for ~80% of miles driven

Introduction of shared (2020) and personally owned (2022) autonomous vehicles

Source: Deloitte analysis based on publicly available information. See appendix for data sources.

Graphic: Deloitte University Press | DUPress.com

2/8/2017
IOT & SMART ISLANDS:
TRANSPORTATION

Estimated Number Of US Drivers Who Have Or Have Had Usage Based Insurance

Source: Insurance Research Council, Tower Watson, NHTSA, BI Intelligence Estimates
IoT devices are about to surpass mobile phones as the largest category of connected devices – source Ericsson Mobility Report 2016
WHY SMART ISLANDS?

• The most important reason for us Islanders?
WHY A SMART ISLAND

- We ALMOST live in paradise
- 5 star tourist service?
- What about 5 star citizen service!
- If we really want to live in paradise we might need to work harder but especially smarter… using ICT
- We need to jump into the Knowledge Economy together
ICTUAL ’S VISION

• By creating a smart island
• We will become an even more attractive place to live
• We will become an even more attractive employer for YDK
• Having them come back on the island & preventing Brain Drain

• But … we also need to make sure enough YDK get into the field of ICT in the first place
ICTUAL ’S VISION

- We need to make the jump into the knowledge economy

XLAB Ictual Camp

SOFTWARE DEVELOPMENT
AND MORE

October 5 - 9

Naf. 100 (incl. ob)

8.00 - 17.00

X-LAB is a youth program, introducing technology to teens in a fun and explorative way. This 5 day workshop is a CITI initiative and will be facilitated by ICTUAL experts and Ricardo Lochan, ICT expert, and Project coordinator of CITI’s youth programs.

“Unleash your inner creativity”

For more information, please contact CITI via info@citi.cw, or call +5999 738 6299