What will "success" mean in our transforming world?

VALERIE HANNON
Cambridge September 2018
Everything starts with the story we tell ourselves about ourselves.
We need a new narrative for education, one that starts with our purpose.
WHAT IS LEARNING FOR?
Today, education has to be about learning to thrive in a transforming world

Should this be our explicit purpose?
Thrive
SCHOOLS REINVENTED FOR THE REAL CHALLENGES WE FACE

Valerie Hannon
with Amelia Peterson

"Thrive offers a compelling analysis that should inspire and deepen the public conversation about education for all our children, here and now, and for the future."

Sir Ken Robinson
What good evidence do we have about the coming 30 years?
The Future

Al Gore
“There is a clear consensus that the future now emerging will be extremely different from anything we have ever known in the past. It is a difference, not of degree, but of kind.”

The Future
Al Gore, 2013
The Fourth Industrial Revolution

Klaus Schwab
“The changes are so profound that, from the perspective of human history, there has never been a time of greater promise or potential peril. My concern, however, is that decision makers are too often caught in traditional, linear (and non-disruptive) thinking or too absorbed by immediate concerns to think strategically about the forces of disruption and innovation shaping our future.”

World Economic Forum Founder and Executive Chairman

Professor Klaus Schwab, Jan 2016
The evidence suggests that 3 major tipping points, or ‘pivots’ will distinguish the C21st:
* our planet
* apotheosis of technology
* our evolution
OUR PLANET AT A TIPPING POINT?

→ SIXTH GREAT EXTINCTION
→ ANTHROPOCENE AGE
→ CLIMATE CHANGE
The Sixth Extinction

Elizabeth Kolbert
Adventures in the Anthropocene

Gaia Vince
TECHNOLOGY IN CONTROL?

→ JOB DISRUPTION BY ROBOTICS

→ ARTIFICIAL INTELLIGENCE

→ GLOBAL CONNECTIVITY
Robots will steal your job

Federico Pistono
Figure 1 – Potential job automation rates by industry across waves

% of existing jobs at potential risk of automation

- Transport
- Financial services
- All sectors
- Health

Wave 1 (to early 2020s)
Wave 2 (to late 2020s)
Wave 3 (to mid-2030s)

Source: PwC estimates based on OECD PIAAC data (median values for 29 countries)
$15tn Potential boost to global GDP from AI by 2030
3% of jobs at potential risk of automation by early 2020s
30% of jobs at potential risk of automation by mid-2030s
44% of workers with low education at risk of automation by mid-2030s
Nao meeting customers
Meet Yangyang
The Industries of the Future

Alec Ross
The Industries of the Future

*Alec Ross*

- Robotics
- Genomics
- Code-ification of new arenas – e.g. money
- Cybersecurity
- Big Data
EVOLUTION IN OUR HANDS?

- GENETIC ENGINEERING
- CONVERGENCE OF HUMAN BODIES WITH ARTIFICIAL INTELLIGENCE
- HUMAN ENHANCEMENT TECHNOLOGIES
 THESE ARE
THE SAMPLES
OF DESIGN
The Artificial Human of Today (below 5mio.$)

- stents
- artificial skin
- bio engineered ear
- artificial blood (oxybyte can carry 5 times more oxygen than hemoglobin)
- BCI implant
- cochlear implant
- artificial vision system
- windpipe with stem cell technology
- neurostimulator
- RFID implant
- neurostimulator/implanted drug delivery system
- artificial lung
- artificial heart
- implantable insulin pump
- bionic arm
- artificial hand
- hip replacement
- bionic leg prosthesis
- intelligent leg prosthesis
- bionic liver machine
- portable dialysis
“intelligence-augmentation”

Coming up......
• Facebook’s mind-computer interface
• Elon Musk: implanted electrodes
PLANETARY/GLOBAL

- Live sustainably
- Protect the Earth’s eco-system
- Acquire global competence
Global competence

Knowledge
- Understand and appreciate the perspectives and world views of others

Values
- Engage in open, appropriate and effective interactions across cultures

Skills
- Take action for collective well-being and sustainable development

Attitudes
- Examine local, global and intercultural issues
Navigate a disrupted & uncertain landscape of work

Reinvent a participative, authentic and meaningful democracy
The Spirit Level

Richard Wilkinson and Kate Pickett
Are we in an age of “democratic disappointment”? 
HOW DEMOCRACIES DIE
WHAT HISTORY REVEALS ABOUT OUR FUTURE
STEVEN LEVITSKY & DANIEL ZIBLATT

National Populism
The Revolt Against Liberal Democracy
Roger Eatwell and Matthew Goodwin
“To find ways of creating democratic processes and institutions that are fit for the 21st century, locally, nationally and internationally is a daunting, complex, long term challenge. But shouldn’t we at least be looking?”

Chief Executive, RSA
Matthew Taylor, 2016
Navigate a disrupted & uncertain landscape of work

Reinvent a participative, authentic and meaningful democracy
CAREER PATHS ARE CHANGING.

20TH CENTURY
1-2 jobs, mastery of one field

21ST CENTURY
Predicted to work 17 jobs, 5 careers
Trigger Warning: May contain upsetting information about how useful your degree really is.
The Future of the Professions

Richard Susskind and Daniel Susskind
most professional jobs can be ‘unbundled’ …..

- Can we rely on ‘human exceptionalism’?
  It will not lie in our cognitive functions…
- The Susskinds offer empathy
- But many people prefer interacting with machines – and would you look for empathy in your tax lawyer or surgeon?
Let’s write the future with robots that have what it takes to collaborate.

abb.com/future
INTERPERSONAL

Loving and respectful relationships in diverse, technologised societies

Engage with, and learn from, other generations
The world’s population of centenarians is set to grow 8-fold
INTRAPERSONAL

A secure sense of self

responsibility for personal health, fitness and well-being
mind full or mindful?
To create the ‘conditions for success’, we must understand what ‘success’ really is and will be.

Thriving is the true goal.