How to use benchmarking in the era of digital transformation

EUNIS BencHEIT Workshop
November 13, 2015
Barcelona

Pekka Kähkipuro
Aalto University
Content

What is digital transformation
Digital transformation in higher education
Assessing your capabilities
Using BencHEIT results
Other aspects to consider
Summary
Digital transformation

Transformation created by a combination of forces that strengthen each others:

**Technology**
- Cloud
- Mobility
- Analytics
- Social media
- Internet of things

**Business**
- Globalization
- Faster speed and disruptions
- Increase of service business
- Increase of diversity
- Digitally native end-users

The result is an accelerating cycle where technology creates new business and business creates new technology.
Digital transformation in higher education

Business model disruptions
- MOOCs with both commercial and not-for-profit approaches
- Communities built around tools and educational interests
- Open content, such as governmental and EU initiatives

Digital student experience
- Student portal
- Student recruitment with social media

Digital education
- On-line learning, flipped classroom, blended learning
- Learning analytics, predictive interception

Digital research
- Research data management
- Digital research project support
- Easy-to-use high performance computing

Digital processes
- Process automation and self-service
- Integration support

Enablers
- Experimentation & agility
- Mobility support

Jari Collin, Kari Hiekkanen, Janne J. Korhonen, Marco Halén, Timo Itälä, Mika Helenius (Eds.), IT Leadership in Transition, Aalto University, 2015
Assessing your institution’s maturity

- Consulting companies have introduced digital maturity assessment methodologies (e.g. McKinsey: Digital Quotient)
  - Consulting engagement is typically required
  - Comparisons are based on data available to consultants only

- BencHEIT data is not directly addressing digital capabilities but has a number of elements that correlate strongly with digital maturity
  - Digital education ~ cost of educational IT
  - Digital processes ~ cost of business applications
  - Blended learning ~ cost of AV equipment
  - To compare institutions of different sizes, values can be normalized with a suitable denominator (e.g. student FTE, employee FTE)
Student experience and digital education

Cost of student administration IT € / student FTE
Cost of teaching IT € / student FTE
Cost of AV services € / student FTE
Number of classroom computers / student FTE
Digital processes and enablers

Digital processes and enablers

- Total cost of business applications € / employee FTE
- Communications IT costs € / employee FTE
- Cost of IT security € / employee FTE
- Number of smart mobile connections / employee FTE

Aalto-yliopisto

19.1.2016
Combining the viewpoints

Normalized view

- "BencHEIT digital maturity index"
- Number of classroom computers / student FTE
- Cost of student administration IT € / student FTE
- Cost of teaching IT € / student FTE
- Size of raw storage TB / employee FTE
- Peak power consumption for HPC kW / employee FTE
- Cost of AV services € / student FTE
- Cost of research administration IT € / employee FTE
- Total cost of business applications € / employee FTE
- Number of smart mobile connections / employee FTE
- Communications IT costs € / employee FTE
- Cost of IT security € / employee FTE
Summary

Digital maturity comes in different flavors
  • Each institution has its own strategy and preferences – direct comparison is difficult or even impossible

Digital maturity can be assessed through different components
  • E.g. student experience, education, research, processes, mobility
  • BencHEIT data provides a good basis for the assessment

Combining different components yields an overall picture
  • Each institution can compare its maturity with its peers using a combination of its preferred components
  • What next? BencHEIT digital maturity index?
Thank you!