

Envisioning the Future of Higher Education in a Digital Age

The Times They Are A Changin'

(Bob Dylan, 1964)

On the pendulum Parmenides and
Heraclitus

Life wide use of ICT

- Mobile technologies: any time/where
 - Nursing/homecare; access information/welfare technology
 - Teachers online with students (LMS/facebook)
 - Engineers infield have always necessary info
 - Administrators online holiday/conferences
 - 24/7 offices/services/Libraries/post/banking
- Learning/work more often outside institutions/workplaces
- Blended learning/BLENDED LIVES

ICT facilitates collaboration, learning communities

- Social learning in digital world
- Learner centred: wider variety of learning materials, including video, simulations ...
- Flipped classrooms – flipped learning at workplaces (introduction online course to prepare a more effective course at the workplace (KS kompetanse)

Change management

- Meet rising demands/diminishing resources, involving all - using new tools/technology
- To cope it is necessary to have skills like
 - Organising in pro-active manner
 - Team and networking abilities across professions and units
 - Entrepreneurship/co-construction
 - Creative thinking/Critical thinking
 - Meta understanding/responsibility

Multiple stakeholders involved:

- Inside, across and outside organisations – workplaces and educational institutions
- If one part of an organisation changes it effects others, or at least others must respond in an adequate manner to produce the wanted/needed outcome.
- When some institutions changes profoundly others are influenced and must respond

Torun vision – WCCE 2013

- *Both Computer Science and ICT need to involve all stakeholders for developments in education*
 - *learners, parents, policymakers, educational advisors, managers, software developers, professional, teachers, tutors, counsellors.*
- *All learners have specific needs* (End of the book Umberto Eco)
 - *professional, teacher, or student learners*
 - *concerned with developing greater personalisation, accommodating increasingly-found practices as (BYOD).*
- *Stakeholders supporting learning can use both CS and ICT to benefit lifetime learners, including seniors, adopting lifelong and intergenerational practices.*

Torun vision

- *focus on five key elements*
 - *collaboration, creativity, deeper understanding, expansion, integration*
- **Key aspects of knowledge/underst. two focal areas:**
- 1 From consuming to innovating, creating, conceptualising, producing: programming (CS) and ICT applications.
- 2. Deploy digital technologies to better
 - support different interactions/different stakeholders, according to technologies selected and used, accommodating institutional diversities, gender, cultural, native language, cognitive and social backgrounds.

- Economy
 - Less money for growing demands (welfare expectations)
- Demographic
 - Fewer hands/heads to deliver public services
- Employment
 - Changing competence necessary for employment