Estonian learning system—through the cultural perspective

Eve Eisen Schmidt, Professor of Educational Leadership
Tallinn University
23. September 2020
A Small Nordic country

At a glance:

- 1.2 million population
- 150,000 students (20% Russian speaking students)
- 562 schools; 7 universities (2 major ones)
- Independent from Soviet Union since 1992
Continued progress of the education system since 17th century

- Public schools for boys and girls since 17th century
- Literacy rate 94% in 1881

Before 1918
- Under Danish, German, Russian rules

1918-1940
- Estonian republic

1944-1981
- Soviet Occupation

From 1991
- Estonian republic

- Teaching and learning in Estonian
- Comprehensive school
- Compulsory and free education from 4 (1918) to 6 grades (1940)
- Spreading of the ideas of the reform pedagogy

- Democratisation, decentralisation, humanisation, comprehensive school
- Deideologising of the instruction
- Compulsory education 9 grades
- Spreading of the ideas of the social constructivism
- Literacy rate 99.8%; gender difference 0

- Maintained teaching & learning in Estonian
- Ideologising of the instruction
- Comprehensive school
- Offering the various extra curriculum activities
- Compulsory education 8 grades
Key Qualities of the Estonian Learning System

1. Aim high and work hard mentality
2. Autonomy of educational actors
3. Evidence-based and equity-promoting governance
4. Multiple contributors to education
5. Diverse and responsive school culture
Moving towards a student-centred education
Continued progress: adapting the curriculum to the needs of the society and promoting student-centred approach

**LEHRPLAN**

- Transforming period

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CURRICULUM</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>National framework for school curriculum</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>General and subject competencies</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Social constructivist approach to learning</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>More decision-making</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>freedom to schools</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>More subject integration</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Modified the cross-curricular topics</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Separated primary and upper-secondary curriculum</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Modified and extended general competencies</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Created subjects’ domains</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Decreased and renewed content</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Unified structure</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Modified general competencies and added digital competence</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Modified descriptions for the study results (respond to the Bloom’s taxonomy)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
## General competences in the curricula

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>General competences:</strong></td>
<td><strong>General competences:</strong></td>
<td><strong>General competences:</strong></td>
</tr>
<tr>
<td>• learning to learn</td>
<td>• learning to learn</td>
<td>• cultural and value</td>
</tr>
<tr>
<td>competence</td>
<td>competence</td>
<td>competence</td>
</tr>
<tr>
<td>• operational</td>
<td>• operational</td>
<td>• social and citizen</td>
</tr>
<tr>
<td>competence</td>
<td>competence</td>
<td>competence</td>
</tr>
<tr>
<td>• value competence</td>
<td>• value competence</td>
<td>• self-management</td>
</tr>
<tr>
<td>• self-determination</td>
<td>• self-determination</td>
<td>competence</td>
</tr>
<tr>
<td>competence</td>
<td></td>
<td>• learning to learn</td>
</tr>
<tr>
<td></td>
<td></td>
<td>competence</td>
</tr>
<tr>
<td>**Domain specific</td>
<td></td>
<td>• communication</td>
</tr>
<tr>
<td>competences:**</td>
<td></td>
<td>competence</td>
</tr>
<tr>
<td>• natural competence</td>
<td></td>
<td>• mathematics, natural</td>
</tr>
<tr>
<td></td>
<td></td>
<td>sciences and technology</td>
</tr>
<tr>
<td>• social competence</td>
<td></td>
<td>competence</td>
</tr>
<tr>
<td></td>
<td></td>
<td>• entrepreneurship</td>
</tr>
<tr>
<td>• reflection and</td>
<td></td>
<td>competence</td>
</tr>
<tr>
<td>interaction competence</td>
<td></td>
<td>• digital competence</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
If you can't measure it, you can't improve it.

Peter Drucker

- Assessing study results:
  - National exams 9th, 12th grades
  - Sample-based tests 3rd, 6th grades

1997

- Graduating primary school:
  - 3 exams
  - Creative work (enquiry, project of art, music, etc.)

Finishing upper-secondary school:
- 3 national exams
- Research or practical work

2003

- Evaluating general competencies:
  - Learning to Learn
  - ...

Background questionnaires of the exams:
- Responds link to results
- Only for teachers
- Promotes teaching & learning
- Students', parents', teachers' well-being
- Diagnostic questionnaires

2010

- Enforcement of the formative assessment

2014
Assessment of general competences

E- tests for assessing the general competences of students, developed in cooperation with university researchers for the following general competences:

- Learning to learn competence,
- Communication and self-determination competence tests
- Reading and mathematics competence tests
- Digital competence tests
The teacher – autonomy and responsibilities

Initial education
MA level 5-years academic education

Induction period
Mentor support at school and peer-group mentoring at the university

Continuous development
Internal or external training based on school development and teacher's individual needs
Estonia has combined a belief in learning with equal-access technology to create one of world's best education systems.

KEVIN DICKINSON 08 September, 2020
Estonia is probably the only country in the world where 99% of the public services are available online 24/7. E-services are only impossible for marriages, divorces and real-estate transactions — you still have to get out of the house for those.

Thanks to a safe, convenient and flexible digital ecosystem, Estonia has reached an unprecedented level of transparency in governance and built broad trust in its digital society. As a result, Estonia saves over 844 years of working time annually and has become a hassle-free environment for business and entrepreneurship.
Technology in the curriculum

Step-by-step development: Tiger-leap programme in 90s

1996: Tiger Leap Foundation to support ICT in schools

- IT in schools: Estonian Juku computers
- E-mail projects, PCs for schools
- Tiger Leap Foundation, 1st strategy

1986
Graduated teachers' college

1989
Became school principal

1993

1997
In TLF regional committee
Today – prepared for distance learning?! 

- Bring your own device (BYOD) approach
- Subjects like Robotics, Programming
- E-learning platforms

Personalized learning paths, e-school bag
(learning materials and tests for self-evaluation)
eKool (eSchool, https://ekool.eu/)

Simple and easy access to study related information and a tool for communicating with the teachers and parents.

- Timetables, lesson descriptions, home assignments and more
- mKool brings eKool to your smartphone
- Study resources in eKool
- Grades and absences
- Communicating with teachers
Top Remote Learning Solutions
that you can now use for free

Concerning closing the schools during the crisis, teaching and learning have moved fully online. To support the teachers and parents in this new situation, Nordic countries have opened up their e-learning solutions for the world for free.

Here you have 40+ remote learning solutions from Estonia, Finland, Denmark, Iceland, Latvia, Lithuania, Norway and Sweden that you are welcome to use.
TÄNAN! – Thank you!

Eve Eisenschmidt
eve@tlu.ee