innove

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About Estonia



Main topics...

- Little about Estonia
- Briefly about the education system
- Performance in PISA
- Successes and innovations
- What will happen?

About Estonia

- Location: North East Europe
- Area: 45 227 km²
- **Population:** 1.3 million
- Capital: Tallinn
- Official language: Estonian
- Ethnic groups: 72% Estonian, 22% Russian, 6% other

Over 1500 islands and 2500 lakes.

http://ec.europa.eu/eurostat/documents/10186/8089712/EEPresidency.gif/ 156b5d16-ef9e-4ce6-a1a0-b380f5114792?t=1498828835608







" e-Estonia"

- e-government (paperless meetings)
- e-elections
- e-taxes
- digital signature
- e-police
- e-healthcare
- e-school, e-tests
- e-residence



What Innove does?

- Implementation of national curricula.
- Content and Language
 Integrated Learning.
- Support for children with SEN.
- Examinations final and state; Estonian
 Citizenship and Estonian language.
- Study and career

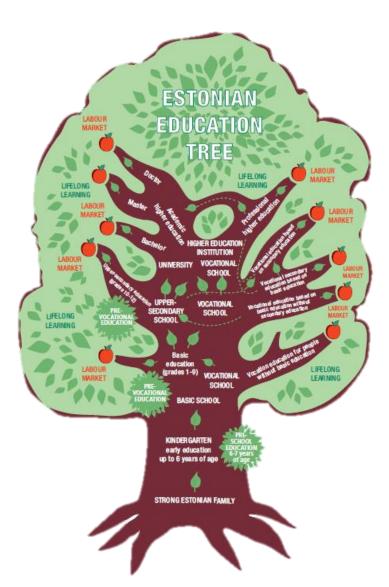


- E-assessment.
- Vocational education image and skills competitions.
- Teacher and headmaster inservice training.
- Internship system in vocational and higher education, work-based learning.
- International surveys (PISA, TALIS).

Estonian success in PISA – is it by chance?



https://www.youtube.com/watch?v=VIAhfn-UaRo



Educational institutions and number of students (2016/2017)

Level of education	Age	Number of institutions	Number of students
Preschool education	0 - 6	635	67 575
General education		535	143 713
Basic education	7 - 16	351	122 282
Upper secondary education	16 - 19	168	21 431
Vocational education		38	25 071
Higher education		21	47 794

Pre-school education

- A pre-school childcare institution children aged 0 to 7.
- Attended by about 95% of children from the age of 4 to school age.
- Coverage is better in Estonia than on average for OECD countries. In 2014, 86% of 3-yearolds were enrolled in early childhood education (OECD 71%) (EAG 2016).
- 86% of the cost of a pre-school place is financed by the local government, 1% from the state budget and 13% by parents.

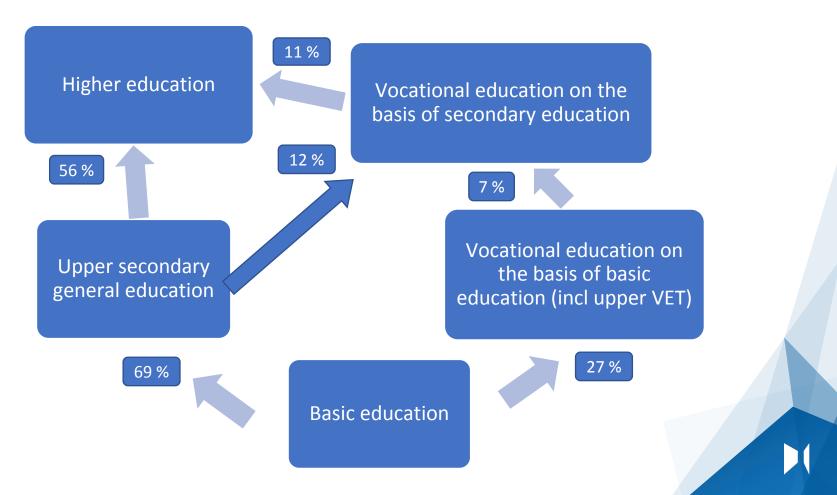
Basic education (grades 1 - 9)

- The compulsory education is from age 7 till 17 or until the acquisition of the basic education.
- Basic schools are comprehensive schools, as a rule the closest regional school is chosen.
- Basic education is provided also in Russian.
- For graduation students must complete the national curriculum and pass three standardised examinations – Estonian language, mathematics and an exam on a subject of the student's choice as well as completing a creative assignment.

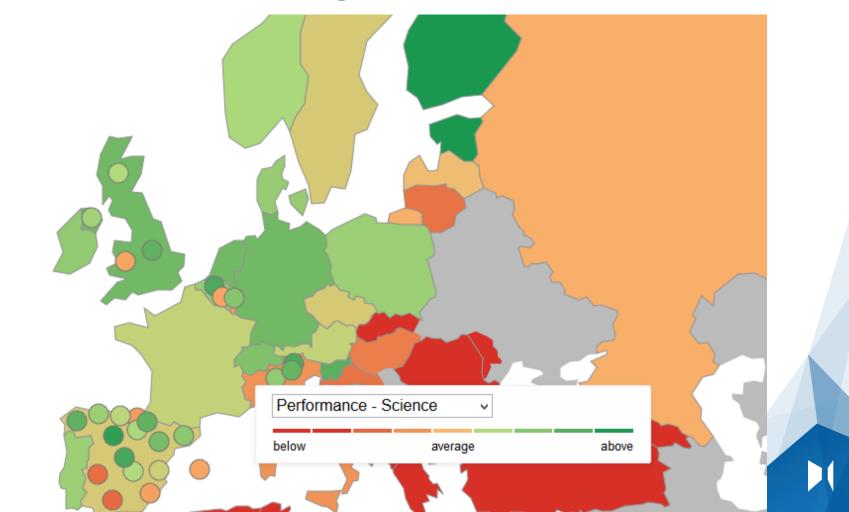
General upper secondary education

- Students have mandatory and voluntary courses.
 Studies last for 3 years.
- In order to graduate from upper secondary school students must complete the curriculum, pass the state exams in the Estonian language, mathematics and a foreign language, complete a student research paper or practical work during the entire study period.
- Choice of gymnasium is not determined by place of living.

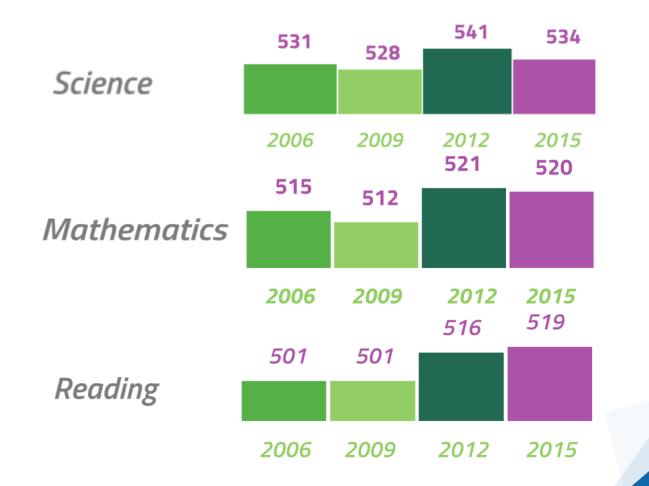
Educational choices (2015/16)



How are we doing in PISA?



Mean scores over time



Excellence and equity in Estonian Education (PISA 2015)

Position (E	urope/World):
Science	1st/3rd
Math	1st-2nd/9 th
Reading	3rd/6th

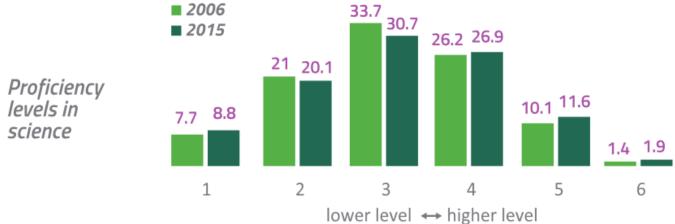
Top performers:Science13.5%Reading11.1%Math14.2%

Equity: Impact of social economical & cultural background 8% Resilient students 48% Low performers 12%

Mean scores from 2015

ZC	Scor e	Science		Score	Reading		Score	Mathematics
1	556	Singapore	1	535	Singapore	1	564	Singapore
2	538	Japan	2	527	Hongkong (China)	2	548	Hongkong (China)
3	534	Estonia	3	527	Canada	3	544	Macau (China)
4	532	Taipei (China)	4	526	Finland	4	542	Taipei (China)
5	531	Finland	5	521	Ireland	5	532	Japan
6	529	Macau (China)	6	519	Estonia	6	531	B-S-J-G (China)
7	528	Canada	7	517	Korea	7	524	Korea
8	525	Vietnam	8	516	Japan	8	521	Šveits
9	523	Hongkong (China)	9	513	Norway	9	520	Estonia

Proficiency levels



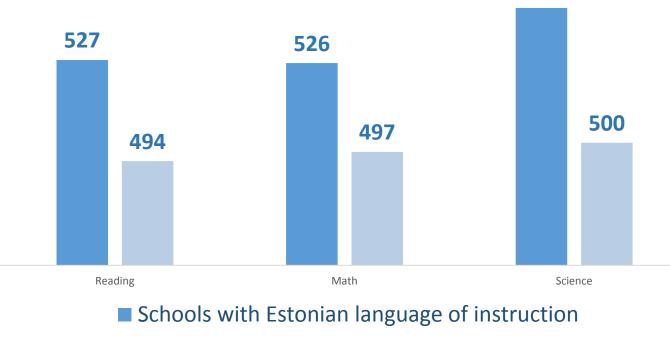
Small share of students below baseline level 2



PISA 2015 scores in Russian and Estonian language schools

Performance by average points

544



Schools with Russian language of instruction

Every country has its own challenges

©	8	2012
Students from low socio economic background achieve high results	Gender gap in reading skills	
Share of satisfactory students	Knowledge and skills gap between students from Estonian language schools and Russian language schools	
Stable science performance	Students' low sense of belonging	
Positive trend in reading	Bullying	
Positive trend in math	Share of top-performers in math	
Share of low achievers	Share of top-performers in reading	
Low level anxiety	Teachers unfair behaviour	
Share of top performers in science	No significant improvements	
Stable scores		

What brought us here?

"Estonian people believe in education. We truly think that the best thing we can give to our children is not land, house or a bank account, but good education"

Toomas Hendrik Ilves, former President of Estonia



High quality early childhood education

- Higher educational requirements for preprimary school (kindergarten) teachers.
- High participation percentage in early childhood education.
- Free support system for children (speech therapists, special education teachers).
- Financial support for parents preprimary education is financed partially from the state budget.



Equality- and equity-aware educational policy

 Equality: comprehensive school; free transport; free lunches and textbooks; free medical care; free hobby activities at school; hobby activities.

Equity: needs-based financing; free study support; individual curriculum plan; free long-day groups; state-funded places in boarding schools; counselling centres.

Estonian educational system is based on the comprehensive school principle

- Equal educational opportunities across the country, small share of private education, support for SEN students.
- Decentralized educational system.
- Schools' curricula are based on the national curriculum.
 - The first streaming takes place after grade 9 at the age of 16 (end of the basic school).
- Grade repeating is not allowed.

Improving teachers' and leaders' professional capacity

- Induction year and allowance for newly qualified teachers (2004).
- New professional standards for teachers (2013).
- Teachers' salaries have increased 31% between 2005-2013.
- The initial training of teachers is carried out at Master's level.

Schools are autonomous:

- They compile school curriculum based on national curriculum.
- Teachers are free to use teaching methods and textbooks of their own choice.
- Head master hires, fires, supports teachers according to the needs of the school.

Teachers in Estonia (OECD

2014)

- A larger proportion of teachers are female than in most other TALIS countries (84.5%).
- Teachers in Estonia are on average older than in most other TALIS countries (47.9 Years).
- On average, teachers in Estonia have spent more years teaching than in most other TALIS countries (21.6 Years).
- A larger proportion of teachers have completed a teacher education or training program than in most other TALIS countries (94.4 %).

Content and Language Integrated Learning (CLIL)

- Launched in 2000 by Innove, Estonian Language Immersion Programme is mostly implemented in Russian-medium kindergartens and schools, where the target language is Estonian.
- The launch of the two-way immersion model in 2015 Estonian and Russian.
- Joining the language immersion programme is voluntary for both educational institutions and children's families.
- There are 100 institutions in the programme: 63 kindergartens and 37 schools. Approx. 10 000 children participating.

National curriculum

- Separate for basic and secondary school.
- The transversal key competences are referred to as general competences which are considered to be essential for a pupil to become a well-rounded human being and a good citizen.
- 8 general competencies: value and culture; social and civic; self-management; learning to learn; communication; math, technology and science; digital competence; entrepreneurship.
- 4 school stages (instead of classes).



Attention to at-risk students and schools

SEN students may study at mainstream school and receive different kind of support:

- support for special education teacher, speech therapist;
- simplified national curriculum;
- individual education plan;
- study in smaller classes;
- additional learning and rehabilitation support (music therapy etc.);
- communication support (sign-language interpreter, study material in Braille, adapted study material etc.);
- state-funded place at the boarding school.

Needs-based approach to resource allocation



The funding is based on student numbers taking into account regional specifications differences and additional needs for SEN students.





"Matthews ... we're getting another one of those strange 'aw blah es span yol' sounds."

- Vale (ES) = Okay (EN)
- Vale (EE) = Wrong (EN)

External evaluation

- External evaluation of study results (1997) and well-being questionnaires (2016).
- Decreasing a role of external evaluation and increasing self-evaluation (2006).
- A new concept of external evaluation analytical and supportive role of the national level (2014).
- More stress on "soft values" like student wellbeing (student- teacher-parent), competencies and values.
- Development towards digital external evaluation.

Extra curricular activities

- All schools have school choirs and offer many extra-curricular activities.
- Many children attend hobby schools (learning music, dance, sports, art).



The purpose of testing?



We are giving back

HaridusSIIm / EducationEye consists statistics about all educational levels, youth, research.

- Performance indicators at school level, e.g.:
 - teachers qualifications
 - exam results
 - participation in extracurricular education (at school, outside school)
 - further studies proportion of students continuing at next stage etc.
- Effectiveness indicators (results and impacts).
- Educational expenditure.
- NEW! "The labour market success": graduates' salary and employment, http://www.haridussilm.ee/?leht=edukus_0

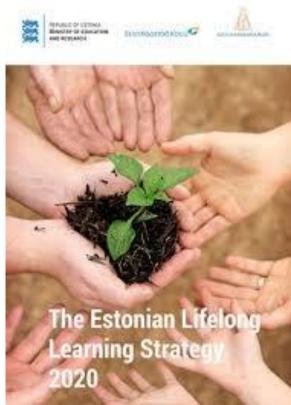
Why we are performing high in PISA?

- Stability, equity and equality!
- No big jumps, but still the smallest number of weak performers in Europe.
- Others falling behind, but for how long?
- That which brought us here will not lead us further.
- ...so we need a change.

What we would like to have?



National agreement: the education strategy for improving performance and equity



Estonian Lifelong Learning Strategy 2020

Vision and strategic goals for 2020

Vision for 2020: Learning is a lifestyle. Development opportunities are noticed and smart solutions are pursued.

WE TAKE RESPONSIBILITY

People understand that learning and self-development are their own choice and responsibility.

WE CARE FOR DEMAND

Studies are based on the learner's interests and capabilities, they support development and meet labour market needs.

WE PROVIDE OPPORTUNITIES

The lifelong learning system as a whole offers study opportunities that are of good quality, modern, flexible and cater to the special needs of the learner.

Lifelong Learning Strategy 2020 aims (1)

- Change in the approach to learning. Implementation of an approach to learning that supports each learner's individual and social development, the acquisition of learning skills, creativity and entrepreneurship at all levels and in all types of education.
- **Competent and motivated teachers and school leadership.** The assessments of teachers and headmasters including their salaries are consistent with the qualification requirements for the job and the work-related performance.

Lifelong Learning Strategy 2020 aims (2)

- Concordance of lifelong learning opportunities with the needs of labor market. LLL opportunities and career services that are diverse, flexible and of good quality, resulting in an increase in the number of people with professional or vocational qualifications in different age groups, and an increase in overall participation in LLL across Estonia.
- A digital focus in lifelong learning. An improvement in the digital skills of the total population has been achieved and access to the new generation of digital infrastructure is ensured.
- Equal opportunities and increased participation in lifelong learning.

New approach to external evaluation

- Done using e-service via EIS (information system for exams, tests and evaluations).
- Well-being questionnaires for kindergartens, for each level at school.
- Help for schools falling behind.
- E-testing at the end on each level.
- Collection of supportive e-exercises.
- More psychometric testing.

Interesting School initiative

- The initiative sends a clear joint message by the state and the public that going to school can and must be:
 - interesting;
 - developing a student's natural curiosity is important;
 - school must be creative.
- The initiative covers four important, fields in general education:
 - community involvement;
 - professional teachers;
 - optimal curricula;
 - supportive external evaluation processes.

E-school bag

It is the portal <u>https://e-koolikott.ee</u> which allows easy access to digital learning materials from one site.

- Consists of learning materials for preschool, general and vocational education.
- Possibility to create your own learning kits by compiling different learning materials.
- e-Koolikott allows providing feedback on the materials and highlighting the best practises.

By law, all educational literature created from May 2015 onwards must be accessible digitally.

Challenges (1)

- Increasing the availability of kindergarten places.
- Attractiveness of teacher-position and significant increase of teachers salaries.
- Rearrangement of the upper secondary school network and establishing state gymnasiums.
- Implementing the new approach to teaching and learning.

Challenges (2)

- Support to digitalization of education and better ICT skills.
- Early leavers from education and training.
- Differences between Estonian and Russian language students.
- VET should be more popular choice after basic education.







Question?

More information:

<u>www.Innove.ee/en</u>

<u>www.hm.ee/en</u>

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