



## Kasvatus 2022 Vol. 53 No 3 The Finnish Journal of Education

**Alisaari, Jenni – Kaukko, Mervi – Heikkola, Leena Maria. 2022. Am I enough? Can I help? Teachers' worries in relation to teaching students with migration background. The Finnish Journal of Education 53 (3), 229–244.**

This article discusses teachers' (n= 596) worries in relation to teaching students with migration background. We focus on the teachers' concerns about their own teacher identity and about schoolwork in general. The teachers' greatest concern was that they regarded their own skills as inadequate. Additionally, challenges related to evaluation, choosing teaching material and overall coping at work were mentioned. Concerns regarding schoolwork in general were about the lack of resources and the unsuitability of current practices. Other teachers' low expectations and negative attitudes towards students were also mentioned. The teachers often noted that schools fail to address the needs of students with migration background. The findings are in line with previous research on the topic: lack of resources, lack of teachers' competences and lack of flexibility in the structures. New solutions in teaching students with migration background are needed in order to improve teachers' ability to cope in their work, as well as to improve students' learning results. The challenges experienced by teachers cannot be addressed by mere changes in teacher education. Political action and structural changes are needed.

*Descriptors:* capabilities, migrant background, practices, resources, school, students, teachers

**Vilhunen, Elisa – Lavonen, Jari – Salmela-Aro, Katariina – Juuti, Kalle. 2022. Upper secondary school students' situational engagement in science instructional activities. The Finnish Journal of Education 53 (3), 245–258.**

This study investigates how instructional activities in science lessons relate to situational engagement experienced by students. Situational engagement is operationalised as optimal learning moments in which students experience simultaneously high levels of interest, skill, and challenge. The data were collected during the implementation of a project-based learning unit in upper secondary school physics classes. The participants' (101 students) situational engagement was measured using the experience sampling method. The instructional activities occurring just before the experience sampling measures were studied using video observations. Two-level regression analyses were conducted to study the relation between the instructional activities and the situational engagement. The results show that students experience situational engagement the most when doing tasks or analysing data and developing models. The pedagogical model in which the importance of interest, skill, and challenge in building up situational engagement is acknowledged can be used diversely in planning teaching and conducting instruction.

*Descriptors:* experience sampling method, instructional activities, optimal learning moments, project-based learning, situational engagement, upper secondary school

**Virtanen, Päivi – Metsäpelto, Riitta-Leena – Lappalainen, Kristiina – Laine, Anu. 2022. Connection of the student selection to self-rated skills among students in primary school teacher, special teacher, and early childhood education teacher programs. *The Finnish Journal of Education* 53 (3), 259–272.**

In this article, we examine the competences of first-year pre-service teachers by investigating their academic self-efficacy beliefs, acceptance of diversity as well as their emotional and deep processing strategies. The participants (N=394) were pre-service student teachers in class, special, and early childhood education programs who took part in the 2019 student selection. The selections were carried out in collaboration between the universities of Helsinki and Eastern Finland. The results indicated that the students self-rated their competences as strong or fairly strong. We found three different competency clusters among the pre-service teachers, which also differed in the student selection phase success and between the study programs. Our study shows that the two-phase student selection can differentiate students who have diverse competencies needed to develop skills which are necessary in a teacher's demanding profession. Our study confirms the usability of the two-phase joint application in the selection process for the educational sector, but also shows the need for researching further the student selection procedure.

*Descriptors:* competencies, student selection, teacher education, university

**Hilden, Raili – Ylinen, Sari – Huotilainen, Minna. 2022. Interfaces between language didactics, cognitive psychology, and brain science. *The Finnish Journal of Education* 53 (3), 273–286.**

All domains of life are currently multilingual. Therefore, it is necessary to explore how languages are taught, studied, and learnt. This is the core of language didactics, fertilized by cognitive and empirical research orientations. Cognitive perspectives on language learning have taken influence from brain science and cognitive neuroscience that investigate human cognition by measuring electromagnetic and metabolic brain activity instead of observing overt behavior. The dialogue between language didactics and brain science is scarce to date. This article sets out to describe how research findings from human brain and behavior contribute to understanding of language learning and how this knowledge could be used in language teaching. We also view future perspectives on utilizing methods of brain research in education and consider potential risks pertaining to them. Recognizing the interface between language didactics and brain research can focally promote language teaching and learning.

*Descriptors:* brain research, cognitive neuroscience, cognitive psychology, language didactics

**Pelkonen, Jenni – Kiuru, Noona – Virtanen, Tuomo. 2022. Why does a lower secondary school pupil not attend school? An integrative literature review of individual and contextual factors related to school attendance types. *The Finnish Journal of Education* 53 (3), 287–303.**

The aim of this integrative literature review is to identify individual (such as mental health, learning difficulties) and contextual factors (such as parenthood, school) that relate to lower secondary school students' school attendance problems (SAP) types (school refusal, truancy, school withdrawal, school exclusion). Relevant studies were retrieved from the ERIC, PsycInfo and Web of Science databases, and 53 articles were selected for the review. Truancy was the most studied SAP type (68 % of studies), followed by school exclusion (16 %) and school refusal (14 %). School withdrawal was the least studied (2 %) SAP type. Several individual and contextual factors were associated with the SAP types. Of the individual factors mental health problems and of the contextual factors low parental support, being bullied and school climate problems were associated with school refusal, truancy, and school exclusion.

*Descriptors:* contextual factors, individual factors, lower secondary school, school attendance types, school non-attendance