

Conceptualising micro-credentials in the higher education research landscape. A literature review

Cartis, Alexandru; **Leoste, Janika**; Iucu, Romiță; **Kikkas, Kaido**; **Tammemäe, Kalle**; Männik, Katrin Polyphonic construction of smart learning ecosystems : proceedings of the 7th Conference on Smart Learning Ecosystems and Regional Development 2023 / p. 191-203 https://doi.org/10.1007/978-981-19-5240-1_13 [Conference proceedings at Scopus](#) [Article at Scopus](#)

CyberPin - Challenges on recognizing youngest cyber talents

Lorenz, Birgy; Kikkas, Kaido; Talisainen, Aleksei; Eomäe, Taavi HCI for Cybersecurity, Privacy and Trust : Third International Conference, HCI-CPT 2021, Held as Part of the 23rd HCI International Conference, HCII 2021, Virtual Event, July 24–29, 2021 : proceedings 2021 / p. 326-336 https://doi.org/10.1007/978-3-030-77392-2_21 [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Conference Proceedings at WOS](#) [Article at WOS](#)

Cybersecurity within the curricula of informatics : the Estonian perspective

Lorenz, Birgy; Kikkas, Kaido; Sömer, Tiia; Laugasson, Edmund Informatics in Schools. New Ideas in School Informatics :12th International Conference on Informatics in Schools : Situation, Evolution, and Perspectives, ISSEP 2019, Larnaca, Cyprus, November 18–20, 2019 : proceedings 2019 / p. 159-171 https://doi.org/10.1007/978-3-030-33759-9_13 [Conference proceeding at Scopus](#) [Article at Scopus](#) [Conference proceeding at WOS](#) [Article at WOS](#)

Dances with the Illuminati: Hands on social engineering in a classroom setting

Mäses, Sten; Lorenz, Birgy; Kikkas, Kaido; Karmo, Kristjan New Perspectives in Behavioral Cybersecurity: Human Behavior and Decision-Making Models 2024 / 7 p <https://doi.org/10.1201/9781003415060-7>

Development of children's cyber security competencies in Estonia

Lorenz, Birgy; Kikkas, Kaido; Osula, Kairi Learning and Collaboration Technologies : Learning and Teaching : 5th International Conference : LCT 2018, Held as Part of HCI International 2018, Las Vegas, NV, USA, July 15-20, 2018 : Proceedings, Part II 2018 / p. 473–482 https://doi.org/10.1007/978-3-319-91152-6_36 [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Conference Proceedings at WOS](#) [Article at WOS](#)

A digital services course to promote teaching of informatics in Estonia

Kikkas, Kaido; Lorenz, Birgy Educating Engineers for Future Industrial Revolutions : Proceedings of the 23rd International Conference on Interactive Collaborative Learning (ICL2020). Volume 1 2021 / p. 711-720 https://doi.org/10.1007/978-3-030-68198-2_66 [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

E-koolitus mõõdukate kulutustega : vaba tarkvara e-õppes

Kikkas, Kaido A & A 2002 / 6, lk. 24-29

Eluga seotud Interneti abiga

Kikkas, Kaido Eesti Päevaleht 2001 / 27. veebr., lk. 11 : ill <https://epl.delfi.ee/artikkel/50799479/eluga-seotud-interneti-abiga>

Factors of socially engineering citizens in critical situations

Lorenz, Birgy; Kikkas, Kaido; Osula, Kairi Advances in Human Factors in Cybersecurity : proceedings of the AHFE 2018 : International Conference on Human Factors in Cybersecurity, July 21-25, 2018, Loews Sapphire Falls Resort at Universal Studios, Orlando, Florida, USA 2019 / p. 229-240 https://doi.org/10.1007/978-3-319-94782-2_23 [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

From traditional to challenge-based learning : a case study

Lorenz, Birgy; Kikkas, Kaido Proceedings of the European Conference on e-Learning, ECEL, vol. 23, 1 2024 / p. 227-234 <https://doi.org/10.34190/ecel.23.1.2516> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

A holistic approach to curriculum design and development in informatics education at the university level

Lorenz, Birgy; Kikkas, Kaido; Toom, Hanna; Lepikult, Toomas EDULEARN24: Proceedings 2024 / p. 468-477 <https://doi.org/10.21125/edulearn.2024.0192>

Infotehnoloogia ja interneti kasutamine Eesti puuetega inimeste seas - 1999. aasta ankeetuuringu tulemustest

Kikkas, Kaido A & A 1999 / 5, lk. 11-14: ill

Infotehnoloogia ja Interneti roll puuetega inimeste tööhõives

Kikkas, Kaido Puuetega inimeste sotsiaalne kaitse : valik piirkondlike seminaride ja rahvusvahelise konverentsi ettekandeid ja sõnavõtte : Euroopa Liidu Phare Consensus programm 1998 / lk. 38-43: ill

Infotehnoloogiasõnastik eripedagoogidele

Kikkas, Kaido 1998 https://www.ester.ee/record=b1061161*est

Inimene võrgus - mõned mõtted võrgusuhtluse erijoontest

Kikkas, Kaido A & A 2001 / 3, lk. 25-29

Innovating IT ethics education : The role of AI in course development

Lorenz, Birgy; Kikkas, Kaido Learning and Collaboration Technologies : 12th International Conference, LCT 2025, Held as Part of the 27th HCI International Conference, HCII 2025 : Proceedings, Part I 2025 / p. 328-338 https://doi.org/10.1007/978-3-031-93564-0_20

Interneti võimalustest puuetega inimeste integratsioonis

Kikkas, Kaido Sotsiaaltöö 1999 / 3, lk. 30-32; 4, lk. 22-24

Ise ei saa kohale minna? Pole viga, kaugosalusrobot läheb!

Kikkas, Kaido Postimees 2022 / Lk. 11 [Ise ei saa kohale minna? Pole viga, kaugosalusrobot läheb!](#)

Ise ei saa kohale minna? Pole viga, kaugosalusrobot saab!

Kikkas, Kaido postimees.ee 2022 / Lk. 11 [Ise ei saa kohale minna? Pole viga, kaugosalusrobot saab!](#) [Telepresence Robots in Higher Education – The Current State of Research](#) <https://dea.digar.ee/article/postimees/2022/11/23/10.1>

IT as a career choice for girls: breaking the (self-imposed) glass ceiling

Lorenz, Birgy; Kikkas, Kaido; Sömer, Tiia Proceedings of the 20th European Conference on e-Learning, ECEL : a Virtual Conference hosted by University of Applied Sciences HTW, Berlin, Germany, 28-29 October, 2021 2021 / p. 226–274 <https://doi.org/10.34190/EEL.21.022> https://www.academic-bookshop.com/ourshop/prod_7667575-ECEL-2021-Proceedings-of-the-20th-European-Conference-on-eLearning.html

IT võimalused puuetega inimeste hariduses

Kikkas, Kaido Konverents "Telemaatika '98 : infotehnoloogia Eesti koolis" 1998 / lk. 76-83: ill

IT-teadlaste manitsus : enne kui sisestate veebiavarusse oma krediitkaardiandmed, pange tähele...

Lorenz, Birgy; Kikkas, Kaido delfi.ee 2022 <https://forte.delfi.ee/artikkel/120110952/it-teadlaste-manitsus-enne-kui-sisestate-veebiavarusse-oma-krediitkaardiandmed-pange-tahele>

Kaido Kikkas : hea õppejõud on sangviinik, võib-olla isegi natuke artist

Kikkas, Kaido Mente et Manu 2019 / lk. 12-17 : fot https://www.ttu.ee/public/m/mente-et-manu/MM_05_2019/mobile/index.html https://www.ester.ee/record=b1242496*est

Kaido Kikkas: tehisaru hiilgus ja viletsus – ühe õppejõu vaade

Kikkas, Kaido Trialoog 2025 <https://trialoog.taltech.ee/kaido-kikkas-tehisaru-hiilgus-ja-viletsus-uhe-oppejou-vaade/>

Kas liikumispuudega inimene võib olla doonoriks?

Kikkas, Kaido Eesti Sõnumid 1995 / 28. veebr., lk. 10

Keeping distance with a telepresence robot : a pilot study

Leoste, Janika; Heidmets, Mati; Virkus, Sirje; Talisainen, Aleksei; Rebane, Martin; Kasuk, Tiina; Tammemäe, Kalle; Kangur, Katrin; Kikkas, Kaido; Marmor, Kristel Frontiers in education 2023 / art. 1046461 : ill <https://doi.org/10.3389/feduc.2022.1046461> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Kes juhib ennastjuhtivat õppijat?

Juurak, Raivo Õpetajate Leht 2023 / lk. 2-3 <https://dea.digar.ee/article/opetajateleht/2023/12/12/4.1> [Kes juhib ennastjuhtivat õppijat?](#)

Kitsaskohti andmekaitse rakendamisel koolides [Võrguväljaanne]

Lorenz, Birgy; Kikkas, Kaido; Baum, Anu; Metsäär, Tõnu opleht.ee 2021 ["Kitsaskohti andmekaitse rakendamisel koolides"](#)

Külaskäik : [vestlus Tallinna Tehnikaülikooli üliõpilase K. Kikkasega]

Kikkas, Kaido; Talving, S. Noorus 1991 / 10, lk. 38-40

Lifti asemel Internet ehk Iseseisev elu võrgu kaudu

Kikkas, Kaido Arvutimaailm 1999 / 7, lk. 34-36: ill https://artiklid.elnet.ee/record=b1001918*est

Lifting the iron curtain : [autobiography]

Kikkas, Kaido Disability and the life course : global perspectives 2001 / p. 113-122

A live virtual simulator for teaching cybersecurity to information technology students

Ernits, Margus; Kikkas, Kaido Learning and Collaboration Technologies : Third International Conference, LCT 2016, held as part of HCI International 2016, Toronto, ON, Canada, July 17-22, 2016 : proceedings 2016 / p. 474-486 : ill https://doi.org/10.1007/978-3-319-39483-1_43 [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Conference Proceedings at WOS](#) [Article at WOS](#)

"Minge kõike maailma ..." ehk kristlane võrguavarustes

Kikkas, Kaido Teekäija 1999 / sept., lk. 17-18

Mitte tehisreaalsus, vaid uus reaalsus: puuetega inimesed infoühiskonnas
Kikkas, Kaido A & A 1998 / 6, lk. 35-37

Muinasjutt Tiigrimaast muutub tegelikkuseks : [K.Kikkase, L.Võhandu, jt. mõtteid Tiigrihüppe Sihtasutuse aastakonverentsilt]

Liivak, Sander Alfred; **Kikkas, Kaido; Võhandu, Leo** Õpetajate Leht 1998 / 15. mai, lk. 4 https://artiklid.elnet.ee/record=b2321244*est

"Oma diagnoosi tõttu pole mul ükski vemp tegemata jäänud" : [vestlus TTÜ rehabilitatsioonitehnoloogia labori juhataja Kaido Kikkasega]

Põdra-Tensuda, Kaire; **Kikkas, Kaido** Terviseleht 1998 / 7. jaan., lk. 3: ill

Pedagogical challenges and ethical considerations in developing critical thinking in cybersecurity

Lorenz, Birgy; Kikkas, Kaido Proceedings IEEE 20th International Conference on Advanced Learning Technologies, ICALT 2020 : 6–9 July 2020, Online 2020 / p. 262-263 <https://doi.org/10.1109/ICALT49669.2020.00085>

Puuetega inimene ja infotehnoloogia

Kikkas, Kaido 1994 http://www.ester.ee/record=b2110949*est

Puuetega inimene küberruumis

Kikkas, Kaido Eesti Ekspress 1997 / 21. nov

Puuetega inimesed ja infotehnoloogia - Mis? Kuidas? Miks? : monograafia

Kikkas, Kaido 1995 https://www.ester.ee/record=b1068571*est

Puuetega inimesed ja infoühiskond : erivajadused ja erilahendused

Kikkas, Kaido A & A 1999 / 2, lk. 46-49: ill

Puuetega inimestest, Eesti ühiskonnast ja infotehnoloogiast

Kikkas, Kaido Sotsiaaltöö 1998 / 3, lk. 6-8: ill

Puuetest saab üle

Kikkas, Kaido Arvutimaailm 1998 / 6, lk. 32-33: ill https://artiklid.elnet.ee/record=b2003507*est

Reaching higher education : ideas and views on Internet-based education for people with severe mobility impairment in Estonia

Kikkas, Kaido Using Technology in Open and Distance Learning : proceedings of the 2nd International DETECH Workshop : University of Maribor, Slovenia, 2001 2001 / p. 107-116

The real chance offered by virtual world : people with disabilities, Internet and changing society

Kikkas, Kaido Frontiers of interstanding : [proceedings of the 4th Baltic Workshop on Creative Media : Royal Institute of Technology, Stockholm, Sweden, August 24-25, 2000] 2000 / p. 47-58 : ill https://www.ester.ee/record=b1419978*est

Tehisaru hiilgus ja viletsus – ühe õppejõu vaade

Kikkas, Kaido Mente et Manu 2025 / lk. 4-7 https://haldus.taltech.ee/sites/default/files/2025-06/MM_2025-2%20uus.pdf
<https://trialoog.taltech.ee/kaido-kikkas-tehisaru-hiilgus-ja-viletsus-uhe-oppejou-vaade/>

Tehisaru hiilgus ja viletsus : ühe õppejõu vaade

Kikkas, Kaido Mente et Manu 2025 / lk. 4-7 : fot https://www.ester.ee/record=b1242496*est 2/2025

Telepresence robots in higher education - the current state of research

Leoste, Janika; Kikkas, Kaido; Tammemäe, Kalle; Rebane, Martin; Laugasson, Edmund; Hakk, Kristiina Robots in education : RiE 2022 2022 / p. 124-134 https://doi.org/10.1007/978-3-031-12848-6_12 [Conference proceedings at Scopus](#) [Article at Scopus](#)
[Article at WOS](#)

Through the pandemic and into the AI era: Transformations of an asynchronous e-course

Kikkas, Kaido; Lorenz, Birgy Futureproofing Engineering Education for Global Responsibility : Proceedings of the 27th International Conference on Interactive Collaborative Learning (ICL 2024) ; vol. 3 2025 / p. 457-468 https://doi.org/10.1007/978-3-031-83523-0_42

Tiigrihüppe Sihtasutuse aastakonverentsilt : [kokkuvõtteid sõnavõttudest]

Kikkas, Kaido Arvutimaailm 1998 / 6, lk. 4-5: ill

Training young cybersecurity talents – The case of Estonia

Kikkas, Kaido; Lorenz, Birgy HCI International 2020 - Posters : 22nd International Conference, HCI 2020, Copenhagen, Denmark, July 19-24, 2020, Proceedings, Part II 2020 / p. 256-263 https://doi.org/10.1007/978-3-030-50729-9_36 [Conference proceeding at](#)

"Trust me, you will need it" : cybersecurity as extracurricular subject at Estonian schools

Lorenz, Birgy; Kikkas, Kaido HCI for Cybersecurity, Privacy and Trust : Second International Conference, HCI-CPT 2020, Held as Part of the 22nd HCI International Conference, HCII 2020, Copenhagen, Denmark, July 19–24, 2020 : proceedings 2020 / p. 175-188
https://doi.org/10.1007/978-3-030-50309-3_12 [Conference proceedings at Scopus](#) [Article at Scopus](#)

Unlocking latent potential : a longitudinal study on enhancing skill diversity in cybersecurity through competitions

Lorenz, Birgy; Kikkas, Kaido; Toom, Hanna EDULEARN24 Proceedings 2024

Using language translation software to detect and classify cyberattacks from suspected cyberattackers from specific countries and languages

Patterson, Wayne; Azzoni, Carlos; Florea, Diana; **Kikkas, Kaido; Lorenz, Birgy**; Malachias, Rosangela; Vagulin, Leonid; Yu, William New perspectives in behavioral : cybersecurity II human behavior for business, profiling, linguistics and voting 2025
<https://www.routledge.com/New-Perspectives-in-Behavioral-Cybersecurity-II-Human-Behavior-for-Business-Profiling-Linguistics-and-Voting/Patterson/p/book/9781032983523>

Using the Internet in rehabilitation of people with mobility impairments - case studies and views from Estonia

Kikkas, Kaido 1999 https://www.ester.ee/record=b1273065*est

Uued inimesed ja positsioonid

Tammet, Tanel; Uska, Riina; Laanearu, Janek; Tabri, Kristjan; Vendelin, Marko; Margus, Madis; Kindsigo, Merit; Talpsepp, Tõnn; Tähemaa, Toivo; Laos, Katrin; Liiv, Innar; Rüttnann, Tiia; Sarapuu, Külli; Kikkas, Kaido; Pachel, Karin Mente et Manu 2022 / lk. 40-49 : fot https://www.ester.ee/record=b1242496*est

Vaba mees ratastoolis

Kikkas, Kaido Arvutimaailm 1997 / 1, lk. 44-46 https://artiklid.elnet.ee/record=b2002891*est

Video- ja võrgupõhine kaugõpe puuetega inimestele : [koostöös Sloveenia Maribori Ülikooli kaugkoolituse arenduskeskusega koordineeritud seminarist]

Kikkas, Kaido Mente et Manu 2002 / 23. apr., lk. 4 : fot https://www.ester.ee/record=b1242496*est

Virtuaalne juurdepääsutee : puuetega inimesed ja internet

Kikkas, Kaido A & A 1999 / 4, lk. 35-39

WWW ja HTML : abiks algajale võrguhuvilisele

Kikkas, Kaido 1998 https://www.ester.ee/record=b1053808*est

WWW ja puuetega kasutajad : kas igasugune HTML on inimsõbralik?

Kikkas, Kaido Arvutustehnika ja Andmetöötlus 1997 / 1, lk. 54-59

Õpитеhnoloogia standarditest. I, Õpihaldussüsteemide koostöömimise suunas

Laanpere, Mart; **Kikkas, Kaido** A & A 2002 / 6, lk. 30-37