

A phantom study for the validation of a surgical navigation system based on real-time segmentation and registration methods

Maris, B.; Ristolainen, Asko; Li, Lin; Gavšin, Juri International journal of computer assisted radiology and surgery 2013 / p. 381-382 : ill

Aerial imagery classification and path planning

Hudjakov, Robert; Tamre, Mart 12th International Symposium "Topical Problems in the Field of Electrical and Power Engineering." Doctoral School of Energy and Geotechnology II : Kuressaare, Estonia, June 11-16, 2012 2012 / p. 147-148 : ill

Aerial imagery terrain classification for long-range autonomous navigation

Hudjakov, Robert; Tamre, Mart Proceedings of International Symposium on Optomechatronic Technologies : ISOT 2009 2009 / p. 88-91 <https://ieeexplore.ieee.org/document/5326104>

Analysing the actual use of controller-pilot data link communications

Orye, Erwin; Visky, Gabor; Maennel, Olaf Manuel Engineering Proceedings 2022 / art. 18 <https://doi.org/10.3390/engproc2022028018>

Automatic vessel identification system

Haavel, Rein; Tani, Harry BEC 2002 : proceedings of the 8th Biennial Baltic Electronics Conference : October 6-9, 2002, Tallinn, Estonia 2002 / p. 181-182 : ill

Channel maintenance planning in Estonia

Utso, Maarius; Zaitseva-Pärnaste, Inga; Parnell, Kevin Ellis Journal of coastal research 2024 / p. 95–99 <https://doi.org/10.2112/JCR-SI113-019.1>

Characteristics of high-resolution sea ice dynamics in the Gulf of Finland, Baltic Sea

Lilover, Madis-Jaak; Pavelson, Juss; Kõuts, Tarmo; Leppäranta, Matti Boreal environment research 2018 / p. 175–191 <http://www.borenv.net/BER/pdfs/ber23/ber23-175-191.pdf>

Classifying the ice seasons 1982-2016 using the weighted ice days number as a new winter severity characteristic

Rjazin, Jevgeni; Alari, Victor; Pärn, Ove EUREKA : physics and engineering 2017 / p. 49-56 : ill <http://dx.doi.org/10.21303/2461-4262.2017.00364>

Control and remote monitoring system of Aids to Navigation

Haavel, Rein; Heinla, Ü.; Käärman, L.; Pikpoom, T.; Rebane, R.; Tani, Harry BEC 2002 : proceedings of the 8th Biennial Baltic Electronics Conference : October 6-9, 2002, Tallinn, Estonia 2002 / p. 207-210 : ill

Declarative ship arenas under favourable conditions

Zarzycki, F.; Gil, M.; Montewka, Jakub; Szlapczyński, R.; Szlapczyńska, J. Ocean Engineering 2025 / art. 119927 <https://doi.org/10.1016/j.oceaneng.2024.119927>

Differential pressure sensor speedometer for autonomous underwater vehicle velocity estimation

Meurer, Christian; Francisco Fuentes-Perez, Juan; Palomeras, Narcis; Carreras, Marc; Kruusmaa, Maarja IEEE Journal of Oceanic Engineering 2020 / p. 946 - 978 <https://doi.org/10.1109/JOE.2019.2907822> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Differential pressure sensors for underwater speedometry in variable velocity and acceleration conditions

Fuentes-Perez, Juan Francisco; Meurer, Christian; Tuhtan, Jeffrey Andrew; Kruusmaa, Maarja IEEE Journal of Oceanic Engineering 2018 / p. 418-426 : ill <https://doi.org/10.1109/JOE.2017.2767786> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Don't do things that you can't undo : reversibility models for generating safe behaviours

Kruusmaa, Maarja; Gavšin, Juri; Eppendahl, A. Proceedings of the 2007 IEEE International Conference in Robotics and Automation : ICRA'07 : Rome, Italy, 10-14 April 2007 2007 / p. 1134-1139 <https://ieeexplore.ieee.org/document/4209241>

Dynamic positioning system for the multifunctional vessel EVA-316

Subarev, Kirill; Vinnikov, Dmitri; Laugis, Juhan 8th International Workshop on Research and Education in Mechatronics 2007 : 14-15 June 2007, Tallinn, Estonia 2007 / p. 142-145 : ill

Eesti navigatsioonisüsteemid on maailmas ühed hinnatumad : [Cybernetica toodangust]

Paris, Krister Eesti Päevaleht 2005 / 13. apr., Ärileht, lk. 14 : ill

English for maritime students

2018 http://www.ester.ee/record=b4762829*est

EU Phare Twinning project "Strengthening enforcement of maritime safety"

Heering, Dan Maritime security and MET 2005 / p. 97-106 <https://www.witpress.com/books/978-1-84564-058-3>

Exercise Neptune : maritime cybersecurity training using the navigational simulators

Lovell, Kieren Nicolas Proceedings of the 5th Interdisciplinary Cyber Research Conference 2019 : 29th of June 2019, Tallinn University of Technology 2019 / p. 34-37 https://www.ester.ee/record=b5238490*est

Formal development of multi-vessel navigation of maritime autonomous systems using UPPAAL STRatego

Shokri-Manninen, Fatima; **Vain, Jüri**; Walden, Marina 32nd Nordic Workshop on Programming Theory, NWPT 2021, Reykjavik, Iceland, and online, 4-6 November 2021 2021 / 4 p <http://icetcs.ru.is/nwpt21/abstracts/paper7.pdf> <http://icetcs.ru.is/nwpt21/programme.html>

Formal verification of COLREG-Based Navigation of maritime autonomous systems

Shokri-Manninen, Fatima; **Vain, Jüri**; Walden, Marina Software Engineering and Formal Methods : 18th International Conference, SEFM 2020, Amsterdam, The Netherlands, September 14-18, 2020 : Proceedings 2020 / p. 41-59 https://doi.org/10.1007/978-3-030-58768-0_3 [Conference Proceedings at Scopus](#) [Article at Scopus](#) [Conference Proceedings at WOS](#) [Article at WOS](#)

The forthcoming Baltic Sea Chart Datum 2000 – how harmonized height reference benefits sustainability

Schwabe, Joachim; Ågren, Jonas; Liebsch, Gunter; **Varbla, Sander**; **Ellmann, Artu**; Teitsson, Hergeir; Forsberg, Rene; Strykowski, Gabriel; Bilker-Koivula, Mirjam; Westfeld, Patrick XXVIII General Assembly of the International Union of Geodesy and Geophysics (IUGG) 2023 <https://doi.org/10.57757/IUGG23-2441>

From ADAS to Material-Informed Inspection : Review of Hyperspectral Imaging Applications on Mobile Ground Robots

Valme, Daniil; **Rassõlkin, Anton**; **Liyanage, Dhanushka Chamara** Sensors 2025 / art. 2346 <https://doi.org/10.3390/s25082346> <https://www.mdpi.com/1424-8220/25/8/2346>

Global 3D map merging methods for robot navigation = 3D globaalkaardi ühendamise meetodid roboti navigeerimiseks

Shvarts, Dmitry 2013 https://www.ester.ee/record=b2967928*est

GPS jamming hard to combat

Rohemäe, Maria-Ann news.err.ee 2024 [GPS jamming hard to combat](#) [GPS jamming hard to combat](#)

GPS-i segamisel võib olla mitu põhjust

Lauri, Vahur err.ee 2024 [GPS-i segamisel võib olla mitu põhjust](#)

Influence of compressive ice force in bow-to-aft ship collision

Tabri, Kristjan; Goerlandt, Floris; Kujala, Pentti The 7th International Conference on Collision and Grounding of Ships and Offshore Structures : ICCGS 2016 : 15th-18th June, 2016, University of Ulsan, Ulsan, Korea 2016 / p. 131-137 : ill

An investigation of winter navigation and icebreaker needs in the ice-infested water: The gulf of Finland and the Gulf of Riga

Lu, Liangliang; Kondratenko, Aleksandr; Kulkarni, Ketki; Li, Fang; Kujala, Pentti Jouko Sakari; Musharraf, Mashrura Proceedings of the International Conference on Offshore Mechanics and Arctic Engineering - OMAE 2024 ; Vol. 6 2024 / OMAE2024-127955, V006T07A006 ; 8 pages <https://doi.org/10.1115/OMAE2024-127955>

Kiviga päikest tabamas

Albri, Rein Paat & Meremees 2015 / lk. 98-99 : ill https://artiklid.elnet.ee/record=b2742523*est

Level ice-structure interaction simulations using solid and shell elements

Kõrgesaar, Mihkel; **Tabri, Kristjan**; Avi, Eero Proceedings of the International Conference on Offshore Mechanics and Arctic Engineering - OMAE 2024 ; Vol. 6 2024 / art. v006t07a008 <https://doi.org/10.1115/OMAE2024-128141>

Maritime Cybersecurity

2025 <https://doi.org/10.1007/978-3-031-87290-7>

Meri veres

Albri, Rein 2023 https://www.ester.ee/record=b5563079*est

Modeling the trajectory tracking accuracy of an autonomous catamaran patrol vessel under different positional data disturbance conditions

Udal, Andres; **Kaugerand, Jaanus**; **Mölder, Heigo**; **Astrov, Igor**; **Bauk, Sanja** MT '24 : 10th International Conference on Maritime Transport : Barcelona, Spain, 5-7 June, 2024 2024 / p. 1-15 : ill <https://doi.org/10.5821/mt.13165> <http://hdl.handle.net/2117/409463>

Motion control of a hovering biomimetic four-fin underwater robot

Salumäe, Taavi; Chemori, Ahmed; **Kruusmaa, Maarja** IEEE Journal of Oceanic Engineering 2019 / p. 54 - 71 <https://doi.org/10.1109/JOE.2017.2774318> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Muhumaa : loodus, aeg, inimene

Rullingo, Ago 2001 https://www.ester.ee/record=b1221826*est

Navigation for autonomous mobile robots

Leoste, Margus Тезисы докладов I международной (XII всероссийской) конференции по автоматизированному электроприводу, 26-28 сентября 1995 г., Санкт-Петербург 1995 / с. 76

Operational wave height monitoring using navigation buoys and marine radars in the Baltic Sea [Online resource]

Kõuts, Tarmo; Rikka, Sander; Käärman, Leo; Usk, Aivar Operational oceanography serving sustainable marine development : Proceedings of the Eighth EuroGOOS International Conference, 3-5 October 2017, Bergen, Norway 2018 / p. 157-163 : ill <http://eurogoos.eu/download/publications/EuroGOOS-2017-Conference-Proceedings.pdf>

Ortophoto analysis for UGV long-range autonomous navigation

Hudjakov, Robert; Tamre, Mart Estonian journal of engineering 2011 / 1, p. 17-27 : ill

Probabilistic analysis of operational ice damage for Polar class vessels using full-scale data

Suominen, Mikko; **Kõrgesaar, Mihkel**; Taylor, Rocky; Bergstrom, Martin Structural safety 2024 / art. 102423 <https://doi.org/10.1016/j.strusafe.2023.102423>

Raadiolokatsioon

Riikoja, Helmut Erik Populaar- ja rakendustehniline kogumik. 2 1949 / lk. 28-33 : ill https://www.ester.ee/record=b1435798*est

Raamatuveerud : [Rein Loodla raamatu "Navigatsioon" tutvustus]

Noor, Ilmar Meremees 2014 / lk. 26

RACON modernization by digital signal processing

Arro, Ilmar; Kinks, Priit; Koževnikov, Valeri; Laidvee, Andres; Taklaja, Andres BEC'98 : the 6th Biennial Conference on Electronics and Microsystems Technology, October 7-9, 1998, Tallinn, Estonia : proceedings 1998 / p. 309-312: ill

Report on availability and re-processing procedure of the historical marine gravity data of the southern and eastern Baltic Sea

Wilde-Piorko, M.; Bauer, T.; Bilker-Koivula, M.; **Ellmann, Artu**; Kaminskis, J.; Krynski, J.; Olsson, P.-A.; Olszak, T.; Paršeliunas, E. K.; Rosowiecka, O.; Schwabe, J.; Strykowski, G.; Szelachowska, M.; Szulwic, J.; Tomczak, A.; **Varbla, Sander**; Zuševics, V. 2023 https://interreg-baltic.eu/wp-content/uploads/2023/10/report_historical_final.pdf

Report on the homogenized historical marine gravity data of the southern and eastern Baltic Sea

Wilde-Piorko, M.; Schwabe, J.; Strykowski, G.; **Varbla, Sander**; Bauer, Tobias; Bilker-Koivula, Mirjam; Dykowski, P.; **Ellmann, Artu**; Josefsson, Ö.; Kaminskis, J. 2024 https://interreg-baltic.eu/wp-content/uploads/2024/11/report_homogenized_final.pdf

Simulating Cyber-Attacks on the Unmanned Sea-Surface Vessel's Rudder Controller

Astrov, Igor; Bauk, Sanja Maritime Cybersecurity 2025 / p. 83-102 https://doi.org/10.1007/978-3-031-87290-7_5

State estimation and control for small low-cost autonomous underwater vehicles = Meetodid olekute hindamiseks ja juhtimiseks soodsa hinnaga autonoomsetele allveerobotitele

Meurer, Christian 2021 https://www.ester.ee/record=b5435482*est <https://digikogu.taltech.ee/et/Item/717111f2-51e3-4176-b0b8-b369064b26a2> <https://doi.org/10.23658/taltech.27/2021>

System level simulation of the winter navigation in the Baltic Sea

Kujala, Pentti Jouko Sakari; Kulkarni, Ketki; Kondratenko, Aleksandr; Lu, Liangliang; Winberg, Christine; Li, Fang; Musharraf, Mashrura Proceedings of 15th International Marine Design Conference (IMDC-2024) 2024 / p. 408-420 <https://doi.org/10.59490/imdc.2024.902>

A systematic review of cutting-edge radar technologies : applications for unmanned ground vehicles (UGVs)

Ersü, Can; Petlenkov, Eduard; Janson, Karl Sensors 2024 / art. 7807 <https://doi.org/10.3390/s24237807> [Journal metrics at Scopus](#) [Article at Scopus](#) [Journal metrics at WOS](#) [Article at WOS](#)

Systems-theoretic process analysis of maritime traffic safety management in the Gulf of Finland (Baltic Sea)

Aps, Robert; **Fetissov, Mihhail**; Goerlandt, Floris; Kujala, Pentti; Piel, Are Procedia engineering 2017 / p. 2-12 : ill <https://doi.org/10.1016/j.proeng.2017.03.090> [Conference proceedings at Scopus](#) [Article at Scopus](#) [Article at WOS](#)

Tallinna tehnikaülikooli lektor selgitab, miks GPSi segaja mõjutab just eriti lennuliiklust

Arula, Eili tartupostimees.ee 2024 [Tallinna tehnikaülikooli lektor selgitab, miks GPSi segaja mõjutab just eriti lennuliiklust](#)

Towards navigational safety of ecosystem based Maritime Spatial Planning solutions

Fetissov, Mihhail; Aps, Robert; Katus, Kaidi; **Tõnismaa, Olev** SHS Web of Conferences 2018 / art. 01008, 7 p. : ill <https://doi.org/10.1051/shsconf/20185801008>

Ujednolicone morskie mapy grawimetryczne południowego i wschodniego Bałtyku dla współczesnych zastosowań 3D w geodezji morskiej, geologii i nawigacji (BalMarGrav)

Wilde-Piorko, Monika; Bauer, Tobias; Bilker-Koivula, Mirjam; Dykowski, Przemysław; **Ellmann, Artu; Varbla, Sander** I kongres geoinformacyjny : X ogólnopolskie sympozjum geoinformacyjne : „Współczesne technologie geoinformacyjne w modelowaniu przestrzeni” Kraków, 25 – 27 X 2023 : streszczenia referatów 2023 / p. 41-42 https://kongres-geo.pl/application/files/3316/9822/3649/ksiega_abstraktow_v03.pdf

Universal navigation algorithm planning platform for unmanned systems

Sell, Raivo; Leomar, Priit Proceedings of International Conference Mechatronic Systems and Materials : Vilnius, Lithuania, 22-25 October 2009 2009 / p. 63-64

https://www.researchgate.net/publication/243762582_Universal_Navigation_Algorithm_Planning_Platform_for_Unmanned_Systems

Universal navigation algorithm planning platform for unmanned systems

Sell, Raivo; Leomar, Priit Mechatronic systems and materials : mechatronic systems and robotics 2010 / p. 405-410 : ill

https://www.researchgate.net/publication/243762582_Universal_Navigation_Algorithm_Planning_Platform_for_Unmanned_Systems

UWB and GNSS Sensor Fusion Using ML-Based Positioning Uncertainty Estimation

Tommingas, Mihkel; Laadung, Taavi; Varbla, Sander; Mürsepp, Ivo; Alam, Muhammad Mahtab IEEE Open Journal of the Communications Society 2025

Wave height measurement as a secondary function of navigational buoys

Moorits, Erkki; Usk, Aivar; Kõuts, Tarmo Info- ja kommunikatsioonitehnoloogia doktorikooli IKTDK kuuenda aastakonverentsi artiklite kogumik : 3.-5. oktoobril 2012, Laulasmaa 2012 / p. 53-57 : ill

Whisker-based tactile navigation algorithm for underground robots

Kossas, Tanel; Remmas, Mohamed Walid; Gkliva, Roza; Ristolainen, Asko; Kruusmaa, Maarja 2024 IEEE International Conference on Robotics and Automation (ICRA) 2024 / p. 13164-13170 <https://doi.org/10.1109/ICRA57147.2024.10610762> [Conference proceedings at Scopus](#) [Article at Scopus](#)

Преподаватель Taltech рассказал, почему глушитель GPS влияет на авиасообщение

Arula, Eili; **Mürsepp, Ivo** rus.postimees.ee 2024 [Преподаватель Taltech рассказал, почему глушитель GPS влияет на авиасообщение](#)