Curriculum Vitae **Thomas Porathe**

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Personal information

Name: Thomas Porathe
Date of birth: 10 March 1954
Address: Department of Product Design,
Norwegian University of Science and Technology
(NTNU), Kolbjørn Hejes vei 2b, NO-7491
Trondheim, Norway
Mobile: +46 70 668 1819
Email: thomas.porathe@ntnu.no
Home address: Ørjaveita 2, NO-7010 Trondheim,
Norway

Academic degrees

2001-2006 Ph.D. Innovation and Design (Information Design), Dep. of Innovation, Design and Product Development, Mälardalen University, Sweden
1977-1980 B.A. in acting, National Drama School (Statens scenskola) at Göteborg University, Sweden

Professional experience

Present position

- 2014- Full professor of Interaction Design at the Department of Product Design at Norwegian University of Science and Technology in Trondheim, Norway.

Earlier positions

- 2013-2014 Associate professor (docent) in Human Factors at the Department of Shipping and Marin Technology at Chalmers University of Technology in Göteborg, Sweden
- 2011-2013 Assistant professor (universitetslektor) in Human Factors at the department of Shipping and Marin Technology at Chalmers University of technology in Göteborg, Sweden
2010-2011 Researcher/guest lecturer in Human Factors at the department of Shipping and Marin Technology at Chalmers University of technology in Göteborg (80 %).
- 2010 - 2011 Assistant professor (universitetslektor) in Information Design at the school of Innovation, Design and engineering (IDT), at Mälardalens University (MDH) in Eskilstuna. (20 %)
- 2008 - 2010 Researcher/guest lecturer in Human Factors at the department of Shipping and Marin Technology at Chalmers University of technology in Göteborg (20 %).
- 2006 - 2010 Assistant professor (universitetslektor) in Information Design at the school of Innovation, Design and engineering (IDT), at Mälardalens University in Eskilstuna. (100 %)

- 2001 - 2006 Lecturer (universitetsadjunkt) in Information Design at the department of Innovation, Design and Product development (IDT) at Mälardalen University.
- 1995 - 2001 Entrepreneur (egen företagare): Sagopråmen Science Media, multimedia, web production and illustrations.See examples on illustrations and jobs on http://www.sagopramen.se/
- 1984 -1995 Freelance actor. E.g. Uppsala Stadsteater, Unga Riks, Västernorrlands Regionteater, Sveriges Radio and SVT, directed radio drama and teacher in drama at the Operahögskolan in Stockholm and on SVT:s internal education program for drama directors and camera crews.
- 1983-84 Actor, director and artistic director for Malmö Metropolitan Theatre's *Young Theatre*
- 1980-83 Actor at Malmö Metropolitan Theatre.

Language skills: Swedish (native), English (fluent), German (basic), French (basic)

Teaching and research interests

Information and interaction design, human factors. Main research interest usability and human-centered map design. Has since 2001 been working with research on and development of a new type of egocentric view 3D nautical charts targeting cognitive off-loading. Particularly interested in methods of user-centered design and usability.

Entrepreneurial Achievements
- 2001-2007 Founder and owner of 3D Islands AB, for research and development of 3D nautical charts.
- 2004 Patent on Depth database structure
- 2005 Patent of Intelligent leading lines in nautical charts
- 1996-2001 Owner of multimedia company "Sagopråmen" (children's CD-ROM productions)

Education

Exams
- 2006: Ph.D. (teknologie doktorsexamen) from Mälardalen University in Innovation and Design (Information Design). Confirmed (promoverad) in 2007 in Västerås.
- 1980: B. A. in acting from Scenskolan at University of Gothenburg (presently Academy of Music and Drama).

Scientific education:
2009 University of Uppsala: Brain and behavior, 7,5 hp.
2002-03 Mälardalen University:

       Information design, overview, 5 p.
       Innovation and design, 10 p.
       Research methods, 5 p.
       Information design, esthetics and semiotics, 5 p.
       Information design, user testing and design, 5 p.
       Statistics for Ph.D. students, 5 p.

2001-02 University of Linköping:
          Geographical information systems, 5 p.
          Geographical information systems 2, 5 p.
          GIS/Econometrics, 5 cp.
          Advanced Course in IT, GIS and Mobility, 5p.
1995-96 KTH Royal Institute of Technology, Stockholm
          Multimedia development, 10 p.
          Electronic publication, 5 p.
1993 University of Uppsala
          Nature and Man, 5 p.
          1992-94 Studies of the Technical Physics program at the University of
          Uppsala .
          Computer user, 4.6 p.
          Numerical analysis1, 4.6 p.
          Basic algebra 3.4 p.
          Technical orientation 1, 2.5 p.
          Mechanics 8.1 p.
          Electricity 4.8 p.
          Electronics 4.2 p.
          Wave motion5.2 p.
          Business economics 2.6 p.
          Technical orientation 2, 3.5 p.
1980-90 Courses at the Dramatic Institute in Stockholm:: Radio theater direction,
Theater as picture, TV drama directing, three camera technique
1977-80 Drama school at University of Gothenburg 120 p.
1974-75 Painting at École National Superiure des Beux-Arts, Paris
1974 Science of literature AB3, at University of Gothenburg, 15 p.

Pedagogic education:
Course design and university pedagogic, university pedagogical course 3, MDH,
2008
The university teacher, university pedagogical course 1, MDH, 2007
Supervision for Ph.D. students, MDH and University of Karlstad, 2007
The student and learning, university pedagogical course 2, MDH, 2006
Pedagogisk meritportfölj course, MDH, 2006

Teaching
2018
- NTNU: Information Visualisation, 7.5 hp. 2018-01-09 to 2018-04-24
- NTNU: Human Centred Design, 7.5 hp. 2018-08-21 to 2018-11-20

2017
- NTNU: Information Visualisation, 7.5 hp. 2017-01-17 to 2017-04-25
- NTNU: Human Centred Design, 7.5 hp. 2017-08-22 to 2017-11-21

2016
- NTNU: Information Visualisation, 7.5 hp. 2016-01-14 to 2016-05-03
- NTNU: Human Centred Design, 7.5 hp. 2016-08-23 to 2016-11-22

2015
- NTNU: Human Centred Design, 7.5 hp. 2015-08-19 to 2015-11-18

2013

- Chalmers: Master program in Maritime logistics: Research methods, 7.5 p. 2013-10-30 to 2013-12-12

- Chalmers/GU Interaction design master program: Information Visualization 2012-01-21 to 2011-03-07

2012
- Chalmers, Nordic Master: Research Methods, 7,5 hp, 2012-10-05 to 2012-11-21

- Chalmers/GU Interaction design master program: Information Visualization 2012-01-17 t0 2011-03-08

- Chalmers, Nordic Master, Master Thesis course, 7,5 hp. 2011-12-15 to 2012-05-31

2011
- Dalian Maritime University, China: Sino-European Usability Center: Quantitative research methods and experimental design. 2011-10-11 to 2011-12-13

- Chalmers, Nordic Master, Master Thesis course, 7,5 hp. 2010-12-15 to 2011-06-01

2010
- Chalmers: Human Factors, (SJO236) , Master Level. English., 2010-09-03 to 2010-11-23

- MDH: Cognitive processes, (KIT104) Under graduate level, core course in Information Design, 2010-03-29 - 2010-04-28

2009
- MDH: Cognitive processes, (KIT104) Under graduate level, core course in Information Design,, 2009-03-23 - 2009-04-24

- Chalmers: Human Factors, (SJO235) , Master Level. English, 2009-10-01 - 2009-11-17

- MDH: User Experience - kvalitativ och kvantitativ utprovning, (ITE203) , Under graduate level, core course in Interaction Design, 2009-09-02 - 2009-10-28

2008
- MDH: VR Visualization, (KIT186) Under graduate level,, 2008-08-26 - 2008-10-24

- Istanbul: Interaktionsdesign, kreativt tänkande för traditionellt K, (ki1820) Under graduate level, international course in English, 2008-06-09 - 2008-07-11 (Utrecht School of the Arts, Holland, Joanneum FHS, Graz, Austria & Gildiz Technical University, Istanbul, Turky)

- MDH: Kognitiva processer, (KIT104) Under graduate level, core course in Information Design, 2008-03-31 - 2008-05-02

- MDH: Interaction Design, (KIT906) Master Level., 2008-03-31 - 2008-05-02

- MDH: VR Visualization, (KIT176) Distance course, Under graduate level, 2008-01-21 - 2008-06-06

2007
- MDH: Instruction Design, (KIT903) Master Level. 2007-12-03 - 2008-01-18

- MDH: Informationsdesign i teori och praktik B 1, (KIT003) Under graduate level, core course in Information Design, 2007-10-29 - 2007-11-30

- Istanbul: Interaktionsdesign, kreativt tänkande för traditionellt K, (ki1820) Under graduate level, international course in English. 2007-06-11 to 2007-07-12. (Utrecht School of the Arts, Holland, Joanneum FHS, Graz, Austria & Gildiz Technical University, Istanbul, Turky)

- MDH: Informationsdesign i teori och praktik B 2,(ki0040) Under graduate level, core course in Information Design, 2007-01-22 - 2007-02-23

- MDH: VR Visualization, (ki1760/kn3130) Distance course, English, Under graduate level, 2007-01-22 - 2007-06-08

2006
- MDH: 3D-modellering, grundkurs, (ki1840) Distance course, Under graduate level, 2006-08-21 - 2007-01-19

- MDH: 3D Modeling, Basic Course, (ki1850) Distance course, English, Under graduate leve,, 2006-08-21 - 2007-01-19

- MDH: Informationsdesign i teori och praktik B 1, (ki0030) Under graduate level, core course in Information Design, 2006-10-30 - 2006-11-30

- MDH: VR Visualization, (ki1760/kn3130) Distance course, English, Under graduate level, 2006-01-23 - 2006-06-09

- MDH: Informationsdesign i teori och praktik B 1, (ki0030) Under graduate level, core course in Information Design, 2006-04-04 - 2006-05-05

2005
- MDH: 3D-modellering, grundkurs, (ki1730) Distance course, Under graduate level, 2005-08-22 - 2006-01-20

- MDH: Informationsdesign i teori och praktik B 1, (ki0030) Under graduate level, core course in Information Design, 2005-10-31 - 2005-12-02

- MDH: Interaktiv Berättarteknik, (ki1780) Under graduate level, 050404 - 050610

- MDH: VR-visualisering, (ki1760/kn3130) Under graduate level, 050228-050408

2004
- TDK: Informationsdesign, metod och utprovning, (ki7500) Distance cours, Master level, 040904 - 041113 (Linköping University, Malmö högskola)

- MDH: Interaktiv Berättarteknik, (ki1780) Under graduate level 040329 - 040604

- MDH: VR-visualisering 1, (ki1760) Under graduate level 040119 - 040220

- MDH: VR-visualisering 2, (kn3130) Under graduate level 040119 - 040326

2003
- MDH: 3D-animering (Animation 2), (ki3170) , Under graduate level 031208 - 040116

- TDK: Informationsdesign, metod och utprovning, (ki7500) Distance course, Master level, 030825 - 031031 (Linköping University, Malmö högskola)

- MDH: 3D-modellering, lågpolygonteknik för speldesign, (ki1790) Under graduate level 030825 - 031031

- MDH: 3D Modeling, Basic Skills, (ki1830) English, Distance Learning, Under graduate level, Aug. 25th 2003 to Jan. 16th 2004

- MDH: 3D-modellering, grundkurs, (ki1730) Under graduate levelt 030902 - 040116

- MDH: 3D-modellering, grundkurs, (ki1730b) Distance course, Under graduate level, 030825 - 040116

- MDH: VR-visualisering s03, (ki1760) Under graduate level 030610 - 030822

- MDH: 3D-modellering_vt03, (ki3150) Under graduate level 030331 - 030430

- MDH: 3D-animation_vt03, (ki3170) Under graduate level 030120 - 030221

2002
- MDH: VR-visualisering_ht02, (ki1760) Under graduate level 021209 - 030117

- MDH: Multimediaprogrammering_ht02, Under graduate level, part of the course Multimedia 1 (ki1750) 021105 - 021206

- MDH: 3D-modellering_vt02, (ki3150) Under graduate level020429 - 020604

2001
- MDH: Multimediaprogrammering_ht01, Under graduate level, part of the course Multimedia 1 (KI1210) 011203 - 020215

- MDH: 3D-animation_ht01, Under graduate level, part of the course Infobilder C (KI1200) 011015 - 011026

- MDH: Multimedial presentationsteknik_ht01, (KI1070) Under graduate level, 010821 - 010918

- MDH: Webbproduktion_ht01, (KI1530) Under graduate level, 010820 - 010921

1999 och 2000
- Grafiska Institutet, Stockholm: Flash-kurs, Dreamweaverkurs

- Grafikens Hus, Mariefred: Dreamveawer-kurs, Photoshop-kurs

In 2009 nominated as one of three teachers by the Mälardalen student council for the award *Teacher of the year* (however I did not get it).
In 2012 I won the prize of "Teacherof the year" (Årets Pedagog), handed out by the student union at the IT section of Chalmers student union for my teaching in the course Information Visualization.

Courses developed:
2014: Information Visualisation, 7.5 hp (NTNU)
         Human Centred Design, 7.5 hp. (NTNU)
2013 Research methods: master level, 7.5 hp (Chalmers)
2012: Information Visualization, master's level, 7,5 hp. (Chalmers/GU)
2011: Quantitative research methods and experimental design, master's level, equivalent to 7,5 hp. Dalian Maritime University, China
2009: User Experience - user testing with qualitative and quantitative methods, 7,5 hp.
2009: Maritime Human Factors, master level, 7,5 hp. (Chalmers)
2008: Cognitiva Processes (basic level), 7,5 hp
2008: Interaktion Design (avanced level), 7,5 hp.
2007 Instruktion Design (avanced level), 7,5 hp
2006: Information Design in theory and pracsis B2 (usability testing methods, avanced level), 5 p.
2006: Information Design in theory and pracsis B1 (cognitive psychology), medium level, 5 p.
2000: Interaktiv Narration, basic level, 5 p.
3D Modellering, low polygon modeling for game dsign, basic level, 5 p.
2000: VR Visualization, advanced level, 5 p.
2000: 3D Modeling, Basic Skills, medium level, 5 p .

Teaching achievements
2012 Elected Teacher of the year award by the student union at Applied IT department, Chalmers University of Technology
2010 Nominated (1 of 3) by the student union to Teacher of the year award at Mälardalen University

Research projects

2018-2021 AutoFerry, NTNU strategic funding project

2018-2021 SESAME, Solution 2 (Secure, Efficient and Safe maritime traffic Management in the Straits of Malacca and Singapore), NRC MAROFF project.

2018-2021 HUMANE, (Human Maritime Autonomy Enable) Human Factors in autonomous shipping, NRC knowledge project.

2018-2020 M-AR (Maritime Augmented Reallity), NRC innovation project.

2017-2020 SMACS (Sensemaking in safety-critical situations), NRC, one PhD candidate

2017-2020 SAREPTA (Safety, autonomy, remote control and operations of transport systems), NRC, one PhD candidate

2015-2018 SIkkerKurs, Innovation project, Norwegian Coastal Administration

2015-2017 REMOTE (Utvikling av kontrollrom-konsept for fjernoperasjon av oppdrettsanlegg), Utvikklingsfond Nord- project

2015-2018 EfficienSea 2, EU Horizon 2020 project.

2015-2018 ONSITE (Design Driven Field Studies for Safer Demanding Marine Operations) Norwegian Research Council.

2015-2017 REMOTE (Utvikling av kontrollrom-konsept for fjernoperasjon av oppdrettsanlegg, Development of concepts for control rooms for fish farms) Norwegian Research Council.

2011-2015 ACCSEAS (Accessibility for shipping efficiency advantages and sustainability). E-Navigation project. EU InterReg. North Sea project. http://www.accseas.eu/

2011-2015 MUNIN (Maritime unmanned navigation through intelligence in networks). e-Navigation project. EU 7th framework. http://www.unmanned-ship.org/munin/

2011-2015 MONALISA 2 (Motorways and electronic navigation by intelligence at sea). e-Navigation project. EU 7th framework. http://www.sjofartsverket.se/en/MonaLisa/MONALISA-20/

2012-2014 SITUMAR. Kongsberg Maritime. Information and interaction expert in development of next generation bridge equipment at this private company.

2009-2013 MONALISA (Motorways and electronic navigation by intelligence at sea). e-Navigation project. EU 7th framework. http://monalisaproject.eu/

2013 MICE (MONALISA Ice) e-Navigation project. Swedish Maritime Administration.

2009-2012 EfficenSea (Efficient safe and sustainable traffic at sea) e-Navigation project. EU InterReg Baltic Sea project. http://efficiensea.eu/

2011-2012 SAM Electronics NACOS Platinum project. Information and interaction expert in development of next generation bridge equipment at this private company. http://www.sam-electronics.de/dateien/navigation/navigation.html

2009-2012 BLAST (Bringing land and sea together) e-Navigation project. EU InterReg. North Sea project. http://www.blast-project.eu/

2009-2011 IMPACT (Integrated Maritime Progressive Assessment and Calibration Tool). Maritime risk assessment project. VINNOVA, EU, MARTEC. http://wmu.se/project/impact

2009-2011 HORIZON Fatigue project. EU 7th framework. http://www.warsashacademy.co.uk/about/our-schools/maritime-research-centre/horizon-project/horizon-project.aspx

2009-2011 SAFEWAY2SCHOOL (Integrated system for safe transportation of children to school). EU 7th framework. http://www.safeway2school-eu.org/

Committees
2018-   Member of the IALA ARM committee
2013-2017   Vice chair of IALA's e-Navigation committee's Testbeds working group.
2011-2013 IALA's e-Navigation committee, Portrayal and testbeds working groups
2013 IMO NAV 59, IALA representative

Memberships
2009-2014 Board member of Swedish Radio Navigation Board (Radionavieringsnämnden)
2009- Member of Nautical Institute (MNI)

Post doc
2011 Guest Professor, Dalian Maritime University, Dalian, China. Experiment with mental rotations and map reading on Chinese mariners. Teaching Research Methods master level course at Sino-European Usability Center, DMU.

Publications

Book
Porathe, T. (2006) *3-D Nautical Chart and Safe Navigation*. Mälardalen University Dissertations No. 27. Västerås.

Book Chapters

Porathe, T., Rødseth, Ø., Fjøltoft, K. Hoem, Å. & Johnsen, S. (2018). At least as safe as manned shipping? Autonomous shipping, safety and "human error". In Safety and Reliability – Safe Societies in a Changing World. Proceedings of ESREL 2018, June 17-21, 2018, Trondheim, Norway. Taylor & Francis 2018, ISBN 9781351174657. p. 417- 425

Porathe, T. (2017). Ship navigation: Information integration in the maritime domain. In In A. Black, P. Luna, O. Lund, & S. Walker (Eds.) *Information design: research and practice.* London: Taylor & Francis.

Porathe, T., Brodje, A., Weber, R., Camre, D., & Borup, O. (2015). Supporting Situation Awareness on the bridge: testing route exchange in a practical e-Navigation study. In A. Weintrit, & T. Neumann (Eds.) *Information, Communication and Environment: Marine Navigation and Safety of Sea Transportation*, London: CRC Press, 85-92.

Brödje, A.; Weber, R; Camre, D.; Borup, O.; & Porathe, T. (2015). Supporting Voice Communication Between Navigator and VTS by Visual Solutions-Exploring the Use of the" Route Suggestion" Functionality within VTS. In *Information, Communication and Environment: Marine Navigation and Safety of Sea Transportation.* CRC Press, 267-274

Porathe, T. (2015). Human Error and e-Navigation: Developing the Nautical Chart as Resilient Decision Support. In *Human Interface and the Management of Information: Information and Knowledge in Context (Part II).* Springer, 129-139.

Porathe, T., Eklund, P., & Göransson, H. (2014) Voice and Text Messaging in Ship Communication, Advances in Human Aspects of Transportation Part I, (Eds.) N. Stanton, S. Landry, G. Di Bucchianico and A. Vallicelli. Published by AHFE Conference, pp. 193-191

Lützhöft, M., Grech, M. R. & Porathe, T. (2011). Human Factors in Maritime Operations. In P.Delucia (Ed.) *Reviews of Human Factors and Ergonomics: Volume 7.* Santa Monica, CA, USA: Human Factors and Ergonomics Society, pp. 280-322

Porathe, T. (2008) Pictures as tools for navigation: on maps and the effectiveness of visual iconicity In B. Lärkner. & G. Svensson (Eds.). *Images, Science & Knowledge.* Linköping Studies in Art and Visual Communication 8, Linköping, 69 - 85.

Book Chapters (popular science)

Porathe, T. (2015) Electronics: Some friendly advice on bridge work. In M. Freeth (Ed.), *Navigation Accidents and their Causes.* London: The Nautical Institute., 83-90

Refereed Journal Publications
Porathe, T. & Ekskog, J. (2018). Egocentric leisure boat navigation in a smartphone based Augmented Reality application. Journal of navigation.

Porathe, T. (2016). Information Design in Nautical Charts: Dynamic NoGo Areas. *Information Design Journal.* Amsterdam: Benjamins.

Man, Y., Lundh, M., Porathe, T., & MacKinnon, S. (2015). From Desk to Field - Human Factor Issues in Remote Monitoring and Controlling of Autonomous Unmanned Vessels. In Procedia Manufacturing, (3), 2674-2681

Burmeister, H. C.; Bruhn, W. C.; Rødseth, Ø. J.; & Porathe, T. (2014). Autonomous Unmanned Merchant Vessel and its Contribution towards the e-Navigation Implementation: The MUNIN Perspective. In *International Journal of e-Navigation and Maritime Economy*, 2014, 1-13.

Porathe, T.; Lützhöft, M.; & Praetorius, G. (2013). Communicating intended routes in ECDIS: Evaluating technological change. In *Accident Analysis and Prevention*. 2013 (60), pp. 366– 370.

Lee, A.; Seojeong, L.; Baranowski, A; & Porathe, T. (2013). Harmonised Portrayal of e-Navigation-related Information. International Journal on Marine Navigation and Safety of Sea Transportation, 7 (1) pp. 39-43.

Porathe, T. (2012). Transmitting intended and suggested routes in ship operations: cognitive off-loading by placing knowledge in the world. *Work*, 41 (Supplement: 1) pp. 4873-4878.

Rigaud, E.; Lützhöft, M.; Kircher, A.; Schröder-Hinrichs, J-U; Baldauf, M.; Jenvald, J; & Porathe, T. (2012). Impact: More Than Maritime Risk Assessment. Procedia - Social and Behavioral Sciences, 48, pp. 1848–1854.

Porathe, T. & Strand, L. (2011) Which sign is more visible? Measuring the visibility of traffic signs through the conspicuity index method. *European Transport Research Review*, Heidelberg: Springer Verlag.

Bartusch, C & Porathe, T. (2011). Climate-smart information design: Visualizing residential electricity use over the Internet. *Information Design Journal*. Amsterdam: John Benjamins.

Porathe, T. (2008) Measuring effective map design for route guidance: an experiment comparing electronic map display principles. *Information Design Journal*, 16(3), 190-201. Amsterdam: John Benjamins Publishing Company.

Porathe, T. (2007) Nautiskt 3D-GIS med sikte på kognitiv avlastning och beslutsstöd. *Kart og Plan*,:3-2007, Vol 67, pp. 183–191. Fagbokforlaget, Bergen, Norway. ISSN 0047 – 3278

Porathe, T. (2007) »Real seamen never turn the chart upside down« Safer navigation with egocentric view 3-D nautical charts? *Mercator: Maritime Innovation, Research and Education*, September 2007. Weilbach & Co, Copenhagen, Denmark. http://mercatorinfo.dk/show/article/21

Refereed Conference Publications

Porathe, T. & Lutzhoft, M. (2018). A harmonized display of e-navigation information: Workload and navigational control; Contextual control levels. In The Royal Institution

of Naval Architects Human Factors Papers 2018. Royal Institution of Naval Architects 2018 ISBN 9781909024809. s. 49-56

Komandur, S. & Porathe, T. (2018). Contours of a Roadmap for Developing Scenarios for the World of Autonomous Ocean Systems. In The Royal Institution of Naval Architects Human Factors Papers 2018. Royal Institution of Naval Architects 2018 ISBN 9781909024809. s. 67-69

Porathe, T. (2018). Autonomous, unmanned cargo shipping, for better or for worse?. In the proceedings of Society and the Sea conference 2018: Investinblue - The Values of the Ocean and Coasts for Sustainable Development. Greenwich, London September 2018.

Porathe, T. (2018). Workload and navigational control: The control levels of COCOM as framework for ship bridge HMI design. Proceedings of the European Navigation Conference 2018, Gotheburg, Sweden

Porathe, T. (2018). Human Factors and Autonomous Ships: Automation transparency. Proceedings of the IALA world conference 2018, Incheon, Korea

Porathe, T. (2017). Is COLREG enough? Interaction between manned and unmanned ships. Proceedings of the 12th International Conference on Marine Navigation and Safety of Sea Transportation, TransNav 2017. 21-23 June 2017, Gdynia Poland. 191-194.

Porathe, T. (2016). Human-Centred Design in the Maritime Domain. In *Proceedings of The NordDesign Conference 2016*. Trondheim, Norway.

Porathe, T., & Bentzen B. M., (2015). Human-machine interaction between unmanned, autonomous, ships and manned non-SOLAS vessels in confined and inshore waters: research needs. In *Proceedings of The International Conference of Advanced Intelligent Maritime Safety and Technology (Ai-MAST 2015*. Daejeon, South Korea, 52-56.

Porathe, T., & Bentzen B. M., (2015). Human Factors in e-Navigation: a study of Dynamic NoGo Area Visualization in Electronic Nautical Charts. In *Proceedings of The International Conference of Advanced Intelligent Maritime Safety and Technology (Ai-MAST 2015*. Daejeon, South Korea, 102-109.

Porathe, T., Bentzen B. M., Borup, O., & Pedersen, P. (2015). Distribution and Display of Maritime Safety Information in an e-Navigation Context. In *Proceedings of the 18th International Conference on Ships and Shipping Research*. Milano: Associazione di Italiana Tecnica Navale, University of Genua and Polytecnico di Milano, 551-559.

Man, Y., Lundh, M., Porathe, T., & MacKinnon, S. (2015). From Desk to Field - Human Factor Issues in Remote Monitoring and Controlling of Autonomous Unmanned Vessels. 6th International Conference on Applied Human Factors and Ergonomics and the Affiliated Conferences, Las Vegas, Nevada, USA, July 26–30, 2015.

Porathe, T. & Brödje, A. (2015). Human Factor Aspects in Sea Traffic Management. In V. Bertram (Ed.) *Proceedings of the 14th International Conference on Computer Applications and Information Technology in the Maritime Industries (COMPIT '15), 11-13 May 2015 in Ulrichshusen, Germany.* Hamburg, Technische Universität Hamburg- Harburg, 2015,

Porathe, T., Borup, O. Jeong, J.S., Park, J.H., Andersen Camre, D., & Brodje, A. (2014). Ship traffic management route exchange: acceptance in Korea and Sweden, a cross cultural study. In the Proceedings of the International Symposium Information on Ships, ISIS 2014, 4-5 September in Hamburg. pp. 64-79

Burmeister, H.C., Rødseth, Ø-J., & Porathe, T. (2014). Autonomous unmanned merchant vessel and its contribution towards the e-Navigation implementation: The MUNIN perspective. In proceedings of the 2nd International Symposium on Advanced Intelligent Maritime Safety and Technology (Ai-MAST) 2014.

Porathe, T., Eklund, P., & Göransson, H. (2014). Voice and Text Messaging in Ship Communication. Proceedings of the 5th AHFE Conference 19-23 July 2014.

Man, Y., Lundh, M., & Porathe, T. (2014). Seeking Harmony in Shore-based Unmanned Ship Handling - From the Perspective of Human Factors, What Is the Difference We Need to Focus on from Being Onboard to Onshore? Proceedings of the 5th AHFE Conference 19-23 July 2014.

Burmeister, H-C., Bruhn, W.C., Rødseth, O.J. & Porathe, T. (2014). Can unmanned ships improve navigational safety? Proceedings of the Transport Research Arena, TRA 2014, 14-17 April 2014, Paris.

Porathe, T. (2014). Remote Monitoring and Control of Unmanned Vessels –The MUNIN Shore Control Centre. Proceedings of the 13th International Conference on Computer Applications and Information Technology in the Maritime Industries (COMPIT '14) p. 460-467.

Porathe, T., Prison, J., &, Man, Y. (2014). Situation awareness in remote control centers for unmanned ships. Proceedings of Human Factors in Ship Design & Operation, 26-27 February 2014, London: Royal Institute of Naval Archtects.

Porathe, T., de Vries, L., & Prison, P. (2014). Ship voyage plan coordination in the MONALISA project: user tests of a prototype ship traffic management system In D. De Waard, K. Brookhuis, R. Wiczorek, F. Di Nocera, P. Barham, C. Weikert, A. Kluge, W. Gerbino, and A. Toffetti, (Eds.) *Proceedings of the Human Factors and Ergonomics Society Europe Chapter 2013 Annual Conference.*

Rødseth, Ø. J.; Kvamstad, B.; Porathe, T.; & Burmeister, H-C. (2013). Communication Architecture for an Unmanned Merchant Ship. In Proceedings of the OCEANS 2013 MTS/IEEE Conference, Bergen Norway.

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