**A review of methods for leakage management in pipe networks**
**Puust, Raido**; Kapelan, Zoran; Savic, D. A.; **Koppel, Tiit** Urban water journal 2010 / 1, p. 25-45 : ill
https://www.researchgate.net/publication/235694708_A_review_of_methods_for_leakage_management_in_pipe_networks

**An inverse approach for leakage identification in water distribution systems**
**Koppel, Tiit**; **Puust, Raido**; **Ainola, Leo** XXIII Nordic Hydrological Conference ["Fresh Water Resources Management"] : Tallinn, Estonia, 8-12 August 2004 : selected articles. Vol. I 2004 / p. 342-349 : ill https://artiklid.elnet.ee/record=b2343456*est

**An investigation of shear stresses on the wall of the pipe at the stating from rest of liquid by means of the thermo-anemometer**
**Liiv, Uno**; **Koppel, Tiit** Proceedings of the Dynamic Flow Conference 1978 on Dynamic Measurements in Unsteady Flows : I.M.S.T., Marseille, France, September 11 - 14, 1978 1979 / p. ?

**An investigation of turbulence generation and wall shear stress spectral analysis during unsteady flow in tubes**
**Ainola, Leo**; **Koppel, Tiit**; **Liiv, Uno** XVIII IAHR Congress : Cagliari, Italia, 10 - 14 Sept. 1979 : 3, Proceedings, Subject B : Mass and heat exchange in hydraulic phenomena 1979 / p. 165-172

**Analysis of the water flow in the water distribution system from point view of hydraulic energy**
**Koppel, Tiit**; **Vassiljev, Anatoli** Proceedings of the International Conference "Hydraulics (Science and Discipline)" 2004 / p. 46-47

**Application of IR thermography for unsteady fluid-flow research**
**Koppel, Tiit**; Lähdeniemi, Matti; Ekholm, Ari Thermosense XX, 14-16 April 1998, Orlando, Florida : [proceedings] 1998 / p. 40-48: ill

**Background leakage assessment for BBLAWN**
**Vassiljev, Anatoli**; **Koppel, Tiit**; **Puust, Raido** Procedia engineering 2014 / p. 111-117 : ill
https://doi.org/10.1016/j.proeng.2014.11.166 Conference proceedings at Scopus Article at Scopus Article at WOS

**Battle of the water calibration networks**
Ostfeld, Avi; **Koppel, Tiit**; **Vassiljev, Anatoli** Journal of water resources planning and management 2012 / p. 523-532 : ill
https://ascelibrary.org/doi/10.1061/%28ASCE%29WR.1943-5452.0000191

**Boundary layer with heat load in transitional accelerating pipe flow**
**Ainola, Leo**; Ekholm, Ari; **Koppel, Tiit**; Lähdeniemi, Matti; **Puust, Raido** Hydrodynamics V. Volume 1, Theory and applications : proceedings of the fifth International Conference on Hydrodynamics : Tainan, Oct. 31 - Nov. 2, 2002 2002 / p. 523-528 : ill

**Calibration of a model of an operational water distribution system containing pipes of different age**
**Koppel, Tiit**; **Vassiljev, Anatoli** Advances in engineering software 2009 / 8, p. 659-664 : ill

**Calibration of the model of an operational water distribution system**
**Vassiljev, Anatoli**; **Koppel, Tiit**; **Puust, Raido** CCWI 2005 : proceedings of the Eighth International Conference on Computing and Control for the Water Industry : Exeter, UK. Volume 1 2005 / p. 155-159 : ill

**Calibration of the model of an operational water distribution system**
**Vassiljev, Anatoli**; **Koppel, Tiit** Proceedings of the Fifth International Conference on Engineering Computational Technology 2006 / Paper 155 [10] p. : ill

**Calibration of the model of an operational water distribution system**
**Koppel, Tiit**; **Vassiljev, Anatoli** World Water Congress : Vienna, Austria, 7-12 September 2008 2008 / [8] p
https://www.sciencedirect.com/science/article/pii/S0965997808001981

**Calibration of the water distribution network model**
**Koppel, Tiit**; **Kändler, Nils**; **Vassiljev, Anatoli** Proc. of the Conference "Water Resources Management 2001" 2001 / p. 207-217

**Calibration of water distribution network for BWCN**
**Koppel, Tiit**; **Vassiljev, Anatoli** Water Distribution System Analysis 2010 : WDSA2010 : Tucson, AZ, USA, Sept. 12-15, 2010 2010 / [10] p.: ill

**Capacity reliability of water distribution systems**
**Vaabel, Joonas**; **Koppel, Tiit**; **Ainola, Leo**; Sarv, Laur Journal of Hydroinformatics 2014 / p. 731-741
https://doi.org/10.2166/hydro.2013.040 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Complex approach to the water network model calibration and the leakage distribution**
**Ainola, Leo**; **Koppel, Tiit**; **Vassiljev, Anatoli** Hydraulic Engineering Software VIII : [Eighth International Conference on Hydraulic Engineering Software : HYDROSOFT 2000] 2000 / p. 91-100 : ill https://www.witpress.com/Secure/elibrary/papers/HY00/HY00008FU.pdf

**Construction of water network model**
**Kändler, Nils**; **Koppel, Tiit**; **Vassiljev, Anatoli** 4th International Congress and Trade Fair "Water : Ecology and Technology" : ECWATECH-2000 : Moscow, 30 May - 2 June 2000 : abstracts 2000 / p. 246-247

**Correction of demand patterns on the basis of pressure measurements**
**Koppel, Tiit**; **Vassiljev, Anatoli** Proceedings of the Thirteenth International Conference on Civil, Structural and Environmental Engineering Computing : Chania, Crete, Greece, 6–9 September 2011 2011 / [9] p
https://www.researchgate.net/publication/269133085_Correction_of_Demand_Patterns_on_the_Basis_of_Pressure_Measurements

**Database driven hydraulic model creation procedure**
**Koor, Margus**; **Puust, Raido**; **Vassiljev, Anatoli**; **Koppel, Tiit** WDSA 2012 : 14th Water Distribution Systems Analysis Conference : 24-27 September 2012 in Adelaide, South Australia 2012 / p. 407-414
https://www.researchgate.net/publication/289399341_Database_driven_hydraulic_model_creation_procedure

**Determination of water distribution network resistance coefficient and hydraulic capacity**
**Vaabel, Joonas**; **Koppel, Tiit**; Sarv, Laur; **Annus, Ivar** Procedia engineering 2014 / p. 679-684 : ill
https://doi.org/10.1016/j.proeng.2014.11.494 Conference proceedings at Scopus Article at Scopus Article at WOS

**Development of accelerating pipe flow starting from rest**
**Annus, Ivar**; **Koppel, Tiit**; Sarv, Laur; **Ainola, Leo** Journal of fluids engineering 2013 / p. 111204-1 - 111204-10 : ill
https://doi.org/10.1115/1.4025256 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Development of accelerating pipe flow starting from rest = Paigalseisust algava kiireneva voolamise areng torus**
**Annus, Ivar**; **Koppel, Tiit** 2011 http://www.ester.ee/record=b2723494*est

**Development of radial velocity component in accelerating start-up pipe flow**
**Annus, Ivar**; **Koppel, Tiit** European journal of mechanics B. Fluids 2015 / p. 48-54 : ill https://doi.org/10.1016/j.euromechflu.2015.04.001 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Diurnal dynamic analysis of water distribution networks**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils** Advances in Water Supply Management : proceedings of the International Conference on Computing and Control for the Water Industry, 15-17 September 2003, London, UK 2003 / p. 165-171 : ill
https://www.taylorfrancis.com/chapters/edit/10.1201/NOE9058096081-19/diurnal-dynamic-analysis-water-distribution-networks-ainola-koppel-k%C3%A4ndler

**Diurnal dynamics effect on freezing of urban water system**
**Koppel, Tiit**; **Ainola, Leo** 1st UNESCO IHP VI Workshop : Integrated Urban Water Management in Cold Climate : NTNU, Trondheim, Norway, November 3-4, 2005 : book of abstracts 2005 / p. 79-80

**Education of civil engineering in Tallinn Technical University [Electronic resource]**
**Koppel, Tiit**; **Õiger, Karl**; **Laur, Toomas** Proceedings of the I International Meeting in Civil Engineering Education, Spain, Ciudad Real, 2003 2003 / [10] p. [CD-ROM]

**Educational problems of civil engineering at Tallinn University of Technology**
**Õiger, Karl**; **Koppel, Tiit**; **Laur, Toomas** ITHET 2004 : proceedings of the Fifth International Conference on Information Technology based Higher Education and Training : 31 May - 2 June, 2004, Istanbul, Turkey 2004 / p. 434-436

**Effects of bottom-height changes on maximal exchange-flow estimates in channels with quadratic shape cross sections**
**Laanearu, Janek**; Davies, Peter A.; **Koppel, Tiit** Proceedings of 32nd Congress of IAHR : Venice, Italy, July 1-6, 2007 2007 / ? p
https://www.iahr.org/library/infor?pid=15300

**Ehitiste tuleohutus**
Randmaa, Toomas; **Suurkask, Valdu**; **Koppel, Tiit** 2005 https://www.ester.ee/record=b2043887*est

**Emptying of large-scale pipeline by pressurized air**
**Laanearu, Janek**; **Annus, Ivar**; **Koppel, Tiit**; Bergant, Anton; Vučkovic, Sašo; Hou, Qingzhi; Tijsseling, Arris S.; Anderson, Alexander; Westende, Jos M.C.van't Journal of hydraulic engineering 2012 / p. 1090-1100 : ill
https://www.win.tue.nl/~atijssel/pdf_files/Laanearu-et-al_2012.pdf

**Energetic optimization by rehabilitation of oversized water distribution networks**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils** Pumps, electromechanical devices and systems applied to urban water management. Volume 1 2003 / p. 3-9

**Energy-based analysis for rehabilitation of water distribution networks**
**Ainola, Leo**; **Koppel, Tiit**; **Vassiljev, Anatoli** Proceedings of the EWA/AGHTM Conference "Operation and Maintenance of Sewer and Water Pipes", Paris, 2003 2003 / p. 163-175

**Estimation of real-time demands on the basis of pressure measurements**
**Vassiljev, Anatoli**; **Koppel, Tiit** Proceedings of the Eight International Conference on Engineering Computational Technology 2012 / Paper 54, [9] p.: ill https://www.sciencedirect.com/science/article/pii/S0965997814001720

**Estimation of real-time demands on the basis of pressure measurements by different optimization methods**
**Vassiljev, Anatoli**; **Koppel, Tiit** Advances in engineering software 2015 / p. 67-71 : ill https://doi.org/10.1016/j.advengsoft.2014.09.023 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Estimation of real-time water fluxes in water distribution system on the basis of pressure measurements**
**Koppel, Tiit**; **Vassiljev, Anatoli** Advances in engineering software 2013 / p. 19-23 : ill https://doi.org/10.1016/j.advengsoft.2012.11.012 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Experience in modeling of water supply systems**
**Koppel, Tiit**; **Vassiljev, Anatoli** Congress publications of ECWATECH-2004 : 1-4 June 2004, Moscow. 2 2004 / p. 912

**Experience of calibration of model of water supply system**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils**; **Vassiljev, Anatoli** 5th International Congress ECWATECH-2002, Moscow : abstracts 2002 / p. 214-215

**Experimental data processing system for unsteady flow studies**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** XIX IAHR Congress, New Delhi, India, 2-7 February 1981 : proceedings = XIX Congrès de l'AIRH, New Delhi, Inde, 2-7 février 1981 ; Vol. 5: Subject D 1981 / p. 535-544

**Experimental investigation on rapid filling of a large-scale pipeline**
Hou, Qingzhi; Tijsseling, Arris S.; **Laanearu, Janek**; **Annus, Ivar**; **Koppel, Tiit** Journal of hydraulic engineering 2014 / art. 04014053, p. 1-14 : ill https://doi.org/10.1061/(ASCE)HY.1943-7900.0000914 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Experimental investigation on rapid filling of a large-scale pipeline**
Hou, Qingzhi; Tijsseling, Arris S.; **Laanearu, Janek**; **Annus, Ivar**; **Koppel, Tiit** 2013

**Experimental study of filling and emptying of a large-scale pipeline**
Hou, Qingzhi; Tijsseling, Arris S.; **Laanearu, Janek**; **Annus, Ivar**; **Koppel, Tiit**; Bergant, Anton; Vučkovič, S.; Gale, Janez; Anderson, A.; Westende, Jos M.C.van't; Pandula, Zoltan; Ruprecht, A. 2012
https://www.researchgate.net/publication/254810149_Experimental_study_of_filling_and_emptying_of_a_large-scale_pipeline

**Experiments on unsteady separating flow in an open channel**
**Koppel, Tiit** 1981

**Generation of zonal transport by weakly nonlinear Rossby waves**
Soomere, Tarmo; **Koppel, Tiit** XXVIII IAHR Congress : 22-27 August, Graz : proceedings [CD-ROM] 1999 / [7] p

**Heat transfer by a pulsating flow in thermally developing region of a pipe**
**Ainola, Leo**; Ekholm, Ari; **Koppel, Tiit**; Lähdeniemi, Matti Progress in engineering heat transfer 1999 / p. 249-256

**Heat transfer in the thermally developing region for pulsating tube flow**
**Ainola, Leo**; **Koppel, Tiit**; Lähdeniemi, Matti Proceedings of the Estonian Academy of Sciences. Engineering 1999 / 1, p. 41-52: ill

**Heat transfer investigation in pipe by IR-thermography**
**Koppel, Tiit**; **Ainola, Leo**; Ekholm, Ari; Lähdeniemi, Matti Thermosense XXII : 25-27 April 2000, Orlando, Florida : proceedings 2000 / p. 267-275 : ill

**Heat transfer investigation of pulsating and accelerated pipe flow by IR-thermography**
Lähdeniemi, Matti; **Ainola, Leo**; **Koppel, Tiit**; Ekholm, Ari Hydrodynamics IV : Theory and Applications : proceedings of the Fourth International Conference on Hydrodynamics : Yokohama, 7-9 September 2000. Vol. II 2000 / p. 913-918 : ill

**Hüdraulika ja pumbad**
Maastik, Aleksander; Haldre, Heiti; **Koppel, Tiit**; **Paal, Leopold** 1995 https://www.ester.ee/record=b1068996*est

**Hüdraulika ülesannete kogu**
1993 http://www.ester.ee/record=b1064669*est

**Hydraulic power analysis for determination of characteristics of a water distribution system [Electronic resource]**
**Vaabel, Joonas**; **Ainola, Leo**; **Koppel, Tiit** 8th Annual Water Distribution Systems Analysis Symposium : proceedings of WDSA 2006 : [Cincinnati, Ohio, USA], August 27-30, 2006 2006 / [9] p. : ill. [CD-ROM]

**Hydraulic power analysis of flows in water distribution network**
**Koppel, Tiit**; **Ainola, Leo**; **Vassiljev, Anatoli** CCWI 2005 : proceedings of the Eighth International Conference on Computing and Control for the Water Industry : Exeter, UK. Volume 1 2005 / p. 317-322

**Hydraulic power capacity of water supply systems = Veevõrkude hüdrauliline võimsus**
**Vaabel, Joonas** 2013 https://www.ester.ee/record=b2970192*est

**Identification of transition to turbulence in a highly accelerated start-up pipe flow**
**Koppel, Tiit**; **Ainola, Leo** Transactions of the ASME. Journal of fluids engineering 2006 / July, p. 680-686 : ill
https://asmedigitalcollection.asme.org/fluidsengineering/article/128/4/680/466677/Identification-of-Transition-to-Turbulence-in-a

**IR technology and image processing applied to flow investigation**
Lähdeniemi, Matti; Ekholm, Ari; **Koppel, Tiit**; **Ainola, Leo** Machine vision news 2002 / p. 12

**Joint influence of river stream, water level and wind waves on the height of sand bar in a river mouth**
**Laanearu, Janek**; **Koppel, Tiit**; **Soomere, Tarmo**; Davies, Peter A. Nordic hydrology 2007 / 3, p. 287-302
https://iwaponline.com/hr/article/38/3/287/688/Joint-influence-of-river-stream-water-level-and

**Linear Rossby waves and zonal transport in rotating platform**
Soomere, Tarmo; **Koppel, Tiit** Proceedings of the Estonian Academy of Sciences. Engineering 1999 / 1, p. 22-40: ill
https://artiklid.elnet.ee/record=b1000412*est

**A mathematical model for the determination of lekage in mains and water distribution networks**
**Koppel, Tiit**; **Ainola, Leo**; **Puust, Raido** Proceedings of the Estonian Academy of Sciences. Engineering 2007 / 1, p. 3-16 : ill

**Mittestatsionaarse voolamise uuringud hüdromehaanika laboratooriumis**
**Koppel, Tiit** Tallinna Tehnikaülikooli aastaraamat 2008 2009 / lk. 111-114

**Model of management of the water supply system**
**Koppel, Tiit**; Seemendi, Sirje; **Vassiljev, Anatoli** XXII Nordic Hydrological Conference : Roros, Norway 4-7 August 2002. Vol. II 2002 / p. 729-737 : ill

**Modelling of stormwater discharge and quality in urban area**
**Koppel, Tiit**; **Vassiljev, Anatoli**; **Puust, Raido**; **Laanearu, Janek** International journal of ecological science and environmental engineering 2014 / p. 80-90 : ill

**On determination of flow routes in a stormwater network using the least squares method**
**Laanearu, Janek**; **Annus, Ivar**; **Vassiljev, Anatoli**; **Koppel, Tiit** Integrating Water Systems : proceedings of the Tenth International Conference on Computing and Control in the Water Industry 2009 : CCWI2009 : Sheffield, UK, 1-3 September 2009 2009 / p. 731-734

**On energy efficiency of water distribution system**
**Vaabel, Joonas**; **Koppel, Tiit**; **Ainola, Leo** Water Management Challenges in Global Change : proceedings of the 9th Computing and Control for the Water Industry (CCWI2007) and Sustainable Urban Water Management (SUWM2007) Conferences : Leicester, UK, 3-5 September, 2007 2007 / p. 169-172

**On hydraulic power capacity of water supply system**
**Koppel, Tiit**; **Ainola, Leo**; **Vaabel, Joonas** Integrating Water Systems : proceedings of the Tenth International Conference on Computing and Control in the Water Industry 2009 : CCWI2009 : Sheffield, UK, 1-3 September 2009 2009 / p. 551-555

**On long-wave dependent flow transitions in partially filled large-scale pipeline [Electronic resource]**
**Laanearu, Janek**; **Annus, Ivar**; **Koppel, Tiit** Water Engineering for a Sustainable Environment : 33rd IAHR Congress, Vancouver, British Columbia, Canada, 9-14 August, 2009 2009 / p. 6553-6560 https://www.iahr.org/library/infor?pid=24429

**On the alternative equations of water hammer**
**Koppel, Tiit**; **Ainola, Leo** Proceedings of 32nd Congress of IAHR : Venice, Italy, July 1-6, 2007 2007 / [9] p

**Optimal pump count prediction algorithm for identical pumps working in parallel mode**
**Koor, Margus**; **Vassiljev, Anatoli**; **Koppel, Tiit** Procedia engineering 2014 / p. 951-958 : ill
https://doi.org/10.1016/j.proeng.2014.02.106 Conference proceedings at Scopus Article at Scopus Article at WOS

**Optimization of pump efficiencies with different pumps characteristics working in parallel mode**
Koor, Margus; **Vassiljev, Anatoli**; **Koppel, Tiit** Advances in engineering software 2016 / p. 69-76 : ill
https://doi.org/10.1016/j.advengsoft.2015.10.010 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Optimization of pump efficiency in a water distribution system**
**Koor, Margus**; **Vassiljev, Anatoli**; **Koppel, Tiit** Proceedings of the Ninth International Conference on Engineering Computational Technology 2014 / Paper 91, p. 1-10 : ill https://iwaponline.com/ws/article/23/3/1094/93912/Optimization-of-the-operation-of-water Conference proceedings at Scopus Article at Scopus

**Parametric modelling study for filling of horizontal pipe containing water**
**Laanearu, Janek**; **Annus, Ivar**; **Sergejeva, Monika**; **Koppel, Tiit**; **Puust, Raido** WDSA 2012 : 14th Water Distribution Systems Analysis Conference : 24-27 September 2012 in Adelaide, South Australia 2012 / p. 678-693
https://www.researchgate.net/publication/286954531_Parametric_modelling_study_for_filling_of_horizontal_pipe_containing_water

**Principle of locality and its application to water network model calibration**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils**; **Vassiljev, Anatoli** Water software systems : theory and applications. Vol. 1 2001 / p. 111-120

**Probabilistic leak detection in pipe networks using the SCEM-UA algorithm = Lekete tõenäosuse määramine torustikes algoritmi SCEM-UA abil**
**Puust, Raido** 2007

**Probabilistic leak detection in pipe networks using the SCEM-UA algorithm [Electronic resource]**
**Puust, Raido**; Kapelan, Zoran; Savic, Dragan; **Koppel, Tiit** 8th Annual Water Distribution Systems Analysis Symposium : proceedings of WDSA 2006 : [Cincinnati, Ohio, USA], August 27-30, 2006 2006 / [12] p. : ill. [CD-ROM]
https://www.researchgate.net/publication/221936231_Probabilistic_Leak_Detection_in_Pipe_Networks_Using_the_SCEM-UA_Algorithm

**Pumps energy consumption based on new EU legislation**
**Annus, Ivar**; Uibo, D.; **Koppel, Tiit** Procedia engineering 2014 / p. 517-524 : ill https://doi.org/10.1016/j.proeng.2014.11.473 Conference proceedings at Scopus Article at Scopus Article at WOS

**Real-time demands and calibration of water distribution systems**
**Vassiljev, Anatoli**; Koor, Margus; **Koppel, Tiit** Advances in engineering software 2015 / p. 108-113 : ill
https://doi.org/10.1016/j.advengsoft.2015.06.012 Journal metrics at Scopus Article at Scopus Journal metrics at WOS Article at WOS

**Rehabilitation aspects of oversized water distribution networks**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils** Hydraulic information management 2002 / p. 351-360

**Semi-empirical method for estimation of energy losses in a large-scale pipeline**
**Laanearu, Janek**; **Annus, Ivar**; **Sergejeva, Monika**; **Koppel, Tiit** Procedia engineering 2014 / p. 969-977 : ill
https://doi.org/10.1016/j.proeng.2014.02.108 Conference Proceedings at Scopus Article at Scopus Article at WOS

**Sensitivity of calibration results to uncertainties in input data: case of operational water distribution system**
**Vassiljev, Anatoli**; **Koppel, Tiit**; Saare, Arvo Urban Water Management: Challenges and Opportunities : proceedings of the 11th International Conference on Computing and Control for the Water Industry (CCWI 2011), University of Exeter, 5-7 September 2011 2011 / p. 713-718 : ill
https://www.researchgate.net/publication/290656813_Sensitivity_of_calibration_results_to_uncertainties_in_input_data_Case_of_operational_water_distribution_system

**Some aspects of fluid elasticity related to filling and emptying of large-scale pipeline**
Laanearu, Janek; **Bergant, Anton**; Annus, Ivar; Koppel, Tiit; **Westende, Jos M.C.van't** Proceedings of the 3rd IAHR International Meeting of the Workgroup on Cavitation and Dynamic Problems in Hydraulic Machinery and Systems : Brno, Czech Republic, October 14-16, 2009. Part II 2009 / p. 465-474 : ill

**Soojusülekandest kriitilistel režiimidel**
**Tihhomirova, T.**; **Saarniit, T.**; **Liiv, Uno**; **Koppel, Tiit** XXIX vabariiklik üliõpilaste teaduslik- tehniline konverents 30. märtsist - 1. aprillini 1977 : ettekannete teesid 1977 / lk. 112 https://www.ester.ee/record=b2449987*est

**Student mobility and economic situation in the constructive sector**
**Koppel, Tiit**; **Liias, Roode** Inquiries into European Higher Education in Civil Engineering, Ninth EUCEET Volume 2010 / p. 217-225

**A study on relationships between forcing factors and morphological parameters of outlet areas of some rivers flowing into the Estonian coastal sea**
**Koppel, Tiit**; **Laanearu, Janek** River basin management III : Third International Conference on River Basin Management 2005 / p. 225-235 : ill https://www.witpress.com/elibrary/wit-transactions-on-ecology-and-the-environment/83/15405

**Survetorude hüdrodünaamika probleeme**
**Koppel, Tiit**; **Ainola, Leo**; **Vassiljev, Anatoli** Teadusmõte Eestis. 4, Tehnikateadused. 2 2007 / lk. 33-40 : ill

**Zonal transport created by Rossby waves**

**Koppel, Tiit**; Soomere, Tarmo Annales geophysicae 1997 / Part 2, Supplement 2, p. C564

**Tallinn Technical University. Faculty of Civil Engineering 2002, 2003**
2002 https://www.ester.ee/record=b5650458*est

**Tallinn Technical University. Faculty of Civil Engineering 2003**
2003 http://www.ester.ee/record=b1810470*est

**Tallinna Tehnikaülikool. Ehitusteaduskond 2003**
2003 http://www.ester.ee/record=b1810459*est

**The civil engineering education in Estonia**
**Koppel, Tiit**; **Laur, Toomas** Civil engineering education in Europe - 2004 : fourth EUCEET volume 2004 / p. 38-42

**The skin friction coefficient during accelerated flows in pipes**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** XX Congress of the International Association for Hydraulic Research, Moscow USSR September 5-9, 1983. Vol. 6, Proceedings, subject A, B, C, D, supplement 1983 / p. 453-460
https://www.ester.ee/record=b1984825*est

**The use of error dynamics for calibration of water distribution systems**
**Koppel, Tiit**; **Vassiljev, Anatoli** Proceedings of the Twelfth International Conference on Civil, Structural and Environmental Engineering Computing : 1-4 September 2009, Madeira 2009 / p. Paper 247 [14 p.]
https://www.sciencedirect.com/science/article/pii/S0965997811002638

**Toimetus sai kirja Sadamate Liidult : [Eesti Sadamate Liidu tegevdirektori Viktor Palmeti kiri sadamaehituse inseneride koolitamise asjus, kommenteerivad TTÜ õppeprorektor Jakob Kübarsepp ja prof. Tiit Koppel]**
Palmet, Viktor; **Kübarsepp, Jakob**; **Koppel, Tiit** Mente et Manu 2009 / 6. märts, lk. 5 https://www.ester.ee/record=b1242496*est

**Tootmispraktika juhend-päevik : [ehitusteaduskonna erialade "Veevarustus ja kanalisatsioon" (1209) ning "Sooja-, gaasivarustus ja ventilatsioon" (1208) III ja IV kursuse üliõpilastele]**
1986 https://www.ester.ee/record=b2618376*est

**Transient flow during filling of horizontal pipe containing water**
**Laanearu, Janek**; **Annus, Ivar**; **Raidmaa, Meelis**; **Koppel, Tiit** Urban Water Management: Challenges and Opportunities : proceedings of the 11th International Conference on Computing and Control for the Water Industry (CCWI 2011), University of Exeter, 5-7 September 2011 2011 / p. 913-918 : ill

**Transition to sustainable water management**
**Pähn, Ene**; Kroon, K.; **Koppel, Tiit** 5th IWHA Conference Tampere, Finland 2007 : Pasts and Futures of Water : University of Tampere 13-17 June 2007 2007 / p. 167

**Transition to turbulence in accelerating flow**
**Annus, Ivar**; **Koppel, Tiit**; Vardy, Alan Proceedings of the HYDRALAB III Joint Transnational Access User Meeting : Hannover, February 2010 2010 / p. 9-12 : ill https://asmedigitalcollection.asme.org/fluidsengineering/article/133/7/071202/456268/Transition-to-Turbulence-in-Accelerating-Pipe-Flow

**Transition to turbulence in accelerating pipe flow**
**Annus, Ivar**; **Koppel, Tiit** Journal of fluids engineering 2011 / [7] p. : ill

**Turbulent structure development in transient pipe flow**
**Ainola, Leo**; **Daniel, Eghert**; **Kask, Endel**; **Koppel, Tiit**; **Liiv, Uno** Preprinted proceedings : 21st Congress, International Association for Hydraulic Research, Melbourne, 19-23 August 1985 = Compte-rendus 21e Congrès, Association internationale de recherches hydrauliques, Melbourne, 19 au 23 août 1985. Vol. 6 1985 / p. 6

**Unsteady flow investigation by infrared and thermoanemometer techniques**
Lähdeniemi, Matti; Ekholm, Ari; **Koppel, Tiit**; **Liiv, Uno** The Fourth Scandinavian International Conference on Fluid Power : proceedings of the conference, Tampere, Finland, September 26-29, 1995. Vol. 1 1995 / p. 432-441: ill

**Unsteady skin friction experimentation in a large diameter pipe**
**Vardy, Alan**; **Bergant, Anton**; **He, Shuisheng**; **Ariyaratne, Chanchala**; Koppel, Tiit; Annus, Ivar; **Tijsseling, Arris S.**; **Hou, Qingzhi** Proceedings of the 3rd IAHR International Meeting of the Workgroup on Cavitation and Dynamic Problems in Hydraulic Machinery and Systems : Brno, Czech Republic, October 14-16, 2009. Part II 2009 / p. 593-602 : ill
https://www.researchgate.net/publication/228984476_Unsteady_skin_friction_experimentation_in_a_large_diameter_pipe

**Use of error analysis for calibration of water distribution systems**
**Vassiljev, Anatoli**; **Koppel, Tiit**; **Puust, Raido** Water Distribution System Analysis 2010 : WDSA2010 : Tucson, AZ, USA, Sept. 12-

15, 2010 2010 / [13] p.: ill

**Use of modelling error dynamics for the calibration of water distribution systems**
**Koppel, Tiit**; **Vassiljev, Anatoli** Advances in engineering software 2012 / p. 188-196 : ill
https://www.sciencedirect.com/science/article/pii/S0965997811002638

**Use of pressure dynamics for calibration of water distribution system and leakage detection**
**Koppel, Tiit**; **Vassiljev, Anatoli**; Lukjanov, D.; **Annus, Ivar** Proceedings of WDSA 2008 : Water Distribution Systems Analysis : 17-20 August 2008, South Africa 2008 / p. 704-715 https://ascelibrary.org/doi/10.1061/41024%28340%2959

**Use of relative roughness and changed diameters for old pipes when calibrating an operational water distribution system**
**Vassiljev, Anatoli**; Martaud, M.; **Koppel, Tiit** Integrating Water Systems : proceedings of the Tenth International Conference on Computing and Control in the Water Industry 2009 : CCWI2009 : Sheffield, UK, 1-3 September 2009 2009 / p. 283-286

**Use of the real-time demands for calibration of water distribution systems**
**Vassiljev, Anatoli**; **Koppel, Tiit** Proceedings of the Fourteenth International Conference on Civil, Structural and Environmental Engineering Computing 2013 / p. 1-9 : ill [Paper 233] https://www.ctresources.info/ccp/paper.html?id=7566 Conference Proceedings at Scopus Article at Scopus

**Using transient flow equations for modelling of filling and emptying of the large-scale pipeline**
**Koppel, Tiit**; **Laanearu, Janek**; **Annus, Ivar**; **Raidmaa, Meelis** Water Distribution System Analysis 2010 : WDSA2010 : Tucson, AZ, USA, Sept. 12-15, 2010 2010 / [9] p.: ill https://ascelibrary.org/doi/10.1061/41203%28425%2912

**Uurimus rannajoonel toimuvatest protsessidest : [Toomas Liivi litsensiaadi väitekirjast, kaitstud Stockholmi Kuninglikus Tehnoloogiainstituudis]**
**Koppel, Tiit** Tehnikaülikool 1999 / lk. 6 : portr. https://www.ester.ee/record=b5309277*est

**Water distribution system modelling and pumping optimization based on real network of Tallinn = Tallinna linna ühisveevärgi modelleerimine ja pumpamise optimeerimine**
**Koor, Margus** 2015 https://www.ester.ee/record=b4478906*est

**Water hammer and column separation due to accidential simultaneous closure of control valves in a large scale two-phase flow experimental test rig**
Bergant, Anton; Westende, Jos M.C.van't; **Koppel, Tiit**; Gale, Janez; Hou, Qingzhi; Pandula, Zoltan; Tijsseling, Arris S. Proceedings of the ASME 2010 Pressure Vessels & Piping Division/K-PVP Conference : PVP2010 : July 18-22, 2010, Bellevue, Washington, USA 2010 / [10] p.: ill
https://www.researchgate.net/publication/280624441_Water_hammer_and_column_separation_due_to_accidental_simultaneous_closure_of_control_valves_in_a_large-scale_two-phase_flow_experimental_test_rig

**Water hammer and column separation due to accidential simultaneous closure of control valves in a large scale two-phase flow experimental test rig**
Bergant, Anton; Westende, Jos M.C.van't; **Koppel, Tiit**; Gale, Janez; Hou, Qingzhi; Pandula, Zoltan; Tijsseling, Arris S. 2010
https://www.researchgate.net/publication/280624441_Water_hammer_and_column_separation_due_to_accidental_simultaneous_closure_of_control_valves_in_a_large-scale_two-phase_flow_experimental_test_rig

**Water network model as a tool for making rehabilitation decisions**
**Ainola, Leo**; **Koppel, Tiit**; **Kändler, Nils** XXII Nordic Hydrological Conference : Roros, Norway 4-7 August 2002. Vol. II 2002 / p. 749-756 : ill

**Water network model calibration based on grouping pipes with similar leakage and roughness estimates**
**Ainola, Leo**; **Koppel, Tiit**; Tiiter, K.; **Vassiljev, Anatoli** Proceedings of ASCE's 2000 : Joint Conference on Water Resources Engineering and Water Resources Planning & Management 2000 / [9] p., [CD-ROM]
https://www.researchgate.net/publication/268593940_Water_Network_Model_Calibration_Based_on_Grouping_Pipes_with_Similar_Leakage_and_Roughness_Estimates

**Water quality in networks in the conditions of substantial decrease of water consumption**
**Koppel, Tiit**; **Kändler, Nils**; Tiiter, K.; **Vassiljev, Anatoli** Proceedings : Frontiers in urban water management : Deadlock or hope? : symposium, 18-20 June 2001, Marseille, France 2001 / p. 38-45 : ill

**Vene-eesti veesõnaraamat**
**Tibar, Harri**; Maastik, Aleksander; **Karu, Jaan**; **Mölder, Heino**; **Koppel, Tiit** 1990 https://www.ester.ee/record=b1218771*est

**Ventilaatorid**
**Koppel, Tiit** 2013 http://www.ester.ee/record=b2970668*est

**Ühisveevärk**
**Mölder, Heino**; **Suurkask, Valdu**; **Koppel, Tiit**; Metslang, Mihkel 2003 https://www.ester.ee/record=b1799313*est

**Алгоритм управления работой скважинных насосов**
**Karu, Jaan**; **Koppel, Tiit**; **Pedak, H.**; **Tiiman, Ago** Неустановившиеся процессы в системах водоснабжения и водоотведения 1989 / с. 7-18

**Анализ возникновения и развития турбулентности при ускоренном движении жидкости в трубе**
**Kask, Endel**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1987 / с. 42-46

**Анализ работы водопроводной сети г. Пярну на ЭВМ**
**Silm, M.** XXXII студенческая научно-техническая конференция вузов Прибалтийских республик, Белорусской ССР и Молдавской ССР, 19-21 апреля 1988 г. : тезисы докладов : [в 3-х частях], ч. 3 1988 / с. 136
https://www.ester.ee/record=b1571601*est

**Визуализация пограничного слоя при ускоренном движении жидкости в трубе**
**Kask, Endel**; **Koppel, Tiit** Гидроаэродинамика и динамика систем управления 1987 / с. 117-122

**Визуализация разгона жидкости с поплавком в короткой трубе**
**Kask, Endel**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1984 / с. 13-19

**Гидравлика и пневматика**
**Reedik, Vello**; **Grossschmidt, Gunnar**; **Vanaveski, Jüri**; **Pais, Enno**; **Pahapill, Jaak**; **Ainola, Leo**; **Liiv, Uno**; **Ruustal, Endel**; **Kask, Endel**; **Koppel, Tiit**; **Lepp, Andres**; Ruubel, R.; **Sarv, Laur**; **Daniel, Eghert**; **Tiiman, Ago**; **Kõiv, Teet-Andrus** 1987
https://www.ester.ee/record=b1317064*est

**Измерительный комплекс для изучения гидродинамических процессов при течении жидкости в трубе**
**Kask, Endel**; **Koppel, Tiit**; **Lepp, Andres**; **Ruubel, R.**; **Sarv, Laur** Гидроаэродинамика и динамика систем управления 1987 / с. 81-88

**Изучение нестационарного течения жидкости в трубе методом визуализации**
**Kask, Endel**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1983 / с. 55-62 : ил
https://www.ester.ee/record=b1288813*est https://digikogu.taltech.ee/et/Item/8421bbec-80f9-4a7b-bbfa-deb3bcbf3a68

**Интегральные соотношения и параметры течения при нестационарных движениях жидкость в цилиндрических трубах**
**Ainola, Leo**; **Koppel, Tiit**; **Liiv, Uno** Шестой Всесоюзный съезд по теоретической и прикладной механике, Ташкент, 24-30 сентября 1986 г. : аннотация. докладов 1986 / с. 1-20

**Исследование замены режима ламинарного нестационарного движения турбулентным в трубах**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** Пятый Всесоюзный съезд по теоретической и прикладной механике, Алма-Ата, 27 мая - 3 июня 1981 года : аннотации докладов 1981 / с. ? https://www.ester.ee/record=b2682342*est

**Исследование касательных напряжений на стенке трубопровода при нестационарном напорном течении жидкостей : автореферат ... кандидата технических наук (05.14.09)**
**Koppel, Tiit** 1975 http://www.ester.ee/record=b1664483*est

**Исследование касательных напряжений на стенке трубопровода при нестационарном напорном течении жидкостей : диссертация ... кандидата технических наук : 05.14.09 - гидравлика и инженерная гидрология**
**Koppel, Tiit** 1975 http://www.ester.ee/record=b2307049*est

**Исследование локальных скоростей при разгонном движении жидкости из состояния покоя в трубе**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** Прогнозирование и регулирование качества воды водоемов и исследование методов очистки природных и сточных вод 1980 / с. 35-45 : илл https://www.ester.ee/record=b1283634*est
https://digikogu.taltech.ee/et/Item/dcc66d6e-5806-4d18-869a-be4e1dcef643

**Методы визуализации, используемые при исследовании нестационарного течения**
**Kask, Endel**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1988 / с. 54-59

**О движении жидкости с поплавком в тубе**
**Daniel, Eghert**; **Kask, Endel**; **Koppel, Tiit**; **Ruubel, R.** Всесюзная научно-техническая конференция "Контейнерный трубопроводный транспорт "(г.Новополоцк, 1984 г.) 1984 / с. 63-64

**О коэффициенте трения для ламинарных нестационарных течений в трубе**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno**; **Eensalu, Olav** Неустановившиеся процессы в системах водоснабжения и водоотведения 1981 / с. 3-15 : илл https://www.ester.ee/record=b1319728*est https://digikogu.taltech.ee/et/Item/a29e3511-a15e-4820-91bd-9a53eb726784

**О критериях перехода ламинарной формы течения в турбулентную при разгонном движении жидкости в круглой трубе**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** Неустановившиеся процессы в системах водоснабжения и водоотведения 1981 / с. 17-29 : илл https://www.ester.ee/record=b1319728*est https://digikogu.taltech.ee/et/Item/a29e3511-a15e-4820-91bd-9a53eb726784

**Определение шероховатости труб для модели сети водоснабжения**
**Koppel, Tiit**; **Vassiljev, Anatoli** International Trade Fair and Congress 2008 / [1] p

**Определение шероховатости труб для модели системы водоснабжения, включающей трубы разногово возраста**
**Koppel, Tiit**; **Vassiljev, Anatoli** ЭКВАТЕК2006 Москва : сборник докладов. 1 2006 / с. 536

**Особенности измерения вектора скорости потоков в цилиндрической трубе лазерным измерителем скорости**
**Aitsam, Alar**; **Koppel, Tiit** XXX студенческая научно-техническая конференция вузов Прибалтийских республик, Белорусской ССР и Молдавской ССР, 8-10 апреля 1986 года : тезисы докладов. Том I, Общественные науки. Физико-математические науки. Строительство. Экономика 1986 / с. 102 https://www.ester.ee/record=b1305540*est

**Процесс турбулизации потока при ускорении жидкости в цилиндрической трубе**
**Daniel, Eghert**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1985 / с. 109-122

**Разгонное движение жидкости с поплавком в трубе**
**Kask, Endel**; **Koppel, Tiit**; **Ruubel, R.** Неустановившиеся процессы в системах водоснабжения и водоотведения 1985 / с. 59-72

**Разработка АСУ ТП водопровода небольшого города**
**Karu, Jaan**; **Koppel, Tiit**; **Sarv, Laur**; **Tiiman, Ago** Неустановившиеся процессы в системах водоснабжения и водоотведения 1988 / с. 16-24

**Разработка модели системы водопроводной сети**
**Kändler, Nils**; **Koppel, Tiit**; **Vassiljev, Anatoli** Четверты международный конгресс "Вода : экология и технология" : ЭКВАТЕК-2000 : Москва, 30 мая - 2 июня 2000 : тезисы докладов 2000 / с. 369-370

**Руководство-дневник по производственной практике**
1987 https://www.ester.ee/record=b3863062*est

**Санитарная техника**
**Tibar, Harri**; **Paal, Leopold**; **Mölder, Heino**; **Ütt, Jaanus**; **Lode, Elve**; Kurbatov, V.A.; **Toomet, Madis**; **Kask, Endel**; **Koppel, Tiit**; **Dumkina, Galina**; Ruubel, R. 1987 https://www.ester.ee/record=b1294161*est

**Санитарная техника**
**Suurkask, Valdu**; **Mölder, Heino**; **Help, Kalju**; **Ütt, Jaanus**; **Blonskaja, Viktoria**; **Vostrikov, Valeri**; **Karu, Jaan**; **Koppel, Tiit**; **Sarv, Laur**; **Tiiman, Ago**; **Säärekõnno, Jüri**; **Kirt, Enno**; **Kõiv, Teet-Andrus**; **Kask, Endel**; **Aitsam, Alar**; **Daniel, Eghert**; **Sarv, Laur**; **Ainola, Leo**; **Liiv, Uno** 1988 https://www.ester.ee/record=b1223647*est

**Санитарная техника**
**Tibar, Harri**; **Paal, Leopold**; **Viies, Vladimir**; **Suurkask, Valdu**; **Karu, Jaan**; **Koppel, Tiit**; Pedak, H.; **Tiiman, Ago**; **Aitsam, Alar**; **Daniel, Eghert**; **Sarv, Laur**; Kikas, K.; **Blonskaja, Viktoria**; **Vostrikov, Valeri**; **Mölder, Heino**; **Säärekõnno, Jüri**; **Liiv, Uno**; Gross, M. 1989 https://www.ester.ee/record=b1232430*est

**Санитарная техника**
**Suurkask, Valdu**; **Kask, Endel**; **Paal, Leopold**; **Koppel, Tiit**; **Ainola, Leo**; **Liiv, Uno**; **Karu, Jaan**; **Säärekõnno, Jüri**; **Tibar, Harri**; **Mölder, Heino**; Repin, B.N.; **Ütt, Jaanus**; **Kõiv, Teet-Andrus** 1984 https://www.ester.ee/record=b1515123*est

**Санитарная техника**
**Tibar, Harri**; Veski, A.; **Karu, Jaan**; **Suurkask, Valdu**; **Hääl, Maire-Liis**; **Säärekõnno, Jüri**; Bomze, Z.; **Munter, Rein**; **Kamenev, Sven**; **Preis, Sergei**; **Siirde, Enno**; Hudak, V.I.; **Pikkov, Lui**; **Kask, Endel**; **Koppel, Tiit**; Ruubel, R.; **Daniel, Eghert**; **Liiv, Uno**; **Sarv, Laur**; **Ainola, Leo**; **Ruustal, Endel**; **Koppel, Tiit**; **Toomet, Madis** 1985 https://www.ester.ee/record=b1255730*est

**Система для накопления и обработки экспериментальных данных гидравлических исследований**
**Haavel, Rein**; **Koppel, Tiit**; **Liiv, Uno** Сборник статей по санитарной технике. 10 1975 / с. 37-43 : илл https://www.ester.ee/record=b2084885*est https://digikogu.taltech.ee/et/Item/db37b17f-7b32-4060-8994-b23a7fa29638

**Создание калиброванных моделей водопроводных сетей и оптимизация работы насосных станций в условиях резкого снижения водопотребления**
**Koppel, Tiit**; **Karu, Jaan** Третий международный конгресс "Вода: экология и технология" : "ЭКВАТЭК-98", Москва, 25-30 мая 1998 г. : тезисы докладов 1998 / с. 263-264

**Спектральное распределение энергии в слое смешения нестационарного отрывного течения в канале с открытой поверхностью**
**Koppel, Tiit** Гидроаэродинамика и динамика систем управления 1983 / с. 27-39 : ил https://www.ester.ee/record=b1273193*est https://digikogu.taltech.ee/et/Item/6eddf5c2-8425-45ed-8c1b-1a000c6f681a

**Спектральный анализ ускоренного турбулентного движения жидкости в трубопроводах**
**Ainola, Leo**; **Koppel, Tiit**; **Lamp, Jürgen**; **Liiv, Uno** Неустановившееся движение жидкости в трубах 1980 / с. 3-15 : илл https://www.ester.ee/record=b1263941*est https://digikogu.taltech.ee/et/Item/aeac2da9-cb51-4746-9dc3-c435104586eb

**Спектральный состав турбулентности в слое смешения**
**Daniel, Eghert** XXVI студенческая научно-техническая конференция вузов Молдавской ССР, Белорусской ССР и Прибалтийских республик, 21-23 апреля 1982 года : тезисы докладов. Часть 2, Химия и технология, механика, строительство 1982 / с. 207-208 https://www.ester.ee/record=b5165223*est

**Уравнения движения возмущений ламинарного нестационарного течения сжимаемой жидкости в цилиндрической трубе**
**Ainola, Leo**; **Koppel, Tiit** Неустановившиеся процессы в системах водоснабжения и водоотведения 1983 / с. 37-45 https://www.ester.ee/record=b1288813*est https://digikogu.taltech.ee/et/Item/8421bbec-80f9-4a7b-bbfa-deb3bcbf3a68

**Экспериментальное исследование возникновения движения жидкости в трубопроводах**
**Koppel, Tiit**; **Liiv, Uno** Известия Академии наук. Механика жидкости и газа 1977 / с. 79-85 https://www.ester.ee/record=b1255929*est

**Экспериментальное определение уровня пульсации касательных напряжений на стенке трубопровода при переходном движении жидкости**
**Koppel, Tiit**; **Liiv, Uno** Прогнозирование и регулирование качества воды водоемов и исследование методов очистки природных и сточных вод 1977 / с. 43-48 : илл https://www.ester.ee/record=b1309563*est https://digikogu.taltech.ee/et/Item/b7ac8308-bd5f-45bf-8000-222db26ff1a1

**Электромагнитные расходомеры с кодированным выходным сигналом для измерения быстропеременных скоростей в трубопроводах**
**Kask, Endel**; **Koppel, Tiit**; **Korsen, Viljo**; **Liiv, Uno**; Rosmann, Mart-Rein Сборник статей по санитарной технике. 10 1975 / с. 45-51 : илл https://www.ester.ee/record=b2084885*est https://digikogu.taltech.ee/et/Item/db37b17f-7b32-4060-8994-b23a7fa29638