

**Submitted**

- a. Papaioannou I., Breitung K., Straub D.: Reliability sensitivity estimation with sequential importance sampling. *Structural Safety*, under review.
- b. Berk M., Kroll H.-M., Schubert O., Buschardt B., Straub D. (2017). Reliability assessment of safety-critical sensor information: Does one need a reference truth? *IEEE Transactions on Reliability*, under review.
- c. Dittes B., Kaiser M., Špačková O., Rieger W., Disse M., Straub D.: Risk-based flood protection planning under climate change and modelling uncertainty: a pre-alpine case study. *Natural Hazards and Earth System Sciences*, under review.
- d. Geyer S., Papaioannou I., Straub D.: Cross entropy-based importance sampling using Gaussian densities revisited. *Structural Safety*, under review.
- e. Dittes B., Špačková O., Schoppa L., Straub D.: Climate uncertainty in flood protection planning. *Hydrology and Earth System Sciences*, under review.
- f. Jiang S.-H., Papaioannou I., Straub D.: Bayesian updating of slope reliability in spatially variable soils with in-situ measurements. *Engineering Geology*, under review.
- g. Ji Y., Papaioannou I., Straub D.: Probabilistic Failure Analysis of Infinite Slopes under Random Rainfall Processes and Spatially Variable Soil Properties. *Georisk*, under review.
- h. Luque J., Straub D.: Risk-based optimization of inspection strategies in structural systems. *Structural Safety*, under review.
- i. Betz W., Beck J.L., Papaioannou I., Straub D. Bayesian inference with reliability methods without knowing the maximum of the likelihood function. *Probabilistic Engineering Mechanics*, under review.
- j. Dittes B., Špačková O., Straub D.: Managing uncertainty in flood predictions: Flexible protection strategies vs safety factors. *Journal of Flood Risk Management*, under review.

**Book chapters**

1. Straub D., Papaioannou I. (2015): Bayesian analysis for learning and updating geotechnical parameters and models with measurements. Chapter 5 in: *Risk and Reliability in Geotechnical Engineering* (eds. Phoon K.-K., Ching J.), CRC Press.
2. Straub D. (2014): Engineering Risk Assessment. Chapter 12 in: *Risk - A Multidisciplinary Introduction* (eds. Klüppelberg C., Straub D., Welpel I.), Springer.
3. Straub D., Welpel I. (2014): Decision-making under risk: a normative and behavioral perspective. Chapter 3 in: *Risk - A Multidisciplinary Introduction* (eds. Klüppelberg C., Straub D., Welpel I.), Springer.

**Books edited**

4. Klüppelberg C., Straub D., Welpel I. (eds.) (2014): *Risk - A Multidisciplinary Introduction*. Springer. ISBN: 978-3-319-04485-9.
5. Vogt N., Schuppener B., Straub D., Bräu G. (eds.), (2011). *Geotechnical Risk and Safety*. Bundesanstalt für Wasserbau. ISBN: 978-3-939230-01-4.
6. Straub D. (ed.), (2010). *Reliability and Optimization of Structural Systems*. CRC Press, Taylor and Francis Group, London, UK. ISBN: 978-0-415-88179-1.

**Referred journal publications**

7. Berk M., Špačková O., Straub D. (2018). Probabilistic Design Storm Method for Improved Flood Estimation in Ungauged Catchments. *Water Resources Research*, in print.

8. Betz W., Papaioannou I., Beck J.L., Straub D. (2018). Bayesian inference with Subset Simulation: strategies and improvements. *Computer Methods in Applied Mechanics and Engineering*, in print.
9. Byun J.-E., Song J., Zwirgmaier K., Straub D. (2018). An improved non-parametric Bayesian independence test for probabilistic learning of the dependence structure among continuous random variables. *KSCE Journal of Civil Engineering*, in print.
10. Papaioannou I., Straub D. (2017). Learning soil parameters and updating geotechnical reliability estimates under spatial variability – theory and application to shallow foundations. *Georisk*, **11**(1): 116-128.
11. Müller M., Drees L., Schmidt-Moll C., Gontar P., Zwirgmaier K., Wang C., Bengler K., Holzapfel F., Straub D. (2017). Risk Analysis of the EASA Minimum Fuel Requirements Considering the ACARE-defined Safety Target. *Journal of Air Transport Management*, **65**:1-10.
12. Špačková O., Straub D. (2017). Long-term adaptation decisions via fully and partially observable Markov decision processes. *Sustainable and Resilient Infrastructure*, **2**(1): 37-58.
13. Zwirgmaier K., Straub D., Groth K. (2017). Capturing cognitive causal paths in human reliability analysis with Bayesian network models. *Reliability Engineering & System Safety*, **158**: 117–129.
14. Luque J., Hamann R., Straub D. (2017). Spatial modeling of corrosion in ship structures. *ASCE-ASME Journal of Risk and Uncertainty Analysis, Part B*, **3**(3): 031001.
15. Papakosta P., Xanthopoulos G., Straub D. (2017). Probabilistic prediction of wildfire economic losses to housing in Cyprus using Bayesian network analysis. *International Journal of Wildland Fire*, **26**: 10–23.
16. Depina I., Papaioannou I., Straub D., Eiksund G. (2017). Coupling the cross-entropy with line sampling method for risk-based design optimization. *Structural and Multidisciplinary Optimization*, **55**(5): 1589-1612.
17. Scherb A., Garrè L., Straub D. (2017). Reliability and component importance in networks subject to spatially distributed hazards followed by cascading failures. *ASCE-ASME Journal of Risk and Uncertainty Analysis, Part B*, **3**(2), 021007.
18. Schneider R., Thöns S., Straub D. (2017). Reliability analysis and updating of structural systems with subset simulation. *Structural Safety*, **64**: 20-36.
19. Giovanis D.G., Papaioannou I., Straub D., Papadopoulos V. (2017). Bayesian updating with subset simulation using artificial neural networks. *Computer Methods in Applied Mechanics and Engineering*, **319**: 124–145.
20. Zwirgmaier K., Straub D. (2016). A discretization procedure for rare events in Bayesian networks. *Reliability Engineering & System Safety*. **153**: 96–109.
21. Straub D., Papaioannou I., Betz W. (2016): Bayesian analysis of rare events. *Journal of Computational Physics*, **314**: 538–556.
22. Papaioannou I., Papadimitriou C., Straub D. (2016). Sequential Importance Sampling for Structural Reliability. *Structural Safety*, **62**: 66-75.
23. Sättele M., Krautblatter M., Bründl M., Straub D. (2016). Forecasting rock slope failures: How reliable and effective are warning systems? *Landslides*, **13**(4): 737–750.
24. Luque J., Straub D. (2016). Reliability analysis and updating of deteriorating structural systems with dynamic Bayesian networks. *Structural Safety*, **62**: 34–46
25. Betz W., Papaioannou I., Straub D. (2016). Transitional Markov Chain Monte Carlo: Observations and Improvements. *ASCE Journal of Engineering Mechanics*, **142**(5): 04016016.
26. Sättele M., Bründl M., Straub D. (2016). Quantifying the effectiveness of early warning systems for natural hazards. *Natural Hazards and Earth System Sciences*, **16**: 149–166.
27. Papakosta P., Straub D. (2016). Probabilistic prediction of daily fire occurrence in the Mediterranean based on weather and anthropogenic factors. *iForest*, **10**: 32-40.

28. Camós C., Špačková O., Straub D., Molins C. (2016). Probabilistic approach to assessing and monitoring settlements caused by tunneling. *Tunneling and Underground Space Technology*, **51**: 313–325
29. Špačková O., Straub D. (2015). Cost-benefit analysis for optimization of risk protection under budget constraints. *Risk Analysis*, **35**(5):941–959.
30. Papaioannou I., Betz W., Zwirgmaier K., Straub D. (2015). MCMC Algorithms for Subset Simulation. *Probabilistic Engineering Mechanics*, **41**: 89-103.
31. Bensi M.T., Der Kiureghian A., Straub D. (2015). Framework for Post-Earthquake Risk Assessment and Decision Making for Infrastructure Systems. *ASCE-ASME Journal of Risk and Uncertainty Analysis. Part A: Civ. Eng.*, **1**(1), 04014003.
32. Schneider R., Fischer J., Bügler M., Nowak M., Thöns S., Borrmann A., Straub D. (2015). Assessing and updating the reliability of concrete bridges subjected to spatial deterioration – principles and software implementation. *Structural Concrete*, **16**(3): 356-365.
33. Straub D., Papaioannou I. (2015). Bayesian Updating with Structural Reliability Methods. *Journal of Engineering Mechanics, Trans. ASCE*, **141**(3), 04014134.
34. Sättele M., Bründl M., Straub D. (2015). Reliability and Effectiveness of Warning Systems for Natural Hazards: Concepts and Application to Debris Flow Warning. *Reliability Engineering & System Safety*, **142**: 192-202
35. Straub D. (2014). Value of information analysis with structural reliability methods. *Structural Safety*, **49**: 75-86.
36. Altamura A., Straub D. (2014). Reliability assessment of high cycle fatigue under variable amplitude loading: review and solutions. *Engineering Fracture Mechanics*. **121**: 40–66.
37. Betz W., Papaioannou I., Straub D. (2014). Numerical methods for the discretization of random fields by means of the Karhunen-Loève expansion. *Computer Methods in Applied Mechanics and Engineering*, **271**: 109–129.
38. Keßler S., Fischer J., Straub D., Gehlen C. (2014). Updating of Service Life Prediction of Reinforced Concrete Structures with Potential Mapping. *Cement & Concrete Composites*, **47**: 47–52
39. Špačková O., Šejnoha J., Straub D. (2013). Probabilistic assessment of tunnel excavation performance based on data. *Tunneling and Underground Space Technology*, **37**: 62–78.
40. Bensi M.T., Der Kiureghian A., Straub D. (2013). Efficient Bayesian network modeling of systems. *Reliability Engineering & System Safety*, **112**: 200-213.
41. Špačková O., Straub D. (2013). Dynamic Bayesian networks for probabilistic modeling of tunnel excavation processes. *Computer-Aided Civil and Infrastructure Engineering*, **28**(1): 1-21.
42. Frey D., Butenuth M., Straub D. (2012): Probabilistic graphical models for flood state detection of roads combining imagery and DEM. *IEEE Geoscience and Remote Sensing Letters*, **9**(6): 1051-1055.
43. Papaioannou I., Straub D. (2012). Reliability updating in geotechnical engineering including spatial variability of soil. *Computers & Geotechnics*, **42**: 44–51.
44. Faber M.H., Straub D., Montes-Iturrizaga R., Heredia-Zavoni E. (2012). Risk Assessment for Design of FPSO Systems. Part I: Generic Models and Acceptance Criteria. *Marine Structures*, **28**(1): 120-133.
45. Montes-Iturrizaga R., Heredia-Zavoni E., Faber M.H., Straub D. (2012). Risk Assessment for Design Criteria of FPSO Systems. Part II: Consequence Models and Applications to Determination of Target Reliabilities. *Marine Structures*, **28**(1): 50-66.
46. Schumacher T., Straub D., Higgins C.C. (2012): Toward a Probabilistic Acoustic Emission Source Location Algorithm: a Bayesian Approach. *Journal of Sound and Vibration*, **331**(19): 4233-4245.
47. Montes-Iturrizaga R., Heredia-Zavoni E., Silva-González F., Straub D. (2012). Nested Reliability Analysis and Calibration of Safety Factors for Mooring Lines. *Applied Ocean Research*, **34**(1): 107–115.

48. Straub D. (2011). Reliability updating with equality information. *Probabilistic Engineering Mechanics*, **26**(2): 254-258.
49. Straub D., Der Kiureghian A. (2011). Reliability Acceptance Criteria for Deteriorating Elements of Structural Systems. *Journal of Structural Engineering*, Trans. ASCE, **137**(12): 1573-1582.
50. Bensi M.T., Der Kiureghian A., Straub D. (2011). Bayesian network modeling of correlated random variables drawn from a Gaussian random field. *Structural Safety*, **33**(6), pp. 317-332.
51. Montes-Iturrizaga R., Inda Sarmiento G., Morandi A., Silva-González F., Heredia-Zavoni E., Straub D. (2011). Reliability Analysis of FPSO Components and Calibration of Safety Factors using Response Surfaces. *Transactions of SNAME*, **119**: 212-224.
52. Straub D., Der Kiureghian A. (2010). Bayesian Network Enhanced with Structural Reliability Methods. Part A: Theory. *Journal of Engineering Mechanics*, Trans. ASCE, **136**(10), pp. 1248-1258.
53. Straub D., Der Kiureghian A. (2010). Bayesian Network Enhanced with Structural Reliability Methods. Part B: Applications. *Journal of Engineering Mechanics*, Trans. ASCE, **136**(10), pp. 1259-1270.
54. Straub D. (2009). Stochastic modeling of deterioration processes through dynamic Bayesian networks. *Journal of Engineering Mechanics*, Trans. ASCE, **135**(10), pp. 1089-1099.
55. Straub D., Malioka V., Faber M.H. (2009). A framework for the asset integrity management of large deteriorating concrete structures. *Structure and Infrastructure Engineering*, **5**(3) pp. 199 - 213.
56. Montes-Iturrizaga R., Heredia-Zavoni E., Vargas F., Faber M.H., Straub D., De la O J. (2009). Risk Based Structural Integrity Management Using Bayesian Probabilistic Nets. *Journal of Offshore Mechanics and Arctic Engineering*. Trans. ASME, **131**(1).
57. Straub D., Der Kiureghian A. (2008). Improved Seismic Fragility Modeling from Empirical Data. *Structural Safety*, **30**(4), pp. 320-336.
58. Straub D., Schubert M. (2008). Modelling and managing uncertainty in rock-fall hazards. *Georisk*, **2**(1), pp. 1-15.
59. Nishijima K., Faber M.H., Straub D., (2008). Sustainable decisions for life-cycle based design and maintenance. *Australian Journal of Civil Engineering*, **4**(1), pp. 59-72.
60. Straub D., Faber M.H. (2007). Temporal Variability in Corrosion Modeling and Reliability Updating. *Journal of Offshore Mechanics and Arctic Engineering*, Trans. ASME, **129**(4), pp. 265-272.
61. Nishijima K., Straub D., Faber M.H. (2007). Inter-generational distribution of the life-cycle cost of an engineering facility. *Journal of Reliability of Structures and Materials*, **3**(1), pp. 33-46.
62. Straub D., Grêt-Regamey A. (2006). A Bayesian probabilistic framework for avalanche modelling based on observations. *Cold Regions Science and Technology*, **46**(3) , pp. 192-203.
63. Grêt-Regamey A., Straub D. (2006). Spatially explicit avalanche risk assessment linking Bayesian networks to a GIS. *Natural Hazards and Earth System Sciences*, **6**(6), pp. 911-926.
64. Straub D., Faber M.H. (2006). Computational Aspects of Risk Based Inspection Planning. *Computer-Aided Civil and Infrastructure Engineering*, **21**(3), pp. 179-192.
65. Faber M.H., Straub D., Maes M.A. (2006). A Computational Framework for Risk Assessment of RC Structures Using Indicators. *Computer-Aided Civil and Infrastructure Engineering*, **21**(3), pp. 216-230.
66. Straub D., Faber M.H. (2005). Risk Based Inspection Planning for Structural Systems. *Structural Safety*, **27**(4), pp 335-355.
67. Straub D., Faber M.H. (2005). Risk Based Acceptance Criteria for Joints Subject to Fatigue Deterioration. *Journal of Offshore Mechanics and Arctic Engineering*, Trans. ASME, **127**(2), pp. 150-157.

68. Faber M.H., Sørensen J.D., Tychsen J., Straub D. (2005). Field Implementation of RBI for Jacket Structures. *Journal of Offshore Mechanics and Arctic Engineering*, Trans. ASME, **127**(3), pp. 220-226.
69. Straub D., Faber M.H. (2004). System Effects in Generic Risk Based Inspection Planning. *Journal of Offshore Mechanics and Arctic Engineering*, Trans. ASME, **126**(3), pp. 265-271.
70. Faber M.H., Straub D., Goyet J. (2003). Unified Approach to Risk Based Inspection Planning for Offshore Production Facilities. *Journal of Offshore Mechanics and Arctic Engineering*, Trans. ASME, **125**(2), pp 126-131.
71. Goyet J., Straub D., Faber M.H. (2002). Risk Based Inspection Planning for Offshore Installations. *Structural Engineering International*, **12**(3), pp. 200-208.
72. Goyet J., Straub D., Faber M.H. (2002). Risk Based Inspection Planning - Methodology and Application to an Offshore Structure. *Revue Française de Génie Civil*, **6**(3), pp. 489-503.

### Non-referred journal articles

73. Straub D., Faber M.H. (2006). Inspektionsstrategien für den optimalen Unterhalt von Tragwerken. *Stahlbau*, **75**(5), pp. 389-396.
74. Straub D., Faber M.H. (2005). Die Planung und der Wert von Inspektionen für Bauwerke. *Der Bauingenieur*, Springer Schweiz, **1**(6), pp. 24-29.
75. Straub D., Faber M.H. (2004). On the Relation between Inspection Quality and Quantity. *e-Journal of Nondestructive Testing*, **9**(7), www.ndt.net.

### Referred papers in conference proceedings and edited volumes

76. Geyer S., Papaioannou I., Straub D. (2017). On the efficiency of cross entropy-based importance sampling with Gaussian densities. *Proc. 15<sup>th</sup> International Probabilistic Workshop*, Dresden.
77. Straub, D., Papaioannou, I., Betz, W. (2017). Reliability updating in the presence of spatial variability. In Gardoni, P., (Ed.), *Risk and Reliability Analysis: Theory and Applications*, Springer.
78. Jiang S.H., Papaioannou I., Li C.-G. Straub D. (2017). Integrating LEM with FEM through model correction factor method in reliability analysis of spatially variable slopes. *Proc. 15<sup>th</sup> International Conference of the International Association for Computer Methods and Advances in Geomechanics*, Wuhan, China.
79. Papaioannou I., Straub D. (2017). Efficient sampling of non-Gaussian priors in high dimensions. *Proc. ICOSSAR 2017*, Vienna
80. Bismut E., Luque J., Straub D. (2017). Optimal prioritization of inspections in structural systems considering component interactions and interdependence. *Proc. ICOSSAR 2017*, Vienna
81. Zwirgmaier K., Papaioannou I., Straub D. (2017). Enhancing sampling based inference in hybrid BNs for reliability assessment. *Proc. ICOSSAR 2017*, Vienna
82. Uribe F., Papaioannou I., Betz W., Ullmann E., Straub D. (2017). Random fields in Bayesian inference: Effects of different prior assumptions. *Proc. ICOSSAR 2017*, Vienna.
83. Straub D., Chatzi E., Bismut E., Courage W., Döhler M., Faber M.H., Köhler J., Lombaert G., Omenzetter P., Pozzi M., Thöns S., Val D., Wenzel H., Zonta D. (2017). Value of information: A roadmap to quantifying the benefit of structural health monitoring, *Proc. ICOSSAR 2017*, Vienna.
84. Kim H.-J., Straub D. (2017). Reliability analysis and updating of inspected ship structures subject to spatially variable corrosion. *Proc. ICOSSAR 2017*, Vienna.

85. Berk M., Kroll H.-M., Schubert O., Buschardt B., Straub D. (2017). Bayesian Test Design for Reliability Assessments of Safety-Relevant Environment Sensors Considering Dependent Failures. *WCX17: SAE World Congress, Detroit*.
86. Chatzi E., Papakonstantinou K.G., Hajdin R., Straub D. (2017). Observation-based Decision-making for Infrastructure. *Workshop on the Value of Structural Health Monitoring for Reliable Bridge Management, Zagreb, Croatia*.
87. Jiang S., Papaioannou I., Straub D. (2017). Optimizing borehole locations for slope reliability assessment. *Geosnet conference, Denver*.
88. Papaioannou I., Straub D. (2017). How subjective are geotechnical reliability estimates? *Geosnet conference, Denver*.
89. Straub D., Špačková O. (2016). Optimizing adaptable systems for future uncertainty. Keynote, *14<sup>th</sup> Probabilistic Workshop, Ghent University*.
90. Jiang S., Papaioannou I., Straub D. (2016). Bayesian updating of slope reliability in undrained clay with vane shear test data. *14<sup>th</sup> Probabilistic Workshop, Ghent University*.
91. Nowak M., Straub D., Fischer O. (2016). Statistical extrapolation for extreme traffic load effect estimation on bridges. *14<sup>th</sup> Probabilistic Workshop, Ghent University*.
92. Scherb A., Garrè L., Yang Y., Straub D. (2016). Component importance in infrastructure networks subject to spatially distributed hazards. *Proc. ESREL 2016, Glasgow, UK*.
93. Zwirgmaier K., Straub D. (2016). Approaches to Bayesian network structure elicitation. *Proc. ESREL 2016, Glasgow, UK*.
94. Berk M., Kroll H.-M., Schubert O., Buschardt B., Straub D. (2016): Zuverlässigkeitsanalyse von umfelderfassender Sensorik unter Berücksichtigung von Umwelteinflüssen. *Proc. 32. VDI/VW-Gemeinschaftstagung zu Fahrerassistenz und automatisiertes Fahren – quo vadis? Wolfsburg, Germany*
95. Luque J., Straub D. (2015): Probabilistic Modeling of System Deterioration with Inspection and Monitoring Data using Bayesian Networks. *Proc. ICASP 12, Vancouver, Canada*.
96. Sättele M., Bründl M., Straub D. (2015). Quantifying the effect of early warning systems on natural hazard risk. *Proc. ICASP 12, Vancouver, Canada*.
97. Špačková O., Dittes B., Straub D. (2015). Risk-based optimization of adaptable protection measures against natural hazards. *Proc. ICASP 12, Vancouver, Canada*.
98. Scherb A., Garrè L., Straub D. (2015): Probabilistic risk assessment of infrastructure networks subjected to natural hazards. *Proc. ICASP 12, Vancouver, Canada*.
99. Zwirgmaier K., Straub D. (2015). Integrating structural reliability problems into Bayesian networks: An application to aircraft operational safety. *Proc. ICASP 12, Vancouver, Canada*.
100. Zwirgmaier K., Straub D., Groth K. (2015). Framework for a Bayesian network version of IDHEAS. *Proc. ESREL '15, ETH Zürich, Switzerland*.
101. Ji Y., Papaioannou I., Straub D. (2015). Reliability Analysis of Infinite Slopes under Random Extreme Rainfall Events. *Proc. 5<sup>th</sup> Geosnet Conference, Rotterdam*.
102. Papaioannou I., Straub D. (2015). Computing the Reliability of Shallow Foundations with Spatially Distributed Measurements. *Proc. 5<sup>th</sup> Geosnet Conference, Rotterdam*.
103. Dittes B., Špačková O., Straub D. (2015). Optimal decisions on flood protection under climate uncertainty. Extended abstract, *Proc. Symposium on Reliability of Engineering Systems SRES, Hangzhou, China*
104. Sättele M., Bründl M., Straub D. (2014). Early Warning Systems for Natural Hazards: Reliability Analyses Provide Guidance for Decision Makers. *Proc. Interpraevent 2014, Nara, Japan*.
105. Papaioannou I., Straub D., Papadimitriou C. (2014). Sequential Importance Sampling for Structural Reliability. *Proc. 17<sup>th</sup> IFIP WG 7.5 Conference on Reliability and Optimization of Structural Systems, Wuangshan, China*.

106. Zwirgmaier K., Straub D. (2014). Efficient discretization procedure for integrating structural reliability into Bayesian networks. *Proc. 17th IFIP WG 7.5 Conference on Reliability and Optimization of Structural Systems*, Wuangshan, China.
107. Špačková O., Rimböck A., Straub D. (2014). Risk management in Bavarian Alpine torrents: a framework for flood risk quantification accounting for subscenarios. *Proc. 12th IAEG Congress*, Torino.
108. Zwirgmaier K., Drees L., Holzapfel F., Straub D. (2014). Reliability analysis for runway overrun using subset simulation. *Proc. ESREL 2014*, Wroclaw, Poland.
109. Betz W., Papaioannou I., Straub D. (2014). Adaptive variant of the BUS approach to Bayesian updating. *Proc. Eurodyn 2014*, Porto, Portugal.
110. Luque J., Hamann R., Straub D. (2014). Spatial model for corrosion in ships and FPSOs. *Proc. OMAE2014*, San Francisco, CA.
111. Papakosta P., Scherb A., Zwirgmaier K., Straub D. (2014). Estimating daily fire risk in the mesoscale by means of a Bayesian network model and a coupled GIS. *Proc. VII International Conference on Forest Fire Research*, D. X. Viegas (Ed.), Coimbra, Portugal.
112. Moretti F., Beretta S., Lo Conte A., Straub D. (2014). Corrosion-fatigue of Q&T steel under rainwater: experiments and probabilistic description. *Proc. XVII International Colloquium on Mechanical Fatigue of Metals (ICMFM17)*.
113. Schneider R., Thöns S., Fischer J., Bügler M., Borrmann A., Straub D. (2014). A software prototype for assessing the reliability of a concrete bridge superstructure subjected to chloride-induced reinforcement corrosion. *Proc. IALCCE*, Tokyo, Japan.
114. Špačková O., Rimböck A., Straub D. (2014): Optimal flood risk management – decision process in practice. *Proc. 2<sup>nd</sup> International Conference on Vulnerability and Risk Analysis and Management (ICVRAM2014)*, Liverpool, UK.
115. Betz W., Mok C.M., Papaioannou I., Straub D. (2014): Bayesian Model Calibration using Structural Reliability Methods: Application to the simple hydrological abc model. *Proc. 2<sup>nd</sup> International Conference on Vulnerability and Risk Analysis and Management (ICVRAM2014)*, Liverpool, UK.
116. Camòs C., Molins C., Špačková O., Straub D. (2013). Development of a probabilistic model for the prediction of building damage due to tunneling induced settlements. *Proc. 4<sup>th</sup> Geosnet Conference*, Hong Kong University of Science and Technology.
117. Ji Y., Papaioannou I., Mok C.M., Straub D. (2013). Effect of Rainfall on the Reliability of an Infinite Slope. *Proc. 4<sup>th</sup> Geosnet Conference*, Hong Kong University of Science and Technology.
118. Papaioannou I., Betz W., Straub D. (2013). Bayesian model updating of a tunnel in soft soil with settlement measurements. *Proc. 4<sup>th</sup> Geosnet Conference*, Hong Kong University of Science and Technology.
119. Luque J., Straub D. (2013). Algorithms for optimal risk-based planning of inspections using influence diagrams. *Proc. 11<sup>th</sup> Probabilistic Workshop*, Brno, Czech Republic.
120. Cottone G., Gollwitzer S., Heckenberger U., Straub D. (2013). Reliability-Oriented Optimization of Replacement Strategies for Monitored Composite Panels in Aircraft Structures. *Proc. 9<sup>th</sup> International Workshop on Structural Health Monitoring IWSHM*, Stanford University.
121. Betz W., Papaioannou I., Straub D. (2013). Assessment of methods for the numerical solution of the Fredholm integral eigenvalue problem. *Proc. 11<sup>th</sup> International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
122. Fischer J., Straub D. (2013): Spatial reliability analysis of a concrete bridge subject to corrosion conditional on monitoring results. *Proc. 11<sup>th</sup> International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
123. Luque J., Papaioannou I., Ruess M., Schillinger D., Straub D. (2013): Probabilistic model of bone structure based on CT scan data and validation of simulation results using the finite cell method. *Proc. 11<sup>th</sup> International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.

124. Papaioannou I., Breitung K., Straub D. (2013): Reliability sensitivity analysis with Monte Carlo methods. *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
125. Papakosta P., Straub D. (2013): A Bayesian Network approach to assessing wildfire vulnerability. *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
126. Sättele M., Bründl M., Straub D. (2013): Bayesian networks to quantify the reliability of a debris flow alarm system. *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
127. Schneider R., Thöns S., Rücker W., Straub D. (2013). Effect of different inspection strategies on the reliability of Daniels systems subjected to fatigue. *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
128. Špačková O., Rimböck A., Straub D. (2013). How to select optimal mitigation strategies for natural hazards? *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
129. Zwirgmaier K., Papakosta P., Straub D. (2013). Learning a Bayesian network model for predicting wildfire behavior. *Proc. 11th International Conference on Structural Safety & Reliability ICOSSAR 2013*, Columbia University, New York.
130. Ranjan R., Betz W., Papaioannou I., Straub D. (2013). A Two-Step Approach to Reliability Assessment of a Tunnel in Soft Soil. *Proc. EURO:TUN 2013, 3rd International Conference on Computational Methods in Tunnelling and Subsurface Engineering*, Ruhr University Bochum
131. Špačková O., Straub D. (2013): Probabilistic assessment of tunnel construction time using dynamic Bayesian network. *Proc. EURO:TUN 2013, 3rd International Conference on Computational Methods in Tunnelling and Subsurface Engineering*, Ruhr University Bochum
132. Bensi M.T., Der Kiureghian A., Straub D. (2013). Bayesian network for post-earthquake infrastructure risk assessment and decision. *Proc. Pacific-Rim Workshop on Innovations in Civil Infrastructure Engineering*, National Taiwan University of Science and Technology, Taipei.
133. Špačková O., Šejnoha J., Straub D. (2013): Analysis of construction progress data and its use for probabilistic prediction of construction time in future tunnels. *Proc. Prague Geotechnical Days 2013*.
134. Straub D., Papaioannou I., Michalski A. (2012). Designing for wind actions based on time-domain analysis: Accounting for statistical uncertainty. *Proc. IFIP WG 7.5 Conference on Reliability and Optimization of Structural Systems*, Yerevan, Armenia.
135. Papaioannou I., Zwirgmaier K., Straub D. (2012). Assessment of MCMC algorithms for subset simulation. *Proc. IFIP WG 7.5 Conference on Reliability and Optimization of Structural Systems*, Yerevan, Armenia.
136. Sättele M., Bründl M., Straub D. (2012): Classification of warning systems for natural hazards. *Proc. 10th Probabilistic Workshop, University of Stuttgart*
137. Betz W., Papaioannou I., Straub D. (2012). A finite cell approach to random field discretization. *Proc. 10th Probabilistic Workshop, University of Stuttgart*.
138. Straub D. (2012). Efficient Algorithms and Models for Bayesian Updating in Structural Reliability. *Proc. Fifth Asian-Pacific Symposium on Structural Reliability and its Applications (5APSSRA)*.
139. Altamura A., Straub D. (2012). Subset simulation for reliability estimation of mechanical components subjected to fatigue using the Forman-Mettu model. *Proc. ASRANET*, London.
140. Špačková O., Šejnoha J., Straub D. (2012). Probabilistic assessment of tunnel construction processes using statistical learning to include past experience. *Proc. Eurock 2012, Stockholm*.
141. Schneider R., Thöns S., Straub D. (2012). Probabilistic fatigue crack growth modeling for reliability-based inspection planning. *Proc. IALCCE*, Vienna.



142. Schneider R., Thöns S., Straub D. (2012). Reliability-based inspection planning with application to orthotropic bridge deck structures subjected to fatigue. *Proc. IALCCE*, Vienna.
143. Keßler S., Fischer J., Straub D., Gehlen C. (2012). Updating of Service Life Prediction of Reinforced Concrete Structures with Potential Mapping. *Proc. International Congress on Durability of Concrete (ICDC)*, Trondheim, Norway.
144. Straub D., Lentz. A., Papaioannou I., Rackwitz R. (2011). Life Quality Index for Assessing Risk Acceptance in Geotechnical Engineering. In: Vogt N., Schuppener B., Straub D., Bräu G. (eds.). *Geotechnical Risk and Safety (Proc. ISGSR 3)*, Bundesanstalt für Wasserbau. ISBN: 978-3-939230-01-4, pp. 37-46.
145. Špačková O., Straub D. (2011) Probabilistic risk assessment of excavation performance in tunnel projects using Bayesian networks: A case study. In: Vogt N., Schuppener B., Straub D., Bräu G. (eds.). *Geotechnical Risk and Safety (Proc. ISGSR 3)*, Bundesanstalt für Wasserbau. ISBN: 978-3-939230-01-4, pp. 651-660.
146. Mahboob Q., Straub D. (2011). Comparison of Fault Tree and Bayesian Networks for Modeling Safety Critical Components in Railway Systems. *Proc. ESREL 11*.
147. Straub D. (2011) Reliability updating with inspection and monitoring data in deteriorating reinforced concrete slabs. *Proc. ICASP11*, Zürich, Switzerland.
148. Miraglia S., Dietsch P., Straub D. (2011). Comparative Risk Assessment of Secondary Structures in Wide-Span Timber Structures. *Proc. ICASP11*, Zürich, Switzerland.
149. Papakosta P., Straub D. (2011). Effect of Weather Conditions, Geography and Human Involvement on Wildfire Ignition: A Bayesian Network Model. *Proc. ICASP11*, Zürich, Switzerland.
150. Bensi M.T., Der Kiureghian A., Straub D. (2011). Post-earthquake decision-making using influence diagrams. *Proc. ICASP11*, Zürich, Switzerland.
151. Kessler S., Gehlen C., Straub D., Huber M. (2011). Spatial variability of corrosion processes in reinforced concrete evaluated by potential mapping. *Proc. ICASP11*, Zürich, Switzerland.
152. Schumacher T., Straub D. (2011). The Bayesian Acoustic Emission Source Location Algorithm: Extended Model. *Proc. ICASP11*, Zürich, Switzerland.
153. Straub D. (2010). Spatial probabilistic corrosion modeling in RC structures conditional on measurements. *Proc. International Symposium on Reliability Engineering and Risk Management (ISRERM2010)*, Tongji Univ., Shanghai, China
154. Straub D. (2009). An efficient computational framework for probabilistic deterioration modeling and reliability updating. *Proc. ICOSSAR 2009*, Osaka, Japan.
155. Straub D., Der Kiureghian A. (2009). Bayesian networks as a framework for structural reliability in infrastructure systems. *Proc. ICOSSAR 2009*, Osaka, Japan.
156. Bensi M.T., Straub D., Friis-Hansen P., Der Kiureghian A. (2009). Modeling infrastructure system performance using BN. *Proc. ICOSSAR 2009*, Osaka, Japan.
157. Faber M.H., Straub D., Roberto Montes-Iturrizaga R., Heredia-Zavoni E., (2009). FPSO Risk Assessment and Acceptance Criteria with Application to FPSO Mooring Systems. *Proc. 28th International Conference on Offshore Mechanics and Arctic Engineering (OMAE 2009)*, Honolulu, Hawaii.
158. Straub D., Der Kiureghian A. (2007). Seismic reliability of infrastructure systems based on fragility models. *Proc. ICASP 2007*, Tokyo.
159. Straub D., Goyet J., Sørensen J.D., Faber M.H. (2006). Benefits of risk based inspection planning for offshore structures. *Proc. OMAE'06*, Hamburg.
160. Faber M.H., Maes M.A., Straub D., Baker J.W. (2006). On the Quantification of Robustness of Structures. *Proc. OMAE'06*, Hamburg.
161. Montes-Iturrizaga R., Heredia-Zavoni E., Marcial-Martínez E., Faber M.H., Straub D., De la O J. (2006). Risk Based Structural Integrity Management Using Bayesian Probabilistic Nets. *Proc. OMAE'06*, Hamburg.
162. Straub D., Faber M.H. (2005). Reliability Updating for Structures Subject to Localized Corrosion Defects. *Safety and Reliability of Engineering Systems and Structures (Proc. ICOSSAR 05, Rome)*, Augusti et al. (eds), Millpress, pp. 843-850.

163. Straub D. (2005). Natural hazards risk assessment using Bayesian networks. *Safety and Reliability of Engineering Systems and Structures (Proc. ICOSSAR 05, Rome)*, Augusti et al. (eds), Millpress, pp. 2535-2542.
164. Schubert M., Straub D., Faber M.H. (2005). Reliability of rock fall protection galleries – A case study with a special focus on the uncertainty modelling. *Safety and Reliability of Engineering Systems and Structures (Proc. ICOSSAR 05, Rome)*, Augusti et al. (eds), Millpress, pp. 1333-1340.
165. Sørensen J.D., Straub D., Faber M.H. (2005). Generic Reliability-Based Inspection Planning for Fatigue Sensitive Details – with Modification of Fatigue Load. *Safety and Reliability of Engineering Systems and Structures (Proc. ICOSSAR 05, Rome)*, Augusti et al. (eds), Millpress, pp. 1063-1070.
166. Nishijima K., Straub D., Faber M.H. (2005). The Effect of Changing Decision Makers on the Optimal Service Life Design of Concrete Structures. *Proc. 4<sup>th</sup> International Workshop on Life-Cycle Cost Analysis and Design of Civil Infrastructure Systems*, Florida, USA.
167. Faber M.H., Straub D., Chakrabarti P., Abu-Odeh I., De la O J. (2005). Fatigue Analysis and Risk Based Inspection Planning for Life Extension of Fixed Offshore Platforms. *Proc. OMAE05*, Greece.
168. Chakrabarti P., Mukkamala A., Abu-Odeh I., Majumdar B., Faber M.H., Straub D., De la O J. (2005). An Overview of the Reassessment Studies of Fixed Offshore Platforms in the Bay of Campeche, Mexico. *Proc. OMAE05*, Greece.
169. Straub D., Faber M.H. (2003). Modeling Dependency in Inspection Performance. *Applications of Statistics and Probability in Civil Engineering*, Der Kiureghian, Madanat & Pestana (eds), Millpress, pp. 1123 – 1130.
170. Straub D. (2002). Probabilistic Modeling of Non-Destructive Testing of Steel Structures. *Proc. 4<sup>th</sup> International Ph.D. Symposium in Civil Engineering*, Munich, Vol.2, pp. 311-320.
171. Goyet J., Straub D., Faber M.H. (2001). Planning d'inspection basé sur l'analyse de risque: méthodologie d'ensemble et application aux structures offshore. *Proc. 3<sup>ème</sup> Conférence Nationale Fiabilité des Matériaux et des Structures*, Bordeaux.

### Research reports

172. Zhang J., Boothroyd P., Calvello M., Eddleston M., Cañavate-Grimal A., Papaioannou I., Luo Z., Najjar S., Rodriguez-Marek A., Straub D., Uzielli M., Wang Y., Walter, H. (2017). *Bayesian Method: A Natural Tool for Processing Geotechnical Information*. Report TC205/TC304 Discussion Groups, ISSMGE.
173. Cottone G., Fischer J., Gollwitzer S., Straub D. (2013). *Reliability-Oriented Optimization of Structural Replacement Strategies for Aircraft Structures*. Final Report, EU CleanSky Project JTI 2010-01.
174. Fischer J., Schneider R., Thöns S., Rücker W. Straub D. (2013). *Intelligente Bauwerke – Zuverlässigkeitsbasierte Bewertung von Brückenbauwerken unter Berücksichtigung von Inspektions- und Überwachungsergebnissen*, Berichte der Bundesanstalt für Straßenwesen.
175. Bensi M.T., Der Kiureghian A., Straub D. (2011). *A Bayesian Network Methodology for Infrastructure Seismic Risk Assessment and Decision Support*. PEER Report 2011/02, Pacific Earthquake Engineering Research Center, University of California, Berkeley.
176. Zilch K., Straub D., Dier F., Fischer J. (2011). *Entwicklung von Verfahren einer zuverlässigkeitsbasierten Bauwerksprüfung*. Berichte der Bundesanstalt für Straßenwesen B85, Wirtschaftsverlag NV, Bremerhaven, ISBN 0943-9293.
177. Schubert M., Faber M.H., Jaquemoud J., Straub D. (2010). *RisKnow – Falling rocks: Werkzeug zur Risikoermittlung bei Steinschlagschutzgalerien*. Forschungsprojekt ASTRA AGB 2008/003, Bundesamt für Strassen, Bern, Switzerland. [in German].

178. fib Task group 5.8 (2010). *Condition Control and Assessment of Reinforced Concrete Structures Exposed to Corrosive Environments (Carbonation / Chlorides)*. State of the art report, Convener Christoph Gehlen.
179. Montes Iturrizaga R., Heredia Zavoni E., Faber M.H., Straub D. (2009). *Redes Bayesianas para Análisis de Riesgo Estructural de Sistemas FPSO y su Aplicación en la Generación de Criterios de Diseño Metoceánico*. Technical Report, Instituto Mexicano del Petróleo [in Spanish].
180. Montes Iturrizaga R., Silva González F., Heredia Zavoni E., Inda Sarmiento G., Straub D., Faber M.H. (2009). *Análisis de Confiabilidad Estructural de Sistemas FPSO y su Aplicación en la Calibración de Factores de Seguridad para Criterios de Diseño Metoceánico*. Technical Report, Instituto Mexicano del Petróleo [in Spanish].
181. Straub D. (2004). *Generic Approaches to Risk Based Inspection Planning for Steel Structures*. IBK Bericht 284, VdF Verlag, Zürich.
182. Straub D. (2001). *Detailed Risk Based Inspection Planning for FPSO Components Subject to Fatigue*. Bureau Veritas, Technical Note #2682, ATA 818A.
183. Straub D. (2001). *Generic Risk Based Inspection Planning – An Introductory Example*. Bureau Veritas, Technical Note #2657, ATA 818A.
184. Schulte O., Straub D. (2000). *Schubversuche an der Platzertobelbrücke*. Diploma Thesis, Institute of Structural Engineering, ETH Zürich.

#### Other scientific publications

185. Špačková O., Dittes B., Straub D. (2016). Critical Infrastructure and Disaster Risk Reduction Planning Under Socioeconomic and Climate Change Uncertainty. *Proc. 6th International Disaster and Risk Conference IDRC*, Davos, Switzerland
186. Kim H.-J., Straub D. (2016). Quantifying the effect of inspections in ships considering the spatial variability of corrosion. *Proc. SAROSS*, Glasgow.
187. Betz W., Papaioannou I., Eckl M., Heidkamp H., Straub D. (2016). Reliability Analysis of a Tunnel with RELY. SOFiSTiK Seminar 2016, München.
188. Hamann R., Kähler N., Kim H.J., Sotiralis P., Straub D., Valkonen J., Ventikos N. (2016). Generic risk models for ship inspection based on readily available information, *Proc. International Conference on Maritime Safety and Operations*, Glasgow, UK.
189. Fischer J., Straub D. (2011). Reliability Assessment of Corroding Reinforced Concrete Slabs with Inspection Data. *Proc. 9th International Probabilistic Workshop*, TU Braunschweig, Germany.
190. Straub D. (2010). Information updating in engineering risk analysis: Opportunities, challenges and recent developments. Keynote paper, *Proc. 7th ASRANET conference*, Edinburgh.
191. Straub D. (2010). Reliability updating with measurements in spatially distributed systems using stochastic simulation. *Reliability and Optimization of Structural Systems* (ed. D. Straub), Proc. IFIP WG7.5 conference, Munich, Taylor and Francis/Balkema.
192. Bensi M.T., Straub D., Der Kiureghian A. (2010). Efficient Bayesian network formulations for modeling system performance. *Reliability and Optimization of Structural Systems* (ed. D. Straub), Proc. IFIP WG7.5 conference, Munich, Taylor and Francis/Balkema.
193. Papaioannou I., Straub D. (2010). Geotechnical reliability updating using stochastic FEM. *Reliability and Optimization of Structural Systems* (ed. D. Straub), Proc. IFIP WG7.5 conference, Munich, Taylor and Francis/Balkema.
194. Bensi M.T., Der Kiureghian A., Straub D. (2010). Bayesian Network for Infrastructure Seismic Risk Assessment: Challenges and Opportunities. *Proc. 7th Int. Conf. on Urban Earthquake Engineering and 5th Int. Conf. on Earthquake Engineering*, Tokyo, Japan.
195. Kessler S., Huber M., Straub D., Gehlen C., Moormann C. (2010). Stochastic evaluation of active corroding areas in concrete structures. *Proc. 8th International Probabilistic Workshop, Szczecin, Poland*.

196. Roberto Montes-Iturrizaga R., Inda-Sarmiento G., Vázquez-Hernández O., Silva-González F., Heredia-Zavoni E., Morandi A., Abu-Odeh I., Straub D. (2010). Reliability Analysis of FPSO Components and Calibration of Safety Factors using Response Surfaces. *Proc. 25th FPSO Forum, Aberdeen, UK*.
197. Der Kiureghian, A., Bensi M., Straub D. (2009). Bayesian network methodology for post-earthquake infrastructure risk management. Chapter 9 in *Frontier Technologies for Infrastructures Engineering*, S-S. Chen and A. H-S. Ang (Editors), CRC Press, Taylor & Francis Group, London, U.K.
198. Bensi M.T., Straub D., Der Kiureghian A. (2009). A Bayesian Network Framework for Post-earthquake Infrastructure System Performance Assessment. *Proc. TCLEE conference - Lifeline Earthquake Engineering in a Multihazard Environment*, Oakland, CA.
199. Zintel M., Gehlen C., Straub D., Mayer T.F. (2009). Zustandsbasierte Inspektionsplanung – Möglichkeiten für ein optimiertes Erhaltungsmanagement von Infrastrukturbauten. *Tagungsband, 50. Forschungskolloquium des DAfStb, TU München*. [in German].
200. Straub D. (2008). Modeling inspections for pipelines and process equipment. *Proc. 6th International Probabilistic Workshop*, TU Darmstadt, Germany.
201. Straub D., Bensi M., Der Kiureghian A. (2008). Spatial Modeling of Earthquake Hazard and Infrastructure Performance Through Bayesian Networks. *Proc. EM'08*, University of Minnesota, Minneapolis.
202. Straub D., Der Kiureghian A. (2008). An investigation into the combination of Bayesian network with structural reliability methods. *Proc. IFIP WG 7.5 Working conference 2008, Mexico City*.
203. Silva-González F.L., Straub D., Heredia-Zavoni E. (2008). Calibration of Fatigue Design Factors for Mooring Lines of an FPSO. *Proc. IFIP WG 7.5 Working conference 2008, Mexico City*.
204. Montes-Iturrizaga R., Heredia-Zavoni E., Straub D., Faber M.H. (2008). Optimum and Minimum Acceptable Reliability Indexes for Mooring Line Design in FPSO Systems. *Proc. IFIP WG 7.5 Working conference 2008, Mexico City*.
205. Montes-Iturrizaga R., Silva-González F.L., Heredia-Zavoni E., Inda G., Straub D. (2008). Calibration of Safety Factors for Mooring Lines. *Proc. IFIP WG 7.5 Working conference 2008, Mexico City*.
206. Straub D., Der Kiureghian A. (2007). Risk acceptance in deteriorating structural systems. *Proc. JCSS Workshop on Risk Acceptance and Risk Communication*, Stanford, CA.
207. Straub D. (2007). An Overview on Risk Based Inspection Planning for Structures. To appear in: *Safety and Performance Concepts*, fib bulletin, Bergmeister K. (ed.).
208. Grêt-Regamey A., Straub D. (2006). Integrating Bayesian Networks into a GIS for avalanche risk assessment. *Proc. 4th Probabilistic Workshop*, BAM, Berlin.
209. Baker J.W., Straub D., Nishijima K., Faber M.H. (2005). On the Assessment of Robustness I: A General Framework. *Proc. JCSS Workshop on Robustness of Structures*, BRE, Watford, UK.
210. Schubert M., Straub D., Baker J.W., Faber M.H. (2005). On the Assessment of Robustness II: Numerical Investigations. *Proc. JCSS Workshop on Robustness of Structures*, BRE, Watford, UK.
211. Stern B., Trau J., Freimark H., Straub D., Gogu R., Hurni L. (2005). Development of a Web-Mapping Expert Tool for Hazard Assessment in Alpine Valleys. *Proc. XXII International Cartographic Conference*, A Coruna, Spain.
212. Straub D., Faber M.H. (2004). Computational Aspects of Generic Risk Based Inspection Planning. Keynote lecture, *Proc. 2nd ASRANet Colloquium*, Barcelona.
213. Straub D., Faber M.H. (2004). Recent Developments in Risk Based Inspection Planning for Structures. *Proc. PSAM 7 Probabilistic Safety Assessment and Management*, Berlin.
214. Straub D. (2003). Accounting for Dependencies in Inspection Planning for Steel Structures. *Proc. Workshop on Risk-Based Maintenance*, TU Delft, pp. 54-61.

215. Straub D., Faber M.H. (2000). Generic Risk Based Inspection Planning for Components Subject to Corrosion. *Proc. ESRA Workshop on Risk Based Inspection Planning*, Zürich, pp. 129-138.

**Lecture notes for courses at TUM**

216. Straub D. (2017). *Lecture Notes in Engineering Risk Analysis*.
217. Straub D. (2015). *Wahrscheinlichkeit, Risiko, Zuverlässigkeit – eine Einführung für Ingenieure*, Vorlesungsunterlagen.
218. Straub D. (2012). *Lecture Notes in Structural Reliability*.
219. Straub D. (2012). *Einführung ins Risikomanagement für Umweltingenieure*, Vorlesungsunterlagen.