

CURRICULUM VITAE

LINDA STRANDE

CURRENT RESIDENCE

Linda Strande
Zürich, Switzerland
Swiss and US Citizenship

LANGUAGES

English – native language
High German – B2/C1
Swiss German – B1 (Züritütsch)
French – A2
Spanish – A1

EDUCATION

-
- | | |
|------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 2009 | Ph.D. Civil and Environmental Engineering
University of Washington , Seattle, Washington, USA
Dissertation: Estrogen Transformations in Wastewater Treatment: Ammonia Oxidizing Bacteria, Nitration, and Heterotrophic Bacteria
Adviser: H. David Stensel |
| 2005 | Professional Registration : Engineer in Training, Washington State, USA |
| 2004 | M.S.E. Civil and Environmental Engineering
University of Washington , Adviser: H. David Stensel |
| 2004 | M.S., University of Washington, Soils Science
University of Washington , Seattle, Washington, USA
Thesis: The Effect of Soil Amendments on the Symbiotic Nitrogen-fixing Relationship of <i>Alnus rubra</i> (Red alder) and <i>Frankia</i>
Adviser: Sally L. Brown and Chuck L. Henry |
| 1994 | B.A., University of Washington, Mathematics
University of Washington , Seattle, Washington, USA |

RESEARCH INTERESTS

The overarching goal of my research is to increase scientific knowledge for the application of sustainable urban excreta and wastewater management technologies. As an engineering scientist focused in low-income countries, I always consider how fundamental research can translate into real-life implementations. To achieve this, I strive to employ a system-based approach to all areas of treatment including business models, value-chain management, and logistics, by developing knowledge of system components and how they integrate into complete systems. My philosophy throughout my research career has been to develop engineering approaches that are relevant for global applications. My background encompassing interdisciplinary degrees in engineering, science and mathematics, and wide-ranging international experiences, has provided me with a global perspective, and equipped me to research and apply environmental engineering fundamentals in complex, interdisciplinary situations.

CURRICULUM VITAE

LINDA STRANDE

RESEARCH POSITIONS

Sept 2024 – Present	Head of Department, Eawag / Sandec
July 2010 – Present	Group Leader / Senior Research Scientist (Tenured since June 2015) Eawag - Swiss Federal Institute of Aquatic Science and Technology Sandec – Sanitation, Water and Solid Waste for Development Dübendorf, Switzerland
Oct 2009 – Feb 2010	University of KwaZulu-Natal, Durban, South Africa, Research Fellow in Pollution Research Group
Dec 2004 – Sept 2009	University of Washington, Seattle, Washington, USA, Research Assistant, Department of Civil and Environmental Engineering
May 2009	University of KwaZulu-Natal, Durban, South Africa, Research Fellow, Pollution Research Group
May 2006 – Aug 2006	Kyoto University, Kyoto, Japan, Visiting Researcher, Graduate School of Global Environmental Studies
April 2006	Jiuzhaigou National Park and Sichuan University, Sichuan, China, Visiting Researcher
Jan 2002 – June 2004	University of Washington, Seattle, Washington, USA, Research Assistant and Manager of the Northwest Biosolids Management Association Library, College of Forest Resources
June 2000 – Jan 2002	Washington Toxics Coalition, Seattle, Washington, USA, Information Specialist

TEACHING EXPERIENCE (current)

- IHE Delft. Lecturer and curriculum development for faecal sludge management module in Master of Science programme in onsite sanitation.
- EPFL. Introduction to Faecal Sludge Management MOOC. Launch May 2017.
<https://www.coursera.org/learn/faecalsludge>. >10,000 course participants.
- Eawag. Curriculum development for faecal sludge management workshop in collaboration with CAWST. Delivered in Dar es Salaam, Tanzania; Durban, South Africa; Washington DC, USA; Blantyre, Malawi; Hanoi, Vietnam.
- EPFL. Lecturer, Sanitary engineering in developing countries EPFL course Env 402 in SIE department ENAC faculty 2010 to present.
- ETH. Environmental Sanitation Planning and Infrastructure in Developing Countries ETH course 102-0838-00L in D-BAUG department 2010 to present.
-

AWARDS AND RECOGNITIONS

2024 Bataafsch Foundation 11th International Steven Hoogendijk Award

CURRICULUM VITAE

LINDA STRANDE

2023	IWA NSS (non-sewered sanitation) Chairman Recognition Award
2007 – 2009	United States Environmental Protection Agency (USEPA) Science to Achieve Results (STAR) Fellowship
2007	Water Environment Federation Canham Graduate Scholarship
2007	University of Washington Huckabay Teaching Fellowship
2007	Society of Women Engineers Outstanding Graduate Award
2005 – 2009	King County Research Fellowship
2004 – 2006	US National Science Foundation (NSF) Integrative Graduate Education and Research Traineeship (IGERT) Fellowship
2004	First place national engineering design competition, Water Environment Federation (WEF)

RESEARCH FUNDING

Current Funding:

- September 2024 – August 2026 Developing Environmental Wastewater-Based Surveillance in Non-Sewered Areas in Low-Income Contexts, 197,423 CHF total, PI Linda Strande, Eawag Discretionary Funding.
- June 2023 – May 2027. Improved Models for Safely Managed Sanitation: Stabilization of Faecal Sludge in Onsite Containment and Impact on Treatment, 700,000 CHF total, PI: Linda Strande, Swiss National Science Foundation (SNF).
- 2023 Seed Funds 93,437 CHF. Water Hub: Development of an automated blackwater treatment unit for the Eawag Water Hub 49,456, ETH4D: Real-time monitoring for faecal sludge dewatering in Lebanon, 19,500, Water Hub Seed Fund TSS Sensor Evaluation for Blackwater Dewatering CHF 24,481.
- August 2022 – Dec 2026. Water, Behavior Change and Environmental Sanitation (WABES) Phase 2: Sustainable solutions through research, knowledge and professionalism, 398,857 CHF / 2,237,000 CHF Total, PI: Christoph Lüthi, Linda Strande project lead on faecal sludge management, Swiss Development Cooperation (SDC).
- April 2021 – March 2024. emergency sanitation backstopping mandate. 200,000 CHF / 1,000,000 CHF. Swiss Humanitarian Aid (SHA).
- January 2021 – December 2024 Water Hub in NEST: Science meets industry in the NEST building to develop and demonstrate on-site treatment technologies for water and sanitation innovation (Phase II). 371,000 CHF / 1,900,000 CHF. PI Blackwater component: Linda Strande, Eawag Discretionary Funding.

Previous Funding (since 2010):

- January 2020 – June 2022. Research into Action: Methods and Tools to Determine Quantities and Qualities (Q&Q) of Faecal Sludge for Sustainable Solutions, 171,239 CHF, PI: Linda Strande, Eawag Discretionary Funding.
- January 2020 – December 2022. SFD Phase 3, 30,000 USD / 200,000 USD, PI: Barbara Evans, LEEDS University, Bill & Melinda Gates Foundation.
- Jan 2018 – July 2022. Water, Behavior Change and Environmental Sanitation (WABES): Sustainable solutions through research, knowledge and professionalism, 337,000 CHF / 2,600,000 CHF Total,

CURRICULUM VITAE

LINDA STRANDE

- PI: Christoph Lüthi, Linda Strande project lead on faecal sludge management, Swiss Development Cooperation (SDC).
- April 2018 – April 2022. Solid-Liquid Separation of Faecal Sludge: Understanding Governing Mechanisms for Improved Global Sanitation, 350,000 CHF, PI: Linda Strande, Swiss National Science Foundation (SNF).
- December 2017 – December 2020. Settling and Dewatering of Faecal Sludge: Building Fundamental Models for Improved Global Sanitation, 175,000 CHF, BJ Ward Student Fellowship, Linda Strande Supervisor, Eberhard Morgenroth PhD Advisor, Engineering for Development (E4D) proposal for four year PhD project.
- September 2019 – December 2019, July 2019. Faecal sludge quantities & qualities (Q&Q) in Lusaka, Zambia, 106,000 Euro, PI: Linda Strande, GIZ (Deutsche Gesellschaft für Internationale Zusammenarbeit).
- June 2016 – December 2020. Water Hub in NEST: Science meets industry in the NEST building to develop and demonstrate on-site treatment technologies for water and sanitation innovation, PI: Eberhard Morgenroth, Linda Strande project lead on faecal sludge management, 250,000 CHF / 1,415,760 CHF total, Eawag Discretionary Funding
- October 2018 – January 2019. Evaluation and Selection of FSTPs in South Asia and Sub Saharan Africa for Long-term Monitoring, 205,000 USD PI Linda Strande, Bill & Melinda Gates Foundation.
2017. Expert consulting, Port Harcourt World Bank Project 5,600 CHF; IHE Delft Development of Master's Curriculum 25,000 USD
- January 2016 – December 2016. Optimization of pathogen inactivation during anaerobic digestion treating faecal sludge in low-income countries, 10,000 CHF PI: Linda Strande, EPFL Seed Money
- June 2016 – May 2017. Faculty for the Future Post-doctoral Fellowship, 40,000 USD PI: Mi Nguyen, Linda Strande supervisor, Schlumberger Foundation
- November 2016 – May 2018. Methods of Faecal Sludge Analysis, 60,000 USD Linda Strande project lead on Sandec component, Bill & Melinda Gates Foundation
- November 2016 – March 2018. SFD Phase 2, 63,605 CHF Linda Strande project lead on Sandec component, Bill & Melinda Gates Foundation
- June 2015 – October 2016. RRR Phase 2, 20,000 Euro, Heiko Gebauer lead for Eawag, Linda Strande for Sandec, Swiss Development Cooperation (SDC)
- Jan 2015 – Dec 2017. Water and Environmental Sanitation Services for the Poor (WESSP), 270,000 CHF / 1,300,000 CHF Total, PI: Chris Zurbrügg, Linda Strande project lead on faecal sludge management, Swiss Development Cooperation (SDC)
- Nov 2014 – Oct 2015. Shit Flow Diagram baseline study, 185,000 USD / 1,000,000 USD Total, PI: Arne Panesar, Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) GmbH, Linda Strande lead on Sandec component, Bill & Melinda Gates Foundation (BMGF)
- Sept 2014 – Aug 2016. Sludge to Energy Enterprises in Kampala (SEEK), 450,000 CHF - 300,000 CHF Symphasis, 150,000 CHF REPIC, PI Linda Strande, cofunded by Symphasis Foundation and REPIC (an interdepartmental platform of the Federal Offices SECO, SDC and SFOE)
- April 2014 – June 2014. FaME and U-ACT Video, 15,000 Euro, PI Linda Strande, European Union Water Initiative (SPLASH)
- Jan 2013 – Dec 2015. Partnership for Urban Resource Recovery (PURR), 440,000 CHF, PI: Linda Strande, Swiss State Secretariat for Economic Affairs (SECO)
- Jan 2013 – June 2013. Economic Evaluation of Faecal Sludge Disposal Routes project (Contract 22384), 10,000 USD / 99,430 USD Total, PI: UKZN, Linda Strande project lead for Dakar data set, Bill & Melinda Gates Foundation (BMGF)

CURRICULUM VITAE

LINDA STRANDE

- Jan 2012 – Dec 2014. Resource Recovery and Reuse (triple R), 470,000 CHF / 3,000,000 CHF Total, Co-PI: International Water Management Institute (IWMI) and World Health Organization (WHO), Linda Strande and Chris Zurbrugg project co-lead on Sandec component, Swiss Development Cooperation (SDC)
- Jan 2012 – Dec 2014. Water and Sanitation (WASSA), 270,000 CHF / 930,000 CHF Total, PI: Chris Zurbrugg, Linda Strande project lead on faecal sludge management, Swiss Development Cooperation (SDC)
- Aug 2011 – Sept 2011. Drinking Water and Sanitation for Refugee Camps, 40,000 CHF Total, PI: Chris Zurbrugg, Linda Strande lead MEWS component, United Nations Refugee Agency (UNHCR)
- April 2011 – March 2014. Faecal Management Enterprises (FaME), 400,000 Euros, PI: Linda Strande, European Union Water Initiative (SPLASH).
- March 2011 – Sept 2012. De Dechet à Resource (DAR) Senegal, 30,000 Euros, PI: Mbaye Mbequere, Linda Strande project partner, Volkswagen Foundation
- Oct 2010 – Sept 2014. Nutrient Harvesting in South Africa (VUNA), 80,000 USD / 3,000,000 USD Total, Kai Udert and Teddy Gouden co-PI, Linda Strande project lead on hygienic and ecotoxicological aspects, Bill and Melinda Gates Foundation (BMGF)

MENTORING AND SERVICE

SUPERVISION AND MENTORING AT EAWAG

Supervision of Research Project Managers at Eawag: Mbaye Mbèguère, Stefan Diener, Magalie Bassan, Lars Schoebitz, Moritz Gold, Barbara Jeanne Ward, Nienke Andriessen, Miriam Englund, Marius Klinger, Michael Vogel, Anik Dutta

Supervision of PhD students: Ednah Kemboi, Natalia Montoya (ETH Switzerland), Kayla Coppens (University of Geneva Switzerland), Kelsey Shaw (University of Victoria, Canada), Nida Maqbool (NUST Pakistan), BJ Ward, Stanley Sam (ETH Switzerland), El Hadji Mamadou Sonko, Alsane Seck, Amadou Gueye (Cheikh Diop University, Senegal), Ebenezer Soh Kegne, Yaounde (University of Yaounde I, Cameroon)

Supervision of Post-doctoral researchers: Seju Kang (2024-2026), Anne Nakagiri (2022), Juliette Ndounla, el Hadji Mamadou Sonko (2015), Mi Nguyen (2016)

Supervision of Swiss Civil Servants and University interns and projects: Hanspeter Zöllig, Burkina Faso (2011), Josef Reiser, Senegal (2011), Benedict Borer, Switzerland (2012), Fabian Bischoff, Uganda, Guillaume Clair, Senegal, Amede Ferre, Vietnam, Nienke Andriessen, Uganda (2014), Aoife Byrne, Uganda, Katerina Brandes, Tanzania, Arief Gunawan, Bangladesh, Linus Brunner, Tanzania, Miriam Englund, Uganda, Michael Cunningham, Switzerland, Jean-David Therrien, Uganda, Seydou Guinko (Universite Joseph Fourier), Senegal (2015), Linus Brunner, Tanzania, Ruth Arnheiter, Uganda, Fritzi Ziebell, Uganda, Hildemar Mendez, Tanzania (2016), Michael Reinisch, Switzerland (2017) Leila Schneider, Tanzania (2017), Kim Whett, Mirco Egloff, Switzerland (2017), Tom Howard, Switzerland (2018), Kayla Coppens, India (2018), Kelsey Shaw, Mai Thu Nguyen, Robert Tommy Hardeman, Switzerland (2021), Julian Fritzsche (Master project ETH), Maxwell Bergström (Internship), Benjamin Morath (Semester Project D-MAVT ETH)

Cosupervision and / or examination committee member for Masters' Degrees: Manfred Schoger EPFL (2011), Hamath Dione, University of Dakar (2012), Cristina Fritzsche and Birge Ozel ETH (2013),

CURRICULUM VITAE

LINDA STRANDE

Pauline Dayer ETH (2014), Amede Ferre, Adeline Mertenat, Karin Gallandat EPFL (2014), Markus Wolf, Fabian Bischoff, Aalborg University, Léa Randin, Livia Jost EPFL, (2015), Mira Bleuler, Zurich University of Applied Sciences (2016), Charles Simon, Leah Marwa, Nuhu Moto, University of Dar es Salaam (2017), Miriam Esanju, University of Dar es Salaam, Ammandip Duggal, ETH (2018), Johannes Nödel, Austria (2019), Kapanda Kapanda, University of Zambia (2020), Daniela Seitz, ETH (2021), Pavan Indireddy IHE (2021), Helena Verloo, TU Delft (2022), Anooj Ramanathan, TU Hamburg (2023), Irene Muscas, University of Geneva (2024)

Mentoring of EPP and ETH4D fellows: Teddy Nakato (2012), El hadji Mamadou Sonko (2012), Ebenezer Soh Kengne (2013), Amadou Gueye (2013), Lungi Zuma (2013), Alsane Seck (2014), Amadou Gueye (2015) Pavan Indireddy (2018), Prerna Prasad (2020), Maria Isabel Amorin (2021), Nida Maqbool (2022), Anne Nakagiri (2022).

EAWAG SERVICE (recent)

Equal Opportunity Committee (EOC) 2017 to 2021, Chair of committee 2020, 2021
Participation in Cohort 2030 meetings, member of the Eawag Future Taskforce and Strategy Commission
Acting Sandec Department Head, March – April 2020
Represent Sandec at Engineering laboratory, Aquatikum, Flux, and Water Hub committees and meetings
Water Hub at NEST Core Team, 2016 to present
Eawag Partnership Program (EPP) Committee, 2019 to present
Eawag Symposium Committee, four years on organizing committee

SCIENTIFIC COMMITTEES (recent)

Member of committee: FSMA (Faecal Sludge Alliance)
Member of conference committee: FSM6, FSM5, FSM4 (Faecal Sludge Management)
Chair of conference committee: FSM3 (Faecal Sludge Management 3) conference, Hanoi Vietnam, January 2015
Member of IWA Specialist group and conference committee: NSS (Non-Sewered Sanitation)
Advisory member: SFD Promotion Initiative, GlobalSanTech, Poop Tank

REVIEWER

Journals

Chemosphere, Energy Conversion and Management, Energy Reports, Environmental Science and Pollution Research, Environmental Science & Technology, Environmental Technology, Fuel, Heliyon, Journal of Cleaner Production, Journal of Environmental Engineering and Science, Journal of Environmental Management, Journal of Environmental Quality, Journal of Water Sanitation and Hygiene for Development, Proceedings of the Institute of Civil Engineers - Water Management, Restoration Ecology, Science of the Total Environment, Scientia Agricola, Sustainability, Tropical Medicine, Water Environment Research, Water Research, Water SA, Water Science and Technology, Waterlines, Water Research

Book chapters

Reviewed books for IWA and Practical Action Publishing

Research proposals

Reviewed proposals for Luxembourg National Research Fund, Volkswagen Foundation, RS-DFID, IRC International Water and Sanitation Centre

Conferences

Conference Abstracts. FSM3, FSM4, FSM5, FSM6, NSS

PROFESSIONAL MEMBERSHIP

CURRICULUM VITAE

LINDA STRANDE

Aguasán Community of Practice, Switzerland
Faecal Sludge Management Alliance
International Water Association
WSSCC Water Supply & Sanitation Collaborative Council

PEER-REVIEWED SCIENTIFIC PUBLICATIONS

BOOK CONTRIBUTIONS

Methods for Faecal Sludge Analysis. ISBN: 9781780409122 eBook: 9781780409122 IWA Publishing, London, 2021.

- Velkushanova, K., **Strande, L.**, Ronteltap, M., Koottatep, T., Brdjanovic, D., Buckley, C. (Editor)
- Chapter 1. Setting the Stage. **Strande, L.**, Velkushanova, K., Brdjanovic, D. (Author)
- Chapter 2. Faecal sludge properties and considerations for characterization. Velkushanova, K., **Strande, L.** (Author)
- Chapter 3. Faecal sludge sample collection and handling. Koottatep, T., Ferré, A., Chapagain, S., Fakkaew, K., **Strande, L.** (Author)
- Chapter 4. Experimental design for the development, transfer, scaling-up, and optimization of treatment technologies: case studies of dewatering and drying. Ward, B.J., Septien, S., Ronteltap, M. **Strande, L.** (Author)
- Chapter 5. Estimating quantities and qualities (Q&Q) of faecal sludge at community to citywide scales. **Strande, L.**, Englund, M., Andriessen, N., Carbajal, J.P., Scheidegger, A. (Author)
- Chapter 7. Faecal sludge simulants: review of synthetic human faeces and faecal sludge for sanitation and wastewater research. Penn, R., Ward, B.J., **Strande, L.**, Maurer, M. (Author)
- Chapter 8. Laboratory procedures and methods for characterisation of faecal sludge. Velkushanova, K., Reddy, M., Zikalala, T., Gumbi, B., Archer, C., Ward, B.J., Andriessen, N., Sam, S., **Strande, L.** (Author)

Faecal Sludge Management: Highlights and Exercises. Englund, M., **Strande, L.** (Editor). ISBN 978-3-906484-70-9, Eawag: Swiss Federal Institute of Aquatic Science and Technology. 2019.

Guidelines on Sanitation and Health. **Strande, L.** (Member of the Development Committee). ISBN 978-92-4-151470-5. World Health Organization (WHO) 2018.

Resource Recovery from Waste: Business Models for Energy, Nutrient and Water Reuse in Low- and Middle-income Countries. **Strande, L.** (Book Contributor). Otoo, M., Drechsel, P. (Editors) Oxon, UK: Routledge – Earthscan, 816 pg. ISBN: 9781138016552 (hardcover) 9781315780863 (eBook), 2018.

Faecal Sludge Management: Systems Approach for Implementation and Operation. IWA Publishing, London. 2014. 432 pg. ISBN: 9781780404721 (Hardback) 9781780404738 (eBook), Book available in English, French, Spanish, Hindi, Marathi and Tamil, and Russian translation in preparation.

- **Strande, L.**, Ronteltap, M., Brdjanovic, D. (Editor)
- Chapter 1. The Way Forward. **Strande, L.** (Author)
- Chapter 2. Quantification, Characterization, and Treatment Objectives. Niwagaba, C., Mbéguéré, M., **Strande, L.** (Author)
- Chapter 3. Treatment Mechanisms. Bassan, M., Dodane, P.H., **Strande, L.** (Author)
- Chapter 10. Enduse of Treatment Products. Kengne, I.M., Moya, B., **Strande, L.** (Author)

CURRICULUM VITAE

LINDA STRANDE

REFEERED JOURNAL ARTICLES

- Sam, S.B., Niederdorfer, R., Scheidegger, A., Ward, B.J., Johnson, D., Bürgmann, H., Morgenroth, E., **Strande, L.** Microbial communities in fecal sludge at city-wide scale in Lusaka, Zambia: relation to usage patterns, accumulation in containments, and treatment performance. In preparation.
- Kapanda, K., Sam, S., Andriessen, N., Ward, B.J., **Strande, L.**, Tembo, J.M. Metrics for stabilization of fecal sludge, and relation to dewatering metrics. *Journal of Water, Sanitation & Hygiene for Development*, 14 (5), 389-399, 2024.
- Strande, L.** Integrating Recent Scientific Advances to Enhance Non-Sewered Sanitation in Urban Areas. *Nature Water*, 2, 405–418, 2024.
- Maqbool, N., Sam, S.B., Khan, S.J., **Strande, L.** Biomethane potential of fresh and stored fecal sludge, food waste, and relation of organic fractions to biogas production. *Journal of Water, Sanitation & Hygiene for Development*, 14 (3): 277–290, 2024.
- Strande, L.**, Evans, B., von Sperling, M., Bartram, J., Harada, H., Nakagiri, A., Nguyen, V.-A. Urban Sanitation: New Terminology for Globally Relevant Solutions? *Environmental Science & Technology*, 57, 42, 15771-15779, 2023.
- Sam, S.B., Morgenroth, E., **Strande, L.** From feces to fecal sludge: the influence of diet, organic fractions, cations, and stabilization on dewatering performance. *Journal of Water Sanitation and Hygiene for Development*, 13(9), 699-710, 2023.
- Andriessen, N., Appiah-Effah, E., Browne, S.J.I., al Jahjah, R., Kabika, J., Kinobe, J.R., Korir, N., Nishimwe, P., Niwagaba, C.B., Pradeep, R., Prasad, P., Tembo, J.M., William, A., Ambuehl, B., **Strande, L.** Quantities and qualities of faecal sludge: Experiences from field implementation with a Volaser in 7 countries during a pandemic. *Frontiers in Water*, 5, 1130081, 2023.
- Ward, B.J., Nguyen, M.T., Sam, S.B., Korir, N., Niwagaba, C., Morgenroth, E., **Strande, L.** Particle size as a driver of dewatering performance and its relationship to stabilization in fecal sludge. *Journal of Environmental Management Vol 326*, 116801, 2023
- Sam, S.B., Ward, B.J., Niederdorfer, R., Morgenroth, E., **Strande, L.** Elucidating the role of extracellular polymeric substances (EPS) in dewaterability of fecal sludge from onsite sanitation systems, and changes during anaerobic storage. *Water Research Vol 222*, 2022.
- Shaw, K., Vogel, M., Andriessen, N., Hardeman, T., Dorea, C., **Strande, L.** Towards globally relevant, small-footprint dewatering solutions: Optimal conditioner dose for highly variable blackwater from non-sewered sanitation. *Journal of Environmental Management Vol 321*, 2022.
- Prasad, P., Andriessen, N., Moorthy, A., Das, A., Coppens, K., Pradeep, R., **Strande, L.** Field-testing of methods for the estimation of quantities and qualities (Q&Q) of faecal sludge in Sircilla, India. *Journal of Water, Sanitation and Hygiene for Development* 2021.
- Ward B.J., Andriessen N., Tembo J.M., Kabika J., Grau M., Scheidegger A., Morgenroth E., and **Strande L.** Predictive models using cheap and easy field measurements: Can they fill a gap fecal sludge monitoring and process control? *Water Research* 2021.
- Narayan, A.S., Marks, S.J., Meierhofer, R., **Strande, L.**, Tilley, E., Zurbrugg, C., Lüthi, C. Advancements in and Integration of Water, Sanitation and Solid Waste in Low and Middle Income Countries. *Annual Review of Environment and Resources* 2021.
- Bleuler, M., Gold, M., **Strande, L.**, Schönborn, A. Pyrolysis of Dry Toilet Substrate as a Means of Nutrient Recycling in Agricultural Systems: Potential Risks and Benefits. *Waste and Biomass Valorization* 2021.
- Englund, M., Carbajal, J.P., Ferré, A., Bassan, M., Vu, T.H.A., Nguyen, V.A., **Strande, L.** Modelling quantities and qualities (Q&Q) of faecal sludge in Hanoi, Vietnam and Kampala, Uganda for improved management solutions. *Journal of Environmental Management*, 261, 2020, 110202.

CURRICULUM VITAE

LINDA STRANDE

- Peal, A., Evans, B., Sangaralingam, A., Ban, R., Blackett, I., Hawkins, P., Schoebitz, L., Scott, R., Sleight, A., **Strande, L.**, Roda, O. Estimating safely managed sanitation in urban areas; lessons learned from a global implementation of excreta-flow diagrams, *Frontiers in Environmental Science*, 31 January 2020.
- Ward, B.J., Gueye, A., Diop, B., Traber, J., Morgenroth, M., **Strande, L.** Evaluation of conceptual model and predictors of faecal sludge dewatering performance in Senegal and Tanzania. *Water Research*, 167, article 115101, 2019.
- Fischer, M., Nguyen, M., **Strande, L.** Context matters: horizontal and hierarchical network governance structures in the Vietnamese sanitation sector. *Ecology and Society*, 24 (3):17 2019.
- Andriessen, N., Ward, B.J., **Strande, L.** To char or not to char? Review of technologies to produce solid fuels for resource recovery from faecal sludge. *Journal of Water, Sanitation and Hygiene for Development*, 9 (2): 210-224 2019.
- Gold, M., Bleuler, M., Cunningham, M., Arnheiter, R., Schönborn, A., Niwagaba, C., **Strande, L.** Operating parameters for three resource recovery options from slow-pyrolysis of faecal sludge. *Journal of Water, Sanitation and Hygiene for Development*. August 8:4, 707-717 2018.
- Strande, L.**, Schoebitz, L., Bischoff, F., Ddiba, D., Niwagaba, C. Methods to reliably estimate faecal sludge quantities and qualities for the design of treatment technologies and management solutions. *Journal of Environmental Management*. 223:1, 898-907 2018.
- Roni, P., Ward, B.J., **Strande, L.**, Maurer, M. Review of synthetic human faeces and faecal sludge for sanitation and wastewater research. *Water Research* Apr 1;132, 222-240 2018.
- Gold, M., Harada, H., Therrien, J.-D., Nishida, T., Cunningham, M., Semiyaga, S., Fujii, S., Niwagaba, C., Dorea, C., Nguyen, V.-A., **Strande, L.** Cross-country analysis of faecal sludge dewatering. *Environmental Technology* Sep 12, 1-11 2018.
- Schoebitz, L., Bischoff, F., Lohri, C.R., Niwagaba, C., Siber, R., **Strande, L.** GIS analysis and optimization of faecal sludge logistics at city-wide scale in Kampala, Uganda. *Sustainability* 9:2, 194-2017.
- Gold, M., Sekigongo, P., Ddiba, D., Seck, A., Niwagaba, C., Diene, A., Diaw, S., Niang, S., **Strande, L.** Faecal sludge as a solid industrial fuel: A pilot-scale study. *Journal of Water, Sanitation and Hygiene for Development* 7:2, 243-251 2017.
- Gueye, A., Mbeguere, M., Niang, S., Diop, C., **Strande, L.** Novel plant species for faecal sludge drying beds: Survival, biomass response and forage quality. *Ecological Engineering*. 94, 617-621, 2016.
- Gold, M., Dayer, P., Faye, C., Clair, G., Seck, A., Niang, S., Morgenroth, E., **Strande, L.** Locally produced natural conditioners for dewatering of faecal sludge, *Environmental Technology* April 17, 1-13, 2016.
- Bischel, H., Oezel, B., **Strande, L.**, McArdell, C., Udert, K., Kohn, T. Pathogens and pharmaceuticals in source-separated urine in eThekweni, South Africa. *Water Research*, 85, 57-65, 2015.
- Bassan, M., Mbéguéré, M., Koné, D., Holliger, C., **Strande, L.** Success and failure assessment methodology for wastewater and faecal sludge treatment projects in low-income countries. *Journal of Environmental Planning and Management*, 58 (10) 1690-1710, 2015.
- Udert, K.M., Buckley, C.A., Etter, B., McArdell, C., Kohn, T., **Strande, L.**, Hug, A., Wächter, M., Zöllig, H. Technologies for the treatment of source-separated urine in eThekweni. *Water SA*, 41 (2) 2015.
- Seck, A., Gold, M., Niang, S., Mbéguéré, M., Diop, C., **Strande, L.** Technology development of unplanted drying beds for resource recovery from faecal sludge: fuel production in Sub-Saharan Africa. *Journal of Water Sanitation and Hygiene for Development*, 5 (1) 72-80, 2015.
- Sonko, E.h.M., Mbéguéré M., Diop, C., Niang, S., **Strande, L.** Effect of hydraulic loading frequency on performance of planted drying beds for the treatment of faecal sludge. *Journal of Water Sanitation and Hygiene for Development* 4(4) 633-641 2014.

CURRICULUM VITAE

LINDA STRANDE

- Kengne, E.S., Kengne, I.M., Nguetsop, V.F., Foubi, I.S., Akoa, A., **Strande, L.** Algal diversity and distribution in Waste Stabilization Ponds treating faecal sludge leachate from drying vegetated beds. *International Journal of Biological and Chemical Sciences* 8(3): 946-955, 2014.
- Tilley, E., **Strande, L.**, Lüthi, C., Mosler, H.-J., Udert, K., Gebauer, H., Hering, J.G. Looking beyond technology to provide adequate and sustainable sanitation in low income countries. *Environmental Science & Technology* 48(17) 9965–9970, 2014.
- Kengne, E.S., Kengne, I.M., Arsenea, L.N.W., Akoa, A., Nguyeng –Viet, H., **Strande, L.** Performance of Vertical Flow Constructed Wetlands for Faecal Sludge Drying Bed Leachate: Effect of Hydraulic Loading. *Ecological Engineering* 71 384–393, 2014.
- Diener, S., Semiyaga, S., Niwagaba, C., Murray, A., Gning, J.B., Mbéguéré, M., Ennin, J.E., Zurbrugg, C., **Strande, L.** A value proposition: resource recovery from faecal sludge – can it be the driver for improved sanitation? *Resources Conservation & Recycling* 88 32-38, 2014.
- Murray Muspratt, A., Nakato, T., Niwagaba, C., Dione, H., Baawuah, N., Kang, J., Stupin, L., Regulinski, J., Mbéguéré, M., **Strande, L.** Fuel Potential of Faecal Sludge: Calorific Value Results from Uganda, Ghana, and Senegal. *Journal of Water Sanitation and Hygiene for Development* 4:2 223-230, 2014.
- Bassan, M., Mbéguéré, M., Zabsonre, F., **Strande, L.** Integrated faecal sludge management scheme for the cities of Burkina Faso. *Journal of Water, Sanitation and Hygiene for Development* 3 216-221, 2013.
- Dodane, P.H., Mbéguéré, M., Ousmane, S., **Strande, L.** Capital and Operating Costs of Full-Scale Faecal Sludge Management and Wastewater Treatment Systems in Dakar, Senegal. *Environmental Science & Technology* 46:7 3705-3711, 2012.
- Gaulke, L.S.**¹, Weiyang, X. Scanlon, A., Henck, A., Hinckley, T. Evaluation Criteria for Implementation of a Sustainable Sanitation and Wastewater Treatment System at Jiuzhaigou National Park, Sichuan Province China. *Environmental Management* 45:(1) 93-104, 2010.
- Gaulke, L.S.**¹, Strand, S.E., Kalhorn, T.F., Stensel, H.D. Estrogen Biodegradation Kinetics and Estrogenic Activity Reduction for Two Biological Wastewater Treatment Methods. *Environmental Science & Technology* 43:(18) 7111-7116, 2009.
- Gaulke, L.S.**¹, Strand, S.E., Kalhorn, T.F., Stensel, H.D. Estrogen Nitration Kinetics and Implications for Wastewater Treatment. *Water Environment Research*, Special Issue: Biological Treatment 81:(8) 772-778, 2009.
- Gaulke, L.S.**¹, Strand, S.E., Kalhorn, T.F., Stensel, H.D. 17 α -ethinylestradiol Transformation via Abiotic Nitration in the Presence of Ammonia Oxidizing Bacteria. *Environmental Science & Technology*, 42:(20) 7622-7627, 2008.
- Gaulke, L.S.**¹, Borgford-Parnell, J.L., Stensel, H.D. A Decentralized and Onsite Wastewater Management Course: Bringing Together Global Concerns and Practical Pedagogy. *Water Science and Technology*, 58:(7) 1397-1404, 2008.
- Gaulke, L.S.**¹, Johkasou: On-site Wastewater Treatment and Reuses in Japan. *Proceedings of the Institute of Civil Engineers - Water Management*, 159:(2) 103-109, 2006.
- Gaulke, L.S.**¹, Brown, S.L., Henry, C.L. Nitrogen Fixation and Growth Response of *Alnus rubra* Amended with Low and High Metal Content Biosolids. *Scientia Agricola*, 53:(4) 351-360, 2006.
- Gaulke, L.S.**¹, Brown, S.L., Henry, C.L. Nitrogen Fixation and Growth Response of *Alnus rubra* Following Fertilization with Urea or Biosolids. *Scientia Agricola*, 53(4) 361-369, 2006.

REFEREED CONFERENCE PROCEEDINGS

¹ formerly Linda Strande Gaulke

CURRICULUM VITAE

LINDA STRANDE

- Ward, B.J., Allen, J., Escamilla, A., Sivick, D., Sun, B., Yu, K., Dahlberg, R., Niu, R., Ward, B.C., **Strande, L.** Sludge Snap: A machine learning approach to fecal sludge characterization in the field. *42nd WEDC International Conference, Online, 2021*
- Moto, N., Esanju, M., Andriessen, N., Kimwaga, R., **Strande, L.** Use of chitosan and Moringa oleifera as conditioners for improved dewatering of faecal sludge. *41st WEDC International Conference, Nakuru Kenya, 2018.*
- Andriessen, N., Schoebitz, L., Bassan, M., Bollier, S., **Strande, L.** Market Driven Approach for faecal sludge treatment products. *40th WEDC International Conference, Loughborough, UK, 2017.*
- Ward, B.J., Gold, M., Turyasiima, D., Studer, F., Getkate, W., Maiteki, J.M., Niwagaba, C.B., **Strande, L.** SEEK (Sludge to Energy Enterprises in Kampala): Co-processing faecal sludge for fuel production. *40th WEDC International Conference, Loughborough, UK, 2017.*
- Gold, M., Niang, S., Niwagaba, C.B., Eder, G., Murray Muspratt, A., Diop, P.S., **Strande, L.** Results from FaME (Faecal Management Enterprises) – can dried faecal sludge fuel the sanitation service chain? *37th WEDC International Conference, Hanoi Vietnam, 2014.*
- Bassan, M., Dao, N., Nguyen, V.A., Holliger, C., **Strande, L.** Technologies for sanitation: how to determine appropriate sludge treatment strategies in Vietnam. *37th WEDC International Conference, Hanoi Vietnam, 2014.*
- Schoebitz, L., Bassan, M., Ferré, A., Vu, T.H.A., Nguyen, V.A., **Strande, L.** FAQ: Faecal Sludge Quantification and Characterization – field trial of methodology in Hanoi, Vietnam. *37th WEDC International Conference, Hanoi Vietnam, 2014.*
- Bassan, M., Tchonda, A., Mahamane, I., Zöllig, H.P., **Strande, L.** Characterization of Faecal Sludge in Dry and Rainy Seasons, Ouagadougou, Burkina Faso. *36th WEDC International Conference, Nakuru Kenya, 2013.*
- Bassan, M., **Strande, L.** Capacity strengthening in sanitation: benefits of a research - operator collaboration. *35th WEDC International Conference, Loughborough University, 2011.*
- Gaulke, L.S.**¹, Weiyang, X. Scanlon, A. Case study of Sanitation and Wastewater Treatment in a National Park: Jiuzhaigou National Park, Sichuan Province, China. *Water for Life: Decentralized Infrastructure for a Sustainable Future, joint conference of International Water Association (IWA) and National Onsite Wastewater Recycling Association (NOWRA), Baltimore, Maryland, 2007.*
- Gaulke, L.S.**¹ Lessons Learned from Japan's System of Integrated Onsite Wastewater Management, *National Onsite Wastewater Recycling Association (NOWRA) 15th Annual Conference, Denver, Colorado, 2006.*

INVITED PRESENTATIONS AND CONFERENCE PROCEEDINGS (since 2015)

- Strande, L.** The Importance of Language in the Sanitation Sector. Eawag World Toilet Day Discussion, November 2023.
- Strande, L.** From Toilets to Treatment: The Importance of Terminology. CSE World Toilet Day Webinar, November 2023.
- Vogel, M., **Strande, L.** Piloting an automated, modular in-building blackwater dewatering unit for dense urban areas. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.

CURRICULUM VITAE

LINDA STRANDE

- Andriessen, N., Vogel, M., Ramanathan, A., Verloo, H., **Strande, L.** Treatment of supernatant from dewatering of faecal sludge with a moving bed biofilm reactor (MBBR). IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Vogel, M., **Strande, L.** Low-cost and low-footprint dewatering of blackwater with flocculants. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Sam, S., Morgenroth, E., **Strande, L.** The role of constituents in fecal sludge and stabilization on dewatering performance. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Kemboi, E., Ward, B.J., Morgenroth, E., **Strande, L.** Small particles drive poor dewatering in fecal sludge. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Strande, L.** Keynote presentation. Science and innovation trends: importance of terminology for globally relevant solutions. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Bogati, N., Maqbool, N., Khan, S.J., **Strande, L.** Biomethane potential of fresh and stored fecal sludge, food waste and relation of organics to biogas production. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Shaw, K., Dorea, C., **Strande, L.** Characterizing Biodegradation in NSS: Field Sampling, Microbiological Analysis, and In Situ Greenhouse Gas Measurements. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Coppens, K., Stoll, S., **Strande, L.** Performance of a full-scale vermifilter for domestic wastewater treatment in Geneva, Switzerland. IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Strande, L.**, Ward, B.J., Sam, S.B., Andriessen, N., Vogel, M., Shaw, K., Kemboi, E. Dewatering and drying workshop: Dewatering of feces, fecal sludge and blackwater: Research and implications from MEWS (Management of Excreta, Wastewater and Sludge). IWA Non-Sewered Sanitation Conference, Johannesburg, South Africa 15-18 October, 2023.
- Ward, B.J., **Strande, L.** Sludge Snap: Easily predicting sludge characteristics using photos and machine learning. WaterJAM 2023 Technical Program, Virginia Beach Convention Center, September 11-14, 2023.
- Strande, L.**, Research Update: Technologies for Faecal Sludge Management, *invited* presentation. Aguasan meeting N°156, Bern Switzerland March 2023
- Strande, L.**, High Level Symposium, *invited* presentation. FSM7 Abidjan, Ivory Coast 19-23 February 2023.
- Strande, L.**, Andriessen, N., Vogel, M., Applied research for scaling up low-footprint, community-scale faecal sludge treatment solutions. FSM7 Abidjan, Ivory Coast February 2023
- Strande, L.**, Research Update: Technologies for Faecal Sludge Management, *invited* presentation. KfW Runde Wasser and Abfall Seminar, online December 2022
- Sam, S.B., Ward, B.J., Andriessen, N., Vogel, M., **Strande, L.**, Dewatering of faecal sludge: Missing link for safely managed Sanitation. IWA Congress and Exhibition, Copenhagen Denmark, September 2022
- Sam, S.B., Ward, B.J., Andriessen, N., Vogel, M., **Strande, L.**, Dewatering of faecal sludge: Missing link for safely managed Sanitation. 9th World water Forum, Dakar Senegal, March 2022
- Vogel, M., **Strande, L.** Sensors for off-grid dewatering of blackwater. Poster presentation. 4RI Sensor Marketplace, Dübendorf September 2022
- Vogel, M., **Strande, L.** Dewatering of Blackwater, the Missing Link for Integrated Off-Grid Solutions. Podium presentation. Eawag Symposium, Dübendorf September 2022
- Ward, B.J., Allen, J., Escamilla, A., Sivick, D., Sun, B., Yu, K., Dahlberg, R., Niu, R., Ward, B.C., **Strande, L.** Sludge Snap: a Machine learning approach to fecal sludge characterization in the field. 42nd WEDC International Conference. ONLINE: 13 – 15 September, 2021.

CURRICULUM VITAE

LINDA STRANDE

- Riedler, B., Nödel, J., Siber, R., Andriessen, N., **Strande, L.**, Lang, S.. Supporting urban sanitation management through the integration of EO-based indicators. EARSEL joint workshop 2021: Earth Observation for sustainable cities and communities
- Strande, L.** Innovations in Faecal Sludge Management, *invited* presentation. WESTalk Seminar Series. Online/Vancouver CA, March 2021
- Strande, L.**, Reflections on Global Sanitation, *invited* presentation. WRC Seminar, Global Sanitation Developments - Recognising Heroes and Legends. Online/Durban SA, March 2021
- Strande, L.**, Participant in *invited* panel discussion "Sanitation Targets of SDG 6.2: Thinking goes beyond piped sewers" India Sanitation Conclave, Online/New Dehli India, November, 2020.
- Strande, L.**, Participant and *invited* presentation, Joint Monitoring Program (JMP) Expert Group Meeting on Safe Management of On-site Sanitation (SMOSS). Online, March 2020.
- Sam, S., Ward, B.J., Morgenroth, E., **Strande, L.** Water Hub @ NEST: Blackwater. Eawag Symposium Duebendorf, Switzerland, Poster Presentation, 2019. First place, best student presentation.
- Strande, L.**, Englund, M. "SPA-DET" Approach for Quantities and Qualities (Q&Q) of Faecal Sludge. *Faecal Sludge Management – FSM5*, Cape Town, South Africa. Podium Presentation, 2019.
- Ward, B.J., Sam S.B., Morgenroth, E., **Strande, L.** Progress in Faecal Sludge Dewatering: Evaluating a conceptual model and predictors of dewatering performance. *Faecal Sludge Management – FSM5*, Cape Town, South Africa. Podium Presentation, 2019.
- Andriessen, N., Ward, B.J., **Strande, L.** Selecting Options for Resource Recovery as a Solid Fuel from Dewatered Faecal Sludge. *Faecal Sludge Management – FSM5*, Cape Town, South Africa. Poster Presentation, 2019.
- Andriessen, N., **Strande, L.** Volaser©: Innovation of in situ field measurements of faecal sludge and containment volumes. *Faecal Sludge Management – FSM5*, Cape Town, South Africa. Poster Presentation, 2019.
- Moisture content: Solving the Achilles heel of faecal sludge treatment and processing options. *Faecal Sludge Management – FSM5*, Cape Town, Workshop, South Africa, February 2019.
- Characterisation and Quantification of Faecal Sludge. *Faecal Sludge Management – FSM5*, Cape Town, Workshop, South Africa, February 2019.
- Building FSM Capacity for City-Wide Inclusive Sanitation. *Faecal Sludge Management – FSM5*, Cape Town, Workshop, South Africa, February 2019.
- Ward, B.J., Sam, S.B., Morgenroth, E., **Strande, L.** Water Hub @ NEST: Faecal Sludge Dewatering for Resource Recovery. Eawag Symposium, Duebendorf, Switzerland, Podium Presentation, 2018. First place, best student presentation.
- Strande, L.** Fäkalschlamm-Management für die Ressourcenrückgewinnung in Entwicklungsländern. Eawag Infotag, Duebendorf, Switzerland, 2018.
- Ward, B.J., Morgenroth, E., **Strande, L.** Water Hub @ NEST: Faecal Sludge Dewatering for Resource Recovery. Eawag Symposium, Duebendorf, Switzerland, Poster and Flash Presentation, 2017. First place, best student presentation.
- Ward, B.J., **Strande, L.** End use and resource recovery from faecal sludge – focusing on solid fuels. *Beyond development aid: Sanitation financing & revenue models in reuse (human) waste. Organised by Institute of Fiscal Studies (IFS), UK & WASTE, Netherlands*. The Hague, Netherlands, Podium Presentation, 2017.
- Gueye, A., Mbéguéré, M., Diop, C., Niang, S., **Strande, L.** Is it Possible to Continually Produce Fodder on Planted Drying Beds Treating Faecal Sludge? *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.

CURRICULUM VITAE

LINDA STRANDE

- Strande, L.** Engineering Design Approach for Selection and Design of Treatment Technologies. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Ward, B.J., Gold, M., Morgenroth, E., Kimwaga, R., **Strande, L.** Faecal Sludge Dewatering: Two New Research Facilities for a Multi Directional Approach. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Sonko, Eh. M., Guinko, S., Thiam M. F., Ndoula, J., Schoebitz, L., **Strande, L.** Tools for faecal sludge management planning in small towns: case study of Bignona, Senegal. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Gold, M., Bleuler, M., Cunningham, M., Arnheiter, R., Schönborn, A., Rajabu, H., Niwagaba, C., **Strande, L.** Production and Resource Potential of (Bio)char from Faecal Sludge Pyrolysis. *Faecal Sludge Management – FSM4, Chennai, India* Poster Presentation, 2017.
- Gold, M., Harada, H., Therrien, J.-D., Nishida, T., Cunningham, M., Semiyaga, S., Fujii, S., Niwagaba, C., Dorea, C., Nguyen, V.-A., **Strande, L.** Understanding Faecal Sludge Dewatering – Research From Uganda, Vietnam, Japan and Switzerland. *Faecal Sludge Management – FSM4, Chennai, India* Poster Presentation, 2017.
- Andriessen, N., **Strande, L.** Market-Driven Approach for Selection of Faecal Sludge Treatment Products. *Faecal Sludge Management – FSM4, Chennai, India* Poster Presentation, 2017.
- Turyasiima, D., Gold, M., Studer, F., Niwagaba, C., Orwiny, M., Englund, M., **Strande, L.** Pelletizing To Increase Faecal Sludge Treatment Plant Capacities And Resource Recovery. *Faecal Sludge Management – FSM4, Chennai, India* Poster Presentation, 2017.
- Veses, O., Furlong, C., Evans, B., Bieker, S., Luthra, B., Padhi, S.K., Panesar, A.R., Rodrigues, C.M., Rohilla, S.K., Schoebitz, L., Scott, R.E., **Strande, L.** Lessons learnt from developing SFDs at scale. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Strande, L.**, Andriessen, N. City-wide sanitation, advocacy and planning: Tools for FSM Diagnostics and Project planning Workshop, World Bank. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Strande, L.** Faecal sludge quantification and characterization. Faecal Sludge Characterization and Quantification Workshop, University of Kwa-zulu Natal. *Faecal Sludge Management – FSM4, Chennai, India* Podium Presentation, 2017.
- Gold, M., Bäuerl, M., **Strande, L.** Faecal Sludge Management - Research into Practice. Kampala WASH Symposium, Kampala, Uganda, Side event June 2016
- Strande, L.**, SFD: Paving the way for FSM in Kampala, co-convener with GIZ, Kampala WASH Symposium June 2016
- Etter, B., Wittmer, A., Ward, B.J. Udert, K.M., **Strande, L.**, T.A. Larsen, E. Morgenroth. Water Hub @ NEST: A Living Lab to Test Innovative Wastewater Treatment Solutions. IWA Small Water and Wastewater Systems & Specialized Conference on Resources-Oriented Sanitation Athens, Greece Paper and podium presentation 2016.
- Blackett, I., Evans, B., Furlong, C., Hawkins, P., Kanathigoda, A.K., Luthra, B., Panesar, A., Peal, A., de Carvalho Rodrigues, M.C., Rohilla, S.K., Schoebitz, L., Scott, R., Smith, M. and **Strande, L.** Excreta flow analysis at a city-wide scale - the SFD promotion initiative. Water and Health Conference, University of Chapel Hill, North Carolina, Poster presentation 2015.
- Strande, L.**, FS Management - Bumps along the Way to Roadmaps for Cities Africa and Asia in session Livable Cities for All: Integrated Sanitation and Water Services, event at Stockholm World Water Week. Co-convener with The World Bank Group and Water and Sanitation Program, Bill & Melinda Gates Foundation, and Eawag, Podium presentation 2015.
- Strande, L.**, SFD – a tool to foster sustainable urban sanitation programming, event at Stockholm World Water Week. Co-convener with Bill & Melinda Gates Foundation; CSE, Eawag, GIZ, University of

CURRICULUM VITAE

LINDA STRANDE

- Leeds, Loughborough University, The World Bank Group and Water and Sanitation Program, and Eawag, Session Moderator 2015.
- Strande, L.**, SFD Discussion in session Sustainable City Sanitation - from planning to implementation, event at Stockholm World Water Week. Co-convened with Eawag and WSSUP, 2015.
- Bassan, M., Gallandat, K., Zuma, L., Holliger, C., **Strande, L.** Synthetic Surrogate for the Optimization of Anaerobic Digestion of Faecal Sludge. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Schoebitz, L., Niwagaba, C., Matovu, J., **Strande, L.** Quantification of faecal sludge by truck counting studies with the Private Emptiers' Association in Kampala. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Gold, M., Dayer, P., Clair, G., Faye, C., Seck, A., Niang, S., **Strande, L.** Faecal sludge treatment: Reducing footprint with conditioning. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Niang, S., Seck, A., Diène, A., Gold, M., Strande, L. Converting Faecal Sludge to Fuel: A New Management Solution? *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Niwagaba, C., Ddiba, D., Sekigongo, P., Gold, M., **Strande, L.** Faecal Sludge as Fuel in Industrial Kilns for Brick Production. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Sonko, E.h-M., Mbéguéré, M., Diop, C., Niang, S., **Strande, L.** Impact of Sludge Characteristics on Planted Drying Bed Performance. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Niang, S., Seck, A., Gueye, A., Gold, M., Sonko, E.H., Mbéguéré, M., **Strande, L.** "De Déchets à Resources" (from Waste to Resource): Faecal Sludge to Fuel and Forage in Dakar, Senegal. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Schöbitz, L., Saul, C., Virard, G., Gold, M., **Strande, L.**, Gebauer, H. Scaling-up sanitation businesses in low- and middle-income countries. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Panuvatvanich, A., Khongsricharoen, P., **Strande, L.**, Koottatep, T. Nitrogen transformations in different layers of vertical flow constructed wetland (VFCW) treating faecal sludge. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Cottingham, R.S., Buckley, C.A., Still, D., Mercer, S.J., Odindo, A., **Strande, L.**, Sonko, E.H. Economic Model of the Costs of VIP Latrine Emptying: from emptying to resource recovery or disposal. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Kengne, E.S., Kengne, I.M., Nguyeng –Viet, H., **Strande, L.** Combining Drying Beds and Vertical-Flow Constructed Wetlands for Faecal Sludge Dewatering and Leachate Polishing in Cameroon. *Faecal Sludge Management – FSM3, Hanoi Podium Presentation*, 2015.
- Nkeze N., Kengne I.M., **Strande, L.** Case Study in Yaoundé, Cameroon: Potential for Struvite Precipitation and Nutrient Recovery From Faecal Sludge Leachate? *Faecal Sludge Management – FSM3, Hanoi Poster Presentation*, 2015.
- Schoebitz, L., Strande, L., Gold, M., Buckley, C., Velkushanova, K. Faecal sludge management systems approach for implementation and operation Research into Practice: Towards standardization of FS quantification and *Faecal Sludge Management – FSM3, Hanoi Workshop*, 2015.

OTHER PUBLICATIONS

BOOK CHAPTERS

CURRICULUM VITAE

LINDA STRANDE

Harada, H., **Strande, L.**, Fujii, S. Challenges and opportunities of faecal sludge management for global sanitation. Towards Future Earth: Challenges and Progress of Global Environmental Studies. 81-100. ISBN 978-4-87603-500-7, Kaisei Publishing Co., Ltd.Tokyo. 2016.

ARTICLES (selected)

Strande, L., Changing times for urban non-sewered sanitation. Linda Strande reflects on the transformation around the non-sewered sanitation agenda for urban areas. The Source, August 2021

Doll, C., Larsen, T.A., **Strande, L.**, Udert, K., Morgenroth, E. Water Hub - Eine Plattform zum Testen von innovativen ressourcenorientierten Sanitärsystemen, Aqua und Gas 2020

Strande, L., How to fill the non-sewered sanitation skills gap. The Source, April 2019

Strande, L. Fäkalschlamm-Management für die Ressourcenrückgewinnung in Entwicklungsländern. Eawag Infotag, Duebendorf Swizterland, 2018.

Sandec News Articles, 51 articles during 2011 – 2024.

<https://www.eawag.ch/en/departement/sandec/publications/sandec-news/>

Strande, L., Faecal Waste: The Next Sanitation Challenge. Water 21, June, 2014.

Robbins, D., **Strande, L.**, Doczi, J. Opportunities in Fecal Sludge Management for Cities in Developing Countries: Experiences from the Philippines. Water 21, December, 2012.

VIDEOS

Faecal Sludge Dewatering. Producers: Donahue, P., Andriessen, N., **Strande, L.** Ward, B.J., Englund, M., 2018.

Innovation in Urban Sanitation: FaME and U-ACT Research in Sub-Saharan Africa. Producers: Donahue, P., Gold, M., **Strande, L.**, 2014.

Faecal Sludge Management. Editor: Hatch, K., Producer: **Strande, L.** (both 10 and 3 minute versions), 2013.

REPORTS (since 2015)

Klinger, M., **Strande, L.** Research Needs: Sanitation Spatial Representation. SFD Project Report. January 2021, Eawag, Dübendorf Switzerland.

Klinger, M., Gueye, A., Sherpa, A.M., **Strande, L.** Scoping Study: Faecal Sludge Treatment Plants in South-Asia and sub-Saharan Africa. December 2019, Bill & Melinda Gates Foundation (<https://doi.org/10.21955/gatesopenres.1116557.1>)

Turyasiima, D., Gold, M., Englund, M., Niwagaba, C.B., Studer, F., **Strande, L.** Dewatering of faecal sludge using geotextiles 2016

Schoebitz, L., Andriessen, N., Bollier, S., **Strande, L.** Market Driven Approach for Selection of Faecal Sludge Treatment Products. June 2016

Schoebitz, L., Bischoff, F., Ddiba, D., Okello, F., Nakazibawe, R., Niwagaba, C.B., Lorhi, C.R., Strande, L. Results of Faecal sludge analyses in Kampala, Uganda 2016

Schoebitz, L., Bischoff, F., Lohri, C.R., Niwagaba, C.B. Siber, R., Strande, L. Supplemental Information: GIS analysis and optimization of faecal sludge logistics at city-wide scale in Kampala, Uganda 2016

Cunningham, M., Gold, M., **Strande, L.** Literature review on faecal sludge slow pyrolysis. Eawag/Sandec. Dübendorf, Switzerland. 2016

Englund, M., Turyasiima, D., Gold, M., Niwagaba, C.B., Studer, F., **Strande, L.** Co-pelletizing of faecal sludge with different biowastes for gasification, Eawag/Sandec. 2016

CURRICULUM VITAE

LINDA STRANDE

- Schoebitz, L., Niwagaba, C.B., **Strande, L.** SFD Report, Kampala, Uganda: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, June 2016
- Ndoula, J., Schoebitz, L., Sonko, E. h. M. **Strande, L.** SFD Report, Bignona, Senegal: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec March 2016
- Brandes, K., Schoebitz, L., Nguyen, V.A., **Strande, L.** SFD Report, Hanoi, Vietnam: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, February 2016
- Harada, H. Schoebitz, L., **Strande, L.** SFD Report, Danang, Vietnam: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, December 2015
- Gunanwan, A., Schoebitz, L., **Strande, L.** SFD Report, Khulna, Bangladesh: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, December 2015
- Harada, H., Schoebitz, L., **Strande, L.** SFD Report, Nonthaburi, Thailand: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, December 2015
- Brandes, K., Schoebitz, L., Kimwaga, R., **Strande, L.** SFD Report, Dar es Salaam Tanzania: Sanitation service delivery context analysis and mapping of excreta flows along the sanitation service chain and throughout the city. Eawag/Sandec, October 2015
- Sonko, E.h.M., Zurbrügg, C., **Strande, L.** Etude sur l'état initial de l'assainissement et le dimensionnement d'une Station de Traitement des Boues de Vidange (STBV) à Bignona et TENGHORY Transgambienne October 2015
- Guinko, S., Schöbitz, L., Sonko, E.h.M., Zurbrügg, C., **Strande, L.** Market Driven Approach to Faecal Sludge Endproducts in Bignona and TENGHORY Transgambienne, Senegal September 2015
- Byrne, A., Gold, M., Turyasiima, D., Getkate, W., Niwagaba, C., **Strande, L.** Suitable Biowastes for Energy Recovery, Eawag/Sandec. June 2015
- Therrien, J.-D., Gold, M., Harada, H., Dorea, C., **Strande, L.** Methods for Characterization of Faecal Sludge Dewaterability. 2015
- Schoebitz, L., Niwagaba, C., Nguyen, V.A., H.H. Tran, T.H. Dang, C. Zurbrügg, **Strande, L.** Resource, Recovery and Reuse Project. From Research to Implementation. Component 4 - Technology Assessment. Bangalore, India; Hanoi, Vietnam; Kampala, Uganda, Lima, Peru. March (2015)
-

INTERNATIONAL EXPERIENCE

RESEARCH COLLABORATIONS *(since 2010, external to ETH Domain)*

500B (Nepal)

Asian Institute of Technology (AIT, Thailand)

BioBurn AG (Switzerland)

Bremen Overseas Research and Development Association (BORDA, Tanzania and Global)

Centre for Dewats Dissemination Society (CDD Society, Bangalore, India)

Chiekh Anta Diop University (Dakar, Senegal)

Center for Energy, and Energy Conservation (CREEC, Kampala, Uganda)

CURRICULUM VITAE

LINDA STRANDE

Centre for Science and Environment (CSE, India)
CubeX (Lebanon)
Delvic Sanitation Initiatives (Delvic, Senegal)
Environmental and Public Health Organization (ENPHO, Nepal)
eThekweni Municipality (Durban, South Africa)
GIZ (Deutsche Gesellschaft für Internationale Zusammenarbeit, Germany)
Goal (Sierra Leone)
Hanoi University of Civil Engineering (HUCE, Vietnam)
hydrophil IC (Austria)
IHE (Netherlands)
INDEQUI (Guatemala)
International Centre for Water Management Services (CEWAS, Switzerland)
International Water Management Institute (IWMI, Sri Lanka)
Kyoto University Graduate School of Global Environmental Studies (GSGES, Japan)
Makerere University (Kampala, Uganda)
MOSAN (Guatemala)
National Sanitation Utility of Burkina Faso (ONEA)
National Sanitation Utility of Senegal (ONAS)
National Water and Sewerage Corporation (NWSC, Uganda)
Sanergy (Kenya)
Sanivation (Kenya)
Swiss Tropical and Public Health Institute (Swiss TPH, Switzerland)
Tribecraft AG (Switzerland)
University of Dar es Salaam (Tanzania)
University of Leeds (England)
University of Victoria (Canada)
University of Yaounde I (Cameroon)
University of Zambia (Lusaka, Zambia)
Virginia Commonwealth University (USA)
WASH R&D Centre (Formerly Pollution Research Group, Durban, South Africa)
Waste Enterprisers (Mombasa, Kenya)
WEDC/Loughborough University (England)
Water Sanitation Programme (WSP) of the World Bank
World Health Organization (WHO, Switzerland)
Z_GIS, University of Salzburg (Austria)
Zürcher Hochschule für Angewandte Wissenschaften ZHAW (Wädenswil and Winterthur, Switzerland)
Zürcher Hochschule der Künste ZhdK (Zurich, Switzerland)

WORK/TRAVEL EXPERIENCE

American Samoa, Australia, Austria, Botswana, Burkina Faso, Cameroon, Canada, China, Colombia, Croatia, Cuba, England, France, Germany, Ghana, Greece, Hungary, India, Ireland, Italy, Ivory Coast, Japan, Kenya, Laos, Lesotho, Malawi, Mexico, Morocco, Mozambique, Nepal, Netherlands, New Zealand, Portugal, Rwanda, Senegal, Serbia, South Africa, Scotland, Sierra Leone, Spain, Swaziland, Sweden, Switzerland, Tanzania, Thailand, Uganda, USA, Vietnam, Western Samoa, Zambia, Zimbabwe
