

APPENDIX B

Bibliography

BIBLIOGRAPHY

- Åkerlund, Anna, AP/Sveriges Lantbruksuniversitet. "*Evaluation of a Disintegration Technique for Increased Biogas Production from Excess Activated Sludge.*" Swedish University of Agricultural Sciences Apr. 2008.
- Ali, Imtiaj MD., Schneider, Philip A., Hudson, Neale, "*Thermodynamics and Solution Chemistry of Struvite.*" J. Indian Institute of Science May/June 2005: 85, 141-149.
- Barjenbruch, M., Kopplow, O., "*Enzymatic, Mechanical and Thermal Pre-Treatment of Surplus Sludge.*" Advances in Environmental Research 7 2003: 715-720.
- Bashan-de, Luz E., Bashan, Yoav, "*Recent Advances in Removing Phosphorus from Wastewater and its Future Use as Fertilizer (1997-2003).*" Water Research 38 2004: 4222-4246.
- Bhuiyan, M.I.H., Mavinic, D.S., Bieckie, R.D., "*A Solubility and Thermodynamic Study of Struvite.*" Environmental Technology Vol. 28 1015-1026.
- Bhuiyan, M.I.H., Mavinic, D.S., and Koch, F.A., "*Phosphorus Recovery from Wastewater through Struvite Formation in Fluidized Bed Reactors: A Sustainable Approach.*" Water Science & Technology-WST 2008: Vol. 57.2 175-181.
- Black & Veatch, "*Preliminary Design Report 10th Addition to the Nine Springs Wastewater Treatment Plant.*" Madison Metropolitan Sewerage District Apr. 2002.
- Black & Veatch, "*Design Memorandum 10th Addition to the Nine Springs Wastewater Treatment Plant.*" Madison Metropolitan Sewerage District June 2002.
- Borgerding, Joseph, "*Phosphate Deposits in Digestion Systems.*" Journal WPCF May 1972: Vol. 44 No. 5.: 813-819.
- Buchanan, A., Bungay, S., Chapman, K., Crassweller, J., Barnes, L., Smyth, M., "*Fate of Phosphorus during Anaerobic Digestion of Sludge from an EBPR Plant.*" WEFTEC Water Environment Federation 2008.
- Bufe, Mary, "*Phosphorus Sources Peaked Out?.*" Water Environment & Technology May 2009: 18-23.
- Bungay, S., Chapman, K., Buchanan, A., Crassweller, J., Barnes, L., Smyth, M., "*Fate of Phosphorus during Anaerobic Digestion of Sludge from an EBPR Plant.*" European Biosolids and Organic Resources Conference Nov. 2007: ed.: 12th.
- Condliff, Cynthia Jae, "*Biochemical Treatment for Phosphorous Removal from Waste Activated Sludge*" University of Wisconsin-Madison Dec. 2003.

- Cornel, P., and Schaum, C., "*Phosphorus Recovery from Wastewater: Needs, Technologies, and Costs.*" *Water Science & Technology-WST* 2009: Vol. 59.6.
- Dillner Westlund, Åsa, Hagland, Eva, Rothman, Maria, "*Foaming in Anaerobic Digesters Caused by Microthrix Parvicella.*" *Water Science Tech* 1998: Vol. 37 No. 4-5, 51-55.
- Dillner Westlund, Åsa, Hagland, Eva, Rothman, Maria, "*Operational Aspects on Foaming in Digesters Caused by Microthrix Parvicella.*" *Water Science Tech* 1998: Vol. 38 No. 8-9, 29-34.
- Donohue & Associates, Camp, Dresser, McKee, (CH2M Hill), "*Facilities Plan Report for the 10th Addition to the Nine Springs Wastewater Treatment Plant.*" Madison Metropolitan Sewerage District May 2001.
- Drawnel, Agnieszka, "*Increase of Biogas Production at Käppala WWTP.*" KTH Industrial Engineering and Management, Industrial Ecology, Royal Institute of Technology, Stockholm 2008.
- Kresge, Robert, Barbeau, Dan, Bishop, Rick, Bowers, Keith, Leaf, William, Murray, Mike, "*Phosphorus Recycling for a Sustainable Future.*" WEFTEC 2009.
- Machnicka, Alicja, Grübel, Klaudiusz, Suschka, Jan, "*Enhanced Biological Phosphorus Removal and Recovery.*" *Water Environment Research* July 2008: Vol. 80, No. 7.
- Mavinic, D.S., Koch, F.A., Huang, H., Lo, K.V., "*Phosphorus Recovery from Anaerobic Digester Supernatants Using a Pilot-Scale Struvite Crystallization Process.*" *J. Environ. Eng. Sci.* 6: 2007: 561-571.
- Noutsopoulos, C, Mamais, D., Andreadakis, A., "*Effect of Solids Retention Time on Microthrix Parvicella Growth.*" *Water SA* July 2006: Vol. 32 No. 3.
- Ohlinger, K.N., Young, T.M., and Schroeder, E.D., "*Predicting Struvite Formation in Digestion.*" *Water Research* 1998: Vol. 32 No. 12.: 3607-3614.
- Rahaman, M.S., Mavinic, D.S., and Ellis, N., "*Phosphorus Recovery from Anaerobic Digester Supernatant by Struvite Crystallization: Model-Based Evaluation of a Fluidized Bed Reactor*" *Water Science & Technology-WST* Vol.58.6 2008 1321-1327.
- Rahaman, M.S., Mavinic, D.S., "*Recovering Nutrients from Wastewater Treatment Plants Through Struvite Crystallization: CFD Modeling of the Hydrodynamics of UBC MAP Fluidized-Bed Crystallizer.*" *Water Science & Technology-WST* 2009: Vol. 59 No. 10.: 1887-1892.
- Reusser, Steven R., "*Caution-Advanced Digestion Processes*" Madison Metropolitan Sewerage District Unpublished 2009.

- Roels, T., Dauwe, F., Damme, Van, S., Wilde, De K., Roelandt, F., "*The Influence of PAX-14 on Activated Sludge Systems and in Particular on Microthrix Parvicella.*" *Water Science Technology* 2002: Vol. 46 No. 1-2.: 487-490.
- Stratful, I., Scrimshaw, M.D., and Lester, J.N., "*Conditions Influencing the Precipitation of Magnesium Ammonium Phosphate.*" *Water Research* 2001: Vol. 35 No. 17.: 4191-4199.
- Stratful, I., Scrimshaw, M.D., Lester, J.N., "*Removal of Struvite to Prevent Problems Associated with its Accumulation in Wastewater Treatment Works.*" *Water Environment Research* Sept./Oct. 2004: Vol. 76 No. 5.: 437-443.
- "*Struvite Recovery at the Madison MSD Nine Springs WWTP-Pilot Study Report*" Ostara Nutrient Recovery Technologies, Inc., 6 Apr. 2009.
- Stumpf, D., Zhu, H., Heinzmann, B., and Kraume, M., "*Phosphorus Recovery in Aerated Systems by MAP Precipitation: Optimizing Operational Conditions.*" *Water Science & Technology-WST* 2008: Vol. 58.10 1977-1983.
- Sundin, Maria Anna, "*Disintegration of Sludge – A Way of Optimizing Anaerobic Digestion.*" 13th European Biosolids and Organic Resources Conference and Workshop Aqua Enviro Technology Transfer 2008.
- Tsai, W. M., Wentzel, M.C., Ekama, G.A., "*The Effect of Residual Ammonia Concentration Under Aerobic Conditions on the Growth of Microthrix Parvicella in Biological Nutrient Removal Plants.*" *Water Research* 37 2003: 3009-3015.
- Vaccari, David A., "*Phosphorus: A Looming Crisis.*" *Scientific American* June 2009: Vol. 300 No. 6.: 54-59.
- Wang, Jun, Burken, Joel G., Zhang, Xiaoqi (Jackie), "*Effect of Seeding Materials and Mixing Strength on Struvite Precipitation.*" *Water Environment Research* Feb. 2006: Vol. 78 No. 2.: 125-132.
- Wilson, Christopher A., Novak, John T., "*Hydrolysis of Macromolecular Components of Primary and Secondary Wastewater Sludge by Thermal Hydrolytic Pretreatment.*" *Water Research* 43 2009: 4489-4498.