

Prof. G. Peter van Walsum Chemical and Biological Engineering

Publications

Refereed Publications

- Scott J. Eaton, Sedat H. Beis, Bruce G. Bunting, Stephen W. Fitzpatrick, G. Peter van Walsum, Hemant P. Pendse, and M. Clayton Wheeler. 2013. Characterization and Combustion of Crude Thermal Deoxygenation Oils Derived From Hydrolyzed Woody Biomass. *Energy and Fuels*, **27**, 5246-5252.
- Byung-Hwan Um, G. Peter van Walsum. 2012. Effect of pretreatment severity on accumulation of major degradation products from dilute acid pretreated corn stover and subsequent inhibition of enzymatic hydrolysis of cellulose. *Applied Biochemistry and Biotechnology*, **168**, Issue 2, Page 406-420.
- Byung-Hwan Um, Benjamin Freedman and G. Peter van Walsum. 2011. Conditioning Hardwood-derived Pre-Pulping Extracts for use in Fermentation through Removal and Recovery of Acetic Acid using Trioctylphosphine Oxide (TOPO). *Holzforschung*, **65**, 51-58.
- Sara Walton, G. Peter van Walsum, Adriaan van Heiningen. 2010. Value Prior to Pulping: Extraction of Hemicellulose from Hardwood. *Ind. Eng. Chem. Res.*, **49** (24), pp 12638–12645.
- Rong Xing, Ayyagari.V. Subrahmanyam, Hakan Olcay, Wei Qi, Michael F. Malone, G. Peter van Walsum, Hemant Pendse, and George W. Huber. 2010. Production of Jet and Diesel Fuel Range Alkanes from Waste Hemicellulose-derived Aqueous Solutions. *Green Chemistry*, **12**, 1933-1946.
- Bowen Du, Lekh N. Sharma, Christopher Becker, Shou-Feng Chen, Richard A. Mowery, G. Peter van Walsum, C. Kevin Chambliss.2010. Effect of Varying Feedstock-Pretreatment Chemistry Combinations on the Production of Potentially Inhibitory Degradation Products in Biomass Hydrolysates. *Biotechnology and Bioengineering*, **107** (3) 430-440.
- Walton, Sara L., Bischoff, Kenneth M., van Heiningen, Adriaan R. P., van Walsum, G. Peter. 2010. Production of Lactic Acid from Hemicellulose Extracts. *Journal of Industrial Microbiology and Biotechnology*, **37**: 823-830.
- Um, Byung-Hwan, van Walsum, G. Peter. 2010. Mass Balance on the Pulping Extraction of Northeast Mixed Hardwood using High Performance Liquid Chromatography and High Performance Anion Exchange Chromatography. *Bioresource Technology* 101, **15**: 5978-5987.
- Um, Byung-Hwan and G. Peter van Walsum. 2010. Evaluation of Enzyme Mixtures in Releasing Fermentable Sugars from Pre-Pulping Extract of Mixed Northeast Hardwoods. *Applied Biochemistry and Biotechnology* 161, **1**: 432.
- Sara Walton, Adriaan van Heiningen, Peter van Walsum. 2010. Inhibition effects on fermentation of hardwood extracted hemicelluloses by acetic acid and sodium. *Bioresource Technology* 101, 1: 1935-1940.