

Donifan Barahona

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Education

- *Master of Science in Chemical Engineering* from Kansas State University, GPA: 4.0, Manhattan, KS, 2005. Advisor: Dr. Mary Rezac. Thesis: Lipase Catalyzed Esterification of Geraniol in Ionic liquid [bmim]PF₆.
- *Bachelor of Science in Chemical Engineering* from National University of Colombia, GPA: 4.2 out of 5.0, Bogotá, Colombia (2002). Thesis: Development and implementation of a simulator module for tubular chemical reactors.

Publications

- Barahona D, Rezac ME, Pfromm PH. 2005. Effect of water activity on the lipase catalyzed esterification of geraniol in ionic liquid [bmim]PF₆. *Biotechnol. Bioeng.*: Published online.
- Barahona D, Pfromm PH, Rezac ME. 2005. Acidic impurities affect enzymatic activity and stability in the lipase catalyzed esterification of geraniol in ionic liquid [bmim]PF₆. *Green Chem.*: Submitted.
- Barahona D, Pfromm PH, Rezac ME. 2005. Water activity control by pervaporation during the lipase catalyzed esterification of geraniol in ionic liquid [bmim]PF₆. *J. Mem. Sci.*: In preparation.

Presentations

- Lipase Catalyzed Esterification of Geraniol in Ionic Liquid [bmim]PF₆. 33rd Annual Biochemical Engineering Symposium. University of Nebraska, Lincoln, NE, May 2004. Note: Proceedings published in May, 2005.
- Lipase Catalyzed Esterification of Geraniol in Ionic Liquid [bmim]PF₆ Under Pervaporation. AIChE Annual Meeting, section 396e. Austin, TX, November 2004.
- Experimental Evaluation of the Lipase Catalyzed Esterification of Geraniol in Ionic Liquid [bmim]PF₆. 34th Annual Biochemical Engineering Symposium. University of Oklahoma, Norman, OK, April 2005.

Work experience

- *Graduate Research Assistant* (01/03 - 08/05). Kansas State University, Manhattan KS:
 - Investigation on enzymatic reactions in non-aqueous solvents.
- *Chemistry Area Coordinator* (06/02 - 01/03) Colombian Institute for the Promotion of Higher Education, Bogotá, Colombia.
 - Responsible for the application, development and statistical analysis of tests of chemistry applied around the country.

Honors

- Second place in the National Contest of the Colombian Association of Chemical Engineers for best undergrad research projects (2002).
- Second place (out of 84) in the 2002 Chemical Engineering promotion of the National University of Colombia.
- Phi Kappa Phi Honor Society. Kansas State University. Manhattan, Kansas.

Keyword summary

Chemical Engineering, Research, Development, Environmental, Design, Enzymes.