Meetings International
SciTechnol

Expert Opin Environ Biol 2018, Volume: 7
DOI: 10.4172/2325-9655-C5-033

World Congress on
BIOPOLYMERS AND BIOPLASTICS
&
World Congress and Expo on
RECYCLING

August 29 -30, 2018
Berlin, Germany

Biomimetic advanced membrane technologies

Amira Abdelrasoul
University of Saskatchewan, Canada

Clean water as basic human need is not available to 1.4 -1.8 billion people around the world. It is essential to direct current research trends toward sustainable water and wastewater treatment technologies that can solve the existing industrial and environmental issues, especially when it comes to solutions that can be successfully commercialized on the global scale. Membrane applications are the most effective and sustainable methods of addressing environmental problems in treating water and wastewater to meet or exceed stringent environmental standards. Nevertheless, membrane fouling is one of the primary operational concerns that are currently hindering its widespread application. My major research focus is to optimize the synthesis of biomimetic and bioinspired membranes designed with antifouling, self-cleaning, and selective permeation that will pave the way for the production of clean water.

amira.abdelrasoul@usask.ca