



AGRO DIVISION

2013 NEW INVESTIGATOR AWARD WINNER

Sponsored by Dow AgroSciences



DR. DANIEL SWALE is the 2013 winner of the New Investigator Award sponsored by Dow AgroSciences and the AGRO division. He received his PhD in Entomology from the University of Florida under the advisement of Dr. Jeffrey Bloomquist. His research focused on the design of novel agrochemicals while defining the biochemical and

toxicological properties of acetylcholinesterase within mosquito vectors and agricultural pests. He is currently a

postdoctoral fellow working with Dr. Jerod Denton at Vanderbilt University Medical Center.

During his postdoctoral fellowship, Dr. Swale is working on the discovery and development of novel modulators of potassium inward rectifying ion channels that possess insecticidal activity to control mosquito-borne diseases. This research area utilizes high-throughput screening, RNAi, and electrophysiological approaches to identify molecular leads that will facilitate insecticide development. In his recent work, he has identified the first Kir channel inhibitors that induce mosquito toxicity and inhibit Malpighian tubule function.

2013 NEW INVESTIGATOR AWARD FINALISTS



DR. CHLOÉ de PERRE received her PhD in 2009 in analytical and environmental chemistry from the University of Bordeaux, France under the supervision of Dr. Helene Budzinski and Dr. Edith Parlanti. Her research focused on interactions between dissolved organic matter organic contaminants (pharmaceuticals and PAHs)

and in aquatic environments. Following graduation, she worked as a postdoctoral researcher in analytical forensic chemistry with Dr. Bruce McCord at Florida International University, Miami, Florida. She developed several analytical methods for the detection of homemade explosives and gunpowder additives at trace levels.

Since 2011, Dr. de Perre has been a postdoctoral researcher working with Dr. Michael Lydy at Southern Illinois University in Carbondale, Illinois. Her research has focused on environmental fate of insecticides (neonicotinoids, organophosphates, and pyrethroids) in agricultural fields using conservation methods, such as crop rotation and different tillage treatments. She has studied the toxicity of these insecticides to aquatic and terrestrial non-target organisms, using individual compounds and mixtures to assess the environmental risk.



DR. CHITVAN KHAJURIA received his PhD in Entomology from Kansas State University (KSU), Manhattan, Kansas under the supervision of Dr. Kun Yan Zhu and Dr. Lawrent Buschman. His PhD work was focused on better understanding the Bt resistance mechanism in European corn borer. After

completing his PhD, Dr. Khajuria joined Dr. Ming Shun Chen's lab at KSU as a post-doctoral research associate and worked on identifying the potential genes that may play an important role in wheat-Hessian fly interaction.

In 2011, Dr. Khajuria moved to University of Nebraska (UNL), Lincoln, Nebraska, as Research Assistant Professor and worked under the supervision of Dr. Blair Siegfried. His research at UNL was focused on better understanding the mode of action of RNA interference in western corn rootworm (WCR). He also worked on identifying potential targets for the control of WCR. In September 2013, Dr. Khajuria joined Monsanto and is working there as a Research Entomologist.

Congratulations to Our New Investigators!