



RESEARCH2REALITY

Shining a light on research & innovation.

What Makes Societies Tick?

An interview with Professor Graham Thompson
Evolutionary Biologist, Western University

What can society learn from bugs?

So what's exciting to us right now is we're basically a lab that's fascinated by a big picture of the living world – evolutionary biology. So we're whole-hearted biologists, we wear it on our sleeve. We're interested in the origins and antiquity of life on Earth, we are interested in the diversity of life; and also the unity of life in terms of things being related by common descent over long periods of time.

How do societies work effectively?

I think people are interested in social biology. Sociality is one of those things that have long fascinated not just biologists, but you know, people in general. People are fascinated by what brings animals together, how they communicate, what makes those groups form. Like, why is it that conflicts arise? How is it that conflicts are mediated, and what's the basis of those conflicts? It's not a uniquely human problem or question, and in fact some people that study social behaviour, don't study humans. In fact, they study things that might appear weird, like they study insects, for example.

On the one hand it might appear esoteric, Oh gee, we're studying ants and how genes are transmitted in ant colonies, that's a bit weird. But on the other hand, a lot of social insects have economic importance. So for example, I can mention honey bees. Honey bees are a billion-dollar industry the world wide over. What makes those workers behave as they do? Why are they suppressing their individualistic, sort of, selfishness? Why don't they fly off and be individuals? Why do they coordinate their efforts? How is that division of labour shaped by natural selection so that it functions as it does? If you know that, if you know the very bricks that make up an animal society, like a honey bee, for example, that information is only one step removed from being able to exploit, manipulate, or understand, coax that information into an economic or practical payoff.