
Bees been struggling

Posted on 1 November 2012 by naylorosa | Leave a comment |



In my random Netflix perusal, I came across a documentary about the striking loss of bee populations, The Vanishing of the Bees. I hadn't realized this, but in industrial scale farming a large amount of pollinators are needed to pollinate fields of crops, many more pollinators than live in the area normally. Bee farmers fill this role by cultivating large colonies of bees. They move these bees around the country in semi-trucks to farms where they are needed. These bees are experiencing "colony collapse disorder" where entire colonies of bees are wiped out. Without pollinators, many crops will be drastically affected. Fellow blogger Michele has posted artwork that tries to draw attention to the plight of the bees. The documentary suggests that exposure to pesticides may be contributing to this disorder.

In the documentary, they mention the woefully inadequate testing required by the FDA in order to prove pesticides safe for use on crops. Pesticides must be used at levels that are not lethal to bees. This leaves a pretty large range where the bees aren't killed but are definitely affected by pesticides. At the time of the filming, there wasn't much known about why exactly these colonies of bees were being wiped out. In the last year, Science magazine has reported some really striking data on the effects of pesticides on bee colonies. One lab in the UK found that when bees are exposed to levels of pesticide found in the pollen and nectar of crops they grew more slowly and made many fewer queen bees. This is a really big problem because the queen bees repopulate bee colonies after the winter. Another group in France found a large number of bees exposed to low levels of pesticides failed to return to the hive after foraging for food. The number of bees lost in each foraging expedition is enough to seriously disrupt the maintenance of colony numbers.

In the most recent study published last week in the journal Nature, UK researchers show that a combination of low-level pesticides is even more devastating to bee colonies. Currently, these pesticides aren't tested in combinations for their effects on the bees. Bees often experience this combination when visiting multiple fields during foraging or being transferred to new crops in the case of industrial farming. Bees seeing multiple pesticides don't forage effectively and die much earlier. To compensate, bees that normally care for the young bees in the hive are sent out to forage which leads into a cycle of reduced production of young bees just exacerbating the problem. This just illustrates that these pesticides are having serious effects on the bees even though these doses are not lethal. We can't ignore the fact that any treatment we apply to crops is not necessarily acting in isolation.

I'm happy that scientists are making strong inroads into finding out what is causing colony collapse disorder.

I'm very concerned with the regulation of pesticide use and how little is known about the effects these pesticides may have on the environment. Hopefully, this research will actually influence how pesticides are used and how to regulate exposure to them.

If you're feeling down about the bees and need something to brighten your day, one of my favorite bands ([The Octopus Project](#)) has a song titled "[Bees Bein' Strugglin'](#)" check it out!

This entry was posted in [Curiosities of Nature](#), [Follies of the Human Condition](#) and tagged [Bees](#), [colony collapse disorder](#), [nature](#), [Octopus Project](#), [pesticides](#), [Vanishing of the Bees](#). Bookmark the [permalink](#).

Theme: Customized Coraline by Automattic. [Blog at WordPress.com.](#)