

# Making Ripples

## The Buzz About Bees

by Amanda Bancroft

According to the UC Berkeley Backyard Bee Lab, we all should want bees in our backyards! But why, if bees can potentially sting us? “Without bees, there would be no chocolate, strawberries, or almonds!” At least 100 crops are pollinated by bees, and California almonds are pollinated 100 percent by bees. Researchers are working hard to keep these top pollinators alive and well, and establish local bee populations instead of relying on trucked-in European honeybees.

There are at least 4,000 species of bees in the US, and about 20,000 species in the world. Native bees, which for the most part are solitary creatures, tend to be less aggressive than the more social bees that are territorial and protective of their hive. Solitary bee species aren't necessarily loners – they can nest in large groups in a homemade bee apartment complex, or in our native environment such as mud banks. Natives typically ignore humans and focus on the flowers. If you get too close, their first reaction is to fly away. Only the female bees can sting, because the stinger is a modified ovipositor that they use to lay eggs. It's possible to tell the difference between males and females by their appearance, but different species vary.

Joel Gardner of the University of Minnesota Bee Lab has a few suggestions to attract and keep pollinators active in your backyard. Try to have a diversity of native plants blooming at different times of the year so that there's always nectar for your bees. For natural shelter, leave a few patches of soil undisturbed in your yard, since bees can burrow underground and make their own tunnels or, like the bumble bee, use rodent burrows instead of digging their own. Cavity-nesting bees use hollow plant stems or holes in wood instead of burrows, but you can build bee apartments for them using items like a plastic Folgers coffee container to keep the rain off of hollow bamboo sticks housed inside, hanging the structure in a location not too far from their pollen and nectar sources. However, sticks need replaced every one or two years to prevent disease and mite infestation.

If you've ever wondered what bees do at night, well, that depends on the species – if they're a hive species, they'll be spending the night in the hive or hunkered down nearby (they can still be active at night). Sometimes you can find bees curled up and sleeping inside a flower during early mornings in the garden after a chilly night. While bees don't sleep in the same way humans do, it's a myth that they never sleep at all – they actually do, even though hives can be active 24 hours a day, 365 days a year. These flying, buzzing puff balls of various gorgeous shades will dazzle us and keep us well-fed at the same time, so consider the bees when you're planning your landscape.

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