Field Notes—June 7, 2022 Carrie Crompton

Monarch Way Station

June 6. The Conservation Commission expanded the Way Station this spring with the planting of several new perennial species (see Pollinator Notes from May 13). These are thriving, as are the annual salvia, cleome, and zinnia seedlings, but there are not many flowers in bloom, so I am not surprised that I'm not seeing many pollinators yet—



Monarch Way Station, June 7, 2022



—just a few, like this Pearl Crescent on the freshly blooming lance-leafed coreopsis:

Pearl Crescent on lance-leafed coreopsis at Monarch Way Station, June 5, 2022

Pearl Crescent is one of the most abundant and widespread butterfly species in Connecticut. They develop from eggs laid on the undersides of the leaves of asters, which are found in all unmowed open spaces– roadsides, yard edges, parking lot edges. I have seen Pearl Crescents as early as the third week of May, and they're definitely out and about now. Bumblebees are visiting the annual salvia; they have the long tongues necessary to get nectar from these long-tubed flowers.



Bumble bee approaching salvia, June 5, 2022

We have a baker's dozen common milkweed plants at the Milkweed Café this year. As of June 7, several of them have tight flower buds.



Milkweed plant in bud, June 7

Journey North (journeynorth.org) reports that Monarchs have been sighted all the way up the East Coast to Vermont and New Hampshire already. I've seen one Monarch in our yard this week and one at the Heritage Farm in Bolton, but none yet at the Way Station. I think it's just a matter of days now before they arrive.

I'm keeping my eye on another pollinator pathway in Andover: the long sunny south-facing bank bordering the vacant lot behind the soccer fields. Perhaps I should call it a "bee pasture." It's

always been the best place to look for the first open clover blossoms in town, and I'm finding that it is full of bees these days. It's only a half-mile from the Monarch Way Station, and I wouldn't be surprised if the bees use the new pedestrian pathway between them!



Bee pasture on Riverside Drive, June 7

Pollinators in Our Yards

Although the temperatures have been mild since May 13, the wind has not stopped blowing. I consider breezes to be one of the best things in life, but when I see a shrub covered with fragrant blossoms waving in the breeze, I know there will be few bees on it, and it will be hard for me to get non-blurry photos of those I see.

Research with honeybees has shown that bees do less foraging when the breeze is brisk, because they have trouble resuming flight after visiting a flower if the wind speed is faster than their flight speed.¹ If they're weighed down by a load of nectar and pollen, they have to wait for a moment between gusts. They tend to stay close to the ground, below the wind, and avoid the pollen sources that move in the upper air. I think the nearly constant breezes in my back yard this spring have been hard on the bee populations – they've had enough to do just to feed themselves. I think I'm seeing fewer individuals than I did at this time last year, and most of those are not carrying heavy loads of pollen. For their sakes, I'm hoping for a few calm, sunny days.

I'm learning to recognize some kinds of bees by their nectaring posture, which is rather fun to watch. The carpenters almost always hold their wings out at a 45° angle while they work a flower, as if to say, "I am wide! Don't crowd me!" ...



Carpenter bee on arrowwood viburnum (Viburnum dentatum)

¹ Hennessey et al., "Gone with the wind: effects of wind on honey bee visit rate and foraging behavior," Animal Behaviour 161, March 2020. https://www.sciencedirect.com/science/article/abs/pii/S0003347220300026?dgcid=author

... while bumblebees tend to scissor their wings in close to their bodies as soon as they land on a flower: "I am working, and I don't need to waste any energy on display."



Bumble bee on catchfly (Silene armeria), June 7, 2022

Honey bees are slim and straight-backed when flying, and bend at the waist only slightly when foraging ("It's good to maintain a good alignment whatever one is doing")...



Honey bee on alsike clover (Trifolium hybridum), June 5

... while the mining bees, which are about the same size, tend to "hunch their backs" and bend themselves double as they work ("Oof, this nectar extraction is back-breaking labor!"):



Mining Bee on alsike clover (Trifolium hybridum), June 5

The tiny early mining bees – the ones I saw on the bloodroot and andromeda in April – have been succeeded by a slightly larger species.



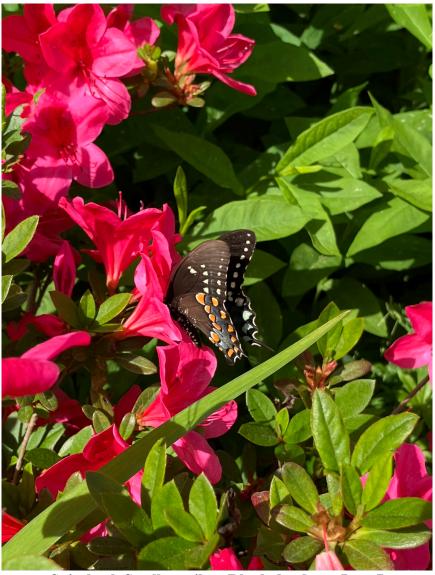
Mining bee on Stephanandra incisa

Check out the rich orange pollen on her femoral scopae (pollen-catching hairs)!

We have large numbers of these mining bees on our Stephanandra shrubs this week. Like most of the ornamental shrubs in our back yard, Stephanandra is a non-native species – it's from Korea. The native ninebark shrubs in bloom nearby are tall and leggy, always moving in the breeze, while the fragrant Stephanandra is close to the ground and relatively still. I wonder if this is influencing the mining bees' choice.

Another possible factor: The early spring mining bees are oligolectic – fussy eaters that use the pollen of only a few species of plants. The mining bees I'm seeing now are more likely to be polylectic – insects with broad palates. And Stephanandra smells good even to me.

Very often, the pollinators like the same flowers I do. I draw close to a rhododendron flower to enjoy its color and form, and see that some insects have beat me to it. I enjoy each flower or shrub more when I see wings on it.



Spicebush Swallowtail on Rhododendron, June 7