Beneficial Insects: Parasitic Wasps

The parasitic wasps are an extremely important and large group of beneficial insects with about 16,000 species occurring in North America. They are not the stinging, social wasps more commonly encountered around houses (paper wasps, yellow jackets and hornets). Parasitic wasps generally do not sting and are not pests except for their occasional, annoying presence as accidental invaders in the house. They are harmless and beneficial because they provide some biological or natural control of other insects. Parasitic wasps use their stinger to lay eggs inside other insects and can sting if threatened or handled. These wasps are very small - most are less than 1/8” long and usually are not noticed. They lay their eggs on or in the body of a host insect and the immature stage consumes the host’s tissues over a period of time, eventually killing it. Pupation may occur in or on the host. Some wasp larvae construct many small white cocoons on the body of their host. Other species pupate inside their host, and the emerging wasp leaves a small circular hole in the host’s body as evidence of parasitism. They differ from the wasps that sting in that they have very long antennae. There are a great variety of hosts for these wasps: caterpillars, moths, leafminers, wood-boring beetle larvae, flies, aphids, gypsy moth, weevils, and spiders.

Butterfly ID: Zebra Swallowtail

The Zebra Swallowtail (Eurytides marcellus) is a very unique species with black and white banding patterns on all four wings. It is not only characterized by its black and white coloration, resembling the stripes of a zebra, but by it’s long tails also. The upper surface of the wings has a pale green to white base color with black stripes. There is a bright red median stripe on the underside of the hind wing. This butterfly can have three or more broods a year. With each brood the length of the tails increase. It can be found along woodland watercourses, swamps, and marshes and in open brushy areas and abandoned fields during the late spring and summer. The caterpillar prefers young tender pawpaw plants in the Annonaceae family, while the adults prefer to get moisture from sand and nectar from flowers. The flowers range from blueberry, blackberry, lilac, redbud, viper’s bugloss, verbena, dogbane, and common milkweed.
**Program Announcements**

### Horticulture Plant Clinics

Bring your plant problems and questions for help and practical solutions!

**Monday May 7th**
10AM-2PM

**Monday May 21st**
10AM-2PM

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### Neighborhood Stormwater/Landscape Program

Provide your neighborhood with information about proper landscape and pond maintenance practices that will protect Florida’s natural waterways.

St. John’s River Water Management/WAVE Representative Paula Staples and Rebecca L. Jordi, University of Florida/IFAS Horticulture Extension Agent will come for a free consultation.

Fifteen (15) participants required.

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### Troubleshooting Florida Landscapes

Do you and your neighbors need a personal consultation on how to solve landscape problems? Are you concerned about your trees, shrubs, or lawngrass thriving?

Rebecca L. Jordi, University of Florida/IFAS Horticulture Extension Agent and Nassau County Master Gardener Volunteers will come for a free group consultation.

Fifteen (15) participants required.

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### Landscape Matters

**May 16th**
Wednesday 10 - 11AM
Herbs
Master Gardener
Claudie Speed

**June 20th**
Wednesday 10 - 11AM
Weeds & Lawngrass
Master Gardener
Nelson Peterson

Nassau County Govt. Complex
North Corridor Conference Room A
96135 Nassau Place

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### Master Gardener Overview

Do you love plants, trees, and gardening? Would you enjoy volunteering your time to help teach youth and newcomers in your community? Are you a team player? Then perhaps you should become a University of Florida/IFAS Master Gardener Volunteer!

Join us for an overview of the Master Gardener Volunteer Program:

**June 5th 10AM Yulee Satellite Office**
86026 Pages Dairy Road (904) 548-1116

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### Painted Bunting

Male Painted Buntings are the most spectacularly colored of all North American songbirds, with a gaudy combination of red, blue, and green feathers. This species has two distinct breeding populations in North America, but overall, it has shown a significant decline across its entire range during the past 35 years. The exact causes for Painted Bunting’s decline are not known, but they are believed to include habitat loss, cowbird parasitism, and trapping for the pet trade on its wintering grounds.

Painted Bunting has two distinct breeding populations: one along the Atlantic Coast from North Carolina to central Florida; and another from the south central states into Mexico.

There are a number of coastal sites that provide breeding habitat for Painted Bunting, including Florida’s Fort George and Talbot Islands, where 78 singing males were detected and over 100 birds were banded in 2000.

The eastern population of Painted Bunting winters in southern Florida and probably in the northwestern Caribbean. The eastern population, with its very limited coastal range, is especially susceptible to habitat degradation and destruction.

Painted Bunting favors somewhat open areas with dense brush at all seasons. Its diet consists mostly of seeds and insects, with insects predominating during the breeding season. These birds forage mostly on the ground or in low brush.

Painted Bunting is identified as an extremely high priority species in Partners in Flight’s Bird Conservation Plan for the South Atlantic Coastal Plain. One of the objectives of the plan is to stabilize or reverse population declines for Painted Bunting in the next 20 years. To learn more about the Important Bird Areas program and how you can help, visit: [http://www.audubon.org/bird/iba/](http://www.audubon.org/bird/iba/).
May Checklist

**Annuals:** Now is a great time of year to be a vigilant scout for pests. Annuals to plant this month are celosia, coleus, coreopsis, crossandras, gaillardias, gazanias, hollyhocks, impatiens, kalanchoe, marigolds, nicotianas, ornamental peppers, pentas, portulacas, salvia, thunbergia alata, torenias, verbenas, periwinkles, and zinnias.

**Lawns:** Check St. Augustine for chinch bugs. It is the beginning of mole cricket season for bahia, Bermuda, and zoysia lawns. The mole crickets have been busy laying eggs that can start hatching this month. Fertilize with 15-0-15 or 16-4-8 this month, water as needed (every 5-10 days).

**Perennials:** may die back to a small rosette then grow back during the spring season. Make sure each plant has room to grow or make plans to move them later in the year. This is a good time to give all perennials a label so they won’t be forgotten during the dormant season.

**Trees:** Some magnolias may drop their leaves during the spring months. This is normal, as they replenish the foliage. Some magnolias will even drop most of their leaves before putting on new growth.

**Vegetables:** Scout for insects and hand remove if possible. Check the underside of leaves for eggs and aphids. Remember some of the insects are predators. These predators are important part of keeping the pests from totally taking over your vegetables. Vegetables to plant this month are lima beans, eggplant, okra, Southern peas, and sweet potatoes.

June Checklist

**Annuals:** If growth appears too slow and the foliage turns yellow, they may need an extra feeding. Too much growth and a lack of flowers indicates the plants have all the nutrients they need and you can skip a feeding. Globe amaranth, melampodium, pentas, portulaca, purslane, salvia, zinnia, lantana, bugle, daylily, verbena, purple coneflower, plumbago, and sun coleus can be planted in full sun.

**Bulbs:** Plant agapanthus, blackberry lily, clivia, gloriosa lily, achimenes, crinum, and iris.

**Lawns:** Keep mower blades sharp (once a month is a good rule). This is a good month to apply iron in liquid or granular form to St. Augustine lawns. Perennials: Some pests to check for are grasshoppers and katydids. Both may be chewing holes in plant leaves. Try to handpick them from the plants, or if needed, use a synthetic insecticide as instructed on the label for chewing insects.

**Trees:** Pests may be noticed in many trees. Their damage is minimal and sprays are seldom needed. Look for aphids, borers, mites, etc.

**Vegetables:** June is not the best month to be starting a garden or planting new crops. Wait until August before putting in new plants. However, you may still plant tomatoes in containers if you want something to harvest. This would be a good month to solarize your garden to fight against nematodes.

Selected from Florida Vegetable Guide by JM Stephens, RA Dunn, G Kidder, D Short, & GW Simone, University of Florida and Month-by-Month Gardening in Florida by Tom MacCubbin
Herbal Vinegars

All types of vinegars may be flavored with herbs, but for best results try to match the strength of the flavor to the type of vinegar. White wine vinegar is a safe bet with any herb, but cider, rice and red wine vinegars are also good with the more flavorful herbs such as garlic, basil, and sage. Use white distilled vinegar with caution. It is fairly harsh and may not give the desired results.

To make herbal vinegars, heat the vinegar but do not boil it. (Or place it in the sun for 15 minutes.) Fill a glass jar with herbs and other seasonings, cover with warmed vinegar, and store in a cool, dark place for up to one year. Use about three 2 inch springs for each cup of vinegar. Garlic, shallots, or chilies may be used also, by adding one for each cup of vinegar. Vinegars should not be stored in direct sunlight (no matter how pretty the bottle may look). The herbs are then strained out and several fresh herb leaves added as decoration. Be sure that all herbs are completely dry before combining with the vinegar. If not, you will be more likely to get unsightly precipitates in the vinegar.

All vegetable matter MUST be covered with vinegar. Hot peppers sometimes float and need to be threaded on a wooden skewer to keep them submerged. Herb flavored vinegars add magic to any recipe that calls for vinegar.