

2026–2027 Florida Citrus Production Guide: Melanose¹

Megan M. Dewdney²

Application Timing Recommendations

- For oranges and tangerines with small amounts of dead wood, one to two applications per season are adequate.
 - Start in early May.
- Applications for grapefruit should start when fruit are 0.25 inch to 0.5 inch (0.64 cm–1.3 cm) in diameter.
 - Often beginning of May but can be as early as mid-April.
 - Fruit no longer susceptible at 2.5–3.0 inches (6.4 cm–7.6 cm) in diameter, usually in mid-July.
- If using calendar application schedule for copper, time applications no more than 21 days apart.
 - Strobilurin-containing (FRAC MOA 11) should be made at shorter intervals, particularly when there is high rainfall.
 - Copper applications can be more effectively timed with the [Citrus Copper Application Scheduler](#).

Rates for pesticides are given as the maximum amount required to treat mature citrus trees unless otherwise noted. To treat smaller trees with commercial application equipment including handguns, mix the per-acre rate for mature trees in 125 gal of water. Calibrate and arrange nozzles to deliver thorough distribution, and treat as many acres as this volume of spray allows.

Fungicide resistance is a known problem with the strobilurin fungicides (FRAC MOA 11). While *Diaporthe citri* does not have a history of resistance, it may develop. Therefore, these materials should never be used more than twice in a row, and no more than two strobilurin-containing applications should be used for melanose control in a season.

Web Addresses for Links

Citrus Copper Application Scheduler: <http://agroclimate.org/tools/citrus-copper-application-scheduler/>

UF/IFAS publication PP289, "A Web-Based Tool for Timing Copper Applications in Florida Citrus":
<https://doi.org/10.32473/edis-pp289-2012>

Recommended Chemical Controls

READ THE LABEL.

See Table 1.

Table 1. Recommended chemical controls for melanose.

Pesticide	FRAC MOA ¹	Mature Trees Rate/Acre ²
Copper fungicide	M 01	Use label rate.
Amistar Top ⁴	11 + 3	15.4 fl oz. Do not apply more than 61.5 fl oz (0.8 lb azoxystrobin and 0.5 lb difenoconazole)/acre/season for all uses. Do not apply more than 0.5 lb a.i./acre/season of difenoconazole. Do not apply more than 1.5 lb a.i./acre/season of azoxystrobin. Do not apply more than 3 times at highest rate. Minimum retreatment interval is 7 days.
Gem 500 SC ³	11	1.9–3.8 fl oz. Do not apply more than 15.2 fl oz/acre/season for all uses. Do not apply within 7 days of harvest.
Headline SC ³	11	12–15 fl oz. Do not apply more than 54 fl oz (0.88 lb a.i.)/acre/season for all uses.
Pristine ⁴	11 + 7	16–18.5 oz. Do not apply more than 74 oz/acre/season for all uses, which is equivalent to 1.17 lb a.i./acre/season of boscalid and 0.592 lb a.i./acre/season of pyraclostrobin. Up to 0.88 lb a.i./acre/season of pyraclostrobin can be used. Minimum retreatment interval is 10 days.
Quadris ³	11	12.0–15.5 fl oz. Do not apply more than 90 fl oz (1.5 lb a.i.)/acre/season for all uses. Minimum retreatment interval is 7 days.

¹ Mode of action class for citrus pesticides from the Fungicide Resistance Action Committee (FRAC) 2025. Refer to chapter 4, "Pesticide Resistance and Resistance Management," for more details.

² Lower rates can be used on smaller trees. Do not use less than the minimum label rate.

³ Do not use more than 4 applications of strobilurin fungicides/season. Do not make more than 2 sequential applications of strobilurin (FRAC MOA 11) fungicides. Do not use in citrus propagation nurseries.

⁴ Do not make more than 4 applications of Pristine or Amistar Top/season. Do not make more than 2 sequential applications of Pristine or Amistar Top before alternating to a non-strobilurin, non-SDHI, non-DMI fungicide.

¹ This document is CG114, one of a series of the Department of Plant Pathology, UF/IFAS Extension. Original publication date August 2026. Revised annually. Visit the Ask IFAS website at <https://ask.ifas.ufl.edu> for the currently supported version of this publication. © 2026 UF/IFAS. This publication is licensed under [CC BY-NC-ND 4.0](#).

² Megan M. Dewdney, professor and Extension specialist, Department of Plant Pathology, UF/IFAS Citrus Research and Education Center, Lake Alfred, FL; UF/IFAS Extension, Gainesville, FL 32611.

The use of trade names in this publication is solely for the purpose of providing specific information. UF/IFAS does not guarantee or warranty the products named, and references to them in this publication do not signify our approval to the exclusion of other products of suitable composition.

Use pesticides safely. Read and follow directions on the manufacturer's label.

The Institute of Food and Agricultural Sciences (IFAS) is an Equal Opportunity Institution authorized to provide research, educational information, and other services only to individuals and institutions that operate in compliance with applicable federal and state non-discrimination laws and policies. For more information on obtaining other UF/IFAS Extension publications, contact your county's UF/IFAS Extension office. U.S. Department of Agriculture, UF/IFAS Extension Service, University of Florida, IFAS, Florida A&M University Cooperative Extension Program, and Boards of County Commissioners Cooperating. Andra Johnson, Dean for UF/IFAS Extension.