

- [Home](#)
- [Current season reports](#)
- [Pest management](#)
- [Weather/Climate](#)
- [Economics](#)
- [Maturity/Storage](#)
- [Pollination](#)
- [Rootstocks](#)
- [Horticultural practices](#)
- [Varieties](#)
- [Contacts](#)
- [Presentations](#)
- [Links](#)

Oriental fruit moth - *Grapholitha molesta*

[Home](#) > Pest management > oriental fruit moth

Three full generations of Oriental fruit moth (OFM) occur in Michigan, and sometimes a partial fourth.



Jack Kelly Clark, U of Calif IPM Proj



Jack Kelly Clark, U of Calif IPM Proj

Adults are about 5 mm long, gray-colored with wavy, light lines on wing surface.

Mature larva is about 10 mm long, creamy-white to pink, with a brown head capsule. Anal comb is present.

Suggested Monitoring: Use 1 trap per 10 acres to determine biofix for each generation. Time treatments for 250 degree days base 42, past biofix.

Oriental Fruit Moth Degree Day Model

The following OFM degree day model provides the predicted egg hatch time periods for all three generations of OFM. Please note that this model is base 45. Treatment thresholds based on trap catch, as with codling moth, have not yet been developed. Where warranted, first control measures should be timed for the beginning of egg hatch for each generation. Where necessary, additional control measures should be applied according to the expected residual effect of the chosen control material.

| GDD Base 45°F (Post Biofix) | Event | Action |
|-----------------------------------|---|---|
| Half-inch green | Development of overwintering larvae | Set Trap |
| 0 GDD = Biofix | 1 st sustained moth captures (see explanation on page 4.) | Set GDD = 0 This is biofix |
| 150-170 GDD | 8-10% 1 st generation egg hatch (expected end of 1 st egg hatch = 646 GDD) | First treatment if control measure is warranted |
| 1125-1150 GDD | 8-10% 2 nd generation egg hatch (expected end of 2 nd egg hatch = 1950 GDD) | First treatment if control measure is warranted |
| 2250-2280 GDD | 8-10% 3 rd generation egg hatch (expected end of 3 rd egg hatch = 3177 GDD) | First treatment if control measure is warranted |

Information above derived from peach data, Hull & Krawczyk. 2001. Penn State University, Penn Fruit News Vol 81(2):23-36

View current Michigan growing degree day accumulations at [Enviro-weather](#). Select a weather station from the map that is closest to your location. Then click on "fruit" for a list of weather resources and models for fruit production.

Comparison of codling moth and Oriental fruit moth

Codling moth and Oriental fruit moth larvae cause similar types of fruit damage. Both will enter fruit from either the calyx end or from the side of the apple. Find more information about the [codling moth](#).



CM feeds in the center of the fruit on flesh and seeds. OFM **generally** feeds on flesh away from the center, but can occasionally feed at the center as well.



Jack Kelly Clark, U of Calif IPM Proj

Mature larvae of OFM can be differentiated from CM larvae by the presence of an anal comb located ventrally at the posterior end of a larva. The comb can be seen with a hand lens.