

Chapter 17. Sweet Corn Production¹

Ramdas Kanissery, Craig Frey, Nicholas S. Dufault, Johan Desaegeer, and Julien Beuzelin²

Botany and Planting

Sweet corn—*Zea mays* var. *rugosa*, Poaceae (Gramineae).

Table 1. Planting information for sweet corn.

Planting Dates	
North Florida	Feb–Apr
Central Florida	Jan–Apr
South Florida	Oct–Mar
Planting Information	
Distance between rows (in)	28–36
Distance between plants (in)	6–8
Seeding depth (in)	1.0–1.5
Seed per acre (lb)	6–15
Days to maturity from seed	64–90
Plant population (acre)	24,000–32,000

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2. Ramdas Kanissery, assistant professor, Horticultural Sciences Department, UF/IFAS Southwest Florida Research and Education Center; Craig Frey, county Extension director and Extension agent II, UF/IFAS Extension Hendry County; Nicholas S. Dufault, associate professor, Plant Pathology Department; Johan Desaegeer, assistant professor, Entomology and Nematology Department, UF/IFAS Gulf Coast REC; and Julien Beuzelin, assistant professor, Entomology and Nematology Department, UF/IFAS Everglades REC; 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.

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Cultivars

Table 2. Description of major sweet corn cultivars currently available.

Type	Genes Controlling Sweetness	Storage Life (Days)	Relative Sugar Content
Sugary	Full complement of sugary	1 to 3	Normal
Sugary Enhanced, also "Modified" and "EH"	Full complement of sugary (su) and half or full complement of sugary enhancer (se)	3 to 5	Slight to moderate or even high levels
Supersweet, also "Ultra," "Extra" sweet	No sugary (su); full complement of shrunken-2 (sh2)	5 to 10	High
Synergistic, also "Sweet-Gene Hybrid"	Full complement of sugary (su) and half complement of shrunken-2 (sh2)	3 to 5	Moderate
Improved Supersweet	Half complement of sugary (su) and full complement of shrunken-2 (sh2)	5 to 10	Very high
ADX	No sugary (su) or shrunken-2 (sh2) genes; full complement of ae, du, and wx genes.	5 to 10	Moderate to high

Table 3. Supersweet (shrunken-2) sweet corn cultivars arranged by kernel color.

Yellow	White	Bicolor
Accentuate	Coronado	Affection
Alliance	Devotion	Awesome XR
Astronaut	Glacial	Battalion
Gallant MXR	Platinum XR	BSS 1075
GSS 1170	3174 XTH	Coastal
Hercules	3380 XTH	Courage MXR
Passion		Honor XR
Primetime		Obsession
Seminole Gold		Salute XR
SV 1077		Seminole Sweet
SV 1446		Starship
		7143

The following tables list registered pesticides that should be integrated with other pest management methods. Additional information on integrated management methods can be requested from UF/IFAS Extension horticulture or agriculture agents. A list of local UF/IFAS Extension offices is available at <https://sfyl.ifas.ufl.edu/find-your-local-office/>.

Table 4. Herbicides approved for managing weeds in sweet corn. Contact: Ramdas Kanissery, UF/IFAS Southwest Florida Research and Education Center.

Active Ingredient lb a.i./Acre	Trade Name Product/Acre	MOA Code	Weeds Controlled/Remarks
Labels change frequently. Be sure to read a current product label before applying any chemical.			
*** PREEMERGENCE ***			
Atrazine Mineral Soil 1.0–2.0 Muck Soil 2.0–3.0	(AAtrex) 4 L Mineral: 2–4 pt Muck: 4–6 pt (AAtrex Nine-0) 90 WDG Mineral: 1.1–2.2 lb Muck: 2.2–3.3 lb	5	Germinating broadleaf and grass weeds. Apply to moist soil. Do not exceed 2.5 lb a.i./A per calendar year. Consult labels for plant-back restrictions on rotational crops.
Carfentrazone up to 0.031	(Aim) 2 EC up to 2 fl oz	14	Apply as a preplant burndown for emerged broadleaf weeds. Use crop oil concentrate, methylated seed oil, or nonionic surfactant at recommended rates. Maximum rate of 0.096 lb a.i./A per season. No pretransplant interval.
Dimethenamid-P 0.56–0.84	(Outlook) 6 EC 12–18 fl oz	15	Annual broadleaf and grass weeds. After application, incorporate into soil by rainfall, sprinkler irrigation, or mechanical tillage. Consult label for rate based on soil texture.
EPTC 4.0–6.0	(Eradicane) 6.7 E 4.75–7.33 pt	8	Annual broadleaf, grass weeds, and nutsedge. Use lower rates on lighter soils (sand). Control of perennial weeds such as bermudagrass or nutsedge is increased through incorporation.
Flufenacet 0.49–0.68	(Define DF) 60 DF 13–18 oz (Define SC) 4 SC 15–19 fl oz	15	Annual broadleaf and grass weeds. Rainfall, irrigation, or light cultivation is required within 7 to 10 days of application. Consult label for rate based on soil texture.
Glyphosate	(various formulations) consult labels	9	Emerged broadleaf and grass weeds. Apply as a preplant burndown. Tank-mix with a residual herbicide to broaden spectrum of weed control. Consult label for individual product directions.
Mesotrione 0.188–0.24	(Callisto) 4 SC 6.0–7.7 fl oz	28	Annual broadleaf weeds. Tank-mix with a preemergence grass herbicide for grass control. Do not exceed 7.7 fl oz/A per season.
Paraquat 0.5–1.0	(Gramoxone) 2 SL 2.0–4.0 pt (Gramoxone) 3 SL 1.3–2.7 pt(Firestorm) 3 SL 1.3–2.7 pt	22	Emerged broadleaf and grass weeds. Apply as a preplant burndown. No more than 3 applications per year. Tank-mix with a residual preemergence herbicide to broaden the spectrum of weed control. Consult label for new restrictions.
Pelargonic acid	(Scythe) 4.2 EC 3%–10% v/v	27	Emerged broadleaf and grass weeds. Apply as a preplant burndown treatment. Product is a contact, nonselective, foliar-applied herbicide with no residual control. May be tank-mixed with soil residual compounds.
Pendimethalin Mineral Soil 0.75–1.0 Muck Soil 1.0–2.0	(Acumen, Prowl) 3.3 EC Mineral: 1.8–2.4 pt Muck: 2.4–4.8 pt (Prowl H20) 3.8 Mineral: 2.0–3.0 pt Muck: 2.0–4.0 pt	3	Broadleaf and grass weeds. Overhead irrigation or rainfall is required within 7 days of application.
Pyraflufen ethyl 0.001–0.003	(ET Herbicide) 0.208 EC 0.5–2.0 fl oz	14	Emerged broadleaf weeds. Apply as a preplant burndown treatment.
Simazine 2.0	(Princep, Simazine) 4 L 2.0 qt (Princep, Simazine 90 WDG 2.2 lb	5	Broadleaf and grass weeds. If a second application is required do not exceed 2.5 lb a.i./A per calendar year. Simazine 4 L and Simazine 90 DF can be applied to muck soils at 2.5 lb a.i./A. PHI 45 days.

Active Ingredient lb a.i./Acre	Trade Name Product/Acre	MOA Code	Weeds Controlled/Remarks
S-metolachlor 1.0–1.6	(Brawl, Dual Magnum) 7.62 EC 1.0–1.67 pt (Cinch, Dual II Magnum) 7.64 EC 1.0–1.67 pt	15	Annual broadleaf and grass weeds. Use a lower rate on lighter soils. Weed control is increased with 0.5 to 1 in. of rainfall or irrigation. Do not exceed 3.9 pt/A per crop year depending on soil texture.
*** POSTEMERGENCE ***			
Atrazine Mineral Soil 1.0–2.0 Muck Soil 2.0–3.0	(AAtrex) 4 L Mineral: 2–4 pt Muck: 4–6 pt (AAtrex Nine-0) 90 WDG Mineral: 1.1–2.2 lb Muck: 2.2–3.3 lb	5	Broadleaf and some grass weeds. Apply before weeds exceed 1.5 in. tall and before corn exceeds 12 inches in height. Do not exceed 2.5 lb a.i./A per calendar year. Consult label for plant-back restrictions on rotational crops.
Bentazon 0.75–1.0	(Basagran) 4 L 1.5–2.0 pt (Basagran) 5 L 1.2–1.6 pt	6	Certain broadleaf and sedge weeds. Consult label for weeds controlled/weed size table. Do not apply more than 4 pt/A per season.
Carfentrazone 0.008–0.016	(Aim) 2 EC 0.5–1.0 fl oz	14	Emerged broadleaf weeds. Apply up to the 14-leaf stage of corn growth. After the V8 stage of growth, apply as a directed application. Do not apply more than 2.0 fl oz/A per season including preplant burndown and crop application. PHI 3 days.
Halosulfuron 0.03–0.05	(Sandeia) 75 DF 0.6–1.0 oz	2	Broadleaf and nutsedge weeds. Apply over the top or with drop nozzles from the spike to the layby stage of corn. A sequential application of 0.66 oz/A may be with drop nozzles to avoid application to the plant whorl. No more than 2 applications per year.
Mesotrione 0.094	(Callisto) 4 SC 3 fl oz	28	Broadleaf weeds. Treat up to 30 in. tall or up to the 8-leaf stage. Include a crop oil concentrate or nonionic surfactant in the spray solution. Slight leaf bleaching may occur. Do not exceed 7.7 fl oz/A per season.
Nicosulfuron 0.03–0.06	(Accent) 75 WDG 0.6–1.3 oz (Accent Q) 54.5 WDG 0.9–1.8 oz	2	Broadleaf and grass weeds. Sensitivity to sweet corn varieties is variable. Do not apply to 'Merit' sweet corn. Do not apply to corn that has previously been treated with 'Counter' or 'Thimet' insecticides because this may result in injury. Consult label for acceptable insecticides. Apply broadcast to corn plants less than 12 in. tall. Apply with drop nozzles to direct spray to corn plants 12–18 in. tall.
Pendimethalin Mineral Soil 0.7–1.0 Muck Soil 1.0–2.0	(Acumen, Prowl) 3.3 EC Mineral: 1.8–2.4 pt Muck: 2.4–4.8 pt (Prowl H20) 3.8 Mineral: 2.0–3.0 pt Muck: 2.0–4.0 pt	3	Broadleaf and grass weeds. Apply after 4 in. tall until corn is 20 to 24 in. tall or the V8 growth stage. Direct the spray to the base of the plants.
S-metolachlor up to 1.9	(Brawl, Dual Magnum) 7.62 EC up to 2.0 pt (Cinch, Dual II Magnum) 7.64 EC up to 2.0 pt	15	Annual broadleaf and grass weeds. Apply after crop emergence up to 40 inches in height. Direct spray to the base of the plants when plants are taller than 5 in. Use a lower rate on lighter soils. Weed control is increased with 0.5 to 1 in. of rainfall or irrigation. Do not exceed 3.9 pt/A per crop year depending on soil texture. PHI 30 days
Tembotrione 0.08	(Laudis) 3.5 EC 3 fl oz	27	Annual broadleaf and grass weeds. Crop tolerance is dependent on variety so apply to a small area if tolerance is unknown. Do not use on 'Merit' or 'Shogun'. May be applied from corn emergence through the V7 stage of growth. Do not exceed 3 fl oz/A per season.
Topramezone 0.020–0.022	(Armezon, Impact) 2.8 0.75–1.0 fl oz	27	Broadleaf and grass weeds. Consult label for maximum size of certain weed species for control. PHI 45 days.

Table 5. Insecticides labeled for management of arthropod pests of sweet corn. Contact: Julien Beuzelin, UF/IFAS Everglades Research and Education Center.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
Labels change frequently. Be sure to read a current product label before applying any chemical. Please refer to Chapter 19 for information on biopesticides, including materials labeled for certified organic production.						
Aphids	1A	*Lannate LV *Lannate SP (methomyl)	LV: 0.75–1.5 pt SP: 0.25–0.50 lb	48	Ears: 0 Forage: 3 Stover: 21	Certain hybrid varieties are susceptible to methomyl injury. Treat a small area to determine safety first.
	1B	Fyfanon Fyfanon 57% EC (malathion)	1.5 pt	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Brigade 2EC (bifenthrin)	2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Capture LFR (bifenthrin)	Preplant incorporated: 4.0–5.3 fl oz At plant: 3.4–13.6 fl oz Preemergence: 3.4 fl oz	12	Preplant incorporated, at planting, preemergence application	For mixing with liquid fertilizer. Maximum of 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Delta Gold (deltamethrin)	1.5–2.4 fl oz	12	Ears and forage: 1 Stover: 21	Maximum of 38.4 fl oz/acre per season.
	3A	*Fastac CS (alpha-cypermethrin)	2.8–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.8–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	PyGanic Crop Protection EC 5.0 (pyrethrins)	4.5–15.6 fl oz	12	0	Thorough coverage is essential. Breaks down rapidly in sunlight. OMRI-listed. ²
	3A	*Warrior II (lambda-cyhalothrin)	1.28–1.92 fl oz	24	Ears (foliar): 1 For feeding livestock or at-plant applications: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
	4A	Assail 30SG Assail 70WP (acetamiprid)	30SG: 2.1–2.9 oz 70WP: 0.9–1.2 oz	12	1	30SG: Maximum of 11.2 oz/acre or 0.21 lb a.i. per year. 70WP: Maximum of 4.8 oz/acre or 0.21 lb a.i. per year. Other brands available with same active ingredient.
	4A + 15	Cormoran (acetamiprid + novaluron)	9–12 fl oz	12	7	Maximum of 40 fl oz/acre per season or 0.21 lb a.i. acetamiprid and 0.39 lb a.i. novaluron per year.
	4C	Transform WG (sulfoxaflor)	0.75–1.5 oz	24	7	Maximum of 3.0 oz/acre per year.
	4D	Sivanto Prime (flupyradifurone)	7.0–14.0 fl oz	4	Ears and forage: 7 Stover: 21	Maximum of 28 fl oz/acre per year.
	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed. ²
	-	BotaniGard ES BoteGHA ES Mycotrol ESO (<i>Beauveria bassiana</i> strain GHA)	0.25–1 qt	4	0	Apply in sufficient water to cover foliage, typically 5–100 gallon/acre. Compatible in tank mix with some fungicides. Mycotrol ESO OMRI-listed. ²
	-	Grandevo (<i>Chromobacterium subtsugae</i> strain PRAA4-1)	2–3 lb	4	0	OMRI-listed. ²
	-	Molt-X (azadirachtin)	10 fl oz	4	0	OMRI-listed. ²
	-	Neemix 4.5 (azadirachtin)	4–16 fl oz	4	0	OMRI-listed. ²
	-	Oil, insecticidal (e.g., Suffoil-X)	1–2 gal/100 gal, depending on brand	4	0	OMRI-listed, ² depending on brand.
	-	Trilogy (extract of neem oil)	1.0%–2.0% v/v	4	0	Apply morning or evening to reduce potential for leaf burn.
Beetles (includes banded cucumber beetle, flea beetles, sap beetles, seed corn beetle)	1A	*Lannate LV *Lannate SP (methomyl)	LV: 0.75–1.5 pt SP: 0.25–0.50 lb	48	Ears: 0 Forage: 3 Stover: 21	Certain hybrid varieties are susceptible to methomyl injury. Treat a small area to determine safety first.
	1A	Sevin 4F Sevin XLR Plus (carbaryl)	1–2 qt	24 (21 days for detasselling workers)	Ears: 2 Forage: 14 Fodder: 48	Maximum of 16 qt/acre per crop per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	1B	*Counter 15G Lock 'N Load (terbufos)	Banded or in furrow: 6.0–8.0 oz per 1000 ft of row Postemergence incorporated: 8 oz per 1000 ft of row at cultivation	48	60	Only one application (at planting, postemergence incorporated, or cultivation time treatment) per season. Do not exceed 8.7 lb/acre. 20G formulation also available.
	1B	Fyfanon Fyfanon 57% EC ULV AG (malathion)	Fyfanon, 57% EC: 1.5 pt ULV AG: 4–8 fl oz	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.
	1B	*Thimet 20-G (phorate)	4.5–6.0 oz per 1000 ft of row	48	at planting	One application per season, no more than 6.5 lb/acre per season.
	3A	*Ambush 25W (permethrin)	6.4–16.0 oz	12	1	Do not apply more than 2.0 lb a.i./acre per season. Rates above 12.8 oz are for Florida only.
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Brigade 2EC (bifenthrin)	2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Capture LFR (bifenthrin)	Preplant incorporated: 4.0–5.3 fl oz At plant: 3.4–13.6 fl oz Preemergence: 3.4 fl oz	12	Preplant incorporated, at planting, preemergence application	For mixing with liquid fertilizer. Maximum of 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Declare (gamma-cyhalothrin)	1.02–1.54 fl	24	Ears: 1 Fodder: 21	Maximum of 24.6 fl oz/acre per crop.
	3A	*Delta Gold (deltamethrin)	1.0–2.4 fl oz	12	Ears and forage: 1 Stover: 21	Maximum of 38.4 fl oz/acre per season.
	3A	*Fastac CS (alpha-cypermethrin)	2.2–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Force 3G (tefluthrin)	Variable depending on row spacing	0	At planting or cultivation within 30 days of seedling emergence	Only one application per crop. Granules must be incorporated.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	PyGanic Crop Protection EC 5.0 (pyrethrins)	4.5–15.6 fl oz	12	0	Thorough coverage is essential. Breaks down rapidly in sunlight. OMRI-listed. ²
	3A	*Warrior II (lambda-cyhalothrin)	At plant: 0.33 fl oz/1000 ft of row Foliar: 1.28–1.92 fl oz	24	Ears (foliar): 1 Feeding livestock or at-plant applications: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
	4A	Assail 30SG Assail 70WP (acetamiprid)	30SG: 4.0–5.3 oz 70WP: 1.7–2.3 oz	12	7	30SG: Maximum of 11.2 oz/acre or 0.21 lb a.i. per year. 70WP: Maximum of 4.8 oz/acre or 0.21 lb a.i. per year. Other brands available with same active ingredient.
	4A + 15	Cormoran (acetamiprid + novaluron)	9–12 fl oz	12	7	Maximum of 40 fl oz/acre per season or 0.21 lb a.i. acetamiprid and 0.39 lb a.i. novaluron per year.
	15	Rimon 0.83EC (novaluron)	6–12 fl oz	12	1	Maximum of 60 fl oz/acre per season.
	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed. ²
	-	Grandevo (<i>Chromobacterium subtsugae</i> strain PRAA4-1)	2–3 lb	4	0	OMRI-listed. ²
Caterpillars (includes beet armyworm, corn borer, corn earworm, cutworms, fall armyworm, webworms)	1A	*Lannate LV *Lannate SP (methomyl)	LV: 0.75–1.5 pt SP: 0.25–0.50 lb	48	Ears: 0 Forage: 3 Stover: 21	Certain hybrid varieties are susceptible to methomyl injury. Treat a small area to determine safety first.
	1A	*Methomyl 5G (methomyl)	1.5–3.0 lb	48	Forage: 3 Ears: 21	For corn earworm and fall armyworm control. Apply as a banded application, directing granules to the whorl of the plants. Apply from the 4th leaf stage until tasseling. Maximum of 30 lb/acre or 5 applications per season.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	1A	Sevin 4F Sevin XLR Plus (carbaryl)	1–2 qt	24 (21 days for detasseling workers)	Ears: 2 Forage: 14 Fodder: 48	Maximum of 16 qt/acre per crop per year.
	1B	*Counter 15G Lock 'n Load (terbufos)	Banded or in furrow: 6.0–8.0 oz per 1000 ft of row Postemergence incorporated: 8 oz per 1000 ft of row at cultivation	48	60	Only one application (at planting, postemergence incorporated, or cultivation time treatment) per season. Do not exceed 8.7 lb/acre. 20G formulation also available.
	1B	Fyfanon Fyfanon 57% EC (malathion)	1.5 pt	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.
	1B	*Mocap 15G (ethoprop)	See label.	48	at planting	One application per growing season.
	3A	*Ambush 25W (permethrin)	6.4–16.0 oz	12	1	Do not apply more than 2.0 lb a.i./acre per season. Rates above 12.8 oz are for Florida only.
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Brigade 2EC (bifenthrin)	In-furrow T-band at plant: 0.15–0.30 fl oz/1000 ft of row Foliar: 2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Capture LFR (bifenthrin)	Preplant incorporated: 4.0–5.3 fl oz At plant: 3.4–13.6 fl oz Preemergence: 3.4 fl oz	12	Preplant incorporated, at planting, preemergence application	For mixing with liquid fertilizer. Maximum of 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Declare (gamma-cyhalothrin)	1.02–1.54 fl oz	24	Ears: 1 Fodder: 21	Maximum of 24.6 fl oz/acre per crop.
	3A	*Delta Gold (deltamethrin)	1.0–2.4 fl oz	12	Ears and forage: 1 Stover: 21	Maximum of 38.4 fl oz/acre per season.
	3A	*Fastac CS (alpha-cypermethrin)	2.2–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Force 3G (tefluthrin)	Depends on row spacing	0	At planting or cultivation within 30 days of seedling emergence	Only one application per crop. Granules must be incorporated.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	PyGanic Crop Protection EC 5.0 (pyrethrins)	4.5–15.6 fl oz	12	0	Thorough coverage is essential. Breaks down rapidly in sunlight. OMRI-listed. ²
	3A	*Warrior II (lambda-cyhalothrin)	At plant: 0.33 fl oz/1000 ft of row Foliar: 1.28–1.92 fl oz	24	Ears (foliar): 1 Feeding livestock or at-plant applications: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
	4A + 15	Cormoran (acetamiprid + novaluron)	9–12 fl oz	12	7	Maximum of 40 fl oz/acre per season or 0.39 lb a.i. novaluron and 0.21 lb a.i. acetamiprid per year.
	5	Entrust SC (spinosad)	1.5–6.0 fl oz	4	Ears: 1 Forage: 7 Fodder: 28	Maximum of 29 fl oz/acre per year or 6 applications. OMRI-listed. ²
	5	Radiant SC (spinetoram)	3–6 fl oz	4	Ears: 1 Forage or fodder: 3	Maximum of 36 fl oz/acre per year or 6 applications.
	5 + 18	Intrepid Edge (spinetoram + methoxyfenozide)	4–12 fl oz	4	Ears and methoxyfenozide, fodder: 3	Maximum of 51 fl oz/acre per year (1 lb a.i. forage, 21 dry 0.2 lb a.i. spinetoram) or 6 applications.
	11A	Agree WG (<i>Bacillus thuringiensis</i> subspecies <i>aizawai</i>)	1.0–2.0 lb	4	0	Apply when larvae are small for best control. OMRI-listed. ²
	11A	Biobit HP (<i>Bacillus thuringiensis</i> subspecies <i>kurstaki</i>)	0.5–2.0 lb	4	0	Treat when larvae are young. Good coverage is essential. Can be used in the greenhouse. OMRI-listed. ²

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	11A	Crymax WDG (<i>Bacillus thuringiensis</i> subspecies <i>kurstaki</i>)	0.5–2.0 lb	4	0	Use high rate for armyworms. Treat when larvae are young. Not for organic production.
	11A	Deliver (<i>Bacillus thuringiensis</i> subspecies <i>kurstaki</i>)	0.25–1.5 lb	4	0	Use higher rates for armyworms. OMRI-listed. ²
	11A	DiPel DF (<i>Bacillus thuringiensis</i> subspecies <i>kurstaki</i>)	0.5–2.0 lb	4	0	Treat when larvae are young. Good coverage is essential. For organic production.
	11A	Javelin WG (<i>Bacillus thuringiensis</i> subspecies <i>kurstaki</i>)	0.12–1.50 lb	4	0	Treat when larvae are young. Thorough coverage is essential. OMRI-listed. ²
	11A	Xentari DF (<i>Bacillus thuringiensis</i> subspecies <i>aizawai</i>)	0.5–2.0 lb	4	0	Treat when larvae are young. Thorough coverage is essential. May be used in the greenhouse. Can be used in organic production.
	15	Rimon 0.83EC (novaluron)	6–12 fl oz	12	1	Maximum of 60 fl oz/acre per season.
	18	Intrepid 2F (methoxyfenozide)	4–16 fl oz	4	Ears and forage: 3 Dry fodder: 21	Maximum of 64 fl oz/acre per year. Other brands available with same active ingredient.
	22	Avaunt Avaunt eVo (indoxacarb)	2.5–3.5 oz	12 (14 days for hand harvesting)	Ears: 3 Fodder and stover: 35	Whorl stage through tassel push applications only. Maximum of 14 oz/acre per crop, or 4 applications/acre per crop, or 42 oz/acre per year.
	28	Coragen (chlorantraniliprole)	3.5–7.5 fl oz	4	1	Foliar only. Maximum of 15.4 fl oz/acre, or 4 applications, or 0.2 lb a.i./acre chlorantraniliprole per year.
	28	Vantacor (chlorantraniliprole)	In-furrow at plant: 1.7–2.5 fl oz Foliar: 1.2–2.5 fl oz	4	1	Can be applied by overhead sprinkler chemigation system. Maximum of 5.1 fl oz/acre, or 4 applications, or 0.2 lb a.i./acre chlorantraniliprole per year.
	32	Spear-Lep (GS-omega/kappa-HV1a)	1–2 pt	4	0	Must be tank-mixed with a <i>Bacillus thuringiensis</i> (Bt) product. Maximum of 10 gallons/acre per year.
-	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed. ²
-	-	Grandevo (<i>Chromobacterium subtsugae</i> strain PRAA4-1)	1–3 lb	4	0	OMRI-listed. ²
-	-	Molt-X (azadirachtin)	10 fl oz	4	0	OMRI-listed. ²
-	-	Neemix 4.5 (azadirachtin)	4–16 fl oz	4	0	OMRI-listed. ²

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	-	Oil, insecticidal	1–2 gal/100 gal, depending on brand	4	0	
Chinch bugs	1A	Sevin 4F Sevin XLR Plus (carbaryl)	1–2 qt	24 (21 days for detasseling workers)	Ears: 2 Forage: 14 Fodder: 48	Maximum of 16 qt/acre per crop per year.
	1B	*Counter 15G Lock 'n Load (terbufos)	Banded or in furrow: 6.0–8.0 oz per 1000 ft of row Postemergence incorporated: 8 oz per 1000 ft of row at cultivation	48	60	Only one application (at planting, postemergence incorporated, or cultivation time treatment) per season. Do not exceed 8.7 lb/acre. 20G formulation also available.
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Brigade 2EC (bifenthrin)	2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Delta Gold (deltamethrin)	1.5–2.4 fl oz	12	Ears and forage: 1 Stover: 21	Maximum of 38.4 fl oz/acre per season.
	3A	*Fastac CS (alpha-cypermethrin)	2.2–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Force 3G (tefluthrin)	Depends on row spacing	0	At planting or cultivation within 30 days of seedling emergence	Only one application per crop. Granules must be incorporated.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	*Warrior II (lambda-cyhalothrin)	1.28–1.92 fl oz	24	Ears: 1 Feeding livestock: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	-	Grandevo (<i>Chromobacterium subtsugae</i> strain PRAA4-1)	2–3 lb	4	0	OMRI-listed. ²
Corn silk flies	1B	Fyfanon ULV AG (malathion)	6–8 fl oz	12	5	Ultra low volume (ULV) formulation. Maximum of 2 applications per year.
	3A	*Asana XL (esfenvalerate)	9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Fastac CS (alpha-cypermethrin)	2.8–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	*Warrior II (lambda-cyhalothrin)	1.92 fl oz	24	Ears: 1 Feeding livestock: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	4A	Assail 30SG Assail 70WP (acetamiprid)	30SG: 5.3 oz 70WP: 2.3 oz	12	7	30SG: Maximum of 11.2 oz/acre per growing season. 70WP: Maximum of 4.8 oz/acre or 0.21 lb a.i. per year. Other brands available with same active ingredient.
	4A + 15	Cormoran (acetamiprid + novaluron)	12 fl oz	12	7	Maximum of 40 fl oz/acre per season or 0.21 lb a.i. acetamiprid and 0.39 lb a.i. novaluron per year.
Fire ants	3A	*Force 3G Insecticide (tefluthrin)	Depends on row spacing	0	At planting or cultivation within 30 days of seedling emergence	Only one application per crop. Granules must be incorporated.
	7A	Extinguish (S-methoprene)	1–1.5 lb	4	0	Slow-acting insect growth regulator (IGR). Best applied early spring and fall where crop will be grown. Colonies will be reduced after three weeks and eliminated after 8 to 10 weeks. May be applied by ground equipment or aerially.
Grasshoppers	1B	Fyfanon Fyfanon 57% EC (malathion)	1.5 pt	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Brigade 2EC (bifenthrin)	2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Delta Gold (deltamethrin)	1.0–1.5 fl oz	12	Ears and forage: 1 Stover: 21	Maximum of 38.4 fl oz/acre per season.
	3A	*Fastac CS (alpha-cypermethrin)	2.8–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.8–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	*Warrior II (lambda-cyhalothrin)	1.28–1.92 fl oz	24	Ears: 1 Feeding livestock: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
	4A + 15	Cormoran (acetamiprid + novaluron)	9–12 fl oz	12	7	Maximum of 40 fl oz/acre per season or 0.21 lb a.i. acetamiprid and 0.39 lb a.i. novaluron per year.
	15	Rimon 0.83EC (novaluron)	6–12 fl oz	12	1	Maximum of 60 fl oz/acre per season.
	28	Coragen (chlorantraniliprole)	2.0–5.0 fl oz	4	1	Foliar only. Maximum of 15.4 fl oz/acre, or 4 applications, or 0.2 lb a.i./acre chlorantraniliprole per year.
	28	Vantacor (chlorantraniliprole)	1.2–2.5 fl oz	4	1	Foliar only. Can be applied by overhead sprinkler chemigation system. Maximum of 5.1 fl oz/acre, or 4 applications, or 0.2 lb a.i./acre chlorantraniliprole per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
Leafhoppers	1A	Sevin 4F Sevin XLR Plus (carbaryl)	1–2 qt	24 (21 days for detasseling workers)	Ears: 2 Forage: 14 Fodder: 48	Maximum of 16 qt/acre per crop per year.
	1B	Fyfanon Fyfanon 57% EC (malathion)	1.5 pt	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.
	3A	*Ambush 25W (permethrin)	6.4–16.0 oz	12	1	Do not apply more than 2.0 lb a.i./acre per season. Rates above 12.8 oz are for Florida only.
	3A	*Fastac CS (alpha-cypermethrin)	2.2–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	4.0–10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.
	3A	PyGanic Crop Protection EC 5.0 (pyrethrins)	4.5–15.6 fl oz	12	0	Thorough coverage is essential. Breaks down rapidly in sunlight. OMRI-listed. ²
	3A	*Warrior II (lambda-cyhalothrin)	1.28–1.92 fl oz	24	Ears: 1 Feeding livestock: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
Soil pests (includes corn rootworms, seed corn maggot, white grubs, wireworms)	4D	Sivanto Prime (flupyradifurone)	7.0–14.0 fl oz	4	Ear and forage: 7 Stover: 21	Maximum of 28 fl oz/acre per year.
	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed ² .
	-	Molt-X (azadirachtin)	10 fl oz	4	0	OMRI-listed ² .
	1A	*Lannate LV *Lannate SP (methomyl)	LV: 0.75–1.5 pt SP: 0.25–0.50 lb	48	Ears: 0 Forage: 3 Stover: 21	Certain hybrid varieties are susceptible to methomyl injury. Treat a small area to determine safety first.
	1A	Sevin 4F Sevin XLR Plus (carbaryl)	1–2 qt	24 (21 days for detasseling workers)	Ears: 2 Forage: 14 Fodder: 48	Maximum of 16 qt/acre per crop per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	1B	*Counter 15G Lock 'n Load (terbufos)	Banded or in furrow: 6.0–8.0 oz per 1000 ft of row Postemergence incorporated: 8 oz per 1000 ft of row at cultivation	48	60	Only one application (at-planting, postemergence incorporated, or cultivation time treatment) per season. Do not exceed 8.7 lb/acre. 20G formulation also available.
	1B	*Mocap 15G (ethoprop)	See label	48	At planting	One application per growing season.
	1B	*Thimet 20-G (phorate)	At planting or cultivation: 4.5–6.0 oz/1000 ft of row	48	Ears, forage: 30	Maximum of 6.5 lb/acre per season or one application.
	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Do not apply more than 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Baythroid XL (beta-cyfluthrin)	0.8–2.8 fl oz	12	0	Maximum of 28 fl oz/acre per season. Maximum of 10 applications.
	3A	*Brigade 2EC (bifenthrin)	In-furrow T-band at plant: 0.15–0.30 fl oz/1000 ft of row Foliar: 2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Capture LFR (bifenthrin)	Preplant incorporated: 4.0–5.3 fl oz At plant: 3.4–17.0 fl oz Preemergence: 3.4 fl oz	12	Preplant incorporated at planting, preemergence application	For mixing with liquid fertilizer. Maximum of 0.2 lb a.i./acre, per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Force 3G (tefluthrin)	Depends on row spacing	0	At planting or cultivation within 30 days of seeding emergence	Only one application per crop. Granules must be incorporated.
	3A	*Warrior II (lambda-cyhalothrin)	At plant: 0.33 fl oz/1000 ft of row Foliar: 1.28–1.92 fl oz	24	Ears (foliar): 1 Feeding livestock or at-plant applications: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A + -	Azera (pyrethrins + azadirachtin)	16–56 fl oz	12	0	OMRI-listed. ²
	-	Oil, insecticidal	1–2 gal/100 gal, depending on brand	4	0	
Spider mites	1B	*Thimet 20-G (phorate)	4.5–6.0 oz per 1000 ft of row	48	At planting, see label	One application per season, no more than 6.5 lb/acre per season.
	3A	*Brigade 2EC (bifenthrin)	5.12–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Hero Insecticide (bifenthrin + zeta-cypermethrin)	10.3 fl oz	12	3	Maximum of 27.39 fl oz/acre per season (0.266 lb a.i.). See label when using more than one product containing bifenthrin or zeta-cypermethrin.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	7.7–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
	6	*Agri-Mek SC (abamectin)	1.75–3.50 fl oz	12	7	Must be mixed with a nonionic activator-type wetting, spreading, or penetrating adjuvant. Do not use binder or sticker adjuvant. Maximum of 7 fl oz/acre per year. No more than 2 sequential applications.
	23	Oberon 25C (spiromesifen)	5.7–16 fl oz	12	Ears, green forage, silage: 5 Grain or stover: 30	Maximum of 17 fl oz/acre per season or no more than two applications.
	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed. ²
	-	Grandevo (<i>Chromobacterium subtsugae</i> strain PRAA4-1)	2–3 lb	4	0	OMRI-listed. ²
	-	Trilogy (extract of neem oil)	1.0%–2.0% v/v	4	0	Apply morning or evening to reduce potential for leaf burn.
Tarnished plant bug	3A	*Asana XL (esfenvalerate)	5.8–9.6 fl oz	12	1	Maximum of 0.5 lb a.i./acre per season (10 applications at highest rate).
	3A	*Brigade 2EC (bifenthrin)	2.1–6.4 fl oz	12	1	Maximum of 12.8 fl oz/acre per season or 0.2 lb a.i./acre per season of all bifenthrin products. Many other brands available with same active ingredient.
	3A	*Fastac CS (alpha-cypermethrin)	2.8–3.8 fl oz	12	3	Maximum of 11.4 fl oz/acre per season.
	3A	*Mustang Maxx (zeta-cypermethrin)	2.24–4.0 fl oz	12	3	Maximum of 24 fl oz/acre per season.

Insect or Mite Pest	MOA Code ¹	Trade Name (Active Ingredient) *Restricted	Rate (Product/Acre)	REI (Hours)	Days to Harvest	Remarks ²
	3A	*Warrior II (lambda-cyhalothrin)	1.28–1.92 fl oz	24	Ears: 1 Feeding livestock: 21	Maximum of 30.72 fl oz/acre per crop. Many other brands with same active ingredient are available.
	3A + 28	*Besiege (lambda-cyhalothrin + chlorantraniliprole)	6–10 fl oz	24	1	Maximum of 31 fl oz/acre per year.
	3A + 28	*Elevest (bifenthrin + chlorantraniliprole)	4.8–9.6 fl oz	12	1	Maximum of 2 applications/acre per year. Maximum of 0.2 lb a.i./acre bifenthrin and 0.2 lb a.i./acre chlorantraniliprole per year.
Thrips (check label for species controlled)	1B	*Counter 15G Lock 'n Load (terbufos)	Banded or in furrow: 6.0–8.0 oz per 1000 ft of row Postemergence incorporated: 8 oz per 1000 ft of row at cultivation	48	60	Only one application (at planting, postemergence incorporated, or cultivation time treatment) per season. Do not exceed 8.7 lb/acre. 20G formulation also available.
	1B	Fyfanon Fyfanon 57% EC (malathion)	1.5 pt	12	5	Maximum of 2 applications per year. Crop injury may occur in the whorl to silking stages.
	3A	PyGanic Crop Protection EC 5.0 (pyrethrins)	4.5–15.6 fl oz	12	0	Thorough coverage is essential. Breaks down rapidly in sunlight. OMRI-listed. ²
	-	Aza-Direct (azadirachtin)	1–3.5 pt	4	0	Antifeedant, repellent, insect growth regulator. OMRI-listed. ²
	-	BotaniGard ES BoteGHA ES Mycotrol ESO (<i>Beauveria bassiana</i> strain GHA)	0.2–1 qt	4	0	Apply in sufficient water to cover foliage, typically 5–100 gallon/acre. Compatible in tank mix with some fungicides. Mycotrol ESO OMRI-listed. ²
	-	Grandevo (<i>Chromobacterium subtugae</i> strain PRAA4-1)	2–3 lb	4	0	OMRI-listed. ²
	-	Molt-X (azadirachtin)	10 fl oz	4	0	OMRI-listed. ²
	-	Oil, insecticidal (e.g., Suffoil-X)	12 gal/100 gal, depending on brand	4	0	OMRI-listed, ² depending on brand.
	-	Trilogy (extract of neem oil)	1.0%–2.0% v/v	4	0	Apply morning or evening to reduce potential for leaf burn.

Table 6. Sweet corn fungicides ordered by disease and then FRAC group according to their mode of action. Contact: Nicholas S. Dufault, UF/IFAS Plant Pathology Department.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
Labels change frequently. Be sure to read a current product label before applying any chemical. Please refer to Chapter 19 for information on biopesticides, including materials labeled for certified organic production.							
Bacterial stalk rot	M1	(copper compounds) Many brands available: Badge X2, Copper Count N, Cueva, Kocide 2000, Kocide 3000, Mastercop, Nu-Cop 50 DF, Top Cop w/Sulfur	SEE INDIVIDUAL LABELS		1	Varies by product from 4 hr to 2 days	
Damping-off	M3	Defiant 75WP (thiram)	5.3 oz/100 lb of seed			1	Seed treatment only.
	M3	Signet 480FS (thiram)	5.0 oz/100 lb of seed			1	Seed treatment only.
Damping-off seedling blight	3	Vortex (ipconazole)	0.085 fl oz/ 100 lb of seed			0.5	Seed treatment only.
	4 + 3	Dividend Extreme (mefenoxam + difenoconazole)	5 fl oz/100 lb of seed			2	Seed treatment only.
	11	Dynasty (azoxystrobin)	0.153 fl oz/100 lb of seed			4	Seed treatment only.
	11	Trilex (trifloxystrobin)	0.96 fl oz/100 lb of seed				Seed treatment only.
Eye spot	3	(propiconazole) Many brands available: Amtide Propiconazole 41.8, Bumper 41.8EC, Fitness, Propiconazole E-AG 41.8EC, Propimax EC, Tilt	4 fl oz	16 fl oz	14	0.5	Do not exceed 4 total applications.
	3 + 7 + 11	Miravis Neo (propiconazole + pydiflumetofen + azoxystrobin)	13.7 fl oz	44.5 fl oz	14	0.5	Do not make more than 2 sequential applications.
	3 + 11	Delaro (prothioconazole + trifloxystrobin)	8 fl oz	32 fl oz	Forage and ears: 0 Fodder: 14	0.5	Do not make more than 2 sequential applications.
	7	Vertisan (penthioapyrad)	24 fl oz	48 fl oz	7	0.5	Soil and foliar treatments. See label for details.
	7 + 11	Priaxor (fluxapyroxad + pyraclostrobin)	8 fl oz	16 fl oz	7	0.5	Alternate with fungicides of dissimilar modes of action.
	11	Aftershock (fluoxastrobin)	Foliar: 3.8 fl oz	15.27 fl oz	7	0.5	Soil and foliar treatments. See label for details.
	11	Evito 480SC (fluoxastrobin)	3.8 fl oz	15.2 fl oz	7	0.5	Do not exceed 2 sequential and 4 total applications.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
	11	Headline (pyraclostrobin)	12 fl oz	72 fl oz	7	0.5	Do not exceed 2 sequential and 6 total applications of Headline or other Qol fungicides.
	11	Headline SC (pyraclostrobin)	12 fl oz	72 fl oz	7	0.5	Do not exceed 2 sequential and 6 total applications of Headline or other Qol fungicides.
	11	Quadris (azoxystrobin)	15.4 fl oz or 0.8 fl oz/1000 row ft	2.88 qt	7	4 hr	Do not exceed 1 sequential and 4 total applications of Quadris or other Qol fungicides. See label for soil applications.
	11 + 3	Avaris (azoxystrobin + propiconazole)	14 fl oz	28 fl oz	14	0.5	See label for details.
	11 + 3	Evito T (fluoxastrobin + tebuconazole)	9 fl oz	36 fl oz	7	19	Do not exceed 2 sequential and 4 total applications.
	11 + 3	Headline AMP (pyraclostrobin + metconazole)	14.4 fl oz	57.6 fl oz	7	0.5	Do not exceed 2 sequential and 4 total applications of Headline AMP.
	11 + 3	Helmstar Plus (azoxystrobin + tebuconazole)	10.8 fl oz	43.2 fl oz	7	19	Do not spray after V-8 growth stage.
	11 + 3	Quilt (azoxystrobin + propiconazole)	14 fl oz	56 fl oz	14	0.5	Alternate every other application with a fungicide of dissimilar mode of action.
	11 + 3	Quilt XCEL (azoxystrobin + propiconazole)	14 fl oz	56 fl oz	14	0.5	Alternate every other application with a fungicide of dissimilar mode of action.
	11 + 3	Stratego (trifloxystrobin + propiconazole)	12 fl oz	24 fl oz	14	0.5	Do not apply more than 2 sequential applications.
	11 + 3	Stratego YLD (trifloxystrobin + propiconazole)	5 fl oz	20 fl oz	14	0.5	Do not apply more than 2 sequential applications.
	11 + 3	Topguard EQ (flutriafol + azoxystrobin)	7 fl oz	14 fl oz		3	Make no more than 2 applications per season.
	11 + 3	Velthyma (pyraclostrobin + mefenfluproconazole)	10 fl oz	20 fl oz	21	0.5	See label for details.
	11 + 7	Priaxor (pyraclostrobin + fluxapyroxad)	8 fl oz	16 fl oz	7	0.5	See label for details.
Gray leaf spot	3	(tebuconazole) Many brands available: Follicur 3.6F, Monsoon 3.6F, Orius 3.6F, Tebustar 3.6L, Tebuzol 3.6F, Toledo 3.6F	6 fl oz	24 fl oz	7	0.5	Restricted-entry time is 19 days.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
	3	Topguard (flutriafol)	14 fl oz	28 fl oz	7	3	No more than 2 applications per year.
	3	Xyway LFR (flutriafol)	15.2 fl oz	15.2 fl oz	-	0.5	Apply to corn in-furrow at planting or postemergence directed to the soil.
	3 + M2	Unicorn (tebuconazole + sulfur)	3.75 lb	15.0 lb	14	19	See label for details and rotational restrictions.
	3 + 7 + 11	Miravis Neo (propiconazole + pydiflumetofen + azoxystrobin)	13.7 fl oz	44.5 fl oz	14	0.5	Do not make more than 2 sequential applications.
	3 + 7 + 11	Revytek (mefenfluproconazole + fluxapyroxad + pyraclostrobin)	15 fl oz	30 fl oz	21	0.5	See label for details.
	3 + 33	Viathon (tebuconazole + potassium phosphite)	3.0 pt	16.5 pt	7	0.5	See label for details and rotational restrictions.
	7 + 11	Priaxor (pyraclostrobin + fluxapyroxad)	8 fl oz	16 fl oz	7	0.5	Alternate with a fungicide of dissimilar mode of action.
Northern blight Southern blight Common rust	M3	(mancozeb) Many brands available: Dithane DF Rainshield, Dithane F-45 Rainshield, Dithane M45, Koverall, Manzate DF, Manzate Flowable, Manzate Pro-Stick, Penncozeb 4FL, Penncozeb 75DF, Penncozeb 80WP, Roper DF Rainshield	1.5 lb	24 lb	7	1	Start applications at the first sign of disease.
	M5	(chlorothalonil) Many brands available: Bravo Ultrex, Bravo Weather Stik, Chloronil 720, Chlorothalonil 720 SC, Echo 720, Echo 90DF, Echo ZN, Equus 500 ZN, Equus 720 SST, Equus DF, Initiate 720, Initiate ZN	SEE INDIVIDUAL LABELS		7	0.5	
	3	(propiconazole) Many brands available: Amcide Propiconazole 41.8, Bumper 41.8EC, Fitness, Propiconazole E-AG 41.8EC, Propicure 3.6F, Propimax EC, Propi-Star EC, Shar-Shield PPZ, Tide Propiconazole 41.8 EC, Tilt 3.6EC, Topaz	4 fl oz	16 fl oz	14	0.5	Do not exceed 4 total applications.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
	3	Prosaro (tebuconazole + prothioconazole)	8.2 fl oz	26 fl oz	7	0.5	See label for adjuvant information and rotational restrictions.
	3	(tebuconazole) Many brands available: Folicur 3.6F, Monsoon 3.6F, Onset 3.6L, Orius 3.6F, Tebu-Crop, Tebustar 3.6L, Tebuzol 3.6F, Toledo 3.6F	6 fl oz	24 fl oz	7	0.5	Restricted-entry time is 19 days.
	3	Topguard (flutriafol)	14 fl oz	28 fl oz	7	3	No more than 2 applications per year.
	3	Xyway LFR (flutriafol)	15.2 fl oz	15.2 fl oz	-	0.5	Apply to corn in-furrow at planting or postemergence directed to the soil.
	3 + M2	Unicorn (tebuconazole + sulfur)	3.75 lb	15.0 lb	14	19	See label for details and rotational restrictions.
	3 + 7	Propulse (prothioconazole + fluopyram)	27.4 fl oz	13.7 fl oz	0	0.5	Do not make more than 2 sequential applications.
	3 + 7 + 11	Miravis Neo (propiconazole + pydiflumetofen + azoxystrobin)	13.7 fl oz	44.5 fl oz	14	0.5	Do not make more than 2 sequential applications.
	3 + 7 + 11	Revytek (mefentrifluconazole + fluxapyroxad + pyraclostrobin)	15 fl oz	30 fl oz	21	0.5	See label for details.
	3 + 7 + 11	Trivapro (propiconazole + benzovindiflupyr + azoxystrobin)	13.7 fl oz	54.8 fl oz	14	0.5	Use no more than 2 sequential applications before alternating with a fungicide of dissimilar mode of action.
	3 + 11	Delaro (prothioconazole + trifloxystrobin)	8 fl oz	32 fl oz	Forage and ears: 0 Fodder: 14	0.5	Do not make more than 2 sequential applications
	3 + 33	Viathon (tebuconazole + potassium phosphite)	3.0 pt	16.5 pt	7	0.5	See label for details and rotational restrictions.
	7	Vertisan (penthioopyrad)	24 fl oz	48 fl oz	7	0.5	Soil and foliar treatments.
	7 + 11	Elatius (benzovindiflupyr + azoxystrobin)	7.3 oz	14.6 fl oz	7	0.5	Alternate with fungicides of dissimilar modes of action.
	11	Aftershock (fluoxastrobin)	Foliar: 3.8 fl oz	15.27 fl oz	7	0.5	Soil and foliar treatments.
	11	Aproach (picoxystrobin)	12 fl oz	36 fl oz	7	0.5	See label for details.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
	11	Evito 480SC (fluoxastrobin)	3.8 fl oz	15.2 fl oz	7	0.5	Do not exceed 2 sequential and 4 total applications.
	11	Headline (pyraclostrobin)	12 fl oz	72 fl oz	7	0.5	Do not exceed 2 sequential and 6 total applications of Headline or other QoI fungicides.
	11	Headline SC (pyraclostrobin)	12 fl oz	72 fl oz	7	0.5	Do not exceed 2 sequential and 6 total applications of Headline or other QoI fungicides.
	11	Quadris (azoxystrobin)	15.4 fl oz or 0.8 fl oz/1000 row ft	2.88 qt	7	4 hr	Do not exceed 2 sequential and 4 total applications of Quadris or other QoI fungicides. See label for soil applications.
	11	Willowood Azoxy 2 SC (azoxystrobin)	15.5 fl oz	62 fl oz	7	4 hr	Do not exceed 2 sequential applications.
	11 + 3	Avaris (azoxystrobin + propiconazole)	14 fl oz	28 fl oz	14	0.5	See label for details.
	11 + 3	Custodia (azoxystrobin + tebuconazole)	12.9 fl oz	51.7 fl oz	21	0.5	See label for details.
	11 + 3	Evito T (fluoxastrobin + tebuconazole)	9 fl oz	36 fl oz	7	19	Do not exceed 2 sequential and 4 total applications.
	11 + 3	Headline AMP (pyraclostrobin + metconazole)	14.4 fl oz	57.6 fl oz		0.5	Do not exceed 2 sequential and 4 total applications of Headline AMP.
	11 + 3	Quilt XCEL (azoxystrobin + propiconazole)	14 fl oz	56 fl oz	14	0.5	Alternate every other application with a fungicide of dissimilar mode of action.
	11 + 3	Stratego (trifloxystrobin + propiconazole)	12 fl oz	24 fl oz	0	0.5	Do not apply more than 2 sequential applications.
	11 + 3	Stratego YLD (trifloxystrobin + propiconazole)	5 fl oz	20 fl oz	0	0.5	Do not apply more than 2 sequential applications.
	11 + 3	Topguard EQ (flutriafol + azoxystrobin)	7 fl oz	14 fl oz		3	Make no more than 2 applications per season.
	11 + 3	Veltyma (pyraclostrobin + mefentrifluconazole)	10 fl oz	20 fl oz	21	0.5	See label for details.
	11 + 7	Priaxor (pyraclostrobin + fluxapyroxad)	8 fl oz	16 fl oz	7	0.5	See label for details.
Powdery mildew rust	M2	Many brands available: Kumulus DF, Microfine Sulfur, Sulfur 90W, Top Cop w/Sulfur, Yellow Jacket Wettable Sulfur	SEE INDIVIDUAL LABELS		1	1	Do not apply during periods of warm weather. Do not apply within 2 weeks of an oil spray.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
Pythium seedling blight Systemic downy mildew	4	(metalaxyl) Various brands available: Acceleron, Acquire, Allegiance, Sebring 2.65ST	3 fl oz/100 lb seed			1	Seed treatment only.
	4	Apron XL (mefenoxam)	2.2 fl oz/100 lb seed			2	Seed treatment only.
	33	(mono- and dipotassium salts of phosphorous acid) Various brands available: Confine Extra, K-phite	3 qt		0	4 hr	See label for details.
Rhizoctonia root and stalk rot diseases	11	Aftershock (fluoxastrobin)	Soil: 0.24 fl oz per 1000 ft of row	15.2 fl oz	7	0.5	Soil and foliar treatments. See label for details.
Tar spot	3 + 7 + 11	Delaro Complete (prothioconazole + fluopyram + trifloxystrobin)	8 fl oz	32 fl oz	Forage and ears: 0 Fodder: 14	0.5	Do not make more than 2 sequential applications
	3 + 7 + 11	Miravis Neo (propiconazole + pydiflumetofen + azoxystrobin)	13.7 fl oz	44.5 fl oz	14	0.5	Do not make more than 2 sequential applications.
	3 + 7 + 11	Revvytek (mefentrifluconazole + fluxapyroxad + pyraclostrobin)	15 fl oz	30 fl oz	21	0.5	See label for details.
	3 + 7 + 11	Trivapro (propiconazole + benzovindiflupyr + azoxystrobin)	13.7 fl oz	54.8 fl oz	14	0.5	Use no more than 2 sequential applications before alternating with a fungicide of dissimilar mode of action.
	3 + 11	Delaro (prothioconazole + trifloxystrobin)	8 fl oz	32 fl oz	Forage and ears: 0 Fodder: 14	0.5	Do not make more than 2 sequential applications
Various seedling diseases	1	Thiabendazole 4L ST (thiabendazole)	0.41 fl oz/80,000 kernel			0.5	
	1 + 4 + 11 + 12	Maxim Quattro (thiabendazole + mefenoxam + azoxystrobin + fludioxonil)				0.5	Seed treatment only.
	3	Difenoconazole 3L ST (difenoconazole)	1.25 fl oz/100 lb of seed			0.5	Seed treatment only.
	3 + 4	EverGol Energy (metalaxyl + prothioconazole)	2 fl oz/100 lb of seed			0.5	Seed treatment only.
	4 + 14 + NC	System 3 (mefenoxam + PCNB + <i>Bacillus subtilis</i> GB03)	3 oz/bu of seed			1	Seed treatment only.

Pertinent Diseases or Pathogens	Fungicide Group ¹	Chemical (Active Ingredients)	Max Rate/Acre		Min. Days to		Remarks ²
			Appl.	Season	Harvest	Reentry	
	7	Kernel Guard Supreme (carboxin + permethrin)				0.5	Seed treatment only.
	11	Stamina (pyraclostrobin)	1.6 fl oz/100 lb of seed				Seed treatment only.
	12	(fludioxonil) Various brands available: Dyna-Shield, Maxim 4FS, Spirato 480 FS	0.16 fl oz/100 lb of seed			0.5	Seed treatment only.
	14	Rizolex (tolclofos-methyl)	0.3 fl oz/100 lb of seed			0.5	Seed treatment only.

¹ FRAC code (fungicide group): Number (1 through 46) and letters (U and P) are used to distinguish the fungicide mode of action groups. All fungicides within the same group (with same number or letter) indicate the same active ingredient or similar mode of action. This information must be considered for the fungicide resistance management decisions. U = unknown, or a mode of action that has not been classified yet and is typically associated with another number; P = host plant defense inducers. Source: FRAC Code List 2022 <http://www.frac.info/> (FRAC = Fungicide Resistance Action Committee).

² Information provided in this table applies only to Florida. Be sure to read a current product label before applying any chemical. The use of brand names and any mention or listing of commercial products or services in the publication does not imply endorsement by UF/IFAS Extension nor discrimination against similar products or services not mentioned.

Table 7. Nonfumigant nematicides for sweet corn in Florida. Contact: Johan Desaegeer, UF/IFAS Gulf Coast Research and Education Center.

Product	Broadcast or Overall Rates		Row Rates	
	Per Acre	Per 1000 sq ft	Per Acre, 36" Row Spacing	Per 1000 ft of Row, Any Row Spacing
Counter 15G (terbufos)*	---	---	5.4–7.3 lb	6.0–8.0 oz
Mocap 15G (ethoprophos)**	40 lb	0.9 lb	10.8–14.8 lb	0.75–1.0 lb
Velum (fluopyram)	Apply 6.5–6.8 fl oz/acre either by in-furrow spray during planting directed on or below seed, or by chemigation into root zone through low-pressure drip or trickle irrigation. Do not apply more than 6.84 fl oz of Velum (0.446 lb of fluopyram) per acre per year, regardless of formulation or method of application (soil or foliar). Do not apply Velum within 14 days of harvest. Do not allow livestock to graze treated area for 14 days, and do not harvest for food or feed within 14 days of application.			
*Apply banded or in the row not to exceed 8.7 lb/A.				
**Do not allow Mocap to come in contact with seed. Apply as a 12 to 15 inch band treatment, incorporating Mocap product according to label instructions.				
These products are not as consistently effective against root-knot nematodes as the fumigants but are registered as indicated.				

Table 8. Fumigant nematicides for sweet corn in Florida. Contact: Johan Desaegeer, UF/IFAS Gulf Coast Research and Education Center.

Nematicide	Broadcast Application ¹		In-the-Row Applications
	Gallons or lb per Acre	fl oz/1000 ft/chisel spaced 12" apart	
Telone II ^{2,3}	9 to 12 gal	26 to 35	For any row spacing, application rates given may be concentrated in the row but shall never exceed the labeled maximum for broadcast applications. Consult the product label for additional detail.
Telone C-17 ^{2,3}	10.8 to 17.1 gal	31.8 to 50.2	For any row spacing, application rates given may be concentrated in the row but shall never exceed the labeled maximum for broadcast applications. Consult the product label for additional detail.
Telone C-35 ^{2,3}	13 to 20.5 gal	38 to 60	For any row spacing, application rates given may be concentrated in the row but shall never exceed labeled maximum for broadcast applications. Consult the product label for additional detail.
Pic-Clor 60	19 to 31.5 gal	57 to 90	For any row spacing, application rates should never exceed the labeled maximum for broadcast applications. Consult the product label for additional detail.
Vapam HL	75 gal	-	For drip or in-row chisel fumigation, consult product label for proportionately reduced overall rates, drip concentration, and flow-modifying directions and procedures.
KPam HL	60 gal	-	For drip or in-row chisel fumigation, consult product label for proportionately reduced overall rates, drip concentration, and flow-modifying directions.
Allyl isothiocyanate (AITC) Dominus	40 gal	-	For drip or in-row fumigation and crop termination, consult product label for proportionately reduced overall rates, drip concentration, and flow-modifying directions

¹ Gallons/acre and fl oz/1000 feet provided only for mineral soils. Higher rates may be possible for heavier-textured (loam, silt, clay) or highly organic soils.

² All of the fumigants mentioned are for retail sale and use only by state certified applicators or persons under their direct supervision. New supplemental labeling for the Telone products must be in the hands of the user at the time of application. See new label details for additional use restrictions based on soil characteristics, buffer zones, Fumigant Management Plans (FMP), requirements for Personal Protective Equipment (PPE), mandatory good agricultural practices (GAPs), product and applicator training certification, and other rate-modifying recommendations.

³ Higher application rates are possible in the presence of cyst-forming nematodes.

Rates are believed to be correct for products named and similar products of other brand names when applied to mineral soils. Higher rates are required for muck (organic) soils. However, the **grower** has the final responsibility to see that each product is used legally; **read the label** of the product to be sure that you are using it properly.