

2023 Relative efficacy of fungicides for control of diseases of pepper in North Carolina

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++++ Excellent; +++ Good; ++ Fair; + Poor; - Not effective OR no data available

Active ingredient	Trade name	FRAC group ¹	PHI (Days)	Anthraco-nose of fruit	Bacterial spot	Phytophthora blight (root and crown)	Phytophthora blight (fruit and foliage)	Pythium damping off	Southern blight
azoxystrobin	Quadris	11	0	+++	-	-	-	-	-
azoxystrobin + difenoconazole	Quadris Top	11 + 3	0	+++	-	-	-	-	-
azoxystrobin + flutriafol	Topguard	11 + 3	0	++	-	-	-	-	++
difenoconazole + benzovindiflupyr	Aprovia Top	7 + 3	0	+++	-	-	-	-	+
difenoconazole + cyprodinil	Inspire Super	3 + 9	0	++	-	-	-	-	-
famoxadone + cymoxanil	Tanos	11 + 27	3	+	-	-	+	-	-
fluopyram + trifloxystrobin	Luna Sensation	7 + 11	3	++	-	-	-	-	-
pyraclostrobin	Cabrio	11	0	++++	-	-	-	-	-
pyraclostrobin + fluxapyroxad	Priaxor	11 + 7	0	+++	-	-	-	-	+++
PCNB	Blocker	14	At plant	-	-	-	-	-	+++
penthiopyrad	Fontelis	7	0	++	-	-	-	-	+++
chlorothalonil	(various)	M	3	+	-	-	+	-	-
cyazofamid	Ranman	21	0	-	-	+++ ^R	++++	-	-
ethaboxam	Elumin	22	2	-	-	+++	+++	-	-
dimethomorph	Acrobat, Forum	40	4	-	-	-	+	-	-
dimethomorph + ametoctradin	Zampro	40 + 45	4	-	-	+++	++++	-	-
fluopicolide ³	Presidio	43	2	-	-	+++ ^R	++++	-	-
mandipropamid	Revus	40	1	-	-	+++	++++	-	-
mefenoxam ²	Ridomil Gold SL, Ultra Flourish	4	7	-	-	++++ ^R	-	++++	-
mefenoxam + copper	Ridomil Gold Copper	4 + M	7	+	++ ^R	-	++++ ^R	-	-
oxathiapiprolin + chlorothalonil	Orondis Opti	49 + M	0	-	-	+++	++++	-	-
oxathiapiprolin + mefenoxam	Orondis Gold 200	49 + 4	0	-	-	++++	+++	-	-
oxathiapiprolin + mandipropamid	Orondis Ultra	49 + 40	0	-	-	-	++++	-	-
propamocarb	Previcur Flex	28	5	-	-	-	-	++++	-
pydiflumetofen + fludioxonil	Miravis Prime	7+11	0	-	-	-	-	-	-
<i>Bacillus mycooides</i> J	LifeGard WG	P6	0	-	++	-	-	-	-
<i>Bacillus thuringiensis</i> subsp. <i>kurstaki</i> strain ABTS-351 + methyl salicylate	LEAP ES	NA	NA	-	++	-	-	-	-
fixed copper	(various)	M	Check label	+	+++ ^{R,4}	-	++	-	-
mancozeb	(various)	M	5	++	+ ⁴	+	+	-	-
streptomycin sulfate ⁵	(various)	25	Not for field use	-	+++ ^R	-	-	-	-

¹ Fungicides are separated into groups according to their mode of action and risk of resistance development. Numbers distinguish the different fungicide groups; whereas letters refer to multi-site activity.

² *P. capsici* becomes resistant to mefenoxam quickly. Ridomil Gold may be applied to pepper at transplanting, but it is NOT registered for control of Phytophthora blight; the foliar blight phase of Phytophthora cannot be controlled with foliar applications of Ridomil Gold.

³ Presidio should always be tank mixed with a protectant (i.e. copper) to reduce the risk of fungicide resistance.

⁴ Copper tank-mixed with mancozeb enhances efficacy against bacterial spot.

⁵ Streptomycin may be used on transplants but is NOT registered for field use.

^R Resistance to this pesticide has been detected in the pathogen population.