

Corn Early-Season Symptoms and Causes

Symptomology	Possible Causes	Germination	Emergence	Early vegetative stages	Late vegetative stages
Seed missing	Rodents, planter errors, blackbirds				
Seed did not germinate	Poor seed-to-soil contact, insects, too much rain (lack of oxygen), lack of moisture, seed decay from fungi, fertilizer burn, chilling injury	→			
Germinated but did not emerge	Crusting, insects, fertilizer injury, seedling blights, too much rain (lack of oxygen)	→			
Corkscrew shaped coleoptile	Prolonged cold soil temperatures, crusting, compaction	→			
Leaves unfurling underground	Crusting, cloddy seedbed, herbicide damage, poor seed-to-soil contact	→	→		
Hollow seed/hole	Wireworms, seedcorn maggots	→	→	→	
Plants cut off	Cutworms, wireworms	→	→	→	
Black or brown root tips	Insects, diseases, anhydrous burn, fertilizer burn	→	→	→	
No root hairs	Insects (white grub, grape colaspis, garden symphylans), herbicide injury, lack of oxygen, diseases	→	→	→	→
Buggy whipping	Low pH-induced Ca deficiency, herbicide damage, cold temperatures followed by rapid increase in temperatures, frost	→	→	→	→
Leaf striping	Nutrient deficiency, insects, diseases, lack of oxygen in the soil	→	→	→	→
Uneven stands	Soil types, seed depth, compaction, cloddy seedbed, soil worked wet, dry	→	→	→	→
Purple corn or purple stalks	Cold, wet soil temperatures, insects, diseases, herbicide injury, P deficiency	→	→	→	→
Yellow corn	N deficiency, cold soils, cold air temp., herbicide injury, diseases, insects, compaction, wet soils, fertilizer injury	→	→	→	→