

May 2025

Neopestalotiopsis: A Fungal Threat Facing Arkansas Strawberry Farms

Strawberry growers across Arkansas are contending with a severe resurgence of Neopestalotiopsis (Neo-P), a fungal disease that is spreading more aggressively this season than in past years. First identified in Florida in 2018 and appearing sporadically in Arkansas since 2020, the disease has now reached new levels of impact across multiple counties. In 2025, the scope and severity of the spread have been markedly worse, with more farms affected and greater overall crop loss, than in previous outbreaks.

What is Neo-P?

Neo-P is a fungal pathogen that causes leaf spots, crown rot and fruit decay in strawberries. It typically begins with tan or brown lesions on the leaves and progresses to include grayish fungal growth, fruit rot and the eventual collapse of the plant's crown. These symptoms can spread rapidly under warm, wet and humid conditions, especially when leaf surfaces remain wet for extended periods.

It's possible that once present, the fungus may linger in soil and plant debris, leading to management challenges in subsequent seasons. Arkansas's strawberry season overlaps with ideal environmental conditions for the disease, making the state's growers especially vulnerable to Neo-P.

How It's Spreading

The 2025 increase in Neo-P cases marks a noticeable shift from its more sporadic appearances in Arkansas in previous years. This year's broader spread may be connected to environmental conditions during plug plant propagation, particularly in regions like Canada and parts of the eastern United States (U.S.), where cooler and wetter climates can support fungal development. In Arkansas, plug plants have generally been more impacted than bare-root plants, which some farmers source from the western U.S. While plug plants remain popular due to their ease of use and strong early growth, they can carry a higher risk of Neo-P disease due to this disease primarily arising in the plug production pipeline. It's important to note that most nurseries



*Photo courtesy of the University of Arkansas
Division of Agriculture*

acted responsibly, informing growers about potential issues and offering refunds or credits. However, many growers chose to plant with a high load of Neo-P, contributing to this year's unusually widespread outbreak.

Arkansas currently lacks commercial-scale production of strawberry plug plants, so most farms rely on out-of-state and international sources, making it difficult to fully control disease entry points.

Impact on Arkansas Farms

The impact of Neo-P on Arkansas strawberry production has been severe, particularly for small and mid-sized farms that rely on farmers markets, u-pick operations, and direct-to-consumer sales. Concerns over infected plug plants led some growers to forgo planting altogether, leading to a decline in overall production compared to previous years. Among those who planted, disease pressure has varied widely with reported losses ranging from 10% to 50%, and one farm experiencing total crop failure just before harvest. Forecasted rainfall is expected to worsen conditions, potentially driving losses even higher. As a result, the 2025 strawberry season may end earlier than usual. For many growers with a narrow harvest window, these setbacks represent a significant financial hit, especially for those who rely on strawberries as a key part of their operation.



*Photo courtesy of the University of Arkansas
Division of Agriculture*

Disease Management

Farmers have done an outstanding job managing the disease since it was first spotted back in the fall. At that time farmers began integrating cultural control tactics including destruction of all overly sick plants, practicing strict sanitary practices to keep the disease from spreading and began strict regiments of fungicide applications that were known to suppress Neo-P. Moving into the spring, continued management included removal of damaged leaves, the culling of damaged or diseased plants, and preventative fungicide applications. One bright spot is that with strong spray programs, the commonly planted Ruby June variety has experienced less loss than was anticipated.

Looking Ahead

The 2025 outbreak of Neo-P marks the most severe resurgence Arkansas strawberry growers have faced since the disease first appeared in the state. In response, researchers are conducting ongoing field trials to better understand the fungus, evaluate treatment options and are working to identify plant varieties that may be less susceptible. These studies will help guide long-term strategies to reduce risk and improve disease resilience in future planting seasons.

Arkansas is home to approximately eighty farms growing strawberries across 128 acres. For these producers, many of whom are small to mid-sized operations, the impact of Neo-P is not only a threat to their crop but also to their livelihoods and the rural communities they support. The economic ripple effect from reduced yields and early harvest closures may be felt by local farmers markets, agritourism operations and supply chains that rely on seasonal strawberry production. Many growers are already facing high input costs, labor shortages, and tightening margins, making this outbreak especially difficult and lessening the overall profitability of the season.

It is important to note that Neo-P poses no health concerns for human consumption. While the disease affects the

appearance and yield of strawberry crops, it does not impact the safety of the fruit. Consumers can continue to enjoy Arkansas-grown strawberries with confidence.

However, due to the shortened harvest window caused by widespread losses and worsening weather conditions, Arkansans who want to support local growers and enjoy fresh berries are encouraged to purchase early this season. With the harvest expected to end sooner than usual, early demand may be key in helping farmers recoup a portion of their losses.

Growers are advised to stay connected with their local Cooperative Extension Service for updates and recommendations as new information becomes available. While the current season presents significant challenges, the research and response efforts now underway offer hope for stronger disease management in the years ahead.



Analysis by John McMinn.

For more information, contact:

John at (501) 228-1267, john.mcminn@arfb.com or