Target Spot Widespread In Burley Float Beds

LEXINGTON, KY.

The recent wet weather resulted in many cases of target spot on young burley tobacco plants in greenhouses across the state. With more wet conditions in the forecast, growers need to watch their seedlings closely for any sign of the disease in order to manage it if it does develop, said Kenny Seebold, plant pathologist in the University of Kentucky College of Agriculture.

"In terms of severity and how widespread it is, this is the worst case of target spot I've seen since I came here in 2005," he said. "Every year, we usually have some target spot, but this year we're finding it in nearly every float bed we visit."

Seebold said the spike in target spot is likely due to the large amount of rain the state has received in recent weeks. The fungal disease favors cool-to-warm temperatures and humid or damp conditions for development and is closely related to damping off.

Target spot forms lesions on the plant leaf, which can lead to defoliation, slow maturity, damping off and in some cases plant death. Usually the lesions are green when they first appear on leaves but can become brown and brittle if not treated.

Target spot can overwinter in old trays that were reused without being properly sanitized. However, the recent wet weather has exacerbated the spread of the disease to greenhouses with proper sanitation practices or which are using new trays.

The wet weather has kept many growers from setting their first plants, resulting in many plants staying in the greenhouse longer. The longer the plants stay in the greenhouse, the more susceptible they are to the disease, especially if it turns wet again.

"If we do have a delay in setting, it could make things worse," Seebold said. "The plants will be sitting ducks for disease development."

If the disease is found, burley growers should try to control the disease in the greenhouse using a fungicide that contains the ingredient mancozeb.

To keep the disease from occurring, burley growers should keep their seedlings as dry as possible by utilizing ventilation in the greenhouse and checking water levels in float beds to maximize air flow. Regularly clipping plants also will improve ventilation, but growers should remove debris so other diseases such as blackleg and collar rot do not occur later in the season.

Many growers tend to lower nitrogen levels in plants they are getting ready to plant, but keeping nitrogen levels up can help keep target spot away or at least lessen its affects. Target spot tends to be worse in plants with low nitrogen levels.

There's no way to ensure that target spot will not be carried to the fields from the greenhouse and appear later in the season, especially if it was present this spring in float beds. Producers should continue to monitor plants throughout the growing season for target spot, especially if planting in an area with high humidity or if target spot was present in the greenhouse. Target spot found later in the growing season can result in significant yield losses. To control the disease later in the season, use an application of Quadris when the plants are in the layby stage. Δ