CULTURE REPORT

Cyclamen Magnia Series

Cultivate high-quality cyclamen in the heat.

BY BART KUIJER

any times, cyclamen grown at temperatures greater than 86° F result in a poor plant quality. The original *Cyclamen persicum* grows in the mountains of Turkey and the nearby countries. Those plants flower naturally in early winter until spring. During that period, night temperatures are low (32 to 50° F). In the summertime, it is hot (77 to 95° F) and the plants survive with only the corm under the ground or with very few leaves only.

BACKGROUND INFORMATION

It is quite common that the cyclamen we grow during hot periods will have a few big leaves and flower buds only. When a cooler period starts, the plants develop more leaves and flower buds. But the plant shape remains poor by the very large leaves developed during the hot period.

Those large leaves are caused by our traditional system of fertilizer and irrigation. We have the fear that in hot periods cyclamen will grow too big and too weak (uncontrolled). In many cases, the composition of the fertilizer is based on low nitrogen (N), average phosphorus (P) and high potassium (K). The good news is that modern F1 hybrids, like the Magnia series, can be controlled much better during hot weather conditions.

With this in mind, growers have the challenge to let the Magnia series grow with a nice plant shape in hot periods and have them full flowering just after these periods. Below, you will find some information to take on this challenge.

PRODUCTION GUIDELINES

For production of the Magnia series, it is recommended to use a fertilizer composition of N-P-K at 1-0.25-1.5. That is a little more nitrogen and a little less phosphorus than usual. The result of this composition is the cyclamen develops more young leaves at an early stage. When the plant contains more leaves, they will remain smaller in size because the fertilizer will spread to all leaves. In a later stage of the plant growth you can change to a fertilizer composition with more potassium (N-P-K = 1-0.25-2 or 1-0.25-3) depending on the desired compactness of the plant.

In the heat, cyclamen grow slower compared to cooler climate circumstances. So you should automatically synchronize the EC level of the fertilizer with the temperatures during the



cultivation. The ideal temperature for the growth of Magnia is 60 to 64° F. At temperatures higher than 82° F, cyclamen will not grow, and at temperatures above 95° F, the plant cells will even die. So Magnia does not require any fertilizer with temperatures above 95° F and less fertilizer during the time of day with temperatures between 82 and 95° F.

In cooler climates, you can easily fertilize the plants from 1.5 EC at the start to 2.5 EC at the end of cultivation. You bring down the EC when the period of the day with temperatures above 82° F becomes longer. The table below shows how you can handle this. The EC levels are based on rain water with EC 0.1.

T-period > 82° F	T-period > 95° F	EC level
0 hours	0 hours	1.5–1.8
6 hours	0 hours	1.2–1.5
10 hours	4 hours	1.0–1.2

Cyclamen fertilizer level for generative growth.

T-period > 82° F	T-period > 95° F	EC level
0 hours	0 hours	2.0–2.5
6 hours	0 hours	1.6–2.0
10 hours	4 hours	1.3–1.6

These are general guidelines and may vary depending on your circumstances. Your climate, potting soil and cultivation influence the protocol on how to handle cyclamen in hot periods.

A little more nitrogen creates more leaves in the cyclamen plants which results in a better plant habit. Heat reduces the growth in cyclamen plants and reduction of fertilizer is recommendable. Too much reduction of fertilizer will delay the speed of your cultivation. GPD

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