Kornegay – Planting Guide

At Kornegay Design our planters are manufactured using cast concrete, a time-honored, durable material. They are designed and manufactured for high-traffic areas, harsh environments, and to last forever. Their ability to "last forever," however, does not preclude the possibility that they may develop cracks.

PROPERTIES OF CONCRETE

Concrete is the most used building material in the world. Yet, as any experienced structural engineer or architect will tell you, "Concrete cracks." While we have never seen a Kornegay Design planter lose its structural integrity, we have seen them crack. There are best practices you can follow to make it less likely that a concrete planter will develop cracks.

MAINTAINING A KORNEGAY DESIGN CONCRETE PLANTER

Proper care of your concrete planters starts with three vital elements:

- Suitable potting mix (growing medium)
- Proper drainage
- Routine monitoring of the moisture level of the planting mix

Planters develop cracks due to one or more of the following:

- Incorrect potting medium
- Overwatering
- Poor drainage

Each of these problems leads to a primary cause of cracking: the expansion of materials inside the planter. This pressure exerted from the interior results in cracks that begin at the rim.

The three elements discussed here are important in preventing cracks in all concrete planters, and they are also crucial to increasing the health and lifespan of the planted material.

GROWING MEDIUM

Choosing the correct planting medium depends on many factors including geographical location, microclimate, installation type, and specified plantings.

Soil taken directly from the ground should never be used, even when the composition includes mulch, sand, or other soil enhancements. Use of soils, especially those with clay, known as expansive soils, will always lead to concrete cracking. Even good garden soil or bagged topsoil will lead to soil compaction, inadequate aeration, porosity, and drainage.

Characteristics of suitable growing medium:

- Soil that is well drained
- Soil that does not compact easily
- Soil that contains nutrients/organic matter which improves soil drainage and soil health and supports plant health and viability
- Soil that has a pH level which supports the plant material being specified

Finally, a good growing medium in planters should be porous to ensure roots receive both water and air and provide adequate nutrients; these traits will also increase the lifespan of the plant material. Planting mix with a large percentage of soilless material generally offers the best long-term container planting outcome.

PROPER DRAINAGE

The ability of the planting mix to properly drain is dependent on the composition of the planting mix. Too much moisture can lead to root rot, chlorosis (yellowing of leaves), wilting, limited growth, possible plant death and can decrease the structural integrity of the planter. In the past it was thought that proper drainage is achieved through the addition of a layer of gravel placed at the bottom of the planter, followed by the placement of filter fabric; however, experienced planters no longer rely on this solution, since the gravel does nothing to increase drainage out of poorly aerated soil that fills three quarters of the container.

Note: containers without drainage holes need conditions in which the potting mix does not become saturated at the base of the container. A workable option in planters without drainage holes may be to utilize double container planting. Some clients find this useful for plantings of seasonal flowers that need more water and are planted in large, deep containers.

SUITABLE WATERING

Different seasons, lighting, soil types, climatic conditions, specified plantings, and plant locations all influence the irrigation regime. The landscape architect or designer should consult with a specialist on irrigation methods. Exact specifications for watering cannot be provided because of the factors and conditions listed above.

EXTERIOR IRRIGATION

For exterior use, an automatic irrigation system is suggested but not always needed. An automatic irrigation system may simplify the irrigation process and ensure the proper amount of water is being supplied, but only if it is monitored often. Frequently it is these unmonitored systems that are most at fault in causing problems.

RESOURCES

For further information on growing medium, drainage and watering, we recommend the following resources:

- USDA
- Local Soil Testing Labs
- Local Nurseries and Garden Centers
- Local University Extension Services (some have programs that can perform soil tests)