



Unilock® Technical Reference

Topic: Deicing Chemicals

What deicing chemicals does Unilock suggest using?

Preferred: **Sodium Chloride (NaCl)** for temperatures down to +20°F (-7°C). Sodium Chloride is commonly known as rock salt.

Only when necessary: **Calcium Chloride (CaCl₂)** can be used for temperature ranges from below +20°F (-7°C) to -2°F (-19°C).

Are there any recommendations for using deicing products?

Follow the directions listed on the deicing product bag. In addition, practice these simple recommendations:

- Use sparingly. Only apply the minimum amount necessary to melt the snow and ice. Over applying the product can still result in damage to concrete.
- Sweep and remove any excess deicing chemical after the ice and snow melts.
- After the winter season, thoroughly wash the paver surface to remove any excess deicing chemical remaining.

Can other types of deicing products be used?

We do not recommend using any other types of deicing chemicals. This includes:

- Magnesium Chloride (MgCl₂)
- Calcium Magnesium Acetate (CMA)
- Potassium Chloride (KCl)
- Potassium Acetate (KA)
- Fertilizers containing Ammonium Nitrate and Ammonium Sulfate

The deicing product isn't Sodium Chloride or Calcium Chloride, but the product label says it's safe for concrete. Can this product be used on concrete pavers?

We recommend against using any products other than Sodium Chloride and Calcium Chloride. Our research has found some of the products listed as safe for concrete were incorrect or false and still caused damage to concrete and concrete pavers.

Will Sodium Chloride and Calcium Chloride damage plant material?

Yes, if not used sparingly. Using less of these products will reduce damage to plants.

Other types of deicing chemicals have been used on ready mix concrete sidewalks without damaging the surface. Is this because concrete pavers are not as strong?

Damage may not have occurred because the deicing chemical was applied sparingly or perhaps the damage is not yet visible. All concrete materials are susceptible to damage from deicing chemicals no matter how the concrete product is produced. Generally speaking, concrete pavers are two to three times stronger than pour-in-place ready mix type concrete in terms of pounds per square inch strength and have lower absorption rates.