

Congratulations on Your Investment! Read the following BEFORE USING YOUR SHELVES

Safety Information

2 Important warnings and 4 guidelines to protect you against SEVERE INJURY...

1. All silicon carbide and silicon nitride shelves conduct electricity. When using these shelves in an electric kiln, avoid a serious electrical shock by following these guidelines:
 - ✓ Be sure your kiln is off before loading and unloading shelves and ware.
 - ✓ Keep your hands out of the kiln when it is on.
 - ✓ Repair elements which have sprung out of their slots (following your kiln manufacturer's directions) so they don't touch the shelf during firing
 - ✓ Leave adequate clearance between shelf and kiln wall so elements and shelves don't make contact
2. Do not immerse shelves in water. Do not store in an area which will be flooded (by weather or mopping). Do not rinse with running water. Isolated incidents reported by other manufacturers about their shelves indicate that shelves subjected to prolonged wetting retain physical water (for a very long time) which converts to steam during firing and can cause deteriorating, fracturing or explosion of the shelves during firing. Force dry thoroughly before firing.

First use directions and Shelf Facts

Clean your new shelves thoroughly upon receiving them to avoid "grit contamination" during firing. Shelves abrade during shipping causing a fine, silicon carbide grit to form on the surface, edges and in the expansion slits (Some shelf sizes include expansion slits that help reduce breakage from thermal shock.). Wipe off the shelves and slide a thin blade through the expansion slits to remove any particles.

Shelves may not be completely flat. Variance of one half percent of the longest diagonal measurement of that shelf is within acceptable tolerance.

You might see a film of "white powder" on your shelves-a result of the manufacturing process it will have no negative effect on your use of the shelves.

Silicon carbide/ nitride bonded shelves are more prone to crack during abrupt thermal fluctuations than typical cordierite (Thorley) shelves. Uneven temperatures across the shelf (thermal gradients) cause thermal shock and shelf failure. This can occur on heat-up or on cool-down for a variety of reasons.

- Breakage in bottom layer of shelves in a car kiln, where the seal between car and kiln is not tight permitting cold air to rush in when the kiln is shut off.
- Using posts that are too massive .
- Direct flame impingement on shelves early in the firing.
- Overly large sight ports permitting cold air to cool off shelf areas unevenly.
- Shelves too close to damper areas causing uneven cool-down of shelves in close proximity to damper.
- Leaving damper open after firing is finished.

Silicon nitride bonded shelves only-pre-firing recommended.....Conducting a pre-firing (without ware) in a full oxidation atmosphere, with the shelves held slightly apart diminishes the chance of local reduction in subsequent firings. If you choose to skip this pre-firing or do not fully oxidize during the pre-firing you may observe dark blotching or discoloration on both the surface of the shelves and the ware they are in contact due to lack of oxygen in the firing environment during the first firing of ware.

We recommend using 3 posts only to negate any unevenness in the kilns floor and reduce long term stress which will eventually fracture the shelf. The lightweight, thin design of your silicon carbide/nitride-bonded shelves, makes using 4 posts unnecessary.

Porcelain ware might require the use of sitters or kiln wash.

Due to the high amount of flux used in porcelain clay bodies, it is not uncommon for porcelain clay bodies to stick to a silicon carbide or silicon nitride shelf surface. The higher the firing temperature is, the greater the opportunity for the flux to interact with the oxide glass layer of the shelf. Pieces with trimmed foot rings supporting larger pieces, like bowls, tend to stick more tenaciously than broad, flat bottomed pieces due to increased pressure on contact area. Laguna recommends Lees Kiln wash, available from your local Laguna distributor or www.Axner.com . Allow to dry thoroughly before firing.

For additional information contact Laguna Clay Co. at (626) 330-0631 or info [at] lagunaclay.com or Axner Pottery Supply at (800) 843-7057.