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Distribution: External

Hinge Joint Detail for Concrete Floor & Wall Junction

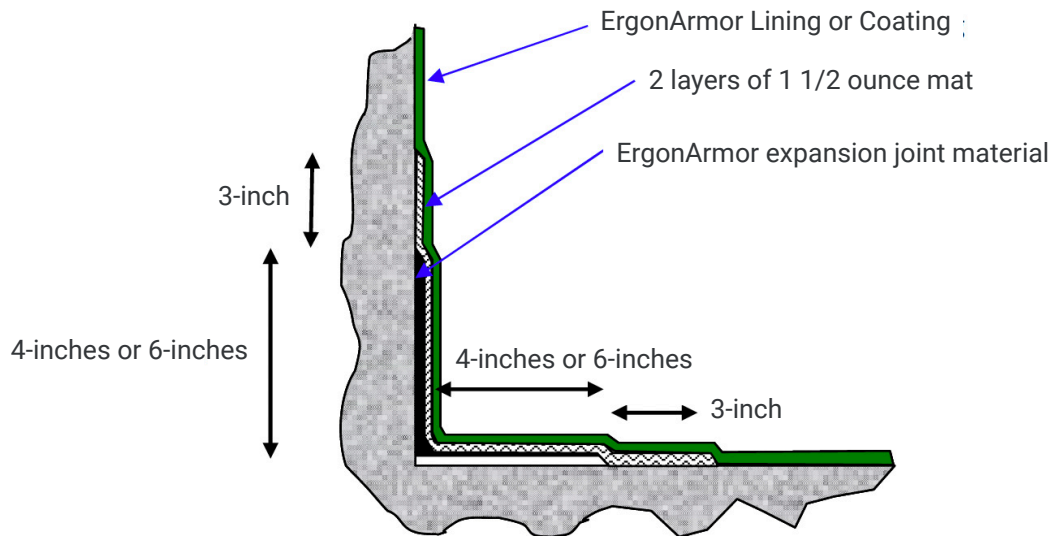
Background

Experience has shown that many internal corners of structures that need to be lined or coated for primary or secondary containment of chemical solutions and may experience movement or flexing. These can include steel or concrete walls that join to concrete floors or vessel bottoms and steel vessel bottom/wall junctions that undergo high localized strains due to hydrostatic pressure.

Solution

As a result, ErgonArmor products have designed a long term solution, referred to as a “hinge joint”. The concrete floor to wall junction is shown with procedures detailed below.

CONCRETE FLOOR TO WALL JUNCTION



1. Abrasive blast joint and concrete surface, approximately 10-inch on vertical and horizontal side.
2. Prime area with ErgonArmor VE Primer at 2 – 5 mils (WFT) for polyester or vinyl ester systems. Use ErgonArmor Novocoat SC1100 Primer/Sealer at 2 – 5 mils (WFT) for epoxy systems. Mix per data sheet instructions. Allow to cure.
3. Repair rough areas with a mixture of ErgonArmor primer and THINSET™ powder, depending on size of repair.



4. Apply ErgonArmor Novocoat EP2900 Flexible Paste with a trowel at 40 – 80 mils, 4-inch or 6-inch on either side of corner. Allow to cure. An 8-inch wide strip will accommodate 80 mils of movement and a 12-inch wide strip will accommodate 160 mils of movement.
5. Layout and saturate fiberglass mat (1 1/2 ounces) using Novocoat SC1100 Primer/Sealer for epoxy systems and PENNCHEM™ VE Primer for polyester or vinyl ester systems. Be sure to overlap both sides of the joint material at least 3-inches onto the adjacent primed concrete surface.
6. While the layer of mat is still wet, repeat with a second layer of 1 1/2-ounce mat. Remove entrapped air with a ribbed roller. No white spots should be obvious on fiberglass. Allow to cure.
7. After curing (generally the next day), grind off any imperfections or protrusions and feather edges and proceed with normal installation of the designated ErgonArmor lining, coating or flooring system.