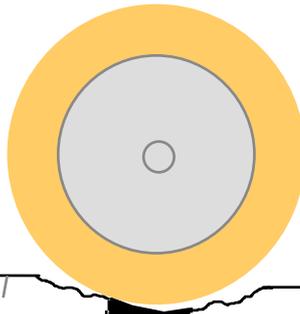


JOINT ARRIS REPAIR DETAIL - Type 3 Repair

Existing problem

Hard wheels of materials handling equipment impact against the joint edges, initially creating and then increasing the extent of the damage.



Any slight step between adjacent floor slabs will exaggerate damage to the joint edges, or arrisses. Wheels, tyres and bearings all suffer damage due to the impacts endured as they travel across joints.

Existing joint sealant is typically too soft, compressed or de-bonded from the floor slab edges.

Wide joints suffer the most damage.

Joint sealant should be hard enough to withstand the impact loads from wheeled traffic and yet be flexible enough to allow movement in the floor slabs.

Proposed repair

A 35mm deep saw cut is made around the perimeter of the proposed repair. i.e. No feather-edge to the repair mortar

The repair and adjacent floor surface will be ground smooth to ensure a smooth transition for wheeled traffic.

New 5mm wide joint width is fully filled with a suitable joint sealant ('Shore A' hardness of 65 - 80)

Repair depth to be a minimum of 35mm.

All surfaces of the joint cavity are primed, with an epoxy bonding agent, prior to filling with the repair mortar.

The repair mortar replaces the damaged corners of the concrete floor slabs

Typical repair width of 100 to 120mm, determined by extent of existing edge damage.

The min. 20mm deep joint sealant is given additional support from a polyethylene backing bead that is inserted into a 5mm wide saw cut through the cured repair mortar. Alternatively a 'cast in place' polystyrene joint former can be used, in lieu of the backing bead and saw cut.

Joint repair base to be roughly scabbled to provide a good mechanical bond between the floor and the repair materials.

Any existing joint material can be retained beneath the repair.