

3 mm Multilayer Epoxy Flooring System

When the floor needs levelling before it needs finishing.

Supply and apply a 3 mm multilayer epoxy flooring system using [MR. JO Eco Underlay](#) and [MR. JO Eco Floor](#), comprising a 2 mm flowable epoxy underlay and a 1 mm self-levelling epoxy flooring, to provide improved substrate correction together with a durable seamless industrial floor finish.

The system separates two jobs a single layer cannot do well at once: the 2 mm flowable underlay restores level and produces a smooth, sound base, and the 1 mm self-levelling layer then delivers the finished surface. Specified on old floors worn hollow under wheel tracks, patched unevenly or dished around drains and machine bases, where a coating alone would simply make the unevenness glossy.

Standard Bill of Materials

Items 1-6 are the standard build-up; items 7 and 8 are specified where required. Clause references are set out in full on page 2.

#	Work Item	Description	MR. JO Product	UOM	Ref
1	Surface Preparation	Mechanically prepare to a clean, sound substrate; remove existing coatings and contamination.	Grinding / scarifying / shot blasting	Sq.m	A1 - A4
2	Concrete Repairs	Repair cracks, pits, honeycombs and spalled edges flush with the surrounding concrete.	MR. JO Tecseal - CRP	Kg	B1, B2
3	Crack Injection (where required)	Pressure-inject structural cracks; finish the repaired surface flush.	MR. JO Inject - LVC	Kg	B3.1 - B3.4
4	Primer	Seal the substrate and establish the bond; P50i on dry concrete, UPS where damp.	MR. JO Eco Primer - P50i / MR. JO Primer - UPS	Sq.m	C1, C2
5	Flowable Epoxy Underlay	2 mm flowable epoxy underlay restoring floor levels and producing a smooth, sound base.	MR. JO Eco Underlay	Sq.m	D1
6	Self-Levelling Flooring	1 mm self-levelling epoxy laid over the underlay as the seamless finished floor.	MR. JO Eco Floor	Sq.m	E3
7	Epoxy Coving (where specified)	25 / 50 / 75 mm seamless coving removing the floor-to-wall junction.	MR. JO Eco Underlay (tampable)	Rmt	F3.1 - F3.3
8	Line Marking (optional)	50 / 75 / 100 mm demarcation lines for aisles, traffic routes and zones.	MR. JO Floorkot - YLW	Rmt	F4.1 - F4.3

MR. JO Insight

The underlay is a levelling layer, not a rebuilding layer - MR. JO Eco Underlay corrects levels up to approximately 2 mm. Where the concrete itself must be rebuilt, specify a 5 mm tappable epoxy screed and move to the heavy duty system.

Typical Uses

Sector	Where This Floor Is Specified
Old Industrial Floors	Worn, patched or uneven slabs being brought back into service
Floors Requiring Levelling	Areas dished around drains, machine bases and wheel tracks
Moderate Traffic Areas	Production and handling areas under pedestrian and light vehicle traffic

Reference - Standard BOQ Clauses

Full clause text from the MR. JO Standard BOQ Clause Library, for direct use in a project Bill of Quantities or tender specification.

A - Surface Preparation — Select one clause based on the actual condition of the existing floor.

Ref	Typical Condition / Application	BOQ Description	UOM
A1	Sound concrete requiring normal preparation	Mechanically prepare the concrete substrate by diamond grinding to remove laitance, weak concrete and surface contamination, producing a clean, sound and open textured surface suitable for receiving the specified epoxy primer and flooring system. The prepared surface shall be cleaned and made ready to receive further epoxy treatment.	Sq.m
A2	Weak concrete requiring aggressive profiling	Mechanically prepare the concrete substrate by captive shot blasting or equivalent approved mechanical method to remove weak concrete, laitance and contaminants, producing a clean, sound and uniformly textured surface suitable for receiving the specified epoxy primer and flooring system.	Sq.m
A3	Existing floor having heavy contamination or existing coatings	Mechanically prepare the concrete substrate using suitable grinding, scarifying or other approved mechanical methods necessary to remove existing coatings, oil contamination and weak concrete to expose a sound substrate suitable for receiving the specified epoxy flooring system.	Sq.m

Ref	Typical Condition / Application	BOQ Description	UOM
A4	Where acid etching is specifically approved	Prepare the concrete surface by acid etching using a suitable acid solution followed by washing and neutralisation where required to produce a clean concrete surface suitable for receiving the specified epoxy primer and flooring system.	Sq.m

B - Concrete Repairs — B1 and B2 as required. B3 is the full structural crack injection sequence.

Ref	Typical Condition / Application	BOQ Description	UOM
B1	Minor cracks, pits, honeycombs and surface defects	Repair minor cracks, pits, honeycombs and surface defects using <u>MR.JO Tecseal - CRP</u> , a solvent-free epoxy repair mortar. Repairs shall be completed flush with the surrounding concrete and made ready to receive the specified primer and flooring system.	Kg
B2	Damaged edges and local spalled concrete	Repair damaged concrete edges and localised spalled areas using <u>MR.JO Tecseal - CRP</u> to restore the original profile prior to installation of the flooring system.	Kg
B3.1	Structural cracks requiring epoxy injection	Drill holes and fix injection nipples at suitable spacing along the crack to facilitate pressure injection.	Nos.
B3.2	Structural cracks requiring epoxy injection	Seal the exposed crack surface using <u>MR.JO Tecseal - CRP</u> to prevent leakage of injection resin during the injection process.	Kg
B3.3	Structural cracks requiring epoxy injection	Supply and inject <u>MR.JO Inject - LVC</u> , a low-viscosity epoxy injection resin, under pressure until complete filling of the crack is achieved.	Kg
B3.4	Structural cracks requiring epoxy injection	Remove injection nipples and finish the repaired surface flush, leaving it ready to receive the specified epoxy flooring system.	Nos.

C - Primers — Select one clause based on substrate moisture condition.

Ref	Typical Condition / Application	BOQ Description	UOM
C1	Sound, dry concrete	Supply and apply <u>MR.JO Eco Primer - P50I</u> , a two-component solvent-free epoxy primer, over the prepared concrete substrate to seal the surface, improve adhesion and provide a suitable bonding layer for the specified epoxy flooring system.	Sq.m
C2	Damp concrete where drying is impractical	Supply and apply <u>MR.JO Eco Primer UPS</u> , a solvent-free moisture-tolerant epoxy primer, over the prepared concrete substrate to provide reliable adhesion and a suitable bonding layer for the specified epoxy flooring system.	Sq.m

D - Underlays & Screeds — Mandatory item for this system.

Ref	Typical Condition / Application	BOQ Description	UOM
D1	Floor requiring levelling up to approximately 2 mm	Supply and apply <u>MR. JO Eco Underlay</u> as a 2 mm flowable epoxy underlay to restore floor levels and provide a smooth, sound substrate ready to receive the specified epoxy flooring system.	Sq.m

E - Topcoat — Mandatory item for this system.

Ref	Typical Condition / Application	BOQ Description	UOM
E3	1 mm Self Levelling Floor	Supply and apply <u>MR. JO Eco Floor</u> as a 1 mm solvent-free self-levelling epoxy flooring system over the approved primer.	Sq.m

F - Finishing & Ancillary Works — Include as specified for the project.

Ref	Typical Condition / Application	BOQ Description	UOM
F3.1	Light-duty hygienic areas	Supply and install a 25 mm x 25 mm seamless epoxy coving using <u>MR. JO Eco Underlay</u> applied at tappable consistency, integrally bonded between the floor and wall to provide a smooth, hygienic and easy-to-clean transition.	Rmt
F3.2	General industrial, food processing and pharmaceutical areas	Supply and install a 50 mm x 50 mm seamless epoxy coving using <u>MR. JO Eco Underlay</u> applied at tappable consistency, integrally bonded between the floor and wall to provide a durable, hygienic and easy-to-clean transition.	Rmt
F3.3	Heavy-duty industrial and wet processing areas	Supply and install a 75 mm x 75 mm seamless epoxy coving using <u>MR. JO Eco Underlay</u> applied at tappable consistency, integrally bonded between the floor and wall to provide a robust, impact-resistant and hygienic floor-to-wall transition.	Rmt
F4.1	Standard pedestrian walkways, equipment zones and aisle marking (50 mm wide)	Supply and apply 50 mm wide epoxy line markings using <u>MR. JO Floorkot - YLW</u> over the completed epoxy flooring system in accordance with the approved layout and manufacturer's recommendations. The completed line markings shall provide a durable, abrasion-resistant and clearly visible traffic demarcation.	Rmt
F4.2	Forklift aisles, vehicle routes and safety demarcation (75 mm wide)	Supply and apply 75 mm wide epoxy line markings using <u>MR. JO Floorkot - YLW</u> over the completed epoxy flooring system in accordance with the approved layout and manufacturer's recommendations. The completed line markings shall provide a durable and highly visible traffic guidance system.	Rmt
F4.3	Loading bays, hazardous zones and special industrial demarcation (100 mm wide)	Supply and apply 100 mm wide epoxy line markings using <u>MR. JO Floorkot - YLW</u> over the completed epoxy flooring system in accordance with the approved layout and manufacturer's recommendations. The completed line markings shall provide durable visual segregation of work areas and traffic routes.	Rmt

Specification Notes

- The nominal 3 mm assumes a 2 mm underlay plus a 1 mm flooring layer; actual underlay consumption varies with the profile of the existing floor and should be assessed on site.
- For floor rebuilding beyond 5 mm, heavy-duty loading or impact-resistant floors, consult Ask MR. JO Technical Services.
- For moving joints, active cracks, water leaking cracks or unusual structural conditions, consult Ask MR. JO Technical Services before finalising Section B.

Ask MR. JO

For help selecting a flooring system, adapting these clauses to your site conditions or developing a complete specification, ask MR. JO - we will help you choose based on what your floor is expected to do, not simply on product names, thickness or budget. Projects outside the scope of these standards should be referred to Ask MR. JO Technical Services.