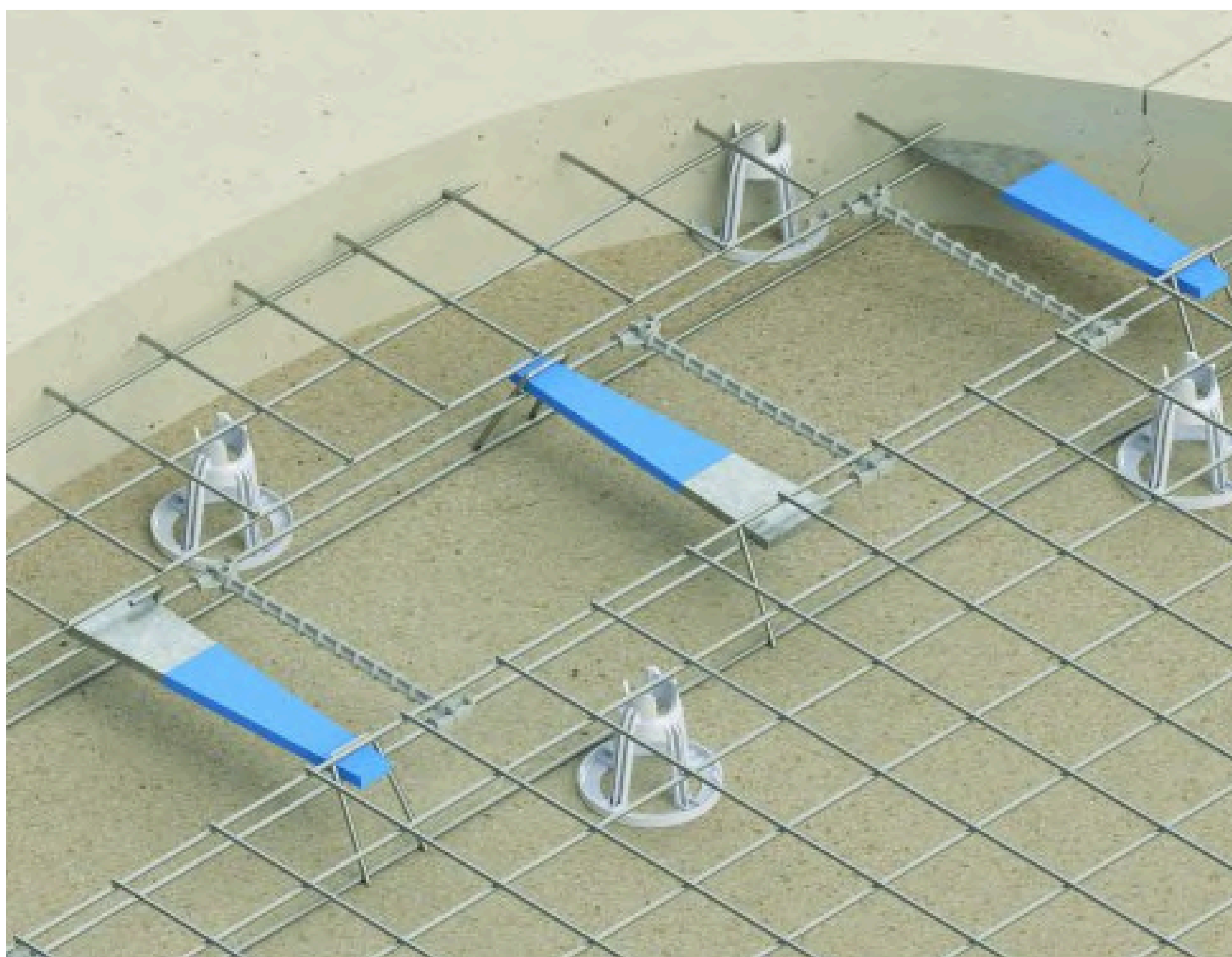
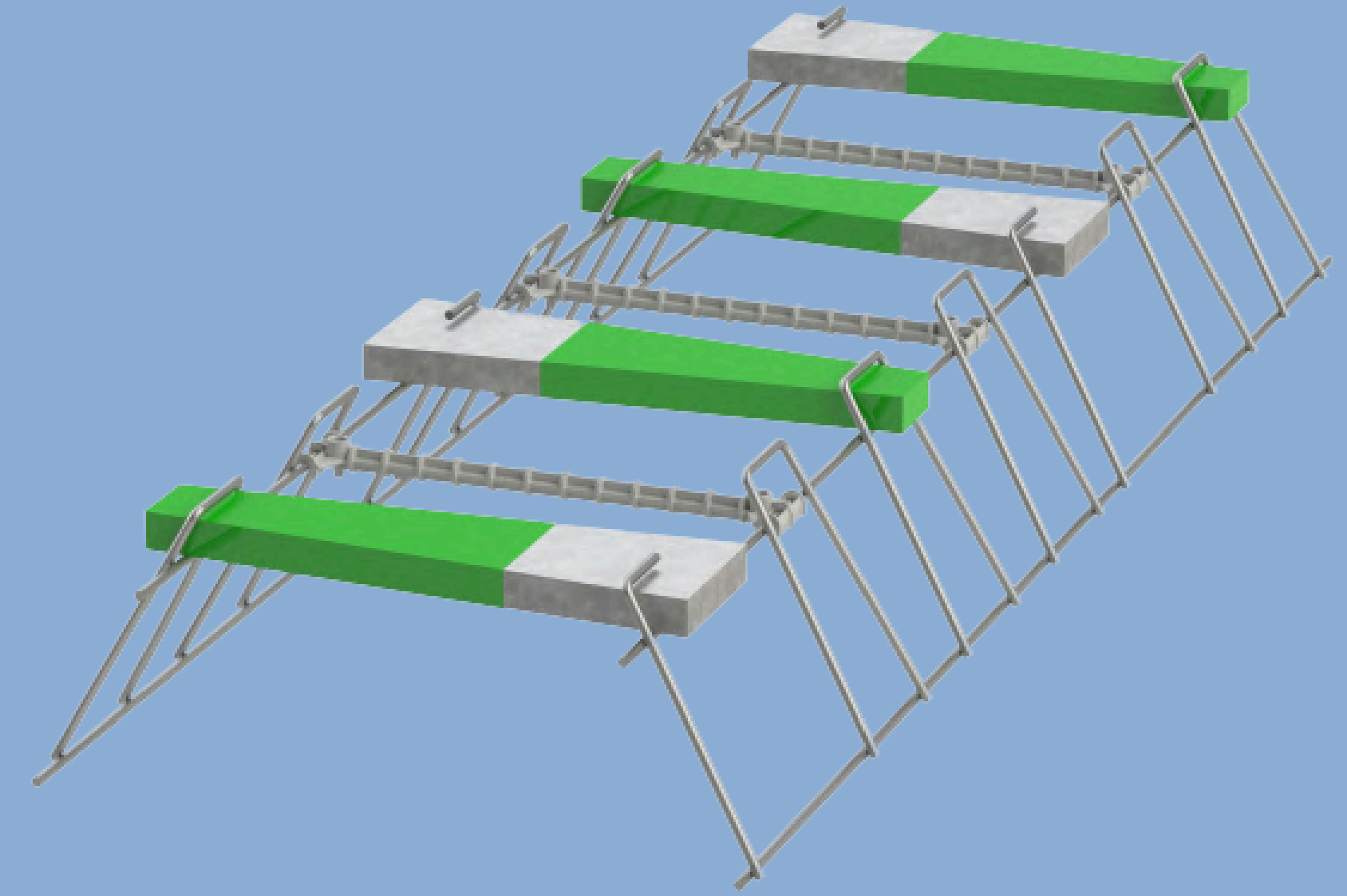


PD3™ Plate Cradle

PRODUCT DESCRIPTION

PD3™ Plate Cradle is a high-performance dowel cradle system engineered for effective load transfer across concrete contraction joints. The system features a tapered, sleeveless plate dowel for superior deflection control, bonded to a welded wire cradle for precise alignment during concrete placement. Integrated with the RynoBar™ travel bar, the cradle simplifies transport, enhances on-site efficiency, and eliminates manual removal tasks.

This cradle is designed for structural integrity, reduced joint deterioration, and faster installation in demanding slab-on-grade applications, and complies with the most stringent international performance guidelines.



FEATURES & BENEFITS

- **No Plastic Sleeves:** Allows direct steel-to-concrete contact for improved deflection performance
- **RynoBar™ Technology:** Sacrificial plastic tie yields during shrinkage without cutting, boosting safety and speed
- **Superior Load Transfer:** Optimised steel geometry and cradle alignment eliminate dowel misplacement
- **Supports Super Flat Floors (SFF):** Meets ACI 360-R10 and other high-spec flooring tolerances
- **Customisable Centres:** Available at 300mm, 400mm, or 450mm centres depending on load and slab thickness
- **Australian Manufactured:** Engineered to AS/NZS 3679.1 steel and galvanising to AS/NZS 4680
- **Improves Joint Longevity:** Minimises joint spalling, cracking, and long-term repair costs
- **Compatible With All Floor Finishes:** No risk of interference with trowelling or toppings

APPLICATIONS

- Warehouse and logistics facilities
- Cold storage or temperature-controlled slabs
- Commercial and industrial slabs
- Distribution centres and supermarkets
- Food processing facilities

PACKAGING & AVAILABILITY

| Product Code | Description |
|--------------|--|
| 122211 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 120-135mm Slab - Black |
| 109375 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 140-160mm Slab - Black |
| 109348 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 165-185mm Slab - Black |
| 116665 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 190-210mm Slab - Black |
| 122210 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 100-110mm Slab - Gal |
| 118124 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 120-135mm Slab - Gal |
| 122212 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 140-160mm Slab - Gal |
| 115316 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 165-185mm Slab - Gal |
| 122213 | Plate Cradle PD3 6mm @ 450mm Centres To Suit 190-210mm Slab - Gal |
| 109376 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 140-160mm Slab - Black |
| 109707 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 165-185mm Slab - Black |
| 124089 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 190-210mm Slab - Black |
| 122294 | Plate Cradle PD3 10mm @ 300mm Centres To Suit 165-185mm Slab - Gal |
| 128070 | Plate Cradle PD3 10mm @ 300mm Centres To Suit 190-210mm Slab - Gal |
| 122376 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 120-135mm Slab - Gal |
| 114792 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 140-160mm Slab - Gal |
| 113727 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 165-185mm Slab - Gal |
| 115048 | Plate Cradle PD3 10mm @ 450mm Centres To Suit 190-210mm Slab - Gal |
| 121436 | Plate Cradle PD3 20mm @ 300mm Centres To Suit 230-275mm Slab 1.2m Long - Gal |
| 134084 | Plate Cradle PD3 20mm @ 300mm Centres To Suit 280-330mm Slab 1.2m Long - Gal |
| 122321 | Plate Cradle PD3 20mm @ 400mm Centres To Suit 340-390mm Slab 1.6m Long - Gal |
| 128173 | Plate Cradle PD3 20mm @ 400mm Centres To Suit 400-450mm Slab 1.6m Long - Gal |

TECHNICAL SPECIFICATIONS

TYPICAL PHYSICAL PROPERTIES

| Property | Value |
|---------------------|--|
| Plate Thickness | 6mm, 10mm, 20mm |
| Plate Width | 50mm |
| Dowel Length | 300mm (typical) |
| Cradle Length | 3000mm (standard), 1600mm (20mm plate) |
| Wire Gauge | 6mm steel |
| Centre Spacing | 300mm, 400mm, or 450mm |
| Lateral Movement | ±5mm (6 & 10mm), ±8mm (20mm) |
| RynoBar™ Yield Load | <1kN (breaks cleanly at saw cut) |
| Material | Mild Steel to AS/NZS 3679.1 |
| Galvanising | AS/NZS 4680:2006 (≥40µm) |
| Bond Breaker | Integrated – no sleeve required |

PERFORMANCE DATA

| Test Performance | Value |
|--------------------------------|--|
| Load Transfer Efficiency | ≥95% (based on deflection control under ACI testing methods) |
| Joint Deflection (ACI 360R-10) | Complies with max 0.25mm deflection tolerance |
| Lateral Movement Accommodation | Up to 8mm (depending on plate size) |
| Saw Cut Tolerance Zone | ±75mm tolerance due to wider effective area |
| Spalling Resistance | Significantly reduced due to uniform stress dispersion |

PD3™ Plate Cradle

COMPLIANCE & STANDARDS

- ACI 360R-10: Guide to Design of Slabs-on-Ground
- AS/NZS 3679.1:2016: Structural Steel – Hot-rolled bars and sections
- AS/NZS 4680:2006: Hot-dip galvanized coatings
- Super Flat Floor Compatible: Designed to meet and exceed tolerances for high-precision floor finishes

STORAGE & SHELF LIFE

- Store under cover in dry conditions
- No functional shelf life limitation when stored as recommended

SAFETY & HANDLING

- Handle with protective gloves and steel-capped boots
- Watch for sharp edges or corners during unloading

INSTALLATION GUIDELINES

1. **Preparation:** Place cradle on compacted subbase according to layout plan. Ensure cradles are level.
2. **Spacing:** Confirm correct spacing as per engineering spec – 300mm/400mm/450mm centres.
3. **Saw Cut Zones:** Align to pass over centre zone of each dowel; RynoBar™ will fracture without obstruction.
4. **Concrete Placement:** Carefully pour and finish; cradle ensures dowels stay in place during vibration and levelling.
5. **Post-Cure:** Proceed with curing compounds or overlays once the slab surface has adequately hardened.