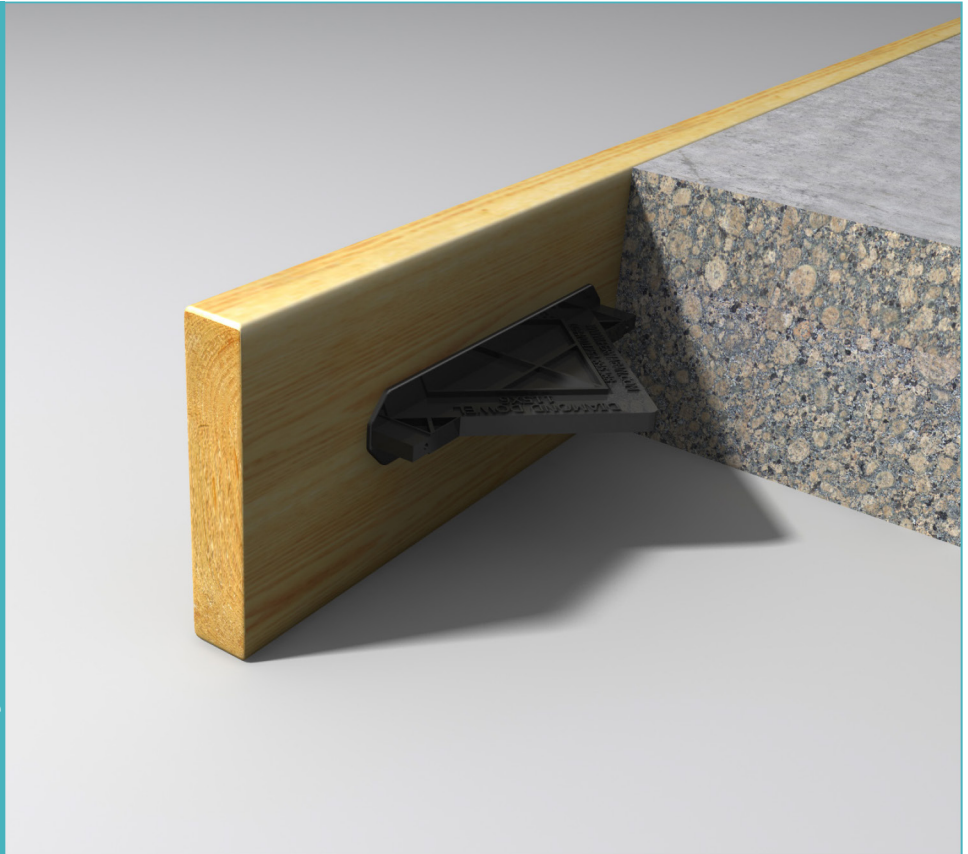


Dowel Systems

Specification Sheet
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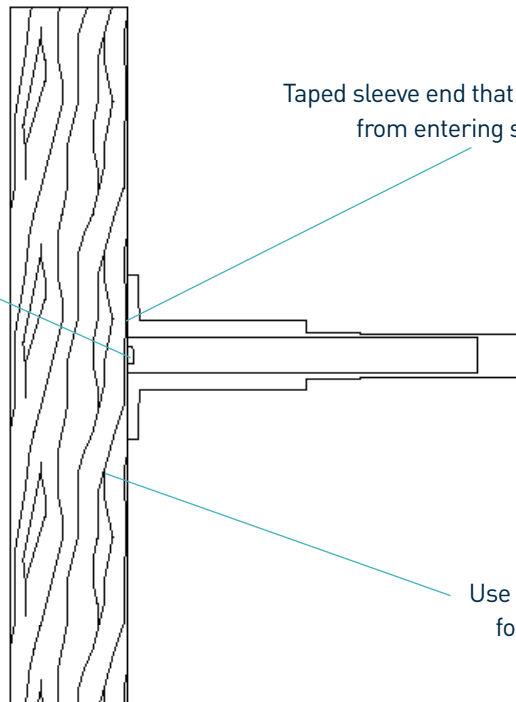
Dowel Systems



Dowel Systems

Plate dowel sleeve is nailed to timber before concrete is poured

Taped sleeve end that stops debris from entering sleeve



Use with timber formwork*

Plate dowel system shown.

*Not supplied

dowel systems

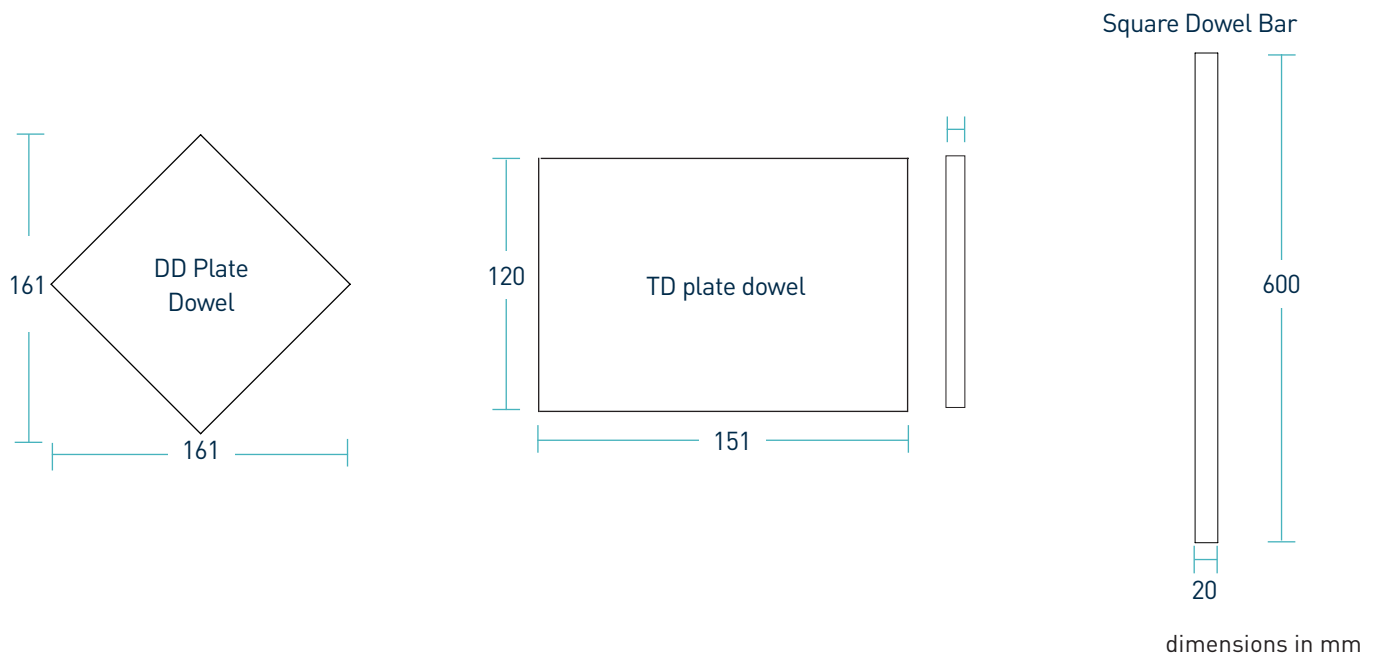
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manufacturing tolerances

Length ±2.0mm

Thickness ±0.4mm

dimensions of Dowel Systems



weight of packaging information

| Dowel Type | Single Dowel Weight (kg) | Single Sleeve Weight (kg) |
|------------------|--------------------------|---------------------------|
| DD6 Plate Dowel | 0.6 | 0.1 |
| DD10 Plate Dowel | 1.0 | 0.2 |
| TD10 Plate Dowel | 1.2 | 0.2 |
| Square Dowel Bar | 1.9 | 0.2 |

Weight values shown are approximate.

materials

| Component | Material |
|-------------------------|-----------------------------|
| Plate dowel | BS EN 10025-2:2004 S275JRG2 |
| Plate dowel sleeve | ABS |
| Square dowel bar | BS EN 10025-2:2004 S275JR |
| Square dowel bar sleeve | PP |

Dowel Systems

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theoretical calculated ultimate loads at failure of dowel or concrete

(10mm joint opening for typical slabs, 40N/mm² and 10mm joint opening)

Unreinforced Slab

| Slab Depth (mm) | Dowel Type | Bursting (KN/m) | Bearing/Bending (KN/m) |
|-----------------|--------------------|-----------------|------------------------|
| 150 | DD6 @ 450mm | 38.9 | 103.8 |
| | DD10 @ 450mm | 38.9 | 212.7 |
| | TD10 @ 600mm | 31.2 | 168.9 |
| | Square Bar @ 300mm | 31.5 | 71.9 |
| 200 | DD6 | 62.8 | 103.8 |
| | DD10 | 62.8 | 212.7 |
| | TD10 | 49.9 | 168.9 |
| | Square Bar | 42 | 71.9 |
| 250 | DD6 | 61.7 | 103.8 |
| | DD10 | 61.7 | 212.7 |
| | TD10 | 72.6 | 168.9 |
| | Square Bar | 52.5 | 71.9 |
| 300 | DD6 | 71.1 | 103.8 |
| | DD10 | 71.1 | 212.7 |
| | TD10 | 86.9 | 168.9 |
| | Square Bar | 63 | 71.9 |

DD are spaced at 450mm, TD spaced at 600mm and Square Bars spaced at 300mm

This table shows the load at failure in bursting (failure of the concrete) and bending (failure of the dowel) for a joint opening of 10mm - larger joint openings can be accommodated. The ultimate load has been calculated in accordance with TR34 4th Edition. Dowel position taken at mid depth of slab. For more detailed analysis please contact RCR Flooring Products Ltd. *All design calculations should be verified by a suitably qualified structural engineer.

Disclaimer: Dowels are to be inserted into the sleeve within 24 - 48 hours following the pour