

THE TECHNICAL STUFF

Name	Size (mm)	Zinc & Yellow	Galvanised	Box Quantity	Hole Depth	Drill Bit Diameter (Substrate)	Max Fixture Thickness	Washer Part Code
 Countersunk 6 Lobe Recess	5 x 30	V35137		200	Embedment + 10mm	5mm	5mm	N/A
	5 x 50	V35138		100	Embedment + 10mm	5mm	25mm	N/A
	5 x 75	V35139		100	Embedment + 10mm	5mm	50mm	N/A
	5 x 100	V35140		100	Embedment + 10mm	5mm	75mm	N/A

Requires T25 Torx Bit

 Countersunk 6 Lobe Recess	6 x 50	V35141		100	Embedment + 10mm	6mm	20mm	N/A
	6 x 75	V35142		100	Embedment + 10mm	6mm	45mm	N/A
	6 x 100	V35143		100	Embedment + 10mm	6mm	55mm	N/A
	6 x 130	V35144		100	Embedment + 10mm	6mm	85mm	N/A
	6 x 150	V35145		100	Embedment + 10mm	6mm	105mm	N/A

Requires T30 Torx Bit

 Hexagon Flange	5 x 30	V35146		200	Embedment + 10mm	5mm	5mm	N/A
	5 x 50	V35147		100	Embedment + 10mm	5mm	25mm	N/A
	5 x 75	V35148		100	Embedment + 10mm	5mm	50mm	N/A
	5 x 100	V35149		100	Embedment + 10mm	5mm	75mm	N/A
	6 x 30	V35173		100	Embedment + 10mm	6mm	5mm	N/A
	6 x 50	V35150	V71783	100	Embedment + 10mm	6mm	20mm	N/A
	6 x 75	V35151	V71784	100	Embedment + 10mm	6mm	45mm	N/A
	6 x 100	V35152	V71785	100	Embedment + 10mm	6mm	55mm	N/A
	6 x 130	V35153		100	Embedment + 10mm	6mm	85mm	N/A
	6 x 150	V35154		100	Embedment + 10mm	6mm	105mm	N/A

Requires 10mm Socket

 Hexagon	8 x 60	V35155	V71786	100	Embedment + 15mm	8mm	20mm	V40000
	8 x 75	V35156		100	Embedment + 15mm	8mm	35mm	V40000
	8 x 100	V35157	V71787	100	Embedment + 15mm	8mm	60mm	V40000
	8 x 130	V35158		50	Embedment + 15mm	8mm	90mm	V40000
	8 x 150	V35159	V71788	50	Embedment + 15mm	8mm	110mm	V40000
	10 x 60	V35160	V71789	50	Embedment + 20mm	10mm	10mm	V40001
	10 x 75	V35161		50	Embedment + 20mm	10mm	20mm	V40001
	10 x 100	V35162	V71790	50	Embedment + 20mm	10mm	50mm	V40001
	10 x 130	V35163		25	Embedment + 20mm	10mm	80mm	V40001
	10 x 150	V35164	V71791	25	Embedment + 20mm	10mm	100mm	V40001
	12 x 75	V35165		50	Embedment + 25mm	12mm	15mm	V40002
	12 x 100	V35166	V71792	50	Embedment + 25mm	12mm	40mm	V40002
	12 x 130	V35167		25	Embedment + 25mm	12mm	70mm	V40002
	12 x 150	V35168	V71793	20	Embedment + 25mm	12mm	90mm	V40002
	12 x 200	V35169	V71794	20	Embedment + 25mm	12mm	140mm	V40002
	16 x 100		V35170	10	Embedment + 35mm	16mm	20mm	N/A
	16 x 150		V35171	10	Embedment + 35mm	16mm	70mm	N/A
	16 x 200		V35172	10	Embedment + 35mm	16mm	120mm	N/A

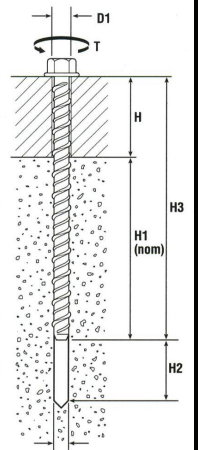
Requires 15mm(8), 17mm(10), 19mm(12) or 27mm(16) Socket

 Hook	6 x 50	V70872		50	Embedment + 10mm	6mm	N/A	N/A
	8 x 55	V70874		50	Embedment + 15mm	8mm	N/A	N/A

 Eye	6 x 50	V70873		50	Embedment + 10mm	6mm	N/A	N/A
	8 x 55	V70875		50	Embedment + 15mm	6mm	N/A	N/A

Whilst every care has been taken to ensure that the information included in this document was accurate at the time of printing, we reserve the right to change specifications at any time. The photographs reproduced in this publication are with the constraints of the printing process and are not to be used for matching purposes. E & OE.

Setting Detail Chart



Anchor Size			5x30		5x50		5x75		5x100		6x50		6x75		6x100		6x130		6x150		8x60		8x75		8x100		8x150		10x60		10x75		10x100		10x150		12x75		12x100		12x130		12x150		12x200		16x100		16x150		16x200																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																							
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Performance Values (Concrete C20/25)*

Size		5mm		6mm		8mm		10mm		12mm		16mm	
Embedment Depth mm		25	37.5	30	45	40	60	50	75	60	90	80	120
Ultimate Load kN	Tension	4.2	9.6	8	16	12	24	18	36	26	52	40	72
Safe Working Load kN	Tension	1	2.5	2	4	3	6	4.5	9	6.5	13	8	18
Ultimate Load kN	Shear	9	11	10	14	24	30	40	50	54	60	N/A	N/A
Safe Working Load kN	Shear	2	2.75	2.5	3.5	6	7.5	10	12.5	13.5	15	N/A	N/A
Normal Edge Distance (mm)	Tension	N/A		60		60		80		90		100	
Normal Edge Distance (mm)	Shear	N/A		80		90		120		140		N/A	
Normal Spacing (mm)	Tension	N/A		100		120		170		200		220	

*Performance values refer to Hexagon and Hexagon Flange head styles only.

Spacing Reduction Factors (Concrete C20/25)†

Size mm	Edge mm	20	30	40	50	60	70	80	90	100	120	140	170	200
6	Tension		0.52	0.59	0.66	0.73	0.80	0.86	0.93	1.00				
8	Tension			0.78	0.81	0.84	0.87	0.89	0.92	0.95	1.00			
10	Tension					0.69	0.70	0.70	0.71	0.72	0.73	0.84	1.00	
12	Tension					0.76	0.77	0.77	0.78	0.78	0.79	0.85	0.92	1.00

† Edge and Spacing reduction factors are based on minimum embedment only.

*Information for the 5mm & 16mm Tension Edge Fixing & the 5mm & 16mm Shear Edge Fixing are currently unavailable.

Edge Reduction Factors (Concrete C20/25)†

Size mm	Edge mm	20	30	40	50	60	70	80	90	100	110	120	130	140
6	Tension	0.70	0.80	0.86	0.95	1.00								
8	Tension	0.61	0.72	0.84	0.93	1.00								
10	Tension		0.43	0.63	0.80	0.92	1.00							
12	Tension			0.57	0.62	0.70	0.77	0.85	0.90	1.00				
6	Shear	0.35	0.52	0.70	0.78	0.85	0.92	1.00						
8	Shear			0.32	0.40	0.48	0.65	0.83	1.00					
10	Shear					0.33	0.39	0.51	0.63	0.76	0.88	1.00		
12	Shear							0.32	0.36	0.48	0.61	0.74	0.87	1.00

† Edge and Spacing reduction factors are based on minimum embedment only.

*Information for the 5mm & 16mm Tension Edge Fixing & Shear Edge Fixing are currently unavailable.

The performance values expressed were compiled from independent tests performed by Imperial College Consultants Limited (ICON), London. The tests were performed in accordance with the methods described in the European Organisation of Technical Approval (EOTA) Guideline (ETAG), ETAG No. 0011997.

THUNDERBOLT™

Please contact

WHEN NOTHING ELSE CAN FIX IT,
CALL FOR...



THE ONE AND ONLY FIX FOR ANY TASK

UNIFIX



THUNDERBOLT™ A FORCE TO BE RECKONED WITH

**THE ORIGINAL
AND BEST SELLING
ALL-PURPOSE ANCHOR**

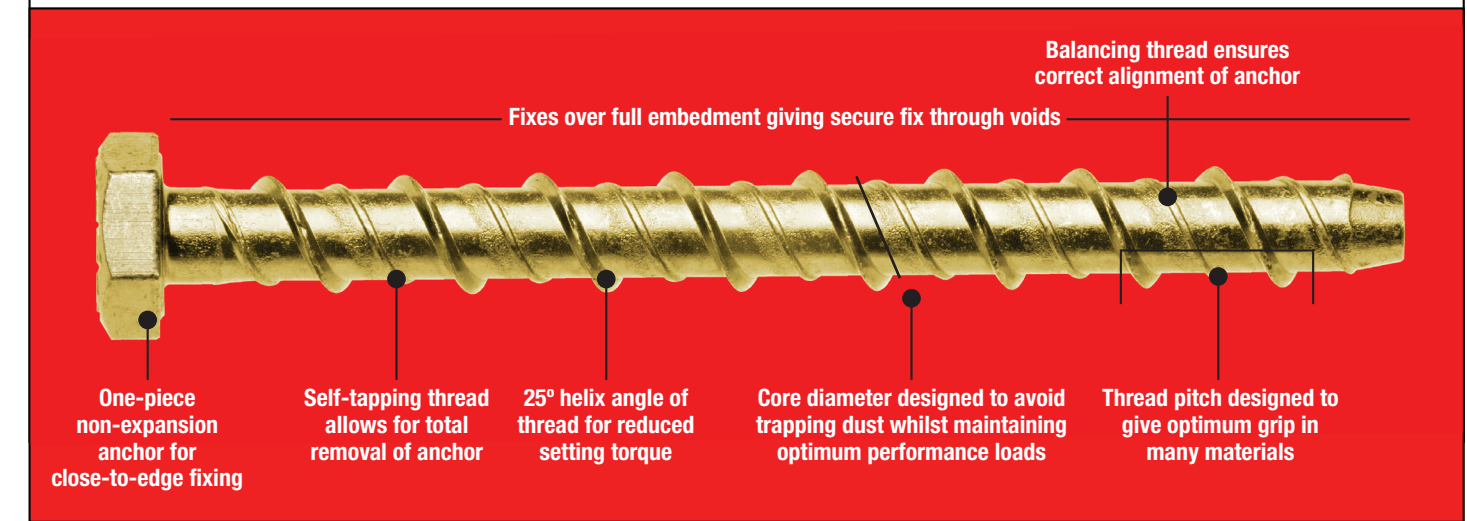
The one and only Thunderbolt™ is the original self-tapping anchor with the power to be used on a whole range of construction materials, including concrete, stone, brick and block. The threaded anchor and self-tapping action allows for safe anchorage, with the substrate becoming the nut to the bolt - applying a tried and tested method for metals and wood to a broader selection of materials.

A truly versatile anchor, the Thunderbolt™ can be installed nearer to edges and closer together at varying embedment depths, providing a stress-free fixing. Installation is quick and easy, making it the ideal general purpose anchor, even on temporary jobs as it's completely removable. Using standard sized drill bits, the Thunderbolt™ is the cost effective fix for any job.

1

WHY IT'S BETTER

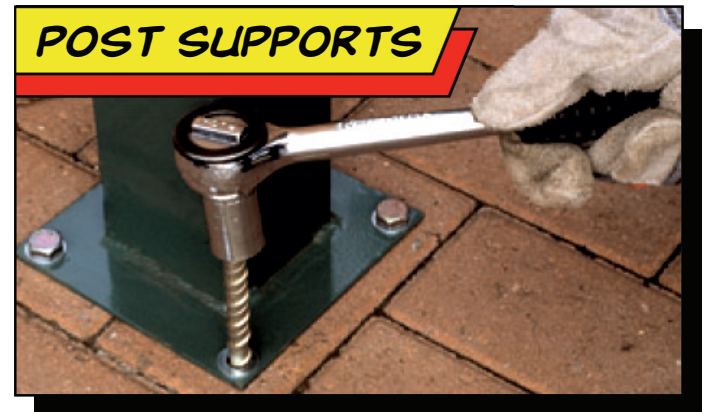
- Gives a mechanical interlock between construction material and the fixing, with no expansion stress
- Fixes close to the edge and is totally removable
- Fixes along the entire thread length to enable fixing through hollow sections
- No marking out required, fix straight through your fixture
- Works in concrete, brick, wood, marble, block, stone and more
- Uses smaller drill bits than traditional bolts and sleeve anchors
- Independently tested to European standards



2

WHO USES IT

- General builders
- Property developers
- Property maintenance
- Fencing contractors
- Shop fitters
- Plumbers
- Restoration contractors
- Roofing contractors



SUBSTRATE
SUITABILITY

NOTHING CAN STOP THE MIGHTY THUNDERBOLT™

- Fixes over full embedment giving secure fix through voids
- Balancing thread ensures correct alignment of anchor
- One-piece non-expansion fixing anchor for close-to-edge fixing
- Self-tapping thread allows for total removal of anchor
- 25° helix angle of thread for reduced setting torque
- Core diameter designed to avoid trapping dust whilst maintaining optimum performance loads
- Manufactured in accordance with ISO 9000 from high grade steel
- Achieves a tensile strength of 800N/mm² (after heat treatment)

HOW IT WORKS

1

Simply drill a hole the same size as the Thunderbolt™ into the material. Ensure the hole is a little deeper than the bolt to allow for dust - see technical info.

2

Remove any loose dust from the hole.

3

Screw in the Thunderbolt™ with a socket wrench. Apply a slight downward pressure to start the self-tapping action, as you would with a woodscrew.

4

Tighten the Thunderbolt™ to secure the fixture in place.

5

Job done!

1

2

3

4

5

THE ORIGINAL
AND BEST
SELLING
ALL-PURPOSE
ANCHOR