

ComFlor® 80

Combined 80mm deep round shouldered trapezoidal combined composite profile with long span capability

ComFlor® 80 is the big sister to ComFlor® 60 with the same round shoulder combined profile technology applied to an 80mm deep trapezoidal shape to give big spans. The use of this profile allows a designer to reduce still further the number of secondary beams in a building to give a cleaner lower cost structure. It allows central stud placement to ensure effective composite beam design and is 600mm cover to give lighter weight sheets in accordance with Health and Safety guidelines.

Versatile

Combined profile allows easy service attachment, with trapezoidal spanning ability.

Reduced number of secondary beams

The use of this profile allows a designer to reduce still further the number of secondary beams in a building to give a cleaner lower cost structure.

Low concrete and steel usage

A low volume of concrete is needed reducing weight and steel requirement.

Closed ends

Applied in the factory to close off the profile, particularly suitable for pre-studded beams.

Colorcoat FD®

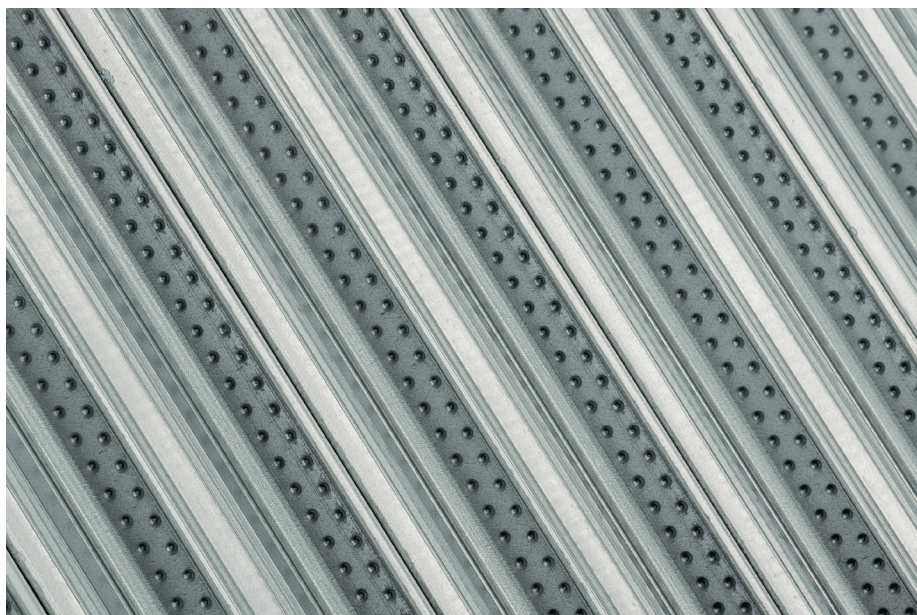
ComFlor® 80 is available with Colorcoat FD® pre-finished soffit, to give a bright attractive finish where a ceiling is not used.

Central stud placement

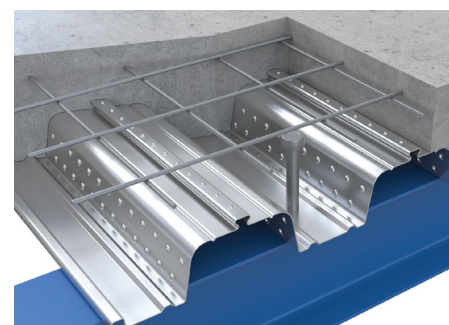
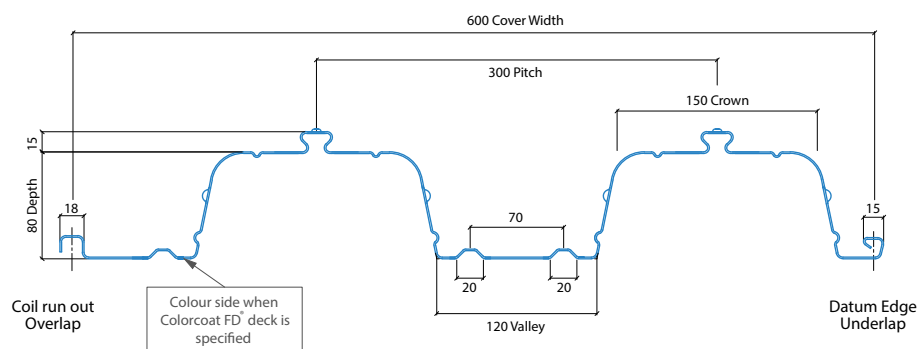
Shear studs are placed centrally in the troughs to ensure beneficial placement.

Better for Health and Safety

The profile is 600mm cover as recommended by Health and Safety guidelines to allow a lighter weight sheet which reduce strain on installation operatives.



Design information



ComFlor® 80 Composite slab - volume and weight (EC values)

Slab depth (mm)	Concrete volume (m ³ /m ²)	Weight of concrete (kN/m ²)			
		Normal weight concrete		Lightweight concrete	
		Wet	Dry	Wet	Dry
130	0.085	–	–	1.70	1.62
140	0.095	2.38	2.28	1.90	1.81
150	0.105	2.63	2.52	2.10	2.00
160	0.115	2.88	2.76	2.30	2.19
170	0.125	3.13	3.00	2.50	2.38
180	0.135	3.38	3.24	2.70	2.57
190	0.145	3.63	3.48	2.90	2.76
200	0.155	3.88	3.72	3.10	2.95
210	0.165	4.13	3.96	3.30	3.14
220	0.175	4.38	4.20	3.50	3.33
230	0.185	4.63	4.44	3.70	3.52
240	0.195	4.88	4.68	3.90	3.71
250	0.205	5.13	4.92	4.10	3.90

ComFlor® 80 (S350) Section properties (per metre width)

Nominal thickness (mm)	Design thickness (mm)	Cross section area (mm ² /m)	Profile weight (kN/m ²)	Height to neutral axis (mm)	Moment of inertia (cm ⁴ /m)		Ultimate moment capacity (kNm/m)	
					Sagging	Hogging	Sagging	Hogging
0.90	0.86	1382	0.11	44.86	165.42	156.17	10.76	8.68
1.00	0.96	1542	0.12	44.90	181.32	171.83	13.34	10.65
1.20	1.16	1864	0.15	45.01	213.13	203.16	18.49	14.59

Section properties in the above table conform to BS 5950 and Eurocode

Design Notes:

Deck material

Tata Steel Galvatite®, hot dip zinc coated steel to BS EN 10346 S350GD+Z275, with guaranteed minimum proof strength of 350N/mm² and zinc coating of total mass 275g/m² (including both sides). This is sufficient for internal floors in a non-aggressive environment, which satisfies the requirement in Clause 4.2 BS EN 1994-1-1 - the exposed surfaces of the steel decking shall be adequately protected to resist the particular atmospheric conditions. A zinc coating, if specified, should conform to the requirements of BS EN 10346. The specification may be varied, depending on service conditions.

Anti-crack mesh

As a minimum requirement where the control of crack width is of no interest, BS EN 1994-1-1, 9.8.1(2) recommends that, where continuous slabs are designed as simply-supported in accordance with BS EN 1994-1-1, 9.4.2(5), the cross-sectional area of the

anti-crack reinforcement above the ribs should be not less than 0.2% of the cross-sectional area of the concrete above the ribs for unpropped construction, and 0.4% of this cross-sectional area for propped construction. The mesh specified in the quick reference Eurocode tables, complies with this clause.

Where forklift truck (or other similar concentrated loading) is expected, 0.5% minimum percentage reinforcement should be used over the supports and the previous stated percentages elsewhere to control cracking. For further information refer to SCI AD 150.

In accordance with Steel Construction Institute (SCI) P300 'Composite Slabs and Beams Using Steel Decking: Best Practice for Design and Construction, a nominal cover of 25mm is stated for an exposure level XC1, for all concrete cylinder strengths for both normal (C25/30 to C40/50) and lightweight concrete (LC25/28 to LC32/35). This nominal cover of 25mm is the minimum cover of 15mm plus a fixing tolerance of 10mm.

Notes

1. Deck and beam deflection (ie, ponding) is not included in the table.
2. Deck and mesh weight is not included in the weight of concrete figures.
3. Eurocode density of concrete is taken as:

Normal weight (wet)	25kN/m ³
Normal weight (dry)	24kN/m ³
Lightweight (wet)	20kN/m ³
Lightweight (dry)	19kN/m ³

Supporting beam width

For all ComFlor® 80 load/span tables, the width of the support beam used is assumed to be 152mm.

Fire design

The capacity of a composite slab with nominal anti-crack mesh in fire is calculated in accordance with Steel Construction Institute NCCI PN005 'Fire resistance design of composite slab'. Two fire-design methods can be used in the ComFlor® 9 software, namely 'Mesh and Deck Fire Method' or 'Bar Fire Method'. For further details of the performance of composite slabs with nominal anti-crack mesh in fire, please contact the technical team.

Technical services

The Technical Department at Tata Steel offers a comprehensive advisory service on the design of composite flooring, which is available to all specifiers and users. Should queries arise which are not covered by this literature or by the ComFlor® 9 software, please contact us.

ComFlor® 80 / Mesh and Deck Fire Method / Unproped

Single span deck continuous slab (m) - Normal weight concrete - Eurocode - Beam width 152mm
 (Note: Single span deck single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.2% min.reqd*	Total applied load (kN/m²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140***	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.71 (A193)	3.69 (A393)	3.29 (A393)	4.07 (A252)	4.06 (A393)	3.29 (A393)	4.34 (A252)	4.15 (A393)	3.31 (A393)
		160	A193	3.61 (A142)	3.60 (A252)	3.59 (2xA252)	3.96 (A193)	3.95 (A393)	3.94 (2xA252)	4.26 (A193)	4.25 (A393)	3.96 (2xA252)
		170	A193	3.51 (A193)	3.51 (A193)	3.50 (A393)	3.86 (A193)	3.86 (A252)	3.84 (2xA252)	4.18 (A193)	4.17 (A393)	4.17 (2xA252)
		180	A193	3.50 (A193)	3.50 (A193)	3.49 (A393)	3.77 (A193)	3.77 (A193)	3.76 (A393)	4.11 (A193)	4.11 (A252)	4.10 (2xA252)
		190	A252	3.45 (A252)	3.45 (A252)	3.45 (A252)	3.68 (A252)	3.68 (A252)	3.68 (A393)	4.04 (A252)	4.04 (A252)	4.04 (A393)
		200	A252	3.37 (A252)	3.37 (A252)	3.37 (A252)	3.60 (A252)	3.60 (A252)	3.60 (A252)	3.99 (A252)	3.99 (A252)	3.98 (A393)
None	90 minutes	150	A142	3.29 (A252)	3.29 (A252)	3.29 (A252)	3.53 (A252)	3.53 (A252)	3.53 (A252)	3.92 (A252)	3.92 (A252)	3.92 (A252)
		160	A193	3.59 (A393)	3.59 (2xA252)	2.89 (2xA252)	3.95 (A393)	3.65 (2xA252)	2.92 (2xA252)	4.25 (A393)	3.61 (2xA252)	2.97 (2xA252)
		170	A193	3.51 (A193)	3.50 (A393)	3.48 (2xA393)	3.85 (A393)	3.84 (2xA252)	3.83 (2xA393)	4.17 (A393)	4.17 (2xA252)	4.15 (2xA393)
		180	A193	3.50 (A193)	3.49 (A252)	3.48 (2xA252)	3.77 (A252)	3.76 (A393)	3.74 (2xA393)	4.10 (A393)	4.10 (2xA252)	4.08 (2xA393)
		190	A252	3.45 (A252)	3.45 (A252)	3.44 (A393)	3.68 (A252)	3.68 (A252)	3.67 (2xA252)	4.04 (A252)	4.04 (A393)	4.02 (2xA393)
		200	A252	3.37 (A252)	3.37 (A252)	3.36 (A393)	3.60 (A252)	3.60 (A252)	3.60 (A393)	3.99 (A252)	3.98 (A393)	3.98 (2xA252)
None	120 minutes	160	A193	3.29 (A252)	3.29 (A252)	3.29 (A252)	3.53 (A252)	3.53 (A252)	3.52 (A393)	3.92 (A252)	3.92 (A252)	3.91 (A393)
		170	A193	3.50 (A393)	3.48 (2xA393)	3.35 (2xA393)	3.85 (A393)	3.83 (2xA393)	3.34 (2xA393)	4.17 (2xA252)	4.15 (2xA393)	3.34 (2xA393)
		180	A193	3.50 (A193)	3.48 (2xA252)	3.47 (2xA393)	3.76 (A393)	3.75 (2xA252)	3.74 (2xA393)	4.10 (A393)	4.09 (2xA393)	4.08 (2xA393)
		190	A252	3.45 (A252)	3.45 (A252)	3.42 (2xA393)	3.68 (A252)	3.68 (A252)	3.66 (2xA393)	4.04 (A393)	4.03 (A252)	4.02 (2xA393)
		200	A252	3.37 (A252)	3.37 (A252)	3.36 (A393)	3.60 (A252)	3.60 (A252)	3.59 (2xA252)	3.99 (A252)	3.98 (A393)	3.96 (2xA393)

Double span (m) - Normal weight concrete - Eurocode - Beam width 152mm



Props	Fire period	Slab depth (mm)	Mesh 0.2% min.reqd*	Total applied load (kN/m²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140***	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.71 (A193)	3.69 (A393)	3.28 (A393)	4.19 (A393)	3.83 (A393)	3.28 (A393)	4.46 (A393)	3.85 (A393)	3.29 (A393)
		160	A193	3.56 (A142)	3.54 (A252)	3.47 (2xA252)	4.03 (A252)	4.02 (A393)	3.50 (2xA252)	4.64 (A393)	4.32 (2xA252)	3.57 (2xA252)
		170	A193	3.41 (A193)	3.41 (A193)	3.39 (A393)	3.88 (A193)	3.86 (A393)	3.82 (2xA393)	4.59 (A393)	4.57 (2xA393)	4.38 (2xA393)
		180	A193	3.28 (A193)	3.28 (A193)	3.27 (A252)	3.73 (A193)	3.73 (A252)	3.71 (A393)	4.54 (A252)	4.53 (A393)	4.48 (2xA393)
		190	A252	3.16 (A252)	3.16 (A252)	3.16 (A252)	3.59 (A252)	3.59 (A252)	3.58 (A393)	4.39 (A252)	4.38 (A393)	4.34 (2xA393)
		200	A252	3.05 (A252)	3.05 (A252)	3.05 (A252)	3.47 (A252)	3.47 (A252)	3.47 (A252)	4.25 (A252)	4.24 (A393)	4.23 (2xA252)
None	90 minutes	150	A252	2.95 (A252)	2.95 (A252)	2.95 (A252)	3.36 (A252)	3.36 (A252)	3.36 (A252)	4.12 (A252)	4.12 (A252)	4.11 (A393)
		160	A193	3.53 (A393)	3.31 (2xA252)	2.80 (2xA252)	3.96 (2xA252)	3.34 (2xA252)	2.83 (2xA252)	4.02 (2xA252)	3.41 (2xA252)	2.89 (2xA252)
		170	A193	3.41 (A193)	3.38 (2xA252)	3.35 (2xA393)	3.86 (A393)	3.82 (2xA393)	3.59 (2xA393)	4.57 (2xA393)	4.43 (2xA393)	3.62 (2xA393)
		180	A193	3.28 (A193)	3.27 (A252)	3.24 (2xA252)	3.73 (A193)	3.71 (A393)	3.68 (2xA393)	4.51 (2xA252)	4.48 (2xA393)	3.92 (2xA393)
		190	A252	3.16 (A252)	3.16 (A252)	3.15 (A393)	3.59 (A252)	3.59 (A252)	3.58 (A393)	4.38 (A393)	4.34 (2xA393)	4.08 (2xA393)
		200	A252	3.05 (A252)	3.05 (A252)	3.05 (A252)	3.47 (A252)	3.47 (A252)	3.46 (A393)	4.25 (A252)	4.24 (A393)	4.20 (2xA393)
None	120 minutes	160	A252	2.95 (A252)	2.95 (A252)	2.95 (A252)	3.36 (A252)	3.36 (A252)	3.35 (A393)	4.12 (A252)	4.10 (A393)	4.07 (2xA393)
		170	A193	3.40 (A252)	3.35 (2xA393)	3.12 (2xA393)	3.82 (2xA393)	3.75 (2xA393)	3.14 (2xA393)	4.54 (2xA393)	3.77 (2xA393)	3.17 (2xA393)
		180	A193	3.28 (A193)	3.27 (A252)	3.23 (2xA393)	3.73 (A252)	3.68 (2xA393)	3.46 (2xA393)	4.48 (2xA393)	4.21 (2xA393)	3.48 (2xA393)
		190	A252	3.16 (A252)	3.16 (A252)	3.15 (A393)	3.59 (A252)	3.58 (A393)	3.55 (2xA393)	4.36 (2xA252)	4.34 (2xA393)	3.76 (2xA393)
		200	A252	3.05 (A252)	3.05 (A252)	3.04 (A393)	3.47 (A252)	3.47 (A252)	3.46 (A393)	4.24 (A393)	4.20 (2xA393)	3.92 (2xA393)

Spans are based on beam centres, with a 152mm flange width and a minimum end bearing of 50mm.

* In accordance with BS EN 1994-1-1 Clause 9.8.1 (2) - Where the continuous slabs are designed as simply-supported in accordance with 9.4.2 (5), the minimum cross-sectional area of anti-crack mesh reinforcement above the ribs should not be less than 0.2% of the cross-sectional area of concrete above the ribs for unproped construction. In order to maximise the FIRE LIMIT STATE spans, increased mesh sizing is required as specified in the above Mesh and Deck Fire Method tables.

*** All mesh covers for all profile types and slab depths are taken as 30mm. However, due to mesh size restriction, the ComFlor® 80 140mm slab depth requires a mesh cover depth of 25mm.

ComFlor® 80 / Bar Fire Method / Unpropped

Single span deck, single span slab (m) - Normal weight concrete - Eurocode - Beam width 152mm

(Note: Single span deck with single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.2% min. reqd.*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.70 (10)	3.70 (12)	3.69 (16)	4.07 (10)	4.06 (12)	3.91 (16)	4.33 (12)	4.32 (16)	3.92 (16)
		160	A193	3.60 (10)	3.60 (10)	3.60 (12)	3.96 (10)	3.95 (12)	3.94 (16)	4.25 (12)	4.25 (12)	4.19 (16)
		170	A193	3.51 (10)	3.51 (10)	3.50 (12)	3.86 (10)	3.85 (12)	3.85 (12)	4.17 (10)	4.17 (12)	4.16 (16)
		180	A252	3.49 (10)	3.49 (10)	3.49 (12)	3.76 (10)	3.76 (10)	3.76 (12)	4.10 (10)	4.10 (12)	4.10 (16)
		190	A252	3.45 (8)	3.44 (10)	3.44 (12)	3.68 (10)	3.68 (10)	3.67 (12)	4.04 (10)	4.04 (12)	4.04 (12)
None	90 minutes	150	A252	3.36 (8)	3.36 (10)	3.36 (10)	3.60 (10)	3.60 (10)	3.59 (12)	3.98 (10)	3.98 (12)	3.98 (12)
		200	A252	3.29 (8)	3.29 (10)	3.29 (10)	3.53 (8)	3.52 (10)	3.52 (12)	3.91 (10)	3.91 (10)	3.91 (12)
		150	A142	3.59 (16)	3.59 (16)	3.58 (20)	3.94 (16)	3.94 (16)	3.93 (20)	4.24 (16)	4.23 (20)	4.18 (20)
		160	A193	3.50 (12)	3.49 (16)	3.49 (16)	3.84 (16)	3.84 (16)	3.83 (20)	4.16 (16)	4.16 (16)	4.15 (20)
		170	A193	3.49 (12)	3.48 (16)	3.48 (16)	3.75 (16)	3.75 (16)	3.75 (16)	4.10 (16)	4.10 (16)	4.09 (20)
		180	A252	3.44 (12)	3.43 (16)	3.43 (16)	3.67 (12)	3.67 (12)	3.67 (16)	4.03 (16)	4.03 (16)	4.02 (20)
None	120 minutes	190	A252	3.36 (12)	3.35 (16)	3.35 (16)	3.59 (12)	3.59 (16)	3.59 (16)	3.97 (16)	3.97 (16)	3.96 (20)
		200	A252	3.28 (12)	3.28 (12)	3.28 (16)	3.52 (12)	3.51 (16)	3.51 (16)	3.90 (16)	3.90 (16)	3.90 (16)
		160	A193	3.47 (25)	3.47 (25)	3.45 (32)	3.81 (25)	3.78 (32)	3.78 (32)	4.14 (25)	4.11 (32)	4.09 (32)
		170	A193	3.46 (25)	3.46 (25)	3.44 (32)	3.73 (25)	3.73 (25)	3.70 (32)	4.07 (25)	4.05 (32)	4.05 (32)
		180	A252	3.42 (20)	3.41 (25)	3.38 (32)	3.64 (25)	3.64 (25)	3.61 (32)	4.01 (25)	3.99 (32)	3.99 (32)
		190	A252	3.34 (20)	3.33 (25)	3.33 (25)	3.56 (25)	3.56 (25)	3.54 (32)	3.95 (25)	3.92 (32)	3.92 (32)
		200	A252	3.27 (20)	3.25 (25)	3.25 (25)	3.51 (20)	3.49 (25)	3.47 (32)	3.88 (25)	3.88 (25)	3.86 (32)

Double span (m) - Normal weight concrete - Eurocode - Beam width 152mm



Props	Fire period	Slab depth (mm)	Mesh 0.2% min. reqd.*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.70 (10)	3.70 (10)	3.69 (12)	4.21 (10)	4.20 (12)	4.03 (16)	4.82 (12)	4.80 (16)	4.01 (16)
		160	A193	3.55 (8)	3.54 (10)	3.54 (12)	4.03 (10)	4.02 (12)	4.01 (16)	4.65 (12)	4.63 (16)	4.34 (16)
		170	A193	3.40 (8)	3.40 (8)	3.40 (10)	3.87 (8)	3.86 (10)	3.86 (12)	4.60 (10)	4.59 (12)	4.58 (16)
		180	A252	3.27 (8)	3.27 (8)	3.27 (10)	3.72 (8)	3.72 (10)	3.71 (12)	4.53 (10)	4.53 (12)	4.51 (16)
		190	A252	3.15 (8)	3.15 (8)	3.15 (8)	3.59 (8)	3.59 (8)	3.58 (10)	4.38 (8)	4.38 (10)	4.37 (12)
None	90 minutes	200	A252	3.04 (8)	3.04 (8)	3.04 (8)	3.47 (8)	3.47 (8)	3.46 (10)	4.24 (8)	4.24 (10)	4.23 (12)
		150	A252	2.95 (8)	2.95 (8)	2.95 (8)	3.36 (8)	3.36 (8)	3.36 (8)	4.11 (8)	4.11 (10)	4.10 (12)
		150	A142	3.54 (12)	3.52 (16)	3.52 (16)	4.01 (16)	4.01 (16)	3.99 (20)	4.63 (16)	4.61 (20)	4.33 (20)
		160	A193	3.40 (10)	3.38 (16)	3.38 (16)	3.85 (12)	3.84 (16)	3.82 (20)	4.58 (16)	4.57 (20)	4.57 (20)
		170	A193	3.27 (8)	3.27 (10)	3.25 (16)	3.72 (10)	3.70 (16)	3.70 (16)	4.51 (16)	4.49 (20)	4.49 (20)
		180	A252	3.15 (8)	3.15 (10)	3.14 (12)	3.58 (10)	3.58 (12)	3.57 (16)	4.36 (16)	4.36 (16)	4.34 (20)
None	120 minutes	190	A252	3.04 (8)	3.04 (8)	3.04 (10)	3.47 (8)	3.46 (10)	3.46 (12)	4.23 (12)	4.22 (16)	4.20 (20)
		200	A252	2.95 (8)	2.95 (8)	2.94 (10)	3.36 (8)	3.35 (10)	3.35 (12)	4.11 (10)	4.10 (12)	4.09 (16)
		160	A193	3.36 (20)	3.33 (25)	3.28 (32)	3.79 (25)	3.74 (32)	3.74 (32)	4.52 (32)	4.52 (32)	4.01 (32)
		170	A193	3.25 (16)	3.21 (25)	3.21 (25)	3.65 (25)	3.65 (25)	3.61 (32)	4.41 (25)	4.40 (32)	4.15 (32)
		180	A252	3.14 (12)	3.13 (16)	3.11 (20)	3.57 (16)	3.55 (20)	3.48 (32)	4.31 (25)	4.26 (32)	4.26 (32)
		190	A252	3.04 (10)	3.03 (16)	3.01 (20)	3.45 (16)	3.43 (20)	3.41 (25)	4.20 (20)	4.13 (32)	4.13 (32)
		200	A252	2.94 (10)	2.94 (12)	2.93 (16)	3.35 (12)	3.34 (16)	3.33 (20)	4.07 (20)	4.05 (25)	4.00 (32)

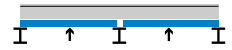
Spans are based on beam centres, with a 152mm flange width and a minimum end bearing of 50mm.

* In accordance with BS EN 1994-1-1 Clause 9.8.1 (2) - Where the continuous slabs are designed as simply-supported in accordance with 9.4.2 (5), the minimum cross-sectional area of anti-crack mesh reinforcement above the ribs should not be less than 0.2% of the cross-sectional area of concrete above the ribs for unpropped construction.

Figures in brackets represent the diameter of bar required – one bar in each deck trough positioned 25mm above the trough.

ComFlor® 80 / Mesh and Deck Fire Method / Propped

Single Span propped deck, continuous slab (m) - Normal weight concrete - Eurocode - Beam width 152mm.
 (Note: Single span deck single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.4% min. reqd.**	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
				0.90mm			1.00mm			1.20mm		
1 line	60 minutes	140***	A252	4.43 (A393)	3.83 (A393)	3.28 (A393)	4.44 (A393)	3.84 (A393)	3.29 (A393)	4.43 (A393)	3.84 (A393)	3.29 (A393)
		150	A393	4.61 (A393)	4.01 (A393)	3.45 (A393)	4.64 (A393)	4.03 (A393)	3.46 (A393)	4.63 (A393)	4.03 (A393)	3.46 (A393)
		160	A393	4.93 (2xA393)	4.46 (2xA393)	3.85 (2xA393)	4.99 (2xA393)	4.51 (2xA393)	3.89 (2xA393)	5.11 (2xA393)	4.58 (2xA393)	3.96 (2xA393)
		170	A393	4.97 (2xA252)	4.56 (2xA252)	3.94 (2xA393)	5.20 (2xA252)	4.60 (2xA393)	3.98 (2xA393)	5.32 (2xA393)	4.68 (2xA393)	4.05 (2xA393)
		180	2xA252	4.79 (2xA252)	4.76 (2xA393)	4.23 (2xA393)	5.37 (2xA252)	4.88 (2xA393)	4.24 (2xA393)	5.53 (2xA393)	4.90 (2xA393)	4.25 (2xA393)
		190	2xA252	4.62 (2xA252)	4.62 (2xA252)	4.59 (2xA393)	5.32 (2xA252)	5.12 (2xA393)	4.59 (2xA393)	5.68 (2xA393)	5.28 (2xA393)	4.60 (2xA393)
1 line	90 minutes	150	A393	3.66 (2xA252)	3.19 (2xA252)	2.74 (2xA252)	3.70 (2xA252)	3.22 (2xA252)	2.77 (2xA252)	3.79 (2xA252)	3.30 (2xA252)	2.84 (2xA252)
		160	A393	4.44 (2xA393)	3.89 (2xA393)	3.35 (2xA393)	4.48 (2xA393)	3.92 (2xA393)	3.38 (2xA393)	4.55 (2xA393)	3.98 (2xA393)	3.43 (2xA393)
		170	A393	4.67 (2xA393)	4.10 (2xA393)	3.55 (2xA393)	4.71 (2xA393)	4.13 (2xA393)	3.58 (2xA393)	4.77 (2xA393)	4.19 (2xA393)	3.63 (2xA393)
		180	2xA252	4.75 (2xA393)	4.09 (2xA393)	3.64 (2xA393)	4.79 (2xA393)	4.22 (2xA393)	3.66 (2xA393)	4.85 (2xA393)	4.28 (2xA393)	3.72 (2xA393)
		190	2xA252	4.62 (2xA252)	4.25 (2xA393)	3.70 (2xA393)	4.84 (2xA393)	4.28 (2xA393)	3.73 (2xA393)	4.91 (2xA393)	4.35 (2xA393)	3.79 (2xA393)
		200	2xA252	4.47 (2xA252)	4.47 (2xA252)	3.97 (2xA252)	5.14 (2xA252)	4.58 (2xA252)	4.00 (2xA252)	5.23 (2xA252)	4.64 (2xA252)	4.05 (2xA252)
1 line	120 minutes	160	A393	3.98 (2xA393)	3.48 (2xA393)	3.01 (2xA393)	4.01 (2xA393)	3.51 (2xA393)	3.03 (2xA393)	4.07 (2xA393)	3.56 (2xA393)	3.07 (2xA393)
		170	A393	4.27 (2xA393)	3.75 (2xA393)	3.25 (2xA393)	4.30 (2xA393)	3.77 (2xA393)	3.27 (2xA393)	4.35 (2xA393)	3.82 (2xA393)	3.31 (2xA393)
		180	2xA252	4.49 (2xA393)	3.96 (2xA393)	3.44 (2xA393)	4.52 (2xA393)	3.98 (2xA393)	3.46 (2xA393)	4.57 (2xA393)	4.03 (2xA393)	3.50 (2xA393)
		190	2xA252	4.59 (2xA393)	4.05 (2xA393)	3.53 (2xA393)	4.61 (2xA393)	4.08 (2xA393)	3.55 (2xA393)	4.66 (2xA393)	4.12 (2xA393)	3.59 (2xA393)
		200	2xA252	4.47 (2xA252)	4.18 (2xA252)	3.65 (2xA252)	4.70 (2xA252)	4.17 (2xA252)	3.64 (2xA252)	4.71 (2xA393)	4.18 (2xA393)	3.65 (2xA393)

ComFlor® 80 / Bar Fire Method / Propped

Single Span propped deck, continuous slab (m) - Normal weight concrete - Eurocode - Beam width 152mm.
 (Note: Single span deck single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.4% min. reqd.**	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
				0.90mm			1.00mm			1.20mm		
1 line	60 minutes	140***	A252	5.17 (32)	4.80 (32)	4.02 (16)	5.19 (32)	4.82 (32)	4.02 (16)	5.24 (32)	4.86 (32)	4.01 (16)
		150	A393	5.25 (25)	5.06 (32)	4.35 (16)	5.45 (32)	5.08 (32)	4.34 (16)	5.50 (32)	5.12 (32)	4.33 (16)
		160	A393	5.15 (16)	5.08 (25)	4.65 (20)	5.72 (32)	5.34 (32)	4.65 (20)	5.76 (32)	5.38 (32)	4.64 (16)
		170	A393	4.97 (10)	4.95 (16)	4.92 (32)	5.62 (20)	5.56 (32)	4.95 (20)	6.02 (32)	5.63 (32)	4.94 (20)
		180	2xA252	4.78 (8)	4.77 (10)	4.75 (16)	5.49 (12)	5.45 (20)	5.22 (25)	6.26 (32)	5.87 (32)	5.23 (20)
		190	2xA252	4.61 (8)	4.61 (10)	4.59 (16)	5.30 (10)	5.28 (16)	5.27 (16)	6.45 (32)	6.12 (32)	5.49 (25)
1 line	90 minutes	150	A393	5.25 (25)	5.06 (32)	4.32 (25)	5.45 (32)	5.08 (32)	4.31 (25)	5.50 (32)	5.12 (32)	4.30 (25)
		160	A393	5.12 (20)	5.08 (25)	4.64 (25)	5.72 (32)	5.34 (32)	4.63 (25)	5.76 (32)	5.38 (32)	4.62 (25)
		170	A393	4.93 (20)	4.92 (20)	4.89 (25)	5.63 (25)	5.56 (32)	4.94 (25)	6.02 (32)	5.63 (32)	4.92 (25)
		180	2xA252	4.75 (16)	4.73 (20)	4.70 (25)	5.45 (20)	5.41 (25)	5.22 (25)	6.26 (32)	5.87 (32)	5.21 (25)
		190	2xA252	4.60 (12)	4.57 (20)	4.57 (20)	5.26 (20)	5.26 (20)	5.22 (25)	6.45 (32)	6.12 (32)	5.49 (25)
		200	2xA252	4.45 (10)	4.43 (20)	4.42 (20)	5.11 (16)	5.09 (20)	5.05 (25)	6.35 (20)	6.25 (32)	5.77 (25)
1 line	120 minutes	160	A393	5.02 (32)	4.51 (32)	3.90 (32)	5.14 (32)	4.51 (32)	3.90 (32)	5.15 (32)	4.50 (32)	3.90 (32)
		170	A393	4.83 (32)	4.65 (32)	4.03 (32)	5.28 (32)	4.65 (32)	4.03 (32)	5.29 (32)	4.64 (32)	4.03 (32)
		180	2xA252	4.64 (32)	4.64 (32)	4.13 (32)	5.35 (32)	4.74 (32)	4.13 (32)	5.38 (32)	4.74 (32)	4.12 (32)
		190	2xA252	4.49 (32)	4.49 (32)	4.25 (32)	5.17 (32)	4.87 (32)	4.25 (32)	5.51 (32)	4.86 (32)	4.25 (32)
		200	2xA252	4.42 (20)	4.34 (32)	4.34 (32)	5.00 (32)	4.99 (32)	4.37 (32)	5.63 (32)	4.99 (32)	4.37 (32)

Spans are based on beam centres, with a 152mm flange width and a minimum end bearing of 50mm.

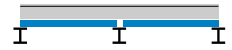
** In accordance with BS EN 1994-1-1 Clause 9.8.1 (2) - Where the continuous slabs are designed as simply-supported in accordance with 9.4.2 (5), the minimum cross-sectional area of anti-crack mesh reinforcement above the ribs should not be less than 0.4% of the cross-sectional area of concrete above the ribs for propped construction. In order to maximise the FIRE LIMIT STATE spans, increased mesh sizing is required as specified in the above Mesh and Deck Fire Method tables.

*** All mesh covers for all profile types and slab depths are taken as 30mm. However, due to mesh size restriction, the ComFlor® 80 140mm slab depth requires a mesh cover depth of 25mm

Figures in brackets represent the diameter of bar required – one bar in each deck trough positioned 25mm above the trough.

ComFlor® 80 closed ends / Mesh and Deck Fire Method / Unpropped

Single span deck continuous slab (m) - Normal weight concrete - Eurocode - Beam width 152mm
(Note: Single span deck single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.2% min.reqd*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140***	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.53 (142)	3.51 (393)	3.22 (2*393)	3.80 (193)	3.76 (393)	3.26 (2*393)	4.36 (252)	4.32 (2*393)	3.35 (2*393)
		160	A142	3.43 (142)	3.43 (193)	3.41 (2*252)	3.70 (142)	3.67 (193)	3.66 (2*393)	4.28 (142)	4.26 (393)	4.14 (2*393)
		170	A193	3.33 (193)	3.33 (193)	3.31 (252)	3.60 (193)	3.60 (193)	3.59 (393)	4.19 (193)	4.19 (252)	4.17 (2*252)
		180	A193	3.24 (193)	3.24 (193)	3.24 (193)	3.56 (193)	3.56 (193)	3.56 (252)	4.09 (193)	4.09 (193)	4.08 (393)
		190	A252	3.16 (252)	3.16 (252)	3.16 (252)	3.54 (252)	3.54 (252)	3.54 (252)	4.00 (252)	4.00 (252)	3.99 (393)
		200	A252	3.09 (252)	3.09 (252)	3.09 (252)	3.45 (252)	3.45 (252)	3.45 (252)	3.92 (252)	3.92 (252)	3.92 (252)
None	90 minutes	150	A142	3.41 (393)	3.26 (2*393)	2.70 (2*393)	3.67 (2*252)	3.28 (2*393)	2.73 (2*393)	4.24 (2*393)	3.34 (2*393)	2.79 (2*393)
		160	A193	3.32 (193)	3.31 (2*252)	3.24 (2*393)	3.60 (252)	3.58 (2*252)	3.24 (2*393)	4.18 (393)	4.15 (2*393)	3.27 (2*393)
		170	A193	3.24 (193)	3.23 (252)	3.21 (2*252)	3.56 (193)	3.55 (393)	3.53 (2*393)	4.09 (252)	4.08 (2*252)	3.97 (2*393)
		180	A252	3.16 (252)	3.16 (252)	3.15 (393)	3.54 (252)	3.53 (393)	3.53 (2*252)	4.00 (252)	3.99 (393)	3.97 (2*393)
		190	A252	3.09 (252)	3.09 (252)	3.08 (393)	3.45 (252)	3.45 (252)	3.44 (2*252)	3.92 (252)	3.91 (393)	3.90 (2*252)
		200	A252	3.02 (252)	3.02 (252)	3.02 (252)	3.38 (252)	3.38 (252)	3.37 (393)	3.84 (252)	3.84 (252)	3.83 (2*252)
None	120 minutes	160	A193	3.28 (393)	3.06 (2*393)	2.57 (2*393)	3.57 (2*393)	3.08 (2*393)	2.59 (2*393)	3.81 (2*393)	3.13 (2*393)	2.64 (2*393)
		170	A193	3.24 (252)	3.23 (2*252)	3.09 (2*393)	3.55 (393)	3.53 (2*393)	3.09 (2*393)	4.08 (2*252)	4.06 (2*393)	3.11 (2*393)
		180	A252	3.16 (252)	3.15 (393)	3.13 (2*393)	3.54 (252)	3.48 (393)	3.51 (2*393)	3.99 (393)	3.94 (2*252)	3.58 (2*393)
		190	A252	3.09 (252)	3.09 (252)	3.07 (2*252)	3.45 (252)	3.45 (393)	3.43 (2*393)	3.92 (252)	3.90 (2*252)	3.89 (2*393)
		200	A252	3.02 (252)	3.02 (252)	3.01 (393)	3.38 (252)	3.37 (252)	3.36 (2*252)	3.84 (252)	3.83 (393)	3.81 (2*393)

Double span (m) - Normal weight concrete - Eurocode - Beam width 152mm



Props	Fire period	Slab depth (mm)	Mesh 0.2% min.reqd*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
None	60 minutes	140***	A142	0.90mm			1.00mm			1.20mm		
		150	A142	3.86 (393)	3.68 (2*393)	3.08 (2x393)	4.28 (2*393)	3.73 (2*393)	3.13 (2*393)	4.58 (2*393)	3.83 (2*393)	3.22 (2*393)
		160	A142	3.69 (142)	3.69 (393)	3.51 (2*393)	4.17 (252)	4.11 (2*393)	3.55 (2*393)	4.72 (2*252)	4.40 (2*393)	3.62 (2*393)
		170	A193	3.57 (193)	3.57 (193)	3.53 (2*252)	4.02 (193)	3.99 (393)	3.94 (2*393)	4.64 (252)	4.61 (2*393)	3.99 (2*393)
		180	A193	3.43 (193)	3.43 (193)	3.41 (393)	3.86 (193)	3.86 (252)	3.82 (2*252)	4.61 (193)	4.61 (2*252)	4.32 (2*393)
		190	A252	3.30 (252)	3.33 (252)	3.30 (252)	3.72 (252)	3.72 (252)	3.71 (393)	4.48 (252)	4.46 (2*252)	4.43 (2*393)
		200	A252	3.19 (252)	3.19 (252)	3.19 (252)	3.60 (252)	3.60 (252)	3.60 (252)	4.34 (252)	4.34 (252)	4.29 (2*252)
None	90 minutes	150	A142	3.63 (2*393)	3.10 (2*393)	2.63 (2*393)	3.67 (2*393)	3.13 (2*393)	2.67 (2*393)	3.75 (2*393)	3.21 (2*393)	2.73 (2*393)
		160	A193	3.54 (393)	3.51 (2*393)	3.04 (2*393)	3.95 (2*393)	3.65 (2*393)	3.06 (2*393)	4.41 (2*393)	3.69 (2*393)	3.11 (2*393)
		170	A193	3.41 (193)	3.40 (2*252)	3.37 (2*393)	3.85 (393)	3.80 (2*393)	3.39 (2*393)	4.58 (2*393)	4.13 (2*393)	3.42 (2*393)
		180	A252	3.30 (252)	3.29 (393)	3.24 (2*252)	3.72 (252)	3.70 (2*252)	3.40 (2*393)	4.46 (2*252)	4.43 (2*393)	3.41 (2*393)
		190	A252	3.19 (252)	3.19 (252)	3.17 (2*252)	3.60 (252)	3.59 (393)	3.53 (2*393)	4.33 (393)	4.29 (2*393)	3.53 (2*393)
		200	A252	3.09 (252)	3.09 (252)	3.08 (393)	3.48 (252)	3.48 (252)	3.46 (2*252)	4.24 (252)	4.19 (2*252)	3.70 (2*393)
None	120 minutes	160	A193	3.41 (2*393)	2.94 (2*393)	2.51 (2*393)	3.44 (2*393)	2.97 (2*393)	2.54 (2*393)	3.50 (2*393)	3.02 (2*393)	2.59 (2*393)
		170	A193	3.41 (393)	3.38 (2*393)	2.92 (2*393)	3.80 (2*393)	3.47 (2*393)	2.94 (2*393)	4.14 (2*393)	3.51 (2*393)	2.98 (2*393)
		180	A252	3.30 (252)	3.28 (2*252)	3.24 (2*393)	3.71 (393)	3.67 (2*393)	3.25 (2*393)	4.43 (2*393)	3.92 (2*393)	3.28 (2*393)
		190	A252	3.19 (252)	3.18 (393)	3.15 (2*393)	3.59 (393)	3.58 (2*252)	3.27 (2*393)	4.32 (2*252)	4.29 (2*393)	3.27 (2*393)
		200	A252	3.09 (252)	3.09 (252)	3.07 (2*252)	3.48 (252)	3.47 (393)	3.36 (2*393)	4.19 (2*252)	4.16 (2*393)	3.35 (2*393)

Spans are based on beam centres, with a 152mm flange width and a minimum end bearing of 50mm.

** In accordance with BS EN 1994-1-1 Clause 9.8.1 (2) - Where the continuous slabs are designed as simply-supported in accordance with 9.4.2 (5), the minimum cross-sectional area of anti-crack mesh reinforcement above the ribs should not be less than 0.4% of the cross-sectional area of concrete above the ribs for propped construction. In order to maximise the FIRE LIMIT STATE spans, increased mesh sizing is required as specified in the above Mesh and Deck Fire Method tables.

*** All mesh covers for all profile types and slab depths are taken as 30mm. However, due to mesh size restriction, the ComFlor® 80 140mm slab depth requires a mesh cover depth of 25mm

Figures in brackets represent the diameter of bar required – one bar in each deck trough positioned 25mm above the trough.

ComFlor® 80 closed ends / Bar Fire Method / Unpropped

Single span deck, single span slab (m) - Normal weight concrete - Eurocode - Beam width 152mm
 (Note: Single span deck with single span slab is only permitted using Bar Fire Method.)



Props	Fire period	Slab depth (mm)	Mesh 0.2% min. reqd.*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
				0.90mm			1.00mm			1.20mm		
None	60 minutes	140	A142	3.52 (10)	3.51 (12)	3.51 (16)	3.79 (10)	3.79 (12)	3.75 (16)	4.35 (12)	4.34 (16)	4.34 (16)
		150	A142	3.42 (10)	3.42 (10)	3.42 (12)	3.69 (10)	3.69 (12)	3.68 (16)	4.27 (12)	4.27 (12)	4.26 (16)
		160	A193	3.33 (8)	3.32 (10)	3.32 (12)	3.59 (10)	3.59 (12)	3.59 (12)	4.18 (10)	4.18 (12)	4.17 (16)
		170	A193	3.24 (8)	3.24 (10)	3.23 (12)	3.56 (10)	3.56 (10)	3.55 (12)	4.09 (10)	4.08 (12)	4.07 (16)
		180	A252	3.16 (8)	3.15 (10)	3.15 (10)	3.53 (10)	3.53 (10)	3.53 (12)	3.99 (10)	3.99 (12)	3.98 (12)
		190	A252	3.08 (8)	3.08 (8)	3.08 (10)	3.45 (8)	3.45 (10)	3.45 (12)	3.91 (10)	3.91 (10)	3.91 (12)
		200	A252	3.01 (8)	3.01 (8)	3.01 (10)	3.37 (8)	3.37 (10)	3.37 (10)	3.83 (10)	3.83 (10)	3.83 (12)
None	90 minutes	150	A142	3.42 (12)	3.41 (16)	3.41 (16)	3.68 (16)	3.68 (16)	3.66 (20)	4.26 (16)	4.25 (20)	4.25 (20)
		160	A193	3.32 (12)	3.31 (16)	3.31 (16)	3.56 (12)	3.58 (16)	3.57 (20)	4.17 (16)	4.17 (16)	4.16 (20)
		170	A193	3.23 (12)	3.23 (16)	3.23 (16)	3.55 (12)	3.55 (16)	3.55 (16)	4.07 (16)	4.07 (16)	4.06 (20)
		180	A252	3.15 (12)	3.15 (12)	3.14 (16)	3.53 (12)	3.52 (16)	3.52 (16)	3.98 (16)	3.98 (16)	3.97 (20)
		190	A252	3.08 (10)	3.08 (12)	3.07 (16)	3.45 (12)	3.44 (16)	3.44 (16)	3.90 (16)	3.90 (16)	3.89 (20)
		200	A252	3.01 (10)	3.01 (12)	3.00 (16)	3.37 (12)	3.37 (12)	3.36 (16)	3.83 (12)	3.82 (16)	3.82 (16)
None	120 minutes	160	A193	3.30 (20)	3.28 (25)	3.26 (32)	3.55 (25)	3.55 (25)	3.52 (32)	4.14 (25)	4.11 (32)	3.96 (32)
		170	A193	3.22 (20)	3.20 (25)	3.17 (32)	3.52 (25)	3.52 (25)	3.50 (32)	4.05 (25)	4.02 (32)	4.02 (32)
		180	A252	3.13 (20)	3.12 (25)	3.12 (25)	3.49 (25)	3.49 (25)	3.47 (32)	3.96 (25)	3.93 (32)	3.93 (32)
		190	A252	3.06 (20)	3.05 (25)	3.05 (25)	3.43 (20)	3.41 (25)	3.39 (32)	3.87 (25)	3.85 (32)	3.85 (32)
		200	A252	2.99 (20)	2.99 (20)	2.98 (25)	3.35 (20)	3.34 (25)	3.34 (25)	3.80 (25)	3.80 (25)	3.77 (32)

ComFlor® 80 closed ends / Bar Fire Method / Unpropped

Double span (m) - Normal weight concrete - Eurocode - Beam width 152mm



Props	Fire period	Slab depth (mm)	Mesh 0.2% min. reqd.*	Total applied load (kN/m ²)								
				5.00	7.50	10.00	5.00	7.50	10.00	5.00	7.50	10.00
				0.90mm			1.00mm			1.20mm		
None	60 minutes	140	A142	3.87 (10)	3.86 (12)	3.85 (16)	4.34 (12)	4.32 (16)	4.32 (16)	4.90 (12)	4.81 (16)	4.80 (20)
		150	A142	3.71 (8)	3.70 (10)	3.70 (12)	4.17 (10)	4.17 (12)	4.15 (16)	4.74 (12)	4.72 (16)	4.72 (16)
		160	A193	3.55 (8)	3.55 (10)	3.54 (12)	4.00 (8)	4.00 (10)	3.99 (12)	4.64 (10)	4.63 (12)	4.62 (16)
		170	A193	3.42 (8)	3.42 (8)	3.42 (10)	3.86 (8)	3.85 (10)	3.85 (12)	4.62 (10)	4.61 (12)	4.60 (16)
		180	A252	3.29 (8)	3.29 (8)	3.29 (8)	3.71 (8)	3.71 (8)	3.71 (10)	4.47 (10)	4.46 (12)	4.45 (16)
		190	A252	3.18 (8)	3.18 (8)	3.18 (8)	3.59 (8)	3.59 (8)	3.59 (10)	4.33 (8)	4.33 (10)	4.32 (12)
		200	A252	3.08 (8)	3.08 (8)	3.08 (8)	3.47 (8)	3.47 (8)	3.47 (8)	4.20 (8)	4.20 (10)	4.19 (12)
None	90 minutes	150	A142	3.70 (12)	3.68 (16)	3.66 (20)	4.15 (16)	4.13 (16)	4.13 (20)	4.72 (16)	4.70 (20)	4.67 (25)
		160	A193	3.55 (12)	3.53 (16)	3.53 (16)	3.98 (16)	3.98 (16)	3.96 (20)	4.62 (16)	4.61 (20)	4.59 (25)
		170	A193	3.42 (10)	3.41 (12)	3.40 (16)	3.85 (12)	3.83 (16)	3.83 (16)	4.60 (16)	4.58 (20)	4.58 (20)
		180	A252	3.28 (8)	3.22 (10)	3.27 (16)	3.70 (12)	3.69 (16)	3.69 (16)	4.45 (16)	4.45 (16)	4.43 (20)
		190	A252	3.18 (8)	3.18 (10)	3.17 (12)	3.59 (10)	3.58 (12)	3.57 (16)	4.31 (12)	4.31 (16)	4.29 (20)
		200	A252	3.08 (8)	3.08 (8)	3.07 (10)	3.47 (8)	3.47 (10)	3.45 (12)	4.19 (12)	4.18 (16)	4.18 (16)
None	120 minutes	160	A193	3.51 (20)	3.49 (25)	3.41 (32)	3.93 (25)	3.87 (32)	3.87 (32)	4.56 (32)	4.56 (32)	3.94 (32)
		170	A193	3.38 (20)	3.36 (25)	3.33 (25)	3.78 (25)	3.78 (25)	3.74 (32)	4.50 (32)	4.50 (32)	4.10 (32)
		180	A252	3.24 (16)	3.26 (20)	3.23 (25)	3.68 (20)	3.65 (25)	3.60 (32)	4.40 (25)	4.35 (32)	4.26 (32)
		190	A252	3.17 (12)	3.15 (20)	3.13 (25)	3.55 (20)	3.53 (25)	3.53 (25)	4.26 (25)	4.22 (32)	4.22 (32)
		200	A252	3.08 (10)	3.06 (16)	3.05 (20)	3.46 (16)	3.44 (20)	3.42 (25)	4.14 (25)	4.14 (25)	4.09 (32)

Spans are based on beam centres, with a 152mm flange width and a minimum end bearing of 50mm.

* In accordance with BS EN 1994-1-1 Clause 9.8.1 (2) - Where the continuous slabs are designed as simply-supported in accordance with 9.4.2 (5), the minimum cross-sectional area of anti-crack mesh reinforcement above the ribs should not be less than 0.2% of the cross-sectional area of concrete above the ribs for unpropped construction. In order to maximise the FIRE LIMIT STATE spans, increased mesh sizing is required as specified in the above Mesh and Deck Fire Method tables.

*** All mesh covers for all profile types and slab depths are taken as 30mm. However, due to mesh size restriction, the ComFlor® 80 140mm slab depth requires a mesh cover depth of 25mm.