

Composite Floor Deck — Europe

Profiled steel sheeting for composite slabs to EN 1994

Profiled steel decking used as permanent formwork and as tensile reinforcement for a composite concrete slab, to the European composite design code. Deck depth is chosen with the span and the slab thickness, and whether the floor can be built without props.

Deck depths and unpropped spans

Deck depth	Unpropped span (typical guidance)	Notes
Up to 60 mm	Up to about 3 m	The common shallow deck for ordinary floor spans
80 mm	Up to about 4.5 m	Deeper rib carries more before propping is needed

Data that is usually specified

Geometry	Narrowly spaced webs with a dovetail or re-entrant shape — the shape is what develops composite action with the concrete
Steel	Galvanised sheet to EN 10346; thickness per the design
Reinforcement	Fabric or bars in the troughs and over supports per the design
Finish	Painted or galvanised soffit; the deck often acts as the ceiling

The number that matters is **the unpropped span for the profile and slab depth in your design**, not a headline deck depth. Tell us the span, slab depth and loading and we will confirm the deck and whether propping can be avoided.

Standards referenced

EN 1994-1-1 (Eurocode 4 — design of composite steel and concrete structures, general rules and rules for buildings) · EN 1993-1-3 (cold-formed members and sheeting) · EN 10346 (coated steel flat products) · EN 1090-2 for execution where it applies

Need a quote? Send the span, slab depth, loading and total area.

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