

Table 1.1. Types of timber used in civil engineering works

Timber type	Young's modulus (modulus of elasticity)	Compressive strength	Tensile strength	Poisson's ratio	Thermal expansion coefficient	Average cost in the UK market
Bamboo						
Birch						
Cedar						
Cherry						
Cross-laminated timber						
Engineered bamboo						
Glulam						
Green timber						
Hardwood						
Laminated veneer lumber (LVL)						
Lime						
Modified wood						
Mahogany						
Oak						
Oriented strand board						
Padauk wood						
Pine						
Plywood						
Sapele wood						
Softwood						
Sycamore						
Tulipwood						

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Unwrot timber / sawn timber						
Walnut						
Wood ash						
Wrot timber						

Table 1.2. Types of concrete used in civil engineering works

Concrete type	Young's modulus (modulus of elasticity)	Compressive strength	Tensile strength	Poisson's ratio	Thermal expansion coefficient	Average cost in the UK market
Air-entrained concrete						
Concrete fibre						
Glass reinforced concrete						
High density concrete						
Lightweight concrete						
Plain/ordinary concrete						
Polymer concrete						
Precast concrete						
Prestressed concrete						
Reinforced concrete						
Self-compacting concrete						
Smart concrete						

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Table 1.3. Types of steel used in civil engineering works

Steel type	Young's modulus (modulus of elasticity)	Compressive strength	Tensile strength	Poisson's ratio	Thermal expansion coefficient	Average cost in the UK market
Alloy steel						
Carbon steel						
Galvanised steel						
High-strength steel						
Stainless steel						

Table 1.4. Types of masonry used in civil engineering works

Masonry type	Young's modulus (modulus of elasticity)	Compressive strength	Tensile strength	Poisson's ratio	Thermal expansion coefficient	Average cost in the UK market
Bagged Concrete Masonry						
Block Masonry						
Brick Masonry						
Composite Masonry						
Gabion Masonry						
Reinforced Masonry						
Stone Masonry						
Veneer Masonry						

Note: The above tables are intentionally left blank. See Research Activity 1 for more details.