

Span tables can be used to determine the size of a timber member of a particular strength class required for a given span. They also tell you what the maximum spacing should be between each section or timber member

## FLOOR JOISTS

SIZE OF JOISTS (mm)	CLEAR SPAN C16 JOIST (M)	CLEAR SPAN C24 JOIST (M)
47 X 95	1.77	2.05
47 X 120	2.40	2.67
47 X 145	2.89	3.22
47 X 170	3.38	3.77
47 X 195	3.87	4.31
47 X 220	4.36	4.85

### Assumptions at 400mm Centers

- Supporting permanent load (excluding self-weight of joists) up to 50kg/m<sup>2</sup>.
- Supporting imposed load up to 150kg/m<sup>2</sup>.
- Joist breadth 47mm.
- Span is clear span between supports.
- At least 40mm bearing on supports.
- If supporting one lightweight partition running perpendicular to joists, reduce span by 10%.
- If supporting lightweight partitions running parallel to joists, provide two additional joists under each partition.

## FLAT ROOF JOISTS

SIZE OF JOISTS (mm)	CLEAR SPAN C16 JOIST (M)	CLEAR SPAN C24 JOIST (M)
47 X 95	1.77	2.04
47 X 120	2.40	2.75
47 X 145	2.89	3.47
47 X 170	3.38	4.20
47 X 195	3.87	4.93
47 X 220	4.36	5.66

### Assumptions at 400mm Centers

- Supporting permanent load (excluding self-weight of joists) up to 50kg/m<sup>2</sup>.
- Supporting imposed load for access and repair only.
- Maximum slope 10 deg.
- Joist breadth 47mm.
- Span is clear span between supports.
- At least 40mm bearing on supports.

The above information is for guidance only and for each individual project expert advice should be sought from a structural engineer or similar.