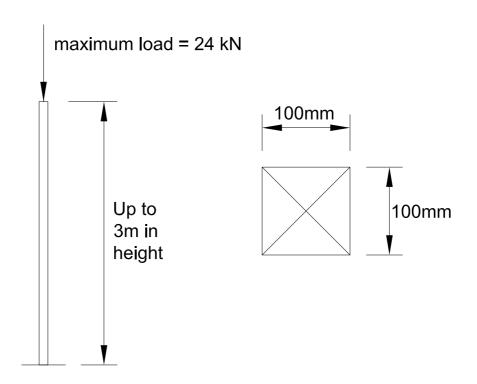
Vertical load capacity of 100mm x 100mm C16 timber post up to 3 metres in height

Slenderness ratio = 3000/28.867 = 103.92 < 180 OK

Therefore K12 = 0.365, interpolated from Table 22 BS 5268

Vertical load capacity,

 $= 6.8 \text{N/mm}^2 \times 0.365 \times 100 \text{mm} \times 100 \text{mm}/10^3 = 24 \text{kN}$



Notes

This design is in accordance with BS 5268-2:2002 Structural use of timber - Part 2: Code of practice for permissible stress design, materials and workmanship.

Timber to be covered, this calculation is not to be used for timber which is fully exposed to the elements.