

category	soundproofing
description	acoustic joist cap
part code	AC200



AC200 ACOUSTIC JOIST CAP is a superb, easy to fit, direct-to-joist system, engineered as a Part E compliant acoustic joist treatment, to save the developer time and money. It can be used in both new build and refurbishment projects for timber and masonry builds.

Proven to be the most effective means of achieving superior sound attenuation, the mass of the structure is placed above the resilient layer. The product is then simply placed over the joists before the mass of the floor is added. The cap is suitable for both rough-cut and planed timber joists.

This product, used upside down, can also provide the resilient layer required for customers to make up their own resilient battens.



100% recyclable

Applications

- Timber and masonry builds
- Part E compliant
- Direct-to-joist application
- Non-specialist installation

Installation

Care should be taken to comply with all relevant safety and building regulations.

- The joist cap can be fitted from either above or below the joists and even before the joists are fitted.
- The jaws of the caps are slightly tapered in to ensure a tight friction fit. Simply open the jaws and sit the cap over the joist ensuring the base is located tightly with the joist surface.
- In all applications, our perimeter isolation strip must be used so the floating floor is fully isolated for the structural floor and walls.

Acoustic Performance

If the product is used as a resilient batten support, on a concrete floor, impact improvements can be expected in the order of:

- Delta L_w 22dB with a standard batten
- Delta L_w 24dB with a deep batten

Robust details only require an improvement of Delta L_w 17dB.

If the product is used as a resilient batten support, on a timber floor, improvements can be expected in the order of:

Delta R_w+C_{tr} 14dB; and Delta L_w 20dB

Robust details only require an improvement of:

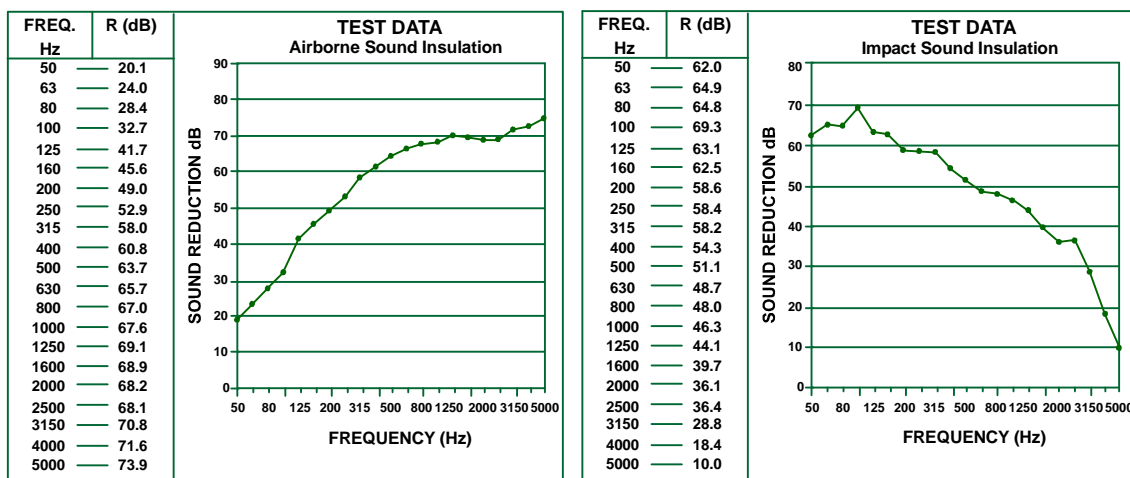
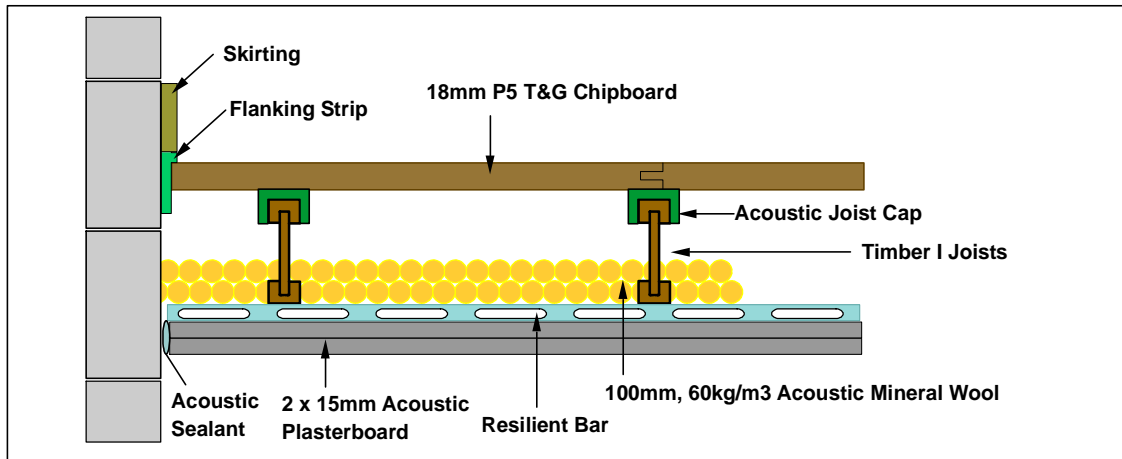
Delta R_w+C_{tr} 13dB and Delta L_w 15dB

Benefits

- No wastage
- No structural change over time
- Lightweight
- CFC- and HCFC-free
- Zero ODP
- Very low toxic fume and smoke emissions
- Moisture resistant
- Rot-proof

Technical Specification

Product	A200 Acoustic Joist Cap
Length	2m
Thickness	12mm
Width	50mm
Density	30kg/m ³
Temperature range	-45°C to 105°C
Heat shrinkage	<1% at 80°C for 96 hours



Tested performance of the above structure (without the 19mm plank):

$$\begin{array}{l}
 \text{Airborne} \quad \text{Impact} \\
 R_w=63\text{dB} \quad (C_{tr}-12) \quad L_{n,w}55\text{dB} \\
 R_w + C_{tr}= 51\text{dB}
 \end{array}$$

Further improvements can be made by placing 19mm gypsum-based plank over the joist caps before installing the 18mm tongued and grooved chipboard.

If this is undertaken first, then improved results will be in the order of:

$$\begin{array}{l}
 \text{Airborne} \quad \text{Impact} \\
 R_w+C_{tr}= 56\text{dB} \quad L_{n,w}50\text{dB}
 \end{array}$$

The subsequent reduction in airborne and impact noise transmission is usually significant and well worthwhile.

