

Acoustic Insulation

FONODAN 50

Auto-adhesive tape for acoustic insulation of plasterboard walls: Stud and track framing.







EPD S-P-04340

FONODAN 50 is a two layer product made of a self-adhesive high density bitumen membrane thermally bonded to a cross-linked polyethylene. FONODAN 50 acoustically works as spring between the gypsum board and frame.

Presentation

Length (cm): 1000Width (cm): 4.6Thickness (mm): 3.9

• Thickness (mm) ~ Standard: EN 1923

m² / package: 3.22
ml/pallet: 42.3
Surface (m²): 0.46
Product code: 610202

Technical Data

Concept	Value	Standard
Mass per unit area (nominal) (kg/m²)	3	EN 1849-1
Improvement of airborne sound insulation between panels; ΔRA	>3	EN 140-1
Thermal conductivity of cross-linked polyethylene (W / m K)	<0.040	EN 12667
Remainder deformation (24h compressed at 50%, 23ºC) (%)	<35	EN 1856
Nominal mass (g/ml)	115	EN 1849-1
Insert Loss; IL (dBA)	>12	-

Concept	Value	Standard
Reaction to fire	F	EN 13501-1
Dynamic stiffness (MN/m³)	<= 100	EN 29052-1
Work temperature (°C)	>10	-
Thickness tolerance (%)	+/- 0,2	EN 823
Tolerance Length and Width (%)	1	EN 822
Hysteresis work (Nm)	>1.9	EN 3386-1

Addtitional Technical Data

Environmental Information

Concept	Value	Standard
Volatile organic compounds (COV's) (μg/m³)	15	ISO 16000-6:2006
Content of recycled raw material (%)	14,4	-
Pre-Consumer recycled content (%)	100	-
Manufactured in	Fontanar - Guadalajara (España)	-

Standards and Certification

- The sound certifications are the result of tests in an approved laboratory.
- *For any questions about information on the tests, please consult our Technical Department.

Laboratory	Test (EN 140-3) No	Result (EN 717-1)
E.U.I.T.T (1)	UPLA 053/01	RA= 37 dBA
E.U.I.T.T (2)	UPLA 054/01	RA= 42.3 dBA

⁽¹⁾ N13 + 50 air cavity + N13

Advantages & Benefits

- Acoustic insulation DnTA>50 dBA.
- By shifting the frequency of coincidence, the lack of privacy that occurs due to the loss of insulation at the previous frequencies (where the human ear is most sensitive) decreases.
- Easy and quick to install.
- High resistance to tearing.
- Improvement of airborne sound level between rigid elements $\Delta RA>3$ dBA.

⁽²⁾ N13 + mineral wood 40 + N13

• Improves the sound insulation of partition walls or wall linings in single-panel systems by minimising the hollow sound.

Instruction for Use

Preliminary operations

- The channel is riveted to the floating floor and the roof. See Danosa Solutions Manual DIV2 and FCH3.
- The gutter is riveted to the floating floor and the roof. See tab AA 11 and AA 12 of the Danosa Sound Insulation Solutions Manual.
- The uprights are then placed every 60 or 40 cm depending on the height and the plasterboard system.
- Once the structure is in place, the FONODAN 50 is adhered following the steps below:

Laying FONODAN 50

- The non-stick plastic is removed from the beginning of the roll and the product is glued to the side of the channel.
- Once the beginning of the roll is attached, the plastic is removed and the band is pressed to the side of the carcass.
- The same procedure is followed for the uprights.
- It is not necessary for the FONODAN 50 strip to be completely end-to-end, as there may be small discontinuities. The important thing is that it is fixed in such a way that it cushions the rigidity of the panel.
- Once the entire structure is covered on the plate side, it is fixed with sheet metal screws according to the proposed system.
- The gypsum plasterboards are sealed and taped according to the criteria of the respective manufacturer.

Laying on tile battens.

• Once the battens have been laid, the Fonodan 50 is fixed according to the previous section.

Laying on wooden battens.

- Once the levelling mortar has been cleaned and the timber framework has been prepared, it is fixed to the base of the framework as described in "Laying Fonodan 50".
- For greater effectiveness of the system, it is recommended to fix the framework with staples on top of it, making a floating frame.
- Finally, fix the decking to the framework with nails 2 cm longer than the thickness of the wood strip.

Indications and Important Recommendations

- The floating mortar must be strong enough to prevent cracking. (See SPD No. 1.3).
- The facade cladding in a building must end at the dividing wall between different users. See SPD 2.1
- Installations or elements liable to cause vibrations inside the partition walls shall be protected by cross-linked PE shells. See SPD 2.3
- The structure's anchorages must not be fixed to the building structure except on the roof. See SPD 3.2
- In order for the system to be perfectly determined by the insulation, no unwanted lateral transmissions must occur.
- Set back the partition wall on the pillars.
- Impact sound insulation (e.g. Impactodan System) must be used. See SUF1, SUF2 and SUF3 data

sheets.

- It will be taken into account that this product is part of a Sound Insulation system, so the Danosa Constructive Solutions Catalogue, Sound Insulation Commissioning must be taken into account. "Details of Singular Points" (SPD), as well as the rest of the Danosa documentation.
- Isolated sewage disposal systems with FONODAN BJ or ACUSTIDAN. See BAJ1 and BAJ2 sheet of "Danosa Sound Insulation Solutions.