danosa
Building together

RehACÚSTICA

ACOUSTIC REFURBISHMENT

Silent solutions for noisy problems.

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ACTION ZONE

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Problem? —> SOLUTION!

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PRODUCTS

RehACUSTICA

Talking about REHACÚSTICA® is talking about invisible comfort, but what is comfort?
Comfort is defined as "Material conditions that provide well-being or convenience"; the use of materials manufactured for this purpose provides an improvement to the conditions in which people finds themselves. Now, to what degree is that well-being achieved? With what amount of materials can we achieve comfort? Is it the same comfort for one person as for another? Are there factors that alter the achievement of this well-being?
With these questions, it's clear that acoustic refurbishment is essential when the desired comfort is not being reached and, at the same time, it will be altered by different factors that reduce the effectiveness of the final result.

1. Design of the elements: Building construction has evolved over time; different regulations have come about, with which the use of some materials contributes a varying degree of insulation.

2. Connection/fixing between elements: The joints between different construction elements will affect the desired solution of the insulation.

3. Alteration of the elements: Over time, inhabitants modify the initial comfort conditions provided by the materials to favour the different uses of the rooms; e.g electrical boxes, perforations…

4. Combination with other elements: The correct arrangement/placement of different insulating materials will ensure the achievement of a high degree of insulation.

5. Surface/volume of the room: It's important to consider the size of the room as this will affect the performance of the insulated surface.

6. Personal Appreciation: In addition to the above and as an subtle consideration, the degree of comfort will differ from person to person. The Technical Building Code sets "minimum" insulation values to guarantee sufficient habitability conditions; although each person has their own desired level of comfort, which is why considering personal comfort is an important and often key factor in achieving the goal of insulation.

REHACÚSTICA® aims to improve the comfort conditions of inhabitants by providing a series of constructive solutions that, to a greater or lesser extent, improve the initial comfort conditions of the end-user depending on their conditioning factors.

REHACÚSTICA® is offered as a resource for buildings that, due to their age, use, or coexistence with neighbours, require an additional contribution of acoustic insulation in order to achieve comfort values for inhabitants.

In order to understand the use of the solutions in this catalogue, you will need to be familiar with the operation of insulation systems, more specifically the contribution offered by the system called "box-in-box or box within a box". You'll need to be familiar with it in terms of noises that are generated by the indirect transmission of sound and in terms of the points mentioned above: Design of the elements, Connection/fixation between elements and Alteration of the elements.

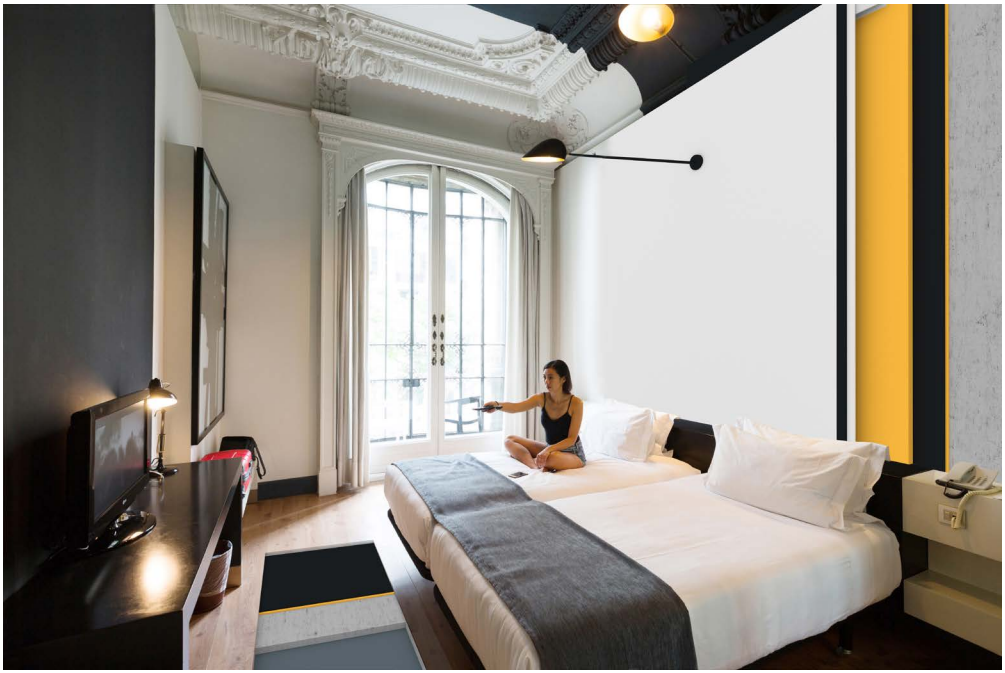
We know that the treatment of only one of the surfaces within a room will notably improve the direct transmission of sound in/from that direction, but it will not subtract the noises that are generated through the adjoining walls. It'll be difficult to quantify the improvement of the insulation solution or provide an approximate value if it doesn't follow a previously tried and tested method within the building.

The purpose of this catalogue is to help the reader understand how acoustic insulation works within construction solutions. Although REHACÚSTICA® defines the acoustic properties of the support element in favour of acoustic rigor and in order not to confuse the user with "universal" values for any type of solution.

Support in horizontal solutions: 140mm of reinforced concrete.

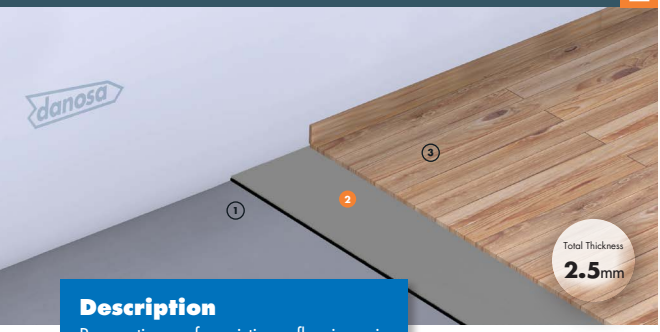
Support in vertical solutions: 10cm double hollow brick.

Although, some solutions present several insulation values for the same solution, which reflects the example of the variation in the insulation improvement depending on the initial insulation of the support element.
In the same way, the insulation value for a product will never be confirmed by itself, since the value is found within a constructive solution and on a specific support element. In this way, REHACÚSTICA® always confirms the insulation values of the full solution.
It's important to clarify that the products used for acoustic insulation solutions do not have UNE standards in the market that standardise them, so they cannot offer CE marking or Declaration of Performance, so in some cases, the justification of compliance of the Technical Code will be associated with obtaining Technical Suitability Documents (DIT) accompanied by the corresponding report by the Official Institute.



BASIC WOODEN FLOOR REFURBISHMENT

RHS1



ΔL_w = 17dB

Acoustic Insulation: Cross-linked Polyethelyne

Finish: Laminated Wood

KEY

Floor:

1. Existing floor
2. Acoustic Insulation **CONFORDAN® ECO**
3. Wooden Flooring

Description

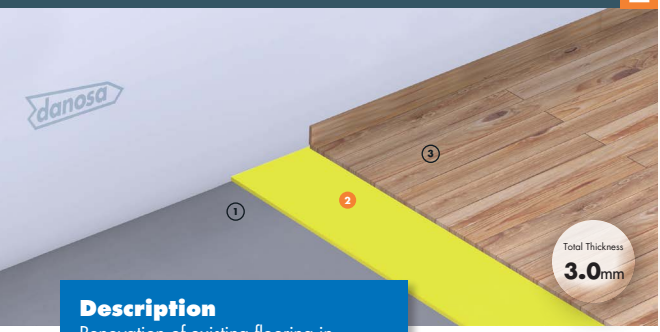
Renovation of existing flooring in private buildings - such as housing - by means of a minimum thickness system that allows rehabilitation on the existing flooring with acoustic insulation against impact noise, obtaining a pleasant sensation of buoyancy.

CONFORDAN® ECO

**Note: This tile is included within a box-in-box acoustic system. See box.*

COMFORT WOODEN FLOOR REFURBISHMENT

RHS2



ΔL_w = 20dB

Acoustic Insulation: Cross-linked Polyethelyne

Finish: Laminated Wood

KEY

Floor:

1. Existing floor
2. Acoustic insulation **IMPACTODAN® BT**
3. Wooden Flooring

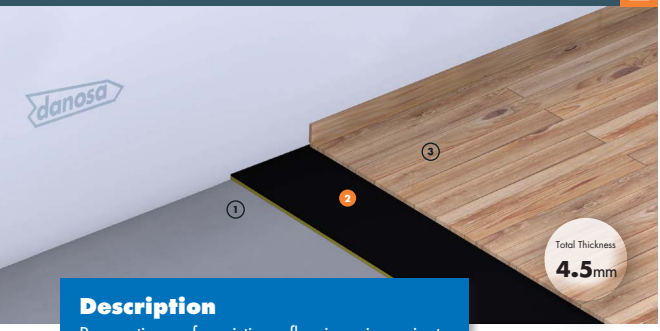
Description

Renovation of existing flooring in private buildings such as homes. A system with very little thickness that allows to rehabilitate on the existing old Floor with acoustic insulation against impact noise. High resistance to humidity and diffusion of water vapor. High resistance to humidity and diffusion of water vapor.

IMPACTODAN® BT

HIGH-PERFORMANCE WOODEN FLOOR RENOVATION

RHS3



ΔR_A > 2dBA
ΔL_w > 22dB

Acoustic Insulation: Multilayer/Cross-linked polyethylene

Finish: Laminated Wood

Floor:

1. Existing flooring
2. Acoustic Insulation **FONODAN® 900**
3. Wooden Flooring

Description

Renovation of existing flooring in private buildings such as homes. Anti-resonant and damping Acoustic Insulation. Reduces the noise of the platform itself. Less noisy. Optimum chemical and thermal resistance. Good resistance to compression. Sensation of comfort in the footstep. It admits small irregularities in the Floor, its aluminum sealing tape reduces the static charge.

FONODAN® 900

REHABILITATION OF BASIC FLOATING FLOOR CERAMIC FINISH

SUF6

ΔR_A > 2dB
ΔL_w = 23dB

Acoustic Insulation: cross-linked polyethylene

Finish: Ceramic flooring

KEY

Floor:

1. Concrete slab or existing floor
2. Cement Adhesive **ARGOCOLA® Élite 500**
3. Acoustic Insulation **FONODAN® 900 HS**
4. Cement Adhesive **ARGOCOLA® Élite 600**
5. Ceramic flooring
6. Grouting Mortar **ARJUNT® Universal**

Description

Rehabilitation of existing flooring in public or private buildings. High traffic commercial premises with ceramic finishes. Extra insulation in damp places on Floating Floor. High flexibility of the mortars that avoid cracks due to differential loads, high resistance to crushing. Provides a sensation of buoyancy to ceramics that imitate wood. Easy and fast adherence of the cement-glue. High resistance to humidity and diffusion of water vapor.

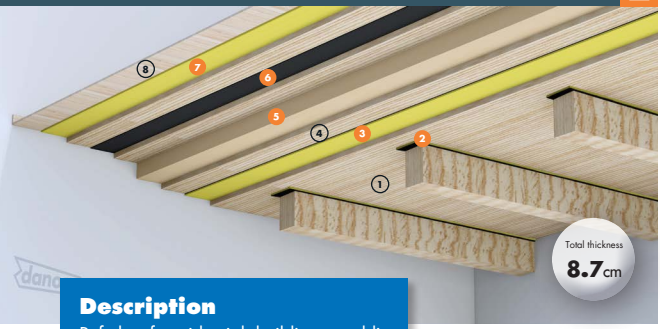
FONODAN® 900 HS

ARGOCOLA® Élite

ARJUNT® Universal

HIGH PERFORMANCE WOODEN FLOORS WITH VISIBLE STRUCTURE

FOR2



DnTA > 55dB
L'nTw < 43dB

Acoustic Insulation: Cross-linked polyethylene, rock wool and anti-resonant and damping band

KEY

Floor:

1. Structure and laminated floor
2. Acoustic Insulation **FONODAN® 50**
3. Acoustic Insulation **FONODAN® 900**
4. Wood laminate
5. Acoustic Insulation Rock Wool
6. Acoustic Insulation **M.A.D.® 6**
7. Acoustic Insulation **IMPACTODAN® BT**
8. Final coating

IMPACTODAN® BT

M.A.D.® 6

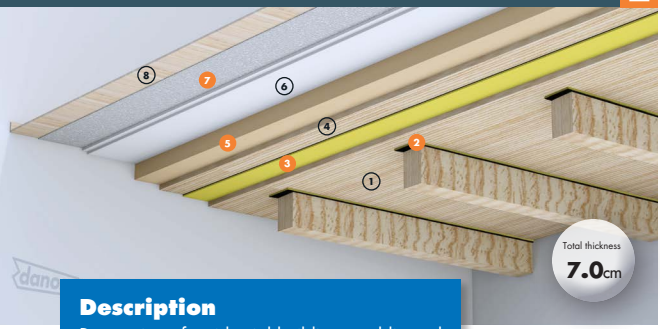
FONODAN® 50

Description

Refurb of residential buildings, public and commercial ground-floor buildings with exposed wooden structures. The membrane between panels improves the insulation for low frequencies by displacing resonant frequencies. It does not require a protective layer against humidity. Thin solution.

HIGH PERFORMANCE WOODEN FLOORS WITH VISIBLE STRUCTURE

FOR3



DnTA > 53dB
L'nTw < 43dB

Acoustic Insulation: Cross-linked polyethylene, rock wool and anti-resonant and damping band.

KEY

Floor:

1. Structure and laminated wood composite
2. Acoustic Insulation **FONODAN® 50**
3. Acoustic Insulation **FONODAN® 900**
4. Wood Laminate
5. Acoustic Insulation Rock Wool
6. Long-lasting plasterboard
7. Acoustic Insulation **CONFORDAN® ECO**
8. Final coating

CONFORDAN® ECO

FONODAN® 900

FONODAN® 50

Description

Renovation of residential buildings, public and commercial ground-floor buildings with exposed wooden structures. The membrane between the panels improves the isolation for low frequencies by shifting the resonant frequencies. Light system that does not produce significant overloads on the existing structure.

REHABILITATION OF BASIC WOODEN FLOORING WITH VISIBLE STRUCTURE

FOR8

DnTA > 40dB
L'nTw < 60dB

Acoustic Insulation: Cross-linked polyethylene membrane

KEY

Floor:

1. Existing floor
2. Acoustic Insulation **IMPACTODAN® 10**
3. Self-leveling mortar **ARGONIV® 420 Élite CT C40 F11**
4. Acoustic Insulation **CONFORDAN®**
5. Finish

Description
Renovation of single-family homes with wooden structures, leaving the wood exposed. Compatible with installations on the floor. Compression resistance.

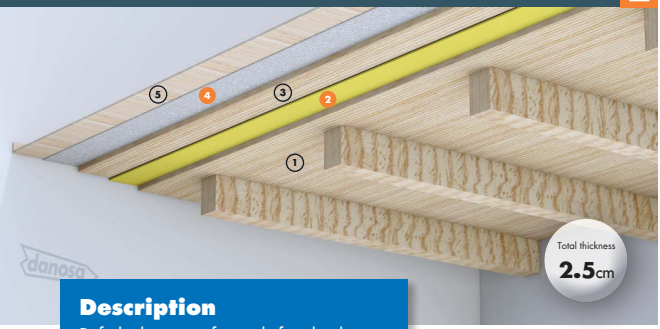
IMPACTODAN® 10

ARGONIV® 420 Élite

CONFORDAN®

REHABILITATION OF REDUCED THICKNESS WOODEN FLOORING

FOR9



DnTA > 35dB
L'nTw < 65dB

Acoustic Insulation: Anti-resonant and damping multilayer cross-linked polyethylene products

KEY

Floor:

1. Existing floor
2. Acoustic Insulation **FONODAN® 900**
3. double lambing composite wood panel
4. Acoustic Insulation **CONFORDAN®**
5. Finish

Description
Refurbishment of single-family homes with wooden structures, leaving the wood exposed. Compatible with installations on the floor. Compression resistance.

CONFORDAN®

FONODAN® 900

BASIC DIRECT RENOVATION OF DIVIDING WALL

RHD1

ΔR_A > 5dBA
(Support mass < 70 kg/m²)

Acoustic Insulation: High-density membrane

KEY

Divider:

1. Dividing wall
2. Acoustic Insulation **M.A.D.® 6 Autoadhesiva**
4. 12.5mm plasterboard

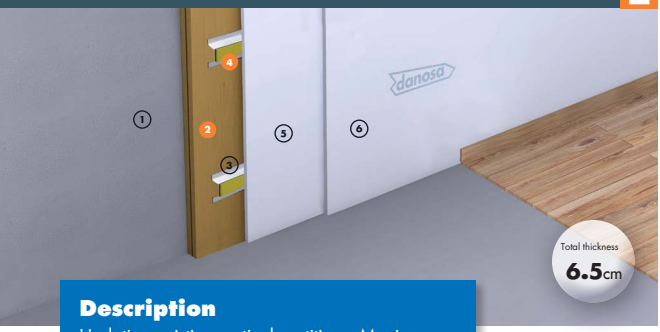
Description

Refurb of existing vertical dividers. At just 19 mm thick, it shifts the resonant frequencies of the system towards less audible frequencies. The acoustic membrane improves the low-frequency isolation of the plasterboard system. The self-adhesive part of the membrane makes assembly easier for the end user. It is a light system with good planimetry, less thickness and faster execution.

M.A.D.® 6 Autoadhesiva

DIRECT COMFORT REFURBISHMENT OF PARTITION

RHD2



ΔR_A > 10dBA
(Suppport mass: 100 a 130 kg/m²)

Acoustic Insulation: High density acoustic membrane with cotton

KEY

Partition:

1. Existing partition
2. Acoustic Insulation **DANOFON®**
3. Omega profile for laminated plaster
4. Acoustic Insulation **FONODAN® 50**
5. 12.5mm plasterboard
6. 12.5mm plasterboard

Description

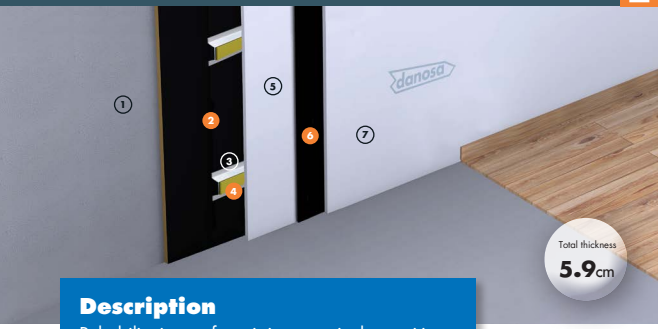
Updating existing vertical partitions, Maximum Acoustic Insulation with a minimal thickness. The multilayer product improves the insulation of the laminated plaster system at low frequencies , absorbing at medium and high frequencies. Its thermal and acoustic insulation capacity can be improved by increasing the thickness of the structure and mineral wool. Light system with good planimetry, less thickness and faster execution.

DANOFON®

FONODAN® 50

DIRECT REFURBISHMENT HIGH PERFORMANCE OF PARTITION

RHD3



ΔR_A > 9dBA
(Support mass: 100 a 130 kg/m²)

Acoustic Insulation: High-density acoustic membrane with cotton / High-density bituminous sheet

KEY

Partition:

1. Partition
2. Acoustic Insulation **ACUSTIDAN® 16/4**
3. Laminated plaster structure
4. Acoustic Insulation **FONODAN® 50**
5. 12.5mm plasterboard
6. Acoustic Insulation **M.A.D.® 4**
7. 12.5mm plasterboard

ACUSTIDAN® 16/4

M.A.D.® 4

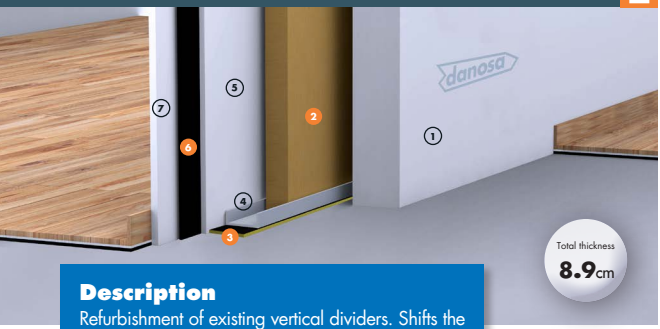
FONODAN® 50

Description

Rehabilitation of existing vertical partitions, contains a multilayer product that improves the low-frequency insulation of the laminated plaster system. Also absorbent at medium and high frequencies. Its thermal and acoustic insulation capacity can be increased by increasing the thickness of the structure and mineral wool. It is a light system with good planimetry, less thickness and faster execution.

BASIC REHABILITATION OF DIVISION

RHD4



ΔR_A > 21dBA
(Support mass: 100 a 130 kg/m²)

Acoustic Insulation: Rock wool/ High density membrane

KEY

Partition:

1. Partition
2. Acoustic Insulation Rock wool
3. Acoustic Insulation **FONODAN® 50**
4. Laminated plaster structure
5. 12.5mm plasterboard
6. Acoustic Insulation **M.A.D.® 6 Autoadhesiva**
7. 12.5mm plasterboard

Rock wool

M.A.D.® 6 Autoadhesiva

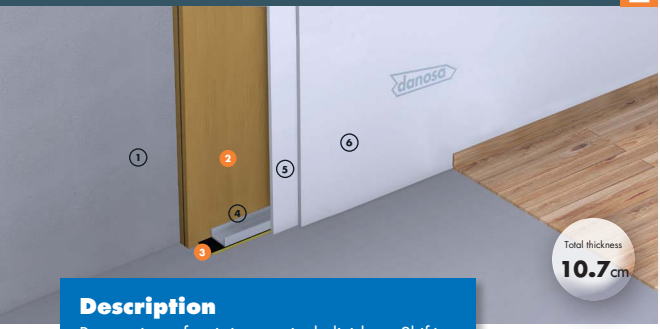
FONODAN® 50

Description

Refurbishment of existing vertical dividers. Shifts the resonant frequencies of the system towards less audible frequencies. The acoustic membrane improves the low-frequency isolation of the plasterboard system. Absorbent at medium and high frequencies. The self-adhesive part of the membrane makes mounting easier for the end user. Its thermal and acoustic insulation capacity can be increased by increasing the thickness of the structure and mineral wool. It is a light system with good planimetry and speed of execution.

COMFORT PARTITION REFURBISHMENT

RHD5



ΔR_A > 22dBA
(Supporting mass: 100 a 130 kg/m²)

Acoustic Insulation: High density acoustic membrane with cotton

KEY

Partition:

1. Partition
2. Acoustic Insulation **DANOFON®**
3. Acoustic Insulation **FONODAN® 50**
4. Laminated plaster structure
5. 12.5mm plasterboard
6. 12.5mm plasterboard

Description

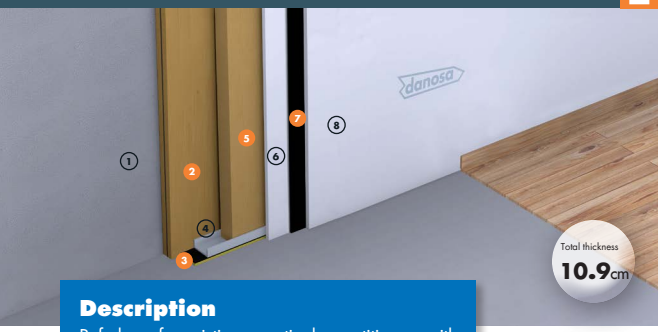
Renovation of existing vertical dividers. Shifting the resonant frequencies of the system towards less audible frequencies. The laminated plaster system with an absorbent pad enhances insulation at medium and high frequencies, while the inclusion of an acoustic membrane in the multilayer system improves insulation at low frequencies. Its thermal and acoustic insulation capacity can be increased by increasing the thickness of the structure and mineral wool. It is a light system and quick to install.

DANOFON®

FONODAN® 50

HIGH PERFORMANCE REHABILITATION OF PARTITION

RHD6



ΔR_A > 25dBA
(Support Mass: 100 a 130 kg/m²)

Acoustic Insulation: High Density Acoustic Membrane with Cotton / Rock Wool / Acoustic Membrane

KEY

Partition:

1. Existing Partition
2. Acoustic Insulation **DANOFON®**
3. Acoustic Insulation **FONODAN® 50**
4. Laminated plaster structure
5. Acoustic Insulation Rock wool
6. 12.5mm plasterboard
7. Acoustic Insulation **M.A.D.® 4 Autoadhesiva**
8. 12.5mm plasterboard

Description

Refurb of existing vertical partitions with maximum Acoustic Insulation. The multilayer product improves the insulation of the laminated plaster system at low frequencies, absorbing medium and high frequencies. Its thermal and acoustic insulation capacity can be improved by increasing the thickness of the structure and mineral wool. Light system with good planimetry, less thickness and faster execution.

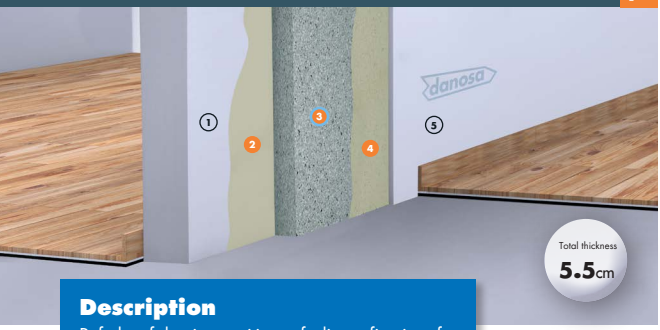
DANOFON®

M.A.D.® 4 Autoadhesiva

FONODAN® 50

DIRECT THERMO-ACOUSTIC REFURB OF PARTITION

TRA4



Description
Refurb of basic partition of direct fixation for noise coming from adjoining spaces. Reduces airborne noise transmission between neighbors in minimum thickness.

ΔR_A > 14dBA
(Support mass: 200 a 250 kg/m²)

Thermo-acoustic insulation: Flexible polyurethane foam chipboard panel

KEY

Partition:

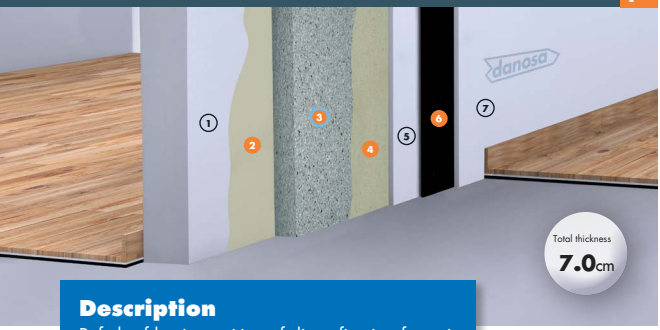
1. Partition
2. Contact adhesive **ABSORDAN® GLUE**
3. Thermo-acoustic insulation: **ABSORDAN® PREN 80**
4. Contact adhesive **ABSORDAN® GLUE**
5. Laminated gypsum board

ABSORDAN® PREN

ABSORDAN® GLUE

DIRECT THERMO-ACOUSTIC COMFORT REFURB OF PARTITION

TRA5



Description
Refurb of basic partition of direct fixation for noise coming from adjoining spaces. Reduces the transmission of airborne noise between neighbors.

ΔR_A > 19dBA
(Support mass: 200 a 250 kg/m²)

Acoustic Insulation: Flexible polyurethane foam chipboard panel / High density membrane

KEY

Partition:

1. Existing partition
2. Contact Adhesive **ABSORDAN® GLUE**
3. Thermo-acoustic Insulation **ABSORDAN® PREN 80**
4. Contact Adhesive **ABSORDAN® GLUE**
5. Laminated gypsum board
6. Acoustic Insulation **M.A.D.® 6**
7. Laminated gypsum board

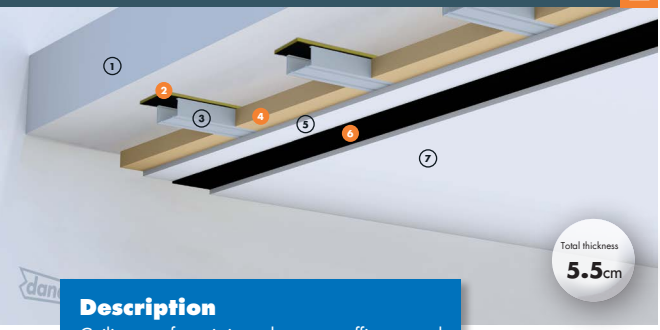
ABSORDAN® PREN

M.A.D.® 6

ABSORDAN® GLUE

DIRECT CEILING REFURB WITH MINIMUM THICKNESS

RHT1



Description

Ceilings of existing homes, offices and premises that require an acoustic improvement with a minimum thickness; for noise problems with neighbors. Mass-spring-mass system with absorber at medium and high frequencies. Rock wool increases the thermal insulation capacity of the system, it is light, with good planimetry and speed of execution.

ΔR_A = 12-7dBA
Ceiling Mass 150kg/m² a 350kg/m²
ΔR_A = 6dBA
Ceiling Mass > 350kg/m²

Acoustic Insulation: Cross-linked polyethylene, rock wool and anti-resonant and damping band

KEY

Floating ceiling:

1. Existing ceiling
2. Acoustic Insulation **FONODAN® 50**
3. Laminated plaster structure
4. Acoustic Insulation: Rock Wool
5. 12.5mm plasterboard
6. Acoustic Insulation: **M.A.D® 6**
7. 12.5mm plasterboard

M.A.D.® 6

FONODAN® 50

DIRECT COMFORT CEILING REFURB

RHT2

Description

For homes, offices and existing premises that require a solution with a minimum thickness and high performance; for noise problems with neighbors. Mass-spring-mass system with absorber at medium and high frequencies. The DANOFON® cotton wad increases the thermal insulation capacity of the system. Light system with good planimetry and speed of execution. It allows to easily solve electrical installations between profiles.

ΔR_a = 15-10dBA
Ceiling Mass 150kg/m² a 350kg/m²
ΔR_a = 9dBA
Ceiling Mass > 350kg/m²

Acoustic Insulation: High density acoustic membrane with cotton

KEY

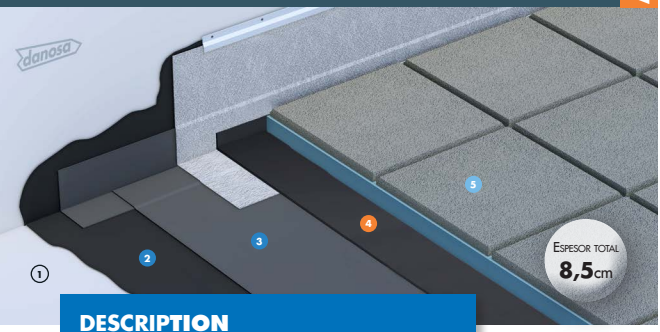
Floating ceiling:

1. Existing ceiling
2. Plaster
3. Acoustic Insulation **DANOFON®**
4. Fixing
5. Laminated plaster structure
6. 12.5mm plasterboard
7. 12.5mm plasterboard

DANOFON®

TRAFFICABLE ACOUSTIC FLAT ROOF

ACU4



ΔR_A > 3dBA
ΔL_w > 23dB

Acoustic Insulation: Cross-linked polyethylene
Thermal Insulation: Extruded Polystyrene (XPS)
KEY:

Roof:

1. Support deck
2. Bituminous primer **CURIDAN®**
3. Waterproofing membrane: **ESTERDAN® 48 P ELAST**
4. Acoustic Insulation **IMPACTODAN® 5**
5. Insulated flooring **DANOLOSA®**

DESCRIPTION

Rehabilitation of inverted flat roof solution paved with preformed thermal solution and Acoustic Insulation to rain noise and people traffic.

IMPACTODAN® 5

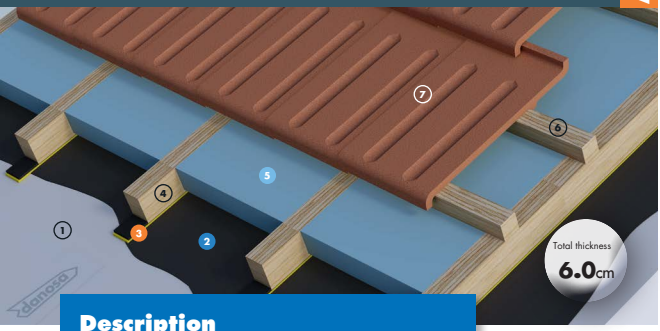
ESTERDAN® 48 P ELAST

DANOLOSA®

CURIDAN®

SLOPED ROOF UNDER RAFTERS

ACU5



ΔL_w = 14 dB

Acoustic Insulation: Cross-linked polyethylene with acoustic membrane
Thermal Insulation: Extruded Polystyrene (XPS)

KEY

Roof:

1. Roof deck
2. Waterproofing membrane **ESTERDAN® PLUS 40 GP/ELAST**
3. Acoustic Insulation **FONODAN® 50**
4. Wooden rafter
5. Thermal insulation **DANOPREN® TR**
6. Batten for tile-fixing
7. Flat tile

Description

Rehabilitation of single-family homes with wooden structures, leaving the wood exposed. Compatible with installations on the floor. Compression resistance.

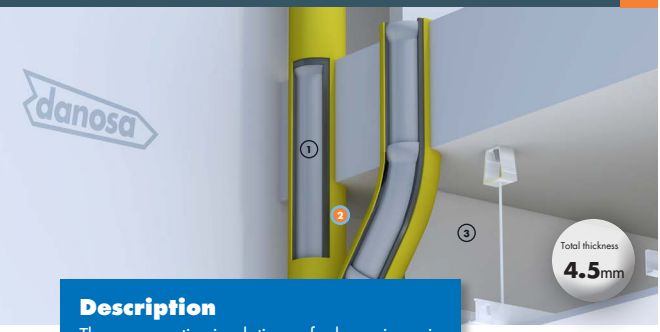
ESTERDAN® PLUS 40 GP/ELAST

DANOPREN® TR

FONODAN® 50

DOWNSPOUTS IN RESIDENTIAL BUILDINGS

BAJ1



IL > 17dBA

Thermal Insulation: Cross-linked polyethylene with acoustic membrane

KEY

Downspout:

1. Downspout
2. Thermal Insulation **FONODAN® BJ**
3. Cladding

Description

Thermoacoustic insulation of downpipes in private and public buildings, anti-resonant and damping. Provides elasticity to the system avoiding structural noises. The reinforcement band in the elbow and toe box increases the cushioning system in the areas where fluids hit. Strengthens the tightness in the union between tubes.

FONODAN® BJ

DOWNSPOUTS IN NOISY PREMISES

BAJ2

IL > 20 dB

Acoustic Insulation: High density acoustic membrane with cotton

KEY

Bajante:

1. Downspout
2. Thermal Insulation **ACUSTIDAN® 16/4**
3. Cladding

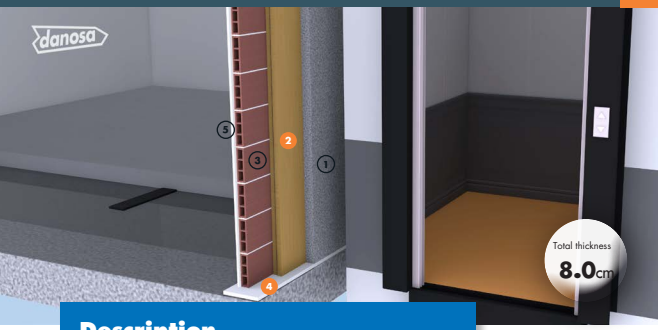
Description

Thermal Insulation of downspouts in commercial premises, prevents noise from the premises from entering the downspout. Dampens the internal noise of the downspout by providing the mass-spring-mass system to the tube. Provides elasticity to the system, avoiding structural noises and thermally insulating conduction.

ACUSTIDAN® 16/4

PARTITION REFURB OF ELEVATORS SHAFTS/MACHINE ROOMS

RH11



ΔR_A > 18dB

Acoustic Insulation: cross-linked polyethylene

KEY

Partition:

1. Existing wall
2. Acoustic Insulation **DANOFON®**
3. Brick wall
4. Acoustic Insulation **Desolidarizador de Muros**
5. Plaster

Description

Refurb of a partition adjacent to noisy rooms such as elevator shafts or machine rooms. Multilayer system composed of an acoustic membrane that provides insulation at low frequencies and a cotton wad that complements the insulation at medium and high frequencies. Interior finish in simple hollow brick masonry. (See also other options in plasterboard finishing according to Danosa's TRA2 solution).

DANOFON®

DESOLIDARIZADOR DE MUROS

ROLLER SHUTTER REFURB

RH12

ΔR_A > 4dBA

Acoustic Insulation: Cross-linked polyethylene

KEY

System:

1. Shutter container
2. Acoustic Insulation **FONODAN® 900**

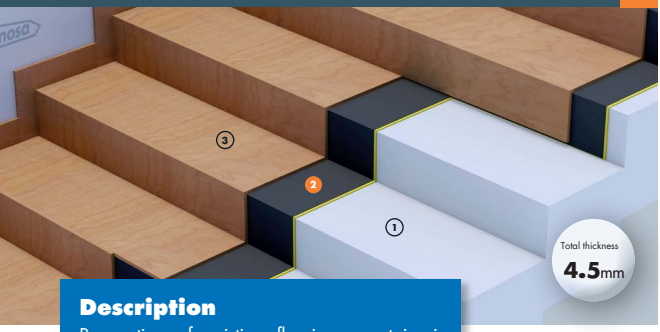
Description

Direct refurb of roller shutters with improved insulation at low frequencies by means of a multilayer product composed of an acoustic membrane and cross-linked polyethylene. Solution with a minimum thickness so as not to hinder the shutter's retraction mechanism.

FONODAN® 900

WOODEN STAIRS REFURB

RH13



ΔR_A > 2dBA
ΔL_w > 20dB

Acoustic Insulation: Cross-linked polyethylene

KEY

Stairs:

1. Existing steps
2. Acoustic Insulation **FONODAN® 900**
3. Wooden flooring

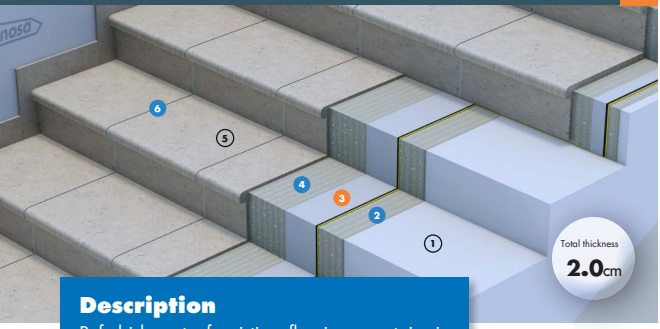
Description

Renovation of existing flooring on stairs in private buildings such as homes. Anti-resonant and sound-damping Acoustic Insulation. Reduces the noise of the platform itself. Less loudness. Optimum chemical and thermal resistance. Good resistance to compression. Sensation of comfort in the footstep. It covers small irregularities in the ground, its aluminum sealing strip reduces the static charge.

FONODAN® 900

CERAMIC STAIR REHABILITATION

RH14



ΔR_A > 2dBA
ΔL_w = 23dB

Acoustic Insulation: Cross-linked polyethylene with acoustic membrane

KEY

Stairs:

1. Existing steps
2. Cement adhesive **ARGOCOLA® Élite 500**
3. Acoustic Insulation **FONODAN® 900 HS**
4. Cement adhesive **ARGOCOLA® Élite 600**
5. Ceramic flooring
6. Grouting mortar **ARJUNT® Universal**

Description

Refurbishment of existing flooring on stairs in public and private buildings, and high-traffic commercial premises with ceramic finishes. High flexibility of the mortars that prevent cracks due to differential loads, high resistance to crushing. Provides a sensation of buoyancy to ceramics that imitate wood. Easy and fast adherence of the cement-glue. High resistance to humidity and diffusion of water vapor.

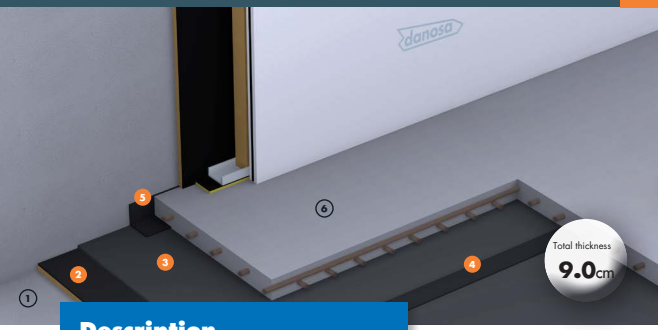
FONODAN® 900 HS

ARGOCOLA® Élite

ARJUNT® Universal

FLOOR FOR MACHINE ROOMS

SUF8



ΔR_A > 10dBA
ΔL_w > 38dB

Acoustic Insulation: Cross-linked polyethylene with acoustic membrane and rock wool / Cross-linked polyethylene

KEY

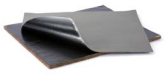
Floor:

1. Existing floor
2. Acoustic Insulation **SONODAN® Plus Autoadhesivo**
3. Acoustic Insulation **IMPACTODAN® 10**
4. Acoustic Insulation **Cinta de solape 70**
5. Acoustic Insulation **Desolidarizador Perimetral**
6. Mortar

Description

Acoustic insulation solution for engine/ machine room. A solution with airborne noise reinforcement and a high level of impact noise insulation. Musical rooms, machine rooms and extraction/ purification rooms in residential buildings.

SONODAN® Plus Autoadhesivo



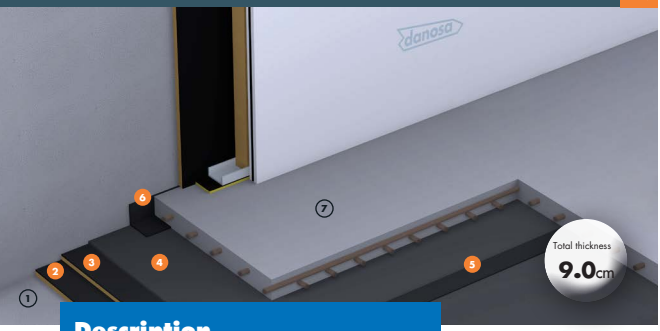
Desolidarizador Perimetral

IMPACTODAN® 10

Cinta de solape 70

FLOOR FOR HIGH-PERFORMANCE MACHINE ROOM

SUF9



ΔR_A > 13dBA
ΔL_w > 33dB

Acoustic Insulation: High density acoustic membrane with cotton / Cross-linked polyethylene

KEY

Floor:

1. Existing floor
2. Acoustic Insulation **ACUSTIDAN® 16/4**
3. Acoustic Insulation **ACUSTIDAN® 16/4**
4. Acoustic Insulation **IMPACTODAN® 10**
5. Acoustic Insulation **Cinta de solape 70**
6. Acoustic Insulation **Desolidarizador Perimetral**
7. Mortar

Description

Acoustic Insulation solution for machine rooms with a high sound emission level. Solution with airborne noise reinforcement and a high level of impact noise insulation. At the same time, this solution is ideal for places with low emission levels such as TV studios, recording rooms, music rooms and high emission places such as discos, pubs or wedding halls.

ACUSTIDAN® 16/4

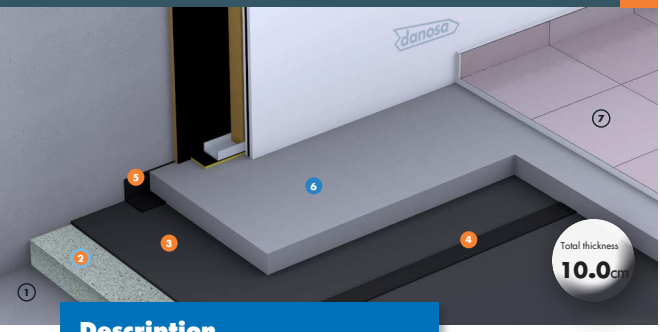
Desolidarizador Perimetral

IMPACTODAN® 10

Cinta de solape 70

REFURBISHMENT FOR NOISY PREMISES

SUF4



Description

Floor renovation for noisy premises that complies in situ with the requirements of the Town Halls for global insulation towards the lower floor > 60 dBA and impact noise L'nTw < 35 dB towards the upper floor.

ΔL_w = 36dB

Acoustic Insulation: Flexible polyurethane foam/Cross-linked polyethylene

KEY

Floor:

1. Existing floor
2. Thermal Insulation **ABSORDAN® PREN 110**
3. Acoustic Insulation **IMPACTODAN® 10**
4. Acoustic Insulation **Cinta de solape 70**
5. Acoustic Insulation **Desolidarizador perimetral**
6. Self-levling mortar **ARGONIV® 420 Élite**
7. Ceramic flooring

ABSORDAN® PREN

IMPACTODAN® 10

Desolidarizador Perimetral y Cinta de solape 70

ARGONIV® 420 Élite

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RehACOUSTICA PRODUCTS

MULTILAYER PANELS. MULTILAYER MATERIALS FOR INSULATION AT LOW, MEDIUM AND HIGH FREQUENCIES.

DANOFON®

A multilayer compound made up of a high-density bituminous-based sheet and a blanket on each side made up of cotton and recycled textile fibers bound with phenolic resin.

	Code	Name	Dimensions (m)	Thickness (mm)	m²/palelt	Airborne noise insulation
	610090	**DANOFON®**	6 x 1	28	54	54 dBA*

Basic Installation

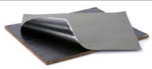




SONODAN® PLUS Autoadhesivo

It is a multilayer product that is divided into two differentiated layers. This differentiation allows counterbalancing during commissioning, reducing the risk of a lack of tightness:

- First layer: Made up of cross-linked polyethylene and a high-density bituminous sheet finished in a self-adhesive film with non-stick plastic.
- Second layer: Formed by a high-density bituminous sheet finished in a self-adhesive film with non-stick plastic and an absorbent panel of rock wool.

	Code	Name	Dimensions (m)	Thickness (mm)	m²/pallet	Panels/palet
	610060	**SONODAN® PLUS Autoadhesivo**	1.20 x 1	40	48	40

Basic Installation





**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

ACUSTIDAN®

A multilayer compound made up of a high-density elastomeric membrane and a blanket made of recycled cotton and textile fibers bound with phenolic resin.

	Code	Commercial Name	Dimensions (m)	Thickness(mm)	m²/pallet	Airborne noise insulation
	610083	**ACUSTIDAN® 16/2**	6 x 1	18	72	35 dBA*
	610080	**ACUSTIDAN® 16/4**		20	72	38.5 dBA*

Basic Installation



SOUND DAMPING MATERIALS TO REDUCE IMPACT NOISE

IMPACTODAN®

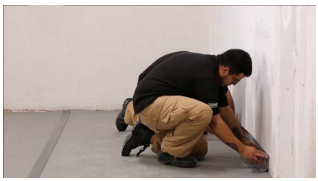
A flexible, chemically cross-linked, polypropylene flexible sheet which results in an elastic internal structure. Acoustically it works as a shock absorber applied in a mass-spring-mass system.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	Mechanical rigidity	Compression resistance	ΔLw
	620015	**IMPACTODAN® 5**	1 x 15	5	<95 MN/m³	>20 KPa	20 dB*
	620005		2 x 50				
	620017	**IMPACTODAN® 10**	2 x 25	10	<65 MN/m³		
	620042	**Desolidarizador de muros**	0.15 x 12.5	10	<100 MN/m³		-
	620044	**Desolidarizador perimetral**	0.2 x 25	3			
	620045	**Cinta de solape**	0.07 x 25	3			

Basic Installation



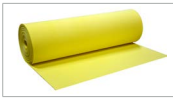




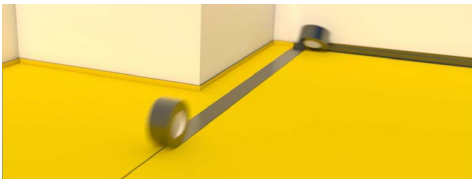

**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

IMPACTODAN® BT

A flexible, closed-cell, chemically cross-linked polyethylene sheet with an elastic internal structure.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	m²/roll	Impact noise insulation
	620051	**IMPACTODAN® BT**	1.06 x 25	3	26.5	20 dB*

Basic Installation



CONFORDAN® ECO

CONFORDAN® ECO is a flexible, chemically cross-linked polyethylene film, closed-cell on one side, which gives the product an elastic internal structure.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	m²/roll	Impact noise insulation
	620031	**CONFORDAN® ECO**	1.00 x 25	2,5	25.00	17 dB*
	620032	**CONFORDAN®**	0.95 x 15	3	14.25	18 dB*

Basic Installation

**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

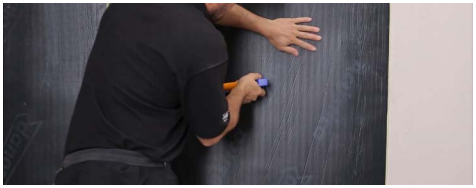
HIGH DENSITY MEMBRANES FOR ACOUSTIC INSULATION. ANTI-RESONANT MATERIALS TO DECREASE VIBRATIONS OF LIGHT RIGID ELEMENTS

Membrana Acústica Danosa M.A.D.®

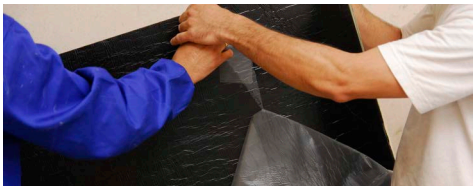
A high density bitumen modified membrane specifically designed to behave as an anti resonant material.

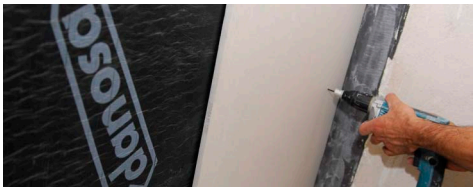
Code	Commercial Name	Dimensions (m)	Thickness (mm)	m²/pallet	Acoustic insulation improvement
610034	**M.A.D.® 2**	12 x 1	2	336	> 3 dB*
610035	**M.A.D.® 4**	6 x 1	4	168	> 6 dB*
610036	**M.A.D.® 4 Autoadhesiva**				
610017	**M.A.D.® 4 Autoadhesiva en placas**	1,20 x 1		150	
610011	**M.A.D.® 6**	4,50 x 1	6	126	> 10 dB*
610018	**M.A.D.® 6 Autoadhesiva**				

Basic Installation (mechanically fixed)



Basic Installation (auto-adhesive)





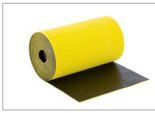
**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

PRODUCTOS RehACÚSTICA

ANTI-RESONANT AND SOUND-DAMPING MATERIALS TO DECREASE SHOCKS AND VIBRATIONS

FONODAN® BJ

A two-layer product made up of a high-density self-adhesive membrane and a chemically cross-linked polyethylene sheet, heat-sealed together.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	Presentation	Insertion loss IL
	610207	**FONODAN® BJ**	0.42 x 10	4	32 rolls/pallet	9 dB*

PUESTA EN OBRA BÁSICA



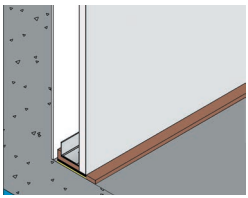
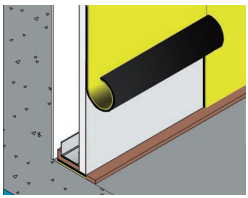
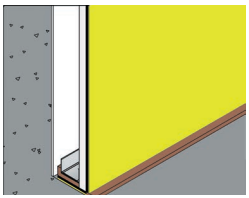
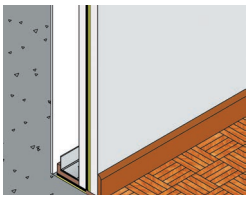

FONODAN® 900

A two-layer product made up of a high-density self-adhesive membrane and a chemically cross-linked polyethylene, heat-sealed together.

	Code	Commercial Name	Dimensiones (m)	Espesor (mm)	m²/palet	Aislamiento a ruido de impacto
	610201	**FONODAN® 900**	0,92 x 10	4	147,2	22 dB*

Basic Installation


Basic Installation (between rigid elements)

**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

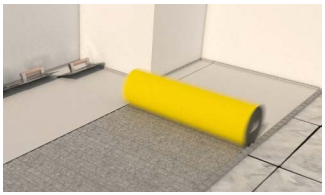
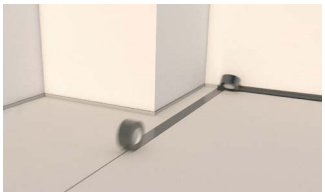
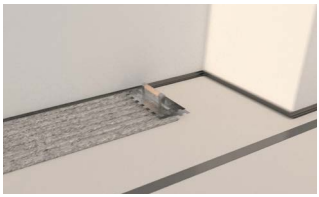
PRODUCTOS RehACÚSTICA

FONODAN® 900 HS

A two-layer product made up of a high-density membrane and chemically cross-linked polyethylene, finished in a heat-sealed geotextile.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	m²/pallet	Impact noise insulation
	610203	**FONODAN® 900 HS**	0.92 x 10	3.9	147.2	23 dB*

Basic Installation


FONODAN® 50, 70 and 130

A two-layer product made up of a high-density self-adhesive membrane and a chemically cross-linked polyethylene heat-sealed together.

	Code	Commercial Name	Dimensions (m)	Thickness (mm)	Presentation	Airborne noise improvement
	610202	**FONODAN® 50**	0.046 x 10	4	7 rolls/box	3 dBA*
	610208	**FONODAN® 70**	0.066 x 10	4	4 rolls/box	
	610209	**FONODAN® 130**	0.132 x 10	4	4 rolls/box	

Basic Installation


**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

ABSORBANT AND ANTIRESONANT MATERIALS FOR AIRBORNE AND IMPACT NOISE

ABSORDAN® PREN

A flexible polyurethane foam chipboard panel for acoustic and thermal insulation.

Code	Commercial Name	Dimensiones (m)	Thickness (mm)	m²/pallet	ΔR_A
730150	ABSORDAN® PREN 80	1.20 x 2	30	96	14 - 19 dBA*
730151			40	72	
730152			80	36	
730153	ABSORDAN® PREN 110	1.20 x 2	20	144	28 - 36 dBA*
730154			30	96	

ABSORDAN® GLUE

Contact adhesive for fixing ABSORDAN® PREN acoustic panels to vertical and horizontal partitions, easy to apply, quick-drying and durable over time.

Code	Commercial Name	Volume (L)	Rendimiento aproximado
730155	ABSORDAN® GLUE	5	200 - 250 mL/m²
730156		20	

SPECIAL MORTARS

ARGOCOLA® ÉLITE

A high-performance, deformable cementitious adhesive formulated on the basis of Portland cement, which will be used to seal walls and slabs at the same time that we glue the insulation material (give a thin layer to the insulation).

Code	Commercial Name	Colour	Volume (kg)	Unidades/ palet	Deformación transversal	Rendimiento aproximado
350310	ARGOCOLA® ÉLITE 500 C2 TE S1	Gris	25	56	≥ 2,5 mm	4.5 kg/m²
350311		Blanco				
350197	ARGOCOLA® ÉLITE 600 C2 TE S2	Blanco			≥ 5 mm	

ARGONIV® 420 ÉLITE

A self-leveling mortar based on hydraulic binder, selected aggregates, polymers and chemical additives as a low Thickness floating mortar within mass-spring-mass systems.

Code	Commercial Name	Colour	Volume (kg)	Unidades/palet	Rendimiento aproximado
350022	ARGONIV® 420 ÉLITE CT C40 F11	Gris	25	56	18 kg/m² at 1cm thick

**Insulation values refer to a specific solution. For more information on test results, consult Danosa's technical department.*

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