acoustic noise barrier

WAVEBAR













WAVEBAR ORIGINAL

Wavebar® is a high-performance, flexible mass-loaded vinyl noise barrier, offering superior acoustic transmission loss. Wavebar was designed to meet market

PROVIDING COMFORT AND PRIVACY

Wavebar is a high performance, flexible, mass-loaded vinyl noise barrier, offering superior acoustic transmission loss. Australian made, it enjoys an unparalleled 40+ years reputation in providing effective industry-leading performance in controlling noise. Wavebar was developed to meet market requirements for reducing noise in the domestic, commercial and industrial markets. It can be used to increase transmission loss therefore reducing noise transfer in walls and ceilings, to control the level of crosstalk between acoustically sensitive rooms, to reduce inter-office noise transmission providing comfort, privacy and confidentiality, for the control of external noise interference from aircraft, traffic and rain, and to increase performance of existing structures through retrofitting over existing walls and covering with plasterboard.

requirements for reducing noise in the domestic, commercial, industrial and automotive markets.

To achieve this high performance, the Pyrotek engineering team developed Wavebar to be dense, thin, highly-flexible, tear-resistant and strong. These properties give the product high transmission loss throughout the various weight ranges.

Stiff lightweight panel constructions, such as plasterboard, drywall, plywood and hollow core walls, typically have coincidence dip resonance which allows noise to transmit through a construction. The coincidence dip is dependent on the material's stiffness and thickness and occurs at the point where the sound transmitted through the structure matches the natural frequency of the panel.

Wavebar prevents coincidence dip resonance. The dense core mass layer reflects and absorbs the transmission of sound through walls, ceilings and floors, reducing the critical frequencies generated from mechanical equipment, engine

noise and electronic audio technologies such as radio and television.

Wavebar products are environmentally safe, contain no ozone-depleting substances and comply with European and Australian standards for Volatile Organic Compound (VOC) emissions.

FEATURES

- Low cost, long lasting with over 40 years' industry use
- No ozone depleting substances generated during manufacture
- Free from lead, odour-producing oils and bitumen
- Easily installed in awkward places
- Easy to cut, sew and mechanically fasten into position
- Resistant to most chemicals, solvents and petrol
- Resistant to weather and UV light
- Tear resistant with high tensile strength. Ability to be suspended in lengths of up to 5m
- Available in various weights, widths, roll lengths and sheet sizes
- Available with various laminates such as foil, metallised film, foams and polyesters

APPLICATIONS

- Inside cavities or over lightweight wall, ceiling and floor constructions. Ideal for home theatre rooms, office partitions, meeting rooms
- Between the plenum chamber of a floor slab, the roof and adjoining partition walls
- Acoustics doors to improve performance
- Portable acoustic curtains and screens
- Easily draped over fencing to create an acoustic barrier
- Automotive cabin application to reduce engine and road noise transmitting through a structure
- Can be laminated onto lightweight structures to damp vibration and reduce airborne noise

WAVEBAR NONLITE

Wavebar® Nonlite is a high performance foil faced mass-loaded vinyl noise barrier offering superior acoustic transmission loss. It was developed to meet stringent fire requirements in building and transport sectors.

Nonlite complies with British Standard 476 Part 6 and 7 to achieve the highest Class 0 fire rating and Australian Standard 1530 Part 3 to achieve a four zero rating. These are the highest fire ratings achievable. The foil facing not only enhances the low spread of flame characteristics but also makes it easy to bond onto other substrates using matching Tape ALR adhesive, or equivalent.

Stiff lightweight panel constructions, such as plasterboard, drywall, plywood and hollow core walls, typically have coincidence dip resonance which allows noise to transmit through a construction. The coincidence dip is dependent on the material's stiffness and thickness and occurs at the point where the sound transmitted through the structure matches the natural frequency of the panel.

Nonlite prevents coincidence dip resonance. The thin, dense mass barrier reflects and absorbs the transmission of sound through walls, ceilings and floors, reducing the critical frequencies generated from mechanical equipment, engine noise and electronic audio technologies such as radio and television.

Nonlite is environmentally safe, contains no ozone depleting substances and complies with European and Australian standards for Volatile Organic Compounds emissions.

FEATURES

- Contains no ozone depleting substances
- Free from lead, unrefined odour-producing oils and bitumen
- Complies to BS476.6 and 7 Class 0
- Complies to China rail fire requirement according to TB standard
- Easy to cut, tape and mechanically fasten into position
- The foil facing also makes it easy to bond onto other substrates using matching Tape ALR adhesive or equivalent.















- Self extinguishes upon removal of flame
- Resistant to water, oil and natural weather conditions
- Tear resistant with high tensile strength. Ability to be suspended in lengths of up to 5 m
- Available in various weights, widths and roll lengths
- Available with various laminates such as foams, polyesters and fibreglass

APPLICATIONS

- Inside cavities or over lightweight wall, ceiling and floor constructions
- Ideal for home theatre rooms, office partitions and meeting rooms
- Applied in marine engine rooms & deck heads to reduce noise transmission
- Rail carriages for under floor insulation to reduce track and break noise
- Designed around the outside of metal air ducts to reduce noise breaking out
- Wrapped around noisy pipes, i.e. fluid or gas pulsation in chemical, petrochemical and waste water treatment plants
- Applied around valves and fan casings.

WAVEBAR OUTDOOR

Typically, Outdoor can be designed as partial or complete enclosures around noise sources to reduce noise transference.

Outdoor can also be laminated to Sorberfoam™ or Sorberpoly™ to create a curtain that will reflect and also absorb noise within an enclosure. It can easily be cut and fabricated into various shapes to suit any design or area. The extraordinary strength of Outdoor provides the versatility to hang or drape in long lengths, with the attachment of velcro seals to create easy accessibility to the enclosure. Acoustic curtains are especially useful around industrial equipment and building sites, since curtains offer more versatility and economy than rigid installations.

Outdoor prevents coincidence dip resonance. The thin, dense mass barrier reflects and absorbs the transmission of sound through walls, ceilings and floors, reducing the critical frequencies generated from mechanical equipment, engine noise and electronic audio technologies such as radio and television.

Outdoor is environmentally safe, contain no ozone depleting substances and complies with European and Australian standards for Volatile Organic Compounds emissions.

FEATURES

- Low cost, long lasting with over 40 years' industry use
- No ozone depleting substances are generated during manufacture
- Easy to cut, sew, high frequency weld, or mechanically fasten into position
- Able to attach velcro, eyelets and grommets







- Resistant to most chemicals, solvents and petrol
- Resistant to weather and UV light
- Ability to suspend in lengths in excess of 20 metres
- High tear resistance, tolerates high wind conditions
- Available in various weights, widths & roll lengths
- Choice of five colours military green, royal blue, grey, yellow and orange
- Available with various laminates such as Sorberfoam™ or Sorberpoly™

APPLICATIONS

- Both indoor and outdoor applications
- Around construction sites to reduce environmental noise issues
- Acoustic expansion joints to reduce break-out noise in air conditioning duct systems
- Portable acoustic curtains and screens. Easily draped over fencing to create an acoustic barrier
- Enclosures for industrial equipment such as punch presses, blowers, drop saws, granulators and generators
- Ideal noise curtain for portable mobile equipment including jack hammers, drilling rigs and pile drivers
- Can be designed to be installed into a C-track support system for moveable / concertina curtains

WAVEBAR QUADZERC

Wavebar® Quadzero is a high performance, foil-faced, mass-loaded vinyl noise barrier, offering superior acoustic transmission loss and low spread of flame surface covering. Quadzero was developed to meet market noise reduction requirements in the domestic, commercial, industrial and OEM sectors.

To achieve this high performance, the Pyrotek engineering team developed Quadzero to be dense, thin, strong, tear-resistant and highly flexible. These properties give the product high transmission loss throughout the various weight ranges. It complies with British and International fire and building codes for low spread of flame. Stiff lightweight panel constructions, such as plasterboard, drywall, plywood and hollow core walls, typically have coincidence dip resonance which allows noise to transmit through a construction. The coincidence dip is dependent on the material's stiffness and thickness and occurs at the point where the sound transmitted through the structure matches the natural frequency of the panel.

Quadzero prevents coincidence dip resonance. The thin, dense mass Quadzero barrier reflects and absorbs the transmission of sound through walls, ceilings and floors, reducing the critical frequencies generated from mechanical equipment, engine noise and electronic audio technologies such as radio and television.



Quadzero products are environmentally safe, contain no ozone-depleting substances and comply with European and Australian standards for Volatile Organic Compound emissions.

FEATURES

- Low cost and long lasting with over 40 years' industry use
- No ozone depleting substances generated during manufacture
- Complies to IMO 653.16 low spread of flame.
- Complies to AS1530.3 & BS 467.6/7 building codes
- Free from lead, odour-producing oils and bitumen
- Easily installed in awkward places
- The foil facing also makes it easy to bond onto other substrates using matching Tape ALR adhesive or equivalent.
- Easy to cut, sew, tape and mechanically fasten into position
- Resistant to water, oil and natural weather conditions
- Tear resistant with high tensile strength. Ability to be suspended in lengths of up to 5 metres
- · Available in various weights, widths and roll lengths
- Available with various laminates such as foams, polyesters and fibreglass

APPLICATIONS

- Inside cavities or over lightweight wall, ceiling and floor constructions. Ideal for home theatres, office partitions, meeting rooms.
- Over roof joists to reduce aircraft, rail and traffic noise.
- Applied between the plenum chamber of a floor slab, roof and adjoining partition walls.
- Installed around the outside of metal air ducts to reduce noise break-out.
- Wrapped around noisy pipes, e.g. fluid or gas pulsation in chemical, petrochemical and waste water treatment plants.
- Wrapped around valves and fan casings.
- Automotive firewalls to reduce engine and road noise transmitting through the structure.
- Rail carriages for under floor insulation to reduce track and braking noise.

WAVEBAR DBX

Wavebar® dBX is a high performance, flexible, mass-loaded, polymer noise barrier offering superior acoustic transmission loss. dBX represents the latest in alternative noise barrier technology using recycled polymers that are halogen-free. It was developed to meet market noise reduction requirements for the domestic, commercial, industrial, automotive and marine markets.

Wavebar dBX is available with a reinforced foil facing. This high performing product was engineered by Pyrotek to achieve a self-extinguishing, low smoke emission, thin, strong and highly flexible product. These properties, combined with foil facing, give dBX added strength, high transmission loss and fire rating, complying with IMO 653.16 marine standard, and building code for low spread of flame. The foil facing also makes it easy to bond onto other substrates using matching Tape ALR adhesive or equivalent.







Stiff lightweight panel constructions, such as plasterboard, drywall, plywood and hollow core walls, typically have coincidence dip resonance which allows noise to transmit through a construction. The coincidence dip is dependent on the material's stiffness and thickness and occurs at the point where the sound transmitted through the structure matches the natural frequency of the panel.

dBX prevents coincidence dip resonance. The thin, dense mass barrier reflects and absorbs the transmission of sound through walls, ceilings and floors, reducing the critical frequencies generated from mechanical equipment, engine noise and electronic audio technologies such as radio and television.

dBX products are environmentally safe, contain no ozone-depleting substances and comply with European and Australian standards for Volatile Organic Compound emissions.

FEATURES

- No ozone-depleting substances generated during manufacture
- Free from lead, odour-producing oils, halogens and bitumen
- Complies with IMO 653.16 (low spread of flame) and AS1530.3 (low smoke emission) for foil faced
- Easy to cut, tape and mechanically fasten into position
- Self-extinguishes upon removal of flame, does not drip
- Resistant to water, oil and natural weather conditions
- Tear-resistant with high tensile strength
- Thermo-formable into different shapes (without foil facing)
- Available in various weights, widths and roll lengths
- Available with various laminates such as fabrics, foams and polyester fibre

APPLICATIONS

- Marine engine rooms and deck heads to reduce noise transmission
- Rail carriages for under floor insulation to reduce track and braking noise
- Inside cavities or over lightweight wall, ceiling and floor constructions. Ideal for theatres, office partitions, meeting rooms and high privacy areas.
- Between the plenum chamber of a floor slab, roof and adjoining partition walls
- Acoustic doors to increase transmission loss
- · Automotive cabin application to reduce engine and road noise transmitting through the structure
- Can be laminated onto lightweight structures to dampen and reduce airborne noise
- Usable where moulded parts or components are required

For technical information, test results and mechanical proprieties please refer to the product information page which can be found on our website www.pyroteknc.com - when on the website use the quick navigation to locate the wavebar product you want more detail on.





www.pyroteknc.com

PYROTEK NOISE CONTROL WORLWIDE LOCATIONS

AUSTRALIA

CANADA

CHINA

CZECH REPUBLIC

HONG KONG

INDIA

INDONESIA

JAPAN

KOREA

MALAYSIA

SINGAPORE

NEW ZEALAND

TAIWAN

THAILAND

TURKEY

UNITED ARAB EMIRATES

UNITED KINGDOM

UNITED STATES OF AMERICA

VIETNAM

CONTACT DETAILS for further information and contact details, please visit our website at www.pyroteknc.com



Pyrotek endorse forest sustainability and the preservation of natural environment. We procure the highest quality materials from suppliers who hold FSC (Forest Stewardship Council) Certification and PEFC (Programme for the Endorsement of Forestry Certification) amongst other certification programmes.

Caveats: Specifications are subject to change without notice. The data in this document are typical of average values based on tests by independent laboratories or by the manufacturer and are indicative only. Materials must be tested under intended service conditions to determine their suitability for purpose. The conclusions drawn from acoustic test results are as interpreted by qualified independent testing authorities. Nothing here releases the purchaser/user from responsibility to determine the suitability of the product for their project needs. Always seek the opinion of your acoustic or mechanical engineer on data presented by the manufacturer. Due to the wide variety of individual projects, Pyrotek No: Is not responsible for differing outcomes from using their products. Pyrotek disclaims any liability for damages or consequential loss as a result of reliance solely on the information presented. No warranty is made that the use of this information or of the products, processes or equipment to which this Information Page refers will not infringe any third party's patents or rights. DISCLAIMER: This document is covered by Pyrotek standard Disclaimer, Warranty and © Copyright clauses. See www.pyroteknc.com/disclaimer.

