acoustica®
the quiet Australian

QuietWave® Noise Barrier

QuietWave® is a high performance noise barrier delivering exceptional performance.

QuietWave® flexible noise barrier and vibration damping material, is typically used in walls, floors, ceilings and pipe lagging. The product can also be applied to doors, partitions and furniture applications to reduce airborne noise and vibration transfer.

QuietWave®

- ✓ Exceeds the Building Code of Australia (BCA) minimum requirements
- ✓ Can achieve the highest AAAC acoustic rating of 6 stars
- ✓ Thinnest and lightest possible wall system for the highest acoustic rating
- ✓ Most economic 6 star rating wall system available
- ✓ Low VOC's (Less than a recognised threshold of 0.5mg "Green Star")

Acoustica's QuietWave® noise barrier isolates noise and dampens sound vibration increasing the sound transmission loss.

QuietWave® viscoelastic noise barrier parallels the theoretical performance of the ideal limp mass barrier.

The development of QuietWave® noise barrier has been achieved with a matching acoustic performance of R1,cw 27 for the 2.5kg/m^2 (Wilkinson & Murray test results following page).

QuietWave® has been certified by the CSIRO Division of Materials Science and Engineering as Group 1 Fire Rated

Tests are showing that when QuietWave® is sandwiched between two layers of 13mm Firecheck plasterboard, the Sound Transmission Loss (STL) achieves is equivalent to 5 layers of the same plasterboard.

QuietWave® is incorporated into Acoustica's range of acoustic products for walls, partitions, floors, ceilings and pipe lagging.

Typical Applications:

- Multi-residential walls and ceilings
- Retrofits
- High Confidentiality partition wall systems (for Lawyers, Doctors, Dentists, etc)
- Commercial walls and ceilings
- Improving existing partition wall & ceiling performance
- Sole occupancy unit dividing walls
- Boardroom and office division walls

acoustica

Grd Flr, 6A Nelson St
Annandale 2038
NSW Australia

1300 722 825
T +61 2 9550 2900
F +61 2 9550 5665

info@acoustica.com.au
www.acoustica.com.au

Distributor Cyprus: M. A. Total Build Ltd
149 Arch. Makarios III Avenue, 3021 Limassol, Cyprus
Email: info@totalbuild.com.cy Tel: +357 99 121841 Fax: +357 25 381403

The natural Environmental and Acoustic Choice

QuietWave®

Highest Performing Barrier

Acoustic Performance Index*

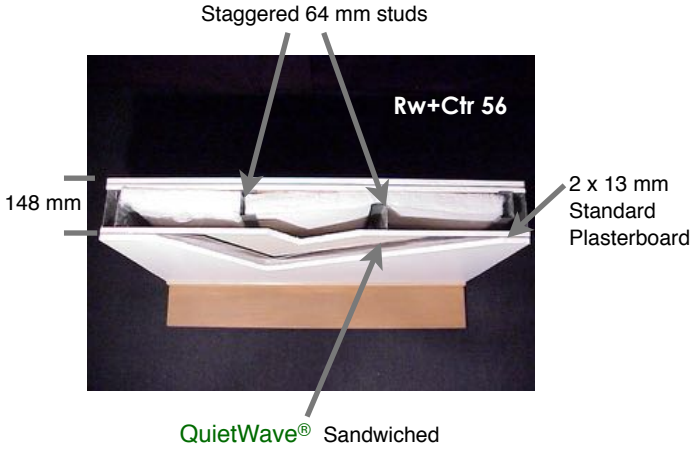
When the concept of Acoustic Performance Index is applied to the QuietWave® wall system, the score is extremely high. Acoustic Performance Index takes into account the cost of the wall compared to its acoustic performance and to the thickness of the wall and the floor space cost.

The QuietWave® wall system is only 148 mm wide and has an acoustic performance that can only be matched by the best wall system at 280 - 300 mm wide.

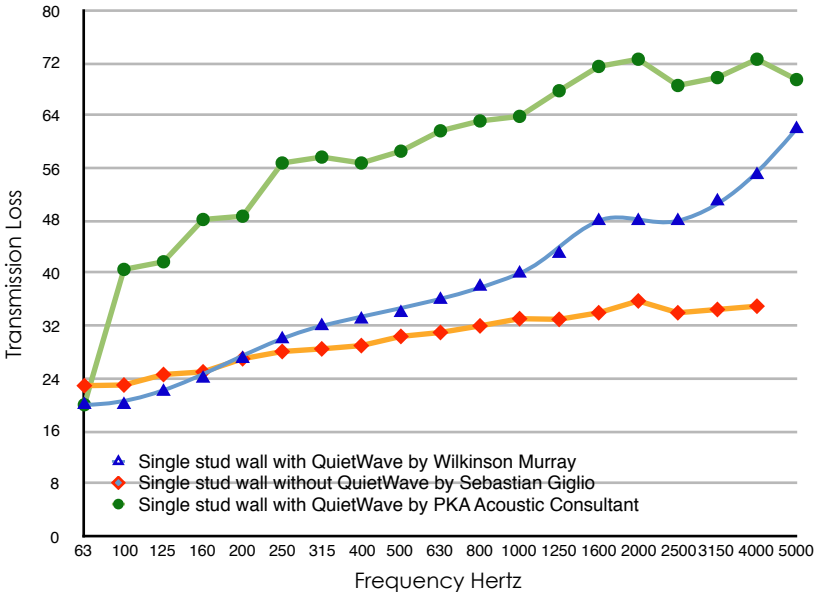
QuietWave available in rolls 1.3m x 5.4m

* Comments by PKA Acoustic

A typical high performance partition wall



Comparison Transmission Loss Test Results



Typical QuietWave® wall construction system = Rw + Ctr 56 *

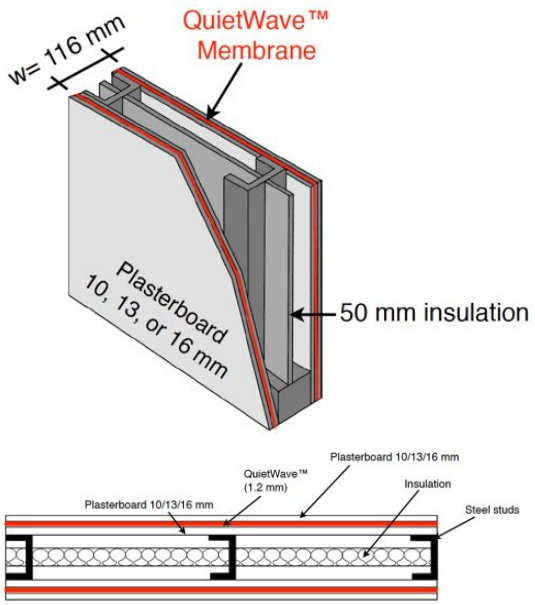
- One 13 mm standard plasterboard
- One 1.2 mm QuietWave® visco-elastic membrane

- One 13 mm standard plasterboard
- 64 mm staggered studs in a 92 mm track
- 50 mm thick insulation
- One 13 mm thick plasterboard
- One 1.2 mm thick QuietWave® visco-elastic membrane
- One 13 mm plasterboard

* PKA test report available on request

Test	Description	R_{lw}
1. Wilkinson Murray (Ref: PD 200813)	QuietWave sandwiched between 2 x 13 mm plasterboard	38 (Ctr-2)
2. Sebastian Giglio (Ref: 204335/D01a)	2 x 13 mm plasterboard panels	33 (Ctr-2)
3. PKA Acoustic Consulting (Ref: 204 202 R01)	148 mm Staggered stud wall with QuietWave sandwiched between 2 x 13 mm plasterboard on both sides of the studs	63 (Ctr-7)

Tel: +61 (2) 9550 2900 Fax: +61 (2) 9550 5665 Email: info@acoustica.com.au



Single Stud Construction - 64mm Cavity

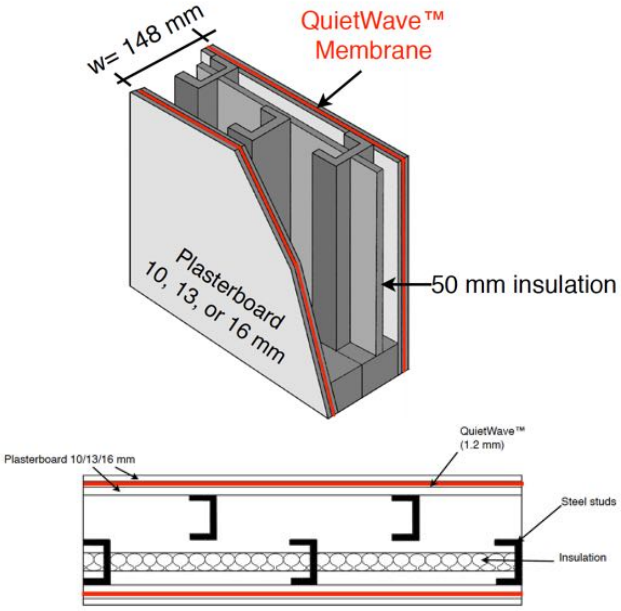
1] 4 x 13 mm std plasterboard + QuietWave™ = 40 kg/m²
2] 4 x 13 mm Fyrchek + QuietWave™ = 48 kg/m²
3] 4 x 16 mm Fyrchek + QuietWave™ = 56 kg/m²

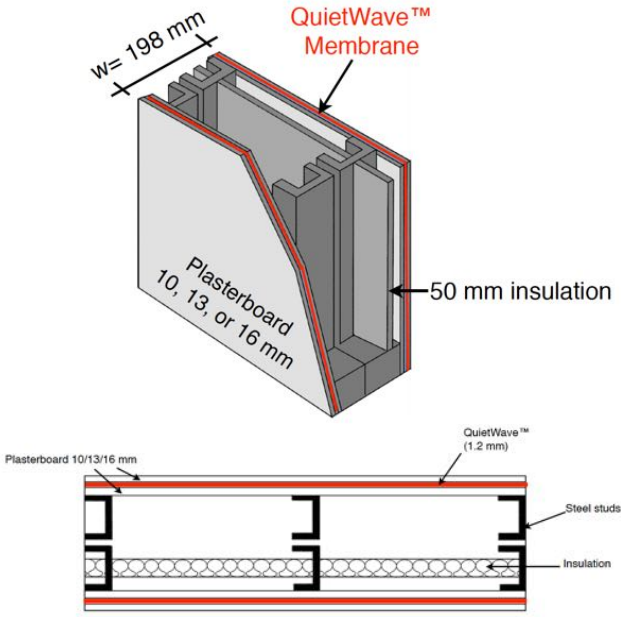
[1]	[2]	[3]
Rw = 59	Rw = 60	Rw = 62
Ctr = -7	Ctr = -6	Ctr = -6
Rw +Ctr = 52	**Rw +Ctr = 54**	**Rw +Ctr = 56**

Staggered Stud Construction - 90mm Cavity

1] 4 x 13 mm std plasterboard + QuietWave™ = 40 kg/m²
2] 4 x 13 mm Fyrchek + QuietWave™ = 48 kg/m²
3] 4 x 16 mm Fyrchek + QuietWave™ = 56 kg/m²

[1]	[2]	[3]
Rw = 61	Rw = 63	Rw = 64
Ctr = -7	Ctr = -6	Ctr = -6
Rw +Ctr = 55	**Rw +Ctr = 57**	**Rw +Ctr = 58**





Double Stud Construction - 148mm Cavity

1] 4 x 13 mm std plasterboard + QuietWave™ = 40 kg/m²
2] 4 x 13 mm Fyrchek + QuietWave™ = 48 kg/m²
3] 4 x 16 mm Fyrchek + QuietWave™ = 56 kg/m²

[1]	[2]	[3]
Rw = 64	Rw = 66	Rw = 67
Ctr = -7	Ctr = -6	Ctr = -6
Rw +Ctr = 57	**Rw +Ctr = 60**	**Rw +Ctr = 61**

Distributor Cyprus: M. A. Total Build Ltd
149 Arch. Makarios III Avenue, 3021 Limassol, Cyprus
Email: info@totalbuild.com.cy Tel: +357 99 121841 Fax: +357 25 381403