

Cyclone Testing Station
College of Science and Engineering
James Cook University
Townsville Qld 4811 Australia

Telephone (07) 4781 4786
Email: jcu.cts@jcu.edu.au
www.jcu.edu.au/cts

TEST SUMMARY SHEET – TS1256

Reappraisal Date of Test Summary Sheet: 30 June 2026 (See Note 2 below)

Static and cyclic simulated wind load strength testing was conducted on Acoustic Panels. The testing was performed with the use of new materials provided by **Soundproof Warehouse Pty Ltd.**

Description of Panels and Set-Up Tested

- Product Name: Acoustic Panel
- Panel Details: Stated to be fabricated from nominally 1.00 mm Base Metal Thickness (BMT) aluminium alloy skins encased in frame. In between skins were layers of acoustic insulation. Frame surrounding the skins was “C section” aluminium extrusion with dimensions of 61 mm high with flanges 32 mm wide and 3 mm wall thickness. Frame fitted with tubes welded in place connecting bolt holes in flanges. Aluminium sheets drilled at locations of tubes. Tubes provided structural support for skins at edges of panels. Three pressed channels installed transversely across panel at approximately 600 mm spacings providing support for eight pop rivets fixing skins to channels in interior region of panel. Pop rivets installed at approximately 150 mm spacing across the channels.
- Outer Skin Details: Solid aluminium sheet with an average thickness of 0.95 mm.
- Inner Skin Details: Perforated in an equilateral triangular pattern with nominally 2.45 mm holes spaced at nominally 6.05 mm centres.
- Panel Fasteners: M10 × 90 bolts with a flat washer under the head, a flat washer and a spring washer installed under the nut.
- Supports: 1.5 mm BMT C15015 purlins. Strength of the supports was not evaluated
- Installation: For both trials, the acoustic panels were bolted to C15015 support members at six (6) locations on each long side of the panels.

Manufacturer’s Details

Name of Manufacturer: Soundproof Warehouse Pty Ltd
Address of Manufacturer: 2-4 Gavin Way, Cornubia, QLD 4130

Report and Test Details

Report Details: Cyclone Testing Station Report No. TS1256, dated 22 April 2022
Report Title: Simulated Wind Load Strength Testing of Acoustic Panels
Test Regimes: Static wind load testing to *AS 4040.2*, cyclic wind load to *AS 4040.3 (for walling applications)*

Recommended Ultimate Limit State Design Wind Pressures

Panel Thickness (mm)	Panel Fixing Configuration	Recommended Non-Cyclonic Ultimate Strength Limit State Design Wind Capacity (kPa)	Recommended Cyclonic Ultimate Strength Limit State Design Wind Capacity (kPa)
61	Six M10 fasteners at each long side	4.26	4.02

Conditions of Use

1. Refer to Report No. TS1256, (contact Soundproof Warehouse) for full details of the Panels installation, test methods and results;
2. These test results are based on legislation and standards that are current at the time of issue and may be subject to change. Therefore this Test Summary Sheet should be reappraised by the date noted.

Signed

Mr. R. Lowe
Project Engineer

Mr. S. Ingham
CTS Authorizing Signatory

Date 22 April 2022

22 April 2022



Accredited Laboratory Number 14937
Accredited for compliance with ISO/IEC 17025 - Testing