

Acoustic Performance



Acoustic performance is becoming more important as builders are needing to meet more stringent standards set by local certifiers in all aspects of the building. For this report, some of the acoustic related standards we have worked with include:

Impact Sound Insulation

Measured to: ISO 717.2 - Rating of sound insulation in buildings and of building elements. Rated to: AS/NZS ISO 140.7 - Measurement of sound insulation in buildings and of building elements - Field measurements of impact sound insulation of floors.

Impact Isolation Class

Measured to: ISO 717.2 - Rating of sound insulation in buildings and of building elements. Rated to: AS/NZS ISO 140.7 - Measurement of sound insulation in buildings and of building elements - Field measurements of impact sound insulation of floors. Calculated according to: ASTM E492-90 and ASTM E989-06.

It is challenging to provide acoustic information because every building provides unique results and there are a number of ways that a subfloor and ceiling can be constructed, which will each contribute more or less to the overall acoustic performance of the flooring system.

To provide as much information as possible, Godfrey Hirst has partnered with an acoustic engineering firm to perform real-world site testing and then to use their expert opinion and modelling software to provide estimates of what many of the most common construction methods should achieve. This is to help the client understand how our product performs in order to make the best decisions possible as they select materials for their project. In situ/ on site testing may still be required as this is the only way the actual acoustic rating of a specific installation can be determined. As a guide to interpreting the results shown in the following table, the lower the LnTw figure, the better the performance and for AIIc, the higher the better.

1300 444 778
www.godfreyhirst.com

This document provides acoustic results for a range of Godfrey Hirst hard flooring products in various commercial and multi-residential applications. These acoustic values are indicative only. Each project should be assessed by the project's acoustic engineer to make sure your chosen product is suitable for the application.

Type	Product	Underlay	Test Type	150mm Slab + 28mm Furrings + 10mm Plaster <i>(model)</i>	200mm Slab <i>(model)</i>	200mm Slab +28mm Furrings +10mm Plaster <i>(model)</i>	200mm Slab + R2.5 Insulation + 100mm Cavity + 28mm Furrings + 10mm Plaster <i>(model)</i>	250mm Slab + 28mm Furrings + 10mm Plaster <i>(model)</i>	270mm Slab + 28mm Furrings + 10mm Plaster (test)	Report #
Laminate	Vista	2.0mm IXPE	Ln'T,w	51	55	50	47	49	49	6968-2.17
			AIIc	53	49	54	55	55	55	
Laminate	Amor Classic, Belle XL, Legacy	2.0mm IXPE	Ln'T,w	51	55	50	47	49	49	6968-2.18
			AIIc	52	48	53	54	54	54	
Hybrid	Apollo	Attached in manufacturing	Ln'T,w	51	55	50	47	49	49	6968-2.9
			AIIc	52	48	53	54	54	54	
Hybrid	Apollo XL, Apollo Hardwood, Apollo Stone	Attached in manufacturing	Ln'T,w	50	54	49	46	48	48	6968-2.11
			AIIc	53	49	54	55	55	55	
Hybrid	Metropol 1500	Attached in manufacturing	Ln'T,w	51	54	49	46	48	48	6968-2.20
			AIIc	53	49	54	55	55	55	
Vinyl Plank	Olympus DS	Nil	Ln'T,w	66	70	65	62	64	64	6968-2.1
			AIIc	37	33	38	39	39	39	
Vinyl Plank	Regent DS	Nil	Ln'T,w	65	69	64	61	63	63	6968-2.2
			AIIc	37	33	38	39	39	39	
Vinyl Plank	Moduleo	Nil	Ln'T,w	65	69	64	61	63	63	6968-2.3
			AIIc	37	33	38	39	39	39	
Vinyl Plank	Regent DS Plus	Nil	Ln'T,w	63	67	62	59	61	61	6968-2.4
			AIIc	40	36	41	42	42	42	
Vinyl Plank	Aquila DS Plus, Nordic Oak	Nil	Ln'T,w	65	69	64	61	63	63	6968-2.5
			AIIc	38	34	39	40	40	40	
Vinyl Plank	Olympus DS	2mm Rubber	Ln'T,w	54	58	53	50	52	52	6968-2.1
			AIIc	49	45	50	51	51	51	
Vinyl Plank	Regent DS	2mm Rubber	Ln'T,w	54	58	53	50	52	52	6968-2.2
			AIIc	49	45	50	51	51	51	
Vinyl Plank	Moduleo	2mm Rubber	Ln'T,w	54	58	53	50	52	52	6968-2.3
			AIIc	50	46	51	52	52	52	
Vinyl Plank	Regent DS Plus	2mm Rubber	Ln'T,w	53	57	52	49	51	51	6968-2.4
			AIIc	50	46	51	52	52	52	
Vinyl Plank	Aquila DS Plus, Nordic Oak	2mm Rubber	Ln'T,w	53	57	52	49	51	51	6968-2.5
			AIIc	50	46	51	52	52	52	
Engineered Timber	Corsica Oak	2.0mm IXPE	Ln'T,w	52	56	51	48	50	50	6968-2.6
			AIIc	51	47	52	53	53	53	
Engineered Timber	Pioneer	2.0mm IXPE	Ln'T,w	53	57	52	49	51	51	6968-2.7
			AIIc	50	46	51	52	52	52	
Engineered Timber	Corsica Oak	2mm Rubber	Ln'T,w	53	57	52	49	51	51	6968-2.6
			AIIc	50	46	51	52	52	52	
Engineered Timber	Pioneer	2mm Rubber	Ln'T,w	55	59	54	51	53	53	6968-2.7
			AIIc	48	44	49	50	50	50	