

**Sound Research  
Laboratories Limited**

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Contract C/00/5L/7873

**TEST CERTIFICATE**

Number 2206 (supersedes 2179)

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Date 24 May 2000

**The Laboratory Measurement of Random Incidence Sound Absorption Generally to BS EN 20354: 1993**

Client: Armstrong World Industries Ltd, Armstrong House, 38 Market Square, Uxbridge, Middlesex. UB8 1NG

Test Date: 03/05/00

See SRL report C\00\5L\7873\1 for full details of testing

**Sample**

Description: Orcal Board Plain/Unperforated - 600 x 600mm

Sample Area: 10.8 m<sup>2</sup> - This sample area is below the 11.3m<sup>2</sup> required by BS EN 20354:1993

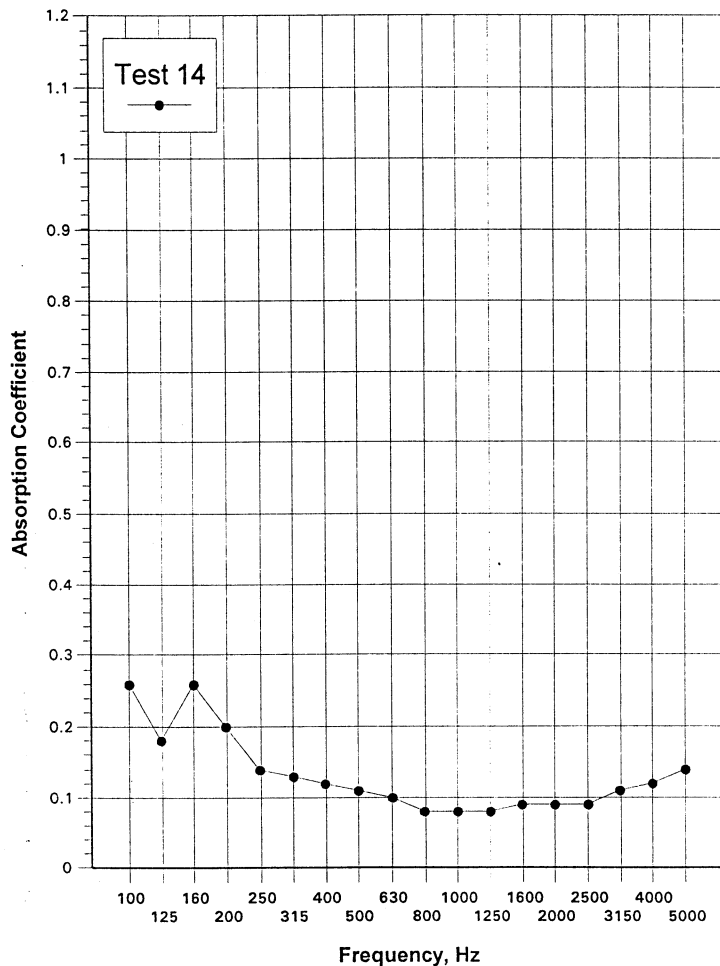
Cavity Depth: 200mm

Chamber Volume: 300 m<sup>3</sup>

Test 14			
Freq Hz	T1 sec	T2 sec	Absorp Coeff
50*	5.20	4.81	0.07
63*	4.29	3.85	0.12
80*	4.77	4.06	0.16
100	6.72	4.83	0.26
125	6.59	5.22	0.18
160	6.87	4.91	0.26
200	8.00	5.89	0.20
250	8.77	6.90	0.14
315	8.20	6.62	0.13
400	7.45	6.23	0.12
500	6.36	5.51	0.11
630	5.73	5.09	0.10
800	5.89	5.34	0.08
1000	6.35	5.74	0.08
1250	6.22	5.60	0.08
1600	5.70	5.09	0.09
2000	5.09	4.61	0.09
2500	4.44	4.07	0.09
3150	3.57	3.29	0.11
4000	2.93	2.71	0.12
5000	2.35	2.19	0.14
6300*	1.96	1.84	0.15
8000*	1.34	1.28	0.16
10000*	0.99	0.90	0.45
$\alpha_w$			0.10(L)
Calculated to EN ISO 11654:1997			
NRC			0.10
Calculated to ASTM C 423-90a			
<small>*Denotes frequencies outside the range covered by BS EN 20354:1993</small>			

T1, empty room reverberation time  
T2, room reverberation time with sample

**Graph 1  
Sound Absorption Coefficient**



Laboratory Engineer

Laboratory Manager