



INVESTOR IN PEOPLE

Holbrook House, Little Waldingfield,  
Sudbury, Suffolk CO10 0TH  
Tel: (01787) 247595  
e-mail: srl@srltsl.com

Confidential

See SRL report C/22171/R01a for full details

The Laboratory Measurement of Random Incidence Sound Absorption to BS EN ISO 354:2003

**Client:** Saint Gobain Eurocooustic

**Test Date:** 29/05/2012

**Empty Room:** Temperature: 19.5 °C Humidity: 58 %RH Pressure: 1011 mbar

**Room with Sample:** Temperature: 20.0 °C Humidity: 58 %RH Pressure: 1011 mbar

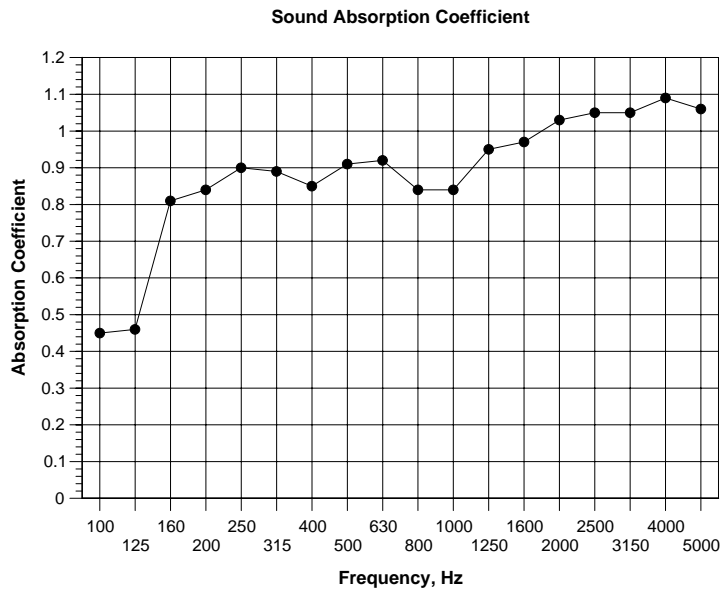
**Sample Description:** Tonga E /600 x 600 x 20 mm /ceiling tiles

**Mounting Method:** E- 200

**Sample Area:** 12.96 m2

**Chamber Volume:** 300 m3

Test 4				
Freq Hz	T1 sec	T2 sec	Absorp Coeff	Practical Absorp Coeff #
50*	3.96	3.38	0.16	
63*	5.17	3.34	0.39	n/a
80*	6.15	4.05	0.31	
100	7.17	3.85	0.45	
125	7.55	3.89	0.46	0.55
160	6.95	2.78	0.81	
200	6.93	2.70	0.84	
250	7.56	2.67	0.90	0.90
315	7.44	2.68	0.89	
400	6.94	2.69	0.85	
500	5.76	2.40	0.91	0.90
630	5.33	2.30	0.92	
800	5.75	2.51	0.84	
1000	6.28	2.60	0.84	0.90
1250	6.19	2.40	0.95	
1600	5.58	2.28	0.97	
2000	5.15	2.12	1.03	1.00
2500	4.66	2.02	1.05	
3150	4.01	1.89	1.05	
4000	3.29	1.68	1.09	1.00
5000	2.64	1.52	1.06	
6300*	1.97	1.24	1.14	
8000*	1.59	1.07	1.18	n/a
10000*	1.12	0.81	1.33	



$\alpha_w$ 0.95
Class A
Calculated to EN ISO 11654:1997
NRC 0.90
Calculated to ASTM C 423-01
* Denotes frequencies outside the range covered by BS EN ISO 354:2003
T1, empty room reverberation time
T2, room reverberation time with sample

# Practical absorption coefficient, BS EN ISO 11654:1997

v4.2