

Sound Reduction Index According to DIN EN 20 140-3

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P-BA 249/2007e

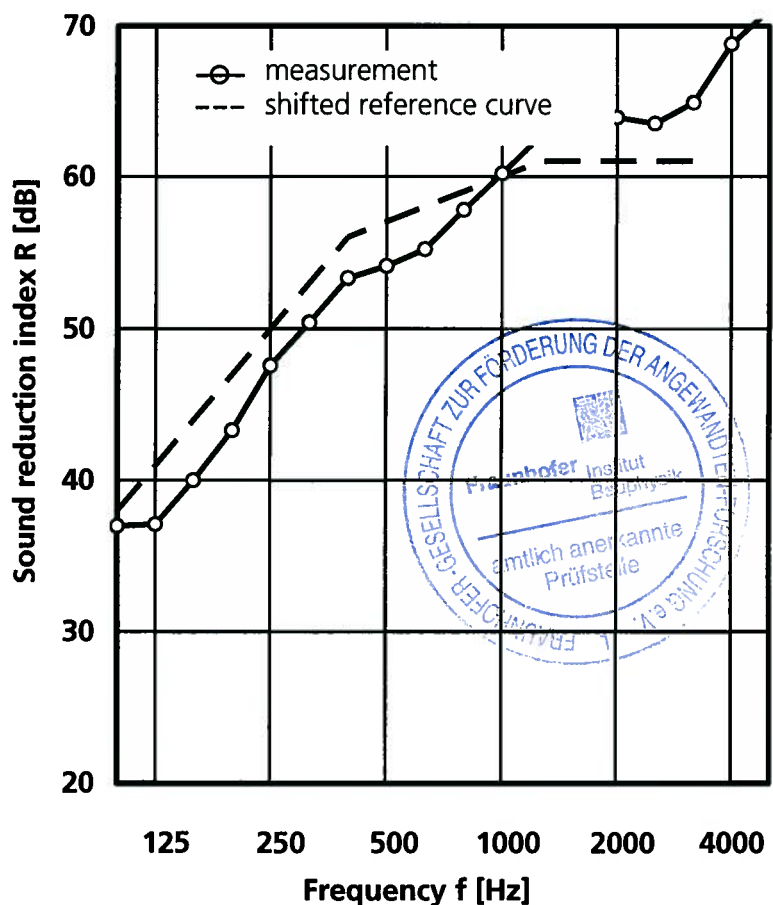
Figure 5

Test Specimen:

Double-leaf movable partition wall (test object S 9828-07) in timber panel design, type NW 100 Premium, covering made of 16 mm plastic-coated chipboards, 5 mm bitumen loading mats clamped to the interior on both sides, 50 mm insulating material in the element cavity. The partition consisted of 4 individual elements, 1022 mm x 2860 mm each, one of them constructed as telescopic element. The partition was in a functional state.

Additional description and technical data see test report, page 2, as well as Table 1 and Fig. 1 to 4.

Test facility: test facility for walls and partitions P2
Room volume: $V_S = 68.7 \text{ m}^3$
 $V_E = 76.1 \text{ m}^3$
Limiting insertion loss: $R'_w = 89 \text{ dB}$
Test surface area: 12.54 m^2
Excitation noise: pink noise
Relative humidity: 60 %
Temperature: 23 °C
Test date: June 19, 2007



f [Hz]	R [dB]
100	37.0
125	37.1
160	40.0
200	43.3
250	47.6
315	50.4
400	53.3
500	54.1
630	55.2
800	57.8
1000	60.2
1250	62.7
1600	63.0
2000	63.9
2500	63.5
3150	64.9
4000	68.8
5000	71.1

Weighted sound reduction index and spectrum adaptation terms according to DIN EN ISO 717 part 1
 $R_w (C; C_{tr}; C_{100-5000}; C_{tr,100-5000}) = 57 (-2; -6; -1; -6) \text{ dB}$

