

Client: Saint-Gobain Ecophon AB  
SE-265 03 Hyllinge, Sweden

**Results 1**

**Test Specimen:**

Suspended ceiling, type: "Tonga dB 41 A + Acoustipan", made of stone wool tiles (test object S 12178-07).

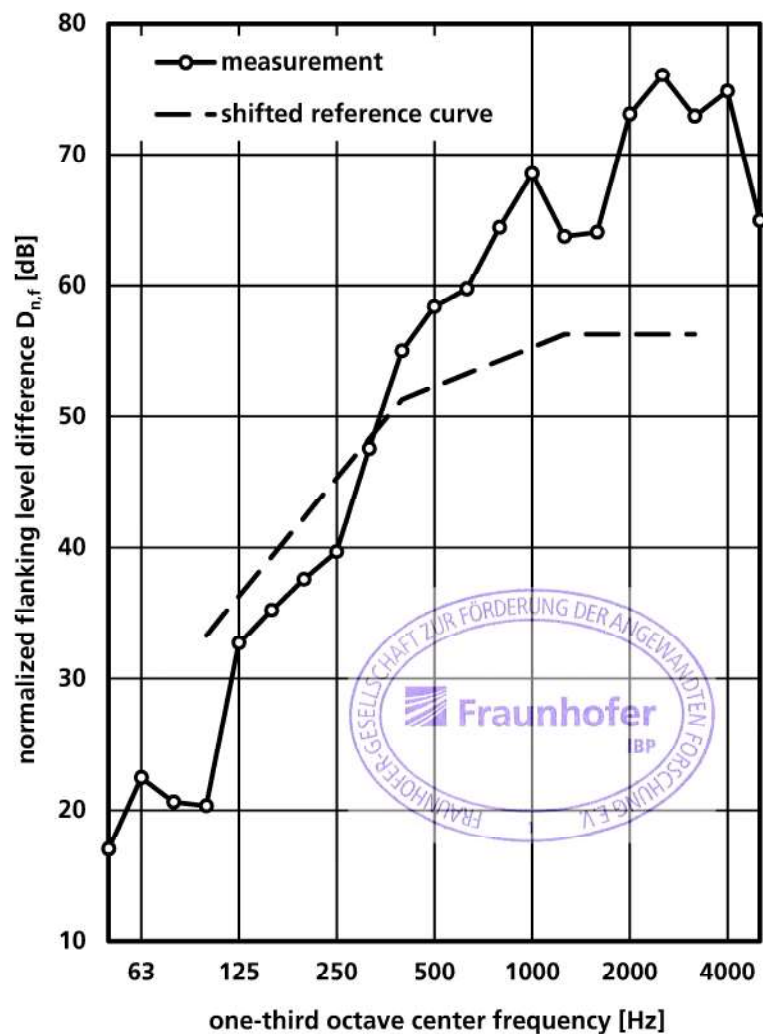
Suspended ceiling made of stone wool tiles, covered with glass veil back-facer (back) and painted glass fibre surface on the visible side (front), installed together with an acoustic barrier made of stone wool and covered on both side with a sheet of aluminium. The tiles were laid in a grid system, type: "Connect T24". The grid was suspended using suspension elements made of steel.

Suspension height: 700 mm

For more details see table 1 or figure 1.

Test date: Nov. 15, 2023  
 Test lab: P5  
 Ref. area: 10.00 m<sup>2</sup>  
 Volumes: V<sub>S</sub> = 55.2 m<sup>3</sup>  
 V<sub>E</sub> = 72.7 m<sup>3</sup>  
 Rel. humidity: 45 ± 2 %  
 Air temperature: 21.8 ± 0.3 °C  
 Stat. pressure: 970 ± 1 hPa  
 Noise: Pink noise

f [Hz]	D <sub>n,f</sub> [dB]
50	17.0
63	22.5
80	20.6
100	20.3
125	32.7
160	35.2
200	37.6
250	39.7
315	47.6
400	55.0
500	58.4
630	59.8
800	64.5
1000	68.6
1250	63.8
1600	64.1
2000	73.1
2500	76.1
3150	72.9
4000	74.8
5000	65.0



„z“: background noise and R<sub>max</sub> correction acc. to Annex F1.

**Weighted sound reduction index and spectrum adaption terms acc. to DIN EN ISO 717-1**  
**D<sub>n,f,w</sub> = 52.3 ± 1.2 dB**

C <sub>100-3150</sub> = -5 dB	C <sub>100-5000</sub> = -4 dB	C <sub>50-3150</sub> = -6 dB	C <sub>50-5000</sub> = -5 dB
C <sub>tr,100-3150</sub> = -12 dB	C <sub>tr,100-5000</sub> = -12 dB	C <sub>tr,50-3150</sub> = -16 dB	C <sub>tr,50-5000</sub> = -16 dB



The test was carried out in laboratory facilities of the IBP which is accredited acc. to DIN EN ISO/IEC 17025:2018 by the Dakks. The accreditation certificate is D-PL-11140-11-00.

Stuttgart, February 15, 2024  
 Head of the test laboratory: