

**Sound reduction index according to PN-EN 20140-3:1999**

Laboratory measurements of airborne sound insulation of building elements

Client: **PILKINGTON-IGP Sp. z o.o.**

**ul. Portowa 24, 27-600 Sandomierz**

Test specimen mounted by: **ITBUD, 02-656 Warszawa, ul. Ksawerów 21**

Description of the test facility, test specimen and test arrangement:

**Insulating glass unit Pilkington Insulight™**

**Dimensions: 1230 mm x 1480 mm**

**Structure: 4 mm Optifloat™ - 24 mm Argon 90% - 4 mm Optifloat™**

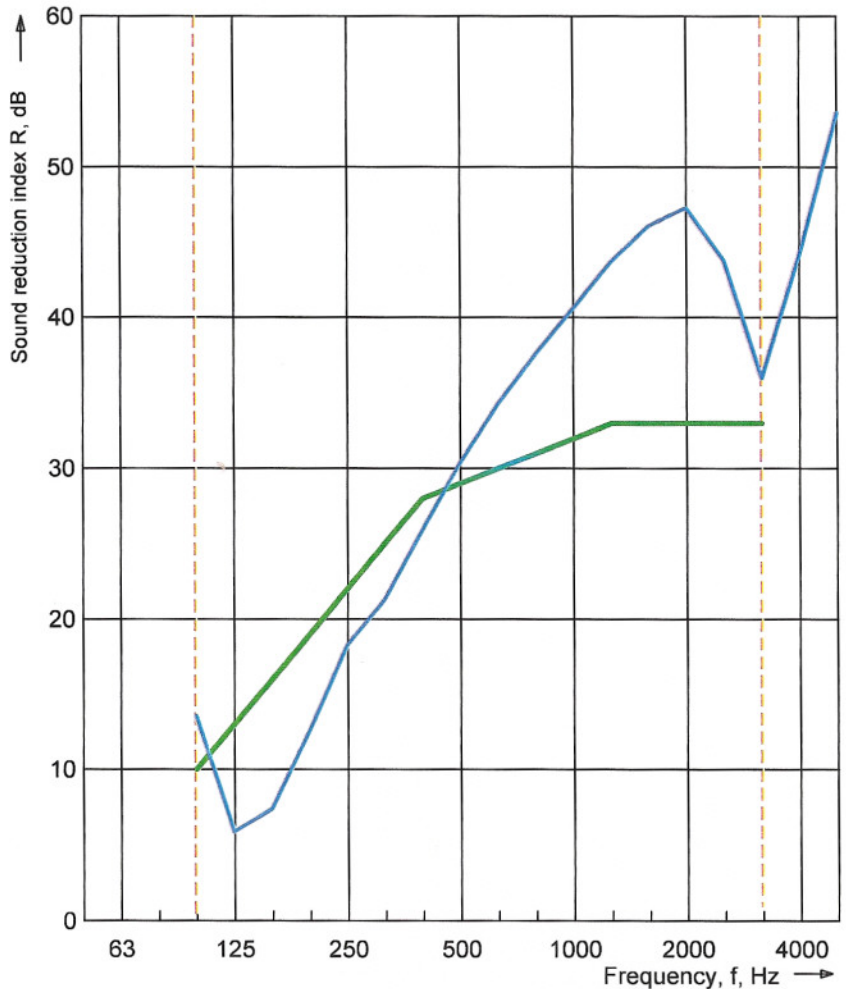
Area of test specimen: **1,88 m<sup>2</sup>**  
 Air permeability coefficient: **--- m<sup>3</sup>/(m<sup>2</sup>·h·daPa<sup>2/3</sup>)**

Test room: source receive

Volume, m<sup>3</sup>: **100,0** **93,0**  
 Air temperature, °C: **21,0** **20,9**  
 Air humidity, %: **22,3** **25,6**

Frequency f [Hz]	R 1/3 octave [dB]
50	---
63	---
80	---
100	13,6
125	5,9
160	7,4
200	12,6
250	18,3
315	21,3
400	25,9
500	30,4
630	34,3
800	37,6
1000	40,6
1250	43,7
1600	46,1
2000	47,3
2500	43,8
3150	36,0
4000	44,2
5000	53,6

--- Frequency range according to the curve reference values (PN-EN ISO 717-1:1999)  
 — Characteristics measured



Rating according to PN-EN ISO 717-1:1999

**R<sub>w</sub>(C;C<sub>tr</sub>) = 29 (-3; -8) dB**

C<sub>50-3150</sub> = --- dB      C<sub>50-5000</sub> = --- dB      C<sub>100-5000</sub> = -2 dB

C<sub>tr,50-3150</sub> = --- dB      C<sub>tr,50-5000</sub> = --- dB      C<sub>tr,100-5000</sub> = -8 dB

Evaluation based on laboratory measurement results obtained by engineering method

Building Research Institute Group of the Testing Laboratories  
 Acoustic Laboratory

Test No.: 137.12

Date of analysis: 2012-02-14

Signature: N. Bombala