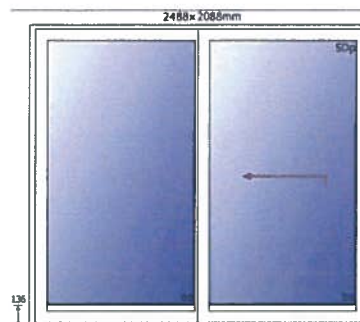


Sound reduction index in accordance with PN - EN ISO 10140-2 (2011)

Laboratory measurements of airborne sound insulation of building elements

Client: **NorDan AS**
 Address: **Stasjonsveien 46, N-4460 Mio, Norway**
 Test specimen: **Wooden Patio Door SD NTech 164mm**
Glazed: Lam w/LowE (LE) 2s WES/Ar
6,38E+10G+4+12G+E4
(Test 5.4)

Measurement date: **28.02.2017**

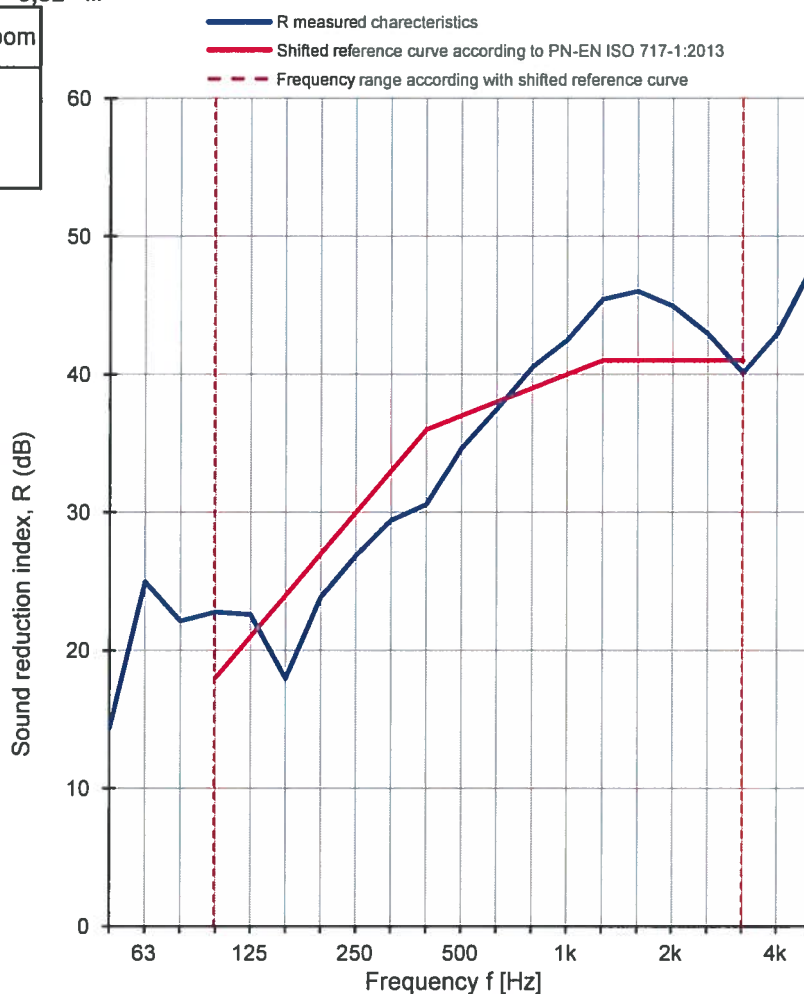


Description of the test facility, test specimen and test arrangement:

Size of test specimen: **2488 x 2088 mm**
 Test specimen mounted by: **Gryfitlab Sp. z o.o.**
 Mass per unit area: **kg/m²**
 The surface area of test specimen: **5,32 m²**

Parameter	Receiving room	Source room
Air temp. [°C]	19,2	19,2
Humidity [%]	67	67
Pressure [hPa]	990	990
Volume [m ³]	372	324

Frequency [Hz]	Test results with uncertainty	
	R [dB]	U _{CR} [dB]
50	14,4	4,6
63	25,0	3,9
80	22,1	3,6
100	22,8	2,7
125	22,6	2,3
160	18,0	2,7
200	23,8	2,1
250	26,8	2,3
315	29,4	2,0
400	30,6	2,1
500	34,6	2,1
630	37,5	2,0
800	40,5	2,0
1000	42,5	1,9
1250	45,4	1,9
1600	46,0	1,9
2000	44,9	1,9
2500	42,9	1,9
3150	40,1	1,9
4000	42,9	2,0
5000	48,0	2,0



Measurement uncertainty of sound reduction U_{CR}
 Confidence level 95% at coverage factor, k=2

Weighted sound reduction index in accordance with PN-EN ISO 717-1:2013			
R_w (C; C_{tr}) = 37 (-1; -5) dB	C ₅₀₋₃₁₅₀ = -2 dB	C ₅₀₋₅₀₀₀ = -1 dB	C ₁₀₀₋₅₀₀₀ = -1 dB
R_w = 37,8 dB	C _{tr, 50-3150} = -6 dB	C _{tr, 50-5000} = -6 dB	C _{tr, 100-5000} = -5 dB

GRYFITLAB Sp. z o.o. Laboratory of Acoustics
 No. of test specimen: GLA-1305.13/17
 Date: 28.02.2017

Signature: Robert Dybicz