TECHNICAL SHEET

Load span tables for Adek range of profiles

Following these guidelines you ensure that your structure complies with the requirements for different flooring media as per 'BS EN 1991-1-1:2002 Actions on Structures - Imposed Loads for Buildings'.

Table 1.a. Adek Comfort Grip 295: 20 & 30 point loads tested at different spans.

Shows deflection of both Adek Comfort Grip 295: 20 & 30 at different spans at a point load of up to 5kN.

Adek Comfort Grip 295	Adek 20			Adek 30				
SPAN (mm)	400	600	800	400	600	800	1000	1200
Deflection @ 2kN (mm)	0.6	1.5	2.9	0.4	1.2	1.8	2.8	4
Deflection @ 3kN (mm)	0.9	2.2	4.4	0.7	1.6	2.6	4	5.9
Deflection @ 4kN (mm)	1.2	2.9	6	0.9	2.1	3.3	5.4	7.9
Deflection @ 5kN (mm)	1.6	3.6	7.6	1.2	2.5	4.1	6.8	9.9

Table 1.b. Adek Enhanced Grip 295: 20 & 30 point loads tested at different spans.

Table 1.b shows deflection of both Adek Enhanced Grip 295: 20 & 30 at different spans at a point load of up to 5kN.

Adek Enhanced Grip 295	Adek 20			Adek 30				
SPAN (mm)	400	600	800	400	600	800	1000	1200
Deflection @ 2kN (mm)	0.58	1.39	3.4	0.5	0.75	1.49	2.42	3.64
Deflection @ 3kN (mm)	0.86	2.07	5	0.71	1.19	2.87	3.43	5.32
Deflection @ 4kN (mm)	1.15	2.78	6.8	0.02	1.6	3.43	4.47	7
Deflection @ 5kN (mm)	1.42	3.52	8.55	1.12	2.02	3.57	5.66	8.75

Table 1.c. Adek Comfort Grip 147: 20 & 30 point loads tested at different spans.

Shows deflection of both Adek Comfort Grip 147: 20 & 30 at different spans at a point load of up to 5kN.

Adek Comfort Grip 147	Adek 20		Adek 30		
SPAN (mm)	400	600	400	600	800
Deflection @ 2kN (mm)	0.96	2.61	0.56	1.49	4.5
Deflection @ 3kN (mm)	1.42	3.7	0.83	2.17	6.36
Deflection @ 4kN (mm)	1.92	4.92	1.11	2.82	8.43
Deflection @ 5kN (mm)	2.31	6.4	1.4	3.42	-

Table 1.d. Adek Enhanced Grip 147: 20 & 30 point loads tested at different spans.

Shows deflection of both Adek Enhanced Grip 147: 20 & 30 at different spans at a point load of up to 5kN.

Adek Enhanced Grip 147	Adek 20		Adek 30		
SPAN (mm)	400	600	400	600	800
Deflection @ 2kN (mm)	0.89	2.49	0.82	1.49	4.06
Deflection @ 3kN (mm)	1.38	3.57	1.16	2.14	6.1
Deflection @ 4kN (mm)	1.9	4.78	1.5	2.82	8.07
Deflection @ 5kN (mm)	2.41	6.25	1.81	3.5	12.6

From ecodek®

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Table 2. Point loads requirements for different flooring media (BS EN 1991-1-1:2002).

BS EN 1991-1-1:2002 Actions on structures - Imposed loads for buildings	Point load kN (mid-span)
Balconies	2.0
Walkways – Light duty	2.0
General residential	2.0
Offices for general use	2.7
Public, institutional and communal dining rooms and lounges, cafes and restaurants	3.0
Classrooms	3.0
Assembly areas with fixed seating	3.6
Walkways – General duty	3.6
Assembly areas without seating, concert halls and bars	3.6
Shopping areas – General	3.6
Stairs & landings in all buildings incl. hotels & institutional buildings subject to crowds	4.0
Corridors, hallways, aisles, in all buildings incl. hotels & institutional buildings subject to crowds or wheeled vehicles incl. trolleys	4.5
Walkways heavy duty (high density pedestrian traffic including escape routes)	4.5
Stages in public assembly areas	4.5

Table 2 shows an extract from BS EN 1991 that demonstrates what point loads the flooring media should be able to support. These loads are mid-span live loads. Dead loads should be supported in a different manner whereby the load is spread over the support beams to ensure long term board deflection is prevented. If in doubt, please contact our technical department for further information.

It is also important to ensure you design your substructure to comply with the uniformly distributed load (UDL) values (commonly expressed in kN/m^2), which are also expressed in BS EN 1991.

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