

August 2022

Technical data Duropal HPL Pyroex

Decorative high pressure laminate in flame retardant quality according to EN 438-3:HGF/VGF, with robust melamine resin surface and sanded reverse.

Melamine impregnated decorative paper Flame retardant impregnated craft paper, reverse side sanded

Applications



Furniture and interior fit-



Fire protection

Properties



Variety of decors and / or textures





Antimicrobial

Food harmless



Flame retardant

Certificates





Specification			Unit	Test standard
Nominal thickness	0.8	1.2	mm	
Tolerance on thickness	± 0.1	± 0.15	mm	EN 438-2
Tolerance on length	+	10	mm	EN 438-2
Tolerance on width	+ 10		mm	EN 438-2
Surface defects	max. 1 ¹⁾ max. 10 ²⁾		mm²/m² mm/m²	EN 438-2
Edge defects	max	c. 20	mm	EN 438-2
Straightness of edges	max	c. 1.5	mm/m	EN 438-2
Squareness	max. 1.5		mm/m	EN 438-2
Flatness (length)	max. 60		mm/m	EN 438-2
Density	min. 1,350		kg/m³	EN ISO 1183-1
Dimensional stability at elevated temperature (length)	max. 0.55 ³⁾ max. 0.75 ⁴⁾		%	EN 438-2
Dimensional stability at elevated temperature (width)	max. 1.05 ³⁾ max. 1.25 ⁴⁾		%	EN 438-2
Resistance to wet heat, 100 °C (gloss finishes)	min. 3		rating	EN 438-2
Resistance to wet heat, 100 °C (other finishes)	min. 4		rating	EN 438-2
Resistance to dry heat, 160 °C (gloss finishes)	min. 3		rating	EN 438-2
Resistance to dry heat, 160 °C (other finishes)	min. 4		rating	EN 438-2
Resistance to water vapour (gloss finishes)	min. 3		rating	EN 438-2
Resistance to water vapour (oth- er finishes)	min. 4		rating	EN 438-2
Resistance to immersion in boil- ing water (gloss finishes)	min. 3		rating	EN 438-2
Resistance to immersion in boil- ng water (other finishes)	min. 4		rating	EN 438-2



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Specification			Unit	Test standard
Nominal thickness	0.8	1.2	mm	
Resistance to surface wear	min. 50 ⁴⁾ min. 150 ³⁾		cycles	EN 438-2
Resistance to scratching (smooth finishes)	min. 1 ⁴⁾ min. 2 ³⁾		rating	EN 438-2
Resistance to scratching (tex- tured finishes)	min. 2 ⁴⁾ min. 3 ³⁾		rating	EN 438-2
Resistance to impact (small di- ameter ball)	min. 15 ⁴⁾ min. 20 ³⁾		N	EN 438-2
Stain resistance (groups 1 & 2)	min. 5		rating	EN 438-2
Stain resistance (group 3)	min. 4		rating	EN 438-2
Resistance to colour change (xenon arc light)	4 to 5 Grey Scale Grade			EN 438-2
Reaction to fire	flame retardant	grade		
Reaction to fire (Euroclass)	C-s1,d0 ⁵⁾			EN 13501-1
Formaldehyde emission class				EN 717-1
Formability (length)	Not determined, processing tests are to be carried out.			EN 438-2
Formability (width)	Not determined, processing tes	s are to be carried out.		

Dirt, spots and similar surface defects
 Fibres, hairs and scratches
 Classification HGF

Additional information

Product standard	• EN 438-3
Areas of application	 Flame retardant surface material for walls and doors, furniture and installations in public buildings and special constructions, such as railway stations and airports, retail and recreational facilities, public areas, hotels, schools, care home facilities and hospitals.
Product safety	 This product follows the REACH regulation EC 1907/2006 an article. Following Article 7 it does not need to be registered. The surface is physiologically safe, and approved for direct contact with food acc. to Regulation (EU) No. 10/2011. The decorative surface and the core consists of paper layers, which are impregnated with thermosetting resins. The resins harden completely during the manufacturing process by heat and high pressure. They form a stable, resistant and non-reactive material.

⁴⁾ Classification VGF

⁵⁾ Depending on the core material and adhesive used, HPL flat bonded elements may have a different classification. We recommend the use of the product Duropal Element Pyroex.



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Antimicrobial effect	Surface with antimicrobial effect in 24 h for interior fit-out and finishes – Test Methodology JIS Z 2801 / ISO 22196
Special	 The coarser the structure and the lighter the decor, the greater the scratch resistance. The smoother the structure and the the darker the decor, the more sensitive it is to stains. Depending on the decor and surface texture, slightly different surface visual impressions can result between cut panels viewed from different angles. This is a result of the production methods and does not constitute a quality defect. Especially for large applications, we recommend paying attention to the colour and texture unifomity of the boards and cut products used when further processing and installing and that the production direction is taken into account. With intensive plain decors, especially in the red range, colour pigment wash-out may occur under certain circumstances. It is possible that colour pigments are not bound by the resin during the impregnation of the decor paper and are only deposited on the surface of the impregnate and are thus directly on the surface. If cleaning is then carried out, slight discolouration of the cleaning cloths can be observed. This is particularly the case when solvent-based cleaners are used. This is not a product defect. Classification HGP / HGS / HGF is achieved with the surface textures recommended for horizontal applications. Requirements of classification VGP / VGS / VGF are met by all surface textures. Please refer to our sales documentation, to check which textures are available for this product.
Note	FSC certification or PEFC certification available on request. FSC license code: FSC® C011773 PEFC license code: PEFC/04-32-0828
Colour and surface match	 Decor, structure and core board all influence the final appearance of the end product. Due to the product-specific differences in production technologies, even identical decor/structure/core board combinations can result in slight optical and tactile deviations across different product groups and formats. Such deviations do not constitute a defect. The choice of surface structure in particular has a significant influence on the visual impression, the tactile perception as well as the technical characteristics of the product. Thus, the overall impression of a decor can change almost completely depending on the surface structure. Furthermore, mechanical influences on the product surface can lead to a higher contrast optical perception with dark decors. To ensure that you always achieve the best results with our products and to clarify any deviations in advance, we will be happy to advise you individually.

Further information on products, formats and decor/structure combinations is available at www.pfleiderer.com

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