

HPD UNIQUE IDENTIFIER: 24389
CLASSIFICATION: 09 29 00 Gypsum Board
PRODUCT DESCRIPTION: KNAUF DF Composed of a gypsum core mixed with glass fibers and faces covered with cardboard sheet. Easily identifiable by its apparent face of pink color and hidden face of cream color. High fire resistance performance.

Section 1: Summary

Basic Method / Product Threshold

CONTENT INVENTORY

Inventory Reporting Format	Threshold level	Residuals/Impurities	
☐ Nested Materials Method	☒ 100 ppm	☐ Considered	<i>All Substances Above the Threshold Indicated Are:</i>
☒ Basic Method	☐ 1,000 ppm	☐ Partially Considered	Characterized ☐ Yes Ex/SC ☒ Yes ☐ No
Threshold Disclosed Per	☐ Per GHS SDS	☒ Not Considered	% weight and role provided for all substances.
☐ Material	☐ Other	Explanation(s) provided for Residuals/Impurities?	Screened ☐ Yes Ex/SC ☒ Yes ☐ No
☒ Product		☒ Yes ☐ No	<i>All substances screened using Priority Hazard Lists with results disclosed.</i>
			Identified ☐ Yes Ex/SC ☒ Yes ☐ No
			<i>All substances disclosed by Name (Specific or Generic) and Identifier.</i>

CONTENT IN DESCENDING ORDER OF QUANTITY

Summary of product contents and results from screening individual chemical substances against HPD Priority Hazard Lists and the GreenScreen for Safer Chemicals®. The HPD does not assess whether using or handling this product will expose individuals to its chemical substances or any health risk. Refer to Section 2 for further details.

MATERIAL | SUBSTANCE | RESIDUAL OR IMPURITY
GREENSCREEN SCORE | HAZARD TYPE
DF [CALCIUM SULFATE DIHYDRATE LT-UNK CONTINUOUS
FILAMENT GLASS FIBER, NON-RESPIRABLE LT-UNK STARCH
(PRIMARY CASRN IS 9005-25-8) LT-UNK CELLULOSE,
MICROCRYSTALLINE LT-UNK | RES]

Number of Greenscreen BM-4/BM3 contents ... 0

Contents highest concern GreenScreen
Benchmark or List translator Score ... LT-UNK
Nanomaterial ... No

INVENTORY AND SCREENING NOTES:

This Health Product Declaration (HPD) was completed in accordance with the HPD Standard version 2.2 and discloses hazards associated with all substances present at or above 100 parts per million (ppm) in the finished compound product, along with the role and percent weight. This includes optional ingredients and all have been screened for impurities and residuals. This HPD is consistent with the LEED v4 MR credit Building Product Disclosure and Optimization: Material Ingredient Reporting. This HPD covers all manufacturing facilities for Knauf GmbH Sucursal España. Residuals and impurities were screened using the database at: https://pharosproject.net/Residuals and impurities are screened using a general database that relies on Healthy Building Material databases with overall 100000 substances listed to determine the typical residuals and impurities for a substance or material. The main raw material declared here comes from Knauf GmbH own quarries located in Guixers and Escuzar, so composition is highly known and tested constantly to comply with high standard environmental and air quality regulations.

VOLATILE ORGANIC COMPOUND (VOC) CONTENT

VOC Content data is not applicable for this product category.

CERTIFICATIONS AND COMPLIANCE See Section 3 for additional listings.

VOC emissions: Instituto für Baubiologie Rosenheim GmbH (IBR)
LCA: ISO 14021:1999 Environmental labels and declarations

CONSISTENCY WITH OTHER PROGRAMS

Pre-checked for LEED v4 Material Ingredients Option 1 and Option 2

Third Party Verified?	PREPARER: Self-Prepared	SCREENING DATE: 2021-04-11
☐ Yes	VERIFIER:	PUBLISHED DATE: 2021-04-11
☒ No	VERIFICATION #:	EXPIRY DATE: 2024-04-11

This section lists contents in a product based on specific threshold(s) and reports detailed health information including hazards. This HPD uses the inventory method indicated above, which is one of three possible methods:

- *Basic Inventory method with Product-level threshold.*
- *Nested Material Inventory method with Product-level threshold*
- *Nested Material Inventory method with individual Material-level thresholds*

Definitions and requirements for the three inventory methods and requirements for each data field can be found in the HPD Open Standard version 2.2, available on the HPDC website at: www.hpd-collaborative.org/hpd-2-2-standard

DF

PRODUCT THRESHOLD: 100 ppm

RESIDUALS AND IMPURITIES CONSIDERED: No

RESIDUALS AND IMPURITIES NOTES: Residuals and impurities are considered and noted when the concentration is above the disclosure threshold. Naturally occurring impurities in the gypsum are evaluated when required, by the manufacturer through chemical analyses. No residuals or impurities were found in the product below declared.

OTHER PRODUCT NOTES: ND

CALCIUM SULFATE DIHYDRATE			ID: 10101-41-4		
HAZARD SCREENING METHOD: Pharos Chemical and Materials Library			HAZARD SCREENING DATE: 2021-04-11 9:07:29		
%: 94.3000 - 96.5000		GS: LT-UNK	RC: None	NANO: No	SUBSTANCE ROLE: Structure component
HAZARD TYPE	AGENCY AND LIST TITLES		WARNINGS		
None found		No warnings found on HPD Priority Hazard Lists			
SUBSTANCE NOTES:					

CONTINUOUS FILAMENT GLASS FIBER, NON-RESPIRABLE			ID: 65997-17-3		
HAZARD SCREENING METHOD: Pharos Chemical and Materials Library			HAZARD SCREENING DATE: 2021-04-11 9:07:29		
%: 0.2500 - 1.3000		GS: LT-UNK	RC: None	NANO: No	SUBSTANCE ROLE: Structure component
HAZARD TYPE	AGENCY AND LIST TITLES		WARNINGS		
None found			No warnings found on HPD Priority Hazard Lists		
SUBSTANCE NOTES: Reinforcement					

STARCH (PRIMARY CASRN IS 9005-25-8)			ID: 2075820-73-2		
HAZARD SCREENING METHOD: Pharos Chemical and Materials Library			HAZARD SCREENING DATE: 2021-04-11 9:07:30		
%: 0.1000 - 0.4000		GS: LT-UNK	RC: None	NANO: No	SUBSTANCE ROLE: Adhesive
HAZARD TYPE	AGENCY AND LIST TITLES		WARNINGS		
None found			No warnings found on HPD Priority Hazard Lists		
SUBSTANCE NOTES: Paper bonding					

CELLULOSE, MICROCRYSTALLINE					ID: 9004-34-6
HAZARD SCREENING METHOD: Pharos Chemical and Materials Library			HAZARD SCREENING DATE: 2021-04-11 9:07:30		
%: 0.0000 - 4.0000		GS: LT-UNK	RC: PreC	NANO: No	SUBSTANCE ROLE: Structure component
HAZARD TYPE	AGENCY AND LIST TITLES		WARNINGS		
RES	AOEC - Asthmagens		Asthmagen (Rs) - sensitizer-induced		
SUBSTANCE NOTES: Recycled content					
Pre-consumer 0.38% - 0.59%					
Post-consumer 2.82%- 4.33%					

Section 3: Certifications and Compliance

This section lists applicable certification and standards compliance information for VOC emissions and VOC content. Other types of health or environmental performance testing or certifications completed for the product may be provided.

VOC EMISSIONS	Instituto für Baubiologie Rosenheim GmbH (IBR)		
CERTIFYING PARTY: Third Party	ISSUE DATE: 2020-01-01	EXPIRY DATE: 2022-01-01	CERTIFIER OR LAB: Instituto für Baubiologie Rosenheim GmbH
APPLICABLE FACILITIES: Laminated gypsum board			
CERTIFICATE URL: https://www.baubiologie-ibr.de/es/			
CERTIFICATION AND COMPLIANCE NOTES: VOC and formaldehyde, content and emissions compliance under> -AgBB Scheme 2010 -Émissions dans l'air intérieur A+ Certificate N° 3020 – 1096			
LCA	ISO 14021:1999 Environmental labels and declarations		
CERTIFYING PARTY: Third Party	ISSUE DATE: 2020-11-25	EXPIRY DATE: 2025-11-25	CERTIFIER OR LAB: DAPcons
APPLICABLE FACILITIES: Guixers (Lleida) and Escuzar (Navarra) Knauf GmbH , sucursal España			
CERTIFICATE URL: https://www.csostenible.net/dapcons/index?locale=es			
CERTIFICATION AND COMPLIANCE NOTES: Certification Nr. This is a sector EPD for Drywall. It was performed on behalf of Knauf GmbH. The content of the declaration included: Product definition and information about building physics, information about basic material and the material's origin, description of the product's manufacturing, an indication of product processing, information about the in-use conditions, life cycle assessment results, and testing results and verifications. This declaration refers to the functional unit as prescribed by the PCR. The functional unit is defined as 1 m2 of drywall for a service life of 50 years."			

Section 4: Accessories

This section lists related products or materials that the manufacturer requires or recommends for installation (such as adhesives or fasteners), maintenance, cleaning, or operations. For information relating to the contents of these related products, refer to their applicable Health Product Declarations, if available.

KNAUF UNIK DRYWALL JOINT COMPUND	HPD URL: https://www.knauf.es/productos/pastas/pastas-juntas
CONDITION WHEN RECOMMENDED OR REQUIRED AND/OR OTHER NOTES: Knauf Unik drywall joint compound is compatible with all paper-faced gypsum panels.	
CINTA KNAUF PYL	HPD URL: https://www.knauf.es/productos/accesorios/cintas-mallas-bandas/cinta-pyl.html
CONDITION WHEN RECOMMENDED OR REQUIRED AND/OR OTHER NOTES: Cinta Knauf PYL is compatible with all paper-faced gypsum panels.	
KNAUF TORNILLOS PYL	HPD URL: https://www.knauf.es/productos/accesorios/tornillos-fijaciones-soportes-sanitarios/tornillos-pyl.html
CONDITION WHEN RECOMMENDED OR REQUIRED AND/OR OTHER NOTES: Knauf Tornillos PYL is compatible with all paper-faced gypsum panels.	

Section 5: General Notes

The drywalls that are covered in this HPD are:

- DF 12,5
- DF 15
- DF 18
- DF 25

The composition for each Diamant variation is proportional to the size of the of drywall.

MANUFACTURER INFORMATION

MANUFACTURER: Knauf GmbH Sucursal en España
ADDRESS: Avenida de Burgos 114
 Planta 6
 Madrid MADRID 28050, España
WEBSITE: <https://www.knauf.es/productos/placas/yeso-laminado/diamant-dfh1i.html>

CONTACT NAME: Knauf
TITLE: Departamento Técnico
PHONE: +34 902 440 460
EMAIL: tecnico@knauf.es

The listed contact is responsible for the validity of this HPD and attests that it is accurate and complete to the best of his or her knowledge.

KEY

Hazard Types

AQU Aquatic toxicity	LAN Land toxicity	PHY Physical hazard (flammable or reactive)
CAN Cancer	MAM Mammalian/systemic/organ toxicity	REP Reproductive
DEV Developmental toxicity	MUL Multiple	RES Respiratory sensitization
END Endocrine activity	NEU Neurotoxicity	SKI Skin sensitization/irritation/corrosivity
EYE Eye irritation/corrosivity	NF Not found on Priority Hazard Lists	UNK Unknown
GEN Gene mutation	OZO Ozone depletion	
GLO Global warming	PBT Persistent, bioaccumulative, and toxic	

GreenScreen (GS)

BM-4 Benchmark 4 (prefer-safer chemical)	LT-1 List Translator 1 (Likely Benchmark-1)
BM-3 Benchmark 3 (use but still opportunity for improvement)	LT-UNK List Translator Benchmark Unknown (the chemical is present on at least one GreenScreen Specified List, but the information contained within the list did not result in a clear mapping to a LT-1 or LTP1 score.)
BM-2 Benchmark 2 (use but search for safer substitutes)	
BM-1 Benchmark 1 (avoid - chemical of high concern)	
BM-U Benchmark Unspecified (due to insufficient data)	
LT-P1 List Translator Possible 1 (Possible Benchmark-1)	NoGS No GreenScreen.

Recycled Types

PreC Pre-consumer recycled content
PostC Post-consumer recycled content
UNK Inclusion of recycled content is unknown
None Does not include recycled content

Other Terms:

GHS SDS Globally Harmonized System of Classification and Labeling of Chemicals Safety Data Sheet

Inventory Methods:

Nested Method / Material Threshold Substances listed within each material per threshold indicated per material
Nested Method / Product Threshold Substances listed within each material per threshold indicated per product
Basic Method / Product Threshold Substances listed individually per threshold indicated per product

Nano Composed of nano scale particles or nanotechnology

Third Party Verified Verification by independent certifier approved by HPDC

Preparer Third party preparer, if not self-prepared by manufacturer

Applicable facilities Manufacturing sites to which testing applies

The Health Product Declaration (HPD) Open Standard provides for the disclosure of product contents and potential associated human and environmental health hazards. Hazard associations are based on the HPD Priority Hazard Lists, the GreenScreen List Translator™, and when available, full GreenScreen® assessments. The HPD Open Standard v2.1 is not:

- *a method for the assessment of exposure or risk associated with product handling or use,*
- *a method for assessing potential health impacts of: (i) substances used or created during the manufacturing process or (ii) substances created after the product is delivered for end use.*

Information about life cycle, exposure and/or risk assessments performed on the product may be reported by the manufacturer in appropriate Notes sections, and/or, where applicable, in the Certifications section.

The HPD Open Standard was created and is supported by the Health Product Declaration Collaborative (the HPD Collaborative), a customer-led organization composed of stakeholders throughout the building industry that is committed to the continuous improvement of building products through transparency, openness, and innovation throughout the product supply chain.

The product manufacturer and any applicable independent verifier are solely responsible for the accuracy of statements and claims made in this HPD and for compliance with the HPD standard noted.