

ENVIRONMENTAL PRODUCT DECLARATION

for a sustainable future



Environmental Product Declaration

for Fillers by ISOMAT

Programme The International EPD® System, www.environdec.com

25kg

25kg

Programme operator **EPD International AB**

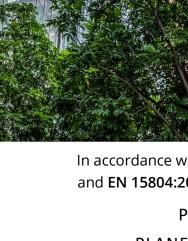
EPD registration number S-P-06173

Publication date 2022-07-20

Valid until 2027-07-19

Geographical scope Global





20kg

20kg

In accordance with ISO 14025 and EN 15804:2012+A2:2019:

PLANFIX PLANFIX-FINE STUCCOCRET STUCCOCRET-PLUS



EPD owner	building quality for a sustainable future	ISOMAT 17th km Thessaloniki – Ag. Athanasios Road, P.O. BOX 1043, 570 03 Ag. Athanasios, Greece export@isomat.eu www.isomat.eu
CA consultant	ENVIROMETRICS Business Corsu tants & Engineers	ENVIROMETRICS ltd Kodrou 3 str., 11636, Athens, Greece info@envirometrics.gr www.envirometrics.gr
rogramme operator	EPD® ENVIRONMENTAL PRODUCT DECLARATION	EPD International AB Box 210 60 SE-100 31 Stockholm Sweden www.environdec.com info@environdec.com
hird party verifier	LCA Studio	Prof. Vladimír Kočí Šárecká 5,16000, Prague 6 - Czech Republic www.lcastudio.cz

Independent third-party verification of the declaration and data, according to ISO 14025:2006:

The International EPD® system

☐ EPD process certification ☒ EPD verification

Procedure for follow-up of data during EPD validity involves third party verifier:

□Yes 🗵 No

Accredited by

Product category rules (PCR)

CEN standard EN 15804 serves as the Core Product Category Rules (PCR).

Product category rules (PCR): PCR 2019:14 Construction products, version 1.11. Published on 2021.02.05, valid until: 2024.12.20. CPC CODE: 375 Articles of concrete, cement and plaster.

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PCR review was conducted by the Technical Committee of the International EPD® System.

Chair: Contact via info@environdec.com

The EPD owner has the sole ownership, liability, and responsibility for the EPD.

EPDs within the same product category but from different programmes may not be comparable.

EPDs of construction products may not be comparable if they do not comply with EN 15804.

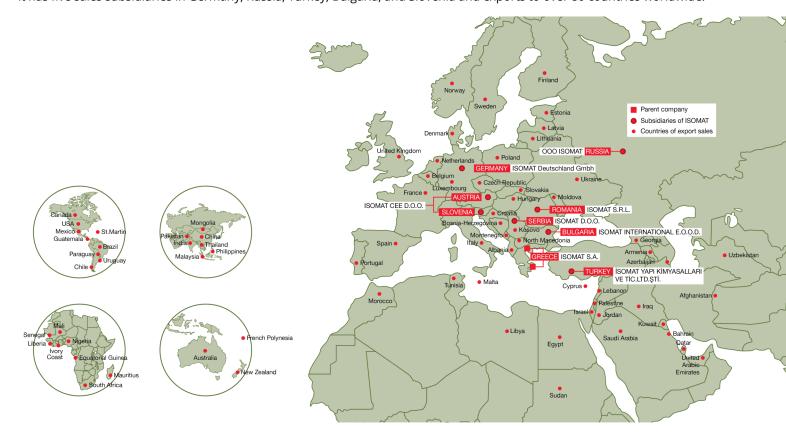
For further information about comparability, see EN 15804 and ISO 14025.

The verifier and the programme operator do not make any claim or have any responsibility of the legality of the product.



Company Info

ISOMAT is a Greek multinational Group specializing in the development and manufacture of building chemicals, mortars and paints. For over 40 years, **ISOMAT** has been making a history of quality, reliability, advanced know-how and continuous business growth. It has three production plants; one in the parent company in Greece and two in its subsidiaries in Romania and Serbia. In addition, it has five sales subsidiaries in Germany, Russia, Turkey, Bulgaria, and Slovenia and exports to over 80 countries worldwide.



The **ISOMAT** Group produces and distributes an extensive range of high-quality products falling into the following 8 product categories:

- Waterproofing
- External Thermal Insulation
- Paints & Surface Protection
- Tile & Stone Installation
- Concrete Admixtures & Repair Products
- Masonry Construction & Repair
- Industrial Floorings
- Microcement Coatings & Decorative Floorings

ISOMAT is committed to continuously developing new, pioneering products in keeping pace with the ever-increasing market needs and technological advancements in the construction industry and with sustainability as its main drive. It owns a fully organized R&D department consisting of 7 chemistry R&D labs and 4 Quality Control labs staffed by highly qualified scientific personnel. Their mission is to continuously optimize existing products and develop innovative, high-performing product solutions and integrated systems covering a wide range of construction needs and applications.



Energy and Social Responsibility Policy

For **ISOMAT**, its people are its key asset in which it constantly invests and thanks to which it evolves. The company's primary concern is to ensure safe and healthy working conditions, have an excellently trained staff, and provide continuous training through technical or educational seminars. In addition, it implements corporate social responsibility practices in relationships with socially vulnerable groups, public benefit foundations and entities, hospitals, educational institutions, public services, etc. Plus, with a customer-centric approach, ISOMAT meets its customers' ever-changing needs and provides a high-quality service experience.

ISOMAT operates in compliance with the requirements of the Legislation, the ISO 9001: 2015 standard and other international standards, based on which its products are certified. The efficiency of the Quality Management System is constantly being improved and measurable quality targets are established and reviewed on an annual basis. These objectives are stated in the annual quality review.

Sustainability is a strategic priority for the **ISOMAT** Group. **ISOMAT**'s Environmental and Energy Policy is oriented toward the guiding principles of sustainability and environmental protection. It implements an Energy and Environmental Management system, certified according to ISO 50001 and ISO 14001, to reduce the consumption of available natural resources and water, reduce the burden of the atmosphere, and save energy during the production process. Waste recycling is another priority for management and employees, as it is promoted through corporate policy as a whole. In this way, the Group's environmental footprint is reduced year by year. Last but not least, aiming towards sustainability, **ISOMAT** is continuously developing and producing more and more premium quality products that contribute to the creation of a healthy living environment and workspace. These products have been awarded internationally recognized certifications for both their technical characteristics and their friendliness towards applicators, end-users, and the environment.





Product Info

This is an average product EPD for multiple categories of ISOMAT fillers. Maximum GWP-GHG deviation of these products shall be 10%, thus they can be divided into two categories, each one representing one weighted average product. The results of this EPD represent the weighted average product. The two different categories are presented below.

Powder fillers for interior and exterior use	Powder fillers for interior use
Average product of PLANFIX (white and grey) & PLANFIX-FINE (white and grey).	Average product of STUCCOCRET & STUCCOCRET-PLUS

PLANFIX

PLANFIX is a fine-grained, polymer-modified, cementitious powder filler for interior and exterior use. With the addition of water, a paste-like mass with very good workability is obtained, suitable for filling. Certified according to EN 1504-3 and classified as PCC R2 type concrete repair mortar.

PLANFIX is suitable for smoothing and repairing of exposed concrete. Also, it is used for filling of cracks, pores or cavities in concrete surfaces and for full-surface smoothing (stuccoing) with very thin layers instead of plastering or cement mortar application.

PLANFIX-FINE

PLANFIX-FINE is an extra fine-grained, polymer-modified, cementitious powder filler for interior and exterior use. With the addition of water, a paste-like mass with very good workability is obtained, suitable for thin-layer applications. Thanks to its particle size, it can be applied with a spray machine. Certified according to EN 1504-3 and classified as PCC R2 type concrete repair mortar.

PLANFIX-FINE is suitable for smoothing and repairing of exposed concrete. Also, it is used for filling of cracks, pores or cavities in concrete surfaces and for full-surface smoothing (stuccoing) with very thin layers instead of plastering or cement mortar application.

STUCCOCRET

STUCCOCRET is a white, ultra fine-grained, polymer-modified, cement-based interior powder filler. With the addition of water, a lump-free paste with great workability is obtained, suitable for smoothing and preparing interior spaces. Certified according to EN 998-1 and classified as GP CS II, W0 type mortar.

STUCCOCRET is used for smoothing and preparing plaster or concrete interior wall surfaces to be covered with paint or other type of coatings. It replaces oil putties and other similar materials.

STUCCOCRET-PLUS

STUCCOCRET-PLUS is a high-performance, ultra fine-grained, white, polymer-modified, cement-based powder filler. With the addition of water, a lump-free paste with good workability is obtained, suitable for smoothing interior surfaces. Being lightweight, it features easy spreading and covers up to 18% extra surface area than conventional fillers. Certified according to EN 998-1 and classified as GP CS II, W0 type mortar.

STUCCOCRET-PLUS is used for smoothing and preparing interior surfaces to be covered with paint or other type of coatings. It is suitable for plaster surfaces or concrete and replaces oil putties and other similar materials.



		Tec	hnical Տր	pecifica	ations		
Specification	PLANFIX white	PLANFIX grey	PLANFIX whit		PLANFIX-FINE grey	STUCCOCRET	STUCCOCRET- PLUS
Form	Cementitious powder	Cementitious powder	Cement		Cementitious powder	Cementitious powder	Cementitious powder
Colors	White	Grey	White		Grey	White	White
Packaging	Paper bags 25 kg	Paper bags 5 kg+25 kg	Paper l 5 kg+2		Paper bags 25 kg	Paper bags 10 kg+20 kg + Plastic bags 4 kg	Paper bags 20 kg
Water demand	6,25 l / 25 kg bag	6,0 l / 25 kg bag	6,75 l / 25 kg bag		6,75 l / 25 kg bag	8,0 l / 20 kg bag	8,8 l / 20 kg bag
Bulk density of dry mortar	1,35 ± 0,1 kg/l	1,35 ± 0,1 kg/l	1,35 ± 0,1 kg/l		1,35 ± 0,1 kg/l	1,00 ± 0,1 kg/l	1,00 ± 0,1 kg/l
Bulk density of fresh mortar	1,70 ± 0,1 kg/l	1,70 ± 0,1 kg/l	1,70 ± 0,	1,70 ± 0,1 kg/l 1,70 ± 0,1 kg/l 1,60 ± 0,1 kg/l		1,60 ± 0,1 kg/l	1,25 ± 0,1 kg/l
Compressive strength (28 days)	≥ 20 N/mm²	≥ 20 N/mm ²	≥ 18 N/	mm²	≥ 18 N/mm ²	3,00 ± 0,50 N/mm ²	2,50 ± 0,50 N/mm ²
Flexural strength (28 days)	≥ 6,0 N/mm ²	≥ 6,0 N/mm ²	≥ 6,0 N/	/mm²	≥ 6,0 N/mm ²	1,30 ± 0,20 N/mm ²	1,20 ± 0,20 N/mm ²
Reaction to fire	Euroclass A1	Euroclass A1	Eurocla	ss A1	Euroclass A1	Euroclass A1	Euroclass A1
	1		Comp	osition			
	The		•	1	v cover all type of fil	lers.	
			Cement	10-30			
		Calcium Carbonat		60-90	9%		
		Vinyl Acetate Et		< 5%			
					of Very High Concern in the final products.	(SVHC)	



System Boundaries

					X= I	nclude	ed, MN	ID= M	odule	Not D	eclare	d					
		roduct stage			ruction age		Use stage				Er	End-of-life stage			Resource recovery stage		
	Raw Materials Supply	Transport	Manufacturing	Transport	Construction installation	Use	Maintenance	Repair	Replacement	Refurbishment	Operational energy use	Operational water use	De-construction and demolition	Transport	Waste processing for re-use, recovery and/or recycling	Disposal	Re-use-Recovery-Recycling-potential
Module	A1	A2	А3	A4	A5	B1	B2	В3	В4	B5	В6	В7	С1	C2	С3	C4	D
Modules declared	х	х	х	MND	MND	MND	MND	MND	MND	MND	MND	MND	х	х	х	х	х
Geography	EU	EU	GR										EU	EU	EU	EU	EU
Specific data used	;	> 90%			_	_	_	_	_	_	_	_	_	_	_	_	_
Variation- products		< 10%		_	_	_	_	_	_	_	_	_	_	_	_	_	_
Variation- sites	Not	releva	ant	_	_	_	_	_	_	_	_	_	_	_	_	_	_

A1: Raw Material Supply

The production starts with the material supply. This stage includes the extraction and processing of raw materials, the generation of electricity and fuels required for the manufacturing stage. Portland cement and calcium carbonate are the main raw materials.

A2: Transportation of raw materials to manufacturer

Transport is relevant for delivery of raw materials from the supplier to the gate of manufacturing plant. Raw materials for the production are transported by trucks from different regions all over the world.



A3: Manufacturing

Manufacturing starts with weighing of raw materials. After weighing, raw materials are mixed and transferred to specially formed silos in order to obtain their final structure. Last stage of manufacturing is the packaging of final products.

C1: De-construction, demolition

Demolition of fillers takes place with the whole demolition of the building/construction.

C2: Transportation of waste

A distance of 100 km by a 16-32 tonne lorry from construction/demolition sites to disposal sites has been chosen as a conservative assumption.

C3: Waste processing for re-use, recovery and/or recycling

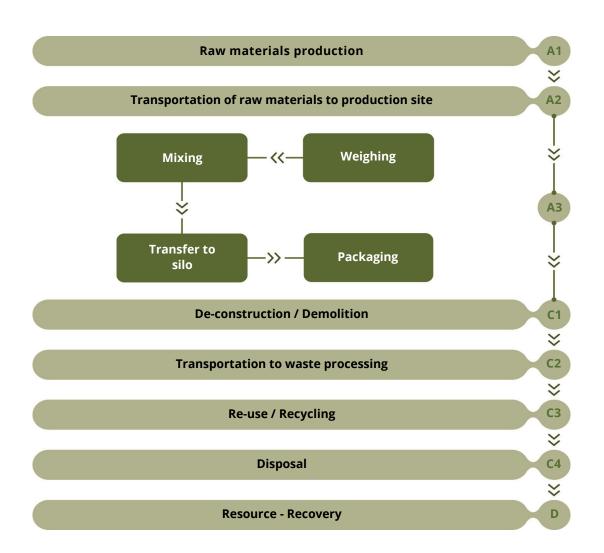
It is assumed that 100% of fillers' end-of-life waste will be landfilled, thus the environmental impact of this module is set to be zero.

C4: Disposal

As mentioned above, 100% of fillers' end-of-life waste will be landfilled.

D: Resource-Recovery stage

Since the product is only disposed of, there are no benefits deriving from the re-use or recycling of the product after its end-of-life stage, and neither is any energy recovery from incinerating the packaging materials.





LCA Info

Declared unit:

The declared unit is 1 kg of ISOMAT fillers.

Goal and Scope:

This EPD evaluates the environmental impacts of the production of 1 kg of ISOMAT fillers from Cradle to gate (A1-A3) with module C1-C4 and D.

System Boundary:

The system boundaries are set to be cradle to gate (A1-A3) with modules C+D.

Cut-off rules:

The cut-off criteria adopted are as stated in "EN 15804:2012+A2:2019". Where there is insufficient data for a unit process, the cut-off criteria are 1% of the total mass of input of that process. The total of neglected input flows per module is a maximum of 5% of energy usage and mass.

Allocations:

Allocation rules have been performed in accordance with the requirements of ISO 14044:2006. Wherever possible allocation was avoided. Allocation based on physical properties (mass) is applied where allocation cannot be avoided. In this case, allocation based on the mass of the final products is applied for electricity used in the plant. Electricity data from ISOMAT was collected separately for each facility (offices, warehouses, utilities, mortars production line and liquids production line) and then was allocated to the corresponding products by mass.

Assumptions:

Modules A2 and C2: A EURO4 16-32 tonne lorry was utilized for road transportation and a bulk carrier for dry goods for sea transportation.

Module C1: Demolition of fillers takes place with the whole demolition of the building/construction. Thus it is assumed that energy used for the demolition of fillers has minor significance and the environmental impact of this module is set to be zero.

Module C2: A conservative assumption of 100 km by a 16-32 tonne lorry was used.

Module C3: It is assumed that 100% of fillers' end-of-life waste will be landfilled, thus the environmental impact of this module is set to be zero.

Module C4: As mentioned above, 100% of fillers' end-of-life waste will be landfilled.

Data quality:

ISO 14044 was applied in terms of data collection and quality requirements. The impact of the production of raw materials recovered from Ecoinvent database v.3.8. The data concerning the modules A2 (Transportation) and A3 (Product manufacturing) were provided by ISOMAT and concerns the full year 2021. These data were the quantities of all input and output materials extracted from the company's SAP system, the consumed utilities (energy, water) and the distances and means of transport for each input stream. Regarding electricity mix, the latest (2020) national residual electricity mix as published in DAPEEP SA was utilized. The end-of-life is based on the most representative scenarios for this product. Background data for this stage are retrieved from Ecoinvent v.3.8.

Geographical Scope:

Worldwide

Time representativeness:

Data obtained refer to the year 2021

Software used:

OpenLCA v.1.10.3



Environmental Performance

Powder fillers for interior and exterior use

ENVIRONMENTAL IMPACTS	Unit	A1-A3	C1	C2	С3	C4	D
GWP-total	kg CO₂ eq	5,62E-01	0,00E+00	1,65E-02	0,00E+00	1,25E-02	0,00E+00
GWP-fossil	kg CO₂ eq	5,61E-01	0,00E+00	1,65E-02	0,00E+00	1,24E-02	0,00E+00
GWP-biogenic	kg CO₂ eq	6,42E-04	0,00E+00	5,55E-06	0,00E+00	5,05E-06	0,00E+00
GWP-luluc	kg CO₂ eq	2,60E-04	0,00E+00	5,58E-06	0,00E+00	2,60E-05	0,00E+00
GWP-GHG ¹	kg CO₂ eq	5,49E-01	0,00E+00	1,63E-02	0,00E+00	1,23E-02	0,00E+00
ODP	kg CFC-11 eq	4,07E-08	0,00E+00	3,77E-09	0,00E+00	3,60E-09	0,00E+00
AP	mol H+ eq	2,16E-03	0,00E+00	8,25E-05	0,00E+00	1,11E-04	0,00E+00
EP-freshwater	kg PO4-3 eq	3,41E-04	0,00E+00	3,42E-06	0,00E+00	2,86E-06	0,00E+00
EP-freshwater ²	kg P eq	1,11E-04	0,00E+00	1,11E-06	0,00E+00	9,34E-07	0,00E+00
EP-marine	kg N eq	4,44E-04	0,00E+00	2,88E-05	0,00E+00	4,28E-05	0,00E+00
EP-terrestrial	mol N eq	4,92E-03	0,00E+00	3,14E-04	0,00E+00	4,68E-04	0,00E+00
POCP	kg NMVOC eq	1,54E-03	0,00E+00	8,95E-05	0,00E+00	1,32E-04	0,00E+00
ADPe	kg Sb eq	9,26E-06	0,00E+00	5,98E-08	0,00E+00	2,53E-08	0,00E+00
ADPf	MJ	6,27E+00	0,00E+00	2,51E-01	0,00E+00	2,48E-01	0,00E+00
WDP ³	m3 eq	1,63E-01	0,00E+00	1,17E-03	0,00E+00	7,22E-03	0,00E+00

¹ GWP-GHG indicator includes all greenhouse gases included in GWP-total but excludes biogenic carbon dioxide emissions and uptake and biogenic carbon stored in the product, with characterization factors (CFs) based on IPCC (2013).

² Eutrophication aquatic freshwater shall be given in both kg PO4 eq and kg P eq.

³ The results of this environmental impact indicators of ADPf, ADPe and WDP shall be used with care as the uncertainties of these results are high or as there is limited experience with the indicator.



RESOURCE USE	Unit	A1-A3	C1	C2	С3	C4	D
PERE	MJ	4,22E-01	0,00E+00	3,38E-03	0,00E+00	2,56E-03	0,00E+00
PERM	MJ	6,69E-03	0,00E+00	0,00E+00	0,00E+00	4,00E+00	0,00E+00
PERT	MJ	4,28E-01	0,00E+00	3,38E-03	0,00E+00	4,00E+00	0,00E+00
PENRE	MJ	6,27E+00	0,00E+00	2,51E-01	0,00E+00	2,48E-01	0,00E+00
PENRM	MJ	6,69E-03	0,00E+00	0,00E+00	0,00E+00	4,00E+00	0,00E+00
PENRT	MJ	6,28E+00	0,00E+00	2,51E-01	0,00E+00	4,25E+00	0,00E+00
SM	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
RSF	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
NRSF	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
FW	m ³	3,80E-03	0,00E+00	2,71E-05	0,00E+00	1,68E-04	0,00E+00

OUTPUT FLOWS AND WASTE CATEGORIES	Unit	A1-A3	C1	C2	С3	C4	D
HWD	kg	7,37E-06	0,00E+00	6,54E-07	0,00E+00	4,94E-07	0,00E+00
NHWD	kg	4,17E-02	0,00E+00	1,20E-02	0,00E+00	1,00E+00	0,00E+00
RWD	kg	1,58E-05	0,00E+00	1,72E-06	0,00E+00	1,64E-06	0,00E+00
CRU	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
MFR	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
MER	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
EE	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00



Powder fillers for interior use

ENVIRONMENTAL IMPACTS	Unit	A1-A3	C1	C2	С3	C4	D
GWP-total	kg CO₂ eq	4,40E-01	0,00E+00	1,65E-02	0,00E+00	1,25E-02	0,00E+00
GWP-fossil	kg CO₂ eq	4,39E-01	0,00E+00	1,65E-02	0,00E+00	1,24E-02	0,00E+00
GWP-biogenic	kg CO₂ eq	6,58E-04	0,00E+00	5,55E-06	0,00E+00	5,05E-06	0,00E+00
GWP-luluc	kg CO₂ eq	2,76E-04	0,00E+00	5,58E-06	0,00E+00	2,60E-05	0,00E+00
GWP-GHG ¹	kg CO₂ eq	4,27E-01	0,00E+00	1,63E-02	0,00E+00	1,23E-02	0,00E+00
ODP	kg CFC-11 eq	4,12E-08	0,00E+00	3,77E-09	0,00E+00	3,60E-09	0,00E+00
AP	mol H+ eq	2,04E-03	0,00E+00	8,25E-05	0,00E+00	1,11E-04	0,00E+00
EP-freshwater	kg PO4-3 eq	3,39E-04	0,00E+00	3,42E-06	0,00E+00	2,86E-06	0,00E+00
EP-freshwater ²	kg P eq	1,10E-04	0,00E+00	1,11E-06	0,00E+00	9,34E-07	0,00E+00
EP-marine	kg N eq	3,82E-04	0,00E+00	2,88E-05	0,00E+00	4,28E-05	0,00E+00
EP-terrestrial	mol N eq	4,22E-03	0,00E+00	3,14E-04	0,00E+00	4,68E-04	0,00E+00
POCP	kg NMVOC eq	1,39E-03	0,00E+00	8,95E-05	0,00E+00	1,32E-04	0,00E+00
ADPe	kg Sb eq	1,12E-05	0,00E+00	5,98E-08	0,00E+00	2,53E-08	0,00E+00
ADPf	MJ	5,61E+00	0,00E+00	2,51E-01	0,00E+00	2,48E-01	0,00E+00
WDP ³	m3 eq	1,53E-01	0,00E+00	1,17E-03	0,00E+00	7,22E-03	0,00E+00

¹ GWP-GHG indicator includes all greenhouse gases included in GWP-total but excludes biogenic carbon dioxide emissions and uptake and biogenic carbon stored in the product, with characterization factors (CFs) based on IPCC (2013).

² Eutrophication aquatic freshwater shall be given in both kg PO4 eq and kg P eq.

³ The results of this environmental impact indicators of ADPf, ADPe and WDP shall be used with care as the uncertainties of these results are high or as there is limited experience with the indicator.



RESOURCE USE	Unit	A1-A3	C1	C2	С3	C4	D
PERE	MJ	4,62E-01	0,00E+00	3,38E-03	0,00E+00	2,56E-03	0,00E+00
PERM	MJ	8,95E-03	0,00E+00	0,00E+00	0,00E+00	4,00E+00	0,00E+00
PERT	MJ	4,71E-01	0,00E+00	3,38E-03	0,00E+00	4,00E+00	0,00E+00
PENRE	MJ	5,61E+00	0,00E+00	2,51E-01	0,00E+00	2,48E-01	0,00E+00
PENRM	MJ	8,95E-03	0,00E+00	0,00E+00	0,00E+00	4,00E+00	0,00E+00
PENRT	MJ	5,62E+00	0,00E+00	2,51E-01	0,00E+00	4,25E+00	0,00E+00
SM	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
RSF	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
NRSF	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
FW	m ³	3,56E-03	0,00E+00	2,71E-05	0,00E+00	1,68E-04	0,00E+00

OUTPUT FLOWS AND WASTE	Unit	A1-A3	C1	C2	С3	C4	D
HWD	kg	8,28E-06	0,00E+00	6,54E-07	0,00E+00	4,94E-07	0,00E+00
NHWD	kg	4,08E-02	0,00E+00	1,20E-02	0,00E+00	1,00E+00	0,00E+00
RWD	kg	1,34E-05	0,00E+00	1,72E-06	0,00E+00	1,64E-06	0,00E+00
CRU	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
MFR	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
MER	kg	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
EE	MJ	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00

Additional Info

The EPD does not give information on release of dangerous substances to soil, water and indoor air because the horizontal standards on measurement of release of regulated dangerous substances from construction products using harmonized test methods according to the provisions of the respective technical committees for European product standards are not available.



Abbreviations

LCA Life Cycle assessment

EPD Environmental Product Declaration

PCR Product category rules

GLO Global

RER Europe

RoW Rest of the world

GWP-total Global Warming Potential total

GWP-fossil Global Warming Potential fossil

GWP-biogenic Global Warming Potential biogenic

GWP-Iuluc Global Warming Potential land use and land use change

ODP Ozone Depletion Potential

AP Acidification Potential

EP-freshwater Eutrophication potential, fraction of nutrients reaching freshwater end compartment

EP-marine Eutrophication Potential fraction of nutrients reaching marine end compartment

EP- terrestrial Eutrophication potential, Accumulated Exceedance

POCP Formation potential of tropospheric ozone photochemical oxidants

ADPe Abiotic depletion potential for non-fossil resources

ADPf Abiotic depletion potential for fossil resources

WDP Water use

PEREUse of renewable primary energy excluding resources used as raw materials

PERM Use of renewable primary energy resources used as raw materials

PERT Total use of renewable primary energy resources

PENRE Use of non-renewable primary energy excluding resources used as raw materials

PENRM Use of non-renewable primary energy resources used as raw materials

PENRT Total use of non-renewable primary energy resources



SM Use of secondary material

RSF Use of renewable secondary fuels

NRSF Use of non-renewable secondary fuels

FW Use of net fresh water

HWD Hazardous waste disposed

NHWD Non-hazardous waste disposed

RWD Radioactive waste disposed

CRU Components for re-use

MFR Materials for recycling

MER Materials for energy recovery

EE Exported Energy

References

General Programme Instructions of the International EPD® System. Version 3.01, 2019-09-18

PCR 2019:14 v.1.11 Construction products. EPD System. Date 2021-02-05. Valid until 2024-12-20

EN 15804:2012+A2:2019, Sustainability of construction works — Environmental Product Declarations — Core rules for the product category of construction products

ISO 14020:2000 Environmental labels and declarations — General principles

ISO 14025:2006 Environmental labels and declarations — Type III environmental declarations — Principles and procedures

ISO 14040:2006 Environmental management — Life cycle assessment — Principles and framework

ISO 14044:2006 Environmental management — Life cycle assessment — Requirements and guidelines

Ecoinvent / Ecoinvent Centre, www.Eco-invent.org

Residual Energy Mix 2020 from Renewable Energy Sources Operator & Guarantees of Origin (DAPEEP SA)