Environmental Product Declaration

In accordance with ISO 14025:2006, EN15804+A2 and ISO21930:2017 for:

ALL-SET® Mortar

From Schluter® Systems

Programme:	The International EPD® System, www.environdec.com
Programme operator:	EPD International AB; EPD is registered through aligned regional hub: EPD North America (www.epdna.com)
EPD registration number:	EPD-IES-0022958
Publication date:	2025-05-15
Valid until:	2030-05-15

An EPD should provide current information and may be updated if conditions change. The stated validity is therefore subject to the continued registration and publication at www.environdec.com

General information

Programme information

Programme:	The International EPD® System
Address:	EPD International AB Box 210 60 SE-100 31 Stockholm Sweden
Website:	www.environdec.com
E-mail:	info@environdec.com

Accountabilities for PCR, LCA and independent, third-party verification	
General Program Instructions and Product Category Rules (PCR)[1]	
General Programme Instructions for the International EPD® System. Version 4.0. 2021-03-29	
Construction Products PCR 2019: 14, Version 1.3.4	
PCR review was conducted by: The Technical Committee of the International EPD® System. A full list of members available on www.environdec.com. The review panel may be contacted via info@environdec.com. Members of the Technical Committee were requested to state any potential conflict of interest with the PCR moderator or PCR committee and were excused from the review. Chair of the PCR Review: Claudia A. Peña Review Dates: 2019-11-28 until 2019-12-18	
The Sub-Category PCR review was conducted by: No sub-category PCR available at the time of study.	
Life Cycle Assessment (LCA)	
LCA accountability: Leslie Louie and Manasa Rao; WAP Sustainability Consulting	
Third-party verification	
Independent third-party verification of the declaration and data, according to ISO 14025:2006, via: ☒ EPD verification by individual verifier ☐ INTERNAL ☒ EXTERNAL	Third-party verifier: James Mellentine, Thrive ESG Approved by: The International EPD System
Procedure for follow-up of data during EPD validity involves third party verifier: ☐ Yes ☒ No	

[1] This EPD is based on a PCR that satisfies procurement rules at the federal, state, and municipal levels which call for EPDs based on the Construction Products PCR 2019: 14, Version 1.3.4. The Construction Products PCR 2019: 14, Version 1.3.4 was used to meet regulatory (example: Buy Clean California Act, etc.) and market expectations (example: Building Transparency EC3 comparisons, LEED and existing vendor procurement requirements, product scoring programs, etc.). The EPD should not be used outside of this context.

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

EPDs within the same product category but registered in different EPD programme, or not compliant with EN 15804 or ISO 21930, may not be comparable. For two EPDs to be comparable, they must be based on the same PCR (including the same version number) or be based on fully-aligned PCRs or versions of PCRs; cover products with identical functions, technical performances and use (e.g. identical declared units); have equivalent system boundaries and descriptions of data; apply equivalent data quality requirements, methods of data collection, and allocation methods; apply identical cut-off rules and impact assessment methods (including the same version of characterization factors); have equivalent content declarations; and be valid at the time of comparison. For further information about comparability, see EN 15804, ISO 21930, and ISO 14025.

Company information

Owner of the EPD: Schluter Systems

Contact: Daniel Marvin. sustainability@schluter.com

Description of the organization: Schluter Systems is a manufacturer and distributor of products designed to make the installation of ceramic tile and stone easier and longer lasting. Schluter has four locations in North America: Plattsburgh, New York; Reno, Nevada; Dallas-Fort Worth, Texas; and Montréal, Québec, as well as six European offices, including its main headquarters in Iserlohn, Germany. With over 2500 employees across the globe, Schluter Systems is dedicated to creating innovative solutions for the tile industry, and working closely with its network of distributors, dealers, tile contractors, architects, specifiers and other members of the building and construction industry.

Location of production site(s): North America

Product information

Product name: ALL-SET Modified Thin-set Mortar.

Product identification: CSI division 09 30 00, UN CPC 37510

Product description: Schluter ALL-SET® is a specialized, modified thin-set mortar for use as a bond coat within tile assemblies that is optimized for use with Schluter® membranes and boards. Schluter ALL-SET® is smooth and creamy, as well as easy to handle and spread. It is ideal for setting tile on both horizontal and vertical surfaces. Schluter ALL-SET® is suitable for use with ceramic, porcelain, and stone tile, including large and heavy tile, in conjunction with Schluter®-Systems' uncoupling and waterproofing membranes (e.g., DITRA, DITRA-HEAT, KERDI, etc.), the Schluter®-Shower System, and KERDI-BOARD. Schluter ALL-SET® can be used in both interior and exterior systems and is available in both grey and white.

Table 1: Technical Details

Item	ALL-SET	Units
Density (wet)	1550	kg/m^3
Production codes	ANSI A118.4T, A118.11, A118.15T	-

LCA information

Declared unit: The declared unit is 3.69 kg per m^2 for All Set (with a density of 1550 kg/m^3) of installed thin-set mortar of 0.00238m thickness used for 75 years.

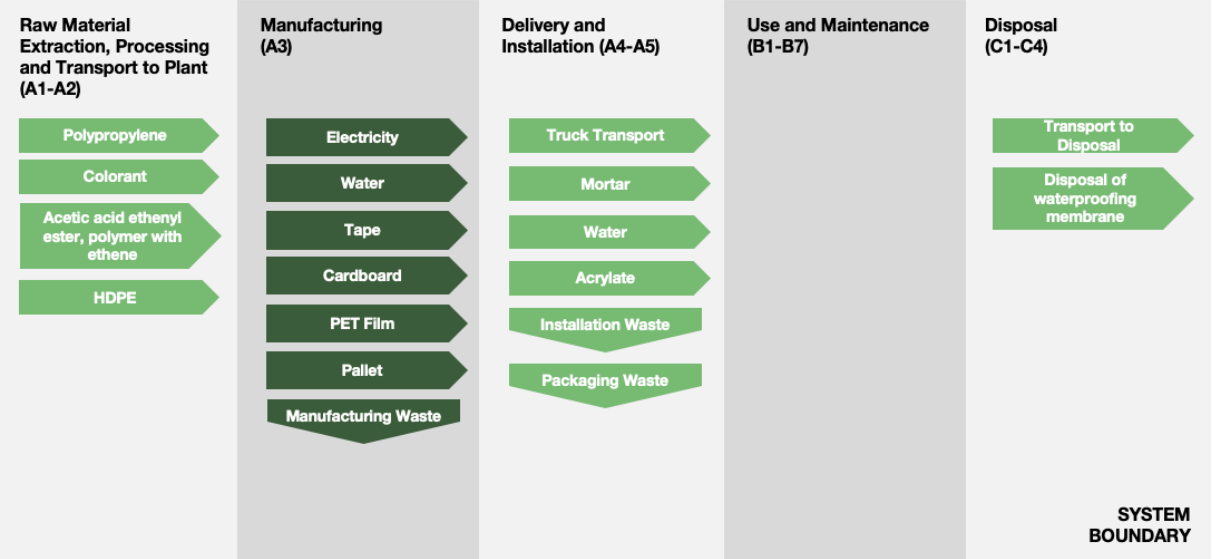
Reference service life: 75 years.

Time representativeness: Primary data were provided by the manufacturer and represent all information for calendar year 2022.

Database(s) and LCA software used: MLC (Managed LCA Content) Database 2023.2 and LCA FE (Life Cycle Assessment for Experts) 10.7.1.28 software.

Description of system boundaries: Cradle-to-grave, modules A1-A5, modules B1-B7, modules C1–C4 and module D.

System diagram:



Manufacturing:
Raw materials are stored at Schluter's facility until required for production. To manufacture all product groups, they weigh, blend, and mix the powders. Then, Schluter packages the products into bags or cartons and palletizes them. There is no material scrap, as any offcuts or excess are re-ground and reintegrated into the production process. After this, they are transported to customer locations or job sites. All manufacturers of products represented by this EPD are governed by federal and local requirements for dust control. Where applicable, they have incorporated dust collection systems in their processes to optimize material usage and mitigate airborne dust and particulate matter within the factory.
Energy resources used in the manufacturing process are accounted for in the model.

Electricity: Energy resources used in the manufacturing process are accounted for in the model. The electricity is sourced from the power grid, and no onsite electricity generation is used. The residual grid mix represents the combination of energy sources supplying an electricity grid, excluding energy claimed by individual consumers. This calculation prevents the double counting of clean energy. The Schulter manufacturing facility, located in Plattsburgh, NY, falls within the NYUP grid region. To ensure

renewable energy is not counted twice, it was removed from the grid mix, and fossil fuel sources were proportionally scaled up to reflect actual consumption. It is assumed that imports are 100% non-renewable.

Table 2: Residual Grid Mix NYUP

Energy Source	Grid Mix %	Residual Grid Mix %
Biogas	0.92%	0.00%
Biomass	0.44%	0.00%
Coal Gas	0.00%	0.00%
Geothermal	0.00%	0.00%
Hard Coal	0.00%	0.21%
Heavy Fuel Oil (HFO)	0.04%	0.13%
Hydroelectric	33.6%	0.00%
Lignite	0.00%	0.00%
Natural Gas	26.2%	50.4%
Nuclear	33.3%	49.2%
Peat	0.00%	0.00%
Photovoltaics	0.87%	0.00%
Solar Thermal	0.00%	0.00%
Wind	4.61%	0.00%
Waste to Energy	0.18%	0.00%
Grid Losses	5.30%	5.30%

Manufacturing inputs and outputs per declared unit were calculated by using annual figures and dividing them by annual production. Packaging materials are also included in the model in this stage with the values being calculated via direct measurement.

Assumptions: Throughout this study, value choices and judgements that may have affected the LCA have been described. Additional decisions are summarized below:

- The inclusion of overhead energy data was determined appropriate due to the inability to sub-meter and isolate manufacturing energy from overhead energy.
- The use and selection of secondary datasets from MLC – The selection of which generic dataset to use to represent an aspect of a supply chain is a significant value choice. Collaboration between the LCA practitioner, the manufacturer, and MLC data experts was invaluable in determining best-case scenarios in the selection of data. However, no generic data can be a perfect fit. Improved supply chain specific data would improve the accuracy of results, however budgetary and time constraints also must be considered.

Cut-off Rules: The cut-off criteria did not exceed 1 % of renewable and non-renewable primary energy usage and 1 % of the total mass input of that unit process. The total of neglected input flows per module, e.g. per module A1-A3, A4-A5, B1-B5, B6-B7, C1-C4 and module D are less than 5 % of energy usage and mass. There are no hazardous or toxic substances that have been knowingly excluded from the study.

The list of excluded materials and energy inputs include:

- As the tools used during the installation of the ALL-SETs are multi-use tools and can be reused after each installation, the per-declared unit impacts are considered negligible and therefore are not included.
- Some material inputs may have been excluded within the MLC datasets used for this project. All MLC datasets have been critically reviewed and conform to the exclusion requirement of the PCR, Construction Products PCR 2019: 14, Version 1.3.4.

Data Quality:

Geographic Coverage: The geographical scope of the manufacturing portion of the life cycle is North America. All primary data were collected from the manufacturer. The geographic coverage of primary data is considered good.
The geographical scope of the raw material acquisition is the United States and Canada. Customer distribution, site installation, and use portions of the life cycle is within North America. Overall geographic data quality is considered good.

Time Coverage: Primary data were provided by the manufacturer and represent all information for calendar year 2022. Using this data meets the PCR requirements. Time coverage of this primary data is considered excellent.

Technological Coverage: Primary data provided by the manufacturer is specific to the technology the company uses in manufacturing their product. It is site-specific and considered of good quality. It is worth noting that the energy and water used in manufacturing the product includes overhead energy such as lighting, heating, and sanitary use of water. Sub-metering was not available to extract process-only energy and water use from the total energy use. Sub-metering would improve the technological coverage of data quality.

Allocation: General principles of allocation were based on ISO 14040/44. There are no products other than the product under study that are produced as part of the manufacturing processes. Since there are no co-products, no allocation based on co-products is required. Waste generated at manufacturing are treated as co-products.
To derive a per-unit value for manufacturing inputs such as electricity, allocation based on total production by mass was adopted. As a default, secondary MLC datasets use a physical basis for allocation.

Modules declared, geographical scope:

	Product stage			Construction process stage		Use stage							End of life stage				Resource recovery stage
	Raw material supply	Transport	Manufacturing	Transport	Construction installation	Use	Maintenance	Repair	Replacement	Refurbishment	Operational energy use	Operational water use	De-construction demolition	Transport	Waste processing	Disposal	Reuse-Recovery-Recycling-potential
Module	**A1**	**A2**	**A3**	**A4**	**A5**	**B1**	**B2**	**B3**	**B4**	**B5**	**B6**	**B7**	**C1**	**C2**	**C3**	**C4**	**D**
Modules declared	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X
Geography	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
Share of specific data	10%			-	-	-	-	-	-	-	-	-	-	-	-	-	-

Content information

All values are reported according to the declared unit of one square meter of uncoupling membrane. No substances included in the Candidate List of Substances of Very High Concern for authorization under REACH Regulations are present in Schluter Systems membranes, either above the threshold for registration with the European Chemicals Agency or above 0.1% (wt./wt).

Table 3: Material Composition

Material	Mass %
Sand	52.0-55.0%
Cement	38.0-40.0%
Modified Methylcellulose	0.10-0.30%
Modified Methylhydroxyethylcellulose	0.10-0.30%
Formic Acid Calcium Salt	0.00-2.00%
Vinyl Acetate-ethylene Copolymer	3.00-5.00%

Packaging Information

The membranes are packaged using cardboard and tape, which is then palletized and covered with shrink wrap for protection. Packaging waste disposal have been modeled as per guidelines in US EPA Waste Disposal Pathways.

Table 4: Packaging

Packaging materials	ALL-SET Weight, kg
Plastic Bag	2.51E-03
Plastic Film	1.33E-03
Cardboard	7.53E-03

Packaging materials	ALL-SET Weight, kg
Pallet	7.64E-02
TOTAL	8.78E-02
Biogenic Carbon in Packaging (kg C/Declared Unit)	3.62E-02

Post-Factory Gate Scenario Development

A4 (Delivery to Installation Site) Scenario Per Declared Unit

The product is delivered to the customer via truck. Transportation averages are calculated based on sales records.

Table 5: Transport to building site (A4)

Distribution Details	ALL-SET
Vehicle Type	Heavy-duty Diesel Truck / 53,333 lb payload - 8b
Fuel Efficiency [L/100km]	42
Fuel Type	Diesel
Distance [km]	500
Capacity Utilization [%]	67%
Weight of Products Transported [kg]	3.69
Capacity utilization volume factor	1

A5 (Construction) Scenario Per Declared Unit

To install Schluter "All-Set" thin-set mortars, you first need to prepare the substrate by cleaning and ensuring it's level, then mix the mortar with water according to the manufacturer's instructions, apply a thin layer with a flat trowel, and finally use a notched trowel to create ridges for optimal tile adhesion; for membranes like Schluter Ditra, firmly embed them into the mortar using a float or roller before placing your tile on top, ensuring full coverage and proper bonding. Product waste at install is considered to be 4.5%, which is taken from the Tile Council of North America (TCNA) EPD for mortar.

Table 6: Installation Materials

Construction Phase End of Life Fates	ALL-SET
Water [kg/m^2]	4.17E-01
Product waste at install [kg/m^2]	1.66E-01
Waste to landfill [kg/m^2]	1.66E-01
Distance to landfill [km]	50.0
Product wastage [%]	4.50
Transport Type	US: Truck - Heavy-duty Diesel Truck 53,333 lb. payload

B1-B7 (Use) Scenario Per Declared Unit

ALL-SETs do not require any inputs or energy for maintenance. Mortar does not need water for cleaning purposes since this product is concealed behind surface materials such as tile. Once installed, they lie below tile flooring protecting the substrate from any damage due to moisture or leakage.

These membranes typically last as long as the building (75 years) and generally don't need to be replaced unless they are damaged or not installed as per manufacturer guidelines.

C1-C4 (Product End of Life) Scenario Per Declared Unit

There are no impacts during deconstruction as the product is either disposed of with the rest of the floor and/or substrate or manually removed via scraping. Mortar is landfilled at end-of-life. All pre-treatment required resource inputs and management activities of the disposal site included through the use of secondary GaBi dataset. Distance to end-of-life facilities is assumed to be 50 km.

Table 7. End-of-Life Scenario Details (C1-C4)

Distribution Details	ALL-SET thin-set mortar
Collected as mixed construction waste [kg]	3.80
Waste to Landfill [kg]	3.80
Distance to Landfill [km]	4.8
Transport Type	US: Truck - Heavy-duty Diesel Truck 53,333 lb. payload

Module D (Benefits and Loads Beyond the System Boundary) Scenario Per Declared Unit

As the products are landfilled at the end of life, there are no impacts or benefits beyond the system boundary.

Impact Category Details

Impact Category	Acronym	Unit
EN 15804 +A2 (based on EF 3.1)		
Climate change - total	GWP_{CCT}	kg CO_2 eq
Climate change – fossil	GWP_{CCF}	kg CO_2 eq
Climate change - biogenic	GWP_{CCB}	kg CO_2 eq
Climate change – land use, Land use change	$GWP_{CCLULUC}$	kg CO_2 eq
Depletion of stratospheric ozone layer	ODP	kg CFC 11 eq
Acidification potential of soil and water	AP	kg Mol H+
Eutrophication potential – aquatic freshwater	EP_{AF}	kg Phosphate eq
Eutrophication potential – aquatic Marine	EP_{AM}	kg N eq
Eutrophication potential - terrestrial	EP_T	Mol N eq
Photochemical ozone creation potential	POCP	kg Ethene eq
Abiotic depletion potential for non-fossil resources	ADP_M	kg Sb eq
Abiotic depletion potential for fossil resources	ADP_F	MJ, net calorific value
TRACI 2.1 and GWP-GHG		
Acidification potential of soil and water	AP	kg SO_2 eq.
Eutrophication potential	EP	kg N eq.
Fossil GHG emissions	GWP-GHG	kg CO_2 eq
Ozone depletion of air	ODP	kg CFC-11 eq.
Smog formation potential	SFP	kg O_3 eq.
Additional impact categories		
Particulate matter	PM	Disease incidence
Ionising radiation, human health	IR	kBq U235 eq.
Ecotoxicity, freshwater	ET	CTUe
Human toxicity, cancer	HT (Cancer)	CTUh
Human toxicity, non-cancer	HT (Non-Cancer)	CTUh
Soil quality	SQ	-
Biogenic Carbon Indicators		
Biogenic Carbon Removal from Product	BCRP	kg CO_2 eq.
Biogenic Carbon Emission from Product	BCEP	kg CO_2 eq.
Biogenic Carbon Removal from Packaging	BCRK	kg CO_2 eq.
Biogenic Carbon Emission from Packaging	BCEK	kg CO_2 eq.
Biogenic Carbon Emission from Combustion of Waste from Renewable Sources Used in Production Processes	BCEW	kg CO_2 eq.
Calcination Carbon Emissions	CCE	kg CO_2 eq.
Carbonation Carbon Removals	CCR	kg CO_2 eq.
Carbon Emissions from Combustion of Waste from Non- Renewable Sources used in Production Processes	CWNR	kg CO_2 eq.
Resource Use Indicators		
Use of renewable primary energy	PERE	MJ LHV
Use of renewable primary energy as materials	PERM	MJ LHV
Total use of renewable primary energy resources	PERT	MJ LHV
Use of non-renewable primary energy	PENRE	MJ LHV
Use of non-renewable primary energy as materials	PENRM	MJ LHV
Total use of non-renewable primary energy resources	PENRT	MJ LHV
Secondary materials	SM	kg

Impact Category	Acronym	Unit
Renewable secondary fuels	RSF	MJ
Non-renewable secondary fuels	NRSF	MJ
Recovered energy	RE	MJ
Net use of fresh water	FW	m^3
Waste and Output Flow Indicators		
Hazardous waste disposed	HWD	kg
Non-hazardous waste disposed	NHWD	kg
Radioactive Waste deposited	RWD	kg
High-level radioactive waste	HLRW	kg
Intermediate- and low-level radioactive waste, conditioned, to final repository	ILLRW	kg
Components for reuse	CRU	kg
Materials for recycling	MFR	kg
Materials for energy recovery	MER	kg
Exported electrical energy	EEE	MJ
Exported thermal energy	EET	MJ

The primary energy resources used as raw materials were calculated by multiplying the mass of each material of the product and packaging content with the lower calorific value (MJ/kg) of the material. Specifically, option B within Annex 3 of the PCR (EPD International, 2022) was utilized for these calculations, whereby the energy used as raw material is declared as an input to the module where it enters the product system and as an output from the product system if it exits the product system as useful energy.

Results of the environmental performance indicators

Mandatory impact category indicators according to Construction Products PCR 2019: 14, Version 1.3.4

Table 8: LCIA results for ALL-SET, per declared unit (m^2) according to ISO 21930

Impact Category	A1-A3	A4	A5	B1-B7	C1	C2	C3	C4	D
IPCC AR6 GWP 100 years									
GWP – excluding	2.86E+00	1.60E-01	1.27E+00	0.00E+00	0.00E+00	2.56E-03	0.00E+00	8.86E-02	0.00E+00
GWP – including	2.66E+00	1.60E-01	1.57E-01	0.00E+00	0.00E+00	2.56E-03	0.00E+00	8.82E-02	0.00E+00
CML 2001 – Jan 2016									
ADPF	3.25E+01	2.09E+00	1.69E+00	0.00E+00	0.00E+00	3.36E-02	0.00E+00	1.30E+00	0.00E+00
TRACI 2.1									
AP	5.43E-03	7.41E-04	3.60E-04	0.00E+00	0.00E+00	7.29E-06	0.00E+00	4.60E-04	0.00E+00
EP	4.01E-04	6.59E-05	3.01E-05	0.00E+00	0.00E+00	7.63E-07	0.00E+00	1.98E-05	0.00E+00
ODP	8.06E-14	4.71E-16	4.05E-15	0.00E+00	0.00E+00	7.57E-18	0.00E+00	4.25E-15	0.00E+00
SFP	1.14E-01	1.71E-02	1.52E-01	0.00E+00	0.00E+00	1.65E-04	0.00E+00	8.22E-03	0.00E+00
Resource Use									
RPR_E	5.29E+00	9.35E-02	2.58E-01	0.00E+00	0.00E+00	1.50E-03	0.00E+00	1.67E-01	0.00E+00
RPR_M	1.65E+00	0.00E+00	7.43E-02	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
RPR_T	6.94E+00	9.35E-02	3.32E-01	0.00E+00	0.00E+00	1.50E-03	0.00E+00	1.67E-01	0.00E+00
$NRPR_E$	3.18E+01	2.11E+00	1.66E+00	0.00E+00	0.00E+00	3.39E-02	0.00E+00	1.35E+00	0.00E+00
$NRPR_M$	4.23E+00	0.00E+00	1.90E-01	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
$NRPR_T$	3.60E+01	2.11E+00	1.85E+00	0.00E+00	0.00E+00	3.39E-02	0.00E+00	1.35E+00	0.00E+00
SM	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
RSF	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
NRSF	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00

RE	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
FW	1.43E-02	3.11E-04	1.11E-03	0.00E+00	0.00E+00	4.99E-06	0.00E+00	1.74E-04	0.00E+00
Waste Categories and Output Flows									
HWD	1.06E-08	2.85E-10	5.23E-10	0.00E+00	0.00E+00	4.57E-12	0.00E+00	3.32E-10	0.00E+00
NHWD	1.88E-01	2.11E-04	3.76E-01	0.00E+00	0.00E+00	3.38E-06	0.00E+00	4.11E+00	0.00E+00
HLRW	1.50E-06	7.55E-09	6.97E-08	0.00E+00	0.00E+00	1.21E-10	0.00E+00	1.60E-08	0.00E+00
ILLRW	1.26E-03	6.36E-06	5.86E-05	0.00E+00	0.00E+00	1.02E-07	0.00E+00	1.43E-05	0.00E+00
CRU	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
MR	0.00E+00	0.00E+00	6.35E-02	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
EEE	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
EET	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Biogenic Carbon Indicators									
BCRP	8.52E-03	0.00E+00	3.84E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
BCEP	0.00E+00	0.00E+00	4.09E-04	0.00E+00	0.00E+00	0.00E+00	0.00E+00	9.10E-03	0.00E+00
BCRK	1.56E-01	0.00E+00	7.03E-03	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
BCEK	0.00E+00	0.00E+00	1.16E-01	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
BCEW	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
CCE	0.00E+00	0.00E+00	1.11E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
CCR	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
CWNR	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00

Table 9: LCIA results for ALL-SET, per declared unit (m2) according to EN 15804+A2

Impact Category	A1-A3	A4	A5	B1-B7	C1	C2	C3	C4	D
EN 15804+A2, according to EF 3.1									
GWP – total	2.66E+00	1.60E-01	1.27E+00	0.00E+00	0.00E+00	2.56E-03	0.00E+00	8.83E-02	0.00E+00

GWP – fossil	2.86E+00	1.60E-01	1.46E-01	0.00E+00	0.00E+00	2.56E-03	0.00E+00	8.85E-02	0.00E+00
GWP – biogenic	-1.93E-01	-1.72E-04	1.11E-02	0.00E+00	0.00E+00	-2.76E-06	0.00E+00	-2.30E-04	0.00E+00
GWP – land use	4.62E-04	8.94E-05	2.92E-05	0.00E+00	0.00E+00	1.44E-06	0.00E+00	4.11E-05	0.00E+00
ODP	4.05E-12	2.36E-14	2.03E-13	0.00E+00	0.00E+00	3.78E-16	0.00E+00	2.14E-13	0.00E+00
AP	5.99E-03	7.96E-04	3.86E-04	0.00E+00	0.00E+00	7.87E-06	0.00E+00	5.29E-04	0.00E+00
EP – fresh water	5.48E-06	8.12E-07	6.37E-07	0.00E+00	0.00E+00	1.30E-08	0.00E+00	1.61E-07	0.00E+00
EP – marine	1.88E-03	3.97E-04	1.22E-04	0.00E+00	0.00E+00	3.80E-06	0.00E+00	1.31E-04	0.00E+00
EP – terrestrial	2.05E-02	4.37E-03	1.40E-03	0.00E+00	0.00E+00	4.20E-05	0.00E+00	1.44E-03	0.00E+00
POCP	5.59E-03	8.13E-04	3.42E-04	0.00E+00	0.00E+00	7.65E-06	0.00E+00	4.04E-04	0.00E+00
ADP – elements	2.46E-07	2.11E-08	1.30E-08	0.00E+00	0.00E+00	3.38E-10	0.00E+00	9.08E-09	0.00E+00
ADP – fossil	3.60E+01	2.11E+00	1.85E+00	0.00E+00	0.00E+00	3.39E-02	0.00E+00	1.35E+00	0.00E+00
WDP	4.84E-01	9.55E-03	3.77E-02	0.00E+00	0.00E+00	1.53E-04	0.00E+00	4.83E-03	0.00E+00
GWP-GHG	2.86E+00	1.60E-01	1.57E-01	0.00E+00	0.00E+00	2.56E-03	0.00E+00	8.87E-02	0.00E+00
Additional Indicators									
PM	4.47E-07	8.10E-09	2.13E-08	0.00E+00	0.00E+00	8.73E-11	0.00E+00	6.03E-09	0.00E+00
IR	1.06E-01	5.38E-04	4.94E-03	0.00E+00	0.00E+00	8.65E-06	0.00E+00	1.38E-03	0.00E+00
ET	1.01E+01	1.65E+00	6.94E-01	0.00E+00	0.00E+00	2.65E-02	0.00E+00	6.30E-01	0.00E+00
HT (Cancer)	9.21E-06	4.09E-11	4.15E-07	0.00E+00	0.00E+00	5.16E-13	0.00E+00	1.46E-11	0.00E+00
HT (Non-Cancer)	1.58E-06	6.54E-10	7.13E-08	0.00E+00	0.00E+00	1.04E-11	0.00E+00	4.47E-10	0.00E+00
SQ	1.57E+01	4.10E-01	7.38E-01	0.00E+00	0.00E+00	6.59E-03	0.00E+00	1.21E-01	0.00E+00
Resource Use Parameters									
PERE	5.29E+00	9.35E-02	2.58E-01	0.00E+00	0.00E+00	1.50E-03	0.00E+00	1.67E-01	0.00E+00
PERM	1.65E+00	0.00E+00	7.43E-02	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
PERT	6.94E+00	9.35E-02	3.32E-01	0.00E+00	0.00E+00	1.50E-03	0.00E+00	1.67E-01	0.00E+00
PENRE	3.18E+01	2.11E+00	1.66E+00	0.00E+00	0.00E+00	3.39E-02	0.00E+00	1.35E+00	0.00E+00

PENRM	4.23E+00	0.00E+00	1.90E-01	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
PENRT	3.60E+01	2.11E+00	1.85E+00	0.00E+00	0.00E+00	3.39E-02	0.00E+00	1.35E+00	0.00E+00
SM	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
RSF	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
NRSF	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
FW	1.43E-02	3.11E-04	0.00E+00	0.00E+00	0.00E+00	4.99E-06	0.00E+00	1.74E-04	0.00E+00
Waste Parameters and Output Flows									
RWD	1.27E-03	6.37E-06	5.87E-05	0.00E+00	0.00E+00	1.02E-07	0.00E+00	1.43E-05	0.00E+00
HWD	1.06E-08	2.85E-10	5.23E-10	0.00E+00	0.00E+00	4.57E-12	0.00E+00	3.32E-10	0.00E+00
NHWD	1.88E-01	2.11E-04	3.76E-01	0.00E+00	0.00E+00	3.38E-06	0.00E+00	4.11E+00	0.00E+00
HLRW	1.50E-06	7.55E-09	6.97E-08	0.00E+00	0.00E+00	1.21E-10	0.00E+00	1.60E-08	0.00E+00
ILLRW	1.26E-03	6.36E-06	5.86E-05	0.00E+00	0.00E+00	1.02E-07	0.00E+00	1.43E-05	0.00E+00
CRU	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
MR	0.00E+00	0.00E+00	6.35E-02	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
EEE	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00
EET	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00	0.00E+00

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