



EcoReview
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Environmental Product Declaration

Type III Declaration according to
ISO 14025 and EN 15804+A2 &
NMD Assessment Method 1.2



Environmental Product Declaration
According to ISO 14025:2010 and EN 15804+A2



Product Declaration Aqua Technology Self-Adhesive Layer
Unit (DU or FU) 1 m² (0.025kg/m²)
Declared by Vitrulan Textile Glass
Owner of Declaration Vitrulan Textile Glass
Verifier Else-A

LCA study by EcoReview B.V.
Calculation number 2025.023.
Issue Date 10-03-2025
Expiry Date 10-03-2030

General Information

Owner of Declaration

Name	Vitrulan Textile Glass
Street	Bernecker Straße 8
Postal Code	95509
City	Marktschorgast
Contact	Andreas Kaul



Declaration for

Calculation Number	2025.023.
Issue Date	10-03-2025
Expiry Date	10-03-2030
Product	Aqua Technology Self-Adhesive Layer
Declared / Functional Unit	1 m ² (0.025kg/m ²)
Reference Service Life	15 years.
Scalable product	n.a.
Geographical Representation	Produced (A1-D) at Vitrulan, Marktschorgast
Product Description	Aqua Technology Self-Adhesive Layer is a uniform layer of adhesive pre-applied to the back of the wall covering in the factory and activated by water.

Declaration Information

This Type III Environmental Product Declaration is in accordance with ISO 14025:2006 and EN 15804+A2. This certificate is based on an LCA-dossier developed according to ISO14025:2006, ISO14040 and EN15804+A2 and the NMD Assessment Method 1.2. EPD of construction products may not be comparable if they do not comply with EN15804+A2 and the NMD Assessment Method 1.2. Substances of Very High Concern (SVHC) that are listed on the 'Candidate List of Substances of Very High Concern for authorization' are declared when contents exceed the limits for registration with ECHA.

This LCA study was conducted by: Ruben van Gaalen, EcoReview B.V.

Demonstration of Verification

Statement CEN standard EN15804 serves as the core PCR. Verification of the claim and data was carried out independently according to ISO 14025:2010

Verifier Name External
Signature Elsemieke Juffer, Else-a

A handwritten signature in blue ink, enclosed in a dashed rectangular box.

LCA Information

LCA Standard	ISO 14040:2006
Product Category Rules (PCR)	EN 15804+A2 + NMD Assessment Method 1.2
Additional PCR	n.a.
Standard Database	Ecoinvent 3.6 + NMD 3.9
LCA Software	SimaPro 9.6.0.1
Year of Data Collection	2021

Environmental Product Declaration

Type III environmental declaration according to ISO 14025:2010 and EN 15804+A2 & NMD Assessment Method 1.2



Scope of Declaration

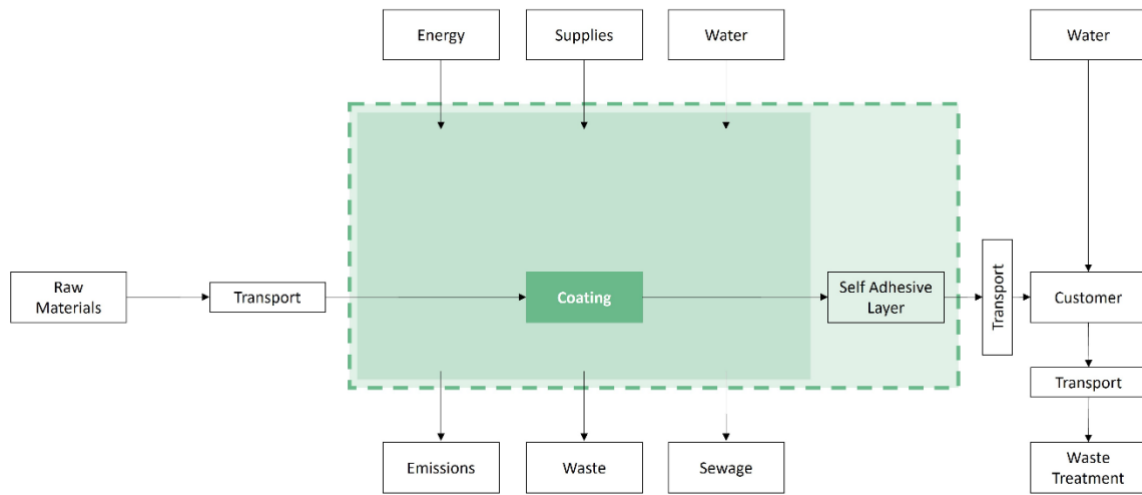
Lifecycle Stage	Module	Declared	Description
Production stage	A1	X	Raw Material supply
	A2	X	Transport
	A3	X	Manufacturing
Construction stage	A4	X	Transport
	A4	X	Installation
Use stage	B1	X	Use
	B2	X	Maintenance
	B3	X	Repair
	B4	X	Replacement
	B5	X	Refurbishment
	B6	MND	Operational Energy Use
	B7	MND	Operational Water Use
End-of-Life stage	C1	X	Deconstruction
	C2	X	Transport
	C3	X	Waste Processing
	C4	X	Disposal
Benefits and loads beyond the system boundaries	D	X	Reuse, Recycle, Recycling potential

X = Module Declared

MND = Module Not Declared



Process Diagram



Detailed Product Description

General Product Information

Aqua Technology was introduced by Vitrulan in 2001. It consists of a uniform layer of adhesive pre-applied to the back of the wall covering in the factory and activated by water. The adhesive complies with the same requirements as conventional dispersion adhesives but with one particular advantage – since the wall covering is pre-pasted with just the right amount of adhesive, there is no danger of missing areas or applying too much. To activate the adhesive coating, the wall covering is drawn through a water bath, loosely folded (approx. 1 m long folds) and cut to the desired length. After an activation time of 1 to 3 minutes, the lengths are ready to hang.

Components (> 1%)

The division of components described below is intended to enable users of this EPD to understand the composition of the product for safe and effective installation, use and disposal of the product.

Component	Mass %
Coating	100%

Example Image



Figure: Representation of product..



Results EN15804+A1

Set 1	Unit	A1	A2	A3	A1-A3	A4	A5	B1-B5	C1	C2	C3	C4	D	A1-D
ECI	euro	0,01	0,00	0,01	0,02	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,02
ECI	euro	1,11E-02	1,90E-04	9,42E-03	2,07E-02	1,44E-04	3,94E-06	0,00E+00	3,30E-05	2,05E-05	0,00E+00	1,55E-05	0,00E+00	2,09E-02
Core Impact Indicators														
ADPE	kg Sb eq	2,10E-06	4,04E-08	3,29E-07	2,47E-06	2,82E-08	9,58E-10	0,00E+00	1,53E-09	4,34E-09	0,00E+00	9,62E-10	0,00E+00	2,50E-06
ADPF	kg Sb eq	4,04E-04	1,16E-05	8,27E-04	1,24E-03	1,17E-05	2,46E-07	0,00E+00	3,11E-06	1,25E-06	0,00E+00	1,64E-06	0,00E+00	1,26E-03
GWP	kg CO2 eq	5,27E-02	1,58E-03	1,11E-01	1,65E-01	1,57E-03	3,37E-05	0,00E+00	4,34E-04	1,70E-04	0,00E+00	1,07E-04	0,00E+00	1,67E-01
ODP	kg CFC-11 eq	6,05E-09	2,80E-10	7,94E-09	1,43E-08	2,96E-10	3,54E-12	0,00E+00	2,04E-11	3,02E-11	0,00E+00	4,21E-11	0,00E+00	1,47E-08
POCP	kg C2H4	3,05E-05	9,53E-07	2,11E-05	5,25E-05	9,58E-07	2,06E-08	0,00E+00	5,64E-08	1,03E-07	0,00E+00	1,16E-07	0,00E+00	5,38E-05
AP	kg SO2 eq	5,16E-04	6,94E-06	1,97E-04	7,21E-04	4,34E-06	1,66E-07	0,00E+00	8,74E-07	7,47E-07	0,00E+00	7,87E-07	0,00E+00	7,28E-04
EP	kg PO4--- eq	3,00E-04	1,36E-06	1,28E-04	4,29E-04	7,33E-07	2,11E-08	0,00E+00	2,98E-07	1,47E-07	0,00E+00	1,69E-07	0,00E+00	4,30E-04
Toxicity Indicators for Dutch Market														
HTP	kg 1,4-DB eq	2,71E-02	6,65E-04	1,53E-02	4,31E-02	3,66E-04	1,33E-05	0,00E+00	4,16E-05	7,16E-05	0,00E+00	5,03E-05	0,00E+00	4,37E-02
FAETP	kg 1,4-DB eq	2,91E-02	1,94E-05	1,07E-03	3,02E-02	1,47E-05	2,89E-07	0,00E+00	1,54E-06	2,09E-06	0,00E+00	1,20E-06	0,00E+00	3,02E-02
MAETP	kg 1,4-DB eq	1,80E+00	6,98E-02	3,45E+00	5,32E+00	4,12E-02	9,15E-04	0,00E+00	6,54E-03	7,51E-03	0,00E+00	4,05E-03	0,00E+00	5,38E+00
TETP	kg 1,4-DB eq	1,38E-03	2,35E-06	1,96E-04	1,57E-03	1,95E-06	3,98E-07	0,00E+00	8,44E-07	2,53E-07	0,00E+00	1,15E-07	0,00E+00	1,58E-03

ECI = Environmental Cost Indicator (Milieukosten Indicator (MKI) in Dutch); ADPE = Abiotic depletion potential for non-fossil resources; ADPF = Abiotic depletion potential for fossil resources; GWP = Global warming potential; ODP = Depletion potential of the stratospheric ozone layer; POCP = Formation potential of tropospheric ozone photochemical oxidants; AP = Acidification potential of land and water; EP = Eutrophication potential; HTP = Human toxicity potential; FAETP = Freshwater aquatic ecotoxicity potential; MAETP = Marine aquatic ecotoxicity potential; TETP = Terrestrial ecotoxicity potential; ECI = Environmental Costs Indicator; ADPF = Abiotic depletion potential for fossil resources

Environmental Product Declaration

Type III environmental declaration according to ISO 14025:2010 and EN 15804+A2 & NMD Assessment Method 1.2



Results EN15804+A2

Set 2	Unit	A1	A2	A3	A1-A3	A4	A5	B1-B5	C1	C2	C3	C4	D	A1-D
ECI	euro	0,01	0,00	0,02	0,03	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,00	0,03
ECI	euro	1,41E-02	3,25E-04	1,63E-02	3,07E-02	2,86E-04	2,81E-05	0,00E+00	6,36E-05	3,50E-05	0,00E+00	1,48E-03	0,00E+00	3,25E-02
GWP-Total	kg CO2 eq	4,30E-02	1,59E-03	1,23E-01	1,68E-01	1,59E-03	3,50E-05	0,00E+00	4,69E-04	1,72E-04	0,00E+00	1,26E-02	0,00E+00	1,83E-01
GWP-f	kg CO2 eq	5,16E-02	1,59E-03	1,12E-01	1,65E-01	1,59E-03	3,43E-05	0,00E+00	4,33E-04	1,71E-04	0,00E+00	1,09E-04	0,00E+00	1,67E-01
GWP-b	kg CO2 eq	-9,14E-03	7,35E-07	1,19E-02	2,78E-03	7,62E-07	7,00E-07	0,00E+00	3,56E-05	7,91E-08	0,00E+00	1,25E-02	0,00E+00	1,53E-02
GWP-luluc	kg CO2 eq	4,54E-04	5,84E-07	7,53E-05	5,29E-04	4,11E-07	5,58E-08	0,00E+00	5,19E-07	6,28E-08	0,00E+00	2,13E-08	0,00E+00	5,31E-04
ODP	kg CFC11 eq	6,70E-09	3,52E-10	8,14E-09	1,52E-08	3,72E-10	3,04E-12	0,00E+00	1,64E-11	3,78E-11	0,00E+00	5,30E-11	0,00E+00	1,57E-08
AP	mol H+ eq	8,34E-04	9,24E-06	2,57E-04	1,10E-03	5,45E-06	2,00E-07	0,00E+00	1,14E-06	9,94E-07	0,00E+00	1,06E-06	0,00E+00	1,11E-03
EP-fw	kg P eq	1,77E-05	1,61E-08	1,49E-05	3,26E-05	1,15E-08	2,74E-09	0,00E+00	6,59E-08	1,73E-09	0,00E+00	8,12E-10	0,00E+00	3,27E-05
EP-m	kg N eq	4,10E-04	3,26E-06	1,71E-04	5,85E-04	1,35E-06	3,17E-08	0,00E+00	1,85E-07	3,50E-07	0,00E+00	3,98E-07	0,00E+00	5,87E-04
EP-t	mol N eq	3,26E-03	3,59E-05	6,86E-04	3,98E-03	1,51E-05	3,69E-07	0,00E+00	2,99E-06	3,86E-06	0,00E+00	4,39E-06	0,00E+00	4,01E-03
POCP	kg NMVOC eq	2,44E-04	1,02E-05	1,53E-04	4,07E-04	5,39E-06	1,16E-07	0,00E+00	5,45E-07	1,10E-06	0,00E+00	1,25E-06	0,00E+00	4,15E-04
ADP-mm	kg Sb eq	1,84E-06	4,04E-08	3,29E-07	2,21E-06	2,82E-08	9,58E-10	0,00E+00	1,53E-09	4,34E-09	0,00E+00	9,62E-10	0,00E+00	2,25E-06
ADP-f	MJ	8,13E-01	2,40E-02	1,55E+00	2,39E+00	2,46E-02	5,86E-04	0,00E+00	5,90E-03	2,58E-03	0,00E+00	3,51E-03	0,00E+00	2,43E+00
WDP	m3 depriv.	2,18E-01	8,59E-05	-2,34E-01	-1,59E-02	1,03E-04	4,30E-03	0,00E+00	1,45E-05	9,25E-06	0,00E+00	1,06E-05	0,00E+00	-1,14E-02
PM	disease inc.	5,97E-09	1,43E-10	1,25E-09	7,35E-09	1,13E-10	1,68E-12	0,00E+00	4,03E-12	1,54E-11	0,00E+00	2,26E-11	0,00E+00	7,51E-09
IR	kBq U-235 eq	1,85E-03	1,01E-04	2,84E-03	4,80E-03	1,05E-04	4,05E-06	0,00E+00	1,86E-05	1,08E-05	0,00E+00	1,52E-05	0,00E+00	4,95E-03
ETP-fw	CTUe	3,28E+00	2,14E-02	3,23E+00	6,54E+00	1,83E-02	6,43E-04	0,00E+00	3,85E-03	2,31E-03	0,00E+00	1,93E-03	0,00E+00	6,56E+00
HTP-c	CTUh	6,68E-11	6,95E-13	3,69E-11	1,04E-10	4,75E-13	9,36E-14	0,00E+00	7,23E-14	7,48E-14	0,00E+00	4,07E-14	0,00E+00	1,05E-10
HTP-nc	CTUh	2,92E-09	2,34E-11	1,22E-09	4,16E-09	1,53E-11	2,10E-12	0,00E+00	3,20E-12	2,52E-12	0,00E+00	1,06E-12	0,00E+00	4,18E-09
SQP	Pt	2,60E+00	2,08E-02	2,16E-01	2,83E+00	2,75E-02	1,65E-04	0,00E+00	1,06E-03	2,24E-03	0,00E+00	7,73E-03	0,00E+00	2,87E+00

ECI = Environmental Cost Indicator (Milieukosten Indicator (MKI) in Dutch); GWP-total = Climate change; GWP-f = Climate change - Fossil; GWP-b = Climate change - Biogenic; GWP-luluc = Climate change - Land use and LU change; ODP = Ozone depletion; AP = Acidification; EP-fw = Eutrophication, freshwater; EP-m = Eutrophication, marine; EP-t = Eutrophication, terrestrial; POCP = Photochemical ozone formation; ADP-mm = Resource use, minerals and metals; ADP-f = Resource use, fossils; WDP = Water use; PM = Particulate matter; IR = Ionising radiation; ETP-fw = Ecotoxicity, freshwater; HTP-c = Human toxicity, cancer; HTP-nc = Human toxicity, non-cancer; SQP = Land use.

Environmental Product Declaration

Type III environmental declaration according to ISO 14025:2010 and EN 15804+A2 & NMD Assessment Method 1.2



Results Parameters

Parameter	Unit	A1	A2	A3	A1-A3	A4	A5	B1-B5	C1	C2	C3	C4	D	A1-D
Resource Use														
PERE	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
PERM	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
PERT	MJ	5,59E-01	3,01E-04	1,04E-01	6,63E-01	2,57E-04	7,96E-05	0,00E+00	7,30E-04	3,24E-05	0,00E+00	5,40E-05	0,00E+00	6,65E-01
PENRE	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
PENRM	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
PENRT	MJ	8,71E-01	2,55E-02	1,69E+00	2,59E+00	2,61E-02	6,18E-04	0,00E+00	6,33E-03	2,74E-03	0,00E+00	3,73E-03	0,00E+00	2,63E+00
PET	MJ	1,43E+00	2,58E-02	1,80E+00	3,25E+00	2,64E-02	6,98E-04	0,00E+00	7,06E-03	2,78E-03	0,00E+00	3,78E-03	0,00E+00	3,29E+00
SM	kg	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	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	0,00E+00	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
FW	m3	8,19E-03	2,93E-06	-5,12E-03	3,07E-03	3,13E-06	1,01E-04	0,00E+00	2,46E-06	3,15E-07	0,00E+00	4,18E-06	0,00E+00	3,19E-03
Waste Categories														
HWD	kg	1,07E-06	6,09E-08	2,12E-06	3,24E-06	6,09E-08	1,01E-09	0,00E+00	1,77E-09	6,55E-09	0,00E+00	3,91E-09	0,00E+00	3,32E-06
NHWD	kg	1,31E-02	1,52E-03	7,36E-03	2,20E-02	2,09E-03	7,11E-06	0,00E+00	2,33E-05	1,64E-04	0,00E+00	2,54E-02	0,00E+00	4,97E-02
RWD	kg	2,28E-06	1,58E-07	3,62E-06	6,05E-06	1,66E-07	3,43E-09	0,00E+00	2,40E-08	1,70E-08	0,00E+00	2,39E-08	0,00E+00	6,29E-06
Output Flows														
CRU	kg	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	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00	0,00E+00
MER	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
EE-E	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00
EE-T	MJ	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	0,00E+00	0,00E+00	0,00E+00	0,00E+00

PERE = Use of renewable primary energy excluding renewable primary energy resources used as raw materials [MJ]; PERM = Use of renewable primary energy resources used as raw materials [MJ]; PERT = Total use of renewable primary energy resources [MJ]; PENRE = Use of non-renewable primary energy excluding non-renewable primary energy resources used as raw materials [MJ]; PENRM = Use of non-renewable primary energy resources used as raw materials [MJ]; PENRT = Total use of non-renewable primary energy resources [MJ]; PET = Total Energy [MJ]; SM = Use of secondary material [kg]; RSF = Use of renewable secondary fuels [MJ]; NRSF = Use of non-renewable secondary fuels [MJ]; FW = Use of net fresh water [m3]; HWD = Hazardous waste disposed [kg]; NHWD = Non-hazardous waste disposed [kg]; RWD = Radioactive waste disposed [kg]; CRU = Components for re-use [kg]; MFR = Materials for recycling [kg]; EIA = Materials for energy recovery [kg]; EE = Exported energy [MJ]

Environmental Product Declaration

Type III environmental declaration according to ISO 14025:2010 and EN 15804+A2 & NMD Assessment Method 1.2



Biogenic Carbon Content

In the table below, information describing the biogenic carbon content at factory gate (A1-D) is described.

Biogenic Carbon Content	Amount (in kg C)
Biogenic Carbon in Product	1,25E-02
Biogenic Carbon in Packaging	0,00E+00
Note: 1 kg biogenic carbon (C) is equivalent to 44/12 kg CO ₂	

If the mass of biogenic carbon containing materials in the product is less than 5% of the mass of the product, the declaration of biogenic carbon may be omitted (= 0 kg).

If the mass of biogenic carbon containing materials in the packaging is less than 5% of the mass of the product, the declaration of biogenic carbon may be omitted (= 0 kg).



References

CML - Department of Industrial Ecology, CML-IA Characterisation Factors, Dated August 2016, Leiden University, Leiden, Netherlands Available at: <https://www.universiteitleiden.nl/en/research/research-output/science/cml-ia-characterisation-factors>.

PRé Sustainability - Simapro 9.6.0.1

EN 15804: Sustainability of construction works - Environmental product declarations - Core rules for the product category of construction products', I.S. EN 15804:2012+A1:2013 and EN 15804:2019+A2.

ISO 14040: Environmental management - Life cycle assessment – Principles and Framework', International Organization for Standardization, ISO14040:2006.

ISO 14044: Environmental management - Life cycle assessment - Requirements and guidelines', International Organization for Standardization, ISO14044:2006.

ISO 14025: Environmental labels and declarations -- Type III environmental declarations -- Principles and procedures', International Organization for Standardization, ISO14025:2006.

NMD Environmental Performance Assessment Method for Buildings version 1.2 (December 2024)

