

Environmental Profile

This LCA is calculated according to: ISO 14044, ISO 14040 and EN 15804

Ecochain v3.5.80



Product: 3024007 - KANION PVC Angle int. 70x90 BN
Unit: 1 piece
Manufacturer: Wavin - PL -Buk - Extra products

Kanion gutters mean original design, elegance and aesthetics. They are designed to drain 100% of rainwater. It is safe to say that they are intended for the most demanding users.

LCA standard: EN15804+A2 (2019)
Standard database: Worldwide - Ecoinvent v 3.6 Cut-Off
Externally verified: Yes
Issue date: 08-06-2023
End of validity: 08-06-2028
Verifier: Martijn van Hövell - SGS Search



This LCA was evaluated according to EN15804+A2. It was concluded that the LCA complies with this standard

The LCA background information and project dossier have been registered in the online Ecochain application in the account Wavin - PL -Buk - Extra products (2020). (☑ = module declared, MND = module not declared).

A1	A2	A3	A4	A5	B1	B2	B3	B4	B5	B6	B7	C1	C2	C3	C4	D
☑	☑	☑	MND	MND	MND	MND	MND	MND	MND	MND	MND	MND	☑	☑	☑	☑
Product stage					Use stage							End-of-Life stage				
A1 Raw material supply A2 Transport A3 Manufacturing					B1 Use B2 Maintenance B3 Repair B4 Replacement B5 Refurbishment B6 Operational energy use B7 Operational water use							C1 De-construction demolition C2 Transport C3 Waste processing C4 Disposal				
Construction process stage												Benefits and loads beyond the system boundaries				
A4 Transport gate to site A5 Assembly / Construction installation process												D Reuse- Recovery- Recycling- potential				

Environmental impacts and parameters

GWP-total = EF EN15804+A2 Climate Change [kg CO2 eq]; **GWP-f** = EF Climate change - Fossil [kg CO2 eq]; **GWP-b** = EF EN15804+A2 Climate Change - Biogenic [kg CO2 eq]; **GWP-luluc** = EF EN15804+A2 Climate Change - Land use and LU change [kg CO2 eq]; **ODP** = EF Ozone depletion [kg CFC11 eq]; **AP** = EF Acidification [mol H+ eq]; **EP-fw** = EF Eutrophication, freshwater [kg P eq]; **EP-m** = EF Eutrophication, marine [kg N eq]; **EP-T** = EF Eutrophication, terrestrial [mol N eq]; **POCP** = EF Photochemical ozone formation [kg NMVOC eq]; **ADP-mm** = EF Resource use, minerals and metals [kg Sb eq]; **ADP-f** = EF Resource use, fossils [MJ]; **WDP** = EF Water use [m3 depriv.]; **PM** = EF Particulate matter [disease inc.]; **IR** = EF Ionising radiation [kBq U-235 eq]; **ETP-fw** = EF Ecotoxicity, freshwater [CTUe]; **HTP-c** = EF Human toxicity, cancer [CTUh]; **HTP-nc** = EF Human toxicity, non-cancer [CTUh]; **SQP** = EF Land use [Pt]; **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]; **MER** = Materials for energy recovery [kg]; **EE** = Exported energy [MJ]; **EET** = Exported energy thermic [MJ]; **EEE** = Exported energy electric [MJ]

Statement of Confidentiality

This document and supporting material contain confidential and proprietary business information of Wavin - PL -Buk - Extra products. These materials may be printed or (photo) copied or otherwise used only with the written consent of Wavin - PL -Buk - Extra products.

Results

Environmental impact	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
GWP-total	kg CO2 eq	3.69E-1	6.39E-3	1.45E-4	3.76E-1	3.82E-3	3.01E-1	1.23E-3	-1.89E-1	4.93E-1
GWP-f	kg CO2 eq	4.66E-1	6.38E-3	1.46E-4	4.72E-1	3.82E-3	1.71E-1	1.23E-3	-2.55E-1	3.93E-1
GWP-b	kg CO2 eq	-9.72E-2	3.87E-6	-1.54E-6	-9.72E-2	2.32E-6	1.30E-1	1.52E-6	6.71E-2	9.97E-2
GWP-luluc	kg CO2 eq	7.36E-4	2.26E-6	1.49E-7	7.38E-4	1.35E-6	4.98E-5	3.30E-8	-6.26E-4	1.64E-4
ODP	kg CFC11 eq	1.73E-7	1.47E-9	8.26E-12	1.75E-7	8.80E-10	1.41E-8	4.53E-11	-9.26E-8	9.71E-8
AP	mol H+ eq	2.23E-3	3.63E-5	1.47E-6	2.26E-3	2.17E-5	2.66E-4	1.11E-6	-1.08E-3	1.47E-3
EP-fw	kg P eq	2.11E-5	5.25E-8	8.24E-9	2.12E-5	3.14E-8	1.68E-6	1.48E-9	-1.28E-5	1.00E-5
EP-m	kg N eq	4.47E-4	1.30E-5	1.55E-7	4.60E-4	7.78E-6	7.09E-5	6.74E-7	-2.18E-4	3.22E-4
EP-T	mol N eq	4.74E-3	1.43E-4	1.85E-6	4.88E-3	8.57E-5	7.80E-4	4.40E-6	-2.42E-3	3.33E-3
POCP	kg NMVOC eq	1.56E-3	4.10E-5	6.28E-7	1.60E-3	2.45E-5	2.32E-4	1.52E-6	-7.75E-4	1.08E-3
ADP-mm	kg Sb eq	1.08E-4	1.65E-7	1.97E-8	1.08E-4	9.87E-8	1.04E-6	1.12E-9	-4.04E-6	1.05E-4
ADP-f	MJ	1.08E+1	9.79E-2	1.36E-3	1.09E+1	5.86E-2	6.79E-1	3.31E-3	-5.50E+0	6.13E+0
WDP	m3 depriv.	5.63E-1	3.01E-4	5.22E-5	5.63E-1	1.80E-4	2.44E-2	2.57E-5	-3.41E-1	2.47E-1
PM	disease inc.	2.04E-8	5.76E-10	9.08E-12	2.09E-8	3.45E-10	3.37E-9	2.28E-11	-1.26E-8	1.21E-8
IR	kBq U-235 eq	2.19E-2	4.28E-4	1.02E-6	2.23E-2	2.56E-4	2.46E-3	1.51E-5	-1.26E-2	1.25E-2
ETP-fw	CTUe	1.65E+1	7.95E-2	1.21E-2	1.66E+1	4.76E-2	4.77E+0	5.11E-2	-8.05E+0	1.34E+1
HTP-c	CTUh	4.36E-10	2.83E-12	6.17E-13	4.39E-10	1.69E-12	8.69E-11	9.44E-14	-1.65E-10	3.63E-10
HTP-nc	CTUh	1.05E-8	9.48E-11	1.57E-11	1.06E-8	5.67E-11	1.80E-9	9.86E-12	-3.61E-9	8.89E-9
SQP	Pt	1.25E+1	8.38E-2	2.24E-3	1.26E+1	5.01E-2	4.22E-1	8.46E-3	-1.97E+1	-6.65E+0
Resource use	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
PERE	MJ	3.06E+0	1.40E-3	2.40E-2	3.08E+0	8.41E-4	4.61E-2	1.21E-4	-3.44E+0	-3.12E-1
PERM	MJ	0	0	0	0	0	0	0	0	0
PERT	MJ	3.06E+0	1.40E-3	2.40E-2	3.08E+0	8.41E-4	4.61E-2	1.21E-4	-3.44E+0	-3.12E-1
PENRE	MJ	1.16E+1	1.04E-1	1.44E-3	1.17E+1	6.22E-2	7.22E-1	3.51E-3	-5.92E+0	6.54E+0
PENRM	MJ	0	0	0	0	0	0	0	0	0
PENRT	MJ	1.16E+1	1.04E-1	1.44E-3	1.17E+1	6.22E-2	7.22E-1	3.51E-3	-5.92E+0	6.54E+0
PET	MJ	1.46E+1	1.05E-1	2.55E-2	1.48E+1	6.30E-2	7.68E-1	3.64E-3	-9.36E+0	6.23E+0
SM	kg	0	0	0	0	0	0	0	0	0
RSF	MJ	0	0	0	0	0	0	0	0	0
NRSF	MJ	0	0	0	0	0	0	0	0	0
FW	m3	7.56E-3	1.11E-5	1.46E-6	7.57E-3	6.63E-6	6.89E-4	4.04E-6	-5.20E-3	3.08E-3

Output flows and waste categories	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
HWD	kg	2.12E-5	2.50E-7	2.73E-13	2.15E-5	1.50E-7	1.19E-6	4.07E-9	-6.07E-6	1.68E-5
NHWD	kg	5.61E-2	6.07E-3	1.05E-6	6.21E-2	3.63E-3	2.79E-2	1.45E-2	-2.26E-2	8.56E-2
RWD	kg	2.00E-5	6.66E-7	1.10E-13	2.06E-5	3.98E-7	2.76E-6	2.15E-8	-1.17E-5	1.21E-5
CRU	kg	0	0	0	0	0	0	0	0	0
MFR	kg	0	0	0	0	0	0	0	0	0
MER	kg	0	0	0	0	0	0	0	0	0
EE	MJ	0	0	0	0	0	0	0	0	0
EET	MJ	0	0	0	0	0	0	0	0	0
EEE	MJ	0	0	0	0	0	0	0	0	0



Ecochain Technologies BV
H.J.E. Wenckebachweg 123, 1096 AM Amsterdam, The Netherlands
<https://www.ecochain.com>
+31 20 3035 777