

Environmental Profile

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

Ecochain v3.5.80



Product: 3002686 - Azura PP Leaf sep Stand pipe WT 80
Unit: 1 piece
Manufacturer: Wavin - PL -Buk - Extra products

Azura IT: efficient and budget-friendly infiltration

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]

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Results

Environmental impact	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
GWP-total	kg CO2 eq	5.49E-1	1.52E-3	1.45E-4	5.51E-1	6.69E-3	4.83E-1	3.15E-3	-3.74E-1	6.70E-1
GWP-f	kg CO2 eq	7.28E-1	1.52E-3	1.46E-4	7.30E-1	6.68E-3	2.84E-1	3.15E-3	-4.13E-1	6.11E-1
GWP-b	kg CO2 eq	-1.79E-1	9.22E-7	-1.54E-6	-1.79E-1	4.06E-6	1.99E-1	2.74E-6	3.91E-2	5.84E-2
GWP-luluc	kg CO2 eq	5.80E-4	5.38E-7	1.49E-7	5.81E-4	2.36E-6	3.99E-5	5.41E-8	-4.97E-4	1.26E-4
ODP	kg CFC11 eq	2.55E-8	3.50E-10	8.26E-12	2.59E-8	1.54E-9	5.98E-9	7.90E-11	-2.58E-8	7.68E-9
AP	mol H+ eq	2.90E-3	8.65E-6	1.47E-6	2.91E-3	3.81E-5	2.50E-4	1.89E-6	-1.30E-3	1.89E-3
EP-fw	kg P eq	1.64E-5	1.25E-8	8.24E-9	1.64E-5	5.50E-8	1.17E-6	2.48E-9	-9.10E-6	8.56E-6
EP-m	kg N eq	5.40E-4	3.10E-6	1.55E-7	5.44E-4	1.36E-5	7.71E-5	1.22E-6	-2.63E-4	3.72E-4
EP-T	mol N eq	5.94E-3	3.41E-5	1.85E-6	5.98E-3	1.50E-4	8.49E-4	7.66E-6	-2.97E-3	4.02E-3
POCP	kg NMVOC eq	2.45E-3	9.75E-6	6.28E-7	2.46E-3	4.29E-5	2.63E-4	2.87E-6	-1.16E-3	1.61E-3
ADP-mm	kg Sb eq	1.02E-5	3.93E-8	1.97E-8	1.03E-5	1.73E-7	9.58E-7	1.91E-9	-2.87E-6	8.52E-6
ADP-f	MJ	2.25E+1	2.33E-2	1.36E-3	2.25E+1	1.03E-1	7.27E-1	5.77E-3	-1.15E+1	1.18E+1
WDP	m3 depriv.	4.73E-1	7.16E-5	5.22E-5	4.74E-1	3.15E-4	1.35E-2	3.11E-5	-2.57E-1	2.30E-1
PM	disease inc.	2.85E-8	1.37E-10	9.08E-12	2.87E-8	6.03E-10	3.98E-9	3.97E-11	-1.52E-8	1.81E-8
IR	kBq U-235 eq	1.68E-2	1.02E-4	1.02E-6	1.69E-2	4.48E-4	2.29E-3	2.67E-5	-9.22E-3	1.04E-2
ETP-fw	CTUe	1.12E+1	1.89E-2	1.21E-2	1.12E+1	8.33E-2	8.69E-1	4.83E-3	-5.82E+0	6.37E+0
HTP-c	CTUh	2.88E-10	6.74E-13	6.17E-13	2.89E-10	2.96E-12	1.10E-10	1.42E-13	-1.47E-10	2.56E-10
HTP-nc	CTUh	6.45E-9	2.26E-11	1.57E-11	6.49E-9	9.93E-11	1.29E-9	3.12E-12	-3.10E-9	4.78E-9
SQP	Pt	1.78E+1	1.99E-2	2.24E-3	1.78E+1	8.78E-2	5.70E-1	1.48E-2	-2.11E+1	-2.56E+0
Resource use	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
PERE	MJ	4.24E+0	3.35E-4	2.40E-2	4.27E+0	1.47E-3	3.45E-2	2.22E-4	-3.53E+0	7.74E-1
PERM	MJ	0	0	0	0	0	0	0	0	0
PERT	MJ	4.24E+0	3.35E-4	2.40E-2	4.27E+0	1.47E-3	3.45E-2	2.22E-4	-3.53E+0	7.74E-1
PENRE	MJ	2.41E+1	2.48E-2	1.44E-3	2.42E+1	1.09E-1	7.75E-1	6.12E-3	-1.24E+1	1.26E+1
PENRM	MJ	0	0	0	0	0	0	0	0	0
PENRT	MJ	2.41E+1	2.48E-2	1.44E-3	2.42E+1	1.09E-1	7.75E-1	6.12E-3	-1.24E+1	1.26E+1
PET	MJ	2.84E+1	2.51E-2	2.55E-2	2.84E+1	1.10E-1	8.09E-1	6.35E-3	-1.59E+1	1.34E+1
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	8.42E-3	2.64E-6	1.46E-6	8.42E-3	1.16E-5	4.20E-4	7.11E-6	-4.74E-3	4.12E-3

Output flows and waste categories	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
HWD	kg	7.86E-6	5.96E-8	2.73E-13	7.92E-6	2.62E-7	1.26E-6	6.97E-9	-4.92E-6	4.53E-6
NHWD	kg	4.50E-2	1.45E-3	1.05E-6	4.64E-2	6.36E-3	3.91E-2	2.54E-2	-1.87E-2	9.86E-2
RWD	kg	1.54E-5	1.59E-7	1.10E-13	1.55E-5	6.98E-7	2.95E-6	3.77E-8	-8.87E-6	1.04E-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



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