

Environmental Profile

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

Ecochain v3.5.71



Product: 3035557 - OsmaD Access Cover for 4D503/508 BK P/E
Unit: 1 piece
Manufacturer: Wavin - UK - Chippenham - Verified

Wavin OsmaDrain - the definitive & comprehensive PVC-U gravity drainage system for residential, commercial & industrial projects. The source for all types of gravity drainage, sewer installation & pressure pipe systems in any private or public development. One of the UK's most trusted & leading names in plastic drainage systems.

LCA standard: EN15804+A2 (2019)
Standard database: Worldwide - Ecoinvent v 3.6 Cut-Off
Externally verified: Yes
Issue date: 09-02-2023
End of validity: 09-02-2028
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 - UK - Chippenham - Verified (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

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Results

Environmental impact	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
GWP-total	kg CO2 eq	7.29E-1	2.26E-2	6.07E-2	8.13E-1	6.98E-3	2.68E-1	2.34E-3	-3.44E-1	7.46E-1
GWP-f	kg CO2 eq	7.25E-1	2.26E-2	5.91E-2	8.07E-1	6.97E-3	2.69E-1	2.34E-3	-3.43E-1	7.42E-1
GWP-b	kg CO2 eq	3.70E-3	-3.91E-6	1.53E-3	5.22E-3	4.23E-6	-2.13E-4	2.87E-6	-1.69E-3	3.33E-3
GWP-luluc	kg CO2 eq	5.91E-4	1.45E-5	4.99E-5	6.55E-4	2.47E-6	8.38E-5	6.07E-8	-1.66E-4	5.75E-4
ODP	kg CFC11 eq	3.02E-7	4.64E-9	5.35E-9	3.12E-7	1.61E-9	2.29E-8	8.53E-11	-1.46E-7	1.91E-7
AP	mol H+ eq	3.61E-3	6.49E-4	3.19E-4	4.57E-3	3.97E-5	4.04E-4	2.08E-6	-1.19E-3	3.83E-3
EP-fw	kg P eq	3.14E-5	1.06E-7	8.20E-7	3.23E-5	5.73E-8	2.82E-6	2.73E-9	-1.13E-5	2.39E-5
EP-m	kg N eq	6.03E-4	1.62E-4	6.31E-5	8.28E-4	1.42E-5	9.96E-5	1.48E-6	-2.11E-4	7.32E-4
EP-T	mol N eq	6.68E-3	1.80E-3	6.86E-4	9.16E-3	1.57E-4	1.10E-3	8.28E-6	-2.27E-3	8.16E-3
POCP	kg NMVOC eq	2.34E-3	4.67E-4	3.03E-4	3.11E-3	4.47E-5	3.26E-4	2.86E-6	-8.57E-4	2.62E-3
ADP-mm	kg Sb eq	3.28E-4	2.28E-7	1.44E-6	3.30E-4	1.80E-7	1.57E-6	2.09E-9	-6.50E-6	3.25E-4
ADP-f	MJ	1.70E+1	2.97E-1	6.54E-1	1.79E+1	1.07E-1	1.07E+0	6.23E-3	-7.65E+0	1.15E+1
WDP	m3 depriv.	9.17E-1	5.14E-4	1.99E-2	9.38E-1	3.28E-4	4.22E-2	4.28E-5	-4.12E-1	5.68E-1
PM	disease inc.	3.11E-8	8.88E-10	2.17E-9	3.42E-8	6.29E-10	4.94E-9	4.28E-11	-8.33E-9	3.14E-8
IR	kBq U-235 eq	3.98E-2	1.28E-3	1.63E-3	4.27E-2	4.68E-4	3.78E-3	2.87E-5	-1.30E-2	3.40E-2
ETP-fw	CTUe	1.68E+1	2.00E-1	1.70E+0	1.87E+1	8.69E-2	8.20E+0	9.03E-2	-4.79E+0	2.23E+1
HTP-c	CTUh	2.26E-9	1.24E-11	6.67E-11	2.34E-9	3.09E-12	1.22E-10	1.73E-13	-1.55E-10	2.31E-9
HTP-nc	CTUh	1.89E-8	1.75E-10	3.68E-9	2.28E-8	1.04E-10	2.92E-9	1.76E-11	-4.89E-10	2.53E-8
SQP	Pt	2.83E+0	7.60E-2	2.22E-1	3.12E+0	9.15E-2	6.74E-1	1.59E-2	-7.86E-1	3.12E+0
Resource use	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
PERE	MJ	1.08E+0	2.38E-3	3.52E+0	4.61E+0	1.53E-3	7.76E-2	2.33E-4	-2.93E-1	4.39E+0
PERM	MJ	0	0	0	0	0	0	0	0	0
PERT	MJ	1.08E+0	2.38E-3	3.52E+0	4.61E+0	1.53E-3	7.76E-2	2.33E-4	-2.93E-1	4.39E+0
PENRE	MJ	1.82E+1	3.16E-1	6.94E-1	1.92E+1	1.14E-1	1.14E+0	6.61E-3	-8.25E+0	1.22E+1
PENRM	MJ	0	0	0	0	0	0	0	0	0
PENRT	MJ	1.82E+1	3.16E-1	6.94E-1	1.92E+1	1.14E-1	1.14E+0	6.61E-3	-8.25E+0	1.22E+1
PET	MJ	1.93E+1	3.18E-1	4.22E+0	2.38E+1	1.15E-1	1.22E+0	6.84E-3	-8.55E+0	1.66E+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	1.14E-2	1.85E-5	5.78E-4	1.20E-2	1.21E-5	1.21E-3	7.62E-6	-4.38E-3	8.89E-3

Output flows and waste categories	Unit	A1	A2	A3	A1-A3	C2	C3	C4	D	Total
HWD	kg	5.07E-5	3.53E-7	6.01E-6	5.71E-5	2.74E-7	1.79E-6	7.60E-9	-9.32E-6	4.98E-5
NHWD	kg	1.88E-1	3.65E-3	1.23E-3	1.93E-1	6.63E-3	4.16E-2	2.75E-2	-2.43E-2	2.45E-1
RWD	kg	3.80E-5	2.06E-6	1.59E-6	4.17E-5	7.28E-7	4.07E-6	4.05E-8	-1.18E-5	3.47E-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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