

Vedlegg 4

Det prosjekterte byggets fullstendige resultater fra One Click LCA. Her vises mange tabeller og grafer som viser ulike resultater. I tillegg vises datakildene til programvaren.

Hoved > Solibri integrasjon > Huseby skoler byggefase >Life-cycle assessment, EN-15978

 **Huseby skoler byggefase - Life-cycle assessment, EN-15978**

Grunnleggende prosjektinformasjon

Resultatrapport: Huseby skoler byggefase

Prosjekt	Solibri integrasjon - Huseby skoler byggefase
Bruker	Oline Rekdal - 14.05.2020
Verktøy	Life-cycle assessment, EN-15978
Detaljer	Building life-cycle assessment according to the European Standard EN 15978. This LCA software covers life cycle stages from cradle to grave with separate reporting to product stage, construction process, use stage, operational energy, and end of life. This LCA software and related datasets are compliant with ISO 14040/14044 or EN 15804. It is compliant with the Active House Specification requirements.
Prosjektinformasjon og oppgaver	
Type (NS 3547)	61 - Skole
Land	Norge
Adresse	Saupstadringen 87
Bruttoareal (BTA), m² (NS 3720)	13688
Antall etasjer over bakken	3,3
Rammetype	notDetermined
Fulgte sertifiseringer	BREEAM NOR 2016
Fulgte sertifiseringer	NS 3720
Investor / sluttklient	Trondheim Kommune
Byggeår (hvis restaurering, opprinnelig byggår)	April, 2019
Fordeling av bygningens funksjoner	Barneskole, ungdomsskole, ressursenter for hørsel og tegnspråk og musikk- og kulturskole.

Kommersiell bruk er forbudt One Click LCA Student (International) Business license + Carbon Designer, UTDANNING, Oline Rekdal 14.05.2020 19:31

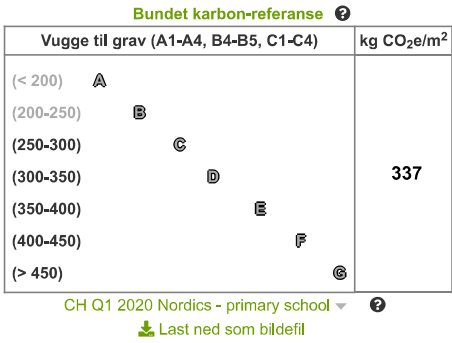
 6 279 Tonn CO₂e

 8 kg CO₂e / m² / år

 313 971 € Sosiale kostnader for karbon

Carbon Heroes Benchmark





Resultater

Life-cycle assessment results


























Sektor	Klimagassutslipp kg CO ₂ e	Acidification kg SO ₂ e	Eutrophication kg PO ₄ e	Ozone depletion potential kg CFC11e	Formation of ozone of lower atmosphere kg Ethenee	Total use of primary energy ex. raw materials MJ	
A1-A3 Byggematerialer	3,55E6	1,16E4	3,86E3	2,1E-1	3,28E3	7,48E7	Detaljer
A4 Transport til byggeplassen	2,74E5	1,2E3	2,61E2	5,35E-2	1,72E1	7,55E6	Detaljer
A5 Byggeplass	1E5	4,2E2	1,74E2	1,13E-2	5,28E1	6,21E6	Detaljer
B1-B5 Maintenance and material replacement	5,88E4	4,48E2	8,97E1	1,65E-3	2,37E2	6,92E6	Detaljer
B6 Energibruk i drift	1,86E6	5,18E3	1,03E3	3,12E-1	2,87E2	1,37E8	Detaljer
B7 Water use							Skjul tomme
C1-C4 Livsløpets slutt	4,36E5	9,13E2	2,12E2	8,81E-4	7,97E1	2,44E6	Detaljer
D Utover livsløp (ikke inkludert i totalen)	-2,32E6	-3,23E3	-6,47E2	-1,05E-2	-3,51E2	-3,57E7	Detaljer
Total	6,28E6	1,98E4	5,63E3	5,89E-1	3,95E3	2,35E8	
Resultater per nevner							
Bruttoareal (BTA), Norway 13688.0 m2	4,59E2	1,45E0	4,11E-1	4,3E-5	2,89E-1	1,72E4	
Brutto internt gulvareal (IPMS / RICS), m2 12800.0 m2	4,91E2	1,55E0	4,4E-1	4,6E-5	3,09E-1	1,84E4	
Antall brukere 1250.0	5,02E3	1,58E1	4,5E0	4,71E-4	3,16E0	1,88E5	
Oppvarmet bruksareal (oppv. BRA), Norway 13688.0 m2	4,59E2	1,45E0	4,11E-1	4,3E-5	2,89E-1	1,72E4	

Fullstendighet og plausibilitetskontroll

LCA Checker totalvurdering: B							
No.	Check description	Project value	Threshold value	Typical value	Unit	Type	Validert ?
1	Mortar mass credible: Has no materials	0.0	0.4 - 50		kg/m2	✗	<input type="checkbox"/>
2	Glass mass credible: Has no materials	0.0	1 - 13		kg/m2	✗	<input type="checkbox"/>
3	Roofing bitumen mass credible: Roofing bitumen mass is unusual	0.042	0.5 - 4		kg/m2	✗	<input type="checkbox"/>
4	Replacements share credible: Project has unusual amount of replacements	1.66	10 - 100		%	✗	<input type="checkbox"/>
Validerte sjekker							
5	Foundation mass credible	143.2	greater than 100		kg/m2	✓	<input type="checkbox"/>
6	Structure mass credible	829.126	greater than 150		kg/m2	✓	<input type="checkbox"/>
7	Finishes mass credible	395.906	greater than 10		kg/m2	✓	<input type="checkbox"/>
8	External areas mass credible	95.977	greater than 10		kg/m2	✓	<input type="checkbox"/>
9	Embodied carbon credible	336.875	150 - 1000		kg CO ₂ e/m2	✓	<input type="checkbox"/>
	Project mass credible	1472.477	300 - 3500		kg/m2	✓	<input type="checkbox"/>

No.	Check description	Project value	Threshold value	Typical value	Unit	Type	Validert ?
11	Ready mix and reinforcement ratio	4.162	1 - 7		%	✓	<input type="checkbox"/>
12	Too few materials to be credible	53	greater than 20		nr.	✓	<input type="checkbox"/>
13	Too dominant single material	23.287	less than 50		%	✓	<input type="checkbox"/>
14	Project mass credible (mixed frame)	1225.032	200 - 1900		kg/m2	✓	<input type="checkbox"/>
15	Insulation mass credible	13.473	1 - 21		kg/m2	✓	<input type="checkbox"/>
16	Gypsum board and plaster mass credible (no cement)	23.887	0.0 - 80		kg/m2	✓	<input type="checkbox"/>
17	Glass and openings mass credible	4.847	2 - 25		kg/m2	✓	<input type="checkbox"/>
18	Vertical materials mass	250.004	50 - 700		kg/m2	✓	<input type="checkbox"/>
19	Horizontal materials mass	579.122	100 - 1300		kg/m2	✓	<input type="checkbox"/>
20	Embodied carbon credible (mixed frame)	276.868	100 - 800		kg CO2e/m2	✓	<input type="checkbox"/>
21	Gypsum board mass credible	23.887	3 - 40		kg/m2	✓	<input type="checkbox"/>
22	Brick mass credible	0.0	0.0 - 100		kg/m2	✓	<input type="checkbox"/>

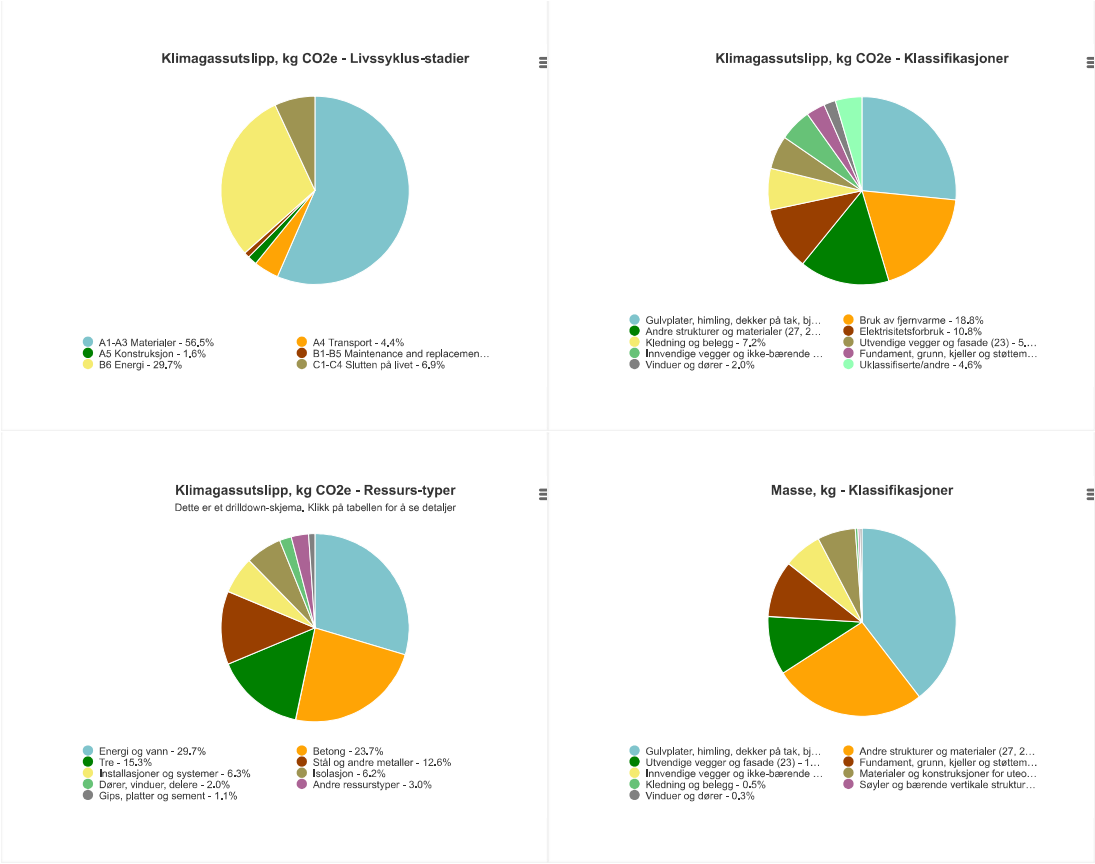
Mest medvirkende materialer (Klimagassutslipp)

No.	Ressurs	Påvirkning fra start til slutt (A1-A3)	Vugge til port (A1-A3)	Bærekraftige alternativer
1.	Ferdigbetong, ekskludert armeringsstål  ?	825 tonn CO ₂ e	23.3 %	Vis bærekraftige alternativer
2.	Photovoltaic polycrystalline panel, per m2 ?	398 tonn CO ₂ e	11.2 %	Vis bærekraftige alternativer
3.	Huldekker Lavkarbon B  ?	316 tonn CO ₂ e	8.9 %	Vis bærekraftige alternativer
4.	XPS isolasjonsplate  ?	300 tonn CO ₂ e	8.5 %	Vis bærekraftige alternativer
5.	Strukturelle stålprofiler, generisk  ?	213 tonn CO ₂ e	6.0 %	Vis bærekraftige alternativer
6.	Ferdigbetong B35 MF45 - UN56A-D000 - Kl. B 0341 Steinkjer  ?	208 tonn CO ₂ e	5.9 %	Vis bærekraftige alternativer
7.	Cross Laminated Timber (CLT)  ?	191 tonn CO ₂ e	5.4 %	Vis bærekraftige alternativer
8.	Armert stål  ?	168 tonn CO ₂ e	4.7 %	Vis bærekraftige alternativer
9.	Galvanisert ståltrapp, innendørs bruk  ?	108 tonn CO ₂ e	3.0 %	Vis bærekraftige alternativer
10.	Profiled steel sheet for cladding or roofing  ?	101 tonn CO ₂ e	2.8 %	Vis bærekraftige alternativer
11.	Bygningsplater i tre  ?	81 tonn CO ₂ e	2.3 %	Vis bærekraftige alternativer
12.	Stålplater, generisk  ?	78 tonn CO ₂ e	2.2 %	Vis bærekraftige alternativer
13.	Stål, kaldvalsede hulprofiler  ?	66 tonn CO ₂ e	1.9 %	Vis bærekraftige alternativer
14.	Fuktmembran for kjellervegger, betonggulv og grønne tak, PP  ?	65 tonn CO ₂ e	1.8 %	Vis bærekraftige alternativer
15.	Vindu, 3-lags, tre/alu-ramme, fastkarm  ?	64 tonn CO ₂ e	1.8 %	Vis bærekraftige alternativer
16.	Fibre cement board  ?	54 tonn CO ₂ e	1.5 %	Vis bærekraftige alternativer
17.	Interior glazed door with wooden frame  ?	49 tonn CO ₂ e	1.4 %	Vis bærekraftige alternativer
18.	Gipsplate  ?	35 tonn CO ₂ e	1.0 %	Vis bærekraftige alternativer
19.	Stainless steel sheets or plates  ?	27 tonn CO ₂ e	0.8 %	Vis bærekraftige alternativer
20.	Aluminium ekstrudering  ?	25 tonn CO ₂ e	0.7 %	Vis bærekraftige alternativer
21.	Glava glassull  ?	20 tonn CO ₂ e	0.6 %	Vis bærekraftige alternativer
22.	Hardwood parquet flooring (oak)  ?	22 tonn CO ₂ e	0.6 %	Vis bærekraftige alternativer
23.	Høvellast, bartre  ?	10 tonn CO ₂ e	0.3 %	Vis bærekraftige alternativer
	Glued laminated timber (Glulam)  ?	9,3 tonn CO ₂ e	0.3 %	Vis bærekraftige alternativer
	25. Gipsplate  ?	12 tonn CO ₂ e	0.3 %	Vis bærekraftige alternativer

Grafer

Oversikt over livssyklusen til Klimagassutslipp

- Kake
- Linje
- Kolumn
- TreeMap



Vis datatabell: ☒ Klimagassutslipp - Livssyklus-stadier ☒ Klimagassutslipp - Klassifikasjoner ☒ Klimagassutslipp - Ressurs-typer ☒ Masse - Klassifikasjoner

Klimagassutslipp - Livssyklus-stadier

Enhet	Verdi	Enhet	Prosent %
A1-A3 Materialer	3 549 170,7	kg CO2e	56.52 %
A4 Transport	273 708,1	kg CO2e	4.36 %
A5 Konstruksjon	100 130,58	kg CO2e	1.59 %
B1-B5 Maintenance and replacement	58 830,93	kg CO2e	0.94 %
B6 Energi	1 862 029,18	kg CO2e	29.65 %
C1-C4 Slutten på livet	435 545,28	kg CO2e	6.94 %

Klimagassutslipp - Klassifikasjoner

Enhet	Verdi	Enhet	Prosent %
Gulvplater, himling, dekker på tak, bjelker og tak (25, 26)	1 669 243,98	kg CO2e	26.58 %
Bruk av fjernvarme	1 182 916	kg CO2e	18.84 %

Enhet	Verdi	Enhet	Prosent %
Andre strukturer og materialer (27, 28, 29)	970 363,08	kg CO2e	15.45 %
Elektrisitetsforbruk	679 113,19	kg CO2e	10.81 %
Kledning og belegg	450 217,56	kg CO2e	7.17 %
Utvendige vegger og fasade (23)	360 956,54	kg CO2e	5.75 %
Innvendige vegger og ikke-bærende strukturer (24)	347 394,1	kg CO2e	5.53 %
Fundament, grunn, kjeller og støttemurer (20, 21)	203 851,82	kg CO2e	3.25 %
Vinduer og dører	127 749,52	kg CO2e	2.03 %
Uklassifiserte/andre	287 608,99	kg CO2e	4.58 %

Klimagassutslipp - Ressurs-typer

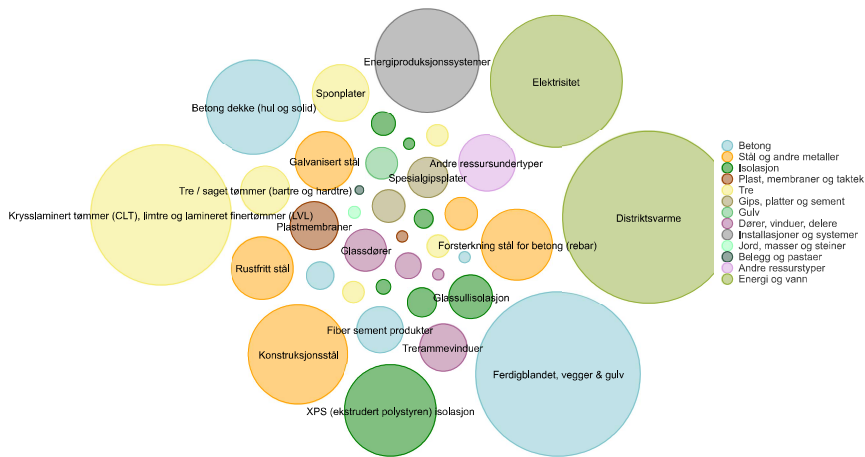
Enhet	Verdi	Enhet	Prosent %
Energi og vann	1 862 029,18	kg CO2e	29.65 %
Betong	1 487 199,07	kg CO2e	23.68 %
Tre	963 590,76	kg CO2e	15.35 %
Stål og andre metaller	792 758,82	kg CO2e	12.62 %
Installasjoner og systemer	398 080,87	kg CO2e	6.34 %
Isolasjon	392 453,9	kg CO2e	6.25 %
Dører, vinduer, delere	127 990,49	kg CO2e	2.04 %
Andre ressurstyper	187 299,71	kg CO2e	2.98 %
Gips, platter og sement	68 011,97	kg CO2e	1.08 %

Masse - Klassifikasjoner

Enhet	Verdi	Enhet	Prosent %
Gulvplater, himling, dekker på tak, bjelker og tak (25, 26)	7 466 346,37	kg	39.61 %
Andre strukturer og materialer (27, 28, 29)	4 954 168,96	kg	26.29 %
Utvendige vegger og fasade (23)	1 899 277,67	kg	10.08 %
Fundament, grunn, kjeller og støttemurer (20, 21)	1 832 965,73	kg	9.73 %
Innvendige vegger og ikke-bærende strukturer (24)	1 247 052,7	kg	6.62 %
Materialer og konstruksjoner for uteområder (7)	1 228 508,36	kg	6.52 %
Kledning og belegg	88 047,84	kg	0.47 %
Søyler og bærende vertikale strukturer (22)	69 634,23	kg	0.37 %
Vinduer og dører	61 705,45	kg	0.33 %

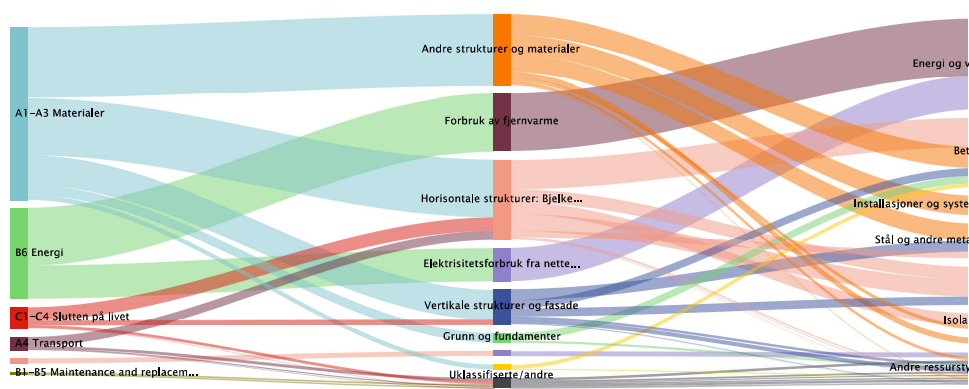


Boblediagram, total livssykluspåvirkning etter ressurstype og undertype, Klimagassutslipp
Hold musen over legendene eller boblene i diagrammet for å vise påvirkningene. Boblenes minste- og største størrelser er begrenset for lesbarhet



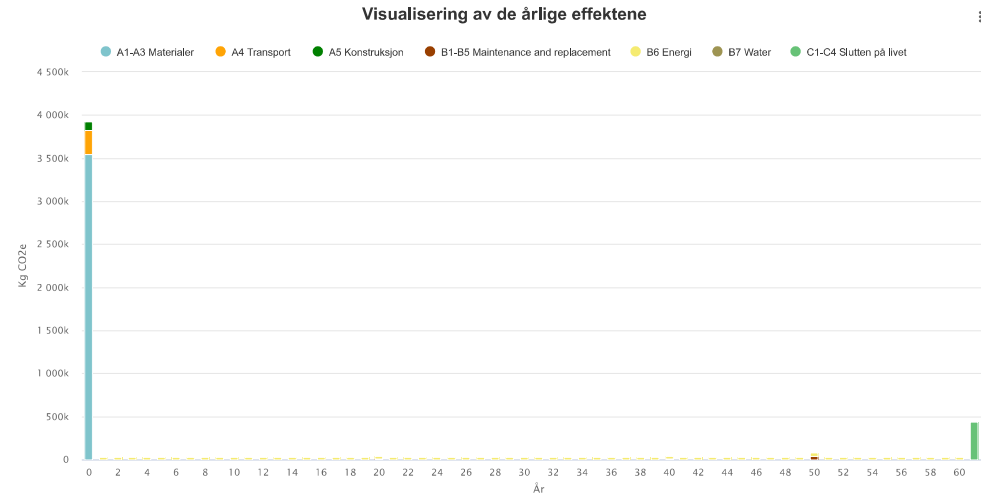
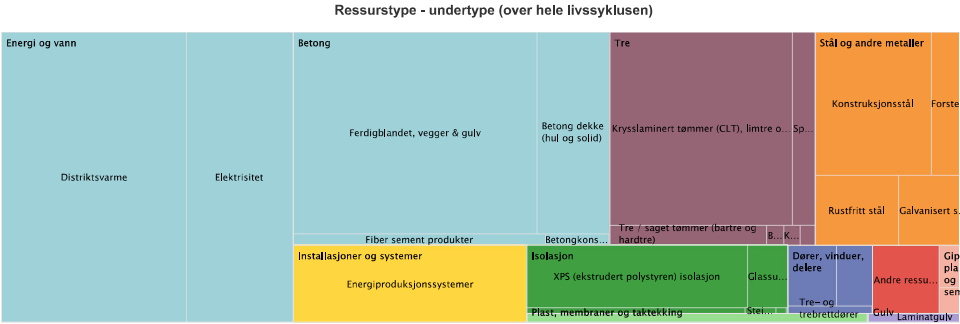
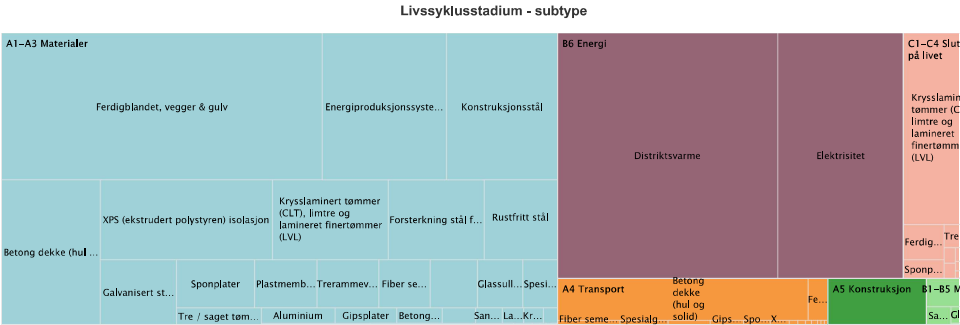
Konfigurer diagrammet ditt

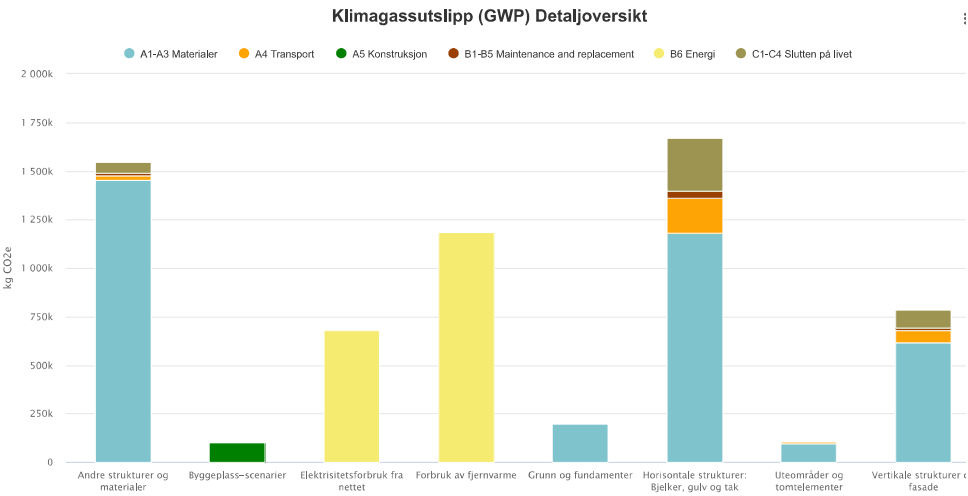
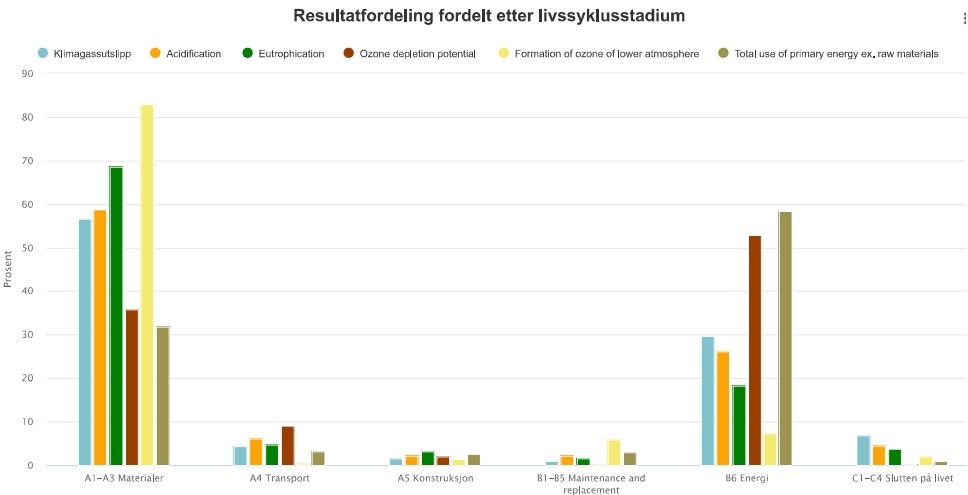
Sankey-diagram, Klimagassutslipp

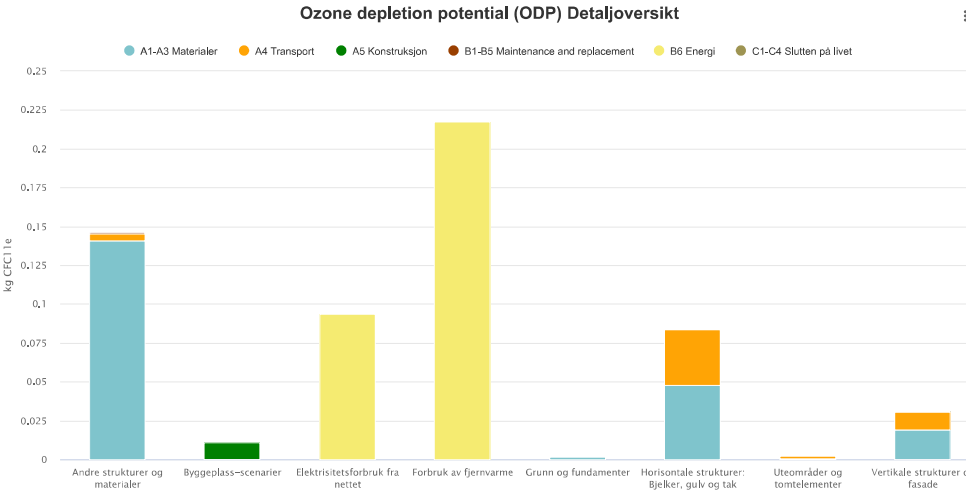
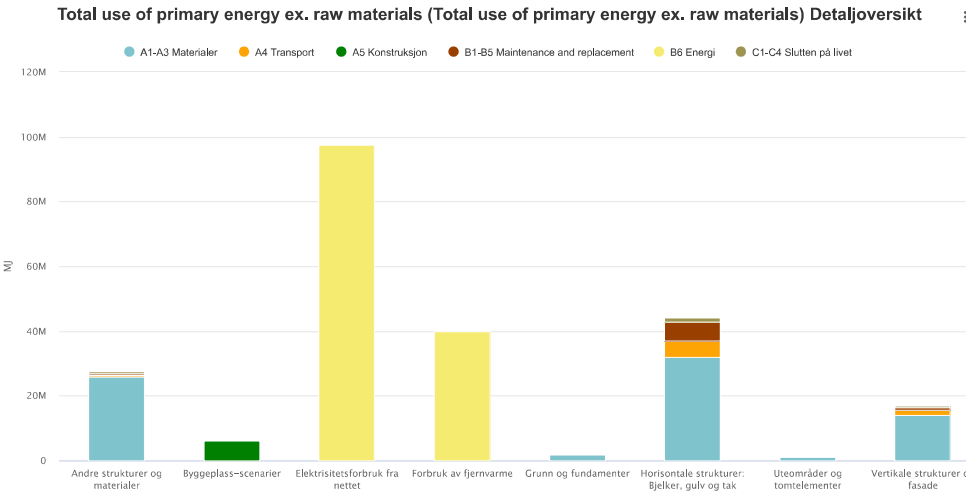


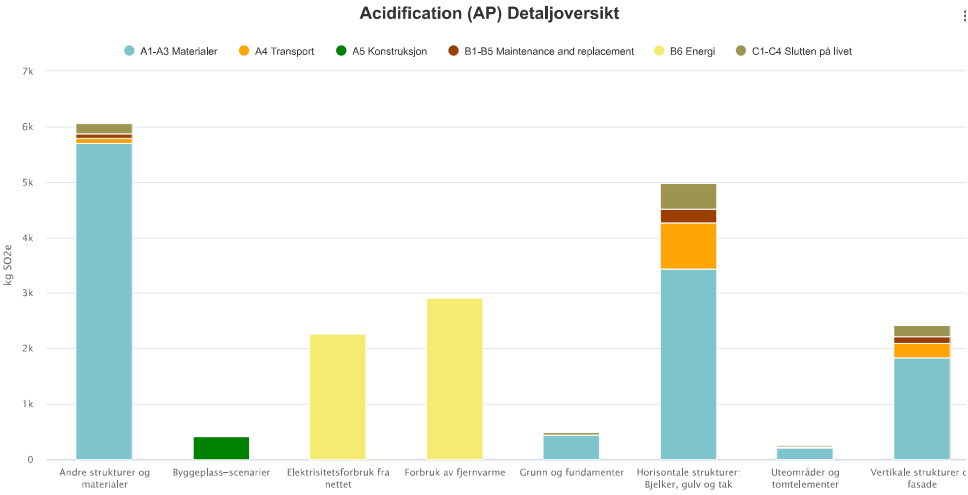
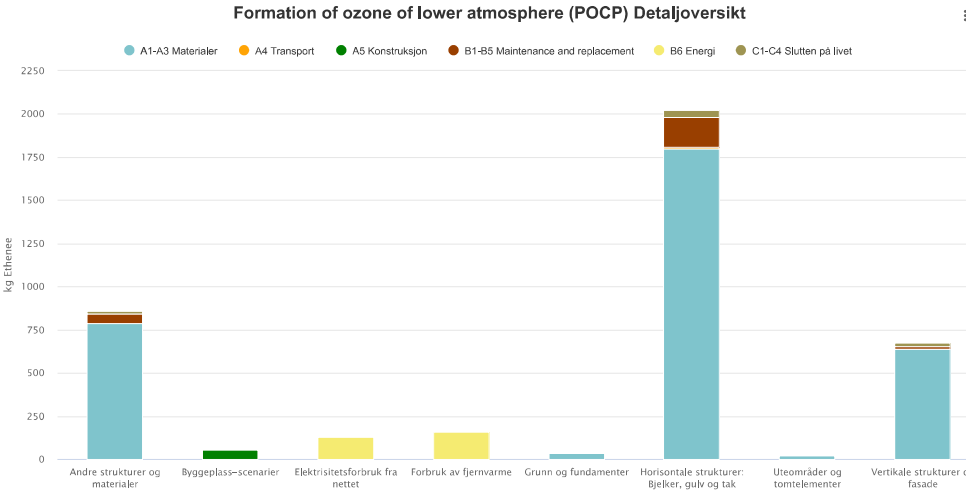
TreeMap , Klimagassutslipp

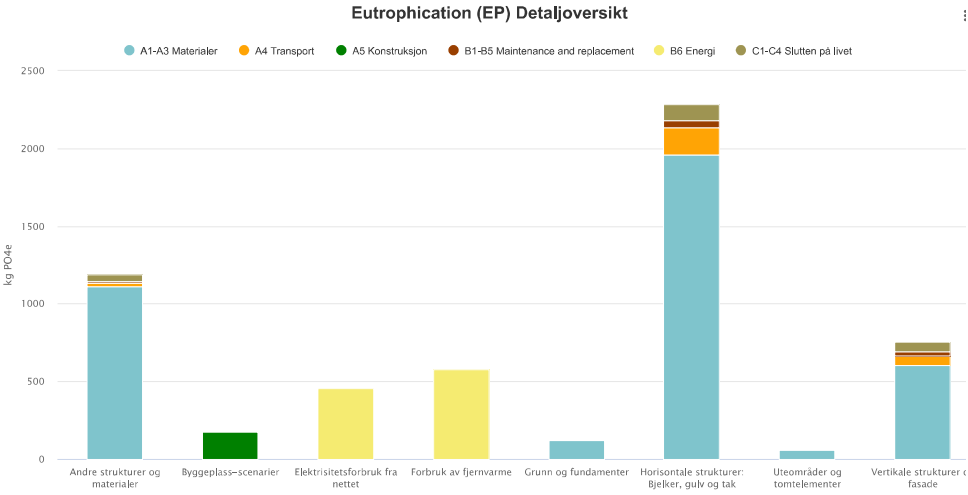












Datakilder

Kilder

Ressursnavn	Teknisk spesifikasjon	Produkt	Produsent	EPD-programmet	EPD nummer	Miljødatakilde	Standard
Akustiske himlingsplater	91 - 131 kg/m3, 1,7 - 9.3 kg/m2, 300x2400 mm	Rockfon	Rockwool	EPD Norge	NEPD-340-229-EN	NEPD-340-229-EN Ceiling tiles (91-131 kg/m3), Rockwool Rockfon Norway	EN15804
Aluminium ekstrudering	2660-2710 kg/m3, min. 75% post-consumer scrap	75R	Hydro Aluminium	EPD Norge	NEPD-1841-768-NO	EPD Hydro 75R Aluminium Extrusion Ingot Hydro Aluminium AS	EN15804
Armert stål	NS 3576		Celsa Steel Service	EPD Norge	NEPD-434-305-EN	EPD Steel reinforcement products for concrete Celsa Steel Service AS	EN15804
BETONG Kristiansand Trapp B30 M60	C30/37 (B30 M60)		Contiga	EPD Norge	-	EPD BETONG Kristiansand Trapp B30 M60 Contiga AS	EN15804
Betongbjelke	300-500/800 mm		Contiga	EPD Norge	NEPD 125N	EPD Betongbjelke	EN15804
Betongsøyle	250-700 mm		Contiga	EPD Norge	NEPD 127N	EPD Betongsoyle	EN15804
Bitumenpolymer membrantekking, 2-lags, sveiset			EWA	EPD Norge	NEPD00269E	Multi layer fully torched modified bitumen roof waterproofing system, Bitumen Waterproofing Association	EN15804
Bygningsplater i tre	836 kg/m3, 9.2 kg/m2, 11mm, Moistr. 4-9%		Huntonit	EPD Norge	NEPD00296N	NEPD00296E Huntonit building boards ECO reg 00000147	EN15804



Ressursnavn	Teknisk spesifikasjon	Produkt	Produsent	EPD-programmet	EPD nummer	Miljødatakilde	Standard
Cross Laminated Timber (CLT)		Brettsperrholz BBS (spruce)	Binderholz GmbH	baubook	8674 ab	–	EN15804
Distriktsoppvarming, Trondheim, Norge	2016-2018 average					LCA study based on fuel data provided by Fjernvarme.no (2016-2018) and Ecoinvent 3.3, Bionova Ltd	ISO14040
Electricity, Norway				Bionova		LCA study for country specific electricity mixes based on IEA, Bionova 2019	EN15804
Ferdigbetong B35 MF45 - UN56A-D000 - Kl. B 0341 Steinkjer	C35/45 (B35 MF45)	UN53A-D000 - Kl. B Steinkjer	Unicon AS	EPD Norge	NEPD-1487-500-NO	EPD B35 MF45 - UN56A-D000 - Kl. B 0341 Steinkjer Unicon AS	EN15804
Ferdigbetong, ekskludert armeringsstål	C30/37 (B30 M60)		Unicon	EPD Norge	NEPD 158N	Fabrikkbetong B30 M60, Unicon	ISO14040
Fibre cement board	1000 kg/m3	Multi Force	Cembrit	EPD Danmark	MD-16001-EN	MD-16001-EN, Cembrit Holding A/S	EN15804
Fuktmembran for kjellervegger, betonggulv og grønne tak, PP	0.5 mm		Icopal	EPD Norge	NEPD-207-260-NO	Icopal Primo fuktmembran, NEPD 00207N	EN15804
Galvanisert ståltrapp, innendørs bruk			Lonbakken	EPD Norge	NEPD00282E	Lonbakken Steel Staircase t.6100, Lonbakken Mek. Verksted AS	EN15804
Gipsfiberplate	12.5 mm, 1180 kg/m3		Fermacell	EPD Norge	NEPD-1332-430-EN	EPD Gypsum Fibreboard Fermacell GmbH Hulton Fiber AS	EN15804
Gipsplate	12.5 mm, 9 kg/m2	Normal – Standard	Gyproc	EPD Norge	NEPD-1260-406-EN	EPD Gyproc® Normal – Standard Plasterboard Saint-Gobain Gyproc AS	EN15804
Gipsplate	15.4 mm, 12.7 kg/m2	Protect F – Fireboard	Gyproc	EPD Norge	NEPD-1264-406-EN	EPD Gyproc Protect F - Fireboard Saint-Gobain Gyproc AS	EN15804
Gipsplate	12.5 mm, 11.7 kg/m2	Robust	Gyproc	EPD Norge	NEPD-1265-407-EN	EPD Gyproc ROBUST® – Hard Plasterboard Gyproc AS	EN15804
Gipsplate, vindskyddsskiva	9.5 mm, 7.6 kg/m2	Webertherm 500	Gyproc	EPD Norge	NEPD-1666-665-EN	EPD webertherm 500 vindskyddsskiva Saint-Gobain Gyproc AS	EN15804
Glassull akustisk takisolasjon, med glassfiberbelegg	55 mm, 7.8 kg/m2	Parafon Decibel Mute	Paroc	EPD Norge	NEPD-1659-658-EN	EPD Paroc Acoustics PARAFON Decibel Mute Paroc AB	EN15804
Glava glassull	R= 1 m2k/W, 34 mm, 0.595 kg/m2, 17.5 kg/m3, Lambda=0.034 W/(m.K)	Proff 34	Glava	EPD Norge	NEPD-1696-683-EN	EPD Glava glass wool	EN15804
Glava glassull	L = 0.032 W/mK, 50/70/100/150 mm, 28 kg/m3, Lambda=0.032 W/(m.K)	Murplate 32	Glava	EPD Norge	NEPD-1696-683-EN	EPD Glava glass wool	EN15804
Glava glassull	L = 0.032 W/mK, 40 mm, 80 kg/m3, Lambda=0.032 W/(m.K)	Venus A	Glava	EPD Norge	NEPD-1696-683-EN	EPD Glava glass wool	EN15804



Ressursnavn	Teknisk spesifikasjon	Produkt	Produsent	EPD-programmet	EPD nummer	Miljødatakilde	Standard
Glava glassull	L = 0,032 W/mK, 100/150/200x600x1200 mm, 25 kg/m3, Lambda=0,032 W/(m.K)	Extreme 32	Glava	EPD Norge	NEPD-1696-683-EN	EPD Glava glass wool	EN15804
Glued laminated timber (Glulam)	459 kg/m3, 12.08% moisture		Binderholz GmbH	IBU	EPD-BBS-20190164-IBA1-EN	EPD binderholz Glulam - binderholz Bois lamelle-colle BSH - Legno lamellare BSH binderholz - binderholz BSH glulam	EN15804
Hardwood parquet flooring (oak)	14/22 x 129mm (B 3.0/B 2.0), 10.2/15.5 kg/m2	Lacquer group 1	Junckers	EPD Danmark	MD-19009-EN	EPD Solid hardwood 2-strip parquet Junckers A/S	EN15804
Heltrepanel av barte til innvendig bruk, barte			Treindustrien	EPD Norge	NEPD-309-179-EN	Solid softwood panelling for interior use, Norwegian Wood Industry Federation	EN15804
High pressure laminate floor covering	9 mm, 8.7 kg/m2	BerryAlloc	BerryAlloc	IBU	EPD-BAC-20150179-CBA1-EN	EPD BerryAlloc High Pressure Laminate Floor Covering (HPL floor covering) BerryAlloc	EN15804
Hulldykker Lavkarbon B		HD200 - 520	Contiga	EPD Norge	NEPD-1239-391-NO	EPD Contiga, Hulldykker Lavkarbon B Contiga AS	EN15804
Høvellast, barte			Treindustrien	EPD Norge	NEPD-308-179-EN	Structural timber of spruce and pine, Norwegian Wood Industry Federation	EN15804
Interior door	809x2053 mm, 42x92 mm frame, 52 mm door leaf		Nordic Dørfabrikk	EPD Norge	NEPD-1535-525-EN	EPD Climate door / interior door Nordic Dørfabrikk AS	EN15804
Interior glazed door with wooden frame	1.96 x 2.09 m, 44.47 kg/m2, Fire resistance class = EI/E15 - EI/E60, biogenic CO2 not subtracted (for CML)	Menuiseries des fabricants membres d ATF BPT remplissant les conditions du cadre de validité	Fédération de l Industrie Bois Construction	INIES	INIES_CBLO20190826_144258, 11181	FDES	EN15804
Kryssfiner fra bøk, generisk	4-50 mm (0.16-1.97 in), 620 kg/m3 (38.7 lbs/ft3)			One Click LCA	-	One Click LCA	EN15804
Lettklinkerblokker, LECA, generisk	650 kg/m3 (40.6 lbs/ft3), 18 kg/block (39.7 lbs/block), 0.5x0.3x0.185 mm (0.019x0.012x0.007 in)			One Click LCA	-	One Click LCA	EN15804
OSB panels with improved fire resistance	600 kg/m3	FLAME RETARDANT (FR)	MEDITE SMARTPLY	EPD Ireland	EPDIE-19-17	EPD SMARTPLY Oriented Strand Boards (OSB)	EN15804
Orienterte strandbrett (OSB), generisk	9.5-28.5 mm (0.37-1.12 in), 610 kg/m3 (38.1 lbs/ft3)			One Click LCA	-	One Click LCA	EN15804
PIR insulation panels	L=0.023 W/mK, T: 30-240 mm, 33 kg/m3 (36.2 kg/m3 with alu. coating)	FF-PIR	Finnfoam	RTS	RTS EPD 3	RTS EPD, No. 3, Finnfoam PIR, Bionova Oy, 2017	EN15804
Photovoltaic polycrystalline panel, per m2	11.513kg/m2, 275Wc	JAP60S01 275/SC JAP60S01-260/SC, JAP60S01-265/SC, JAP60S01-270/SC, JAP60S01-275/SC, JAP60S01-280/SC	JA Solar	INIES	JASO-00002-V01.01-FR, 11061	PEP	EN15804



Ressursnavn	Teknisk spesifikasjon	Produkt	Produsent	EPD-programmet	EPD nummer	Miljødatakilde	Standard
Polyurethane (PUR) spray on insulation	L=0.027 W/mK, R=2.55 m ² k/W, moy.ép. 70mm, 2.85 kg/m ² , 40.71 kg/m ³ , Lambda=0.027 W/(m.K)	ISOCHAPE, ISOMURS, ISOLAT BMS, ISOTRIE 240, ISOTRIE 340, SYNERSOL ISOLEGE MK2, WALLTITE	Syndicat Français des Techniques du Polyuréthane Projeté	INIES	INIES_CISO20170410_155746, 6499	FDES	EN15804
Profiled steel sheet for cladding or roofing	6.66 kg/m ²	AMCF, BACACIER, LA MAISON DE L'ETANCHEUR, CISABAC, JORIS IDE, SPO, Tata Steel France – Monopanel	EMB	INIES	INIES_CCOU20120105_154418_1413, 6839	FDES	EN15804
Resirkulert asfaltbelegg, generisk	2100 kg/m ³ (131 lbs/ft ³) uncompacted density			One Click LCA	-	One Click LCA	EN15804
Sementplater	1300 kg/m ³ (81.16 lbs/ft ³)			One Click LCA	-	One Click LCA	EN15804
Stainless steel sheets or plates	7900 kg/m ³		Outokumpu Oyj	IBU	EPD-OTO-20190107-IBD1-EN	EPD Stainless Steel Long Product Outokumpu Oyj	EN15804
Steinull-isolasjon	L = 0,034 W/mK, 55 kg/m ³ , 34 mm for R=1, 30-95 mm,, Lambda=0.034 W/(m.K)	Lydplate	Rockwool	EPD Norge	NEPD-1762-735-EN	EPD ROCKWOOL stone wool thermal insulation ROCKWOOL International A/S (ROCKWOOL Nordics)	EN15804
Strukturelle stålprofiler, generisk	90% recycled content (typical), I, H, U, L, and T sections			One Click LCA	-	One Click LCA	EN15804
Stål, kaldvalsede hulprofiler			Contiga	EPD Norge	NEPD 00079E Rev1	Cold formed structural hollow sections (CFSHS), NEPD 00079E Rev1, Contiga AS	EN15804
Stålbeltete, brannsikre sandwichpaneler med steinull	16 kg/m ² , 50mm	AST S/AST S+	Paroc	EPD Norge	NEPD-403-283-EN	NEPD-403-283-EN Paroc AST S and AST S+ fire proof panels	EN15804
Stålplater, generisk	90% recycled content (typical)			One Click LCA	-	One Click LCA	EN15804
Tynn, vannbasert, brannisolerende akrylmaling	1.4 kg/l, film thickness dry/wet: 210-690/300-1000 micrometers	Steelmaster 1200WF	Jotun	EPD Norge	NEPD-1411-462-EN	EPD Steelmaster 1200WF, Jotun U.A.E. Ltd. (L.L.C.)	EN15804
Uni Wall systemvegg med doble gipsplater	122mm dp, 3600x2700 mm, 9.72 m ² , 343kg	UniWall 98/122mm dp	Moelven Modus	EPD Norge	NEPD-298-164-EN	NEPD-298-164-EN Uni Wall room partition system (UniWall 98/122 mm dp), Moelven Modus AS	EN15804
Utvendig kledning med vannetynnbar maling, bartre			Treindustrien	EPD Norge	NEPD-310-180-EN	Exterior cladding with waterborne paint, Norwegian Wood Industry Federation	EN15804
Vindu, 3-lags, tre/alu-ramme, fastkarm	1.23x1.48 mx105 mm, U-value 0.74	NTech Fixed 105/80	NorDan	EPD Norge	NEPD00257E	NorDan Ntech Fixed window 150/80, NorDan AS	EN15804
XPS isolasjonsplate	33 mm, 300KPa, 0.033 - 0.039 W/mK, 1185x585	Sundolitt	Sunde	EPD Norge	NEPD-396-274-EN	NEPD-396-274-EN Sundolitt® XPS Insulation board, Brødr. Sunde AS	EN15804



Bekreftelse	År	Land	Oppstrømsdatabaser	Tetthet	Produktkategoriregler (PCR)	Merknader om PCR	Last ned EPD
Verified	2015	[denmark]	ecoinvent	126.67	NPCR 010 Building boards, rev1	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	2700.0	NPCR 013: 2019 Part B for Steel and Aluminium Construction Products, ver. 3.0	Only with EN15804	Last ned EPD
Verified	2016	[norway]	ecoinvent, GaBi	7850.0	PCR 2012:01 Construction products and Construction services. ver. 2.0. 03/03/2015	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	2400.0	PCR for Precast Concrete Products, NPCR 20.2011.	Only with EN15804	Last ned EPD
Verified	2013	[norway]	-	2400.0	NPCR 020 Precast Concrete Products, 2011	Only with EN15804	Last ned EPD
Verified	2013	[norway]	-	2400.0	NPCR 020 Precast Concrete Products, 2011	Only with EN15804	Last ned EPD
Verified	2014	[europe, belgium, denmark, finland, germany, italy, netherlands, sweden]	-	1232.0	NPCR 022 Roof Waterproofing, rev1	Only with EN15804	Last ned EPD
Verified	2015	[norway]	ecoinvent	836.36	NPCR 010 Building boards, rev1	Biogenic CO2 separated	Last ned EPD
-	2018	[austria]	ecoinvent	450.0	–	–	Se fullt datasett
Verified	2018	[norway]					
		[norway]	ecoinvent				
Verified	2019	[norway]	ecoinvent	2400.0	NPCR 020 Precast Concrete Products, 2011	Only with EN15804	Last ned EPD
Verified	2013	[norway]	-	2400.0	NPCR 020 Precast Concrete Products, 2011	Only with EN15804	Last ned EPD
Verified	2016	[finland]	GaBi	1000.0	EN15804	-	Last ned EPD
Verified	2015	[norway]	ecoinvent	1000.0	NPCR 022 Roof waterproofing	Only with EN15804	Last ned EPD
Verified	2014	[norway]	GaBi	7850.0	NPCR 013 Steel as construction material, rev1, 08/2013	Only with EN15804	Last ned EPD

Verified	2016	[germany, spain]	GaBi	1180.0	PCR Plasterboard, 07/2014	Only with EN15804	Last ned EPD
Verified	2017	[norway]	ecoinvent	720.0	NPCR 010 Building boards, rev1, 12/2013	Only with EN15804	Last ned EPD
Verified	2017	[norway]	ecoinvent	824.6753246753246	NPCR 010 Building boards, rev1, 12/2013	Only with EN15804	Last ned EPD
Verified	2017	[norway]	ecoinvent	936.0	NPCR 010 Building boards, rev1, 12/2013	Only with EN15804	Last ned EPD
Verified	2018	[norway]	ecoinvent		NPCR 010 Building boards, rev1, 12/2013	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent		NPCR 010 Building Boards, rev1	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	17.5	NPCR PART A: Construction Products and Services, NPCR 012 ver. 2 and PCR-Part B for Thermal insulation products	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	28.0	NPCR PART A: Construction Products and Services, NPCR 012 ver. 2 and PCR-Part B for Thermal insulation products	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	80.0	NPCR PART A: Construction Products and Services, NPCR 012 ver. 2 and PCR-Part B	Only with EN15804	Last ned EPD
Verified	2019	[norway]	ecoinvent	25.0	NPCR PART A: Construction Products and Services, NPCR 012 ver. 2 and PCR-Part B for Thermal insulation products	Only with EN15804	Last ned EPD
Verified	2019	[austria]	GaBi	459.2	PCR Solid wood products, 12/2018	Only with EN15804	Last ned EPD
Verified	2020	[denmark]	GaBi	725.0	EN15804	-	Last ned EPD
Verified	2015	[norway]	ecoinvent	385.0	NPCR 015 Wood and wood-based products for use in construction, rev1, 08/2013	Biogenic CO2 separated	Last ned EPD
Verified	2015	[norway]	GaBi	980.0	PCR Floor coverings, 07/2014	Only with EN15804	Last ned EPD
Verified	2017	[norway]	ecoinvent	1297.6	NPCR 020 Precast Concrete Products, 2011	Only with EN15804	Last ned EPD

Verified	2015	[norway]	ecoinvent	420.0	NPCR 015 Wood and wood-based products for use in construction, rev1, 08/2013	Biogenic CO2 separated	Last ned EPD
Verified	2018	[norway]	ecoinvent		NPCR 014 Windows and doors, rev1, 03/2013	Only with EN15804	Last ned EPD
Verified	2019	[france]	ecoinvent		EN15804	EN15804	Last ned EPD
-	2018	[LOCAL]	ecoinvent	620.0	EN15804	-	
-	2018	[LOCAL]	ecoinvent	650.0	EN15804	-	
Verified	2019	[ireland]	ecoinvent	600.0	EN15804:2012+A1:2013, EPD Ireland PCR Part A	Only with EN15804	Last ned EPD
-	2018	[LOCAL]	ecoinvent	610.0	EN15804	-	
Verified	2017	[finland]	ecoinvent	33.0	EN15804	-	Last ned EPD
True	2018	[vietnam, malaysia]	ecoinvent		PEP-PCR-ed3-FR-2015 04 02	ISO 14025	Last ned EPD
Verified	2016	[france]	ecoinvent	40.71	EN15804	EN15804	Last ned EPD
Verified	2016	[france]	ecoinvent	7850.0	EN15804	-	Last ned EPD

-	2018	[LOCAL]	ecoinvent	2100.0	EN15804	-	
-	2019	[LOCAL]	ecoinvent	1300.0	EN15804	-	
Verified	2019	[unitedKingdom, sweden, southCarolina, USA]	GaBi	7900.0	PCR Structural steels, 07/2014	Only with EN15804	Last ned EPD
Verified	2019	[denmark, norway]	GaBi	55.0	PCR Mineral insulating materials, 12/2018	Only with EN15804	Last ned EPD
-	2018	[LOCAL]	ecoinvent	7850.0	EN15804	-	
Verified	2013	[norway]	GaBi	7850.0	NPCR 013 Steel as construction material, rev1, 08/2013	Only with EN15804	Last ned EPD
Verified	2016	[finland]	ecoinvent		NPCR 010 Building boards, rev1	Only with EN15804	Last ned EPD
-	2018	[LOCAL]	ecoinvent	7850.0	EN15804	-	
Verified	2017	[unitedArabEmirates]	ecoinvent	1400.0	EN15804	-	Last ned EPD
Verified	2015	[norway, sweden]	ecoinvent	289.1	IBU PCR for Room partition systems, ver. 1.2, 03/04/2013	Only with EN15804	Last ned EPD
Verified	2015	[norway]	ecoinvent	420.0	NPCR 015 Wood and wood-based products for use in construction, rev1, 08/2013	Biogenic CO2 separated	Last ned EPD
Verified	2014	[norway]	ecoinvent		NPCR 014 Windows and doors, rev1, 03/2013	Biogenic CO2 separated	Last ned EPD
Verified	2016	[norway]	ecoinvent	32.0	NPCR 012 Insulation materials, rev1. LCA of PAROC stone wool produced at Scandinavian plants.	Only with EN15804	Last ned EPD