NATIONAL CEMENT
The National Cement Company, Inc.

Environmental Product Declaration (EPD) for Cement Produced at Lebec, California Operation

GENERAL INFORMATION

This cradle to gate Environmental Product Declaration covers cement products produced at the Lebec Production Plant. The Life Cycle Assessment (LCA) was prepared in conformity with ISO 21930, Smart EPD Part A (2025), Smart EPD Part B (2025), ISO 14025, ISO 14040, and ISO 14044. This EPD is intended for business-to-business (B-to-B) audiences.

NATIONAL CEMENT COMPANY OF CALIFORNIA

Lebec Operation

33503 CA-138
Lebec, CA 93243

EPD # 1178
12th of May, 2026
Valid for 5 years

PROGRAM OPERATOR

ASTM International
100 Barr Harbor
West Conshohocken, PA 19428
https://www.astm.com
610-832-9500

ENVIRONMENTAL IMPACTS Lebec Plant:
Product-Specific Type III EPD Declared Cement
Product:
Type IL, Type Block, Type V and Type IT
Declared Unit: One metric Tonne of cement

IMPACT CATEGORIES	Type IL	Type Block	Type V	Type IT
Global Warming Potential - Total kg CO_2 eq	627	603	682	543
Ozone Depletion Potential kg CFC-11 eq	2.91E-05	2.80E-05	3.20E-05	2.35E-05
Eutrophication Potential kg N eq	1.28E-01	1.24E-01	1.37E-01	1.22E-01
Acidification Potential kg SO2 eq	9.51E-01	9.21E-01	9.86E-01	8.46E-01
Photochemical Ozone Formation Potential, kg O_3eq	23.8	23.0	24.7	20.6
Abiotic Depletion, non-fossil kg Sb eq	3.52E-06	3.11E-06	3.68E-06	3.35E-06
Abiotic Depletion, fossil MJ, NCV	3111	3006	3323	2579

PRODUCT COMPONENTS

Clinker Percent	85%	79%	90%	62%
Limestone, Gypsum and others percent	15%	21%	10%	38%

Limitations, Liability, & Ownership

The EPD owner has sole ownership, liability, and responsibility for the EPD.
Environmental declarations from different programs (ISO 14025) may not be comparable. Comparison of the environmental performance of products using EPD information shall be based on the product's use and impacts at the building or construction works level, and therefore EPDs may not be used for comparability purposes when not considering the whole building life cycle. EPD comparability is only possible when all stages of a life cycle have been considered. However, variations and deviations are possible. Example of variations: Different LCA software and background LCI datasets may lead to differences in results upstream or downstream of the life cycle stages declared.

The environmental impact results of products in this document are based on a declared unit and therefore do not provide sufficient information to establish comparisons. The results shall not be used for comparisons without knowledge of how the physical properties of the product impact the precise function at the construction level. The environmental impact results shall be converted to a functional unit basis before any comparison is attempted.
A manufacturer shall not make claims based on an industry-average EPD which leads the market to believe the industry-average is representative of manufacturer-specific or product-specific results.

PRODUCER

National Cement Company of California Inc., (NCC of CA), a subsidiary of National Cement Company Inc., (NCC) is an innovative and dynamic manufacturer of artificial cement and ready-mix concrete serving markets in California and the southeastern United States. NCC is a proud, wholly-owned subsidiary of the Vicat Group based in France. Vicat is an international group of companies and a French, family-run business founded in 1817 by Louis Vicat who mastered the production of artificial cement during construction of the Souillac Bridge in southwestern France.

The portland cement manufacturing plant in Lebec was built in 1966 to serve the rapidly growing demand for Portland cement in Southern California. NCC of CA was formed in 1987 as part of the acquisition of the Lebec Plant. Since that time, NCC of CA has modernized the Lebec plant with state-of-the-art technology to eliminate landfilling of CKD waste, improve energy efficiency and minimize emissions. In addition to manufacturing cement, NCC of CA's ready-mix subsidiaries (National Ready-Mix, Builders Concrete, Viking Ready-Mix and Golden Empire Concrete) serve the region's needs for high-quality residential and commercial concrete products from their numerous batch plants which attend to the diverse markets of Southern California and the Central Valley.

ISO 21930:2017 Sustainability in Building Construction-Environmental Declaration of Building Products and Smart EPD Part A (2025) serve as the core PCR Smart EPD Part B PCR for Cements for Construction (2025) 1000-010, v4.0. serves as the sub-category PCR
Sub-category PCR review was conducted by **Thomas P. Gloria, PhD. (t.gloria@industrial-ecology.com) • Industrial Ecology Consultants**
Independent verification of the declaration, according to ISO 21930:2017 and ISO 14025:2006.: ☐ internal ☑ external
Third party verifier Thomas P. Gloria, PhD. (t.gloria@industrial-ecology.com) • Industrial Ecology Consultants
For additional explanatory material **Manufacturer Representative: Thomas Snowden (thomas.snowden@natcem.com)** **This LCA EPD was prepared by Climate Earth (www.climateearth.com)**

PRODUCT

The cement products covered in this EPD meet UN CPC 3744 classification and the following standards:

Product Type	Applicable Standard	Standard Designation
Portland Limestone Cement	ASTM C595, C1157, AASHTO M240	Type IL, Type Block
Portland Cement	ASTM C150, C1157, AASHTO M85	Type V
Blended hydraulic cement	ASTM C595, C1157, AASHTO M240	Type IT

PRODUCT DESCRIPTION

This EPD reports environmental information for four cement products produced by NCC of CA at their Lebec, CA facility. These cements are used as the key ingredient in many products, such as ready-mix concrete, mortar, grout, masonry units, and in a wide array of applications such as concrete pipes, pre-stressed concrete, roads, foundations, bridges, soil stabilization, and more. Type IL cement is a general-use cement engineered to reduce the carbon footprint by integrating a higher ground limestone content than permitted in Type II/V cement. Type IT (LC3) cement is a general-use cement engineered to reduce the carbon footprint by integrating a calcined clay pozzolan and higher ground limestone content than permitted in ASTM C150 Type II/V cement.

The biogenic carbon content of the cement product leaving the factory gate is declared in the following table.

Biogenic carbon content	Value	Unit (per declared unit)
Biogenic carbon content in product	<5%	kg C per tonne of cement
Biogenic carbon content in accompanying packaging	0	kg C per tonne of cement

No regulated hazardous or dangerous substances are included in this product.

EPD REPRESENTATIVENESS AND SPECIFICITY

The scope of this EPD is cradle to gate (A1-A3).
This EPD is facility specific and product specific.
The year of primary data is 2025
Supply chain specificity: 99.8%

LIFE CYCLE ASSESSMENT

DECLARED UNIT

The declared unit is one metric tonne of Type IL, Type Block, Type V and Type IT cement.

SYSTEM BOUNDARY

This EPD is a cradle-to-gate EPD covering A1-A3 stages of the life cycle.

PRODUCTION STAGE			CONSTRUCTION STAGE		USE STAGE							END-OF-LIFE STAGE			
Extraction and upstream production	Tansport to factory	Manufacturing	Transport to site	Installation	Use	Maintenance	Repair	Replacement	Refurbishment	Operational energy use	Operational eater use	Deconstruction / Demolition	Transport	Waste Procesing	Disposal of Waste
A1	A2	A3	A4	A5	B1	B2	B3	B4	B5	B6	B7	C1	C2	C3	C4
X	X	X	MND	MND	MND	MND	MND	MND	MND	MND	MND	MND	MND	MND	MND

Note: MND = module not declared; X = module included.

The manufacturing processes outlined in the process flow diagram are described below:

Process	Process description
A1: Extraction and upstream production	• Upstream production and pre-processing of raw materials used in clinker production and cement milling.
A2: Transport to factory	• Transportation of raw materials used in clinker production and cement milling. • Transportation of ancillary materials and fuels used in quarry, kiln, mill, and other manufacturing operations.
A3: Manufacturing	• Upstream production and use of ancillary materials, fuels, electricity, and water used in quarry, kiln, mill, and other manufacturing operations. • Direct emissions from kiln, mill, and other manufacturing operations. • Waste creation and transportation to downstream processing in general manufacturing operations.

CUT-OFF

Items excluded from system boundary include:

- production, manufacture and construction of manufacturing capital goods and infrastructure;
- production and manufacture of production equipment, delivery vehicles, and laboratory equipment;
- personnel-related activities (travel, furniture, and office supplies); and
- energy and water use related to company management and sales activities that may be located either within the factory site or at another location.

ALLOCATION PROCEDURE

Allocation follows the requirements and guidance of ISO 14044:2006, Clause 4.3.4; Smart EPD Part A and B (2025); and ISO 21930:2017 section 7.2. Recycling and recycled content is modeled using the cut-off rule.

This sub-category PCR recognizes fly ash, silica fume, granulated blast furnace slag, cement kiln dust, flue gas desulfurization (FGD) gypsum, and post-consumer gypsum as recovered materials and thus the environmental impacts allocated to these materials are limited to the treatment and transportation required to use as a cement material input. Recycled and recovered materials with fuel content and used as fuels, such as scrap tires and agricultural waste, are considered nonrenewable or renewable secondary fuels. Impacts allocated to these fuels are limited to the treatment and transport required for their use from point of generation along with all emissions from combustion.

DATABASES

The LCI databases used to model foreground and background data are listed in the following table.

Database name	Version	Geography	Allocation method
ecoinvent	3.10	Rest of the World	Cut-off
USLCI	2015	United States	Cut-off
US- EI	2021.1	United States	Cut-off

DATA SOURCES

Both foreground data and background LCI dataset information are documented in the following table.

Material/ Process Category	Module	Material/ Process name	Inventory Dataset Name	Dataset geographic region	Reporting period/Year Dataset represents	Reference
Material	A1	Limestone (tn.sh)	Specific data	United States	2025	n/a. Primary data from quarry
Material	A1	Gypsum (tn.sh)	Gypsum, mineral, at mine/US* US-EI U	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Product	A1	Grinding Aids (tn.sh)	"Diethylene glycol, at plant/US- US-EI U"	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Product	A1	Explosive (tn.sh)	Explosive, tovex {RoW}| production | Cut-off, U	Rest of the World	1997-2023	ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories
Material	A1	Sand (sh.tn)	Sand, at mine/US* US-EI U"	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Material	A1	Iron ore (lb)	Iron ore, crude ore, 46% Fe {GLO}| market for | Cut-off, U	Global	1997-2023	ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories
Material	A1	Clay (tn.sh)	Clay, at mine/US* US-EI U"	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Material	A1	Shale (tn.sh)	Specific data	United States	2025	n/a. Primary data from quarry
Material	A1	Kiln dust (tn.sh)	None – recovered material	United States	2025	None – recovered material
Transport	A2	Road Transport (lbmi)	Transport, combination truck, long-haul, diesel powered/tkm/West	United States	2011	National Renewable Energy Laboratory. (2015). U.S. Life-Cycle Inventory (LCI) database.
Transport	A2	Road Transport (lbmi)	Transport, combination truck, short-haul, diesel powered/tkm/West	United States	2011	National Renewable Energy Laboratory. (2015). U.S. Life-Cycle Inventory (LCI) database.

Material/ Process Category	Module	Material/ Process name	Inventory Dataset Name	Dataset geographic region	Reporting period/Year Dataset represents	Reference
Calcination	A3	Calcination	Specific data	United States	2025	Energy Protocol output method (B2) published by the World Business Council for Sustainable Development (WBCSD) Cement Sustainability Initiative (CSI).
Combustion emissions	A3	Direct emissions	Specific data	United States	2025	Lebec's plant direct CEM measurements (2025)
Energy	A3	Electricity (kWh)	Specific data	United States	2024	Southern California Edison (2025). Electric Company ESG/Sustainability Quantitative Information.
Energy	A3	Diesel (gal)	Diesel, combusted in industrial equipment NREL/US U	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Energy	A3	Natural gas (ft3)	Natural gas, high pressure {US}| market for | Cut-off, U	United States	1997-2023	ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories
Energy	A3	Petroleum Coke (tn.sh)	Petroleum coke, at refinery/US- US-EI U	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Ancillaries	A3	Ammonia (lb)	Ammonia, anhydrous, liquid {RoW}| ammonia production, steam reforming, liquid | Cut-off, U	Rest of the World	1997-2023	ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories
Ancillaries	A3	Castable (tn.sh)	Cement mortar {RoW}| production	Rest of the World	1997-2023	ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories
Ancillaries	A3	Lubricating Oil (gal)	Lubricating oil, at plant/US- US-EI U	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability
Energy	A3	Agricultural waste (tn.sh)	None – recovered material	United States	2025	None – recovered material
Energy	A3	Tires (tn.sh)	None – recovered material	United States	2025	None – recovered material
Waste	A3	Waste Treatment: Sanitary Landfill (tn.sh)	Disposal, municipal solid waste, 22.9% water, to sanitary landfill/US US-EI U	United States	2010-2021	Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability

DATA QUALITY

The data quality assessment (DQA) for cement foreground data is presented in the following table.

Indicator		Definition	Data quality score meaning	Data quality score
Temporal representativeness (plant)		Indicates the temporal difference between the date of data generation and the date the data are supposed to represent based on the PCR.	Previous calendar or financial year (1 year)	1
Geographical representativeness		Indicates how well the geographical area from which data for a unit process are collected satisfies the goal of the study	Site-specific data	1
Technological representativeness		Indicates technical representativeness based on four categories: process design, operating conditions, material quality/type and process scale.	Site-specific technology	1
Reliability (Precision, Accuracy, Verification)	Combustion emissions	Indicates quality of data generation method and verification of data collection methods.	Third-party verified1 data based on direct CEMS measurements (CO_2 and PM)	1
	Calcination emissions		Site-specific data	1
	Thermal energy quantity by source type		Site-specific data	1
	Electricity quantities		Site-specific data	1
	Raw material quantities		Site-specific data	1
	Inbound transport distances		Site-specific data	1
	Outbound transport distances (from A3)		Site-specific data	1
	Raw material quantities		Site-specific data	1
	Waste quantities		Site-specific data	1

RENEWABLE ELECTRICITY

Renewable contractual instruments are used in the reported impact results in this EPD. The information in the following table describes the renewable electricity technical scenario for this manufacturing facility.

Parameter	Value
Electricity source	Offsite
Renewable energy type(s)	Wind, solar, geothermal, hydro, biomass
Percent of EPD Owner's product-related electricity covered	56.69%
If <100%, grid type used to model remaining electricity	California electricity generation (2023) reported by the California Energy Commission (CEC)
Electricity accounting methodology	Local based
Commitment pledged for entire validity period of EPDs	Yes

LIFE CYCLE IMPACT ASSESSMENT RESULTS

Lebec Cement Products[1]: Type IL, Type Block, Type V, Type IT; per 1 metric tonne

Impact Assessment	Unit	Type IL	Type Block	Type V	Type IT
Global warming Potential – Total (GWP-TOTAL)[2]	kg CO_2 eq	627	603	682	543
Global Warming Potential – Fossil (GWP-fossil)[2]	kg CO_2 eq	627	603	682	543
Global Warming Potential – Biogenic (GWP-biogenic)[2]	kg CO_2 eq	7.62E-02	7.43E-02	8.16E-02	6.80E-02
Global Warming Potential – Land Use and Land Use Change (GWP-luluc)[2]	kg CO_2 eq	1.62E-03	1.59E-03	1.65E-03	8.53E-03
Depletion potential of the stratospheric ozone layer (ODP)	kg CFC-11 eq	2.91E-05	2.80E-05	3.20E-05	2.35E-05
Eutrophication potential (EP)	kg N eq	1.28E-01	1.24E-01	1.37E-01	1.22E-01
Acidification potential of soil and water sources (AP)	kg SO_2 eq	9.51E-01	9.21E-01	9.86E-01	8.46E-01
Formation potential of tropospheric ozone (POCP)	kg O_3 eq	23.8	23.0	24.7	20.6
Resource Use					
Abiotic depletion potential for non-fossil mineral resources (ADPelements)*	kg Sb eq	3.52E-06	3.11E-06	3.68E-06	3.35E-06
Abiotic depletion potential for fossil resources (ADPfossil)	MJ, NCV	3111	3006	3323	2579
Renewable primary energy resources as energy (fuel), (RPRE[3]) *	MJ, NCV	319	312	342	286
Renewable primary resources as material, (RPRM[3]) *	MJ, NCV	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Non-renewable primary resources as energy (fuel), (NRPRE[3]) *	MJ, NCV	3434	3322	3669	2872
Non-renewable primary resources as material, (NRPRM[3]) *	MJ, NCV	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Consumption of fresh water, (FW[3])	m3	1.84	1.79	1.97E+00	1.57
Secondary Material, Fuel and Recovered Energy					
Secondary Materials, (SM[3]) *	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Renewable secondary fuels, (RSF[3]) *	MJ, NCV	1552	1489	1489	1211
Non-renewable secondary fuels (NRSF[3]) *	MJ, NCV	160	154	154	125
Recovered energy, (RE[3]) *	MJ, NCV	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Waste & Output Flows					
Hazardous waste disposed, (HW[3]) *	kg	1.22E-01	1.20E-01	1.28E-01	1.10E-01
Non-hazardous waste disposed, (NHWD[3]) *	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
High-level radioactive waste, (HLRW[3]) *	kg	1.74E-07	1.70E-07	1.72E-07	1.59E-07
Intermediate and low-level radioactive waste, (ILLRW[3]) *	kg	8.38E-07	8.21E-07	8.29E-07	7.72E-07
Components for reuse, (CRU[3]) *	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Materials for recycling, (MR[3]) *	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Materials for energy recovery, (MER[3]) *	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Recovered energy exported from the product system, (EE[3]) *	MJ, NCV	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Additional Inventory Parameters for Transparency					
Calcination carbon emissions[4]	kg CO_2	429	412	471	335
Carbonation carbon removals	kg CO_2	0.00E+00	0.00E+00	0.00E+00	0.00E+00

* Emerging LCA impact categories and inventory items are still under development and can have high levels of uncertainty that preclude international acceptance pending further development. Use caution when interpreting data in these categories. The following optional indicators are not reported and also have high levels of uncertainty: Land use related impacts, toxicological aspects, and emissions from land use change.
Only EPDs prepared from cradle-to-grave life-cycle results and based on the same function, quantified by the same functional unit, and taking account of replacement based on the product reference service life (RSL) relative to an assumed building service life, can be used to assist purchasers and users in making informed comparisons between products.

[1] These products contain no materials that are considered hazardous as defined by the PCR.
[2] GWP 100; 100-year time horizon GWP factors are provided by the IPCC 2021 Sixth Assessment Report (AR6). CO2 from biogenic secondary fuels used in kiln are climate-neutral (CO2 sink = CO2 emissions), ISO 21930, 7.2.7.
[3] Calculated per ACLCA ISO 21930 Guidance.
[4] Calcination emissions were calculated based on the Cement CO2 and Energy Protocol detailed output method (B2) published by the World Business Council for Sustainable Development (WBCSD) Cement Sustainability Initiative (CSI).

The LCIA results for Global Warming Potential (GWP) of the plant, are further split between impacts derived from fuels combustion, alternative fuels, calcination, and impacts related to carbon capture, utilization, and storage, per tonne of cement produced.

Impact Category		Unit	Primary Fuels Combustion	Alternative Fuels Combustion	Calcination	Other	GWP-CC	GWP-S	GWP-U
GWP	Fossil	kg CO_2 eq	167	15.1	486	n/a	n/a	n/a	n/a
	Biogenic	kg CO_2 eq	204	7.6	12.4	n/a	n/a	n/a	n/a
	Total	kg CO_2 eq	371	22.7	499	n/a	n/a	n/a	n/a

Comparisons cannot be made between product-specific or industry average EPDs at the design stage of a project, before a building or construction works has been specified. Comparisons may be made between product-specific or industry average EPDs at the time of product purchase only when product or construction works performance and specifications have been established and serve as a functional unit for comparison. Environmental impact results shall be converted to a functional unit basis before any comparison is attempted. Any comparison of EPDs shall be subject to the requirements of ISO 21930 or EN 15804. EPDs are not comparative assertions and are either not comparable or have limited comparability when they have different system boundaries, are based on different product category rules or are missing relevant environmental impacts. Such comparisons can be inaccurate and could lead to erroneous selection of materials or products that are higher-impact, at least in some impact categories.

ADDITIONAL ENVIRONMENTAL INFORMATION

Uncertainty in Impact Assessment Categories Under Development

The following impact assessment categories are still under development and can have high levels of uncertainty that preclude international acceptance pending further development. Use caution when interpreting data in these categories:

- GWP-luluc: Global Warming Potential – Land Use and Land Use Change
- GWP-CC(U)S: Global Warming Potential – Carbon Capture, Utilization, and Storage
- ADPelements: Abiotic depletion potential for non-fossil mineral resources

Downstream Transportation

To facilitate improved understanding and tracking of primary transportation impacts for downstream products (e.g. ready-mix concrete, precast concrete), the following table has been provided to help downstream users of cement EPDs to accurately quantify any additional transportation impacts – within the cement producers control – associated with moving cement to a distribution facility beyond the gate of the cement plant.

Starting Plant/Gate Location	Leg	% of Supply	Transport Mode	Distance/ Unit	Destination
Lebec, CA	1	38%	Truck	75 miles	Los Angeles, CA
Lebec, CA	1	8%	Truck	85 miles	Vernon, CA
Lebec, CA	1	6%	Truck	200 miles	Westside, CA
Lebec, CA	1	6%	Truck	65 miles	Van Nuys, CA
Lebec, CA	1	5%	Truck	95 miles	Artesia, CA
Lebec, CA	1	4%	Truck	240 miles	Soledad, CA
Lebec, CA	1	4%	Truck	100 miles	Oxnard, CA
Lebec, CA	1	4%	Truck	75 miles	Glendale, CA
Lebec, CA	1	4%	Truck	35 miles	Santa Clarita, CA
Lebec, CA	1	4%	Truck	80 miles	Irwindale, CA
Lebec, CA	1	4%	Truck	95 miles	Ventura, CA
Lebec, CA	1	3%	Truck	75 miles	Oildale, CA
Lebec, CA	1	3%	Truck	70 miles	Moorpark, CA
Lebec, CA	1	3%	Truck	70 miles	Bakersfield, CA
Lebec, CA	1	2%	Truck	180 miles	Handford, CA
Lebec, CA	1	1%	Truck	260 miles	Salinas, CA
Lebec, CA	1	1%	Truck	90 miles	Montebello, CA

Company Disclaimers

NCC of CA's Lebec Plant complies with local, state and federal environmental regulations and monitors and reports emissions to air and water from the manufacturing process. The plant maintains a Title V Operating Permit (1128-V-2000) issued by Eastern Kern Air Pollution Control District (EKAPCD). This permit also requires compliance with the Federal New Source Performance Standards (NSPS), the National Emission Standards for Hazardous Air Pollutants (NESHAP) and Prevention of Significant Deterioration (PSD) permit number NSR 4-4-11, SE 95-01. NCC of CA's commitment to sustainability includes the use of alternative raw materials and alternative fuels such as tire-derived fuel (TDF) and wood-derived fuel to lower the carbon footprint of the products.

NCC is part of the Vicat Group, a global innovator of construction materials across 12 countries worldwide. The Vicat Group's sustainability initiatives include implementation of new, less energy-intensive organizational methods, integration of new technologies derived from our research and development projects and a focus on the use of new materials for the construction of housing and transportation infrastructures. To learn more about the Vicat Group's sustainability initiatives, visit https://www.vicat.com/commitments/respecting-environment.

REFERENCES

ACLCA 2019, Guidance to Calculating Non-LCIA Inventory Metrics in Accordance with ISO 21930:2017. The American Centre for Life Cycle Assessment, May 2019

Climate Earth 2026: National Cement – LCA Project Report, Lebec Plant

ecoinvent v3.10: 2023 The Swiss Centre for Life Cycle Inventories

ISO 14020:2000 Environmental labels and declarations – General principles

ISO 14025:2006 Environmental labeling and declarations – Type III environmental declarations – Principles and procedures

ISO 14040:2006 Environmental Management - Life Cycle Assessment - Principles and Framework

ISO 14044:2006/Amd 1:2017/Amd2:2020 Environmental Management - Life Cycle Assessment - Requirements and Guidelines

ISO 21930:2017 Sustainability in buildings and civil engineering works — Core rules for environmental product declarations of construction products and services

Long Trail Sustainability. (2021). DATASMART (US-EI Database). Huntington, VT: Long Trail Sustainability

Smart EPD. (2025). Part A PCR Standard 1000, version 1.2.

Smart EPD. (2025). Part B PCR for Cements for Construction 1000-010, v4.0.

Southern California Edison (2025). Electric Company ESG/Sustainability Quantitative Information.

US EPA. (2014). Tool for the Reduction of Assessment of Chemical and Other Environmental Impacts (TRACI).