

Environmental Product Declaration



In accordance with ISO 14025:2006 for:

Pure Aniline and Semi Aniline Leathers

from

Garrett Leather



L E A T H E R

Programme:	The International EPD® System, www.environdec.com
Programme operator:	EPD International AB
EPD registration number:	EPD-IES-0008977:001
Publication date:	2025-01-29
Valid until:	2030-01-28

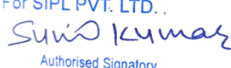
An EPD may be updated or depublished if conditions change. To find the latest version of the EPD and to confirm its validity, see www.environdec.com.



General information

Programme information

Programme:	The International EPD [®] System
Address:	EPD International AB Box 210 60 SE-100 31 Stockholm Sweden
Website:	www.environdec.com
E-mail:	info@environdec.com

Accountabilities for PCR, LCA and independent, third-party verification
Product Category Rules (PCR)
CEN standard EN 15804 EF 3.1 EF 3.1 serves as the Core Product Category Rules (PCR)
Product Category Rules (PCR): <i>EPD International PCR 2011:13 Finished Bovine Leather (V 3.0.4) and UN CPC code 2912></i>
PCR review was conducted by: <i>Maurizio Fieschi</i>
Life Cycle Assessment (LCA)
LCA accountability: <i>WAP Sustainability Consulting, LLC</i>
Third-party verification
Independent third-party verification of the declaration and data, according to ISO 14025:2006, via: ☒ EPD verification by individual verifier Third-party verifier: Sunil Kumar, SIPL Pvt Ltd. For SIPL PVT. LTD.,  Authorised Signatory Approved by: The International EPD [®] System

The EPD owner has the sole ownership, liability, and responsibility for the EPD.

EPDs within the same product category but registered in different EPD programmes, or not compliant with EN 15804 EF 3.1 EF 3.1, may not be comparable. For two EPDs to be comparable, they must be based on the same PCR (including the same version number) or be based on fully-aligned PCRs or versions of PCRs; cover products with identical functions, technical performances and use (e.g. identical declared/functional units); have equivalent system boundaries and descriptions of data; apply equivalent data quality requirements, methods of data collection, and allocation methods; apply identical cut-off rules and impact assessment methods (including the same version of characterisation factors); have equivalent content declarations; and be valid at the time of comparison. For further information about comparability, see EN 15804 EF 3.1 EF 3.1 and ISO 14025.

Information about EPD owner

Owner of the EPD: Garrett Leather

Contact: Max Brown <mbrown@garrettleather.com>

Description of the organization: Drawing its name from its origin, Garrett Leather came to life in founder Cameron Brown's attic, known as a Garrett in old English. Today, after growing from those humble beginnings, Garrett Leather is the leather upholstery partner of choice. Our leather defines the prominent spaces of the business and home and adorns the interiors of what takes us across the blue skies, the open road and the vast ocean.

We specialize in helping interior designers, upholsterers and manufacturers find the perfect leather for the aircraft, automotive, yacht, commercial and interior markets and more. We also offer opportunities for our clients to learn more about the intricacies of leather and its applications. Garrett Leather remains privately-owned and family-run to strengthen our deep commitment to personal attention and care for each of our clients.

Our craft is personal to each of us, and we're intentional in choosing sustainable business partnerships and leading a sustainable practice. We source our leather collections from the highest quality raw material selections throughout Europe. Maintaining strong relationships with the most elite and ethically responsible tanneries, we work together to create purposeful leather products.

Product-related or management system-related certifications: Garrett Leather's Buffalo warehouse is ISO 9001 compliant.

Name and location of production site(s): Pure Aniline and Semi Aniline Leathers are produced in Italy and warehoused in Buffalo, NY.

Product information

Product name: Pure Aniline and Semi Aniline Leathers

Product identification: The products under study represent chromium tanned leather produced in Italy.

Product description: Garrett Leather's Italian articles provide superior performance, durability, and longevity. The grain consistency throughout each hide results in high cutting yields with minimal waste. These leathers achieve exceptional results on rigorous industry test requirements, particularly for transportation (aviation, automotive, and marine). These collections are ideal for all upholstery applications, especially high traffic areas.

UN CPC code: 2912

Geographical scope: Global

Manufacturing process: Manufacturing begins with raw hide inputs. Any remaining fat and tallow are cut from the hide before the hair is chemically removed. Hides are then washed, dried, treated, and dyed to be ready for commercial use. Chromium tanned leather is chemically treated to preserve the hide and prevent degradation and rot for years to come.

LCA information

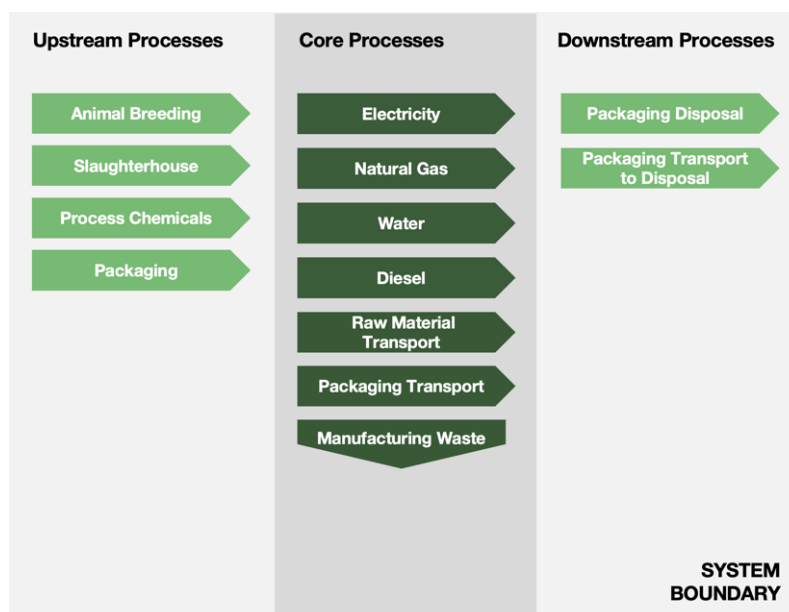
Declared unit: The declared unit is the production of 1 m² of “finished bovine leather”, measured according to ISO standard 11646.

Time representativeness: 2023

Database(s) and LCA software used: Agri-footprint 5.0, ecoinvent 3.9.1 and SimaPro 9.5.0.1

Description of system boundaries: Cradle-to-grave (as defined by the PCR)

System diagram:



Assumptions:

- Primary data were not provided for the bovine-related upstream processes. Therefore, generic data from the Agri-footprint dataset, as well as LCI data from Ulya et. al. were used as proxy.

Content information

Product components	Weight, kg	Post-consumer material, weight-%	Biogenic material, weight-% and kg C/kg
Cattle hide	2.50E+00	0%	0%, 0 kg C/kg and 0 CO ₂ e/kg
Other chemicals	5.48E-01	0%	0%, 0 kg C/kg and 0 CO ₂ e/kg
TOTAL	3.05E00	0%	0%, 0 kg C/kg and 0 CO ₂ e/kg
Packaging materials	Weight, kg	Weight-% (versus the product)	Weight biogenic carbon, kg C/kg
Cardboard	2.18E-03	0.1%	4.54E-01 kg C/kg
TOTAL	2.18E-03	0.1%	4.54E-01 kg C/kg

This product does not contain substances on the candidate list of SVHC for Authorisation at a percentage higher than 0.1% by mass.

Results of the environmental performance indicators

Mandatory impact category indicators according to EN 15804 EF 3.1

Indicator	Unit	Upstream	Core	Downstream	Total
GWP-fossil	kg CO ₂ eq.	1.58E+01	1.53E+01	4.64E-03	3.11E+01
GWP-biogenic	kg CO ₂ eq.	8.54E+00	4.14E-01	3.70E-02	8.99E+00
GWP-luluc	kg CO ₂ eq.	1.19E+00	4.82E-03	2.93E-06	1.19E+00
GWP-total	kg CO ₂ eq.	2.55E+01	1.57E+01	4.16E-02	4.13E+01
ODP	kg CFC 11 eq.	7.61E-01	8.81E-02	2.56E-05	8.49E-01
AP	mol H ⁺ eq.	2.74E-03	8.56E-04	5.41E-07	3.59E-03
EP-freshwater	kg P eq.	3.24E-01	3.07E-02	5.39E-05	3.55E-01
EP-marine	kg N eq.	3.32E+00	3.17E-01	8.87E-05	3.64E+00
EP-terrestrial	mol N eq.	3.64E-02	1.02E-01	4.31E-05	1.38E-01
POCP	kg NMVOC eq.	8.64E-08	2.81E-07	8.02E-11	3.68E-07
ADP-minerals&metals*	kg Sb eq.	9.60E-05	1.64E-05	1.43E-08	1.12E-04
ADP-fossil*	MJ	1.20E+02	2.30E+02	6.56E-02	3.50E+02
WDP*	m ³	5.85E+00	1.13E+00	8.60E-04	6.98E+00
Acronyms	GWP-fossil = Global Warming Potential fossil fuels; GWP-biogenic = Global Warming Potential biogenic; GWP-luluc = Global Warming Potential land use and land use change; ODP = Depletion potential of the stratospheric ozone layer; AP = Acidification potential, Accumulated Exceedance; EP-freshwater = Eutrophication potential, fraction of nutrients reaching freshwater end compartment; EP-marine = Eutrophication potential, fraction of nutrients reaching marine end compartment; EP-terrestrial = Eutrophication potential, Accumulated Exceedance; POCP = Formation potential of tropospheric ozone; ADP-minerals&metals = Abiotic depletion potential for non-fossil resources; ADP-fossil = Abiotic depletion for fossil resources potential; WDP = Water (user) deprivation potential, deprivation-weighted water consumption				

** Disclaimer: The results of this environmental impact indicator shall be used with care as the uncertainties of these results are high or as there is limited experience with the indicator. The estimated impact results are only relative statements, which do not indicate the endpoints of the impact categories, exceeding threshold values, safety margins and/or risks.*

Resource use indicators

Indicator	Unit	Upstream	Core	Downstream	Total
PERE	MJ	2.16E+01	8.36E+00	1.50E-03	2.99E+01
PERM	MJ	0.00E+00	1.44E-02	0.00E+00	1.44E-02
PERT	MJ	2.16E+01	8.38E+00	1.50E-03	3.00E+01
PENRE	MJ	1.20E+02	2.19E+02	6.56E-02	3.39E+02
PENRM	MJ	0.00E+00	0.00E+00	0.00E+00	0.00E+00
PENRT	MJ	1.20E+02	2.19E+02	6.56E-02	3.39E+02
SM	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
RSF	MJ	0.00E+00	0.00E+00	0.00E+00	0.00E+00
NRSF	MJ	0.00E+00	0.00E+00	0.00E+00	0.00E+00
FW	m ³	1.88E+02	3.16E+01	6.39E-03	2.19E+02
Acronyms	PERE = Use of renewable primary energy excluding renewable primary energy resources used as raw materials; PERM = Use of renewable primary energy resources used as raw materials; PERT = Total use of renewable primary energy resources; PENRE = Use of non-renewable primary energy excluding non-renewable primary energy resources used as raw materials; PENRM = Use of non-renewable primary energy resources used as raw materials; PENRT = Total use of non-renewable primary energy re-sources; SM = Use of secondary material; RSF = Use of renewable secondary fuels; NRSF = Use of non-renewable secondary fuels; FW = Use of net fresh water				

Waste indicators

Indicator	Unit	Upstream	Core	Downstream	Total
Hazardous waste disposed	kg	4.25E-04	1.28E-03	3.86E-07	1.70E-03
Non-hazardous waste disposed	kg	7.20E-01	2.40E+00	3.44E-02	3.15E+00
Radioactive waste disposed	kg	1.20E-04	1.74E-04	2.56E-08	2.95E-04

Output flow indicators

Indicator	Unit	Upstream	Core	Downstream	Total
Components for re-use	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Material for recycling	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Materials for energy recovery	kg	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Exported energy, electricity	MJ	0.00E+00	0.00E+00	0.00E+00	0.00E+00
Exported energy, thermal	MJ	0.00E+00	0.00E+00	0.00E+00	0.00E+00

Additional environmental information

Garrett Leather has pursued sustainability verifications and ratings for its products, including GREENGUARD GOLD, MindClick rating, Declare and LBC Red List free, REACH Compliance, and ratings by the leather working group.

Details on additional sustainability certifications and ratings for products can be found on [Garrett Leather's website](#).

References

- CEN. (2019). *EN 15804+A2: Sustainability of construction works – Environmental product declarations – Core rules for the product category of construction products*. European Committee for Standardization.
- Ecoinvent. (2022). *ecoinvent Version 3.9.1*. Retrieved from <https://ecoinvent.org/the-ecoinvent-database/>
- EPD International AB. (2020). *FINISHED BOVINE LEATHER, version 3.01*. www.environdec.com.
- EPD International AB. (2021). *GENERAL PROGRAMME INSTRUCTIONS FOR THE INTERNATIONAL EPD® SYSTEM, v4.0*. www.environdec.com.
- General Programme Instructions of the International EPD® System. Version 5.0.
- Graedel, T. E., Allwood, J., Birat, J. P., Reck, B. K., Sibley, S. F., Sonnermann, G., . . . Hagelüken, C. (2011). *Recycling Rates of Metals - A Status Report, A Report of the Working Group on the Global Metal Flows to the International Resource Panel*. UNEP.
- Humbert, S., Rossi, V., Margni, M., Jolliet, O., & Loerincik, Y. (2009). Life cycle assessment of two baby food packaging alternatives: Glass jars vs. plastic pots. *The International Journal of Life Cycle Assessment*.
- ISO. (2006). *ISO 14025: Environmental labels and declarations - Type III environmental declarations - Principles and procedures*. Geneva: International Organization for Standardization.
- ISO. (2006). *ISO 14040/Amd 1:2020: Environmental management - Life cycle assessment - Principles and framework*. Geneva: International Organization for Standardization.
- ISO. (2006). *ISO 14044/Amd 1:2017/Amd 2:2020: Environmental Management - Life cycle assessment - Requirements and Guidelines*. Geneva: International Organization for Standardization.
- ISO. (2018). *ISO 14067: Greenhouse gases — Carbon footprint of products — Requirements and guidelines for quantification*. Geneva: International Organization for Standardization.
- Mérieux NutriSciences | Blonk . (2014). *Agri-footprint 5.0*. Retrieved from <https://simapro.com/products/agri-footprint-database/>
- Tenerías Omega S.A. (2022). *Life Cycle Assessment Comparison [CAROLINA vs. VITORIA-WG Products]*.
- Ulya, M., Arifuddin, A. L., & Hidayat, K. (n.d.). Life Cycle Assessment of Cow Tanned Leather Products. *IOP Conf. Ser.:Earth Environ.Sci* 757 0120066.
- United States Environmental Protection Agency. (2020). *Advancing Sustainable Materials Management: 2018 Fact Sheet*. Washington DC: United States EPA.
- Life Cycle Assessment for Leather Products, Garrett Leather, WAP Sustainability, January 2025

