SOPRA-XPS by Soprema

Health Product Declaration v2.3

created via: HPDC Online Builder

HPD UNIQUE IDENTIFIER: 1972042752
CLASSIFICATION: 07 21 13.13 Foam Board Insulation
PRODUCT TYPE: Extruded Polystyrene Foam-Plastic Board (Insulation)
PRODUCT DESCRIPTION: SOPRA-XPS is an extruded polystyrene thermal insulation board used in roofs, walls and foundations. It is composed of a closed-cell, rigid extruded polystyrene foam core. Since October 2020, SOPRA-XPS is using Solstice GBA, a low-GWP, HFO-based blowing agent (HFO 1234ze).

Section 1: Summary

Basic Method / Product Threshold

CONTENT INVENTORY

Inventory Reporting Format
- ○ Nested Materials Method
- ◉ Basic Method

Threshold Disclosed Per
- ○ Material
- ◉ Product

Threshold Level
- ○ 100 ppm
- ◉ 1,000 ppm
- ○ Per GHS SDS
- ○ Other

Residuals/Impurities Evaluation
- ○ Completed
- ◉ Partially Completed
- ○ Not Completed

Explanation(s) provided :
- ◉ Yes ○ No

For all contents above the threshold, the manufacturer has:

Characterized ◉ Yes ○ No
Provided weight and role.

Screened ◉ Yes ○ No
Provided screening results using HPDC-approved methods.

Identified ○ Yes ◉ No
Provided name and CAS RN or other identifier.

CONTENT IN DESCENDING ORDER OF QUANTITY

Summary of product contents and results from screening individual chemical substances against HPD Priority Hazard Lists and the GreenScreen for Safer Chemicals®. The HPD does not assess whether using or handling this product will expose individuals to its chemical substances or any health risk. Refer to Section 2 for further details.

PRODUCT | **MATERIAL OR SUBSTANCE** | *RESIDUAL OR IMPURITY* GREENSCREEN SCORE | HAZARD TYPE

SOPRA-XPS [POLYSTYRENE LT-UNK **1,3,3,3-TETRAFLUOROPROPENE, (1E)- (HFO 1234ZE)** LT-UNK
UNDISCLOSED BM-2 | CAN | END | DEV | REP | PHY | MAM | EYE
CARBON DIOXIDE (CARBON DIOXIDE) NoGS **TALC** BM-1 | CAN | MAM
UNDISCLOSED LT-1 | PBT **STEARIC ACID** LT-P1 | END **CARBON BLACK** BM-1 | CAN | EYE | MAM | PHY *WATER* BM-4]

Number of Greenscreen BM-4/BM3 contents ... 1

Contents highest-concern GreenScreen score(s) (BM-1, LT-1, LT-P1) ... BM-1, LT-1, LT-P1

Nanomaterial ... No

INVENTORY AND SCREENING NOTES:

SOPRA-XPS is available in seven (7) different levels of compressive strength (20, 25, 30, 35, 40, 60, and 100 psi) and in thicknesses from 25 to 102 mm (1 to 4 inches). Ranges were given to substance and ingredient percentages to cover all configurations. No substance other than those listed in this HPD have been added to the finished product during its manufacturing. Residuals could not be considered for all materials because information was not provided by all raw materials vendors.

VOLATILE ORGANIC COMPOUND (VOC) CONTENT

VOC Content data is not applicable for this product category.

CERTIFICATIONS AND COMPLIANCE *See Section 3 for additional listings.*

VOC emissions: CDPH Standard Method V1.2 (Section 01350/CHPS) - Classroom & Office scenario
VOC emissions: UL/GreenGuard Gold Certified
Recycled content: ISO 14021:1999 Environmental labels and declarations
Management: ISO 9001:2015 Quality management systems

CONSISTENCY WITH OTHER PROGRAMS

Pre-checked for LEED v4 Option 1.
Pre-checked for LEED v4.1 Option 1.

Third Party Verified?
- ○ Yes
- ◉ No

PREPARER: Self-Prepared
VERIFIER:
VERIFICATION #:

SCREENING DATE: 2024-08-23
PUBLISHED DATE: 2024-08-23
EXPIRY DATE: 2027-08-23

Section 2: Content in Descending Order of Quantity

This section lists contents in a product based on specific threshold(s) and reports detailed health information including hazards. This HPD uses the inventory method indicated above, which is one of three possible methods:

- *Basic Inventory method with Product-level threshold.*
- *Nested Material Inventory method with Product-level threshold*
- *Nested Material Inventory method with individual Material-level thresholds*

Definitions and requirements for the three inventory methods and requirements for each data field can be found in the HPD Open Standard version 2.3, available on the HPDC website at: www.hpd-collaborative.org/hpd-2-3-standard

SOPRA-XPS

PRODUCT THRESHOLD: 1000 ppm RESIDUALS AND IMPURITIES EVALUATION COMPLETED: Partially

RESIDUALS AND IMPURITIES NOTES: Residuals could not be considered for all substances because information was not provided by all raw materials vendors.

OTHER PRODUCT NOTES: Some substances are undisclosed to protect proprietary information.

POLYSTYRENE ID: 9003-53-6

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **85.0000 - 95.0000** GreenScreen: **LT-UNK** RC: **Both** NANO: **No** SUBSTANCE ROLE: **Polymer species**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
None found		No warnings found on HPD Priority Hazard Lists

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
RESTRICTED LIST	Perkins+Will (P+W)	P&W - Precautionary List Precautionary list of substances recommended for avoidance

SUBSTANCE NOTES: SOPRA-XPS principal ingredient is polystyrene. The recycled content of this substance has been evaluated by a third party and is covered by an independent report.

1,3,3,3-TETRAFLUOROPROPENE, (1E)- (HFO 1234ZE) ID: 29118-24-9

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **2.0000 - 5.0000** GreenScreen: **LT-UNK** RC: **None** NANO: **No** SUBSTANCE ROLE: **Blowing agent**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
None found		No warnings found on HPD Priority Hazard Lists

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
RESTRICTED LIST	Cradle to Cradle Products Innovation Institute (C2CPII)	C2C Certified v4.0 Product Standard Restricted Substances List (RSL) - Effective July 1, 2022 Core Restrictions

SUBSTANCE NOTES: Blowing agent with a global warming potential (GWP) smaller than 1.

UNDISCLOSED ID: **Undisclosed**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **0.5000 - 4.0000** GreenScreen: **BM-2** RC: **None** NANO: **No** SUBSTANCE ROLE: **Blowing agent**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
CAN	CA EPA - Prop 65	Carcinogen - specific to chemical form or exposure route
END	TEDX - Potential Endocrine Disruptors	Potential Endocrine Disruptor
CAN	IARC	Group 1 - Agent is Carcinogenic to humans
CAN	MAK	Carcinogen Group 5 - Genotoxic carcinogen with very slight risk under MAK/BAT levels
DEV	CA EPA - Prop 65	Developmental - specific to chemical form or exposure route
CAN	GHS - Japan	H350 - May cause cancer [Carcinogenicity - Category 1A]
REP	GHS - Japan	H360 - May damage fertility or the unborn child [Toxic to reproduction - Category 1A]
PHY	EU - GHS (H-Statements) Annex 6 Table 3-1	H225 - Highly flammable liquid and vapour [Flammable liquids - Category 2]
MAM	GHS - Japan	H335 - May cause respiratory irritation [Specific target organ toxicity - Single exposure - Category 3]
EYE	GHS - New Zealand	Eye irritation category 2
EYE	GHS - Australia	H319 - Causes serious eye irritation [Serious eye damage/eye irritation - Category 2A]
MAM	GHS - Japan	H372 - Causes damage to organs through prolonged or repeated exposure [Specific target organs/systemic toxicity following repeated exposure - Category 1]
PHY	GHS - New Zealand	Flammable liquids category 2
PHY	GHS - Japan	H225 - Highly flammable liquid and vapour [Flammable liquids - Category 2]
PHY	GHS - Malaysia	H225 - Highly flammable liquid and vapour [Flammable liquids - Category 2]
PHY	GHS - Australia	H225 - Highly flammable liquid and vapour [Flammable liquids - Category 2]

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
None found		No listings found on Additional Hazard Lists

SUBSTANCE NOTES: This substance is a low-GWP co-blowing agent.

CARBON DIOXIDE (CARBON DIOXIDE)

ID: **463-79-6**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:18**

%: **0.5000 - 4.0000** GreenScreen: **NoGS** RC: **None** NANO: **No** SUBSTANCE ROLE: **Blowing agent**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
None found		No warnings found on HPD Priority Hazard Lists

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
None found		No listings found on Additional Hazard Lists

SUBSTANCE NOTES: Blowing agent with a GWP of 1 (reference of the GWP scale).

TALC

ID: **14807-96-6**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:18**

%: **0.1000 - 4.0000** GreenScreen: **BM-1** RC: **None** NANO: **No** SUBSTANCE ROLE: **Nucleating agent**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
CAN	MAK	Carcinogen Group 3B - Evidence of carcinogenic effects but not sufficient for classification
CAN	IARC	Group 2b - Possibly carcinogenic to humans
MAM	GHS - Japan	H372 - Causes damage to organs through prolonged or repeated exposure [Specific target organs/systemic toxicity following repeated exposure - Category 1]
MAM	GHS - Japan	H370 - Causes damage to organs [Specific target organs/systemic toxicity following single exposure - Category 1]

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
None found		No listings found on Additional Hazard Lists

SUBSTANCE NOTES: Talc is used as an additive to control foam generation.

UNDISCLOSED

ID: **Undisclosed**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **0.2000 - 3.0000** GreenScreen: **LT-1** RC: **None** NANO: **No** SUBSTANCE ROLE: **Flame retardant**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
PBT	OSPAR - Priority PBTs & EDs & equivalent concern	PBT - Chemical for Priority Action

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
RESTRICTED LIST	Perkins+Will (P+W)	P&W - Precautionary List Precautionary list of substances recommended for avoidance
RESTRICTED LIST	Cradle to Cradle Products Innovation Institute (C2CPII)	C2C Certified v4.0 Product Standard Restricted Substances List (RSL) - Effective July 1, 2022 Core Restrictions
RESTRICTED LIST	International Living Future Institute (ILFI)	Living Building Challenge 4.0 - Red List of Materials & Chemicals - Effective April 1, 2024 Red List substances to avoid in Living Building Challenge V4.0 projects

SUBSTANCE NOTES: Non-HBCD additive to provide fire retardant performance to foam.

STEARIC ACID

ID: **57-11-4**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **0.1000 - 1.0000** GreenScreen: **LT-P1** RC: **None** NANO: **No** SUBSTANCE ROLE: **Lubricant**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
END	TEDX - Potential Endocrine Disruptors	Potential Endocrine Disruptor

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
None found		No listings found on Additional Hazard Lists

SUBSTANCE NOTES: Stearic acid is used in lubrication of extrusion process.

CARBON BLACK

ID: **1333-86-4**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:17**

%: **0.0100 - 0.5000** GreenScreen: **BM-1** RC: **None** NANO: **No** SUBSTANCE ROLE: **Pigment**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
CAN	US CDC - Occupational Carcinogens	Occupational Carcinogen
CAN	MAK	Carcinogen Group 3B - Evidence of carcinogenic effects but not sufficient for classification
CAN	CA EPA - Prop 65	Carcinogen - specific to chemical form or exposure route
CAN	IARC	Group 2b - Possibly carcinogenic to humans
EYE	GHS - New Zealand	Eye irritation category 2
CAN	GHS - New Zealand	Carcinogenicity category 2
CAN	GHS - Japan	H351 - Suspected of causing cancer [Carcinogenicity - Category 2]
MAM	GHS - Japan	H372 - Causes damage to organs through prolonged or repeated exposure [Specific target organs/systemic toxicity following repeated exposure - Category 1]
PHY	GHS - Japan	H251 - Self-heating;; may catch fire [Self-heating substances and mixtures - Category 1]

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
None found		No listings found on Additional Hazard Lists

SUBSTANCE NOTES: Main ingredient of coloring the polystyrene foam.

WATER ID: **7732-18-5**

HAZARD DATA SOURCE: **Pharos Chemical and Materials Library** HAZARD SCREENING DATE: **2024-08-23 12:52:18**

%: **0.0100 - 0.2000** GreenScreen: **BM-4** RC: **None** NANO: **No** SUBSTANCE ROLE: **Impurity/Residual**

HAZARD TYPE	LIST NAME AND SOURCE	WARNINGS
None found		No warnings found on HPD Priority Hazard Lists

ADDITIONAL LISTINGS	LIST NAME AND SOURCE	NOTIFICATION
EXEMPT	European Union / European Commission (EU EC)	EU - REACH Exemptions Exempted from REACH Annex IV listing due to intrinsic safety

SUBSTANCE NOTES: Water is present as an impurity in the co-blowing agent.

Section 3: Certifications and Compliance

This section lists applicable certification and standards compliance information for VOC emissions and VOC content. Other types of health or environmental performance testing or certifications completed for the product may be provided.

VOC EMISSIONS — **CDPH Standard Method V1.2 (Section 01350/CHPS) - Classroom & Office scenario**

CERTIFYING PARTY: Third Party
APPLICABLE FACILITIES: Sherbrooke, QC, Canada
CERTIFICATE URL:
ISSUE DATE: 2024-04-26 00:00:00
EXPIRY DATE: 2025-04-29 00:00:00
CERTIFIER OR LAB: UL Environment

CERTIFICATION AND COMPLIANCE NOTES: SOPRA-XPS meets all requirements of CDPH standard method V1.2. Report number 1001148207-3669765 from UL Environment.

VOC EMISSIONS — **UL/GreenGuard Gold Certified**

CERTIFYING PARTY: Third Party
APPLICABLE FACILITIES: Sherbrooke, QC, Canada
CERTIFICATE URL: https://spot.ul.com/main-app/products/detail/5cd9cd5055b0e81d607f4174
ISSUE DATE: 2019-04-29 00:00:00
EXPIRY DATE: 2025-04-29 00:00:00
CERTIFIER OR LAB: UL Environment

CERTIFICATION AND COMPLIANCE NOTES: Certified to UL2818-2022. Certificate number 138124-420 from UL Environment.

RECYCLED CONTENT — **ISO 14021:1999 Environmental labels and declarations**

CERTIFYING PARTY: Third Party
APPLICABLE FACILITIES: Sherbrooke, QC, Canada
CERTIFICATE URL: https://my.assets-library.com/m/53763eb429de4da0/original/RCC-SOPRA-XPS.pdf
ISSUE DATE: 2024-01-01 00:00:00
EXPIRY DATE: 2024-12-31 00:00:00
CERTIFIER OR LAB: Groupe AGÉCO

CERTIFICATION AND COMPLIANCE NOTES: Post-consumer recycled content of SOPRA-XPS ranges from 19% to 21% depending on the grade. Pre-consumer recycled content of SOPRA-XPS ranges from 31% to 34% depending on the grade. Total recycled content ranges from 51% to 55% as validated by an independent third party according to ISO 14020/21. The total recycled content of SOPRA-XPS including the recovery of scraps and non-compliant products in the manufacturing process ranges from 70% to 77%.

MANAGEMENT — **ISO 9001:2015 Quality management systems**

CERTIFYING PARTY: Third Party
APPLICABLE FACILITIES: Sherbrooke QC, Canada.
CERTIFICATE URL: https://my.assets-library.com/m/79419bfee455577c/original/ISO-Certification-9001.pdf
ISSUE DATE: 2024-06-11 00:00:00
EXPIRY DATE: 2027-05-07 00:00:00
CERTIFIER OR LAB: SGS ICS

CERTIFICATION AND COMPLIANCE NOTES: Certificate number FR18/81842815.00. Although all the plants cited in this report are covered by the certification, the only plant that manufactures the product covered by this HPD is the plant in Sherbrooke QC, Canada.

Section 4: Accessories

This section lists related products or materials that the manufacturer requires or recommends for installation (such as adhesives or fasteners), maintenance, cleaning, or operations. For information relating to the contents of these related products, refer to their applicable Health Product Declarations, if available.

SOPRASEAL STICK FLASHPRO
MANUFACTURER (OR GENERIC): **SOPREMA**

HPD URL: No HPD Available
ACCESSORY TYPE: Other
CONDITION WHEN RECOMMENDED OR REQUIRED AND/OR OTHER NOTES: SOPRASEAL STICK FLASHPRO can be used to bridge joints of SOPRA-XPS if part of the air barrier assembly.

SOPRASEAL LM 200T
MANUFACTURER (OR GENERIC): **SOPREMA**

HPD URL: No HPD Available
ACCESSORY TYPE: Adhesive
CONDITION WHEN RECOMMENDED OR REQUIRED AND/OR OTHER NOTES: SOPRASEAL LM 200T can be used to adhere SOPRA-XPS on vertical surfaces.

Section 5: General Notes

Residuals could not be considered for all materials because information was not provided by all raw materials vendors. Since October 2020, SOPRA-XPS is using Solstice GBA, a low-GWP, HFO-based blowing agent (HFO 1234ze). SOPRA-XPS is fully compliant with all federal, provincial, and state regulations on the use of halocarbons.

Section 6: References

MANUFACTURER INFORMATION

MANUFACTURER: **Soprema**
ADDRESS: **1688 J-B Michaud St.**
Drummondville, QC J2C 8E9
COUNTRY: **Canada**

WEBSITE: **www.soprema.ca**
CONTACT NAME: **Jean-François Côté**
TITLE: **Director, Standards & Scientific Affairs**
PHONE: **819 478 8166 x.3290**
EMAIL: **jfcote@soprema.ca**

The listed contact is responsible for the validity of this HPD and attests that it is accurate and complete to the best of his or her knowledge.

KEY

Hazard Types

AQU Aquatic toxicity
CAN Cancer
DEV Developmental toxicity
END Endocrine activity
EYE Eye irritation/corrosivity
GEN Gene mutation
GLO Global warming
LAN Land toxicity
MAM Mammalian/systemic/organ toxicity
MUL Multiple
NEU Neurotoxicity
NF Not found on Priority Hazard Lists
OZO Ozone depletion
PBT Persistent, bioaccumulative, and toxic
PHY Physical hazard (flammable or reactive)
REP Reproductive
RES Respiratory sensitization
SKI Skin sensitization/irritation/corrosivity
UNK Unknown

GreenScreen (GS)

BM-4 Benchmark 4 (prefer-safer chemical)
BM-3 Benchmark 3 (use but still opportunity for improvement)
BM-2 Benchmark 2 (use but search for safer substitutes)
BM-1 Benchmark 1 (avoid - chemical of high concern)
BM-U Benchmark Unspecified (due to insufficient data)
LT-P1 List Translator Possible 1 (Possible Benchmark-1)
LT-1 List Translator 1 (Likely Benchmark-1)
LT-UNK List Translator Benchmark Unknown
NoGS No GreenScreen.

GreenScreen Benchmark scores sometimes also carry subscripts, which provide more context for how the score was determined. These are DG (data gap), TP (transformation product), and CoHC (chemical of high concern). For more information, see 2.2.2.4 GreenScreen® for Safer Chemicals, www.greenscreenchemicals.org, and Best Practices for Hazard Screening on the HPDC website (hpd-collaborative.org).

Recycled Types

PreC Pre-consumer recycled content
PostC Post-consumer recycled content
UNK Inclusion of recycled content is unknown
None Does not include recycled content

Other Terms:

GHS SDS Globally Harmonized System of Classification and Labeling of Chemicals Safety Data Sheet

Inventory Methods:

Nested Method / Material Threshold Substances listed within each material per threshold indicated per material
Nested Method / Product Threshold Substances listed within each material per threshold indicated per product
Basic Method / Product Threshold Substances listed individually per threshold indicated per product

Nano Composed of nano scale particles or nanotechnology
Third Party Verified Verification by independent certifier approved by HPDC
Preparer Third party preparer, if not self-prepared by manufacturer
Applicable facilities Manufacturing sites to which testing applies

The Health Product Declaration (HPD) Open Standard provides for the disclosure of product contents and potential associated human and environmental health hazards. Hazard associations are based on the HPD Priority Hazard Lists, the GreenScreen List Translator™, and when available, full GreenScreen® assessments. The HPD Open Standard v2.1 is not:

- *a method for the assessment of exposure or risk associated with product handling or use,*
- *a method for assessing potential health impacts of: (i) substances used or created during the manufacturing process or (ii) substances created after the product is delivered for end use.*

Information about life cycle, exposure and/or risk assessments performed on the product may be reported by the manufacturer in appropriate Notes sections, and/or, where applicable, in the Certifications section.

The HPD Open Standard was created and is supported by the Health Product Declaration Collaborative (the HPD Collaborative), a customer-led organization composed of stakeholders throughout the building industry that is committed to the continuous improvement of building products through transparency, openness, and innovation throughout the product supply chain.

The product manufacturer and any applicable independent verifier are solely responsible for the accuracy of statements and claims made in this HPD and

for compliance with the HPD standard noted.