BID FORM

Non Public Works

All Public Work Projects are required to use the Louisiana Uniform Public Work Bid Form

All prices must be held firm unless an escalation provision is requested in this bid. Jefferson Parish will allow one escalation during the term of the contract, which may not exceed the U.S. Bureau of Labor Statistics National Index for all Urban Consumers, unadjusted 12 month figure. The most recently published figure issued at the time an adjustment is requested will be used. A request must be made in writing by the vendor, and the escalation will only be applied to purchases made after the request is made.

Are you requesting an escalation provision?

YES _____ NO X

MAXIMUM ESCALATION PERCENTAGE REQUESTED 0 %

INITIAL BID PRICES WILL REMAIN FIRM THROUGH THE DATE OF 7/16/2017.

For the purposes of comparison of bids when an escalation provision is requested, Jefferson Parish will apply the maximum escalation percentage quoted by the bidder to the period to which it is applied in the bid. The initial price and the escalation will be used to calculate the total bid price. It will be assumed,for comparison of prices only, that an equal amount of material or labor is purchased each month throughout the entire contract.

DELIVERY: FOB JEFFERSON PARISH

INDICATE DELIVERY DATE ON EQUIPMENT AND SUPPLIES 06/12/2017

LOUISIANA CONTRACTOR'S LICENSE NO.: (if applicable) 44981

THIS SECTION MUST BE COMPLETED BY BIDDER:

FIRM NAME: Brazos Industries, LLC

ADDRESS: 11950 Richcroft Ave.

CITY, STATE: Baton Rouge, LA ZIP: 70706

TELEPHONE: (225) 272-0428 FAX: (225) 273-6894

EMAIL ADDRESS: s.hyatt@brazosurethane.com

In the event that addenda are issued with this bid, bidders MUST acknowledge all addenda on the bid form.Bidder must acknowledge receipt of an addendum on the bid form as indicated. Failure to acknowledge any addendum on the bid form will result in bid rejection.

Acknowledge Receipt of Addenda: NUMBER: 1 dated May 26, 2017

NUMBER: N/A

NUMBER: N/A

NUMBER: N/A

TOTAL PRICE OF ALL BID ITEMS: $ 132,965.00

AUTHORIZED SIGNATURE: Sherise Hyatt

Sherise Hyatt

Printed Name

TITLE: Office Manager

SIGNING INDICATES YOU HAVE READ AND COMPLY WITH THE INSTRUCTIONS AND CONDITIONS.

NOTE: All bids should be returned with the BID NUMBER and BID OPENING DATE indicated on the outside of the envelope submitted to the Purchasing Department.

INVITATION TO BID FROM JEFFERSON PARISH - continued

BID NO.: 50-00119467

SEALED BID

ITEM NUMBER	QUANTITY	U/M	DESCRIPTION OF ARTICLES	UNIT PRICE QUOTED	TOTALS
			FURNISH AND INSTALL ALL LABOR, MATERIALS AND EQUIPMET FOR THE INSTALLATION OF AN ELASTOMETRIC SILICONE ROOF COATING SYSTEM AT THE JEFFERSON PARISH HUMAN SERVICE AUTHORITY BUILDING		
1	1.00	JOB	0010-INSTALLATION OF AN ELASTOMERIC SILICONE ROOF COATING SYSTEM AT THE JEFFERSON PARISH HUMAN SERVICES AUTHORITY BUILDING. BASE BID: ALL WORK DESCRIBED IN THE SPECIFICATION WITH THE EXCEPTION OF SECTIONS NINE (9) AND TEN (10). WE EXTEND THIS BID TO SUPPLY ALL LABOR, MATERIALS, AND EQUIPMENT TO REPAIR, CLEAN, TEST AND COATING OF THE ROOF AT HUMAN SERVICES AUTHORITY BUILDING LOCATED AT 5001 WESTBANK EXPRESSWAY, MARRERO, LA, 70072.	$69,540.00	$69,540.00
2	1.00	SQFT	0020-ANCILLARY WORK: PROVIDE A COST PER SQUARE FOOT TO REMOVE, REPAIR, AND REPLACE WATER DAMAGE. ROOFING MATERIALS DESCRIBED IN SECTION 9.0 OF THE SPECIFICATIONS. THIS LINE ITEM WILL ONLY BE USED IF NEEDED.	$6.50	$6.50
3	1.00	ONLY	0030-ALTERNATE ONE (1): SEE SECTION 10.0 OF THE SPECIFICATIONS. THIS LINE ITEM WILL BE ACCEPTED IF EXISTING BUDGET FOR THIS WORK IS SUFFICIENT.	$63,425.00	$63,425.00

CORPORATE RESOLUTION

EXCERPT FROM MINUTES OF MEETING OF THE BOARD OF DIRECTORS OF Brazos Industries, LLC INCORPORATED.

AT THE MEETING OF DIRECTORS OF Brazos Industries, LLC INCORPORATED, DULY NOTICED AND HELD ON 5/31/2017, A QUORUM BEING THERE PRESENT, ON MOTION DULY MADE AND SECONDED. IT WAS:

RESOLVED THAT Shelby Scoggins, BE AND IS HEREBY APPOINTED, CONSTITUTED AND DESIGNATED AS AGENT AND ATTORNEY-IN-FACT OF THE CORPORATION WITH FULL POWER AND AUTHORITY TO ACT ON BEHALF OF THIS CORPORATION IN ALL NEGOTIATIONS, BIDDING, CONCERNS AND TRANSACTIONS WITH THE PARISH OF JEFFERSON OR ANY OF ITS AGENCIES, DEPARTMENTS, EMPLOYEES OR AGENTS, INCLUDING BUT NOT LIMITED TO, THE EXECUTION OF ALL BIDS, PAPERS, DOCUMENTS, AFFIDAVITS, BONDS, SURETIES, CONTRACTS AND ACTS AND TO RECEIVE ALL PURCHASE ORDERS AND NOTICES ISSUED PURSUANT TO THE PROVISIONS OF ANY SUCH BID OR CONTRACT, THIS CORPORATION HEREBY RATIFYING, APPROVING, CONFIRMING, AND ACCEPTING EACH AND EVERY SUCH ACT PERFORMED BY SAID AGENT AND ATTORNEY-IN-FACT.

I HEREBY CERTIFY THE FOREGOING TO BE A TRUE AND CORRECT COPY OF AN EXCERPT OF THE MINUTES OF THE ABOVE DATED MEETING OF THE BOARD OF DIRECTORS OF SAID CORPORATION, AND THE SAME HAS NOT BEEN REVOKED OR RESCINDED.

SECRETARY-TREASURER

5/31/2017

DATE

Non-Public Works Bid

AFFIDAVIT

STATE OF TEXAS

PARISH/COUNTY OF GALVESTON

BEFORE ME, the undersigned authority, personally came and appeared: Shelby Scoggins _____, (Affiant) who after being by me duly sworn, deposed and said that he/she is the fully authorized Secretary - Treasurer of Brazos Industries, LLC (Entity), the party who submitted a bid in response to Bid Number 50-00119467, to the Parish of Jefferson.

Affiant further said:

Campaign Contribution Disclosures

(Choose A or B, if option A is indicated please include the required attachment):

Choice A _____ Attached hereto is a list of all campaign contributions, including the date and amount of each contribution, made to current or former elected officials of the Parish of Jefferson by Entity, Affiant, and/or officers, directors and owners, including employees, owning 25% or more of the Entity during the two-year period immediately preceding the date of this affidavit or the current term of the elected official, whichever is greater. Further, Entity, Affiant, and/or Entity Owners have not made any contributions to or in support of current or former members of the Jefferson Parish Council or the Jefferson Parish President through or in the name of another person or legal entity, either directly or indirectly.

Choice B X there are NO campaign contributions made which would require disclosure under Choice A of this section.

Debt Disclosures

(Choose A or B, if option A is indicated please include the required attachment):

Choice A _____ Attached hereto is a list of all debts owed by the affiant to any elected or appointed official of the Parish of Jefferson, and any and all debts owed by any elected or appointed official of the Parish to the Affiant.

Choice B __X__ There are NO debts which would require disclosure under Choice A of this section.

Affiant further said:

That Affiant has employed no person, corporation, firm, association, or other organization, either directly or indirectly, to secure the public contract under which he received payment, other than persons regularly employed by the Affiant whose services in connection with the construction, alteration or demolition of the public building or project or in securing the public contract were in the regular course of their duties for Affiant; and

[*The remainder of this page is intentionally left blank.*]

That no part of the contract price received by Affiant was paid or will be paid to any person, corporation, firm, association, or other organization for soliciting the contract, other than the payment of their normal compensation to persons regularly employed by the Affiant whose services in connection with the construction, alteration or demolition of the public building or project were in the regular course of their duties for Affiant.

Signature of Affiant

Shelby Scoggins
Printed Name of Affiant

SWORN AND SUBSCRIBED TO BEFORE ME
ON THE 31st DAY OF May, 2017.

JANETTE POLIVKA
Notary Public, State of Texas
Comm. Expires 04-22-2020
Notary ID 130632074

Janette Polivka
Notary Public

JANETTE POLIVKA
Printed Name of Notary

130632074
Notary/Bar Roll Number

My commission expires 04/22/2020.

BRAZOS
INDUSTRIES

AFFIDAVIT OF AUTHORITY

The following personnel of Brazos Industries, LLC. are authorized to sign bids and enter into contracts on my behalf until further notice:

Larry Fattig

Sherise Hyatt

Shelby Scoggins

Sincerely,

Howard W. Scoggins, III

Howard W. Scoggins, III

President

Hwsiii/

STATE OF LOUISIANA
PARISH OF EAST BATON ROUGE
SWORN TO AND SUBSCRIBED
BEFORE ME this 12 day of May, 2017 at Baton Rouge, Louisiana

NOTARY PUBLIC
MARK D. MILEY
NOTARY PUBLIC LSBA# 27576
MY COMMISSION IS FOR LIFE

11950 Richcroft Ave. - Baton Rouge, LA 70814 - Phone: 225-272-0428 - Fax: 225-273-6894

Tom Schedler
Secretary of State

State of Louisiana Secretary of State

COMMERCIAL DIVISION
225.925.4704

Fax Numbers
225.932.5317 (Admin. Services)
225.932.5314 (Corporations)
225.932.5318 (UCC)

Name	Type	City	Status
BRAZOS INDUSTRIES, LLC	Limited Liability Company	BATON ROUGE	Active

Previous Names

Business: BRAZOS INDUSTRIES, LLC
Charter Number: 36074322K
Registration Date: 12/16/2005

Domicile Address

11950 RICHCROFT DR.
BATON ROUGE, LA 70814

Mailing Address

C/O HOWARD W. SCOGGINS, III
11950 RICHCROFT DR.
BATON ROUGE, LA 70814

Status

Status: **Active**
Annual Report Status: **In Good Standing**
File Date: 12/16/2005
Last Report Filed: 5/2/2017
Type: Limited Liability Company

Registered Agent(s)

Agent: HOWARD W. SCOGGINS, III
Address 1: 11950 RICHCROFT DR.
City, State, Zip: BATON ROUGE, LA 70814
Appointment Date: 12/16/2005

Officer(s)

Additional Officers: No

Officer: BRAZOS URETHANE, INC.
Title: Member
Address 1: 1031 SIXTH ST.
City, State, Zip: TEXAS CITY, TX 77590

Officer: HOWARD W. SCOGGINS, III
Title: Manager
Address 1: 11950 RICHCROFT DR.
City, State, Zip: BATON ROUGE, LA 70814

Amendments on File

No Amendments on file

Print

CERTIFICATE OF LIABILITY INSURANCE

DATE (MM/DD/YYYY): 5/31/2017

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

PRODUCER
Rust Ewing Watt and Haney, Inc.
7900 Emmett Lowry Expressway
Texas City TX 77591

CONTACT NAME: Gloria Summers CIC
PHONE (A/C, No, Ext): (409) 934-8000 **FAX (A/C, No):** (409) 935-1883
E-MAIL ADDRESS: gloria_summers@rustewing.com

INSURER(S) AFFORDING COVERAGE	NAIC #
INSURER A : National Fire Ins Hartford	20478
INSURER B : Continental Casualty Company	20443
INSURER C : American Cas Co of Reading PA	20427
INSURER D : Columbia Casualty Company	31127
INSURER E :	
INSURER F :	

INSURED
Brazos Industries, LLC
11950 Richcroft Ave
Baton Rouge LA 70814

COVERAGES **CERTIFICATE NUMBER:** 17-18 **REVISION NUMBER:**

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

INSR LTR	TYPE OF INSURANCE	ADDL INSD	SUBR WVD	POLICY NUMBER	POLICY EFF (MM/DD/YYYY)	POLICY EXP (MM/DD/YYYY)	LIMITS	
A	X COMMERCIAL GENERAL LIABILITY CLAIMS-MADE [X] OCCUR			6045935321	5/31/2017	5/31/2018	EACH OCCURRENCE	$ 1,000,000
							DAMAGE TO RENTED PREMISES (Ea occurrence)	$ 100,000
D	X Contractors Pollution			CSP604963	5/31/2017	5/31/2018	MED EXP (Any one person)	$ 10,000
	GEN'L AGGREGATE LIMIT APPLIES PER:						PERSONAL & ADV INJURY	$ 1,000,000
	POLICY [X] PRO-JECT [ ] LOC						GENERAL AGGREGATE	$ 2,000,000
	OTHER:						PRODUCTS - COMP/OP AGG	$ 2,000,000
								$
B	AUTOMOBILE LIABILITY X ANY AUTO ALL OWNED AUTOS [ ] SCHEDULED AUTOS X HIRED AUTOS [X] NON-OWNED AUTOS			BA6045935304	5/31/2017	5/31/2018	COMBINED SINGLE LIMIT (Ea accident)	$ 1,000,000
							BODILY INJURY (Per person)	$
							BODILY INJURY (Per accident)	$
							PROPERTY DAMAGE (Per accident)	$
								$
B	X UMBRELLA LIAB [X] OCCUR EXCESS LIAB [ ] CLAIMS-MADE DED [X] RETENTION $ 10,000			6045935352	5/31/2017	5/31/2018	EACH OCCURRENCE	$ 2,000,000
							AGGREGATE	$ 2,000,000
								$
C	WORKERS COMPENSATION AND EMPLOYERS' LIABILITY ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? Y/N [ ] N/A (Mandatory in NH) If yes, describe under DESCRIPTION OF OPERATIONS below			WC6045935335 WC6045935349-California	5/31/2017 5/31/2017	5/31/2018 5/31/2018	X PER STATUTE [ ] OTH-ER	
							E.L. EACH ACCIDENT	$ 1,000,000
							E.L. DISEASE - EA EMPLOYEE	$ 1,000,000
							E.L. DISEASE - POLICY LIMIT	$ 1,000,000
B	Leased/Rented Equipment			6050123479	5/31/2017	5/31/2018	Any One Item	$250,000
							Max-Any One Occurrence	$500,000

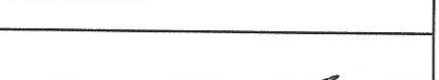
DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)

For Bidding Purposes Only

The General Liability and Auto policies include a blanket automatic additional insured endorsement that provides additional insured status to the certificate holder and the General Liability, Auto and Workers Compensation policies include a blanket automatic waiver of subrogation endorsement that provides waiver of subrogation wording to the certificate holder. These endorsements, to the extent provided in the policy, all apply when there is a written contract between the named insured and the certificate holder that requires such status. The General Liability policy will pay for a covered loss on a primary basis

CERTIFICATE HOLDER
( ) -
Jefferson Parish Purchasing Department
200 Derbigny St.
Gretna, LA 70053

CANCELLATION
SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE
J Blackshear Jr. CIC/ 

COMMENTS/REMARKS

and the Company will not seek contribution from the Certificate Holder for such loss until the Company's primary limits of liability have been exhausted. Umbrella policy follows form.

GreenSil 100

GSP GREEN SHIELD PRODUCTS

SINGLE COMPONENT SOLVENTLESS SILICONE COATING

GSP DOCUMENT NO.: TDS 2017012

TECHNICAL DATA SHEET

DESCRIPTION: Greensil 100 Series are single component elastomeric waterproofing moisture curing silicone coatings. Greensil 100 Series are petroleum-free coatings.

Standard specification for liquid applied silicone coating used in spray polyurethane foam roofing.

USAGE: Greensil 100 is designed as a protective coating for spray-in-place polyurethane foam, metal, concrete, wood, built-up roofing and most single ply's.

COLOR: White, Medium Gray and Tan.

APPLIED PRODUCT DATA

WEATHERABILITY: Excellent durability, color stability and chalk resistance.

CHEMICAL RESISTANCE: Excellent solvent and chemical resistance.

			Greensil 100 Immersed in Water @150°F(66°C) for 1 year per ASTM D-471:
TENSILE:	ASTM D-412		
	Strength:	550 ± 10 psi (3.79 ± .07 MPa)	Strength: 463 psi (3.19MPa)
	Elongation:	150 % ± 10	Elongation: 125%
	Permanent Set At Break:	Approx. 1%	Permanent Set At Break: 0%
TEAR RESISTANCE:	ASTM D-624 DIE C		
	Lb./In.	21 pli (3.8 kg(f)/cm)	11 pli (2.0 kg(f)/cm)
HARDNESS:	ASTM D-2240	55 Shore A	56 Shore A
WATER VAPOR PERMEABILITY:	ASTM E-96	5.3 perms	
	Procedure B at 0.5 mm (20 mils) thickness +/- 10%		
	Minimum permeance requirements is 2.5 U.S. perms		
ADHESION:	Excellent adhesion to polyurethane foam.		
FLAMMABILITY:	ASTM E108 Class A		
REFLECTANCE:	ASTM C-1549 White	0.88	
EMITTANCE:	ASTM C-1371 White	0.87	

Green Shield Products, LLC
4008 Louetta Rd. #464 Spring, TX 77388-4405 (P) 832-957-2925 (F) 832-957-3960
www.greenshieldproducts.com

GreenSil 100

GSP GREEN SHIELD PRODUCTS

SINGLE COMPONENT SOLVENTLESS SILICONE COATING

TECHNICAL DATA SHEET

COVERAGE:	Sq. Ft./Gal./Mil	1524 (37.42 m^2/L/.02mm)
SOLIDS:	Weight: Method 4041 Fed. Std. 141	96.5% ± 1%
	Volume:	95% ± 1%
V.O.C	Volatile organic compounds content is 48 grams per liter.	
FLASH POINT:	ASTM D-56, TCC	Above 179°F (82°C)
STORAGE STABILITY:	One year from date of manufacture when stored in sealed containers below 75°F (24°C).	
CLEANER:	Consult Green Shield Products, LLC for further information.	

APPLICATION

PRIMER:	None normally required.
MIXING:	Mix before application to assure uniform color and consistency.
APPLICATION:	Apply by brush or roller as received. For spray application, use as received. Consult Green Shield Products, LLC for further information.
	For cold weather application, keep material stored above 65°F (18°C). Recoat time is between 4 to 48 hours. Longer recoat times will result in poor intercoat adhesion and delamination.
CLEAN-UP:	Consult Green Shield Products, LLC for further information.
CURE:	Applied coating will cure in 1 to 4 hours depending on temperature and humidity.
CAUTION:	Greensil 100 is considered combustible. Keep away from heat, sparks and open flame. Avoid prolonged breathing of vapors and prolonged or repeated skin contact. Use only with adequate ventilation.

Green Shield Products, LLC
4008 Louetta Rd. #464 Spring, TX 77388-4405 (P) 832-957-2925 (F) 832-957-3960
www.greenshieldproducts.com

SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: Greensil 100
PRODUCT CODE: 100
SYNONYMS:
CAS NUMBER: N/A Mixture
PRODUCT USE: Silicone roof coating

MANUFACTURER
Green Shield Products, LLC
4008 Louetta Rd. #464
Spring, TX 77388-4405
(P)832-957-2925 (F)832-957-3960
www.greenshieldproducts.com

24 HR. EMERGENCY TELEPHONE NUMBER

CHEMTREC® (US Transportation) (800) 424-9300
CHEMTREC® (International Transportation) 1 (202) 483-7616

2. HAZARDS IDENTIFICATION

EMERGENCY OVERVIEW

PHYSICAL APPEARANCE: Viscous liquid
IMMEDIATE CONCERNS: Use as Directed – For Industrial Use Only.

POTENTIAL HEALTH EFFECTS

EYES: May cause eye irritation.
SKIN: May cause skin irritation.
SKIN ABSORPTION: None.
INGESTION: Harmful if swallowed.
INHALATION: N/A
CHRONIC: None.
CARCINOGENICITY: Contains crystalline silica.
MUTAGENICITY: None.

REPRODUCTIVE TOXITY

REPRODUCTIVE EFFECTS: None.
TERATOGENIC EFFECTS: None.
IRRITANCY: None.

CLASSIFICATION:

Carcinogen: Category 1.
Eye irritation: Category 2.

PICTOGRAMS:

SIGNAL WORD: Warning

HAZARD STATEMENTS:
May cause cancer (crystalline silica is a known carcinogen if inhaled).
Causes eye irritation.
Harmful to aquatic life.

PRECAUTIONARY STATEMENTS:
Keep container tightly closed.
Keep away from heat/sparks/open flame. - No smoking.
Wear protective gloves and eye/face protection
Ground/Bond container and receiving equipment.
For Industrial and Institutional Use Only – For outside use only
Store in cool/well-ventilated place
Avoid release to the environment

3. COMPOSITION/INFORMATION ON INGREDIENTS*

Chemical name	CAS #	Weight %
Crystalline Silica**	14808-60-7	30 - 35
Titanium Dioxide**	13463-67-7	5 - 10
Pigment Dispersions (as carbon black**)	1333-86-4	<0.5
Methyl Oximino Silane	22984-54-9	< 7

* The specific chemical identity and exact percentage (concentration) of composition has been withheld as a trade secret in accordance with paragraph (i) of §1910.1200.

** These materials are bound in liquid/paint and are not airborne or in dust form.

** "WARNING: THIS PRODUCT CONTAINS CHEMICALS KNOWN TO THE STATE OF CALIFORNIA TO CAUSE CANCER AND BIRTH DEFECTS OR OTHER REPRODUCTIVE HARM."

4. FIRST AID MEASURES

EYES: Hold eyelids apart and flush eyes with plenty of water for at least 15 minutes. Get medical attention

SKIN: Wash the contaminated area with soap and water. Remove contaminated clothing and wash before reuse. If irritation develops, get medical attention.

INGESTION: If swallowed, DO NOT induce vomiting. Seek immediate medical attention.

INHALATION: Remove person to fresh air. If respiratory irritation, dizziness, nausea, or unconsciousness occurs, seek immediate medical assistance. If breathing has stopped, give artificial respiration.

MOST IMPORTANT SYMPTOMS AND EFFECTS, BOTH ACUTE AND DELAYED
SYMPTOMS: N/A
EFFECTS: N/A

NOTES TO PHYSICIAN: N/A

5. FIRE FIGHTING MEASURES

SUITABLE EXTINGUISHING MEDIA: Foam, extinguishing powder, carbon dioxide, water fog. In case of fire, cool endangered containers with water fog.

FIRE FIGHTING PROCEDURES: As appropriate for surrounding materials/equipment. If electrical equipment is involved, the use of foam should be avoided. Use water spray to cool non-involved containers.

UNUSUAL FIRE AND EXPLOSION HAZARD: N/A

COMBUSTION PRODUCTS: By high heat or fire: Carbon monoxide, Carbon dioxide, Oxides of Nitrogen and Oxides of silicone and various hydrocarbon fragments.

6. ACCIDENTAL RELEASE MEASURES

SMALL SPILL: Remove all sources of ignition. Ventilate area. Absorb spill with absorbent material such as sawdust, vermiculite or sand, and place in a closed container.

LARGE SPILL: In case of large spill, dike the area to prevent this material from entering water systems or sewers. For major spills call CHEMTREC® (800-424-9300).

ENVIRONMENTAL PRECAUTIONS

WATER SPILL: For major spills call CHEMTREC® (800-424-9300).

LAND SPILL: For major spills call CHEMTREC® (800-424-9300).

PERSONAL PRECAUTIONS: Do not eat, drink or smoke while cleaning up. Ensure adequate ventilation.

PROTECTIVE EQUIPMENT: Wear protective clothing, safety glasses and impervious gloves (e.g., neoprene gloves).

EMERGENCY PRECAUTIONS: N/A

METHOD OF CLEANING UP: Absorb on liquid-absorbing material (treated sawdust, diatomaceous earth, sand). Shovel up and dispose of at an appropriate waste disposal facility in accordance with current applicable laws and regulations, and product characteristics at time of disposal

7. HANDLING AND STORAGE

PRECAUTIONS FOR SAFE HANDLING: Avoid contact with eyes. Avoid skin contact and breathing mists/vapors. Use in well-ventilated area away from all ignition sources. Switch off all electrical devices such as parabolic heaters, hotplates, storage heaters etc. in good time for them to have cooled down before commencing work. Do not smoke; do not weld. Do not empty waste into sanitary drains. Take measures to prevent the build up of electrostatic charge.

CONDITIONS FOR SAFE STORAGE, INCLUDING INCOMPATIBILITIES: Storage containers must be grounded and bonded. Store away from all ignition sources in a cool area equipped with an automatic sprinkling system. Ensure adequate ventilation. **Shelf Life 1 Year** when stored (Unopened Containers) at temperatures between +2°C to +30°C (35°F to 85°F) - Store only in the original container.

8. EXPOSURE CONTROLS\PERSONAL PROTECTION

OSHA TABLE COMMENTS:
Crystalline Silica - OSHA - Final PELs - Table Z-3 Mineral Dusts
Titanium dioxide - 15 mg/m3 TWA (total dust) U.S. - OSHA - Final PELs - Time Weighted Averages (TWAs)

EXPOSURE LIMITS: U.S. - OSHA - Final PELs - Table Z-3 Mineral Dusts Quartz (30)/(%SiO2 + 2) mg/m3 TWA, total dust; (250)/(%SiO2 + 5) mppcf TWA, respirable fraction; (10)/(%SiO2 + 2) mg/m3 TWA, respirable fraction. Titanium dioxide - 15 mg/m3 TWA (total dust)

ENGINEERING CONTROLS: Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below TLV(s). General ventilation is recommended. Additional local exhaust ventilation is recommended where vapors, mists, or aerosols may be released.

PERSONAL PROTECTIVE EQUIPMENT

EYES AND FACE: Wear protective eyeglasses or chemical safety goggles, per OSHA eye and face-protection regulations (29 CFR 1910.133). Contact lenses are not eye protection devices. Appropriate eye protection must be worn instead of, or in conjunction with contact lenses.

SKIN: Wear chemical resistant gloves. Wear protective clothing to prevent skin contact. Keep exposed skin area to a minimum. Eye wash station and safety shower should be available.

RESPIRATORY: If exposure can exceed the PEL/TLV, use only NIOSH/MSHA approved air purifying or supplied air respirator operated in a positive pressure mode per the NIOSH/OSHA occupational health guidelines for chemical hazards. If it is possible to generate significant levels of vapors or mists, a NIOSH approved or equivalent respirator is recommended.

WORK HYGIENIC PRACTICES: Use good personal hygiene practices. Wash hands before eating, drinking, smoking, or using toilet facilities. Promptly remove soiled clothing and wash thoroughly before reuse. Shower after work, using plenty of soap and water. Open containers of food and beverages should be kept away from areas where the product is used or stored. Eating, drinking, smoking and application of cosmetics should be prohibited in areas where the product is being used.

OTHER USE PRECAUTIONS: For Industrial Use Only – Use only as directed.

COMMENTS: Avoid sanding or other activities that may produce airborne fibers from finished product.

9. PHYSICAL AND CHEMICAL PROPERTIES

PHYSICAL STATE: Viscous Liquid
COLOR: White, Lt Grey, Dark Grey, or Tan
ODOUR: Slight sweet odor
ODOUR THRESHOLD: N/A
pH: N/A
MELTING POINT: N/A
BOILING POINT: N/A
FLASH POINT AND METHOD: >200°F - (COC) ASTM D-92
EVAPORATION RATE: Slower than ether
FLAMMABILITY (Solid/Gas): N/A
FLAMMABLE LIMITS: N/A
VAPOUR PRESSURE: N/A
VAPOUR DENSITY: Heavier than air
SPECIFIC GRAVITY: Average 1.26 to 1.30
% SOLUBILITY IN WATER: Negligible
OCTANOL/WATER PARTITION COEFFICIENT: N/A
AUTO-IGNITION TEMPERATURE: N/A
DECOMPOSITION TEMPERATURE: N/A
POUR POINT: N/A
MOLECULAR FORMULA:
% VOLATILE: <50 Grams/Liter EPA Method 24
VISCOSITY: N/A
MOLECULAR WEIGHT: N/A

10. STABILITY AND REACTIVITY

STABLE: Stable

HAZARDOUS POLYMERIZATION: Will not occur.

CONDITIONS TO AVOID: Keep away from heat, sparks, or flames.

STABILITY: Stable under normal conditions of use and storage

POLYMERIZATION: Will not occur.

HAZARDOUS DECOMPOSITION PRODUCTS: By high heat or fire: Carbon Monoxide, Carbon dioxide, Oxides of silicone, and various hydrocarbon fragments.

INCOMPATIBLE MATERIALS: Avoid water, strong oxidizing agents, concentrated nitric and sulfuric acids, halogen, and molten sulfur.

POSSIBILITY OF HAZARDOUS REACTIONS: Does not occur.

11. TOXICOLOGICAL INFORMATION

SIGNS AND SYMPTOMS OF OVEREXPOSURE: Dizziness and labored breathing.

ACUTE EFFECTS:

EYE: Exposure to liquid or vapor causes eye irritation. Symptoms may include stinging, tearing, and swelling.

SKIN: Exposure causes skin irritation. Prolonged or repeated exposure may dry the skin. Symptoms may include redness, burning, drying and cracking. Skin absorption is possible, but harmful effects are not expected from this route of exposure under normal conditions of handling and use.

INHALATION: Short-term inhalation toxicity is low. Breathing small amounts during normal handling is not likely to cause harmful effects. Breathing large amounts may be harmful. Symptoms are more likely seen at air concentrations exceeding the recommended exposure limits. Symptoms of exposure may include: Irritation (nose, throat, and respiratory tract), metallic taste in mouth, impaired coordination, confusion, CNS depression (dizziness, drowsiness, weakness, fatigue, nausea, headache, and unconsciousness).

INGESTION: Single dose or oral toxicity is low. Swallowing small amounts during normal handling is not likely to cause harmful effects. Swallowing large amounts may be harmful. Symptoms may include: Gastrointestinal irritation (nausea, vomiting, and diarrhea) and possible liver damage. This material can enter the lungs during swallowing or vomiting and cause lung inflammation and/or damage.

TARGET ORGAN: N/A

CHRONIC EFFECTS: Crystalline Silica: IARC - Group 1 (Carcinogenic to Humans) Silica, quartz Monograph 100C [2012] (listed under Crystalline silica inhaled in the form of quartz or cristobalite from occupational sources); Monograph 68 [1997]

Product evolves methyl ethyl ketoxime (MEKO) when exposed to water or humid air. In animal studies MEKO produced tumors in rats. Provide ventilation during use to control MEKO exposure or use respiratory protection.

ACUTE TOXICITY VALUES: N/A

SYMPTOMS OF RELATED

PHYSICAL: N/A

CHEMICAL: N/A

TOXICOLOGICAL CHARACTERISTICS: N/A

DELAYED AND IMMEDIATE EFFECTS: N/A

12. ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION: The total of the organic components contained in the product is not classified as "readily biodegradable" (OECD-301 A-F).

PERSISTENCE AND DEGRADABILITY: Biodegradation is not applicable to inorganic substances such as crystalline silica, quartz.

BIO-ACCUMULATIVE POTENTIAL: There is no evidence to suggest bioaccumulation will occur.

MOBILITY: N/A

OTHER ADVERSE EFFECTS: N/A

13. DISPOSAL CONSIDERATIONS

WASTE TREATMENT METHODS
DISPOSAL METHOD: Avoid disposal by using the entire product as directed. If discarded in liquid form, this product may be treated as hazardous waste. Unused product may be disposed of as solid waste once cured out and dry. Check with local authorities regarding landfill disposal.

EMPTY CONTAINER: Empty containers should be decontaminated and either passed to an approved drum recycler or crushed and land filled.

14. TRANSPORT INFORMATION

DOT (DEPARTMENT OF TRANSPORTATION)
TECHNICAL NAME: Roof Coating, Not Regulated.

UN NUMBER: N/A

UN PROPER SHIPPING NAME: Not Regulated

TRANSPORT HAZARD CLASS: N/A

PACKING GROUP: N/A

MARINE POLLUTANT: N/A

SPECIAL PRECAUTIONS: N/A

15. REGULATORY INFORMATION

TSCA (Toxic Substances Control Act) Regulations: This material or its components are listed on the TSCA Chemical Substance Inventory and is in compliance with all applicable rules and orders.

SARA: This material does not contain any substances in the list of Toxic Chemicals subject to Section 313 of the Superfund Amendments and Reauthorization Act of 1986 (SARA Title III), in excess of the applicable de minimis concentrations as specified in Section 372.38 (a).

Massachusetts, New Jersey, Pennsylvania right to know Extraordinarily Hazardous Substance Lists:

Reportable Component	CAS No	Weight % (+ 2%)
Crystalline Silica	14808-60-7	31
(as respirable dust only, not while in liquid form)		
Methyl Oximo silane	22984-54-9	< 7

California Proposition 65:
Warning: This product contains chemicals known to the state of California to be Carcinogenic.

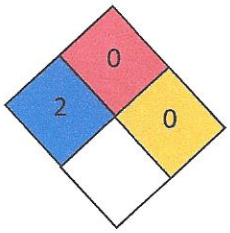
Reportable Component	CAS No	Weight % (+ 2%)
Crystalline Silica	14808-60-7	31
(as respirable dust only, not while in liquid form)		
Pigment Dispersion (as carbon black)	1333-86-4	<0.5%
(as respirable dust only, not while in liquid form)		

16. OTHER INFORMATION

HMIS RATING	
Health :	2
Flammability :	0
Reactivity :	0
Personal Protection :	B

REVISION:	10/2/2015

NFPA CODES



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End of SDS

GreenPrime 100

GSP DOCUMENT NO.: TDS 2017004

TECHNICAL DATA SHEET

PRODUCT INFORMATION

General Properties: This product is designed to perform as an intermediate barrier that provides outstanding adhesion, excellent flexibility and toughness to a variety of substrates.

Recommended Uses: This primer is suitable when a fast-drying, primer is needed. This product may be used on many surfaces for effective protection: BUR, Wood, Metal, Concrete (minimum 30 day cured), Polyurethane Foam, and Masonry.

Product Limitations: Do not apply when it is raining or if the threat of rain exists. Also, do not apply when the dew point is less than 5°F above ambient temperature. Subsequent coats should be applied within 48 hours of prior applications to insure full and uniform adhesion. Do not use on new concrete (less than 30 days)

Shipping Information:

Container Size	Gross Weight	Class
5 Gal	45 lbs.	55
55 Gal.	495 lbs.	55

DOT Shipping Information:
Roof Coating, Not-Regulated

HMIS:

Health	1
Flammability	0
Reactivity	0
Protection	X

Physical Properties:

- **Solids Content By Weight:** 30% (ASTM D-1353)
- **Solids Content By Volume:** 25% (ASTM D-2697)
- **Flash Point:** None to 212°F. (ASTM D-1310).
- **Cure Time:** Dry to touch in 1-2 hours, full cure in 12 hours. Drying time is temperature, humidity, and film thickness dependent.
- **Clean up:** Use water.
- **Maximum Continuous Service Temperature:** 185°F (85°C)
- **Shelf Life:** (UNOPENED CONTAINERS): 6 months when stored between 35°and 75°
- **VOC:** < 50 Grams / Liter
- **Color: Black**

STORAGE CONDITIONS:

This product has a shelf life of 1 year. It will freeze if subjected to temperatures below 32° F.

Ordering Information:

This product is available in
- 5-gallon pails (19 liters)
- 55-gallon drums (209 liters)

Green Shield Products, LLC
4008 Louetta Rd. #464 Spring, TX 77388-4405 (P) 832-957-2925 (F) 832-957-3960
www.greenshieldproducts.com

GreenPrime 100

GREEN SHIELD PRODUCTS

TECHNICAL DATA SHEET

APPLICATION PROCEDURES

Do Not Thin

Surface Preparation: All surfaces to be primed must be clean, dry, and paintable. It may be necessary to power wash to enhance adhesion. See application specification for more details.

Mixing Procedures: Product may separate after shipping and storage, though it may still look mixed. For best results, thoroughly blend contents of all containers using a power mixer for a minimum of 10 minutes prior to use.

Weather Restrictions: It is very important that this product is not used when weather conditions are below 50° F., or when there is a chance that temperatures could fall below 32°F. within a 24 hour period after application. We also do not recommend application of this product if rain or dew is likely to occur before curing of product.

Application Rates: Substrates should be coated until it appears wet. Care should be taken not to flood or over apply primer. Yield is 150 to 300 square feet per gallon, depending on the porosity of the substrate.

Application Equipment: This product may be sprayed, brushed, or rolled. Low-pressure airless spray equipment can be used to apply this material.

Application Procedures: This product may be applied directly to any clean, dry surface. Subsequent coats should be applied within 48 hours of prior applications to insure full and uniform adhesion.

Before applying a subsequent coat, the previous coat must be completely dry and cured. If any contamination of a thoroughly cured surface occurs, it must be washed with a chemical cleaner before applying subsequent coats. Coating must be extended beyond the substrate to create a self-terminating flashing. Consult *Green Shield Products, LLC* for recommended dry film thickness.

Safety Precautions: Installers should use caution during spray processes to avoid falls caused by slipping on wet primer. Installers should read and understand all technical and informational literature on this product, including the Safety Data Sheet, prior to using this product.

GREEN SHIELD PRODUCTS

GSP DOCUMENT NO.: SDS 2017004
REVISION DATE: 5/30/2015

SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

Product Name GreenPrime 100

Chemical Family Water-based Acrylic Coating

Recommended Use or Restrictions Coating for various applications

MANUFACTURER
Green Shield Products, LLC
4008 Louetta Rd. #464
Spring, TX 77388-4405
(P)832-957-2925 (F)832-957-3960
www.greenshieldproducts.com

24 HR. EMERGENCY TELEPHONE NUMBER

CHEMTREC® (US Transportation) (800) 424-9300

CHEMTREC® (International Transportation) 1 (202) 483-7616

2. HAZARDS IDENTIFICATION

GHS Classification

Carcinogenicity: Category 1A

GHS Label Elements

Hazard pictograms:

Signal word: Danger

Hazard statements: May cause cancer

Precautionary statements:

Prevention:
Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood
Wear permeation resistant protective gloves and clothing. Wear eye and face protection.

Response:
IF exposed or concerned: Get medical attention.

Storage:
Store locked up.

Disposal:
Dispose of contents and container in accordance with existing federal, state, and local environmental control laws.

The following percentage of the mixture consists of ingredient(s) with unknown acute toxicity: 28 %

3. COMPOSITION/INFORMATION ON INGREDIENTS*

Hazardous Components

Weight Percent	Components	CAS-No.	Classification
0.1 - 1%	Titanium dioxide (Rutile)	13463-67-7	Carcinogenicity Category 2 Inhalation. Specific target organ toxicity – single exposure Category 3 Respiratory system.
0.1 - 1%	Carbon Black	1333-86-4	Carcinogenicity Category 2 Inhalation. Specific target organ toxicity – single exposure Category 3 Respiratory system.
0.1 - 1%	Benzophenone	119-61-9	Carcinogenicity Category 2 Specific target organ toxicity – repeated exposure Category 2 Liver. Kidney
0.1 - 1%	Crystalline Quartz Silica	14808-60-7	Acute toxicity Category 4 Oral. Carcinogenicity Category 1A. Specific target organ toxicity - repeated exposure Category 1 Lungs.
0.1 - 1%	Titanium dioxide (rutile)	1317-80-2	Specific target organ toxicity – single exposure Category 3 Respiratory system. Carcinogenicity Category 3 Inhalation.

The specific chemical identity and/or exact percentage of component(s) have been withheld as a trade secret.

4. FIRST AID MEASURES

Most Important Symptom(s)/Effect(s)

Acute: Not expected to cause adverse acute health effects.

Eye Contact

In case of contact, flush eyes with plenty of lukewarm water. Get medical attention if irritation develops.

Skin Contact

In case of skin contact, wash affected areas with soap and water. Immediately remove contaminated clothing and shoes. Get medical attention if irritation develops and persists.

Inhalation

If inhaled, remove to fresh air. Get medical attention if irritation develops.

Ingestion

If ingested, do not induce vomiting unless directed to do so by medical personnel. Get medical attention.

5. FIRE FIGHTING MEASURES

Suitable Extinguishing Media: All extinguishing media are suitable.

Unsuitable Extinguishing Media No Data Available

Fire Fighting Procedure

Firefighters should be equipped with self-contained breathing apparatus to protect against potentially toxic and irritating fumes. Use cold water spray to cool fire-exposed containers to minimize the risk of rupture.

Hazardous Decomposition Products
By Thermal Decomposition: carbon monoxide, carbon dioxide, Acrylic monomers, other potentially toxic fumes

Unusual Fire/Explosion Hazards
Toxic and irritating gases/fumes may be given off during burning or thermal decomposition.

6. ACCIDENTAL RELEASE MEASURES

Spill and Leak Procedures
Cleanup personnel must use appropriate personal protective equipment. Cover spill with inert material (e. g., dry sand or earth) and collect for proper disposal.

7. HANDLING AND STORAGE

Handling/Storage Precautions
Avoid breathing dust, vapor, or mist. Avoid contact with skin or clothing. Avoid contact with eyes. Use only with adequate ventilation/personal protection. Wash thoroughly after handling. Keep container closed when not in use. Protect from freezing.

Storage Period:
12 Months

Storage Temperature

Minimum:	1 °C (33.8 °F)
Maximum:	49 °C (120.2 °F)

Storage Conditions
None known

Substances to Avoid
None known

8. EXPOSURE CONTROLS\PERSONAL PROTECTION

Titanium dioxide (Rutile) (13463-67-7)

US. ACGIH Threshold Limit Values
Time Weighted Average (TWA): 10 mg/m3

US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)
Permissible exposure limit: 15 mg/m3 (Total dust.)

US. ACGIH Threshold Limit Values
Hazard Designation: Group A4 Not classifiable as a human carcinogen.

Carbon Black (1333-86-4)

US. ACGIH Threshold Limit Values
Time Weighted Average (TWA): 3.5 mg/m3

US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)
Permissible exposure limit: 3.5 mg/m3

US. ACGIH Threshold Limit Values
Time Weighted Average (TWA): 3 mg/m3 (Inhalable fraction)

US. ACGIH Threshold Limit Values
Hazard Designation: Group A4 Not classifiable as a human carcinogen

US. ACGIH Threshold Limit Values
Hazard Designation: Group A3 Confirmed animal carcinogen with unknown relevance

Titanium dioxide (rutile) (1317-80-2)

US. ACGIH Threshold Limit Values
Time Weighted Average (TWA): 10 mg/m3

US. OSHA Table Z-1 Limits for Air Contaminants (29 CFR 1910.1000)
Permissible exposure limit: 15 mg/m3 (Total dust.)

US. ACGIH Threshold Limit Values
Hazard Designation: Group A4 Not classifiable as a human carcinogen

Crystalline Quartz Silica (14808-60-7)

US. ACGIH Threshold Limit Values
Time Weighted Average (TWA): 0.025 mg/m3 (Respirable fraction.)

US. OSHA Table Z-3 (29 CFR 1910.1000)
Time Weighted Average (TWA): 2.4 millions of particles per cubic foot of air (Respirable.)The exposure limit is calculated from the equation, 250/(%SiO2+5), using a value of 100% SiO2. Lower percentages of SiO2 will yield higher exposure limits.

US. OSHA Table Z-3 (29 CFR 1910.1000)
Time Weighted Average (TWA): 0.1 mg/m3 (Respirable.)The exposure limit is calculated from the equation, 10/(%SiO2+2), using a value of 100% SiO2. Lower percentages of SiO2 will yield higher exposure limits.

US. OSHA Table Z-3 (29 CFR 1910.1000)
Time Weighted Average (TWA): 0.3 mg/m3 (Total dust.)The exposure limit is calculated from the equation, 30/(%SiO2+2), using a value of 100% SiO2. Lower values of % SiO2 will give higher exposure limits.

US. ACGIH Threshold Limit Values
Hazard Designation: Group A2 Suspected human carcinogen.

Any component which is listed in section 3 and is not listed in this section does not have a known ACGIH TLV, OSHA PEL or supplier recommended occupational exposure limit.

Industrial Hygiene/Ventilation Measures

When handling this product, ventilation of the work area is recommended

Respiratory Protection

In case of mist, spray or aerosol exposure wear suitable personal respiratory protection and protective suit.

Hand Protection

Permeation resistant gloves Neoprene gloves.

Eye Protection

Chemical safety goggles or safety glasses with side-shields.

Skin Protection

Wear as appropriate, disposable one-piece overall with integral hood, impervious protective clothing.

Additional Protective Measures
Employees should wash their hands and face before eating, drinking, or using tobacco products. Educate and train employees in the safe use and handling of this product. Emergency showers and eye wash stations should be available.

9. PHYSICAL AND CHEMICAL PROPERTIES

State of Matter:	liquid
Color:	Black
Odor:	Mild, Amine
Odor Threshold:	No Data Available
pH:	No Data Available
Freezing Point:	Approximately 0 °C (32 °F) similar to water
Boiling Point:	Approximately 100 °C (212 °F) similar to water
Flash Point:	Not applicable (water based product), however, solid material will support combustion if water has been evaporated.
Evaporation Rate:	No Data Available
Lower Explosion Limit:	No Data Available
Upper Explosion Limit:	No Data Available
Vapor Pressure:	17 mmHg @ 20 °C (68 °F) similar to water
Vapor Density:	No Data Available
Density:	No Data Available
Relative Vapor Density:	No Data Available
Specific Gravity:	1.5
Solubility in Water:	No Data Available
Partition Coefficient: n-octanol/water:	No Data Available
Auto-ignition Temperature:	No Data Available
Decomposition Temperature:	No Data Available
Dynamic Viscosity:	No Data Available
Kinematic Viscosity:	No Data Available
Bulk Density:	

10. STABILITY AND REACTIVITY

Hazardous Reactions
Hazardous polymerization does not occur.

Stability
Stable

Materials to Avoid
None known.

Hazardous Decomposition Products
By Thermal Decomposition: carbon monoxide, carbon dioxide, Acrylic monomers, other potentially toxic fumes

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Skin Contact
Eye Contact
Inhalation

Health Effects and Symptoms
Acute: Not expected to cause adverse acute health effects.
Chronic: May cause cancer.

Toxicity Data for GreenPrime 100

No data available for this product.

Toxicity Data for Titanium dioxide (Rutile)
Acute Oral Toxicity
LD50: > 5000 mg/kg (rat, female) (OECD Test Guideline 425)

Acute Inhalation Toxicity
LC50: > 6.82 mg/l, 4 h (rat, male)

Acute Dermal Toxicity
LD50: > 10000 mg/kg (rabbit)

Skin Irritation
rabbit, OECD Test Guideline 404, Exposure Time: 24 h, Non-irritating

Eye Irritation
rabbit, OECD Test Guideline 405, Non-irritating

Sensitization
dermal: non-sensitizer (Guinea pig, Maximization Test)

dermal: non-sensitizer (Human, Patch Test)

Skin sensitization (local lymph node assay (LLNA)):: negative (mouse, OECD Test Guideline 429)

Repeated Dose Toxicity
28 Days, inhalation: NOAEL: 35 mg/m3, (Rat)

29 days, Oral: NOAEL: 24,000 mg/kg, (rat, male, daily)

up to 2 years, inhalation: NOAEL: 0.01 mg/l, (Rat, male/female, 6 hrs/day 5 days/week)

Mutagenicity
Genetic Toxicity in Vitro:
Ames: negative (Salmonella typhimurium, Metabolic Activation: with/without)
Mammalian cell - gene mutation assay: negative (Mouse lymphoma cells (L5178Y/TK), Metabolic Activation: with/without)
Chromosome aberration test: negative (Chinese hamster ovary (CHO) cells, Metabolic Activation: with/without)

Genetic Toxicity in Vivo:
Drosophila SLRL test: negative (Drosophila melanogaster) negative

Cytogenetic assay: negative (mouse, male, intraperitoneal) negative

Carcinigenicity
Rat, Male/Female, inhalation, According to IARC, several rat inhalation and intratracheal installation studies using titanium dioxide have shown increases in benign and malignant lung tumors. Reviewed human exposure data did not suggest an association between occupational exposure to titanium dioxide and risk for cancer. Additionally, the IARC working group determined that, "No significant exposure to titanium dioxide is thought to occur during the use of products in which titanium dioxide is bound to other material, suchr as in paints."

Other Relevant Toxicity Information
May cause irritation of respiratory tract.

Toxicity Data for Carbon Black

Acute Oral Toxicity
LD50: > 8000 mg/kg (rat, male/female) (OECD Test Guideline 401)

Acute Dermal Toxicity
LD50: > 3000 mg/kg (rabbit)

Skin Irritation
rabbit, Non-irritating

Eye Irritation
Human, non-irritant

Sensitization
Buehler Test: negative (guinea pig, OECD Test Guideline 406)
Skin sensitization (local lymph node assay (LLNA)):: negative (mouse, OECD Test Guideline 429)

Repeated Dose Toxicity
13 weeks, Inhalative: NOAEL: 0.0011 mg/kg, (rat,)

Mutagenicity
Genetic Toxicity in Vitro:
Salmonella/microsome test (Ames test): negative Mammalian cell - gene mutation assay: positive (other mammalian cell line, Metabolic Activation: without) Micronucleus test: positive (other human cell line, Metabolic Activation: without)

Genetic Toxicity in Vivo:
Other assay: negative (mouse, male, intraperitoneal) negative

Carcinogenicity
Several inhalation studies involving carbon black in female rats have shown increases in benign and malignant lung tumors. Although a large body of data on possible mechanisms of carcinogenicity in rats was considered by the IARC Working Group, it was not possible to state with confidence that the mechanisms of carcinogenicity in rats correlate to exposure in humans. Tumors have not been observed in other animal species (i.e., mouse and hamster) under similar circumstances and study conditions.

Developmental Toxicity/Teratogenicity
rat, female, Inhalative, 10 days, daily,

Other Relevant Toxicity Information
May cause irritation of respiratory tract.

Toxicity Data for Benzphenone

Acute Oral Toxicity
LD50: 2895 mg/kg (mouse) (OECD Guideline 401)

Acute Dermal Toxicity
LC50: 3535 mg/kg (rabbit)

Skin Irritation
Rabbit, OECD Test Guideline 404, Non-irritating

Sensitization
Non-sensitizer: (guinea pig)
Magnusson/Kligmann (Maximization Test); non-sensitizer (Guimea pig)

Repeated Dose Toxicity
90d, oral: NOAEL: 20 mg/kg, LOAEL: 100 mg/kg, (rate male/female, daily)
14 weeks, oral: (rat, male/female)

Mutagenicity
Genetic Toxicity in Vitro:
Ames: negative (Salmonella typhimurium, Metabolic Activation: with/without)
Mammalian cell - gene mutation assay: negative (Mouse lymphoma cells (L5178Y/TK), Metabolic Activation: with/without)

Genetic Toxicity in Vivo:
Micronucleus Assay: negative (mouse, male, intraperitoneal)
negative

Carcinogenicity
mouse, female, dermal, life span, No carcinogenic effects observed at the doses tested.

Toxicity to Reproduction/Fertility
Two-generation study, Oral, (rat, male/female) NOAEL (parental): 100 ppm, NOAEL (F1): 450 ppm, NOAEL (F2): 450 ppm

Developmental Toxicity/Teratogenicity
rat, female, Oral, GD 6-19, daily, NOAEL (maternal): < 100 mg/kg,

Toxicity Data for Crystalline Quartz Silica
Acute Oral Toxicity
LD50: 500 mg/kg (rat)

Mutagenicity
Genetic Toxicity in Vitro:
Ames: Negative results were reported in various in vitro studies. (Salmonella typhimurium, Metabolic Activation: with/without)

Genetic Toxicity in Vivo:
Sister Chromatid Exchange: ambiguous (hamster) ambiguous

Carcinogenicity
rat, Male/Female, inhalation, 2 years, 6 hrs/day 5 days/week, positive

Toxicity Data for Titanium dioxide (rutile)
Acute Oral Toxicity
LD50: > 10000 mg/kg (rat)

Acute Inhalation Toxicity
LC50: > 6.8 mg/l, 4 h (rat)

Skin Irritation
rabbit, Non-irritating

Eye Irritation
rabbit, Non-irritating

Sensitization
Skin sensitization (local lymph node assay (LLNA)):: negative (mouse, OECD Test Guideline 429)

Repeated Dose Toxicity
29 days, Oral: NOAEL: 24,000 mg/kg, (rat, male, daily) up to 2 years, Inhalation: NOAEL: 0.01 mg/l, (rat, male/female, 6 hrs/day 5 days/week)

Mutagenicity
Genetic Toxicity in Vitro:
Other assay: negative, Negative results were reported in various in vitro studies. (Bacillus subtilis) Mammalian cell - gene mutation assay: negative, Negative results were reported in various in vitro studies. (Mouse lymphoma cells (L5178Y/TK), Metabolic Activation: with/without) Chromosome aberration test: negative, Negative results were reported in various in vitro studies. (Chinese hamster ovary (CHO) cells, Metabolic Activation: with/without)

Genetic Toxicity in Vivo: Cytogenetic assay: negative (mouse, male, intraperitoneal) negative

Carcinogenicity
Rat, Male/Female, inhalation, According to IARC, several rat inhalation and intratracheal installation studies using titanium dioxide have shown increases in benign and malignant lung tumors. Reviewed human exposure data did not suggest an association between occupational exposure to titanium dioxide and risk for cancer. Additionally, the IARC working group determined that, "No significant exposure to titanium dioxide is thought to occur during the use of products in which titanium dioxide is bound to other material, such as in paints." Animal experiments showed a statistically significant number of tumors. Rat, male/female, oral, 103 weeks, daily, No carcinogenic effects observed at the doses tested. Mouse, Male/Female, oral, 103 days, daily, No carcinogenic effects observed at the doses tested.

Toxicity to Reproduction/Fertility
Three generation study, oral, (Rat) NOAEL (parental): 5 mg/L (as Titanium), Reproductive effects have been observed in animal studies.

Other Relevant Toxicity Information
May cause irritation of respiratory tract.

Carcinogenicity:

Titanium dioxide (rutile)	IARC - Overall evaluation: 2B Possibly carcinogenic to humans.
Titanium dioxide (Rutile)	IARC - Overall evaluation: 2B Possibly carcinogenic to humans.
Carbon Black	IARC - Overall evaluation: 2B Possibly carcinogenic to humans.
Benzophenone	IARC - Overall evaluation: 2B Possibly carcinogenic to humans.
Crystalline Quartz Silica	NTP - Hazard Designation: Known To Be Human Carcinogen. IARC - Overall evaluation: 1 Carcinogenic to humans.

12. ECOLOGICAL INFORMATION

No data available for this product.

Ecological Data for Titanium dioxide (Rutile)
Acute and Prolonged Toxicity to Fish
LC0: > 1,000 mg/l (Golden orfe (Leuciscus idus), 48 h)

Acute Toxicity to Aquatic Invertebrates
EC0: > 3 mg/l (Water flea (Daphnia magna))

Toxicity to Microorganisms
EC0: > 10,000 mg/l, (Pseudomonas fluorescens, 24 h)

Ecological Data for Carbon Black
Acute and Prolonged Toxicity to Fish
LC0: > 1,000 mg/l (Danio rerio (zebra fish), 96 h)

Acute Toxicity to Aquatic Invertebrates
EC50: > 5,600 mg/l (Water flea (Daphnia magna), 24 h)

Toxicity to Microorganisms
EC0: 100 - 800 mg/l, (Activated sludge microorganisms, 3 h)

Ecological Data for Benzophenone
Biodegradation
aerobic, 0 %,
0 %, Exposure time: 28 d, i.e. not readily degradable

Bioaccumulation
Does not bioaccumulate.

Acute and Prolonged Toxicity to Fish
LC50: 15.3 mg/l (Fathead minnow (Pimephales promelas), 96 h)

Ecological Data for Titanium dioxide (rutile)
Additional Ecotoxicological Remarks
No data available for this component.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Method
Waste disposal should be in accordance with existing federal, state and local environmental control laws.

Container Precautions
Recondition or dispose of empty container in accordance with governmental regulations. Do not reuse empty container without proper cleaning.

14. TRANSPORT INFORMATION

Land transport (DOT)
Non-Regulated

Sea transport (IMDG)
Non-Regulated

Air transport (ICAO/IATA)
Non-Regulated

15. REGULATORY INFORMATION

United States Federal Regulations
US. Toxic Substances Control Act: Listed on the TSCA Inventory.

US. EPA CERCLA Hazardous Substances (40 CFR 302) Components:
None

SARA Section 311/312 Hazard Categories:
Chronic Health Hazard

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 302 Extremely Hazardous Substance (40 CFR 355, Appendix A) Components:
None

US. EPA Emergency Planning and Community Right-To-Know Act (EPCRA) SARA Title III Section 313 Toxic Chemicals (40 CFR 372.65) - Supplier Notification Required Components:
1,3-Benzenedicarbonitrile, 2,4,5,6-tetrachloro-

US. EPA Resource Conservation and Recovery Act (RCRA) Composite List of Hazardous Wastes and Appendix VIII Hazardous Constituents (40 CFR 261):
Under RCRA, it is the responsibility of the person who generates a solid waste, as defined in 40 CFR 261.2, to determine if that waste is a hazardous waste.

State Right-To-Know Information
The following chemicals are specifically listed by individual states; other product specific health and safety data in other sections of the SDS may also be applicable for state requirements. For details on your regulatory requirements you should contact the appropriate agency in your state.

Massachusetts, New Jersey or Pennsylvania Right to Know Substance Lists:

Weight percent	Components	CAS-No.
>=1%	Water	7732-18-5
>=1%	Acrylic Polymer	
25 - 35%	Limestone	1317-65-3
0.1 - 1%	Titanium dioxide (rutile)	1317-80-2
5 – 10%	Titanium dioxide (Rutile)	13463-67-7
0.1 - 1%	Carbon Black	1333-86-4
0.1 - 1%	Benzophenone	119-61-9
0.1 - 1%	Crystalline Quartz Silica	14808-60-7

New Jersey Environmental Hazardous Substances List and/or New Jersey RTK Special Hazardous Substances Lists:

Weight percent	Components	CAS-No.
0.1 - 1%	Carbon Black	1333-86-4
0.1 - 1%	Crystalline Quartz Silica	14808-60-7

Massachusetts Right to Know Extraordinarily Hazardous Substance List:

Weight percent	Components	CAS-No.
0.1 - 1%	Crystalline Quartz Silica	14808-60-7

California Prop. 65:
Warning! This product contains chemical(s) known to the State of California to be Carcinogenic. Developmental toxin. Female reproductive toxin. Male reproductive toxin.

Weight percent	Components	CAS-No.
0.1 - 1%	Titanium dioxide (rutile)	1317-80-2
0.1 - 1%	Titanium dioxide (Rutile)	13463-67-7
0.1 - 1%	Carbon Black	1333-86-4
0.1 - 1%	Benzophenone	119-61-9
0.1 - 1%	Crystalline Quartz Silica	14808-60-7

Based on information provided by our suppliers, this product is considered "DRC Conflict Free" as defined by the SEC Conflict Minerals Final Rule (Release No. 34-67716; File No. S7-40-10; Date: 2012-08-22).

16. OTHER INFORMATION

The method of hazard communication for Green Shield Products, LLC is comprised of Product Labels and Safety Data Sheets.

Contact:	Green Shield Products, LLC
Telephone:	(832)957-2925
Version Date:	05/30/2015
SDS Version:	1

This information is furnished without warranty, express or implied. This information is believed to be accurate to the best knowledge of Green Shield Products, LLC. The information in this SDS relates only to the specific material designated herein. Green Shield Products, LLC assumes no legal responsibility for use of or reliance upon the information in this SDS.

GreenFabric (4, 6, 12, 40)

For Professional Use Only

GSP GREEN SHIELD PRODUCTS

GSP DOCUMENT NO.: TDS 2017038

TECHNICAL DATA SHEET

PRODUCT INFORMATION

Green Fabric is stitch-bonded polyester for use with the ***Green Shield Products, LLC*** roofing and waterproofing systems.

RECOMMENDED USES

- GreenFabric is used to increase tensile and add
- strength to moving joints and flashings.
  - Set polyester liner in wet material leaving no wrinkles.
- GreenFabic can be used with all Green Shield Products, LLC coating systems.

PRODUCT CHARACTERISTICS

PROPERTY	TEST METHOD ASTM	RESULT
Tensile	D-5034	WARP 74lbs WEFT 45lbs
Elongation	D-5034	WARP 21.3% WEFT 51.3%
Ball Burst	D-3787	111lbs
Trapezoid	D-117	WARP 13.5lbs WEFT 24.2lbs

* These averages are the typical averaged results of random tests conducted on this fabric by an independent testing laboratory.

FABRIC SPECIFICATIONS

Construction	Stitch-bond
Fiber Content	100% Polyester
Yarn	100% Polyester
Thickness	.018"
Weight	3 oz./sq. yd. ± 10%
Width	Variable / Per Customer Request

APPLICATION INFORMATION

APPLICATION CONDITIONS

Temperature

Air & Surface: N/A

GENERAL INFORMATION

- Not for "Hot Mop" applications.
- Apply base coat of desired ***GreenFabric*** material onto substrate at approximately 1.5 gallons per 100 sq.ft.
- Apply saturation layer over polyester at 1.5 gallons per 100 sq.ft.
- Back-brush to remove wrinkles and trapped air.

ORDERING INFORMATION

Packaging:

Roll Size	Weight	Class
40" x 324'	22 lbs.	65
18" x 300'	10 lbs.	65
12" x 300'	8 lbs.	65
9" x 300'	6 lbs.	65
6" x 300'	5 lbs.	65
4" x 300'	4 lbs.	65

D.O.T. Shipping Information: Polyester Fabric, Not Regulated

Safety Precautions: This product may be applied with coating which contain flammable solvents, and is designed for professional installation. Caution should be exercised to prevent mishap due to improper handling. The use of an appropriate MESA/NIOSH approved respirator during application is important. We also recommend the use of fabric coveralls and neoprene or other resistant gloves. Installers should use caution during spray processes to avoid falls caused by slipping on wet primer. Installers should read and understand all technical and informational literature on this product, including the Safety Data Sheet, prior to using this product.

HMIS® Rating:
Health 1, Flammability 0, Reactivity 0, Protection X
0= Minimal 1=Slight 2=Moderate 3=Serious 4=Severe

GreenCoat FS

GSP GREEN SHIELD PRODUCTS

TECHNICAL DATA SHEET

Wet-out of GreenFabric

It is extremely important to fully saturate the GreenFabric liner from seam to seam and edge to edge. Any exposed GreenFabric that does not receive sufficient coating will not form a watertight membrane and will wick moisture and not cure out. If the applicator is unable to completely wet out the GreenFabric he must then apply an additional coat to seal the surface.

If the GreenFabric is not thoroughly wet out, and cured, and does wick in some moisture it is very unlikely that it will dry out underneath the membrane. It will feel dry to the touch on the surface but there will be moisture trapped underneath and cause problems with the topcoat.

Additional Application Tips

- Each lap rolled out must be wet out as it is applied. You cannot roll out 2 or 3 sections of GreenFabric and then attempt to apply the coating. It will not adequately wet out all of the fabric especially in the lapped seams.
- All wrinkles / fish mouths must be smoothed out during application.
- The substrate must be clean, dry and smooth as is possible.
- All debris under the membrane must be removed to avoid tenting.
- If this is a water-based base coat there must be sufficient drying time before dew forms or rainfall is expected. Do not apply when the dew point is less than 5°F above ambient temperature. Do not apply at temperatures below 40°F.
- All coatings must be uniformly mixed before use.

Green Shield Products, LLC
4008 Louetta Rd. #464 Spring, TX 77388-4405 (P) 832-957-2925 (F) 832-957-3960
www.greenshieldproducts.com

GSP GREEN SHIELD PRODUCTS

GSP DOCUMENT NO.: SDS 2017038

REVISION DATE: 12/9/2008

SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: GreenFabric 4

HMIS CODES:

H	F	R	P
1	1	0	X

D.O.T. Shipping Information: Polyester Fabric, Not Regulated

MANUFACTURER
Green Shield Products, LLC
4008 Louetta Rd. #464
Spring, TX 77388-4405
(P)832-957-2925 (F)832-957-3960
www.greenshieldproducts.com

24 HR. EMERGENCY TELEPHONE NUMBER

CHEMTREC® (US Transportation) (800) 424-9300

CHEMTREC® (International Transportation) 1 (202) 483-7616

2. COMPOSITION/INFORMATION ON INGREDIENTS*

INFORMATION Components – Chemical Name & Common Names
(Hazardous Components 1% or greater: Carcinogens 0.1% or greater)

CHEMICAL NAME (COMMON NAME)	CAS #	Vapor Pressure Mm Hg @ TEMP	WEIGHT PERCENT +/- 2%
NONE KNOWN			

3. PHYSICAL AND CHEMICAL PROPERTIES

1) BOILING POINT: N/A
2) SPECIFIC GRAVITY: N/A
3) VAPOR DENSITY: N/A
4) MELTING POINT: 250°C
5) VAPOR DENSITY: N/A
6) EVAPORATION RATE: N/A
7) VOC % by WTI N/A
8) SOLUBILITY IN WATER: Insoluble
9) WATER REACTIVE: N/A
10) APPEARANCE & COLOR: White fabric

4. FIRE FIGHTING MEASURES

1) FLASH POINT & METHOD: N/A
2) FLAMMABILITY LIMITS IN AIR % BY VOLUME: N/A
3) EXTINGUISHER (MEDIA): Water & Foam (all types), CO_2, Dry Chemical
4) SPECIAL FIRE FIGHTING PROCEDURES: None
5) UNUSUAL FIRE AND EXPLOSION HAZARDS: None - Do not expose to open flame, fabric will melt and may burn.

5. STABILITY AND REACTIVITY

1) STABILITY: Stable.
2) CONDITIONS TO AVOID: None known.
3) INCOMPATIBILITY: None known.
4) HAZARDOUS DECOMPOSITION PRODUCTS: Oxides of carbon, oxides of nitrogen, cyanide gas, acrylic monomers.
5) HAZARDOUS POLYMERIZATION: May occur. See "Condition to avoid."

1) INHALATION HEALTH RISKS AND SYMPTOMS OF EXPOSURE:
   a. N/A
2) SKIN AND EYE CONTACT HEALTH RISKS AND SYMPTOMS OF EXPOSURE
   a. N/A

3) SKIN ABSORPTION HEALTH RISKS AND SYMPTOMS OF EXPOSURE
   a. N/A
4) INGESTION HEALTH RISKS AND SYMPTOMS OF EXPOSURE
   a. N/A
5) HEALTH HAZARDS (ACUTE AND CHRONIC)
   a. No severe or acute health hazards are known to be associated with the use of this product.
6) CARCINOGENICITY
   a. NTP CARCINOGEN: NO
   b. IRAC MONOGRAPHS: NO
   c. OSHA REGULATED: NO
7) MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE:
   a. N/A
8) EMERGENCY FIRST AID PROCEDURES:
   a. N/A

6. HANDLING AND STORAGE

1) STEPS TO BE TAKEN IF MATERIAL IS SPILLED OR RELEASED:
   a. Consult Local & Federal Regulations
2) WASTE DISPOSAL METHODS:
   a. According to Local & Federal Regulations.
3) PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE:
   a. N/A
4) OTHER PRECAUTIONS:
   a. None

7. EXPOSURE CONTROLS\PERSONAL PROTECTION

1) RESPIRATORY PROTECTION (Specify type):
   a. N/A
2) PROTECTIVE GLOVES: N/A
3) EYE PROTECTION: N/A
4) VENTILATION TO BE USED:
   a. N/A
5) OTHER PROTECTIVE CLOTHING OR EQUIPMENT (Specify):
   a. N/A
6) WORK/HYGIENIC PRACTICES:
   a. N/A

8. OTHER INFORMATION

The information in this SDS was obtained from sources which we believe are reliable. HOWEVER, THE INFORMATION IS PROVIDED WITHOUT ANY WARRANTY, EXPRESSED, OR IMPLIED, REGARDING ITS CORRECTNESS.
The conditions or methods of handling, storage, use and disposal of the product are beyond our control, and may be beyond our knowledge. FOR THIS AND OTHER REASONS, WE DO NOT ASSUME RESPONSIBILITY AND EXPRESSLY DISCLAIM LIABILITY FOR LOSS, DAMAGE, OR EXPENSE ARISING OUT OF OR IN ANY WAY CONNECTED WITH THE HANDLING, STORAGE, USE, OR DISPOSAL OF THE PRODUCT.
This SDS was prepared and is to be used only for this product. If the product is used as a component in another product, this SDS information may not be applicable.

For Your Protection: Green Shield Products, LLC. warrants only that its products meet the specifications stated in the sales contract. Typical properties, where stated, are to be considered as representative of current production and should not be treated as specifications. While all the information presented in this document is believed to be reliable and to represent the best available data on these products, NO GUARANTY, WARRANTY, OR REPRESENTATION IS MADE, INTENDED, OR IMPLIED AS TO THE CORRECTNESS OR SUFFICIENCY OF ANY INFORMATION, OR AS TO THE MERCHANTABILITY OR SUITABILITY OR FITNESS OF ANY CHEMICAL COMPOUNDS OR OTHER PRODUCTS OR THE USE THEREOF ARE NOT SUBJECT TO A CLAIM BY A THIRD PARTY FOR INFRINGEMENT OF ANY PATENT OR OTHER INTELLECTUAL PROPERTY RIGHT. THE USER SHOULD CONDUCT SUFFICIENT INVESTIGATION TO ESTABLISH THE SUITABILITY OF ANY PRODUCT FOR ITS INTENDED USE. Liability of Green Shield Products, LLC.. for all claims, whether arising out of breach of warranty, negligence, strict liability, or otherwise, is limited to the purchase price of the material. Products may be toxic and require special precautions in handling. For all products listed, the user should obtain detailed information on toxicity, together with proper shipping, handling, and storage procedures, and comply with all applicable safety and environmental standards. Toxicity and risk characteristics of chemical compounds and other products may differ when used with other materials or in a manufacturing or other process. Those risk characteristics should be determined by the user and made known to handlers, processors, and end users.

End of Data Sheet

GreenFibers

For Professional Use Only

GSP DOCUMENT NO.: TDS 2017036

TECHNICAL DATA SHEET

PRODUCT INFORMATION

GreenFibers is a micro-fine manufactured high-tensile polyethylene fiber used as a general thickener to increase tensile strength and reduce sag for **Green Shield Products, LLC** silicone, urethane and acrylic coatings.

RECOMMENDED USES

- GreenFibers can be used to thicken silicone, urethane and acrylic coatings into spray or brushable mastics. Thicker materials allow for fabrication of cants and filling around irregular surfaces.
- GreenFibers can be used with all Green Shield Products, LLC coating systems.
- Excellent for flashing details, metal roof seams, inside and outside flashing details, round stacks, pipe legs, pitch pots, conduit pipes, expansion joints, etc.

PERFORMANCE CHARACTERISTICS

- GreenFibers allows you to greatly increase viscosity and filling ability of the coating at an economical price. Allows a higher viscosity and excellent vertical hold for a variety of applications.
- The unique nature of GreenFibers fiber configuration allows excellent melding to silicone, urethane and acrylics without allowing slipping. Adding GreenFibers also creates a smooth easy-to-apply material.
- Retains elastic properties; increases tensile strength.
- Improves bridging strength.
- Fiber will not decompose.
- Easily mixed in with hand tools at a ratio of 20% - 50% by volume.

PRODUCT CHARACTERISTICS

Melting Point:	248°F - 271°F (120°C -
Specific Gravity:	133°C) .0915 - .0965
Flash Point: PH:	665°F (352°C)
Appearance:	1.5 - 7.0
Color:	Fluffy fiber
Shelf Life:	White
Storage:	Indefinite
Shelf Life:	Keep material dry
Cleanup:	Indefinite
	Sweep or vacuum

ORDERING INFORMATION

Packaging: Plastic 5 Gal Pail - 6 lbs. Gross Wt.

Container Size	Class
5 gal. (18.9 Liter) Pail	125

D.O.T. Shipping Information: Polyethylene Micro Fiber, Not Regulated

HMIS® Rating:
Health 0, Flammability 1, Reactivity 0, Protection X
0= Minimal 1=Slight 2=Moderate 3=Serious 4=Severe

Green Shield Products, LLC
4008 Louetta Rd. #464 Spring, TX 77388-4405 (P) 832-957-2925 (F) 832-957-3960
www.greenshieldproducts.com

GreenFibers

GREEN SHIELD PRODUCTS

TECHNICAL DATA SHEET

APPLICATION CONDITIONS Temperature

Air & Surface: N/A

APPLICATION PROCEDURES

GENERAL INFORMATION

As Filler:

Add GreenFibers 20% to 50% by volume to all Green Shield Products, LLC coating systems.

- Easily mixed in with hand tools at a ratio of 20%-50%.
- **Addition of GreenFibers to silicone or urethane *will shorten* pot life.**
  - Do not add more than one hour in advance.
  - Do not mix more than you will use during one working period.

SAFETY PRECAUTIONS

- **Read and Understand SDS before using.**
- **EYE PROTECTION:** Goggles for dust
- **GLOVES:** Not needed
- **RESPIRATORY:** Dust mask if dust is present
- **SPECIAL CLOTHING/EQUIPMENT:** None

FIRST AID

- **EYES:** Irrigate immediately for five minutes
- **SKIN:** Wash off with flowing water
- **INHALATION:** Remove to fresh air
- **INGESTION:** No treatment required (nontoxic)

WARNING This product may be mixed with coating which contain flammable solvents, and is designed for professional installation. Caution should be exercised to prevent mishap due to improper handling. The use of an appropriate MESA/NIOSH approved respirator during application is important. We also recommend the use of fabric coveralls and neoprene or other resistant gloves. Installers should use caution during spray processes to avoid falls caused by slipping on wet primer. Installers should read and understand all technical and informational literature on this product, including the Safety Data Sheet, prior to using this product.

GSP GREEN SHIELD PRODUCTS

GSP DOCUMENT NO.: SDS 2017036
REVISION DATE: 5/31/2015

SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

- Product identifier used on label: **GreenFibers**
- Product Code: **GreenFibers**
- Any other common names or synonyms by which the substance is known: **HDPE, Polyethylene, Polyalkene, Polythene, Polyolefin, Olefin**
- Name, address, phone number of the manufacturer, importer, or other responsible party, and emergency phone number: **Green Shield Products, LLC 4008 Louetta Rd. #464, Spring TX 77388 (P)832-957-2925.**
- Recommended use of the chemical (e.g., a brief description of what it actually does, such as flame retardant): **Not a chemical; uses vary, mix with Roof Coatings to create mastic.**
- Any restrictions on use (including recommendations given by the supplier): **None known**

2. HAZARDS IDENTIFICATION

This product does not meet the hazard criteriaof the OSHA Hazard Communication Standard (29 CFR 1910.1200) or of the United Nations Globally Harmonized System of Classification and Labelling of Chemicals (GHS). While the provision o fthis SDS is optional, it contains valuable information about the safe handling and proper use of this product and should be retained.

- The hazard classification of the chemical (e.g., flammable liquid, category): **Not applicable**
- Signal word: **Not applicable**
- Hazard statement(s): **Not applicable**
- Pictograms (the pictograms or hazard symbols may be presented as graphical reproductions of the symbols in black and white or be a description of the name of the symbol (e.g., skull and crossbones, flame): **Not applicable**
- Precautionary statement(s): **Not applicable**
- Description of any hazards not otherwise classified: **None known**
- For a mixture that contains an ingredient(s) with unknown toxicity, a statement describing how much (percentage) of the mixture consists of ingredient(s) with unknown acute toxicity. Please note that this is a total percentage of the mixture and not tied to the individual ingredient(s): **Not applicable**

3. COMPOSITION/INFORMATION ON INGREDIENTS*

Main component chemical names:	Common names and synonyms:	Chemical Abstracts Service (CAS) number and other unique identifiers:
Polyethylene	**Ethene, homopolymer**	**9002-88-4**

- Impurities and stabilizing additives which are classified and which contribute to the classification of the chemical: **None**
- The chemical name and concentration (i.e., exact percentage) of all ingredients which are classified as health hazards and are present above their cut-off/concentration limits or present a health risk below the cut-off/concentration limits: **None**

4. FIRST AID MEASURES

- Necessary first-aid instructions by relevant routes of exposure
  Inhalation: **In the case of respiratory irritation, move to fresh air; consult a physician if symptoms persist.**
  Skin contact: **In the case of skin irritation, wash off with soap and water; consult a physician if symptoms persist.**
  Eye contact: **Remove contact lenses if present, and flush eyes with water to remove particles; consult a physician if symptoms persist.**
  Ingestion: **Consult a physician if symptoms develop.**
- Description of the most important symptoms or effects, and any symptoms that are acute or delayed
  Inhalation: **May cause respiratory irritation.**
  Skin contact: **Not expected to be an irritant, but may cause skin irritation in some individuals.**
  Eye contact: **May cause eye irritation.**

Ingestion: **Unknown**

- Recommendations for immediate medical care and special treatment needed, when necessary: **Not applicable**

5. FIRE FIGHTING MEASURES

- Recommendations of suitable extinguishing equipment, and information about extinguishing equipment that is not appropriate for a particular situation: **Foam, dry chemicals, CO2, sand; water mist to cool exposed surfaces.**
- Advice on specific hazards that develop from the chemical during the fire, such as any hazardous combustion products created when the chemical burns: **May include, but are not limited to, CO and CO2.**
- Recommendations on special protective equipment or precautions for firefighters: **Firefighters should wear full protective clothing. Due to potential decomposition of the polymer, firefighters should be equipped with positive pressure self-contained breathing apparatus (SCBA) when fighting all indoor fires and any significant outdoor fires, and should fight fire from an upwind position.**

6. ACCIDENTAL RELEASE MEASURES

- Use of personal precautions (such as removal of ignition sources or providing sufficient ventilation) and protective equipment to prevent the contamination of skin, eyes, and clothing: **A dust mask and goggles are recommended to prevent possible irritation from airborne fibers. Cleansing the skin after handling is advisable.**
- Emergency procedures, including instructions for evacuations, consulting experts when needed, and appropriate protective clothing: **Not applicable**
- Methods and materials used for containment (e.g., covering the drains and capping procedures): **Not Applicable**
- Cleanup procedures (e.g., appropriate techniques for neutralization, decontamination, cleaning or vacuuming; absorbent materials; and/or equipment required for containment/clean up): **Vacuum or sweep up and place in a standard disposal container. Avoid the use of air jets if possible, to prevent fibers from becoming airborne.**

7. HANDLING AND STORAGE

- Precautions for safe handling, including recommendations for handling incompatible chemicals, minimizing the release of the chemical into the environment, and providing advice on general hygiene practices (e.g., eating, drinking, and smoking in work areas is prohibited): **No special handling has been shown to be necessary, but cleansing the skin after use is advisable. Maintain good housekeeping methods to control dust accumulations. Avoid the use of air jets if possible, to prevent fibers from becoming airborne.**
- Recommendations on the conditions for safe storage, including any incompatibilities. Provide advice on specific storage requirements (e.g., ventilation requirements): **Avoid overstacking to prevent collapse or shifting of the packages.**

8. EXPOSURE CONTROLS\PERSONAL PROTECTION

- OSHA Permissible Exposure Limits (PELs), American Conference of Governmental Industrial Hygienists (ACGIH) Threshold Limit Values (TLVs), and any other exposure limit used or recommended by the chemical manufacturer, importer, or employer preparing the safety data sheet, where available:
  Fiber dust should be considered a nuisance dust, i.e. particulates (not otherwise classified):
  ACGIH Threshold Limit Value: 10 mg/m3 total dust; 3 mg/m3 respirable dust
  OSHA Permissible Exposure Limit: 15 " /m3 total dust; 5 mg/m3 respirable dust
- Appropriate engineering controls (e.g., use local exhaust ventilation, or use only in an enclosed system): **Local exhaust ventilation may be used to reduce exposure to airborne fibers or fiber dust. Processing involving the use of elevated temperatures should only be carried out in areas with adequate ventilation.**
- Recommendations for personal protective measures to prevent illness or injury from exposure to chemicals, such as personal protective equipment (PPE) (e.g., appropriate types of eye, face, skin or respiratory protection needed based on hazards and potential exposure): **A dust mask and goggles are recommended to prevent possible irritation from airborne fibers.**
- Any special requirements for PPE, protective clothing or respirators (e.g., type of glove material, such as PVC or nitrile rubber gloves; and breakthrough time of the glove material): **Not specified.**

9. PHYSICAL AND CHEMICAL PROPERTIES

- Appearance (physical state, color, etc.): **White, fluffy fibers**
- Odor: **No significant odor**
- Odor threshold: **Not available**
- pH: **Not available**
- Melting point: **125-135 C/ 257-275 F**
- Initial boiling point and boiling range: **Not applicable**
- Flash point: **>200 C/ D) 92 F**
- Evaporation rate: **Not applicable**
- Flammability (solid, gas): **N n-flammable**
- Upper/lower flammability or explosive limits: **Not applicable**
- Vapor pressure: **Not applicable**
- Vapor density: **Not applicable**
- Relative density: **0.96g/cm)**
- Solubility(ies): **Not soluble in water**
- Partition coefficient: n-octanol/water: **Not available**
- Auto-ignition temperature: **Not available**
- Decomposition temperature: **Not available**
- Viscosity: **Not applicable**

10. STABILITY AND REACTIVITY

Reactivity

- Description of the specific test data for the chemical(s). This data can be for a class or family of the chemical if such data adequately represent the anticipated hazard of the chemical(s), where available: **Not available**

Chemical stability

- Indication of whether the chemical is stable or unstable under normal ambient temperature and conditions while in storage and being handled: **Stable**
- Description of any stabilizers that may be needed to maintain chemical stability: **Not Applicable**
- Indication of any safety issues that may arise should the product change in physical appearance: **None known**

Other

- Indication of the possibility of hazardous reactions, including a statement whether the chemical will react or polymerize, which could release excess pressure or heat, or create other hazardous conditions. Also, a description of the conditions under which hazardous reactions may occur: **None known**
- List of all conditions that should be avoided (e.g., static discharge, shock, vibrations, or environmental conditions that may lead to hazardous conditions): **None known**
- List of all classes of incompatible materials (e.g., classes of chemicals or specific substances) with which the chemical could react to produce a hazardous situation: **Strong oxidizers**
- List of any known or anticipated hazardous decomposition products that could be produced because of use, storage, or heating: **Carbon oxides, organic acids.**

11. TOXICOLOGICAL INFORMATION

- Information on the likely routes of exposure. The SDS should indicate if the information is unknown.
  Inhalation: **Possible inhalation of airborne fibers or fiber dust.**
  Ingestion: **Unlikely to occur.**
  Skin absorption: **Not known to occur.**
  Eye contact: **Possible contact with airborne fibers or fiber dust.**
- Description of the delayed, immediate, or chronic effects from short- and long-term exposure: **Delayed or immediate effects may include respiratory irritation, skin irritation, or eye irritation. No chronic effects from short-term exposure are known to occur. Effects from long-term exposure are unknown.**

- The numerical measures of toxicity: **Acute Toxicity:**
  Oral Rat LD >3g/k
  Oral Mouse LDL0 5g/k
- Description of the symptoms. This description includes the symptoms associated with exposure to the chemical including symptoms from the lowest to the most severe exposure.
  Inhalation: **Symptoms of respiratory irritation may include coughing, sneezing or itching of the nasal passages.**
  Ingestion: **Ingestion of large amounts of fibers may cause gastrointestinal blockage, which can cause stomach distress.**
  Skin contact: **Symptoms of skin irritation may include itching or redness of the skin.**
  Eye contact: **Symptoms of eye irritation may include itching, watering, or redness of the eyes.**
- Indication of whether the chemical is listed in the National Toxicology Program (NTP) Report on Carcinogens (latest edition) or has been found to be a potential carcinogen in the International Agency for Research on Cancer (IARC) Monographs (latest editions) or found to be a potential carcinogen by OSHA.
  NTP: **Not listed.**
  IARC: **3 – Not classifiable as to its carcinogenicity to humans.**
  OSHA: **Not regulated.**
- **According to the hypothesis of Stanton-Pott, it is reported that there is a possibility of causing cancer when ultra-fine fibers below 0.25µm in diameter and below 8µm in length are absorbed into the lung. When observed with the electronic microscope, the diameter of these fibers was above 1µm, and the average length was over 100µm; therefore the values were higher than those provided by this hypothesis.**

12. ECOLOGICAL INFORMATION

- Data from toxicity tests performed on aquatic and/or terrestrial organisms, where available (e.g., acute or chronic aquatic toxicity data for fish, algae, crustaceans, and other plants; toxicity data on birds, bees, plants): **Not available**
- Whether there is a potential for the chemical to persist and degrade in the environment either through biodegradation or other processes, such as oxidation or hydrolysis: **Unknown. This material is generally considered to be essentially non-biodegradable.**
- Results of tests of bioaccumulation potential, making reference to the octanol-water partition coefficient (Kow) and the bioconcentration factor (BCF), where available: **Not available**
- The potential for a substance to move from the soil to the groundwater (indicate results from adsorption studies or leaching studies): **Unlikely**
- Other adverse effects (e.g., environmental fate, ozone layer depletion potential, photochemical ozone creation potential, endocrine disrupting potential, and/or global warming potential): **Unknown**

13. DISPOSAL CONSIDERATIONS

- Description of appropriate disposal containers to use: **Standard disposal containers are acceptable.**
  Recommendations of appropriate disposal methods to employ: **Dispose of in accordance with governmental regulations for non-hazardous solid waste.**
- Description of the physical and chemical properties that may affect disposal activities: **None known**
- Language discouraging sewage disposal: **Disposable via septicor sewage systems is not recommended.**
- Any special precautions for landfills or incineration activities: **None Known**
- **Recycling of corrugated or paper packaging is encouraged where possible. Other packaging may be disposed of with product.**

14. TRANSPORT INFORMATION

- UN number (i.e., four-figure identification number of the substance): **None**
- UN proper shipping name: **Not applicable**
- Transport hazard class(es): **Not applicable**
- Packing group number, if applicable, based on the degree of hazard: **Not applicable**

- Environmental hazards (e.g., identify if it is a marine pollutant according to the International Maritime Dangerous Goods Code (IMDG Code)): **None known**
- Guidance on transport in bulk (according to Annex II of MARPOL 73/78 and the International Code for the Construction and Equipment of Ships Carrying Dangerous Chemicals in Bulk (International Bulk Chemical Code (IBC Code)): **Not applicable**
- Any special precautions which an employee should be aware of or needs to comply with, in connection with transport or conveyance either within or outside their premises (indicate when information is not available): **None known**
- Commodity: **Polyethylene Pulp**
- HTS Code Number: **3901.20**
- NMFC Item Number: **68310 Sub 6**

15. REGULATORY INFORMATION

- Any national and/or regional regulatory information of the chemical or mixtures (including any OSHA, Department of Transport, Environmental Protection Agency, or Consumer Product Safety Commission regulations)
- Canada DSL/NDSL: **Included on the Canadian Domestic Substance List.**
- Canada WHMIS: **Not a controlled product.**
- UN: **Does not appear on the Dangerous Goods List.**
- United States EPA: **Not regulated.**
- United States OSHA: **Not hazardous.**

16. OTHER INFORMATION

Date of Last Revision: May 31**, 2015** - Clarification of statements in Sections 1, 2, 3, 4, and 5;

information added to Section 6.