GAF
Safety Data Sheet
SDS # 1079C
SDS Date: February 2018

SECTION 1: PRODUCT AND COMPANY INFORMATION

PRODUCT NAME:	EverGuard® 1121 TPO Bonding Adhesive
TRADE NAME:	N/A
CHEMICAL FAMILY:	N/A
MANUFACTURER:	GAF
ADDRESS:	1 Campus Drive, Parsippany, NJ 07054
24 HOUR EMERGENCY PHONE: (CHEMTREC)	800–424–9300
INFORMATION ONLY:	800 – 766 – 3411
PREPARED BY:	Corporate EHS
APPROVED BY:	Corporate EHS

SECTION 2: HAZARD IDENTIFICATION

NFPA and HMIS RATINGS:

	NFPA Hazard Rating		HMIS Hazard Rating
Health	*2*	**Health**	*2*
Flammable	*3*	***Flammable***	*3*
Reactive	*0*	**Reactive**	*0*
Special Hazards	-	**Personal Protection**	X

GHS LABEL ELEMENTS:

GHS CLASSIFICATION:

Flammable Liquid - Category 2
Eye Irritant - Category 2A
Skin Irritant - Category 2
Acute Toxicity - Category 4
Target Organ (SE) - Category 3
Target Organ (RE) - Category 2
Reproductive Toxicity - Category 2

GHS PICTOGRAMS:

SIGNAL WORD: Danger

HAZARD STATEMENTS:

Highly flammable liquid and vapor.
Causes skin irritation.
Causes serious eye irritation.
May cause drowsiness or dizziness.
Suspected of damaging fertility or the unborn child.
Causes damage to organs (Nervous system) through prolonged or repeated e
May cause damage to organs (Neurologic: other (neuropsychological effects, vision)) through prolonged or repeated exposure if inhaled.

PRECAUTIONARY STATEMENTS:

Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Keep away from heat/sparks/open flames/hot surfaces. No smoking.
Keep container tightly closed.
Ground/bond container and receiving equipment.
Use explosion-proof electrical/ ventilating/ lighting/ equipment.
Use only non-sparking tools.
Take precautionary measures against static discharge.
Do not breathe dust/ fume/ gas/ mist/ vapors/ spray.
Wash skin thoroughly after handling.
Do not eat, drink or smoke when using this product.
Use only outdoors or in a well-ventilated area.
Wear protective gloves/ protective clothing/ eye protection/ face protection.

ADDITIONAL HAZARD IDENTIFICATION INFORMATION:

PRIMARY ROUTE OF EXPOSURE: Inhalation, Skin absorption, Skin contact, Eye contact, Ingestion

SIGNS & SYMPTONS OF EXPOSURE

Eyes: Can cause eye irritation. Symptoms include stinging, tearing, redness, and swelling of eyes.

Skin: May cause mild skin irritation. Prolonged or repeated contact may dry the skin. Symptoms may include redness, burning, drying and cracking of skin, and skin burns. Passage of this material into the

body through the skin is possible, but it is unlikely that this would result in harmful effects during safe handling and use.

Ingestion: Swallowing this material is harmful. This material can get into the lungs during swallowing or vomiting. This can cause lung inflammation and other lung injury.

Inhalation: Breathing small amounts of this material during normal handling is not likely to cause harmful effects. Breathing large amounts may be harmful.

ACUTE HEALTH HAZARDS: Inhalation of high concentrations of this material, as could occur in enclosed spaces or during deliberate abuse, may be associated with cardiac arrhythmias. Sympathomimetic drugs may initiate cardiac arrhythmias in persons exposed to this material. This material (or a component) has produced hyperglycemia and ketosis following substantial ingestion.

Signs and symptoms of exposure to this material through breathing, swallowing, and/or passage of the material through the skin may include: stomach or intestinal upset (nausea, vomiting, diarrhea) irritation (nose, throat, airways) temporary changes in mood and behavior confusion irregular heartbeat.
Causes skin irritation. Causes serious eye irritation. May cause drowsiness or dizziness. Suspected of damaging fertility or the unborn child. Causes damage to organs through prolonged or repeated exposure if inhaled.

CHRONIC HEALTH HAZARDS: This material (or a component) shortens the time of onset or worsens the liver and kidney damage induced by other chemicals. Prolonged and repeated exposure to n-hexane may cause peripheral neuropathy by damaging peripheral nerve tissue (that of the arms and legs) and result in muscular weakness and loss of sensation. Prolonged and repeated inhalation of high levels of mixed isomers of hexane resulted in kidney damage in male rats. The effects observed are the same as those seen in male rats exposed to other hydrocarbons. The mechanism by which these chemicals cause the characteristic kidney toxicity is unique to the male rat and the kidney effects are not expected to occur in man. Prolonged intentional toluene abuse may lead to damage to many organ systems having effects on: central and peripheral nervous systems, vision, hearing, liver, kidneys, heart and blood. Such abuse has been associated with brain damage characterized by disturbances in gait, personality changes and loss of memory. Comparable central nervous system effects have not been shown to result from occupational exposure to toluene. Prolonged intentional toluene abuse may lead to hearing loss progressing to deafness. In addition, while noise is known to cause hearing loss in humans, it has been suggested that workers exposed to organic solvents, including toluene, along with noise may

suffer greater hearing loss than would be expected from exposure to noise alone. Overexposure to this material (or its components) has been suggested as a cause of the following effects in laboratory animals: mild, reversible liver effects, mild, reversible kidney effects, blood abnormalities, liver abnormalities, nasal damage, respiratory tract damage (nose, throat, and airways), spleen damage, eye damage, kidney damage, effects on hearing, testis damage, lung damage, central nervous system damage, Overexposure to this material (or its components) has been suggested as a cause of the following effects in humans: liver abnormalities, visual impairment, kidney damage and central nervous system effects

CARCINOGENICITY: Based on the available information, this material cannot be classified with regard to carcinogenicity. This material is not listed as a carcinogen by the International Agency for Research on Cancer (IARC), the National Toxicology Program (NTP), or the Occupational Safety and Health Administration (OSHA).

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

			OCCUPATIONAL EXPOSURE LIMITS		
CHEMICAL NAME	**CAS #**	**% (BY WT)**	**OSHA**	**ACGIH**	**OTHER**
Toluene	108-88-3	30 – 40	200 ppm 300 ppm – ceiling	20 ppm	REL: 100 ppm
Acetone	67-64-1	20 – 30	1000 ppm	500 ppm 750 ppm – STEL	REL: 250 ppm
n-Hexane	110-54-3	10 – 15	500 ppm	50 ppm	REL: 50 ppm
Solvent Naphtha (Petroleum), Light Aliphatic	64742-89-8	1 – 2	300 ppm	NE	NE
Methyl-3-Pentane	96-14-0	1.5 – 5	500 ppm 1000 ppm - STEL	500 ppm 510 ppm - Ceiling	NE
Methylcyclopentane	96-37-7	1 – 1.5	500 ppm	NE	REL: 400 ppm

NE = Not Established

SECTION 4: FIRST AID MEASURES

FIRST AID PROCEDURES

EYES:	If symptoms develop, immediately move individual away from exposure and into fresh air. Flush eyes gently with water for at least 15 minutes while holding eyelids apart; seek immediate medical attention.
SKIN:	Remove contaminated clothing. Wash exposed area with soap and water. If symptoms persist, seek medical attention. Launder clothing before reuse.
INHALATION:	If symptoms develop, move individual away from exposure and into fresh air. If symptoms persist, seek medical attention. If breathing is difficult, administer oxygen. Keep person warm and quiet; seek immediate medical attention.
INGESTION:	Seek medical attention. If individual is drowsy or unconscious, do not give anything by mouth; place individual on the left side with the head down. Contact a physician, medical facility, or poison control center for advice about whether to induce vomiting. If possible, do not leave individual unattended.
NOTES TO PHYSICIANS OR FIRST AID PROVIDERS:	Inhalation of high concentrations of this material, as could occur in enclosed spaces or during deliberate abuse, may be associated with cardiac arrhythmias. Sympathomimetic drugs may initiate cardiac arrhythmias in persons exposed to this material. This material is an aspiration hazard. Potential danger from aspiration must be weighed against possible oral toxicity (see Section 11 – Toxicological Information) when deciding whether to induce vomiting. This material (or a component) has produced hyperglycemia and ketosis following substantial ingestion.

SECTION 5: FIRE FIGHTING PROCEDURES

SUITABLE EXTINGUISHING MEDIA:	Water spray, dry powder, foam, carbon dioxide (CO2).
HAZARDOUS COMBUSTION PRODUCTS:	Carbon dioxide and carbon monoxide, phenols, various hydrocarbons.
RECOMMENDED FIRE FIGHTING PROCEDURES:	Material is volatile and readily gives off vapors which may travel along the ground or be moved by ventilation and ignited by pilot lights, flames, sparks, heaters, smoking, electric motors, static discharge or other ignition sources at locations

	near the material handling point. Never use welding or cutting torch on or near drum (even empty) because product (even just residue) can ignite explosively. Wear full firefighting turn-out gear (full Bunker gear), and respiratory protection (SCBA).
UNUSUAL FIRE & EXPLOSION HAZARDS:	None.

SECTION 6: ACCIDENTAL RELEASE MEASURES

ACCIDENTAL RELEASE MEASURES:	For personal protection see section 8. Eliminate all ignition sources (flames including pilot lights, electrical sparks). Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed. Stop spill at source. Prevent from entering drains, sewers, streams or other bodies of water. Prevent from spreading. If runoff occurs, notify authorities as required. Pump or vacuum transfer spilled product to clean containers for recovery. Absorb unrecoverable product. Transfer contaminated absorbent, soil and other materials to containers for disposal.

SECTION 7: HANDLING AND STORAGE

HANDLING AND STORAGE:	Containers of this material may be hazardous when emptied. Since emptied containers retain product residues (vapor, liquid, and/or solid), all hazard precautions given in the data sheet must be observed. Static ignition hazard can result from handling and use. Electrically bond and ground all containers, personnel and equipment before transfer or use of material. Special precautions may be necessary to dissipate static electricity for non-conductive containers. Use proper bonding and grounding during product transfer as described in National Fire Protection Association document NFPA 77.
OTHER PRECAUTIONS:	Store in closed containers in a dry, well-ventilated area. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Observe label precautions. No smoking.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

ENGINEERING CONTROLS / VENTILATION:	Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below TLV(s).
RESPIRATORY PROTECTION:	If workplace exposure limit(s) of product or any component is exceeded (see exposure guidelines), a NIOSH-approved air supplied respirator is advised in absence of proper environmental control. OSHA regulations also permit other NIOSH respirators (negative pressure type) under specified conditions (see your industrial hygienist). Engineering or administrative controls should be implemented to reduce exposure.
EYE PROTECTION:	Chemical splash goggles or safety glasses should be used.
SKIN PROTECTION:	Wear chemical resistant gloves. To prevent repeated or prolonged skin contact, wear impervious clothing and boots.
OTHER PROTECTIVE EQUIPMENT:	N/A
WORK HYGIENIC PRACTICES:	Wash exposed skin prior to eating, drinking or smoking and at the end of each shift.
EXPOSURE GUIDELINES:	N/A

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE & ODOR:	Liquid with a solvent odor.		
FLASH POINT:	<0 °F / -18 °C	**LOWER EXPLOSIVE LIMIT:**	No data
METHOD USED:	Seta closed cup	**UPPER EXPLOSIVE LIMIT:**	No data
EVAPORATION RATE:	No data	**BOILING POINT:**	No data
pH (undiluted product):	No data	**MELTING POINT:**	No data
SOLUBILITY IN WATER:	No data	**SPECIFIC GRAVITY:**	0.873 g/cm3 @ 77 °F / 25 °C 7.3 lb/gal @ 77 °F / 25 °C
VAPOR DENSITY:	No data	**PERCENT VOLATILE:**	No data

VAPOR PRESSURE:	307.96 hPa @ 77 °F / 25 °C	**MOLECULAR WEIGHT:**	No data
VOC WITH WATER (LBS/GAL):	No data	**WITHOUT WATER (LBS/GAL):**	No data

SECTION 10: STABILITY AND REACTIVITY

THERMAL STABILITY: **STABLE X** **UNSTABLE** ☐

CONDITIONS TO AVOID (STABILITY): None known.

INCOMPATIBILITY (MATERIAL TO AVOID): Acids, strong alkalis, strong mineral acids, strong oxidizing agents.

HAZARDOUS DECOMPOSITION OR BY-PRODUCTS: Carbon dioxide and carbon monoxide, phenols, various hydrocarbons.

HAZARDOUS POLYMERIZATION: Product will not undergo hazardous polymerization.

SECTION 11: TOXICOLOGICAL INFORMATION

TOXICOLOGICAL INFORMATION:

TOLUENE:

Acute oral toxicity: LD50 (Rat, male): 5,580 mg/kg

Acute inhalation toxicity: LC50 (Rat): 28.1 mg/l
Exposure time: 4 h
Test atmosphere: vapor
Method: OECD Test Guideline 403

Acute dermal toxicity: LD50 (Rabbit): 12,267 mg/kg

ACETONE:

Acute oral toxicity: LD50 (Rat, female): 5,800 mg/kg

Acute inhalation toxicity: LC50 (Rat, female): 76 mg/l
Exposure time: 4 h
Test atmosphere: vapor

Acute dermal toxicity: LD50 (Rabbit): > 7,426 mg/kg

N-HEXANE:

Acute oral toxicity:	LD50 (Rat, male and female): ca. 16 g/kg
Acute inhalation toxicity:	LC50 (Rat, male): > 5000 ppm Exposure time: 24 h Test atmosphere: vapor
Acute dermal toxicity:	LD50 (Rabbit, male and female): > 2,000 mg/kg Assessment: No adverse effect has been observed in acute dermal toxicity tests.

SOLVENT NAPHTHA (PETROLEUM), LIGHT ALIPHATIC:

Acute oral toxicity:	LD50 (Rat): > 8,000 mg/kg
Acute inhalation toxicity:	LC50 (Rat): > 7,630 mg/m3 Exposure time: 4 h Test atmosphere: vapor Method: OECD Test Guideline 403 Assessment: No adverse effect has been observed in acute inhalation toxicity tests.
Acute dermal toxicity:	LD50 (Rat): > 4,000 mg/kg Assessment: Not classified as acutely toxic by dermal absorption under GHS.

METHYL-3-PENTANE:

Acute oral toxicity:	LD50 (Rat): 16,000 mg/kg Remarks: Information given is based on data obtained from similar substances.
Acute inhalation toxicity:	LC50 (Rat): 73680 ppm Exposure time: 4 h Test atmosphere: vapour Remarks: Information given is based on data obtained from similar substances.
Acute dermal toxicity:	LD50 (Rabbit): 3,350 mg/kg Assessment: No adverse effect has been observed in acute dermal toxicity tests. Remarks: Information given is based on data obtained from similar substances.

METHYLCYCLOPENTANE:

Acute oral toxicity:	LD50 (Rat): > 2,000 mg/kg

Skin corrosion/irritation
Causes skin irritation.

Product:
Remarks: May cause skin irritation and/or dermatitis.

Result: Repeated exposure may cause skin dryness or cracking.

Further information
Product: Remarks: Symptoms of overexposure may be headache, dizziness, tiredness, nausea and vomiting., Concentrations substantially above the TLV value may cause narcotic effects., Solvents may degrease the skin.

SECTION 12: ECOLOGICAL INFORMATION

ECOLOGICAL INFORMATION:

Product: An environmental hazard cannot be excluded in the event of unprofessional handling or disposal., Toxic to aquatic life., Harmful to aquatic life with long lasting effects.

SECTION 13: DISPOSAL CONSIDERATIONS

WASTE DISPOSAL METHOD: Dispose of in accordance with all applicable local, state and federal regulations.

Contaminated packaging:
Empty remaining contents.
Dispose of as unused product.
Empty containers should be taken to an approved waste handling site for recycling or disposal.
Do not re-use empty containers.
Do not burn, or use a cutting torch on, the empty drum.

SECTION 14: TRANSPORTATION INFORMATION

U.S. DOT TRANSPORTATION

PROPER SHIPPING NAME:	Adhesives
HAZARD CLASS:	3
ID NUMBER:	UN1133
PACKING GROUP:	II

LABEL STATEMENT:	N/A
OTHER:	N/A

IATA

PROPER SHIPPING NAME:	Adhesive
HAZARD CLASS:	3
ID NUMBER:	UN1133
PACKING GROUP:	II
LABEL STATEMENT:	N/A
OTHER:	N/A

IMDG

PROPER SHIPPING NAME:	Adhesive
HAZARD CLASS:	3
ID NUMBER:	UN1133
PACKING GROUP:	II
LABEL STATEMENT:	N/A
OTHER:	EMS: FE,SE

SECTION 15: REGULATORY INFORMATION

U.S. FEDERAL REGULATIONS

TSCA: All components are listed on the TSCA inventory.

CERCLA: CERCLA Hazardous Substances (40 CFR 302)

Reportable Quantity – Components

Toluene: 108-88-3, 1000 lbs

Acetone: 67-64-1, 5000 lbs
n-Hexane: 110-54-3, 5000 lbs
Cyclohexane: 110-82-7, 1000 lbs

SARA:

311/312 HAZARD CATEGORIES: Acute Health Hazard, Chronic Health Hazard, Fire Hazard

313 REPORTABLE INGREDIENTS: Toluene 108-88-3
n-Hexane 110-54-3
Cyclohexane 110-82-7

CALIFORNIA PROPOSITION 65: This product contains toluene, a chemical known to the state of California to cause birth defects, or other reproductive harm.

Other state regulations may apply. Check individual state requirements. The following components appear on one or more of the following state hazardous substances lists:

Chemical Name	CAS #	CA	MA	MN	NJ	PA	RI
Toluene	108-88-3	Yes	Yes	Yes	Yes	Yes	Yes
Acetone	67-64-1	Yes	Yes	Yes	Yes	Yes	Yes
Solvent Naphtha (Petroleum), Light Aliphatic	64742-89-8	No	No	No	No	No	No
n-Hexane	110-54-3	Yes	Yes	Yes	Yes	Yes	Yes
Methyl-3-pentane	96-14-0	Yes	Yes	Yes	Yes	Yes	Yes
Methylcyclopentane	96-37-7	Yes	Yes	Yes	Yes	Yes	Yes

SECTION 16: OTHER INFORMATION

ADDITIONAL COMMENTS: None

DATE OF PREVIOUS SDS: December 2014

CHANGES SINCE PREVIOUS SDS: Updates to Sections 2, 3., 9 and 11.

This information relates to the specific material designated and may not be valid for such material used on combination with any other materials or in any process. Such information is to the best of our knowledge and belief accurate and reliable as of the date compiled. However, no representation, warranty or guarantee, expressed or implied, is made as to its accuracy, reliability, or completeness. It is the user's responsibility to satisfy himself as to the suitability and completeness of such information for his particular use. We do not accept liability for any loss or damage that may occur from the use of this information. Nothing herein shall be construed as a recommendation for uses which infringe valid patents or as extending a license of valid patents.