

**DuPont™ Tyvek® Fluid Applied WB**

Version 3.0

Revision Date 04/20/2011

Ref. 130000094931

This SDS adheres to the standards and regulatory requirements of the United States and may not meet the regulatory requirements in other countries.

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product name : DuPont™ Tyvek® Fluid Applied WB
MSDS Number : 130000094931

Manufacturer : DuPont
Building Innovations
1007 Market Street
Wilmington, DE 19898

Product Information : 1-302-774-1000
Medical Emergency : 1-800-441-3637 (outside the U.S. 1-302-774-1139)
Transport Emergency : CHEMTREC: 1-800-424-9300 (outside the U.S. 1-703-527-3887)

SECTION 2. HAZARDS IDENTIFICATION

Emergency Overview

May cause eye and skin irritation. Repeated or prolonged skin contact may cause allergic reactions with susceptible persons. May cause irritation of respiratory tract.

Potential Health Effects

This product is a mixture. Health hazard information is based on its components.

Skin : May cause: Irritation with discomfort or pain, redness or rash, itching or swelling.

Eyes : May cause: transient irritation with discomfort, tearing.

Inhalation : Inhalation of mist or dried residue causes irritation of respiratory system.

Target Organs : Skin, Respiratory Tract

Carcinogenicity
Material

IARC	NTP	OSHA
Titanium dioxide	2B	


DuPont™ Tyvek® Fluid Applied WB

Version 3.0

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Crystalline silica 1 X

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Component	CAS-No.	Concentration
Proprietary polymer		25 - 50 %
Polyether diol		15 - 25 %
Limestone	1317-65-3	10 - 20 %
Precipitated calcium carbonate	471-34-1	10 - 20 %
Titanium dioxide	13463-67-7	5 - 10 %
Diamino silane	1760-24-3	1 - 5 %
Trimethoxyvinylsilane	2768-02-7	1 - 2 %
Crystalline silica	14808-60-7	0.1 - 1 %

Additives in this product do not present a respiration hazard unless the product is ground to a powder of respirable size and the dust is inhaled. All dusts are potentially injurious to the respiratory tract if respirable particles are generated and inhaled.

SECTION 4. FIRST AID MEASURES



DuPont™ Tyvek® Fluid Applied WB

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Revision Date 04/20/2011

Ref. 130000094931

- Skin contact : In case of contact, immediately flush skin with plenty of water. Get medical attention if irritation develops and persists.
- Eye contact : Rinse with plenty of water. Consult a physician if necessary.
- Inhalation : Remove person to fresh air. If signs/symptoms continue, get medical attention.
- Ingestion : DO NOT induce vomiting unless directed to do so by a physician or poison control center.

SECTION 5. FIRE-FIGHTING MEASURES

- Fire and Explosion Hazard : Does not readily burn or support combustion. Nitrogen oxides, carbon monoxide and unidentified organic compounds may be formed upon combustion.
- Suitable extinguishing media : Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
- Firefighting Instructions : Wear suitable protective equipment. In the event of fire, wear self-contained breathing apparatus. Evacuate personnel to safe areas.

SECTION 6. ACCIDENTAL RELEASE MEASURES

NOTE: Review FIRE FIGHTING MEASURES and HANDLING (PERSONNEL) sections before proceeding with clean-up. Use appropriate PERSONAL PROTECTIVE EQUIPMENT during clean-up.

- Spill Cleanup : Shovel into suitable container for disposal. Dispose of in accordance with local regulations.

SECTION 7. HANDLING AND STORAGE

- Storage : Store in a clean, dry place. To maintain product quality, do not store in heat or direct sunlight.


DuPont™ Tyvek® Fluid Applied WB

Version 3.0

Revision Date 04/20/2011

Ref. 130000094931

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION
Personal protective equipment

Respiratory protection : Where there is potential for airborne exposures in excess of applicable limits, wear NIOSH approved respiratory protection.

Eye protection : Wear protective eyewear to prevent contact with this substance.

Skin and body protection : Wear protective gloves/clothing to prevent skin contact.

Exposure Guidelines
Exposure Limit Values
Limestone

PEL: (OSHA) 5 mg/m3 8 hr. TWA Respirable fraction.

PEL: (OSHA) 15 mg/m3 8 hr. TWA Total dust.

PEL: (OSHA) 15 mg/m3 8 hr. TWA Total dust.

TLV (ACGIH) 3 mg/m3 8 hr. TWA Respirable particles.

TLV (ACGIH) 10 mg/m3 8 hr. TWA Inhalable particles.

Calcium carbonate

PEL: (OSHA) 5 mg/m3 8 hr. TWA Respirable fraction.

PEL: (OSHA) 15 mg/m3 8 hr. TWA Total dust.

Titanium dioxide

PEL: (OSHA) 15 mg/m3 8 hr. TWA Total dust.

TLV (ACGIH) 10 mg/m3 TWA

AEL * (DUPONT) 10 mg/m3 8 & 12 hr. TWA Total dust.

AEL * (DUPONT) 5 mg/m3 8 & 12 hr. TWA Respirable dust.

Crystalline silica

PEL: (OSHA) 2.4 millions of particles per cubic foot of air TWA
Respirable.



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		Remarks	The exposure limit is calculated from the equation, $250/(\%SiO_2+5)$, using a value of 100% SiO ₂ . Lower percentages of SiO ₂ will yield higher exposure limits.
PEL:	(OSHA)	0.1 mg/m ³ Remarks	TWA Respirable. The exposure limit is calculated from the equation, $10/(\%SiO_2+2)$, using a value of 100% SiO ₂ . Lower percentages of SiO ₂ will yield higher exposure limits.
PEL:	(OSHA)	0.3 mg/m ³ Remarks	TWA Total dust. The exposure limit is calculated from the equation, $30/(\%SiO_2+2)$, using a value of 100% SiO ₂ . Lower values of % SiO ₂ will give higher exposure limits.
TLV	(ACGIH)	0.025 mg/m ³	TWA Respirable fraction.
AEL *	(DUPONT)	0.02 mg/m ³	8 hr. TWA Respirable dust.
AEL *	(DUPONT)	0.01 mg/m ³	12 hr. TWA Respirable dust.

* AEL is DuPont's Acceptable Exposure Limit. Where governmentally imposed occupational exposure limits which are lower than the AEL are in effect, such limits shall take precedence.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Form	: paste
Color	: white
% Volatile	: < 2 %
Specific Gravity	: 1.0 - 1.8

SECTION 10. STABILITY AND REACTIVITY

Stability : Stable under normal conditions.


DuPont™ Tyvek® Fluid Applied WB

Version 3.0

Revision Date 04/20/2011

Ref. 130000094931

Conditions to avoid : Temperature > 140 F

Incompatibility : Incompatible with strong acids and bases. Incompatible with oxidizing agents.

Hazardous decomposition products : Possible decomposition products in case of hydrolysis are:: Methanol

SECTION 11. TOXICOLOGICAL INFORMATION

DuPont™ Tyvek® Fluid Applied WB
Further information : No data is available on the product itself.

Polyether diol
Dermal LD50 : 20,000 mg/kg , rabbit
Oral LD50 : 3,750 - 40,000 mg/kg , rat
Inhalation LC50 : > 200 mg/l , animals (unspecified species)

Limestone
Oral LD50 : 6,450 mg/kg , rat

Precipitated calcium carbonate
Oral LD50 : 6,450 mg/kg , rat
Carcinogenicity : Due to its physical properties, there is no potential for adverse effects.
Mutagenicity : Due to its physical properties, there is no potential for adverse effects.

Titanium dioxide
Oral LD50 : > 5,000 mg/kg , rat
Inhalation 4 h LC50 : > 6.82 mg/l , rat
Carcinogenicity : Based upon all available study results, DuPont scientists conclude that titanium dioxide will not cause lung cancer or chronic respiratory diseases in humans at concentrations experienced in the workplace.
Mutagenicity : Did not cause genetic damage in animals.
Tests on bacterial or mammalian cell cultures did not show mutagenic effects.

Diamino silane
Dermal LD50 : ca. 16,160 mg/kg , rabbit

**DuPont™ Tyvek® Fluid Applied WB**

Version 3.0

Revision Date 04/20/2011

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Oral LD50 : 2,400 mg/kg , rat

Mutagenicity : Did not cause genetic damage in animals.
Tests on bacterial or mammalian cell cultures did not show mutagenic effects.

Trimethoxyvinylsilane

Dermal LD50 : 3,270 mg/kg , rabbit

Oral LD50 : 7,000 mg/kg , rat

Mutagenicity : Tests on mammalian cell cultures showed mutagenic effects.
Did not show mutagenic effects in animal experiments.

Crystalline silica

Dermal : No adverse effects expected.

Oral ALD : > 11,000 mg/kg , rat

Inhalation : human
Effects of breathing high concentration of respirable particles may include:
Breathing difficulties
Cough
Adverse body weight effects
Lung damageCarcinogenicity : An increased incidence of tumours was observed in laboratory animals.
An increased risk of cancer in humans has been shown in workplace-based studies.Mutagenicity : Did not cause genetic damage in cultured bacterial cells.
Did not cause genetic damage in animals.
Genetic damage in cultured mammalian cells was observed in some laboratory tests but not in others.**SECTION 12. ECOLOGICAL INFORMATION**

Aquatic Toxicity

**DuPont™ Tyvek® Fluid Applied WB**

Version 3.0

Revision Date 04/20/2011

Ref. 130000094931

Polyether diol

96 h LC50 : Menidia peninsulae (tidewater silverside) 650 mg/l
The substance is a polymer and is not expected to produce toxic effects.

Precipitated calcium carbonate

96 h LC50 : Gambusia affinis (Mosquito fish) > 56,000 mg/l

Titanium dioxide

96 h LC50 : Pimephales promelas (fathead minnow) > 1,000 mg/l

72 h EC50 : Pseudokirchneriella subcapitata (green algae) 61 mg/l

48 h EC50 : Daphnia magna (Water flea) > 1,000 mg/l

Diamino silane

96 h LC50 : Oncorhynchus mykiss (rainbow trout) > 100 mg/l

72 h ErC50 : Pseudokirchneriella subcapitata (green algae) 8.8 mg/l

48 h EC50 : Daphnia magna (Water flea) 90 mg/l

SECTION 13. DISPOSAL CONSIDERATIONS

Waste Disposal : Comply with applicable Federal, State/Provincial and Local Regulations.

SECTION 14. TRANSPORT INFORMATION

Not classified as dangerous in the meaning of transport regulations.

SECTION 15. REGULATORY INFORMATION

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- SARA 313 Regulated Chemical(s) : SARA 313: This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.
- California Prop. 65 : WARNING! This product contains a chemical known to the State of California to cause cancer. Crystalline silica
The State of California, under Proposition 65, regulates Crystalline silica - airborne, unbound particles of respirable size as a carcinogen. In this product, crystalline silica is not supplied in the form regulated in California.
- PA Right to Know Regulated Chemical(s) : Substances on the Pennsylvania Hazardous Substances List present at a concentration of 1% or more (0.01% for Special Hazardous Substances): Titanium dioxide , Limestone , Calcium carbonate
- NJ Right to Know Regulated Chemical(s) : Substances on the New Jersey Workplace Hazardous Substance List present at a concentration of 1% or more (0.1% for substances identified as carcinogens, mutagens or teratogens): Titanium dioxide

SECTION 16. OTHER INFORMATION

DuPont™ Tyvek® are trademarks of E. I. du Pont de Nemours and Company
This safety datasheet only contains information relating to safety and does not replace any product information or product specification.

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

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