

Material Safety Data Sheet

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SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: 3MTM TILE, GROUT & BOWL CLEANER Ready-to-Use (Product No. 52, Twist 'n

FillTM System)

MANUFACTURER: 3M

DIVISION: Building & Commercial Services Division

ADDRESS: 3M Center, St. Paul, MN 55144-1000

EMERGENCY PHONE: 1-800-364-3577 or (651) 737-6501 (24 hours)

Issue Date: 09/09/11 **Supercedes Date:** 05/29/07

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Product Use:

Intended Use: Hard Surface Cleaner

SECTION 2: INGREDIENTS

<u>Ingredient</u>	<u>C.A.S. No.</u>	% by Wt
WATER	7732-18-5	> 90
HYDROCHLORIC ACID	7647-01-0	3 - 7
POLYOXYETHYLENE TALLOW AMINE	61791-26-2	0.1 - 1
ETHYLENE OXIDE	75-21-8	< 0.005
DYE	3844-45-9	< 0.001

SECTION 3: HAZARDS IDENTIFICATION

3.1 EMERGENCY OVERVIEW

Specific Physical Form: Liquid

Odor, Color, Grade: Clear to translucent liquid with dark turquoise color and mild hydrochloric acid odor

General Physical Form: Liquid

Immediate health, physical, and environmental hazards: May cause chemical eye burns. May cause chemical skin burns. May cause chemical gastrointestinal burns. May cause chemical respiratory tract burns. Contains a chemical or chemicals which can

cause cancer.

3.2 POTENTIAL HEALTH EFFECTS

Eye Contact:

Corrosive (Eye Burns): Signs/symptoms may include cloudy appearance of the cornea, chemical burns, severe pain, tearing, ulcerations, significantly impaired vision or complete loss of vision.

Skin Contact:

Corrosive (Skin Burns): Signs/symptoms may include localized redness, swelling, itching, intense pain, blistering, ulceration, and tissue destruction.

Inhalation:

May be harmful if inhaled.

Respiratory Tract Corrosion: Signs/symptoms may include nasal discharge, severe nose and throat pain, chest tightness and pain, coughing up blood, wheezing, and breathlessness, possibly progressing to respiratory failure.

Ingestion:

May be harmful if swallowed.

Gastrointestinal Corrosion: Signs/symptoms may include severe mouth, throat and abdominal pain; nausea; vomiting; and diarrhea; blood in the feces and/or vomitus may also be seen.

Carcinogenicity:

Contains a chemical or chemicals which can cause cancer.

<u>Ingredient</u>	C.A.S. No.	Class Description	Regulation
ETHYLENE OXIDE	75-21-8	Grp. 1: Carcinogenic to	International Agency for Research on Cancer
		humans	
ETHYLENE OXIDE	75-21-8	Known human carcinogen	National Toxicology Program Carcinogens
ETHYLENE OXIDE	75-21-8	Cancer hazard	OSHA Carcinogens
			_

3.3 POTENTIAL ENVIRONMENTAL EFFECTS

A 3M Product Environmental Data Sheet (PED) is available.

A conservative assessment indicates this product presents a low environmental risk. Components released to the environment through use and disposal are expected to have insignificant environmental impacts.

SECTION 4: FIRST AID MEASURES

4.1 FIRST AID PROCEDURES

The following first aid recommendations are based on an assumption that appropriate personal and industrial hygiene practices are followed.

Eye Contact: Immediately flush eyes with large amounts of water for at least 15 minutes. Get immediate medical attention. **Skin Contact:** Remove contaminated clothing and shoes. Immediately flush skin with large amounts of water for at least 15 minutes. Get immediate medical attention. Wash contaminated clothing and clean shoes before reuse.

Inhalation: Remove person to fresh air. Get immediate medical attention.

If Swallowed: Do not induce vomiting. Give victim two glasses of water. Never give anything by mouth to an unconscious person. Get immediate medical attention.

SECTION 5: FIRE FIGHTING MEASURES

5.1 FLAMMABLE PROPERTIES

Flash PointNo flash pointFlammable Limits(LEL)Not ApplicableFlammable Limits(UEL)Not ApplicableOSHA Flammability Classification:Not Applicable

5.2 EXTINGUISHING MEDIA

Material will not burn.

5.3 PROTECTION OF FIRE FIGHTERS

Special Fire Fighting Procedures: Wear full protective equipment (Bunker Gear) and a self-contained breathing apparatus (SCBA).

Unusual Fire and Explosion Hazards: Not applicable.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

Evacuate unprotected and untrained personnel from hazard area. The spill should be cleaned up by qualified personnel. Ventilate the area with fresh air. For large spill, or spills in confined spaces, provide mechanical ventilation to disperse or exhaust vapors, in accordance with good industrial hygiene practice. Warning! A motor could be an ignition source and could cause flammable gases or vapors in the spill area to burn or explode. Avoid contact with incompatible materials listed in the Reactivity Data Section. Remember, adding an absorbent material does not remove a toxic, corrosivity or flammability hazard.

6.2. Environmental precautions

For larger spills, cover drains and build dikes to prevent entry into sewer systems or bodies of water. Place in a metal container approved for use in transportation by appropriate authorities. The container must be lined with polyethylene plastic or contain a plastic drum liner made of polyethylene. Place in a container approved for transportation by appropriate authorities, but do not seal the container for 48 hours to avoid pressure build-up. Dispose of collected material as soon as possible.

Clean-up methods

Refer to other sections of this MSDS for information regarding physical and health hazards, respiratory protection, ventilation, and personal protective equipment. Call 3M-HELPS line (1-800-364-3577) for more information on handling and managing the spill. Contain spill. For large spills, if necessary, get assistance from professional spill clean up team. For small spills, carefully cover the spill with soda ash (sodium carbonate) or sodium bicarbonate. Work from around the perimeter inward. Avoid splashing. Add enough water to ease mixing and stir. Continue stirring and adding water and neutralizing agent until the reaction stops. Let cool before collecting. Or use a commercially available 'Acid spill' clean-up kit. Follow the kit directions exactly, as specified. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Collect as much of the spilled material as possible. Clean up residue with a dilute solution (approximately 1 to 5%) of soda ash (sodium carbonate) or baking soda (sodium bicarbonate) in water.

In the event of a release of this material, the user should determine if the release qualifies as reportable according to local, state, and federal regulations.

SECTION 7: HANDLING AND STORAGE

7.1 HANDLING

Keep out of the reach of children. Avoid breathing of vapors, mists or spray. Avoid skin contact. Avoid eye contact with vapors, mists, or spray. Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water. Keep away from aluminum and zinc. Avoid contact with oxidizing agents. NOTE: The above precautionary information presumes that this ready-to-use product has been diluted and dispensed from a TWIST 'n FILL(TM) Chemical Dispenser. Do not mix with bleach or ammonia products.

7.2 STORAGE

Keep container in well-ventilated area. Store away from oxidizing agents. Store away from strong bases.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 ENGINEERING CONTROLS

Use in a well-ventilated area.

8.2 PERSONAL PROTECTIVE EQUIPMENT (PPE)

8.2.1 Eye/Face Protection

Avoid eye contact with vapors, mists, or spray.

The following eye protection(s) are recommended: Full Face Shield

Indirect Vented Goggles

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8.2.2 Skin Protection

Avoid skin contact.

Select and use gloves and/or protective clothing to prevent skin contact based on the results of an exposure assessment. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible materials.

Gloves made from the following material(s) are recommended: Butyl Rubber

Neoprene

. The following protective clothing material(s) are recommended: Apron - Neoprene

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8.2.3 Respiratory Protection

Avoid breathing of vapors, mists or spray. Under normal use conditions, airborne exposures are not expected to be significant enough to require respiratory protection.

8.2.4 Prevention of Swallowing

Do not eat, drink or smoke when using this product. Wash exposed areas thoroughly with soap and water.

8.3 EXPOSURE GUIDELINES

<u>Ingredient</u>	<u>Authority</u>	Type	<u>Limit</u>	Additional Information
ETHYLENE OXIDE	3M	STEL	5 ppm	
ETHYLENE OXIDE	ACGIH	TWA	1 ppm	
ETHYLENE OXIDE	OSHA	TWA	1 ppm	29 CFR 1910.1047
ETHYLENE OXIDE	OSHA	STEL	5 ppm	29 CFR 1910.1047
HYDROCHLORIC ACID	ACGIH	CEIL	2 ppm	
HYDROCHLORIC ACID	OSHA	CEIL	7 mg/m3	

System) 09/09/11

SOURCE OF EXPOSURE LIMIT DATA:

ACGIH: American Conference of Governmental Industrial Hygienists

CMRG: Chemical Manufacturer Recommended Guideline OSHA: Occupational Safety and Health Administration

AIHA: American Industrial Hygiene Association Workplace Environmental Exposure Level (WEEL)

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Specific Physical Form: Liquid

Odor, Color, Grade: Clear to translucent liquid with dark turquoise color and mild

hydrochloric acid odor

General Physical Form: Liquid

Flash Point
No flash point
Flammable Limits(LEL)
Not Applicable
Flammable Limits(UEL)
Not Applicable
Soiling Point
> 200 °F

Specific Gravity 1.1 [Ref Std: WATER=1]

pH < 0.1

Solubility in Water Complete

 $\begin{array}{lll} \textbf{Volatile Organic Compounds} & < 0.005 \% \text{ weight} \\ \textbf{Percent volatile} & 95 - 100 \% \\ \textbf{VOC Less H2O \& Exempt Solvents} & < 0.27 \text{ g/l} \\ \textbf{Viscosity} & < 200 \text{ centipoise} \\ \end{array}$

SECTION 10: STABILITY AND REACTIVITY

Stability: Stable.

Materials and Conditions to Avoid:

10.1 Conditions to avoid

None known

10.2 Materials to avoid

Strong bases

Additional Information: Do not mix with bleach or ammonia products.

Hazardous Polymerization: Hazardous polymerization will not occur.

Hazardous Decomposition: Under recommended usage conditions, hazardous decomposition products are not expected. Hazardous decomposition products may occur as a result of oxidation, heating, or reaction with another material.

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SECTION 11: TOXICOLOGICAL INFORMATION

Please contact the address listed on the first page of the MSDS for Toxicological Information on this material and/or its components.

SECTION 12: ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION

A 3M Product Environmental Data Sheet (PED) is available.

CHEMICAL FATE INFORMATION

A 3M Product Environmental Data Sheet (PED) is available.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Disposal Method: Dispose of waste product in a permitted hazardous waste facility.

EPA Hazardous Waste Number (RCRA): D002 (Corrosive)

Since regulations vary, consult applicable regulations or authorities before disposal.

SECTION 14:TRANSPORT INFORMATION

For Transport Information, please visit http://3M.com/Transportinfo or call 1-800-364-3577 or 651-737-6501.

SECTION 15: REGULATORY INFORMATION

US FEDERAL REGULATIONS

311/312 Hazard Categories:

Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No Immediate Hazard - Yes Delayed Hazard - Yes

Section 313 Toxic Chemicals subject to the reporting requirements of that section and 40 CFR part 372 (EPCRA):

<u>Ingredient</u>	<u>C.A.S. No</u>	% by Wt
HYDROCHLORIC ACID	7647-01-0	3 - 7

STATE REGULATIONS CALIFORNIA PROPOSITION 65

<u>Ingredient</u>	<u>C.A.S. No.</u>	<u>Classification</u>
ETHYLENE OXIDE	75-21-8	*Female reproductive toxin
ETHYLENE OXIDE	75-21-8	*Male reproductive toxin
ETHYLENE OXIDE	75-21-8	**Carcinogen
ETHYLENE OXIDE	75-21-8	*Developmental Toxin

^{*} WARNING: contains a chemical or chemicals which can cause birth defects or other reproductive harm.

** WARNING: contains a chemical which can cause cancer.

CHEMICAL INVENTORIES

The components of this product are in compliance with the chemical notification requirements of TSCA.

All applicable chemical ingredients in this material are listed on the European Inventory of Existing Chemical Substances (EINECS), or are exempt polymers whose monomers are listed on EINECS. The components of this material are in compliance with the new chemical notification requirements for the Korean Existing Chemicals Inventory.

The components of this product are listed on the Australian Inventory of Chemical Substances.

The components of this product are listed on Japan's Chemical Substance Control Law List (also known as the Existing and New Chemical Substances List.)

All the components of this product are listed on China's Inventory of Chemical Substances.

The components of this product are in compliance with notification requirements in the Philippines.

The components of this product are listed on the Canadian Domestic Substances List.

INTERNATIONAL REGULATIONS

This MSDS has been prepared to meet the U.S. OSHA Hazard Communication Standard, 29 CFR 1910.1200.

SECTION 16: OTHER INFORMATION

NFPA Hazard Classification

Health: 3 Flammability: 0 Reactivity: 0 Special Hazards: None

Corrosive: Yes

National Fire Protection Association (NFPA) hazard ratings are designed for use by emergency response personnel to address the hazards that are presented by short-term, acute exposure to a material under conditions of fire, spill, or similar emergencies. Hazard ratings are primarily based on the inherent physical and toxic properties of the material but also include the toxic properties of combustion or decomposition products that are known to be generated in significant quantities.

HMIS Hazard Classification

Health: 3 Flammability: 0 Reactivity: 0 Protection: X - See PPE section.

Hazardous Material Identification System (HMIS®) hazard ratings are designed to inform employees of chemical hazards in the workplace. These ratings are based on the inherent properties of the material under expected conditions of normal use and are not intended for use in emergency situations. HMIS® ratings are to be used with a fully implemented HMIS® program. HMIS® is a registered mark of the National Paint and Coatings Association (NPCA).

Revision Changes:

Section 1: Product name was modified.

Section 1: Product use information was modified.

Section 16: Disclaimer (second paragraph) was modified.

Section 3: Potential effects from inhalation information was modified.

Section 3: Potential effects from ingestion information was modified.

Section 8: Engineering controls information was modified.

Section 13: Waste disposal method information was modified.

Section 8: Eye/face protection information was modified.

Section 8: Skin protection - recommended gloves information was modified.

- Section 4: First aid for inhalation medical assistance was modified.
- Section 8: Skin protection protective clothing information was modified.
- Section 3: Immediate other hazard(s) was modified.
- Section 14: Transportation legal text was modified.
- Section 16: HMIS explanation was modified.
- Page Heading: Product name was modified.
- Section 15: Inventories information was modified.
- Section 9: Boiling point information was modified.
- Section 5: Flammable limits (UE) information was modified.
- Section 5: Flammable limits (LEL) information was modified.
- Section 5: Flash point information was modified.
- Section 9: Property description for optional properties was modified.
- Section 9: Specific gravity information was modified.
- Section 9: pH information was modified.
- Section 9: Solubility in water text was modified.
- Section 9: Flash point information was modified.
- Section 9: Flammable limits (LEL) information was modified.
- Section 9: Flammable limits (UEL) information was modified.
- Section 3: Immediate inhalation hazard(s) was added.
- Section 3: Carcinogenicity phrase was added.
- Section 15: California proposition 65 reproductive harm warning was added.
- Section 2: Ingredient table was added.
- Section 15: EPCRA 313 information was added.
- Section 15: EPCRA 313 text was added.
- Section 8: Exposure guidelines ingredient information was added.
- Section 8: Exposure guidelines data source legend was added.
- Section 3: Carcinogenicity table was added.
- Section 3: Carcinogenicity heading was added.
- Section 15: California proposition 65 ingredient information was added.
- Section 15: California proposition 65 heading was added.
- Section 15: California proposition 65 cancer warning was added.
- Section 6: 6.2. Environmental precautions heading was added.
- Section 6: 6.1. Personal precautions, protective equipment and emergency procedures heading was added.
- Section 10.1 Conditions to avoid heading was added.
- Section 10.2 Materials to avoid heading was added.
- Section 16: Web address was added.
- Section 6: Personal precautions information was added.
- Section 6: Environmental procedures information was added.
- Section 6: Methods for cleaning up information was added.
- Section 10: Materials to avoid physical property was added.
- Section 10: Conditions to avoid physical property was added.
- Section 1: Address was added.
- Copyright was added.
- Company logo was added.
- Section 6: Clean-up methods heading was added.
- Telephone header was added.
- Company Telephone was added.
- Section 1: Emergency phone information was added.
- Section 1: Emergency phone information was deleted.
- Company Logo was deleted.
- Copyright was deleted.
- Section 16: Web address heading was deleted.
- Section 6: Release measures information was deleted.
- Section 6: Release measures heading was deleted.
- Section 10: Materials and conditions to avoid physical property was deleted.

Section 1: Address line 1 was deleted. Section 1: Address line 2 was deleted.

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