

1. PRODUCT IDENTIFICATION

<u>TRADE NAME (AS LABELED):</u>	Oven and Grill Cleaner
<u>CHEMICAL NAME/CLASS:</u>	Corrosive, Poison
<u>PRODUCT NUMBER:</u>	Oven and Grill Cleaner
<u>U.N. NUMBER:</u>	UN3266
<u>U.N. DANGEROUS GOODS CLASS/SUBSIDIARY RISK:</u>	8
<u>MANUFACTURER'S NAME:</u>	NuGeneration Technologies, LLC
<u>ADDRESS:</u>	1155 Park Avenue, Emeryville, CA 94608 USA
<u>EMERGENCY PHONE:</u>	(800) 424-9300 (CHEMTREC)
<u>BUSINESS PHONE:</u>	(888) 996-8436 (Product Information)
<u>DATE OF PREPARATION:</u>	April 4, 2011

2. COMPOSITION and INFORMATION ON INGREDIENTS

Hazardous Ingredients:	CAS #	EC #	ICSC #	WT %	Hazard Symbol; Risk Phrases
POTASSIUM HYDROXIDE	1310-58-3			<22%	HAZARD CLASSIFICATION: C RISK PHRASES: R34
SODIUM HYDROXIDE	1310-73-2			<19%	HAZARD CLASSIFICATION: C RISK PHRASES: R34
SODIUM METASILICATE	6834-92-0			<9%	HAZARD CLASSIFICATION: E RISK PHRASES: R34
NONYL PHENOL ETHOXYLATE	127087-87-0			<4%	

The specific identities of certain components of this formulation are withheld as trade secrets accordance with 29 CFR 1910.1200.

NOTE: ALL WHMIS required information is included in appropriate sections based on the ANSI Z400.1-2004 format. This product has been classified in accordance with the hazard criteria of the CPR and the MSDS contains all the information required by the CPR, EU Directives and the Japanese Industrial Standard *JIS Z 7250: 2000*.

See Section 3 for full text of Risk Phrases and Safety Phrases

3. HAZARD IDENTIFICATION

EU LABELING AND CLASSIFICATION: This product meets the definition of the following hazard class as defined by the European Economic Community Guidelines.


EU CLASSIFICATION: Harmful if swallowed (Xn), Irritating to eyes (Xi)

EU RISK PHRASES: R, R34 Irritating to eyes.

EU SAFETY PHRASES: S 24/25 Avoid contact with skin and eyes.



EMERGENCY OVERVIEW: WARNING! CORROSIVE LIQUID!

Hazardous Material Information System (HMIS): Hazard Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe * = Chronic hazard	Health	3
	Flammability	0
	Reactivity	0
	Personal Protection	D
		

SYMPTOMS OF OVEREXPOSURE BY ROUTE OF EXPOSURE: The most significant routes of overexposure for this product are by inhalation and by ingestion. The symptoms of overexposure are described in the following paragraphs.

INHALATION: May cause irritation to nose and throat.

INGESTION: Ingestion of large amounts will cause gastrointestinal upset.

SKIN CONTACT: Continuous contact may cause skin irritation.

EYE CONTACT: Direct contact may cause irritation, redness, and pain.

HEALTH EFFECTS OR RISKS FROM EXPOSURE:

POTENTIAL ACUTE HEALTH EFFECTS: No information found.

CHRONIC: This product does NOT contain compounds known to be carcinogens, i.e. cause cancer, according to NTP, IARC, or OSHA.

AGGRAVATION OF PRE-EXISTING CONDITIONS: No information found.

4. FIRST-AID MEASURES

Contaminated individuals of chemical exposure must be taken for medical attention if any adverse effect occurs. Rescuers should be taken for medical attention, if necessary. Take copy of label and MSDS to health professional with contaminated individual.

SKIN EXPOSURE: Immediately rinse material off skin with running water; remove contaminated clothing and shoes. Then wash with soap and water. If heavy contamination has occurred, then pile the clothing in a manner which limits further exposure and insert them into washing machine. Otherwise, thoroughly clean contaminated clothing and shoes before use. Get medical attention if irritation persists.

EYE EXPOSURE: Immediately flush eyes with plenty of water for at least 15 minutes, lifting upper and lower eyelids and rinse well under them. Get medical attention.

INHALATION: Remove from exposure. If individual is not breathing, administer cardiopulmonary resuscitation (CPR) and get immediate medical attention. If individual is breathing, but with difficulty, get medical attention.

INGESTION: Do not induce vomiting. Do not give anything by mouth to an unconscious person. Immediately drink large quantities of milk or water. Get medical attention.

5. FIRE-FIGHTING MEASURES

FLASH POINT: Not Applicable

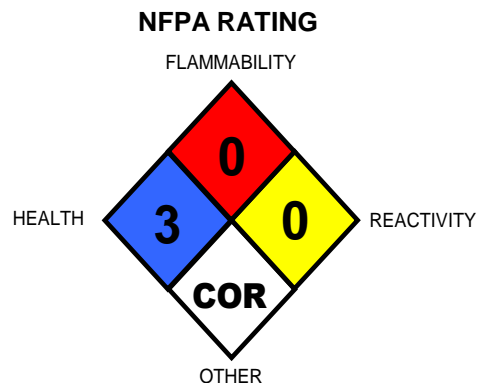
AUTOIGNITION TEMPERATURE: Not Applicable

FLAMMABLE LIMITS (in air by volume, %): Not Applicable

FIRE EXTINGUISHING MATERIALS: Use fire extinguishing materials appropriate for surrounding fire.

UNUSUAL FIRE AND EXPLOSION HAZARDS: Not Applicable

SPECIAL FIRE-FIGHTING PROCEDURES: Not Available



6. ACCIDENTAL RELEASE MEASURES

SPILL AND LEAK RESPONSE: Uncontrolled releases should be responded to by appropriately trained personnel using pre-planned procedures. Proper protective equipment should be used.

Remove all sources of ignition. Ventilate area of leak or spill. Keep unnecessary and unprotected people away from area of spill. Wear appropriate protective equipment as specified in section 8.

Spills Wear protective clothing and equipment. Never discharge directly into a lake, pond, stream, river, or other natural body of water. Sweep up and recycle into process if contamination does not present a problem. Use appropriate protective equipment if dust is generated or contact with eyes or skin is expected. Flush any residues down a sanitary sewer only.

US Regulations (CERCLA) require reporting spills and releases to soil, water and air in excess of reportable quantities. The toll free number for the US Coast Guard National Response Center is (800) 424-8802. U.S. Regulations (CERCLA) requires reporting spills and releases to soil, water and air in excess of reportable quantities.

7. HANDLING and STORAGE

WORK PRACTICES AND HYGIENE PRACTICES: As with all chemicals, avoid getting this product ON YOU or IN YOU. Wash thoroughly after handling this product. Do not eat, drink, smoke, or apply cosmetics while handling this product. Use in a well-ventilated location. Remove contaminated clothing immediately.

STORAGE AND HANDLING PRACTICES: All employees who handle this material should be trained to handle it safely. Avoid contact with eyes, skin, and clothing. Empty drums should be completely drained (triple rinsed), properly bunged, and promptly returned to a drum reconditioner, or disposed of properly. Open containers slowly on a stable surface. Containers of this product must be properly labeled. Storage areas of this product should be clearly identified, well-illuminated, clear of obstruction and accessible only to trained and authorized personnel. Store containers in a cool, dry location away from direct sunlight. Keep product from freezing. Keep container tightly closed when not in use. Observe all warnings and precautions listed for this product.

Use approved equipment for transportation of drums to avoid puncturing or rupturing. Do not use air pressure to transfer. After handling, always wash hands thoroughly with soap and water.

8. EXPOSURE CONTROLS - PERSONAL PROTECTION

VENTILATION AND ENGINEERING CONTROLS: Use with adequate ventilation to ensure exposure levels are maintained below the limits provided below. Use a chemical fume hood or local exhaust ventilation, and process enclosure if necessary, to control airborne dust. Ensure eyewash/safety shower stations are available near areas where this product is used.

EXPOSURE LIMITS/GUIDELINES:

CHEMICAL NAME	CAS #	EXPOSURE LIMITS IN AIR									
		ACGIH-TLVs		OSHA-PELs		NIOSH-RELs		NIOSH	AIHA WEELs		OTHER
		TWA ppm	STEL ppm	TWA ppm	STEL ppm	TWA ppm	STEL ppm	IDLH ppm	TWA ppm	STEL ppm	ppm
Potassium Hydroxide	1310-58-3	2.0 mg/M3 Ceiling	NE	2.0 mg/M3 Ceiling	C	NE	NE	NE	NE	NE	NE
Sodium Hydroxide	1310-73-2	2mg / M	NE	NE	NE	NE	NE	NE	NE	NE	NE
Sodium Metasilicate	6834-92-0	None	NE	None	NE	NE	NE	NE	NE	NE	NE
Nonyl Phenol Ethoxylate	12708-7-87-0	None	NE	Oxide Traces	NE	NE	NE	NE	NE	NE	NE

NE = Not Established.

NIC = Notice of Intended Change

See Section 16 for Definitions of Terms Used.

The following information on appropriate Personal Protective Equipment is provided to assist employers in complying with OSHA regulations found in 29 CFR Subpart I (beginning at 1910.132) or equivalent standard of Canada, or standards of EU member states (including EN 149 for respiratory PPE, and EN 166 for face/eye protection), and those of Japan. Please reference applicable regulations and standards for relevant details.

RESPIRATORY PROTECTION (NIOSH Approved): If the exposure limit is exceeded and engineering controls are not feasible, a half face piece particulate respirator (NIOSH type N95 or better filters) may be worn for up to ten times the exposure limit or the maximum use concentration specified by the appropriate regulatory agency or respirator supplier, whichever is lowest. A full-face piece particulate respirator (NIOSH type N100 filters) may be worn up to 50 times the exposure limit, or the maximum use concentration specified by the appropriate regulatory agency, or respirator supplier, whichever is lowest. If oil particles (e.g. lubricants, cutting fluids, glycerin, etc.) are present, use a NIOSH type R or P filter. For emergencies or instances where the exposure levels are not known, use a full-face piece positive-pressure, air-supplied respirator. **WARNING:** Air-purifying respirators do not protect workers in oxygen-deficient atmospheres.

EYE PROTECTION: Use chemical safety goggles and/or full face shield where dusting or splashing of solutions is possible. If necessary, refer to U.S. OSHA 29 CFR 1910.133, Canadian Standards, and the European Standard EN166, Australian Standards, or relevant Japanese Standards. Maintain eye wash fountain and quick drench facilities in the work area.

BODY PROTECTION: Wear impervious protective clothing, including boots, gloves, lab coat, apron or coveralls, as appropriate, to prevent skin contact. If necessary, refer to appropriate Standards of Canada, or appropriate Standards of the EU, Australian Standards, or relevant Japanese Standards. If a hazard of injury to the feet exists due to falling objects, rolling objects, where objects may pierce the soles of the feet or where employee's feet may be exposed to electrical hazards, use foot protection, as described in U.S. OSHA 29 CFR 1910.136.

VENTILATION SYSTEM: A system of local and/or general exhaust is recommended to keep employee exposures below the Airborne Exposure Limits. Local exhaust ventilation is generally preferred because it can control the emissions of the contaminant at its source, preventing dispersion of it into the general work area. Please refer to the ACGIH document, *Industrial Ventilation, A Manual of Recommended Practices*, most recent edition, for details.

9. PHYSICAL and CHEMICAL PROPERTIES

BULK DENSITY: No Data

SPECIFIC GRAVITY @ 20°C: 1.268 (Water=1)

SOLUBILITY IN WATER: 100%

VAPOR DENSITY (Air=1): No Data

ODOR: Mild Amine

% VOLATILES BY VOLUME @ 21°C (70°F): No Data

EVAPORATION RATE (n-BuAc=1): No Data

MELTING POINT: No Data

BOILING POINT: No Data

pH: 12.8 > <13.5

APPEARANCE and COLOR: Clear Dark Amber

VAPOR PRESSURE, mm Hg: No Data

10. STABILITY and REACTIVITY

STABILITY: Stable under normal conditions of use and storage.

DECOMPOSITION PRODUCTS: Heated to decomposition, it emits fumes of sodium oxide, temperatures above 884° evolve toxic sulfur oxides.

MATERIALS WITH WHICH SUBSTANCE IS INCOMPATIBLE: Because of the slight alkaline nature of this product, avoid contact with acids.

HAZARDOUS POLYMERIZATION: Will not occur.

CONDITIONS TO AVOID: Heat, moisture, incompatibles.

11. TOXICOLOGICAL INFORMATION

TOXICITY DATA: The specific toxicology data available for components greater than 1% in concentration are as follows.

SODIUM SILICATE	ORAL-MUSUS LD50	770 mg/kg
POTASSIUM HYDROXIDE	2 MG/M3 (CEILING)	2.0 MG/M3 (CEILING)
SODIUM HYDROXIDE	TLV 2mg / M	TLV 2mg / M

ROUTES OF ENTRY: Eye, skin contact, inhalation and ingestion.

TOXICITY TO ANIMALS: Not available.

CHRONIC EFFECTS ON HUMANS: Not available.

OTHER TOXIC EFFECTS ON HUMANS: Extremely hazardous in case of inhalation (lung corrosive). Very hazardous in case of skin contact (corrosive, irritant), of eye contact (corrosive), of ingestion.

SPECIAL REMARKS ON TOXICITY TO ANIMALS: Not available.

SPECIAL REMARKS ON CHRONIC EFFECTS ON HUMANS: May affect genetic material (mutagenic).

SPECIAL REMARKS ON OTHER TOXIC EFFECTS ON HUMANS: Acute Potential Health Effects: Skin: Causes severe skin irritation and burns. Eyes: Causes severe eye irritation and burns. May cause irreversible eye injury. Inhalation: Causes severe irritation and burns of the respiratory tract and mucous membranes. Irritation may lead to chemical pneumonitis Ingestion: Harmful if swallowed. May cause severe and permanent damage to the digestive tract. Causes severe irritation and burns of the gastrointestinal (digestive) tract with abdominal pain, vomiting and possible death. May cause perforation of the digestive tract. Chronic Potential Health Effects: Chronic contact with dilute solutions of potassium hydroxide can cause dermatitis. Inhalation can produce chronic productive cough, and shortness of breath.

12. ECOLOGICAL INFORMATION

ENVIRONMENTAL FATE: The high pH (alkalinity) of undiluted or un-neutralized material is harmful to aquatic life. All undiluted material should be kept out of any storm drains, creeks, rivers, estuaries, bays, seas, and oceans.

13. DISPOSAL CONSIDERATIONS

PREPARING WASTES FOR DISPOSAL: This alkaline material must be neutralized before disposal. Do not dump into sewers, on the ground, or into any body of water. Whatever cannot be saved for recovery for recycling should be managed in an appropriate and approved waste facility. Although not a listed RCRA hazardous waste, this material may exhibit one or more characteristics of a hazardous waste and require appropriate analysis to determine specific disposal requirements. Processing, use or contamination of this product may change the waste management options. Waste and container disposal must be in accordance with appropriate U.S. Federal, State, and local regulations, those of Canada, Australia, EU Member States and Japan.

14. TRANSPORTATION INFORMATION

DOT Classification: CORROSIVE LIQUID, BASIC, INORGANIC, N.O.S., (CONTAINING POTASSIUM HYDROXIDE, SODIUM HYDROXIDE), 8, UN 3266, PGII, ERG #154

15. REGULATORY INFORMATION**ADDITIONAL REGULATIONS:**

OSHA HAZARD COMMUNICATION RULE, 29 CFR 1910.1200: According to the OSHA Hazard Communication Standard this product is considered hazardous because it contains **POTASSIUM HYDROXIDE, SODIUM HYDROXIDE**

FEDERAL, STATE & INTERNATIONAL REGULATIONS - PART 1

SARA 313 INFORMATION: This product contains NO toxic chemicals subject to the reporting requirements of section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 and of 40 CFR 372. **POTASSIUM HYDROXIDE, SODIUM HYDROXIDE**

FEDERAL, STATE & INTERNATIONAL REGULATIONS - PART 2

CERCLA/SUPERFUND, 40 CFR 117, 302: This compound contains the following regulated compounds, subject to 40 CFR 117, 302. **POTASSIUM HYDROXIDE, SODIUM HYDROXIDE**

CALIFORNIA PROPOSITION 65: The following statement is made in order to comply with the California Safe Drinking Water and Toxic Enforcement Act of 1986: This product does not contain chemicals known to the State of California to cause cancer, birth defects, or other reproductive harm. [22 CCR 12705 (b)].

WHMIS: This MSDS has been prepared according to the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all of the information required by the CPR.

EUROPEAN ECONOMIC COMMUNITY INFORMATION:

EU LABELING AND CLASSIFICATION: This product meets the definition of the following hazard class as defined by the European Economic Community Guidelines.

EU CLASSIFICATION: Harmful if swallowed (Xn), Irritating to eyes (Xi)

EU RISK PHRASES: R, R34 Irritating to eyes.

EU SAFETY PHRASES: S 24/25 Avoid contact with skin and eyes.

**16. OTHER INFORMATION**

PREPARED BY: Donato Polignone

MSDS Authoring Services

DATE: April 16, 2011

This information is furnished without warranty, expressed or implied, except that it is accurate to the best knowledge of NuGeneration Technologies, LLC. The data on this sheet are related only to the specific material designated herein. NuGeneration Technologies, LLC assumes no legal responsibility for use or reliance upon this data.

End of MSDS