SAFETY DATA SHEET

KRATON

1. Identification

Product identifier UNI-REZ™ TP101

Other means of identification

SDS number 9215

Product Code 20000000850

Recommended use Industrial uses: Uses of substances as such or in preparations at industrial sites. Formulation

[mixing] of preparations and/or re-packaging (excluding alloys).

Recommended restrictions None known.

Manufacturer/Importer/Supplier/Distributor information

Company Arizona Chemical Company LLC

Address Building 100

4600 Touchton Road East, Suite 1200

City/State Jacksonville, FL

 Zip
 32246

 Country
 USA

 Phone Number
 904-928-8700

 Alternate Phone Number
 800-526-5294

 Fax Number
 904-928-8780

Emergency-US CHEMTREC 800-424-9300

2. Hazard(s) identification

Physical hazards Not classified.

Health hazards Not classified.

OSHA defined hazards Not classified.

Label elements

Hazard symbol None.
Signal word None.

Hazard statement The substance does not meet the criteria for classification.

Precautionary statement

Prevention Observe good industrial hygiene practices.

Response Wash hands after handling.

Storage Store away from incompatible materials.

Disposal Dispose of waste and residues in accordance with local authority requirements.

Hazard(s) not otherwise

classified (HNOC)

Static charges generated by emptying package in or near flammable vapor may cause flash fire.

Supplemental information None.

3. Composition/information on ingredients

Substances

Chemical name	Common name and synonyms	CAS number	%	
Polyamide Resin		Proprietary	99-100	

^{*}Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

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4. First-aid measures

Inhalation If exposed to excessive levels of dusts or fumes, remove to fresh air and get medical attention if

cough or other symptoms develop.

Skin contact If burned by contact with hot material, cool molten material adhering to skin as quickly as possible

with water, and see a physician for removal of adhering material and treatment of burn. Wash the skin immediately with soap and water. Get medical attention if irritation develops and persists.

Eye contact If hot product contacts eye, flush with water for at least 15 minutes and seek medical attention

immediately. Immediately flush eyes with plenty of water for at least 15 minutes. Remove contact

lenses, if present and easy to do. If eye irritation persists: Get medical advice/attention.

Ingestion Rinse mouth. Get medical attention if symptoms occur.

Most important

symptoms/effects, acute and delayed

Indication of immediate

medical attention and special treatment needed

Treat symptomatically.

General information Get medical attention if symptoms occur. Ensure that medical personnel are aware of the

Direct contact with eyes may cause temporary irritation.

material(s) involved, and take precautions to protect themselves.

5. Fire-fighting measures

Suitable extinguishing media

Unsuitable extinguishing media

Specific hazards arising from the chemical

Special protective equipment and precautions for firefighters

Fire fighting

equipment/instructions Specific methods

General fire hazards

Water fog. Water spray, dry chemical, carbon dioxide.

Do not use water jet as an extinguisher, as this will spread the fire.

Upon decomposition, this product emits carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons.

Self-contained breathing apparatus and full protective clothing must be worn in case of fire.

Wear suitable protective equipment. Move containers from fire area if you can do so without risk.

Use standard firefighting procedures and consider the hazards of other involved materials. Static charges generated by emptying package in or near flammable vapor may cause flash fire.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

Keep unnecessary personnel away. Avoid inhalation of fumes from molten product. Use a NIOSH/MSHA approved respirator if there is a risk of exposure to dust/fume at levels exceeding the exposure limits. Avoid contact with hot material. For personal protection, see section 8 of the SDS.

Methods and materials for containment and cleaning up **Environmental precautions**

Attempt to reclaim the free product, if this is possible. Collect and dispose of spillage as indicated in section 13 of the SDS.

Avoid discharge into drains, water courses or onto the ground.

7. Handling and storage

Precautions for safe handling

Avoid heat, sparks, open flames and other ignition sources. Do not smoke. Ground container and transfer equipment to eliminate static electric sparks. Avoid contact with hot material. Avoid breathing vapor from heated material. Avoid prolonged exposure. Avoid release to the environment. Observe good industrial hygiene practices. Follow all SDS/label precautions even after container is emptied because they may retain product residues.

Conditions for safe storage, including any incompatibilities Keep away from heat, sparks and open flame. Store in original tightly closed container. Keep containers closed when not in use. Store at ambient temperature and atmospheric pressure. Store away from incompatible materials (see Section 10 of the SDS).

8. Exposure controls/personal protection

Occupational exposure limits **Biological limit values**

Appropriate engineering controls

This substance has no PEL, TLV, or other recommended exposure limit.

No biological exposure limits noted for the ingredient(s).

Good general ventilation (typically 10 air changes per hour) should be used. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level. Ventilation should be sufficient to effectively remove and prevent buildup of any dusts or fumes that may be generated during handling or thermal processing.

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Individual protection measures, such as personal protective equipment

Eye/face protection Wear a face shield when working with molten material. Wear safety glasses with side shields (or

goggles).

Skin protection

Hand protection Wear appropriate chemical resistant gloves.

Wear suitable protective clothing and gloves. For molten product, use any type rubber thermal Other

insulating gloves and other clothing as necessary to protect from thermal burns.

If engineering controls do not maintain airborne concentrations below recommended exposure Respiratory protection

> limits (where applicable) or to an acceptable level (in countries where exposure limits have not been established), an approved respirator must be worn. Use a NIOSH/MSHA approved respirator

if there is a risk of exposure to dust/fume at levels exceeding the exposure limits.

Thermal hazards Wear appropriate thermal protective clothing, when necessary.





General hygiene considerations

Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants. Eye wash fountain and emergency showers are recommended.

9. Physical and chemical properties

Solid. **Appearance Physical state** Solid. Pellets. **Form** Color Amber. Odor Mild amine **Odor threshold** Not available. Ha Not available.

Melting point/freezing point Not available. Initial boiling point and boiling

range

Not available.

Flash point 519.8 °F (271.0 °C) Cleveland Open Cup Data is for similar product.

0 n-BuAc=1 estimated **Evaporation rate**

Flammability (solid, gas) Not available. Upper/lower flammability or explosive limits

Flammability limit - lower

(%)

Not available.

Flammability limit - upper

Not available.

Not available. Explosive limit - lower (%) Explosive limit - upper (%) Not available.

Vapor pressure < 0.001 mm Hg at 20°C

Vapor density Not available.

Relative density 0.97 at 25°C/25°C (water=1)

Solubility(ies)

< 0.1 % at 25°C Solubility (water) Not available. Partition coefficient

(n-octanol/water)

Auto-ignition temperature Not available. Not available. **Decomposition temperature**

4250 cP Brookfield at 190°C **Viscosity**

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Other information

Chemical family Polyamide Resin 970.00 kg/m3 Density

0 % by weight estimated Percent volatile Softening point 248 °F (120 °C) Ring & Ball

Weighted solids 100 %

10. Stability and reactivity

Reactivity The product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stability Material is stable under normal conditions. Possibility of hazardous This product may react with oxidizing agents.

reactions

Conditions to avoid Strong oxidizing agents. Heat, flames and sparks.

Incompatible materials Strong oxidizing agents.

Hazardous decomposition

products

Upon decomposition this product emits acrid dense smoke with carbon dioxide, carbon monoxide,

water and other products of combustion.

11. Toxicological information

Information on likely routes of exposure

Inhalation Inhalation of vapors/fumes generated by heating this product may cause respiratory irritation with

throat discomfort, coughing or difficulty breathing.

Skin contact Molten material will produce thermal burns.

Molten material will produce thermal burns. Fumes released during thermal processing may Eye contact

cause eye irritation.

Expected to be a low ingestion hazard. Ingestion

Symptoms related to the physical, chemical and toxicological characteristics Direct contact with eyes may cause temporary irritation.

Information on toxicological effects

Based on available data, the classification criteria are not met. Acute toxicity

Components Species **Test Results** Polyamide Resin **Acute** Oral

LD50 Rat

> 5000 mg/kg, 14 days At this dose no death occurred.;Data is for similar product.;

OECD 401

Skin corrosion/irritation Molten material will produce thermal burns.

Serious eye damage/eye

Molten material will produce thermal burns. Fumes released during thermal processing may cause eye irritation.

irritation

Respiratory sensitization Not available.

Skin sensitization This product is not expected to cause skin sensitization.

Sensitization

Respiratory or skin sensitization

Polyamide Resin Buehler Test, Not a skin sensitizer.; Data is for similar

product.; Result: Negative Species: Guinea pig

Organ: Skin

Germ cell mutagenicity Not available.

This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA. Carcinogenicity

IARC Monographs. Overall Evaluation of Carcinogenicity

Not listed.

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^{*} Estimates for product may be based on additional component data not shown.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not regulated.

US. National Toxicology Program (NTP) Report on Carcinogens

Not listed.

Reproductive toxicityThis product is not expected to cause reproductive or developmental effects.

Specific target organ toxicity -

Not classified.

single exposure

Specific target organ toxicity -

repeated exposure

Not classified.

Aspiration hazard

Not available.

12. Ecological information

Ecotoxicity The product is not classified as environmentally hazardous. However, this does not exclude the

possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Components		Species	Test Results
Polyamide Resin			
Acute			
	EC50	Bacteria (Pseudomonas putida)	> 1000 mg/l, 16 hr >> Water solubility; Data is for similar product.;
Aquatic			
Crustacea	NOEC	Water flea (Daphnia magna)	> 1000 mg/l, 48 hr Data is for similar product.; OECD 202;
Acute			
Crustacea	EL50	Water flea (Daphnia magna)	> 1000 mg/l, 48 hr >> Water solubility; Data is for similar product.: OECD 202:

^{*} Estimates for product may be based on additional component data not shown.

Persistence and degradability No data is available on the degradability of this product.

Bioaccumulative potential No data available.

Mobility in soil No data available.

Other adverse effects No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation

potential, endocrine disruption, global warming potential) are expected from this component.

13. Disposal considerations

Disposal instructionsCollect and reclaim or dispose in sealed containers at licensed waste disposal site.

Local disposal regulations Dispose in accordance with all applicable regulations.

Hazardous waste codeThe waste code should be assigned in discussion between the user, the producer and the waste

disposal company.

Waste from residues / unused

products

Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see:

Disposal instructions).

Contaminated packaging Empty containers should be taken to an approved waste handling site for recycling or disposal.

Since emptied containers may retain product residue, follow label warnings even after container is

emptied.

14. Transport information

DOT

Not regulated as dangerous goods.

IATA

Not regulated as dangerous goods.

IMDG

Not regulated as dangerous goods.

Transport in bulk according to Not available.

Annex II of MARPOL 73/78 and

the IBC Code

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15. Regulatory information

US federal regulations This product is not known to be a "Hazardous Chemical" as defined by the OSHA Hazard

Communication Standard, 29 CFR 1910.1200.

All components are on the U.S. EPA TSCA Inventory List.

TSCA Section 12(b) Export Notification (40 CFR 707, Subpt. D)

Not regulated.

CERCLA Hazardous Substance List (40 CFR 302.4)

Not listed.

SARA 304 Emergency release notification

Not regulated.

OSHA Specifically Regulated Substances (29 CFR 1910.1001-1050)

Not regulated.

Superfund Amendments and Reauthorization Act of 1986 (SARA)

Hazard categories Immediate Hazard - No

Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No

SARA 302 Extremely hazardous substance

Not listed.

SARA 311/312 Hazardous No

chemical

SARA 313 (TRI reporting)

Not regulated.

Other federal regulations

Clean Air Act (CAA) Section 112 Hazardous Air Pollutants (HAPs) List

Not regulated.

Clean Air Act (CAA) Section 112(r) Accidental Release Prevention (40 CFR 68.130)

Not regulated.

Safe Drinking Water Act

(SDWA)

NFPA ratings Health: 1

Flammability: 1 Instability: 0

Not regulated.

NFPA ratings



16. Other information, including date of preparation or last revision

 Issue date
 03-15-2015

 Revision date
 12-04-2016

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