







Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

1. PRODUCT AND COMPANY IDENTIFICATION

Product name : Dynasolve 190

Product Use Description : Polymer Remover

Manufacturer/Importer/Distribu

tor

: Versum Materials US, LLC

Exporter EIN No. 47-5632014

Emergency telephone number : 1-800-424-9300

(24h) (+1) 703-741-5970 (CHEMTREC)

2. HAZARDS IDENTIFICATION

GHS classification

Flammable liquids - Category 2
Acute toxicity - Oral Category 3
Acute toxicity - Inhalation Category 3
Acute toxicity - Dermal Category 3
Skin Corrosion/Irritation - Category 1B
Serious Eye Damage/Eye Irritation - Category 1
Specific target organ toxicity - single exposure - Category

GHS label elements

Hazard pictograms/symbols









Signal Word: Danger

Hazard Statements:

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

H225: Highly flammable liquid and vapour.

H301+H311+H331:Toxic if swallowed, in contact with skin or if inhaled

H314: Causes severe skin burns and eye damage.

H370: Causes damage to organs.

Precautionary Statements:

Prevention : P210:Keep away from heat, hot surfaces, sparks, open flames, and other

ignition sources. No smoking. P233:Keep container tightly closed.

P240:Ground/Bond container and receiving equipment.

P241:Use explosion-proof electrical/ventilating/lighting/equipment.

P242:Use only non-sparking tools.

P243:Take precautionary measures against static discharge.

P271:Use only outdoors or in a well-ventilated area. P260:Do not breathe dust/fume/gas/mist/vapours/spray. P270:Do not eat, drink or smoke when using this product.

P280:Wear protective gloves/protective clothing/eye protection/face protection.

P264:Wash hands thoroughly after handling.

Response : P301+P310 :IF SWALLOWED: Immediately call a POISON CENTER/doctor.

P330 :Rinse mouth.

P303+P361+P353 :IF ON SKIN (or hair): Remove/Take off immediately all

contaminated clothing. Rinse skin with water/shower.

P304+P340 :IF INHALED: Remove victim to fresh air and keep at rest in a

position comfortable for breathing.

P305+P351+P338 :IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P310 :Immediately call a POISON CENTRE/doctor.

P321 :Specific treatment (see on this label).

P370+P378: In case of fire, use recommended extinguishing media for

extinction.

Storage : P403+P235:Store in a well-ventilated place. Keep cool.

P405:Store locked up.

Disposal : P501:Disposal of contents/container to be specified in accordance with

regulations.

Hazards not otherwise classified

None known.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Components	CAS Number	Concentration (Weight)
Methyl alcohol	67-56-1	60% - 80 %

2/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Potassium Hydroxide	1310-58-3	5% - 7 %

4 FIRST AID MEASURES

General advice : Seek medical advice. If breathing has stopped or is labored, give assisted

respirations. Supplemental oxygen may be indicated. If the heart has stopped, trained personnel should begin cardiopulmonary resuscitation immediately.

Eye contact : Hold eyelids apart, initiate and maintain gentle and continuous irrigation care is

not promptly available, continue to irrigate for one hour.

Skin contact : Immediately remove contaminated clothing, and any extraneous chemical, if

possible to do so without delay. Flush immediately with copious amounts of water. Initiate and maintain continuous irrigation until the patient receives medical care. If medical care is not promptly available, continue to irrigate for

one hour. Cover wound with sterile dressing.

Ingestion : Medical care must emphasize the control of acidosis and the use of intravenous

bicarbonate has been lifesaving. Evidence is good that treatment of methanol absorption is enhanced through the administration of ethanol, which should be given to produce a blood level of at least 0.1%. Ethanol diminishes the production of toxic metabolites of methanol. Blood methanol level of 50 mg/100mL is an indication for hemodialysis, which has improved the prognosis

mg/100mL is an indication for hemodialysis, which has improved the prognosis of methanol intoxication. Methanol is often confused with beverage alcohol (ethylalcohol). Care must cause of methanol poisoning. Never give anything by mouth to an unconscious person. Do not induce vomiting without medical

advice. Prevent aspiration of vomit. Turn victim's head to the side.

Inhalation : If breathing has stopped or is labored, give assisted respirations. Supplemental

oxygen may be indicated. If the heart has stopped, trained personnel should begin cardiopulmonary resuscitation immediately. If unconscious place in

recovery position and seek medical advice. Move to fresh air.

Most important

symptoms/effects - acute and

delayed

: Asthma. Eye disease. Skin disorders and Allergies. Neurological disorders

Immediate Medical Attention and Special Treatment

Risks : In case of ingestion or massive inhalation, obser ve victim as an inpatien hours

between exposure and acidosis and blindness

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media : Alcohol-resistant foam.

Carbon dioxide (CO2).

Dry chemical. Dry sand.

Limestone powder.

Specific hazards : Incomplete combustion may form carbon monoxide. Flash back possible over

3/11

Versum Materials US,LLC Dynasolve 190

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

considerable distance. Fire or intense heat may cause violent rupture of packages. Burning produces noxious and toxic fumes. May form explosive mixtures in air. Downwind personnel must be evacuated.

Special protective equipment

for fire-fighters

: Avoid contact with the skin. A face shield should be worn. Use personal

protective equipment. Wear self contained breathing apparatus for fire fighting if

necessary.

Further information : Fire residues and contaminated fire extinguishing water must be disposed of in

accordance with local regulations., Do not allow run-off from firefighting to enter

drains or water courses.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment, and Emergency Procedures : Remove all sources of ignition. Use self-contained breathing apparatus and

chemically protective clothing. Evacuate personnel to safe areas.

Environmental precautions : Local authorities should be advised if significant spillages cannot be contained.

Prevent spilled product from entering streams or drinking water supplies. Shut

off or remove all ignition sources. Construct a dike to prevent spreading.

Methods for cleaning up : Absorb with inert absorbent materials such as: Dry sand. Vermiculite. Activated

charcoal. Approach suspected leak areas with caution. Call Emergency Response number for advice. Place in appropriate chemical waste container.

Additional advice : If possible, stop flow of product.

7. HANDLING AND STORAGE

Handling

Avoid contact with skin and eyes. Emergency showers and eye wash stations should be readily accessible. Adhere to work practice rules established by government regulations. See "Flammable and Combustible Liquid Code" NFPA No. 30, National Fire Protection Association, Boston, MA. Use personal protective equipment. When using, do not eat, drink or smoke.

Storage

Keep containers tightly closed in a dry, cool and well-ventilated place. To avoid ignition of vapors by static electricity discharge, all metal parts of the equipment must be grounded. Keep away from heat and sources of ignition. Keep away from oxidizers.

Technical measures/Precautions

Keep away from open flames, hot surfaces and sources of ignition.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

4/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Engineering measures

Provide readily accessible eye wash stations and safety showers.

Provide natural or explosion-proof ventilation adequate to ensure concentrations are kept below exposure limits.

Personal protective equipment

Respiratory protection : Wear appropriate respirator when ventilation is inadequate.

Hand protection : Neoprene gloves.

Chemical-resistant, impervious gloves complying with an approved standard

should be worn at all times when handling chemical products if a risk

assessment indicates this is necessary.

Eye protection : Full face shield with goggles underneath.

Skin and body protection : Impervious clothing.

Rubber or plastic boots.

Slicker Suit.

Environmental exposure

controls

: Local authorities should be advised if significant spillages cannot be contained.

Prevent spilled product from entering streams or drinking water supplies. Shut

off or remove all ignition sources.

Special instructions for

protection and hygiene

: Remove contaminated clothing. Drench affected area with water for at least 15 minutes. Wash hands at the end of each workshift and before eating, smoking

or using the toilet. Provide readily accessible eye wash stations and safety

showers.

Exposure limit(s)

Methyl alcohol	Time Weighted Average (TWA): ACGIH	200 ppm	-
Methyl alcohol	Short Term Exposure Limit (STEL): ACGIH	250 ppm	-
Methyl alcohol	Short Term Exposure Limit (STEL): NIOSH	250 ppm	325 mg/m3
Methyl alcohol	Recommended exposure limit (REL): NIOSH	200 ppm	260 mg/m3
Methyl alcohol	Permissible exposure limit: OSHA Z1	200 ppm	260 mg/m3
Potassium Hydroxide	Ceiling Limit Value: ACGIH	-	2 mg/m3
Potassium Hydroxide	Ceiling Limit Value and Time Period (if specified): NIOSH	-	2 mg/m3

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance : Liquid. Blue

Odor : No data available.

Odor threshold : No data available.

5/11

Versum Materials US,LLC Dynasolve 190

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

pH : No data available.

Melting point/range : No data available.

Boiling point/range : 149 °F (65 °C)

Flash point : $54 \,^{\circ}\text{F} \, (12 \,^{\circ}\text{C})$

Evaporation rate : No data available.

Flammability (solid, gas) : Refer to product classification in Section 2

Upper/lower

explosion/flammability limit

: No data available.

Vapor pressure : 72.18 mmHg

Water solubility : Completely soluble.

Relative vapor density : No data available.

Relative density : 0.84 (water = 1)

Partition coefficient: noctanol/water [log Kow] : No data available.

Auto-ignition temperature : No data available.

Decomposition temperature : No data available.

Viscosity : No data available.

: No data available.

Density : 52.440 lb/ft3 (0.84 g/cm3)

10. STABILITY AND REACTIVITY

Chemical Stability : Stable under normal conditions.

Conditions to avoid : Heat, flames and sparks.

Materials to avoid : Reactive metals (e.g. sodium, calcium, zinc etc.).

Materials reactive with hydroxyl compounds.

Acids.

Oxidizing agents.

Hazardous decomposition

products

: Carbon monoxide. Carbon dioxide (CO2).

6/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Aldehydes

Flammable hydrocarbon fragments.

Possibility of hazardous Reactions/Reactivity

: No data available.

11. TOXICOLOGICAL INFORMATION

11.1. Information on toxicological effects

Likely routes of exposure

Effects on Eye : Causes eye burns. May cause blindness.

Effects on Skin : Toxic in contact with skin. Causes skin burns. If absorbed through the skin, may

cause central nervous system effects, such as headache, nausea, dizziness,

confusion, breathing difficulties.

Inhalation Effects : Toxic by inhalation. Can cause severe eye, skin and respiratory tract burns.

Inhalation of aerosol may cause irritation to the upper respiratory tract. May cause central nervous system effects, such as headache, nausea, dizziness, confusion, breathing difficulties. Severe cases of overexposure can result in

respiratory failure.

Ingestion Effects : Toxic if swallowed. If ingested, severe burns of the mouth and throat, as well as

a danger of perforation of the oesophagus and the stomach. Can cause optic

nerve damage and blindness.

Symptoms : No data available.

Acute toxicity

Acute Oral Toxicity : No data is available on the product itself.

Acute Oral Toxicity - Components

Methyl alcohol LD50 : 5,628 mg/kg Species : Rat Potassium Hydroxide LD50 : 273 mg/kg Species : Rat

Inhalation : No data is available on the product itself.

Inhalation - Components

Methyl alcohol LC50 (1 h): > 84 mg/l Species: Rat

Acute Dermal Toxicity : No data is available on the product itself.

Acute Dermal Toxicity - Components

Methyl alcohol LD50 : 16,000 mg/kg Species : Rabbit Potassium Hydroxide LD50 : 1,260 mg/kg Species : Rabbit

Skin corrosion/irritation : Causes skin burns.

7/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Serious eye damage/eye

irritation

: Risk of serious damage to eyes.

Sensitization. : No data available.

Chronic toxicity or effects from long term exposures

Carcinogenicity : No data available.

Reproductive toxicity : No data is available on the product itself.

Germ cell mutagenicity : No data is available on the product itself.

Specific target organ systemic

toxicity (single exposure)

: Causes damage to organs., Central nervous system., Can cause optic nerve

damage and blindness.

Specific target organ systemic

toxicity (repeated exposure)

: No data available.

Aspiration hazard : No data available.

Delayed and Immediate Effects and Chronic Effects from Short and Long Term Exposure

This product contains no listed carcinogens according to IARC, ACGIH, NTP and/or OSHA in concentrations of 0.1 percent or greater. Asthma., Eye disease., Skin disorders and Allergies., Neurological disorders

Methanol has relatively low acute toxicity in non-primates, but causes profound species-specific toxicity dependent on the extent to which formate accumulates. Sensitive primate species develop increased blood formate concentrations after methanol exposure, while rodents, rabbits and dogs do not. Exposure of non-primate lab animals to high methanol doses result in Central Nervous System (CNS) depression. Toxic effects in primates including metabolic acidosis and ocular toxicity, effects not normally found in lower animals.

12. ECOLOGICAL INFORMATION

Ecotoxicity effects

Aquatic toxicity : No data is available on the product itself.

Toxicity to fish - Components

Methyl alcohol EC 50 (48 h): 13,200 mg/l Species: Rainbow

Trout

Methyl alcohol EC 50 (48 h): 16,000 mg/l Species: Bluegill

(Lepomis macrochirus)

Potassium Hydroxide LC50 (96 h): 10 mg/l Species: Fish

Toxicity to daphnia - Components

Methyl alcohol EC 50 (48 h): > 10,000 mg/l Species: Daphnia

8/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Toxicity to other organisms : No data available.

Persistence and degradability

Biodegradability : No data is available on the product itself.

Mobility : No data available.

Bioaccumulation : No data is available on the product itself.

Bioaccumulation - Components

Methyl alcohol Negligible bioaccumulation potential.

13. DISPOSAL CONSIDERATIONS

Waste from residues / unused

products

: Contact supplier if guidance is required.

Contaminated packaging : Dispose of container and unused contents in accordance with federal, state,

and local requirements.

14. TRANSPORT INFORMATION

DOT

UN/ID No. : UN2924

Proper shipping name : Flammable liquids, corrosive, n.o.s., (Methyl alcohol, Potassium Hydroxide)

Class or Division : 3
Packing group : II
Label(s) : 3 (8)
Marine Pollutant : No

IATA

UN/ID No. : UN2924

Proper shipping name : Flammable liquid, corrosive, n.o.s., (Methyl alcohol, Potassium Hydroxide)

Class or Division : 3
Packing group : II
Label(s) : 3 (8)
Marine Pollutant : No

IMDG

UN/ID No. : UN2924

Proper shipping name : FLAMMABLE LIQUID, CORROSIVE, N.O.S., (Methyl alcohol, Potassium

Hydroxide)

Class or Division : 3

9/11

Versum Materials US,LLC Dynasolve 190

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

Packing group : II Label(s) : 3 (8) Marine Pollutant : No

TDG

UN/ID No. : UN2924

Proper shipping name : FLAMMABLE LIQUID, CORROSIVE, N.O.S., (Methyl alcohol, Potassium

Hydroxide)

Class or Division : 3
Packing group : II
Label(s) : 3 (8)
Marine Pollutant : No

Further Information

The transportation information is not intended to convey all specific regulatory data relating to this material. For complete transportation information, contact customer service.

15. REGULATORY INFORMATION

Toxic Substance Control Act (TSCA) 12(b) Component(s):

None.

Country	Regulatory list	Notification
USA	TSCA	Included on Inventory.
EU	EINECS	Included on EINECS inventory or polymer substance, monomers included on EINECS inventory or no longer polymer.
Canada	DSL	Included on Inventory.
Australia	AICS	Included on Inventory.
Japan	ENCS	Not on Inventory.
South Korea	ECL	Included on Inventory.
China	SEPA	Included on Inventory.
Philippines	PICCS	Included on Inventory.

EPA SARA Title III Section 312 (40 CFR 370) Hazard Classification

Fire Hazard. Acute Health Hazard

EPA SARA Title III Section 313 (40 CFR 372) Component(s) above 'de minimus' level Methyl alcohol

US. California Safe Drinking Water & Toxic Enforcement Act (Proposition 65)

WARNING! This product contains a chemical known in the State of California to cause birth defects or other reproductive harm.

Methyl alcohol

10/11

Versum Materials US,LLC

Version 1.0 Revision Date 02/14/2019 SDS Number 300000078618 Print Date 04/08/2019

16. OTHER INFORMATION

HMIS Rating

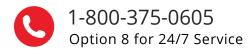
Health : 3 Flammability : 3 Physical hazard : 0

Prepared by : Versum Materials, Product Regulatory Department

Preparation Date : 04/08/2019

For additional information, please visit Versum Materials' Product Stewardship web site. http://www.versummaterials.com/productstewardship/







6550 Oley Speaks Way Canal Winchester, OH 43110



www.RudolphBros.Com RBCsupport@RudBro.Com