

Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

- · 1.1 Product identifier
- · Trade name: Radio Control Model Fuel
- · CAS Number: Mixture has not provided a specific number.
- · Registration number

The last digit registration number are not reported (replaced with xxx) as identifiers of the registrant. Will be transmitted at the request of the competent authority.

Mixture composed of raw materials registered under the REACH regulation.

- · 1.2 Relevant identified uses of the substance or mixture and uses advised against
- · Sector of Use SU21 Consumer uses: Private households / general public / consumers
- · Process category

PROC16 Using material as fuel sources, limited exposure to unburned product to be expected

- · Application of the substance / the mixture Industrial solvent
- · 1.3 Details of the supplier of the safety data sheet
- · Manufacturer/Supplier:
- · P.S.P. Passerini Special Products
- · Via della Stazione, 12-14-16 CAP 27020 Parona (PV) Italy
- Tel.: +39 (0)384/255320 • Fax: +39 (0)384/253443 www.runnertime.com
- · Further information obtainable from:

Product safety department info@runnertime.com

· 2.1 Classification of the substance or mixture

· Classification according to Regulation (EC) No 1272/2008



GHS02 flame

Flam. Liq. 2 H225 Highly flammable liquid and vapour.



GHS06 skull and crossbones

Acute Tox. 3 H301 Toxic if swallowed.

Acute Tox. 3 H311 Toxic in contact with skin.

Acute Tox. 3 H331 Toxic if inhaled.



GHS08 health hazard

STOT SE 1 H370 Causes damage to organs.

- · 2.2 Label elements
- · Labelling according to Regulation (EC) No 1272/2008

The product is classified and labelled according to the CLP regulation.

· Hazard pictograms







GHS02

GHS06

GHS08



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 1)

· Signal word Danger

· Hazard-determining components of labelling:

methanol

nitromethane

· Hazard statements

H225 Highly flammable liquid and vapour.

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

H370 Causes damage to organs.

· Precautionary statements

P101 If medical advice is needed, have product container or label at hand.

P102 Keep out of reach of children.

P103 Read label before use.

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

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

P307+P311 IF exposed: Call a POISON CENTER or doctor/physician.

P405 Store locked up.

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

P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

· 2.3 Other hazards

Flammable liquid. In use may form flammable or explosive mixtures with air. During the pumping causes static. ESD can cause fires.

Vapour accumulation could flash and / or explode if ignited.

- · Results of PBT and vPvB assessment See Section 12 Ecological Information.
- · PBT: Not applicable.
- · vPvB: Not applicable.

· 3.2 Chemical characterisation: Mixtures

· Description: Mixture of substances listed below with nonhazardous additions.

· Dangerous compone	nts:	
CAS: 67-56-1	methanol	88-100%
EINECS: 200-659-6	Flam. Liq. 2, H225; Acute Tox. 3, H301; Acute Tox. 3, H311; Acute	
	Tox. 3, H331; 🍑 STOT SE 1, H370	
CAS: 75-52-5	nitromethane	10-25%
EINECS: 200-876-6	❤ Flam. Liq. 3, H226; ❤ Acute Tox. 4, H302	

- · SVHC There are no substances in Annex XIV of EC Regulation 1907/2006.
- · Additional information: For the wording of the listed hazard phrases refer to section 16.

· 4.1 Description of first aid measures

· General information:

Immediately remove any clothing soiled by the product.

Remove breathing equipment only after contaminated clothing have been completely removed.

In case of irregular breathing or respiratory arrest provide artificial respiration.

· After inhalation:

Supply fresh air or oxygen; call for doctor.

In case of unconsciousness place patient stably in side position for transportation.

If breathing has stopped, assist ventilation with mechanical device or use mouth-to-mouth.

(Contd. on page 3)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 2)

For those providing assistance, avoid exposure to themselves and others. Use adequate respiratory protection. In case of respiratory irritation, nausea, dizziness or unconsciousness occurs, seek immediate medical assistance.

· After skin contact:

Immediately wash with water and soap and rinse thoroughly.

Remove contaminated clothing immediately.

Wash contaminated clothing before using them.

· After eye contact:

Rinse opened eye for several minutes under running water. Then consult a doctor.

Immediately flush eyes with copious amounts of water, occasionally lifting the upper and lower eyelids. Verify the presence of contact lenses and in that case, remove them. Continue to rinse for at least 10 minutes. Consult a doctor.

· After swallowing:

Do not induce vomiting; call for medical help immediately.

If swallowed, seek immediate medical attention.

· 4.2 Most important symptoms and effects, both acute and delayed

Headache, dizziness, drowsiness, nausea and other effects on the central nervous system.

· Information for doctor:

If ingested, material may be aspirated into the lungs and cause chemical pneumonitis. Treat appropriately.

· Hazards

It can form explosive mixtures with air.

Burning produces heavy smoke.

Combustion can generate carbon monoxide, hydrogen and formaldehyde .

The vapors are heavier than air and may spread along floors.

· 4.3 Indication of any immediate medical attention and special treatment needed

Medical supervision for at least 48 hours.

· 5.1 Extinguishing media

· Suitable extinguishing agents:

CO2, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

· 5.2 Special hazards arising from the substance or mixture

Can form explosive gas-air mixtures.

During heating or in case of fire poisonous gases are produced.

In case of fire, it can develop hazardous substances due to thermal decomposition, such as: Carbon dioxide (CO2) Carbon monoxide.

· 5.3 Advice for firefighters

Promptly isolate the scene by removing all persons from the vicinity of a fire. There will be no action taken involving any personal risk or without suitable training. Move containers from fire area if there is no risk. Use water spray to keep fire-exposed containers cool. This material is very toxic to aquatic organisms. Fire water contaminated with this material must be contained and must prevent access to any waterway, sewer or drain.

· Protective equipment:

Mouth respiratory protective device.

Do not inhale explosion gases or combustion gases.

Wear fully protective suit.

Keep people away without adequate equipment.

· Additional information

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Highly flammable liquid. In case of fire or overheating, will occur a pressure increase and the container may burst, with the risk of a subsequent explosion. The vapor or gas is heavier than air and can spread on the floor. Vapors may accumulate in low or confined areas or travel a considerable distance to source of ignition and flash back. Runoff to sewer may create fire or explosion.

(Contd. on page 4)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 3)

Use extinguishing measures that are appropriate to local circumstances and the environment.

· 6.1 Personal precautions, protective equipment and emergency procedures

Mount respiratory protective device.

Wear protective equipment. Keep unprotected persons away.

In the event of a spill or accidental release, notify relevant authorities in accordance with all applicable regulations.

Work gloves (preferably long gloves) that ensure adequate resistance to chemicals.

· 6.2 Environmental precautions:

Do not allow product to reach sewage system or any water course.

Do not allow to enter sewers/ surface or ground water.

Do not flush into surface water or sanitary sewer system.

· 6.3 Methods and material for containment and cleaning up:

Dispose contaminated material as waste according to item 13.

Ensure adequate ventilation.

Stop leak if without risk. Move containers from the spill. Approach the release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible absorbent materials, eg sand, earth, vermiculite or diatomaceous earth and dispose of them. Use spark-proof tools and explosion proof equipment. Contaminated absorbent material may pose the same hazard as the spilled product.

· 6.4 Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

· 7.1 Precautions for safe handling

Before making transfer operations, assure that there are no containers incompatible materials.

Ensure good ventilation/exhaustion at the workplace.

Open and handle receptacle with care.

Prevent formation of aerosols.

Wear suitable respiratory protective device when decanting larger quantities without extractor facilities.

Ensure good interior ventilation, especially at floor level. (Fumes are heavier than air).

Avoid contact with skin.

Prevent small spills and leakage to avoid slip hazard. Material can accumulate static charges which can cause a spark (ignition source). When the material is handled in a bulk container, a source of ignition can ignite flammable vapors or residues that may be present (eg. During the operations of loading / unloading). Use appropriate procedures for storage and grounding. However, storage and grounding can not remove the risk of electrostatic accumulation. Consult the guidelines for the local standards applicable. Additional indications American Petroleum Institute 2003 (Protection Against Ignitions Arising out of Static, Lightning and Stray Currents) o National Fire Protection Agency 77 (Recommended Practice on Static Electricity) or CENELEC CLC/TR 50404 (Electrostatics - Code of practice for the avoidance of hazards due to static electricity).

Do not eat, drink or smoke during work.

Do not use electrical devices (mobile phones, etc.) is not approved for use, according to the risk characteristics of the area.

Do not use compressed air for filling, discharging or handling.

During transfer operations and mixing, ensure proper grounding of equipment and prevent the accumulation of electrical charges.

This material is a static accumulator.

· Information about fire - and explosion protection:

Keep away from sources of ignition.

(Contd. on page 5)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 4)

Keep ignition sources away - Do not smoke.

Protect from heat.

Protect against electrostatic charges.

Keep respiratory protective device available.

· 7.2 Conditions for safe storage, including any incompatibilities

· Storage:

Requirements to be met by storerooms and receptacles:

Use only receptacles specifically permitted for this substance/product.

Do not store with strong oxidizing agents.

Provide ventilation for receptacles.

Store only in the original receptacle.

Store in a cool location.

· Information about storage in one common storage facility:

Do not store in the proximity of oxidising substances, self-reactive.

Keep away from: strong oxidants.

· Further information about storage conditions:

Keep container tightly sealed.

Store in cool, dry conditions in well sealed receptacles.

Pay particular attention to the accumulation in pits and confined spaces.

If the product is supplied in containers: Keep containers tightly closed and properly labeled. Keep only in original containers or in containers suitable for the type of product.

Store away from direct sunlight and other heat sources.

Open slowly in order to control possible pressure release.

Empty containers may contain flammable product residues. Do not weld, solder, drill, cut, or incinerate empty containers unless they have not been properly cleaned.

· 7.3 Specific end use(s)

ES1 Manufacture of the substance / Use as an intermediate / use in chemical processes.

ES2: Distribution of the substances.

ES3: Formulation and re-packing of the substance and mixtures.

ES4: Industrial use as fuel.

ES5: Professional use as fuel.

ES8 Use in functional fluids

ES9 Use in functional fluids (professional)

ES14a: Indoor use as fuel (use domestic / hobby eg engines , fondues , etc.) by the consumer .

ES14b: Outdoor use as fuel (gasoline additive).

Refer to Chapter 16 and / or attachments for any use registered under the REACH Regulation.

Industrial and Professional: see the relevant exposure scenarios

Consumer: consult the relevant exposure scenarios

· Additional information about design of technical facilities:

The level of protection and types of controls necessary will vary depending on the conditions of potential exposure.

Control measures to consider:

Provide adequate ventilation so as not to exceed exposure limits.

Use explosion-proof ventilation.

(Contd. on page 6)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 5)

· 8.1 Control parameters		
· Ingredients with limit values that require monitori	ng at the workplace:	
67-56-1 methanol		
WEL Short-term value: 333 mg/m³, 250 ppm		
Long-term value: 266 mg/m³, 200 ppm		
Sk		
75-52-5 nitromethane		
WEL Short-term value: 381 mg/m³, 150 ppm		
Long-term value: 254 mg/m³, 100 ppm		
· DNELs		
67-56-1 methanol		
Dermal DNEL 40 mg/kg (-)		
Inhalative DNEL 260 mg/m³ (-)		
PNECs		
67-56-1 methanol		
PNEC Acqua/Water (Acqua dolce;Soft water) 154 mg/l (-)		
PNEC Acqua/Water (Acqua marina; Marine water) 15.4 mg/l (-)		
PNEC Acqua/Water (Intermittent release) 1540 mg/l (-)		

- · Additional information: The lists valid during the making were used as basis.
- · 8.2 Exposure controls

PNEC Sewage

- · Personal protective equipment:
- · General protective and hygienic measures:

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing

Wash hands before breaks and at the end of work.

Store protective clothing separately.

Avoid contact with the eyes and skin.

· Respiratory protection:

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.

570.4 (-)

For high airborne concentrations, use an approved supplied-air respirator, operated in positive pressure. Supplied air respirators with an escape bottle may be appropriate when oxygen levels are inadequate, the risk of gas / vapors are low, and if the capacity / rating of the air purifying filter can be overcome.

In case of exposure to levels above the standard values recommended the use of a filter respirator to cover part of the face material of the filter type A, the European Committee for Standardization (CEN) standards EN 136, 140 and 145 provide recommendations on masks, as well as EN 149 and 143 of the filters.

· Protection of hands:



Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation. Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

· Material of gloves

Butyl rubber, BR

Nitrile rubber, NBR

Contaminated gloves should be replaced.

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the

(Contd. on page 7)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 6)

resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

· Penetration time of glove material

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

· Eye protection:



Tightly sealed goggles

If contact is likely, we recommend the use of safety glasses with side shields.

- · **Body protection:** Protective work clothing
- · Limitation and supervision of exposure into the environment

If engineering controls do not maintain airborne contaminant concentrations at a level adequate to protect worker health, you should use an appropriate respirator. The respirator must be selected, used and maintained in accordance with regulatory requirements.

· Risk management measures

Provide near a system for eyewash.

The Local guidelines on emission limits for volatile substances must be respected in the exhaust air containing vapor.

The level of protection and types of controls necessary will vary depending upon potential exposure conditions. Select the most appropriate controls, based on an assessment of the hazards. Appropriate control measures include: Adequate ventilation to control the concentration of airborne particles. The suction system must be designed relatively to local conditions, the air should always be aspirated from the source of production of the vapors and the person working there. Eye wash and emergency showers. We recommend that monitors fire prevention and fire deluge systems.

General Information	and chemical properties The following are the typical values of the substance or preparation
General Information	For more details see the Technical Specifications.
Appearance:	1 of more details see the Teelimear Specifications.
Form:	Fluid
Colour:	Colourless
Odour:	Characteristic
Odour threshold:	10 ppm – 20000 ppm (Meditext, 2003, AIHA, 2002)
pH-value:	Not determined.
Change in condition	
Melting point/Melting range:	Undetermined.
Boiling point/Boiling range:	64 °C
Flash point:	11 °C
Flammability (solid, gaseous):	Not applicable.
Ignition temperature:	415 °C
Decomposition temperature:	Not determined.
Self-igniting:	Product is not selfigniting.
Danger of explosion:	Heating may cause an explosion.
Explosion limits:	
Lower:	5.5 Vol %

(Contd. on page 8)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

	(Contd. of p
Upper:	63.0 Vol %
· Vapour pressure at 20 °C:	128 hPa
· Density at 20 °C:	0.852 g/cm³
· Relative density	Not determined.
· Vapour density	Heavier than air.
· Evaporation rate	Not determined.
· Solubility in / Miscibility with	
water:	Not miscible or difficult to mix.
· Partition coefficient (n-octanol/	(water): Not determined.
· Viscosity:	
Dynamic:	Not determined.
Kinematic:	Not determined.
· Solvent content:	
Organic solvents:	80.0 %
VOC (EC)	80.00 %
· 9.2 Other information	No further relevant information available.

· 10.1 Reactivity

Flammable liquid.

It may react with some plastics, rubber and coatings.

- 10.2 Chemical stability The product is stable in relation to its intrinsic characteristics.
- · Thermal decomposition / conditions to be avoided:

It may react explosively with sodium methoxide in chloroform and diethyl zinc .

It can react violently with alkyls of aluminum salts, acetyl bromide, sodium hydroxide in chloroform, cyanuric chloride, nitric acid .

It can react violently with oxidizing agents.

Not hazardous reactions are foreseeable (in normal conditions of storage and handling).

· 10.3 Possibility of hazardous reactions

Contact with strong oxidizers (eg, peroxides and chromates) can cause a fire hazard.

A mixture with nitrates or other strong oxidizing agents (such as chlorates, perchlorates and liquid oxygen) may generate an explosive mass.

· 10.4 Conditions to avoid

Keep away from open flames, hot surfaces and sources of ignition. Avoid the accumulation of electrostatic charges. Do not smoke.

· 10.5 Incompatible materials:

Strong acids, acid chlorides, acid anhydrides, alkali metals, oxidizing agents, reducing agents .

· 10.6 Hazardous decomposition products: No dangerous decomposition products known.

· 11.1 Information on toxicological effects

· Acute toxicity

Toxic if swallowed, in contact with skin or if inhaled.

· LD/LC5	O values relevant for classification:
67-56-1 1	methanol
Oral	LD50 1187 - 2769 mg/kg (rat)

(Contd. on page 9)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

		(Contd. of page 8)
Dermal	LD50	17000 mg/kg (rabbit)
Inhalat	ive CL50	128.2 mg/l, 48h (rat)
75-52-5	5 nitromet	hane
Oral	LD50	940 mg/kg (rat)

- · Specific symptoms in biological assay: Methanol is not irritating to the skin.
- · Primary irritant effect:
- · Skin corrosion/irritation Based on available data, the classification criteria are not met.
- · Serious eye damage/irritation Based on available data, the classification criteria are not met.
- · Respiratory or skin sensitisation

The Guinea Pig Maximization Test showed no evidence of sensitization by contact after the administration of doses to $50\,\%$

· Additional toxicological information:

The product is very volatile, even at normal temperatures. Exposure to high vapor concentrations, particularly in enclosed or poorly ventilated areas, may cause respiratory irritation, nausea, malaise, and dizziness, and even loss of consciousness.

High concentrations of vapors may cause: headache, nausea, dizziness. Aspiration into the lungs may cause chemical pneumonitis.

· Acute effects (acute toxicity, irritation and corrosivity)

May be fatal if swallowed and enters airways. In relation to the physical-chemical properties of the material.

· CMR effects (carcinogenity, mutagenicity and toxicity for reproduction)

Nitromethane - The carcinogenicity to humans is not applicable. The agent shows an inappropriate classification for man but with proven lack of carcinogenicity to animals, firmly supported by other.

- · Germ cell mutagenicity Based on available data, the classification criteria are not met.
- · Carcinogenicity Based on available data, the classification criteria are not met.
- Reproductive toxicity Based on available data, the classification criteria are not met.
- · STOT-single exposure

The minimal acute fatal dose of methanol for humans is considered to be between 300 to 1000 mg / kg per ingestion . The minimum dose capable of causing permanent visual defects is unknown . (IPCS / WHO (1997))

Causes damage to organs.

- · STOT-repeated exposure Based on available data, the classification criteria are not met.
- · Aspiration hazard

LOAEL (Ocular toxicity) intraperitoneal = 5000 mg / kg bw for rats (NOAEL is not identified)

The methanol poisoning symptoms, which may not occur before an asymptomatic period of 12-24 hours, include visual disturbances, nausea, abdominal and muscle pain, dizziness, weakness, coma and convulsions. Visual disturbances usually develop 12 to 48 hours after ingestion of methanol and range from weak photophobia and blurred vision in marked reduction of visual acuity and blindness. In extreme cases, death. (IPCS / WHO (1997))

· 12.1 Toxicity

· Aquatic toxicity:

67-56-1 methanol

EC50 > 10000 mg/l, 48h (Daphnia Magna)

IC50 ca. 22000 mg/l (72 ore) (Pseudokirchneriella subcapitata)

EC50 15400 - 29400 mg/l 96h (pes)

· 12.2 Persistence and degradability

The mixture is easily degradable under aerobic and anaerobic conditions in various environmental media such as freshwater and marine water, sediment and soil, groundwater and industrial wastewater.

In the air slowly degrades to photochemical reactions that depend on the hydroxyl radical . half-life estimated at approx . 17 days.

(Contd. on page 10)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 9)

· 12.3 Bioaccumulative potential

Low potential for bioaccumulation (ie log Kow < 3)

BCFs < 10 fish, including Cyprinus carpio and Leuciscus idus Hansch and Leo 1979 Gluth et al. 1985 Freitag et al. 1985 Howard 1990.

· 12.4 Mobility in soil

The adsorption in soil is unlikely given the high solubility of the methanol and its low octanol - water partition coefficient.

· Additional ecological information:

· General notes:

Water hazard class 2 (German Regulation) (Self-assessment): hazardous for water

Do not allow product to reach ground water, water course or sewage system.

Danger to drinking water if even small quantities leak into the ground.

- · 12.5 Results of PBT and vPvB assessment
- · PBT: Not applicable.
- · *vPvB*: Not applicable.
- · 12.6 Other adverse effects No further relevant information available.

· 13.1 Waste treatment methods

· Recommendation

Avoid sources of ignition and use appropriate control measures (see Section 8).

Must not be disposed together with household garbage. Do not allow product to reach sewage system.

Recycle if possible or contact a disposal of industrial waste.

Do not distribute the sludge generated from the treatment of industrial waste water on natural terrain. The sludge generated from the treatment of industrial wastewater should be incinerated, kept under containment or treatment.

Caution - used containers may contain highly flammable vapors. Do not cut , weld, drill , burn or incinerate empty containers unless they have been cleaned and declared safe to handle. Do not incinerate.

Treat empty containers in the same way as the product or if possible, wash them thoroughly and recycle.

· Waste disposal key:

The European Union does not establish uniform rules for elimination of chemical waste, which are special waste. Their treatment and elimination depends on the domestic laws of each country. For this reason, depending on the case, they must be contacted by the competent authorities.

The waste classification depends exclusively on the production process that generated it (see C.E.R. code) as well as by contaminants resulting from actual use. Waste producers need to assess the actual process used when generating the waste and its contaminants in order to assign the most appropriate waste code.

· European waste catalogue

07 07 04* other organic solvents, washing liquids and mother liquors

· Uncleaned packaging:

Empty containers may contain residue and can be dangerous. Empty containers should be recycled, recovered or disposed of by authorized and trained operators in accordance with national regulations.

Do not put under pressure, cut, weld, drill, grind, or expose such containers to heat, flame, sparks, static electricity or other sources of ignition. THEY MAY EXPLODE

· Recommendation:

For information only (not limited to) the following are the classes of hazardous waste that may be associated with the substance / mixture indicated in this data, it should be noted however, that the correct classification can be made only after a specific analysis of the waste:

H3-A 'Highly flammable': substances and preparations:

- Liquids with flash point below 21 °C (including extremely flammable liquids), or
- Which in contact with air at ambient temperature without energy input, may become hot and catch fire, or
- Solid substances and preparations which may readily catch fire after brief contact with a source of ignition and which continue to burn or be consumed after removal of the source of ignition, or
- Gases which ignite on contact with air at normal pressure, or

(Contd. on page 11)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 10)

- Which, in contact with water or damp air, evolve highly flammable gases in dangerous quantities;

H5 "Harmful": substances and preparations which, if inhaled, swallowed or absorbed via the skin, may involve risks to the limited health.

H6 "Toxic": substances and preparations (including very toxic substances and preparations) which, if inhaled or ingested or if they penetrate the skin, may involve serious risks to health, acute or chronic.

14.1 UN-Number ADR, IMDG, IATA	UN1992
14.2 UN proper shipping name ADR IMDG, IATA	1992 FLAMMABLE LIQUID, TOXIC, N.O. (METHANOL, NITROMETHANE) FLAMMABLE LIQUID, TOXIC, N.O.S. (METHANO
	NITROMETHANE)
14.3 Transport hazard class(es)	
ADR	
Class	3 Flammable liquids.
Label	3+6.1
IMDG	
Class Label	3 Flammable liquids. 3/6.1
IATA Solve of the second of t	
Class	3 Flammable liquids.
Label	3 (6.1)
14.4 Packing group ADR, IMDG, IATA	II
14.5 Environmental hazards:	Not applicable.
14.6 Special precautions for user	Warning: Flammable liquids.
Danger code (Kemler):	336
EMS Number:	F-E,S-D
Stowage Category	В
Stowage Code	SW2 Clear of living quarters.
14.7 Transport in bulk according to Ann	
Marpol and the IBC Code	Not applicable.



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

	(Contd. of page 1
· Transport/Additional information:	
· ADR	
· Limited quantities (LQ)	1L
· Excepted quantities (EQ)	Code: E2
	Maximum net quantity per inner packaging: 30 ml
	Maximum net quantity per outer packaging: 500 ml
· Transport category	2
· Tunnel restriction code	D/E
· IMDG	
· Limited quantities (LQ)	1L
Excepted quantities (\widetilde{EQ})	Code: E2
	Maximum net quantity per inner packaging: 30 ml
	Maximum net quantity per outer packaging: 500 ml
· UN ''Model Regulation'':	UN 1992 FLAMMABLE LIQUID, TOXIC, N.O.S
	(METHANOL, NITROMETHANE), 3 (6.1), II

- · 15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture
- · Labelling according to Regulation (EC) No 1272/2008

Complies with the following inventory requirements National / regional chemical:

AICS, IECSC, EINECS, KECI, PICCS, TSCA.

The product is classified and labelled according to the CLP regulation.

· Hazard pictograms







GHS02

GHS06

GHS08

- · Signal word Danger
- · Hazard-determining components of labelling:

methanol

nitromethane

· Hazard statements

H225 Highly flammable liquid and vapour.

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

H370 Causes damage to organs.

· Precautionary statements

P101 If medical advice is needed, have product container or label at hand.

P102 Keep out of reach of children.

P103 Read label before use.

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

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

P307+P311 IF exposed: Call a POISON CENTER or doctor/physician.

P405 Store locked up.

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

P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

.: 2012/10/EII

- · Directive 2012/18/EU
- · Named dangerous substances ANNEX I methanol

(Contd. on page 13)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 12)

· Seveso category

H2 ACUTE TOXIC

P5c FLAMMABLE LIQUIDS

- · Qualifying quantity (tonnes) for the application of lower-tier requirements 50 t
- · Qualifying quantity (tonnes) for the application of upper-tier requirements 200 t
- · 15.2 Chemical safety assessment: A Chemical Safety Assessment has been carried out.

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

· Relevant phrases

H225 Highly flammable liquid and vapour.

H226 Flammable liquid and vapour.

H301 Toxic if swallowed.

H302 Harmful if swallowed.

H311 Toxic in contact with skin.

H331 Toxic if inhaled.

H370 Causes damage to organs.

- · Department issuing SDS: Direction P.S.P. Passerini Special Products
- · Contact: Dr. Passerini Matteo
- · Abbreviations and acronyms:

UVCB: Substances of Unknown or Variable composition, Complex reaction products or biological materials.

Note P: the EU classification as carcinogen (R45) can not be applied if it is shown that the benzene content is below 0.1% by volume. (EINECS No 200-753-7). (Annex XVII REACH Reg.1272/2008)

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

VOC: Volatile Organic Compounds (USA, EU)

DNEL: Derived No-Effect Level (REACH)

PNEC: Predicted No-Effect Concentration (REACH)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

SVHC: Substances of Very High Concern

vPvB: very Persistent and very Bioaccumulative

Flam. Liq. 2: Flammable liquids – Category 2

Flam. Liq. 3: Flammable liquids – Category 3

Acute Tox. 3: Acute toxicity – Category 3

Acute Tox. 4: Acute toxicity – Category 4

STOT SE 1: Specific target organ toxicity (single exposure) – Category 1

· Sources

Dir 67/548/EEC and subsequent amendments

Regulation (EC) N $^{\circ}$ 1907/2006 of the European Parliament and the Council of 18 December 2006, REACH Regulation (EC) N $^{\circ}$ 1272/2008 of the European Parliament and the Council of 16 December 2008, CLP, and subsequent amendments

Globally Harmonized System GHS

Leg. 81/2008 and subsequent amendments

(Contd. on page 14)





Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 13)

The information and recommendations contained herein are, to the knowledge of P.S.P., accurate and reliable, and based on information provided in the Manufacturer / Importer at the time of publication. In the presence of additional information, the MSDS will be updated and resubmitted as required by law. User is responsible for the proper use of the product.

GR

(Contd. on page 15)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 14)

- · Short title of the exposure scenario Use the mixture as a fuel in special fuels by consumers.
- · Sector of Use SU21 Consumer uses: Private households / general public / consumers
- · Process category

PROC16 Using material as fuel sources, limited exposure to unburned product to be expected

- · Notes Outdoor use of fuels by fuels outdoors consumers. Software used: ECETOC TRA workers (v2.0).
- · Description of the activities / processes covered in the Exposure Scenario

See section 1 of the annex to the Safety Data Sheet.

· Conditions of use

According to directions for use.

It is assumed that good personal hygiene industrial base are implemented.

Considering the use to not more than 20 °C above ambient temperature.

- · Duration and frequency
- < 15 minutes hours / day
- \leq 240 days / year.
- · Worker

General measures (skin irritants) Avoid direct skin contact with the product. Identify potential areas for indirect skin contact. Wear gloves (tested to EN374) if hand contact with substance likely. Clean up contamination / spills as soon as they occur. Wash skin contamination immediately. Provide basic employee training to prevent / minimize exposure.

- · Physical parameters Vapour pressure > 10 kPa
- · Physical state Fluid
- · Concentration of the substance in the mixture

Concentration of substance in product 100 %

The substance is main component.

- · Used amount per time or activity Smaller than 5000 g per application.
- $\cdot \ Other \ operational \ conditions$
- · Other operational conditions affecting environmental exposure No special measures required.
- · Other operational conditions affecting worker exposure

Do not breathe gas/vapour/aerosol.

Take precautionary measures against static discharge.

Keep away from sources of ignition - No smoking.

Avoid contact with the skin.

- · Other operational conditions affecting consumer exposure No special measures required.
- · Other operational conditions affecting consumer exposure during the use of the product

Dermal contact: the exposed body surface Palm of one hand (240cm²)

· Risk management measures

Type of Use: Professional / Downstream user

It is not required respiratory protection

- · Worker protection
- \cdot *Organisational protective measures* Considering the use to not more than 20 $^{\circ}$ C above ambient temperature.
- · Technical protective measures

Provide explosion-proof electrical equipment.

Ensure that suitable extractors are available on processing machines

· Personal protective measures

Do not inhale gases / fumes / aerosols.

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.

For high airborne concentrations, use an approved supplied-air respirator, operated in positive pressure. Supplied air respirators with an escape bottle may be appropriate when oxygen levels are inadequate, the risk of gas / vapors are low, and if the capacity / rating of the air purifying filter can be overcome.

In case of exposure to levels above the standard values recommended the use of a filter respirator to cover part of the face material of the filter type A, the European Committee for Standardization (CEN) standards EN 136, 140 and 145 provide recommendations on masks, as well as EN 149 and 143 of the filters.

(Contd. on page 16)



Printing date 28.04.2016 Version number 2 Revision: 28.04.2016

Trade name: Radio Control Model Fuel

(Contd. of page 15)

Avoid contact with the skin.

Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

- · Measures for consumer protection Ensure adequate labelling.
- · Disposal measures Ensure that waste is collected and contained.
- · Disposal procedures

Must not be disposed together with household garbage. Do not allow product to reach sewage system.

- · Waste type Partially emptied and uncleaned packaging
- · Exposure estimation

The exposure in the workplace does not assume exceed the DNEL when measures are adopted risk management.

- · Worker (oral) The highest oral exposure to be expected is 4.67 mg / kg / day.
- · Worker (dermal) The highest dermal exposure to be expected is 0.34 mg/kg/day.
- · Worker (inhalation) The highest inhalative exposure to be expected is 9.34 ppm.
- · Environment

The exposure in the workplace does not assume exceed the PNEC when measures are adopted risk management.

· Guidance for downstream users No further relevant information available.

GB