SAFETY DATA SHEET

Section 1. Identification of the material and the supplier

Product:	**Dinitrol 443 Spray**
Product Use:	Paints and varnishes
Restriction of Use:	Refer to Section 15
New Zealand Supplier:	**Auto Body Equipment**
Address:	17 The Boulevard Te Rapa, Hamilton, 3200 New Zealand
Telephone:	+64 7 849 3514
Email:	office@abe.co.nz
Emergency No:	**0800 764 766 (National Poison Centre)**
Date of SDS Preparation:	5 December 2022

Section 2. Hazards Identification

This substance is hazardous according to the EPA Hazardous Substances (Classification) Notice 2020

EPA Approval No: Aerosols (Flammable) – HSR002515

Pictograms:

Flammable Irritant Asp/ Chronic Ecotoxic

Signal Word: **DANGER**

GHS Classification and Category	Hazard Code	Hazard Statement
Aerosol Cat. 1	H222	Extremely flammable aerosol.
Aerosol	H229	Pressurised container: may burst if heated.
Aspiration hazard Cat. 1	H304	May be fatal if swallowed and enters airways.
Eye irritation Cat. 2	H319	Causes serious eye irritation.
Narcotic effects	H336	May cause drowsiness or dizziness.
Hazardous to the aquatic environment acute/chronic Cat. 1	H400/H410	Very toxic to aquatic life with long lasting effects.

Prevention Code	Prevention Statement
P102	Keep out of reach of children.
P103	Read label before use.

P210	Keep away from heat, sparks, open flames or hot surfaces. No smoking.
P211	Do not spray on an open flame or other ignition source.
P251	Pressurized container: Do not pierce or burn, even after use.
P261	Avoid breathing fumes, mist, vapours or spray.
P264	Wash hands thoroughly after handling.
P271	Use only outdoors or in a well-ventilated area.
P273	Avoid release to the environment.
P280	Wear protective clothing as detailed in Section 8.

Response Code	**Response Statement**
P101	If medical advice is needed, have product container or label at hand.
P312	Call a POISON CENTER or doctor/physician if you feel unwell.
P331	Do NOT induce vomiting.
P391	Collect spillage.
P301 + P310	IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.
P305 + P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P337 + P313	If eye irritation persists: Get medical advice/attention.

Storage Code	**Storage Statement**
P405	Store locked up.
P403 + P233	Store in a well-ventilated place. Keep container tightly closed.
P410 + P412	Protect from sunlight. Do not expose to temperatures exceeding 50 °C.

Disposal Code	**Disposal Statement**
P501	Dispose of according to Local Regulations or Authorities

Section 3. Composition / Information on Hazardous Ingredients

Ingredients	**Wt%**	**CAS NUMBER.**
dimethyl ether	25 - <50	115-10-6
zinc powder - zinc dust (stabilized)	25 - <50	7440-66-6
acetone; propan-2-one; propanone	5 - <10	67-64-1
Hydrocarbons, C9, aromatics	5 - <10	128601-23-0
reaction mass of ethylbenzene and xylene	5 - <10	EC 905-588-0
zinc oxide	<2.5	1314-13-2

Section 4. First Aid Measures

Routes of Exposure:

If in Eyes Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice.

If on Skin Rinse skin with water/shower. If skin irritation occurs: get medical advice/attention.

If Swallowed Do NOT induce vomiting. Rinse mouth. Never give anything to the mouth of an unconscious person. If vomiting occurs, place victim face downwards, with the head turned to the side and lower than the hips to prevent vomit entering the lungs. Immediately call a POISON CENTER or doctor/physician.

If Inhaled Remove person to fresh air. Remove contaminated clothing and loosen remaining clothing. Allow person to assume most comfortable position and keep warm. Keep at rest until fully recovered. Apply artificial respiration if not breathing. Get medical advice if breathing becomes difficult.

Most important symptoms and effects, both acute and delayed

Symptoms: May cause drowsiness or dizziness.
Ingestion: May be fatal if swallowed and enters airways.
Inhalation: Not applicable.
Skin: Not applicable.
Eye: Causes serious eye irritation.

Section 5. Fire Fighting Measures

Hazard Type	Flammable Aerosol
Hazards from products	Do not inhale explosion and combustion gases. Use appropriate respiratory protection.
Suitable Extinguishing media	Carbon dioxide (CO2), Extinguishing powder, alcohol resistant foam. Co-ordinate fire-fighting measures to the fire surroundings.
Precautions for firefighters and special protective clothing	Wear full protective device. Use water spray jet to protect personnel and to cool endangered containers. Use water spray jet to protect personnel and to cool endangered containers. Suppress gases/vapours/mists with water spray jet. Collect contaminated fire extinguishing water separately. Do not allow entering drains or surface water.
HAZCHEM CODE	**2YE**

Section 6. Accidental Release Measures

Wear protective gear as detailed in Section 8. Evacuate all unnecessary personnel. Avoid contact with skin, eyes and clothes. Remove all sources of ignition. Provide adequate ventilation. Avoid breathing fumes, gas, mist, vapours or spray.

Do not allow to enter into surface water or drains. In case of gas escape or of entry into waterways, soil or drains, inform the responsible authorities.

Prevent spread over a wide area (e.g. by containment or oil barriers).
Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents). Treat the recovered material as prescribed in the section on waste disposal.

Dispose of waste according to the applicable local regulations detailed in Section 13.

Section 7. Handling and Storage

Precautions for Handling:

- Read label before use.
- Keep away from heat, sparks, open flames or hot surfaces. No smoking.
- Do not spray on an open flame or other ignition source.
- Pressurized container: Do not pierce or burn, even after use.
- Avoid breathing fumes, mist, vapours or spray.
- Wash hands thoroughly after handling.
- Use only outdoors or in a well-ventilated area. If handled uncovered, arrangements with local exhaust ventilation have to be used.
- If local exhaust ventilation is not possible or not sufficient, the entire working area should be ventilated by technical means.
- Take precautionary measures against static discharges.
- Keep away from sources of ignition - No smoking.
- Pressurized container: protect from sunlight and do not expose to temperatures
- exceeding 50 °C.
- Heating causes rise in pressure with risk of bursting.
- Avoid release to the environment.
- Wear protective clothing as detailed in Section 8.
- Keep away from food, drink and animal feeding stuffs.
- Remove contaminated, saturated clothing immediately.

- Draw up and observe skin protection programme. Wash hands and face before breaks and after work and take a shower if necessary. When using do not eat or drink.

Precautions for Storage:

- Store away from incompatible materials listed in Section 10.
- Keep out of reach of children.
- Store locked up.
- Store in a well-ventilated place. Keep container tightly closed in a cool place.
- Protect from sunlight. Do not expose to temperatures exceeding 50 °C.
- Do not keep the container sealed. Keep container dry.
- Keep away from heat. Protect from direct sunlight.

Section 8 Exposure Controls / Personal Protection

WORKPLACE EXPOSURE STANDARDS (provided for guidance only)

Substance		TWA ppm	TWA mg/m^3	STEL ppm	STEL mg/m^3
Dimethylether	[115-10-6]	400	766	500	958
Acetone	[67-64-1]	500	1185	1000	2375
Zinc oxide	[1314-13-2]	2	5	-	-

Workplace Exposure Standard – Time Weighted Average (WES-TWA). The time-weighted average exposure standard designed to protect the worker from the effects of long-term exposure. Workplace Exposure Standard – Short-Term Exposure Limit (WESSTEL). The 15-minute average exposure standard. Applies to any 15- Minute period in the working day and is designed to protect the worker against adverse effects of irritation, chronic or irreversible tissue change, or narcosis that may increase the likelihood of accidents. The WES-STEL is not an alternative to the WES-TWA; both the short-term and time-weighted average exposures apply. Workplace Exposure Standards and Biological Exposure Indices APRIL 2022 13TH EDITION.

DNEL Values:

CAS No Substance			
DNEL type	Exposure route	Effect	Value
67-64-1 acetone; propan-2-one; propanone			
Worker DNEL, long-term	inhalation	systemic	1210 mg/m³
Worker DNEL, acute	inhalation	local	2420 mg/m³
Worker DNEL, long-term	dermal	systemic	186 mg/kg bw/day
Consumer DNEL, long-term	inhalation	systemic	200 mg/m³
Consumer DNEL, long-term	dermal	systemic	62 mg/kg bw/day
Consumer DNEL, long-term	oral	systemic	62 mg/kg bw/day
128601-23-0 Hydrocarbons, C9, aromatics			
Worker DNEL, long-term	inhalation	systemic	150 mg/m³
Worker DNEL, long-term	dermal	systemic	25 mg/kg bw/day
Consumer DNEL, long-term	inhalation	systemic	32 mg/m³
Consumer DNEL, long-term	dermal	systemic	11 mg/kg bw/day
Consumer DNEL, long-term	oral	systemic	11 mg/kg bw/day
reaction mass of ethylbenzene and xylene			
Worker DNEL, long-term	inhalation	systemic	211 mg/m³
Worker DNEL, long-term	inhalation	local	221 mg/m³
Worker DNEL, acute	inhalation	systemic	442 mg/m³
Worker DNEL, long-term	dermal	systemic	180 mg/kg bw/day
Worker DNEL, acute	inhalation	local	289 mg/m³
Consumer DNEL, long-term	oral	systemic	1,6 mg/kg bw/day
Consumer DNEL, long-term	inhalation	systemic	14,8 mg/m³
Consumer DNEL, long-term	inhalation	local	65,3 mg/m³
Consumer DNEL, acute	inhalation	systemic	260 mg/m³
Consumer DNEL, acute	inhalation	local	260 mg/m³

1314-13-2 zinc oxide			
Worker DNEL, long-term	inhalation	systemic	5 mg/m³
Worker DNEL, long-term	inhalation	local	0,5 mg/m³
Worker DNEL, long-term	dermal	systemic	83 mg/kg bw/day
Consumer DNEL, long-term	inhalation	systemic	2,5 mg/m³
Consumer DNEL, long-term	dermal	systemic	83 mg/kg bw/day
Consumer DNEL, long-term	oral	systemic	0,83 mg/kg

PNEC Values:

CAS No Substance	
Environmental compartment	Value
67-64-1 acetone; propan-2-one; propanone	
Freshwater	10,6 mg/l
Marine water	1,06 mg/l
Freshwater sediment	30,4 mg/kg
Marine sediment	3,04 mg/kg
Micro-organisms in sewage treatment plants (STP)	100 mg/l
Soil	29,5 mg/kg
reaction mass of ethylbenzene and xylene	
Freshwater	0,327 mg/l
Marine water	0,327 mg/l
Freshwater sediment	12,64 mg/kg
Marine sediment	12,64 mg/kg
Soil	2,31 mg/kg
1314-13-2 zinc oxide	
Freshwater	0,0206 mg/l
Marine water	0,0061 mg/l
Freshwater sediment	117,8 mg/kg
Marine sediment	56,5 mg/kg
Micro-organisms in sewage treatment plants (STP)	0,100 mg/l
Soil	35,6 mg/kg

Engineering Controls

Provide adequate ventilation.
If handled uncovered, arrangements with local exhaust ventilation should be used if possible.
If technical exhaust or ventilation measures are not possible or insufficient, respiratory protection must be worn.

Personal Protection Equipment

Eyes	Eye glasses with side protection (EN 166).
Skin	Tested protective gloves must be worn (EN ISO 374): FKM (fluoro rubber), Breakthrough time: 120 min. Butyl caoutchouc (butyl rubber), Breakthrough time: 120 min. For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves. Protective gloves have to be replaced at the first sign of deterioration. Protect skin by using skin protective cream. Wear anti-static footwear and clothing.
Respiratory	Work in well-ventilated zones or use proper respiratory protection. gas

	filtering equipment (EN 141)., Filter material/medium: A2/P3

Section 9 Physical and Chemical Properties

Form	Aerosol
Colour	Grey
Odour	Characteristic
Odour Threshold	Not available
pH @20^{0}C	Not available
Boiling Point	Not available
Melting Point	Not available
Freezing Point	Not available
Flash Point	Not available
Flammability	Flammable Aerosol
Upper and Lower Explosive Limits	3.3 Vol% - 26.2 Vol %
Vapour Pressure @20^{0}C	4000 hPa
Density@ 20^{0}C	1.1 g/cm^3
Specific Gravity	Not available
Water Solubility	The study does not need to be conducted because the substance is known to be insoluble in water.
Partition Coefficient:	Not available
Ignition Temperature	>400^{0}C
Decomposition Temperature	Not available
Kinematic Viscosity @20^{0}C	Not available
Particle Characteristics	Not available
Solvent content	59.2%
Solids content	40.7%

Section 10. Stability and Reactivity

Stability of Substance	This product is stable under normal conditions.
Possibility of hazardous reactions	No hazardous reaction when handled and stored according to provisions.
Conditions to Avoid	Keep away from heat. Ignition hazard.
Incompatible Materials	None known.
Hazardous Decomposition Products	No dangerous decomposition products known.

Section 11 Toxicological Information

Acute Effects:

Swallowed	Not applicable.
Dermal	Not applicable.
Inhalation	Not applicable.
Eye	Causes serious eye irritation.
Skin	Not applicable.

Chronic Effects:

Carcinogenicity	Not applicable.
Reproductive Toxicity	Not applicable.
Germ Cell Mutagenicity	Not applicable.
Aspiration	May be fatal if swallowed and enters airways.
STOT/SE	Not applicable.

STOT/RE	May cause drowsiness or dizziness.

Acute Toxicity for components:

CAS No	Chemical name				
	Exposure route	Dose	Species	Source	Method
67-64-1	acetone; propan-2-one; propanone				
	oral	LD50 5800 mg/kg	Rat	RTECS	
	dermal	LD50 7426-15800 mg/kg	Rabbit	IUCLID	
	inhalation (4 h) vapour	LC50 76 mg/l	Rat		
128601-23-0	Hydrocarbons, C9, aromatics				
	oral	LD50 >6800 mg/kg	Rat		
	dermal	LD50 >2000 mg/kg	Rabbit		
	inhalation (4 h) vapour	LC50 10,2 mg/l	Rat		
	reaction mass of ethylbenzene and xylene				
	oral	LD50 4300 mg/kg	Rat		
	dermal	LD50 > 2000 mg/kg	Rabbit		
	inhalation (4 h) vapour	LC50 20 mg/l	Rat		
	inhalation dust/mist	ATE 1,5 mg/l			
1314-13-2	zinc oxide				
	oral	LD50 > 5000 mg/kg	Rat	IUCLID	
	dermal	LD50 > 2000 mg/kg	Rat		
	inhalation (4 h) dust/mist	LC50 > 5,7 mg/l	Rat		

Section 12. Ecotoxicological Information

Very toxic to aquatic life with long lasting effects.

CAS No	Chemical name					
	Aquatic toxicity	Dose	[h] | [d]	Species	Source	Method
67-64-1	acetone; propan-2-one; propanone					
	Acute fish toxicity	LC50 5540 mg/l	96 h	Onchorhynchus mykiss		
	Acute crustacea toxicity	EC50 8800 mg/l	48 h	Daphnia Magna		
	Algae toxicity	NOEC 4740 mg/l	2 d	Selenastrum capricornutum		
128601-23-0	Hydrocarbons, C9, aromatics					
	Acute fish toxicity	LC50 9,2 mg/l	96 h	Oncorhynchus mykiss (Rainbow trout)		
	Acute algae toxicity	ErC50 2,9 mg/l	72 h	Pseudokirchneriella subcapitata		
	Acute crustacea toxicity	EC50 3,2 mg/l	48 h	Daphnia magna (Big water flea)		
1314-13-2	zinc oxide					
	Acute fish toxicity	LC50 1120 mg/l	96 h	fish	GESTIS	
	Acute crustacea toxicity	EC50 12,3 mg/l	48 h		GESTIS	

Persistence and Degradability:

No data for the product itself

CAS No	Chemical name		
	Method	Value	d S o
	Evaluation		
67-64-1	acetone; propan-2-one; propanone		
	OECD 301 B	91%	28
	Readily biodegradable (according to OECD criteria).		

Bioaccumulative Potential:

No data for the product itself

Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
115-10-6	dimethyl ether	0,1
67-64-1	acetone; propan-2-one; propanone	-0,24

BCF

CAS No	Chemical name	BCF	Species	
67-64-1	acetone; propan-2-one; propanone	<10		

Mobility in Soil:

No data available for the product itself.

Section 13. Disposal Considerations

Disposal Method:
Spent media that has removed toxic chemicals should be examined for specific hazards. Spilled product may be recovered for use if it has not come in contact with liquids or been exposed to significant amounts of gaseous contaminants. Dispose of according to Local Regulations.

Ensure any container holding waste product or contaminated spill media is labelled "Hazardous Waste – "Spilled Flammable Aerosol, Ecotoxic" and that the label also has the Flammable and Eco toxic Pictogram, and the business name, address, and phone number.

Precautions or methods to avoid: Must not be disposed together with household garbage. Avoid release to the environment.

Section 14 Transport Information

This product is classified as a Dangerous Good for transport in NZ ; NZS 5433:2020

Road and Rail Transport

UN No:	1950
Class-primary	2
Proper Shipping Name:	AEROSOLS, ENVIRONMENTALLY HAZARDOUS

Air Transport

UN No:	1950
Class-primary	2
Proper Shipping Name:	AEROSOLS, ENVIRONMENTALLY HAZARDOUS

Marine Transport

UN No:	1950
Class-primary	2
Proper Shipping Name:	AEROSOLS, ENVIRONMENTALLY HAZARDOUS
Marine Pollutant:	Yes

Special Provisions: 63, 190, 277, 344, 327
Limited Quantity: For aerosols containing toxic substances the limited quantity is 120ml. For all other aerosols the limited quantity is 1000ml.

Section 15 Regulatory Information

New Zealand:
This substance is classified hazardous according to the EPA Hazardous Substances (Classification) Notice 2020

EPA Approval Code: Aerosols (Flammable) – HSR002515

HSW (HS) Regulations 2017 and EPA Notices	Trigger Quantity
Certified Handler	Not required
Location Certificate	3000L (AWC)
Tracking Trigger Quantities	Not required
Signage Trigger Quantities	1000L
Emergency Response Plan	1000L
Secondary Containment	1000L
Fire Extinguishers	3000 (AWC) - require 1X
Restriction of Use	Only use for the intended purpose.

Section 16 Other Information

Glossary

EC_{50}	Median effective concentration.
EEL	Environmental Exposure Limit.
EPA	Environmental Protection Authority
HSNO	Hazardous Substances and New Organisms.
HSW	Health and Safety at Work.
LC_{50}	Lethal concentration that will kill 50% of the test organisms inhaling or ingesting it.
LD_{50}	Lethal dose to kill 50% of test animals/organisms.
LEL	Lower explosive level.
OSHA	American Occupational Safety and Health Administration.
TEL	Tolerable Exposure Limit.
TLV	Threshold Limit Value-an exposure limit set by responsible authority.
UEL	Upper Explosive Level
WES	Workplace Exposure Limit

References:

1. EPA Hazardous Substances (Safety Data Sheets) Notice 2017
2. Workplace Exposure Standards and Biological Exposure Indices April 2022 edition.
3. Assigning a hazardous substance to a HSNO Approval (Aug 2013).
4. Transport of Dangerous goods on land NZS 5433:2020
5. HSW (Hazardous Substances) Regulations 2017

Disclaimer
This document has been prepared by TCC (NZ) Ltd and serves as the suppliers Safety Data Sheet ('SDS'). It is based on information concerning the product which has been provided to TCC (NZ) Ltd or obtained from third party sources and is believed to represent the current state of knowledge as to the appropriate safety and handling precautions for the product at the time of issue. Further clarification regarding any aspect of the product should be obtained directly from the manufacturer. While TCC (NZ) have taken all due care to include accurate and up-to-date information in this SDS, it does not provide any warranty as to accuracy or completeness. As far as lawfully possible, TCC (NZ) Ltd accept no liability for any loss, injury or damage (including consequential loss) which may be suffered or incurred by any person as a consequence of their reliance on the information contained in this SDS

The information herein is given in good faith, but no warranty, express or implied is made.

Please contact Auto Body Equipment, if further information is required.

Issue Date: 5 December 2022 Review Date: 5 December 2027