

SAFETY DATA SHEET

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Product identifier	Isopropyl Alcohol
Other means of identification	
Product code	ADV 125-1
Recommended use	Alcohol Solvent

Manufacturer/Importer/Supplier/Distributor information

Company name Address	INTERNATIONAL AUTOBODY MARKETING GROUP 1505 NORTH HAYDEN RD, SUITE 111 SCOTTSDALE, AZ 85257 UNITED STATES
Website	www.advantagerefinish.com
Telephone	1-87-REFINISH 480.451.4451

Emergency phone number 800-424-9300 ChemTrec EMERGENCY 24 Hrs.

SECTION 2. HAZARDS IDENTIFICATION

GHS Classification Flammable liquids	Category 2
Eye irritation	Category 2A
Specific target organ tox- icity - single exposure	Category 3 (Central nervous system)
GHS Label element Hazard pictograms	
Signal word	Danger
Hazard statements	H225 Highly flammable liquid and vapour. H319 Causes serious eye irritation. H336 May cause drowsiness or dizziness.
Precautionary statements	Prevention: P210 Keep away from heat, hot surfaces, sparks, open

	flames and other ignition sources. No smoking. P233 Keep container tightly closed. P261 Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray. P264 Wash skin thoroughly after handling. P271 Use only outdoors or in a well-ventilated area. P280 Wear protective gloves/ eye protection/ face protection.
Potential Health Effects	5
Carcinogenicity:	
IARC	No component of this product present at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.
ACGIH	No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by ACGIH.
OSHA	No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.
ΝΤΡ	No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

Emergency Overview

WARNING!	
Appearance	liquid
Colour	colourless, clear
Odour	alcohol-like

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture : Mixture

Hazardous components

CAS-No.	Chemical Name	Concentration (%)
67-63-0	Isopropyl alcohol	90 - 100
64-17-5	Ethanol	0.1 - 1

Isopropanol Anhydrous/Isopropyl Alcohol ACS

Grade/Isopropyl Alcohol/TT I 735 Grade A/Velvasol 425/Value Grade Isopropanol, TT I 735A Grade B

SECTION 4. FIRST AID MEASURES

General advice	Move out of dangerous area. Show this safety data sheet to the doctor in attend- ance. Do not leave the victim unattended.
If inhaled	Consult a physician after significant exposure. If unconscious place in recovery position and seek medical advice.
In case of skin contact	If on skin, rinse well with water. If on clothes, remove clothes.
In case of eye contact	Immediately flush eye(s) with plenty of water. Keep eye wide open while rinsing. If eye irritation persists, consult a specialist.
If swallowed	Keep respiratory tract clear. Never give anything by mouth to an unconscious per- son. If symptoms persist, call a physician.

SECTION 5. FIREFIGHTING MEASURES

Suitable extinguishing media	Alcohol-resistant foam Carbon dioxide (CO2) Dry chemical
Unsuitable extinguishing media	High volume water jet
Specific hazards during firefighting	Do not allow run-off from fire fighting to enter drains or water courses.
Hazardous combustion products	Carbon oxides
Specific extinguishing methods	Use a water spray to cool fully closed containers.
Further information	Collect contaminated fire extinguishing water sepa- rately. This must not be discharged into drains. Fire residues and contaminated fire extinguishing wa-

	ter must be disposed of in accordance with local regu- lations. For safety reasons in case of fire, cans should be stored separately in closed containments.
Special protective equip-	Wear self-contained breathing apparatus for fire-
ment for firefighters	fighting if necessary.

NFPA Flammable and Combustible Liquids Classification:

Flammable Liquid Class IB

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures	Use personal protective equipment. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas. Beware of vapours accumulating to form explosive concentrations. Vapours can accumulate in low areas.
Environmental precau- tions	Prevent product from entering drains. Prevent further leakage or spillage if safe to do so. If the product contaminates rivers and lakes or drains inform respective authorities.
Methods and materials for containment and cleaning up	Contain spillage, and then collect with non- combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in con- tainer for disposal according to local / national regula- tions (see section 13).

SECTION 7. HANDLING AND STORAGE

Advice on safe handling	Avoid formation of aerosol. Do not breathe vapours/dust. Avoid exposure - obtain special instructions before use. Avoid contact with skin and eyes. For personal protection see section 8. Smoking, eating and drinking should be prohibited in the application area. Take precautionary measures against static discharg- es. Provide sufficient air exchange and/or exhaust in work rooms.
	Open drum carefully as content may be under pres- sure.

	Dispose of rinse water in accordance with local and national regulations.
Conditions for safe stor- age	No smoking. Keep container tightly closed in a dry and well- ventilated place. Containers which are opened must be carefully re- sealed and kept upright to prevent leakage. Observe label precautions. Electrical installations / working materials must com- ply with the technological safety standards.

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

CAS-No.	Components	Value type (Form of exposure)	Control parame- ters / Permissi- ble concentra- tion	Basis
67-63-0	Isopropyl alcohol	TWA	200 ppm	ACGIH
		STEL	400 ppm	ACGIH
		TWA	400 ppm 980 mg/m3	NIOSH REL
		ST	500 ppm 1,225 mg/m3	NIOSH REL
		TWA	400 ppm 980 mg/m3	OSHA Z-1
		TWA	400 ppm 980 mg/m3	OSHA PO
		STEL	500 ppm 1,225 mg/m3	OSHA PO

Components with workplace control parameters

Biological occupational exposure limits

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Components	CAS-No.	Control	Biological	Sam-	Permissi-	Basis
		parame-	specimen	pling	ble con-	
		ters		time	centration	
Isopropyl alcohol	67-63-0	Acetone	In urine	End of	40 mg/l	ACGIH
				shift at		BEI
				end of		
				work-		
				week		

Personal protective equipment

Respiratory protection

No personal respiratory protective equipment normally required.

In the case of vapour formation use a respirator with an approved filter.

Hand protection Remarks	The suitability for a specific workplace should be dis- cussed with the producers of the protective gloves.
Eye protection	Eye wash bottle with pure water Tightly fitting safety goggles Wear face-shield and protective suit for abnormal pro- cessing problems.
Skin and body protection	impervious clothing Choose body protection according to the amount and concentration of the dangerous substance at the work place.
Hygiene measures	When using do not eat or drink. When using do not smoke. Wash hands before breaks and at the end of workday.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	liquid
Colour	colourless, clear
Odour	alcohol-like
Odour Threshold	200 ppm
рН	No data available
Freezing Point (Melting point/freezing point)	-88 °C (-126 °F)
Boiling Point (Boiling point/boiling range)	82 °C (180 °F)
Flash point	12 °C (54 °F)
Evaporation rate	1.2
Flammabilit y (solid, gas)	n-Butyl Acetate No data available
Burning rate	No data available
Upper explosion limit	12.7 %(V)

Lower explosion limit	2 %(V)
Vapour pressure	32 mmHg @ 20 °C (68 °F)
Relative vapour density	2 @ 20 °C (68 °F) AIR=1
Relative density	0.79 @ 20 °C (68 °F) Reference substance: (water = 1)
Density	0.79 g/cm3 @ 20 °C (68 °F)
	6.59 lb/gal @ 20 °C (68 °F)
Bulk density	No data available
Solubility(ies) Water solubility	completely miscible
Solubility in other sol- vents	No data available
Partition coefficient: n- octanol/water	log Pow: 0.05 @ 25 °C (77 °F)
Auto-ignition temperature	399 °C
Thermal decomposition	No data available
Viscosity Viscosity, dynamic	2.4 mPa.s @ 20 °C (68 °F)
Viscosity, kinematic	2.6 mm2/s @ 25 °C (77 °F)
Regulatory VOC (lbs/gal) Regulatory VOC (g/l)	6.55 789.00
Actual VOC (lbs/gal) Actual VOC (g/l)	6.55 789.00

SECTION 10. STABILITY AND REACTIVITY

Reactivity	No dangerous reaction known under conditions of normal use.
Chemical stability	Stable under normal conditions.
Possibility of hazardous reactions	Vapours may form explosive mixture with air.
Conditions to avoid	Heat, flames and sparks.

Incompatible materials	Aldehydes Chlorine Ethylene oxide halogens isocyanates Strong acids strong oxidizing agents
Hazardous decomposition products	Carbon monoxide, carbon dioxide and unburned hy- drocarbons (smoke).

SECTION 11. TOXICOLOGICAL INFORMATION

Acute toxicity	
Product:	
Acute oral toxicity	Acute toxicity estimate : > 5,000 mg/kg Method: Calculation method
Acute inhalation toxicity	Acute toxicity estimate : > 40 mg/l Exposure time: 4 h Test atmosphere: vapour Method: Calculation method
Acute dermal toxicity	Acute toxicity estimate : > 5,000 mg/kg Method: Calculation method
Components:	
67-63-0:	
Acute oral toxicity	LD50 (rat): 5,045 mg/kg
Acute inhalation toxicity	LC50 (rat): 16000 ppm
Acute dermal toxicity	LD50 (rabbit): 12,800 mg/kg

64-17-5: LD50 (rat): 7,060 mg/kg Acute oral toxicity Acute inhalation toxicity LC50 (rat): 124.7 mg/l Acute dermal toxicity Remarks: No data available

Skin corrosion/irritation

Product:

Remarks: May cause skin irritation in susceptible persons.

Components:

67-63-0: Species: rabbit Result: Mild skin irritation

64-17-5:

Species: rabbit Result: No skin irritation

Serious eye damage/eye irritation

Product:

Remarks: Eye irritation

Components:

67-63-0: Species: rabbit Result: Irritating to eyes.

64-17-5:

Species: rabbit Result: Irritating to eyes.

Respiratory or skin sensitisation

Components:

64-17-5: Test Type: lymph node assay Species: mouse Method: OECD Test Guideline 429 GLP: No data available Remarks: Did not cause sensitisation on laboratory animals.

Germ cell mutagenicity

Components:

67-63-0:	
Genotoxicity in vitro	Test Type: Ames test Test species: Salmonella typhimurium Result: negative
Genotoxicity in vivo	Test Type: In vivo micronucleus test Test species: mouse Method: OECD Test Guideline 474 Result: negative
Germ cell mutagenicity-	Did not show mutagenic effects in animal experi-

Assessment	ments.
64-17-5: Genotoxicity in vitro	Test Type: Mammalian cell gene mutation assay Test species: mouse lymphoma cells Metabolic activation: with and without metabolic acti- vation Method: OECD Test Guideline 476
Genotoxicity in vivo	Result: negative GLP: No data available Test Type: Dominant lethal assay Test species: mouse (male)
	Application Route: Oral Dose: 10 or 40% ethanol in water Method: OECD Test Guideline 478 Result: negative GLP: No data available
Germ cell mutagenicity- Assessment	Mutagenicity classification not possible from current data
Carcinogenicity	
Components:	

67-63-0: Species: rat NOAEL: 5,000 ppm

Method: OECD Test Guideline 451

Carcinogenicity - As-	: Not classifiable as a human carcinogen.
sessment	

64-17-5:

Carcinogenicity - As-	Carcinogenicity classification not possible from current
sessment	data.

Reproductive toxicity

Components:

67-63-0: Reproductive toxicity -Assessment

Animal testing did not show any effects on fertility. Did not show teratogenic effects in animal experiments.

64-17-5:

Effects on fertility	Test Type: Two-generation study
	Species: mouse, male and female

	Application Route: oral Dose: 5, 10 and 15% v/v in water General Toxicity - Parent: NOAEL: 15 % diet General Toxicity F1: NOAEL: 10 % diet Symptoms: reduced litter size Reduced sperm motility in F1 generation Method: OECD Test Guideline 416 GLP: No data available
Effects on foetal devel- opment	Species: rat Application Route: Inhalation Dose: 10,000, 16,000 or 20,000 ppm General Toxicity Maternal: NOAEL: 16,000 ppm Teratogenicity: NOAEL: > 20,000 ppm Symptoms: No malformations were observed. Method: OECD Test Guideline 414 GLP: No data available
Reproductive toxicity - Assessment	Fertility classification not possible from current data. Embryotoxicity classification not possible from current data.

STOT - single exposure

Product:No data available

Components:

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Exposure routes:	Target Organs:	Assessment:	Remarks:
Inhalation	Central nervous system	May cause drowsi- ness or dizziness., The substance or mixture is classified as specific target organ toxicant, sin- gle exposure, cate- gory 3 with narcotic effects.	

64-17-5:

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Exposure routes:	Target Organs:	Assessment:	Remarks:
Inhalation	Central nervous	May cause drowsi-	
	system	ness or dizziness.,	
		The substance or	
		mixture is classified	
		as specific target	
		organ toxicant, sin-	
		gle exposure, cate-	
		gory 3 with narcotic	
		effects.	

Inhalation	Respiratory system	May cause respira- tory irritation., The substance or mix- ture is classified as specific target or- gan toxicant, single exposure, category 3 with respiratory tract irritation.

STOT - repeated exposure

Product:No data available

Components:

67-63-0:No data available

64-17-5:No data available

Repeated dose toxicity

Components:

64-17-5: Species: rat, male and female NOAEL: 10 ml/kg Application Route: Oral Exposure time: 7 or 14 wk Number of exposures: 2 times/d, 7 d/wk Dose: 5, 10, 20ml/kg of 16.25% etoh Method: OECD Test Guideline 408 GLP: yes

Aspiration toxicity

Components:

64-17-5: No aspiration toxicity classification

Further information

Product:

Remarks: Symptoms of overexposure may be headache, dizziness, tiredness, nausea and vomiting., Concentrations substantially above the TLV value may cause narcotic effects., Solvents may degrease the skin.

SECTION 12. ECOLOGICAL INFORMATION

Ecotoxicity	
<u>Components:</u> 67-63-0:	
Toxicity to fish	LC50 (Pimephales promelas (fathead minnow)): > 1,000 mg/l Exposure time: 96 h
Toxicity to daphnia and other aquatic inverte- brates	LC50 (Daphnia magna (Water flea)): > 100 mg/l Exposure time: 48 h
Toxicity to algae	Remarks: No data available
64-17-5:	
Toxicit y to fish	LC50 (Pimephales promelas (fathead minnow)): 15,300 mg/l Exposure time: 96 h Test Type: flow-through test
Toxicity to daphnia and other aquatic inverte-brates	EC50 (Ceriodaphnia dubia): 5,012 mg/l Exposure time: 48 h Test Type: static test
Toxicity to algae	EC50 (Chlorella vulgaris (Fresh water algae)): 275 mg/l End point: Growth rate Exposure time: 72 h Test Type: static test Method: OECD Test Guideline 201 GLP: No data available

Persistence and degradability

Components:	
64-17-5:	
Biodegradability	

Result: Readily biodegradable.

Bioaccumulative potential

<u>Components:</u> 64-17-5: Bioaccumulation

Remarks: Bioaccumulation is unlikely.

Mobility in soil No data available	
Other adverse effects No data available	
Product:	
Regulation	40 CFR Protection of Environment; Part 82 Protection of Stratospheric Ozone - CAA Section 602 Class I Substances
Remarks	This product neither contains, nor was manufactured with a Class I or Class II ODS as defined by the U.S. Clean Air Act Section 602 (40 CFR 82, Subpt. A, App.A + B).
Additional ecological in- formation	No data available

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal methods	Dispose of in accordance with all applicable local,
Waste from residues	state and federal regulations.

Contaminated packaging	Empty remaining contents. Dispose of as unused product. Do not re-use empty containers.
	Do not burn, or use a cutting torch on, the empty drum.

SECTION 14. TRANSPORT INFORMATION

IATA (International Air Transport Association): UN1219, Isopropanol, 3, II, Flash Point:12 °C(54 °F)

IMDG (International Maritime Dangerous Goods): UN1219, ISOPROPANOL, 3, II

DOT (Department of Transportation): UN1219, Isopropanol, 3, II

SECTION 15. REGULATORY INFORMATION

OSHA Hazards	Flammable liquid, Moderate eye irritant
WHMIS Classification	B2: Flammable liquid D2B: Toxic Material Causing Other Toxic Effects

EPCRA - Emergency Planning and Community Right-to-Know Act

CERCLA Reportable Quantity

This material does not contain any components with a CERCLA RQ.

SARA 304 Extremely Hazardous Substances Reportable Quantity

This material does not contain any components with a section 304 EHS RQ.

SARA 311/312 Hazards	Fire Hazard Acute Health Hazard
SARA 302	SARA 302: No chemicals in this material are subject to the reporting requirements of SARA Title III, Section 302.
SARA 313	SARA 313: This material does not contain any chemi- cal components with known CAS numbers that exceed the threshold (De Minimis) reporting levels estab- lished by SARA Title III, Section 313.

Clean Air Act

This product does not contain any hazardous air pollutants (HAP), as defined by the U.S. Clean Air Act Section 12 (40 CFR 61).

This product does not contain any chemicals listed under the U.S. Clean Air Act Section 112(r) for Accidental Release Prevention (40 CFR 68.130, Subpart F). The following chemical(s) are listed under the U.S. Clean Air Act Section 111 SOCMI Intermediate or Final VOC's (40 CFR 60.489):

67-63-0	Isopropyl alcohol	100 %
64-17-5	Ethanol	0.1 %
71-23-8	n-Propanol	0.015 %

Clean Water Act

This product does not contain any Hazardous Substances listed under the U.S. CleanWater Act, Section 311, Table 116.4A.

This product does not contain any Hazardous Chemicals listed under the U.S. Clean-Water Act, Section 311, Table 117.3.

This product does not contain any toxic pollutants listed under the U.S. Clean Water Act Section 307

US State Regulations

Massachusetts Right To Know

67-63-0	Isopropyl alcohol	90 - 100 %
Pennsylvania Right To Kn		
67-63-0 New Jersey Right To Kno	Isopropyl alcohol w	90 - 100 %
67-63-0 64-17-5	Isopropyl alcohol Ethanol	90 - 100 % 0.1 - 1 %
California Prop 65	This product does not contain any	

California Prop 65This product does not contain any chemicals known to
State of California to cause cancer, birth defects, or
any other reproductive harm.

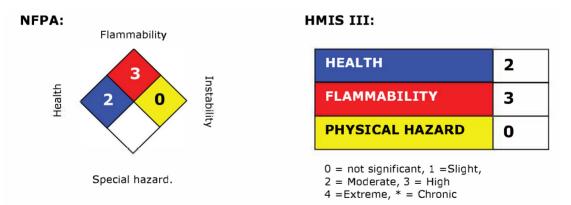
The components of this product are reported in the following inventories:

Switzerland. New notified substances and declared preparations United States TSCA Inventory	y (positive listing) (The formulation contains substances listed on the Swiss Inventory) y (positive listing)
	(On TSCA Invento- ry)
Canadian Domestic Substances List (DSL)	y (positive listing) (All components of this product are on the Canadian DSL.)
Australia Inventory of Chemical Substances (AICS)	y (positive listing) (On the inventory, or in compliance with the inventory)
New Zealand. Inventory of Chemical Substances	y (positive listing) (On the inventory, or in compliance with the inventory)
Japan. ENCS - Existing and New Chemical Substances Inventory	y (positive listing) (On the inventory, or in compliance with the inventory)
Japan. ISHL - Inventory of Chemical Substances (METI)	y (positive listing) (On the inventory, or in compliance with the inventory)

Korea. Korean Existing Chemicals Inventory (KECI)	y (positive listing) (On the inventory, or in compliance with the inventory)
Philippines Inventory of Chemicals and Chemical Substances (PICCS)	y (positive listing) (On the inventory, or in compliance with the inventory)
China. Inventory of Existing Chemical Substances in China (IECSC)	y (positive listing) (On the inventory, or in compliance with the inventory)

SECTION 16. OTHER INFORMATION





Our Company cannot anticipate all conditions under which this information and its product, or the products of other manufacturers in combination with its product, may be used. It is the user's responsibility to ensure safe conditions for handling, storage and disposal of the product, and to assume liability for loss, injury, damage or expense due to improper use. The information in the sheet was written based on the best knowledge and experience currently available.

Legecy MSDS:

R0001444

Material number:

16076497, 16070429, 16067144, 16062664, 16062658, 16056234, 16056233, 16056232, 16056231, 16056230, 16056236, 16056235, 16056229, 16056228, 16061245, 16053485, 16052635, 16049720, 16030493, 16030184, 16020147, 16010158, 772812, 772811, 749963, 744289, 744288, 744287, 737212, 728214, 717444, 713300, 667236, 667235, 638919, 628350, 622971, 620243, 607424, 604761, 598538, 584582, 574318, 568108, 554273, 554170, 554086, 554045, 554336, 554300, 550689, 549773, 554335, 554291, 554272, 554257, 554206, 554169, 554149, 554085, 554371, 556671, 547315, 547297, 551361, 544760, 508619, 508618, 508414, 55018, 73136, 55939, 55835, 56756, 105079, 71262, 88592, 54882, 104163, 56760, 88703, 88700, 105097, 87779, 56758, 71396, 56752, 73132, 71401, 56759, 55942, 106250, 152309, 136796, 166706, 89678, 71489, 70529, 89675, 55109

Key or le	gend to abbreviations and ac	ronyms us	ed in the safety data sheet
ACGIH	American Conference of Gov- ernment Industrial Hygienists	LD50	Lethal Dose 50%
AICS	Australia, Inventory of Chem- ical Substances	LOAEL	Lowest Observed Adverse Effect Level
DSL	Canada, Domestic Substanc- es List	NFPA	National Fire Protection Agency
NDSL	Canada, Non-Domestic Sub- stances List	NIOSH	National Institute for Occupational Safety & Health
CNS	Central Nervous System	NTP	National Toxicology Program
CAS	Chemical Abstract Service	NZIOC	New Zealand Inventory of Chemicals
EC50	Effective Concentration	NOAEL	No Observable Adverse Effect Level
EC50	Effective Concentration 50%	NOEC	No Observed Effect Concentration
EGEST	EOSCA Generic Exposure Scenario Tool	OSHA	Occupational Safety & Health Admin- istration
EOSCA	European Oilfield Specialty Chemicals Association	PEL	Permissible Exposure Limit
EINECS	European Inventory of Exist- ing Chemical Substances	PICCS	Philipines Inventory of Commercial Chemical Substances
МАК	Germany Maximum Concen- tration Values	PRNT	Presumed Not Toxic
GHS	Globally Harmonized System	RCRA	Resource Conservation Recovery Act
>=	Greater Than or Equal To	STEL	Short-term Exposure Limit
IC50	Inhibition Concentration 50%	SARA	Superfund Amendments and Reau- thorization Act.
IARC	International Agency for Re- search on Cancer	TLV	Threshold Limit Value
IECSC	Inventory of Existing Chemi- cal Substances in China	TWA	Time Weighted Average
ENCS	Japan, Inventory of Existing and New Chemical Substanc- es	TSCA	Toxic Substance Control Act
KECI	Korea, Existing Chemical In- ventory	UVCB	Unknown or Variable Compositon, Complex Reaction Products, and Biological Materials
<=	Less Than or Equal To	WHMIS	Workplace Hazardous Materials In- formation System
LC50		Lethal Cor	ncentration 50%