

# SAFETY DATA SHEET

1 of 9 MCL-AIRBOND

Prepared to OSHA, ANSI, NOHSC, WHMIS, 1002/58 & 1272/2008/EC Standards

SDS Revision: 4.2

SDS Revision Date: 3/4/2016

	1. PRODUCT INDENTIFICATION		
1.1	Product Name:		
	LIGHT ELEGANCE AirBond		
1.2	Chemical Name:		
	BONDING RESIN		
1.3	Synonyms:		
	NA NA		
1.4	Trade Names:		
	none		
1.5	Product Use:		
	PROFESSIONAL USE ONLY		
1.6	Manufacturer's Name:		
	MCCONNELL LABS, INC.		
1.7	Manufacturer's Adress:		
	406 SW UMATILLA AVE, REDMOND, OR 97756 USA		
1.8	Emergency Phone:		
	CHEMTREC: +1 703 527 3887 / +1 800 424 9300 (CCN 696869)		
1.9	Business Phone / Fax:		
	+1 541 526 1417 / +1 541 526 1418		

## 2. HAZARD INDENTIFICATION

2.1 Hazard Identification:

This product is classified as a HAZARDOUS SUBSTANCE and as a DANGEROUS GOOD according to the classification criteria of NOHSC: 1008 (2004) and ADG Code (Australia). WARNING! MAY CAUSE AN ALLERGIC SKIN REACTION. AVOID SKIN CONTACT DUE TO SENSITIZING POTENTIAL. CAUSES EYE IRRITATION. Hazard Statements (H): H224 - Extremely flammable liquid and vapor. H317 - May cause an allergic skin reaction. H320 - Causes eye irritation. Precautionary Statements (P): P210 - Keep away from heat/sparks/open flame/hot surfaces - No Smoking. P223 - Keep container tightly closed. P243 - Take precaustionary measures against static discharge. P261 - Avoid breathing fumes/gas/vapors/spray. P272 - Contaiminated work clothing should not be allowed out of the workplace. P280 - Wear protective gloves. P302 + P352 - IF ON SKIN - wash with soap and warm water. P305 + P351 + P338 - IF IN EYES - Rince continually with water for several minutes. Remove contact lenses if present and easy to do, continue rinsing. P333 + P313 - If skin reaction or a rash occurs, get medical attention. P337 + P313 - ilf eye irritation persists, P321 - for specific first aid treatment (see section 4 of this Safety Data Sheet). P363 - Wash contaminated clothing before resuse. P501 - Dispose of contents/container to a licensed treatment, storage or disposal facility (TSDF).





2.2 Routes of Entry: Inhalation: YES Absorption: YES Ingestion: YES

2.3 Effects of Exposure:

INGESTION: If product is swallowed, may cause nausea, vomiting and/or diarrhea and central nervouse system depression.

EYES & SKIN:

The liquid may produce eye discomfort and is capable of causing temporary impairment of vision and/or transient eye inflamation, ulceration. The vapor is discomforting to the eye. Splashes may cause severe eye irritation, possible corneal burns and eye damage. Moderately irritating to the eyes. Symptoms of overexposure may include redness, itching, irritation and watering. May be irritating to the skin, especially after prolonged contact. The product can cause allergic skin reactions (e.g., rashes, welts, dermatitis) upon prolonged or repeated expsoure.

INHALATION:

Vapors of this product may be moderately irritating to the nose, throat and other tissues of the respiratory system. Symptoms of overexposure can include coughing, wheezing, nasal congestion and difficulty breathing. Inhalation of concentrated vaors can cause central nervous system depression (e.g., drowsiness, headaches, nausea). Odor may give some warning of exposure but odor fatigue may occur.

2.4 Symptoms of Overexposure:

Symptoms of skin overexposure may include redness, itiching and irritation of affected areas. Overexposure in eyes may cause redness, itching and watering. The product can cause allergic skin reactions (e.g., rashes, welts, deratitis) upon prolonged or repeated exposure.

2.5 Acute Health Effects

Moderate irritation to eyes near affected areas. Additionally, high concentrations of vapors can cause drowsiness, dizziness, headaches and nausea.

2.6 Chronic Health Effects:

The material may cause an allergic reaction for some sensitive individuals.

2.7 Target Organs:

Eyes, skin

3. COMPOSITION & INGREDIENT INFORMATION 3 of 9													
	EXPOSURE LIMITS IN AIR (mg/m3)												
					AC	GIH		NOHSO	2		OSHA		
					pp	m		ppm			ppm		
							ES-	ES-	ES-				
CHEMICAL NAME(S)	CAS No.	RTECS No.	EINECS No.	%	TLV	STEL	TWA	STEL	PEAK	PEL	STEL	IDLH	OTHER
Ethyl Acetate	141-86-4	AH5425000	205-500-4	60-100	400	400	200	400	NF	NA	NA	#####	400 TWA
	Flamm.Lig.2; Eye Ir	rit. 2; STOT SE	3, H224, H31	L9, H336									
Isopropyldienediphenyl	2530-85-0	UC230000	219-785-8	5-10	NA	NA	NF	NF	NF	NA	NA	NA	
Bisoxyhydroxypropyl													
Methacrylate													
dut =	<u> </u>												

<sup>\*\*</sup> Due to trade secret information, more detailed concentrations of the ingredients cannot be provided.

		4. FIRST AID MEASURES				
4.1	First Aid: INGESTION: SKIN & EYES:	If ingested, do not induce vomiting! If product has been swallowed, drink p is vomiting, continue to offer water or milk. Never give water or milk to an Control Center or local emergency number. Provide an estimate of the tim amount of the substance that was swallowed.  If product gets in the eyes, flush with copious amounts of lukewarm water to ensure thorough irrigation. Seek immediate medical attention. If proble	unconscious person. Contact le at which the material was in for at least 15 minutes. Open m persists, seek immediate m	the nearest Poison gested and the and close eyelid(s) edical attention. If		
	INHALATION:	irritation occurs & product is on the skin, rinse thoroughly with lukewarm water followed by a thorough washing of the affected area with plenty of soak and waster. Remove all contaminated clothing including footwear and wash thoroughly before reuse. If irritation, redness or swelling persists, consult a physician immediately.  INHALATION: Remove victim to fresh air at once. If breathing stops, perform artificial respiration. Seek immediate medical attention.				
4.2	Medical Condit	ons Aggravated by Exposure:	HEALTH	1		
	Pre-existing de	Pre-existing dermatitis, other skin conditions and disorders of the target organs (eyes, skin)		3		
			PHYSICAL HAZARDS	1		
			PROTECTIVE EQUIPMENT	В		
				_		

	5. FIREFIGHTING MEASURES	4 of
5.1	Flashpoint & Method: - 20 °C (-4 °F) calculated	
5.2	Autoignition Temperature: NA	
5.3	Flammability Limits: Lower Explosive Limit (LEL): <b>NA</b> Upper Explosive Limit (UEL): <b>NA</b>	
5.4	Fire & Explosion Hazards:  This product is slightly flammable. When involved in a fire, this product may ignite and decompose to form toxic gases (e.g., CO, CO2 and Nox)	
5.5	Extinguishing Methods: Water, Foam, CO2, Dry Chemical	
5.6	Fire Fighting Procedures: First responders should wear eye protection. Structural fire fighters must wear full protective equipment and MSHA/NIOSH approved, self-contained breathing apparatus. If possible, prevent runoff water from entering storm drains, bodies of water or other enviormentally sensitive reas. If necessary, rinse contaminated equipment with soapy water before returnign to service.	

## 6. ACCIDENTAL RELEASE MEASURES

6.1 Spills:

Before cleaning any spill or leak, individuals involved in spill cleanup must wear appropriate Personal Protective Equipment. For small spills (e.g., , 1 gallon [3.785 liters]) wear appropriate personal protective equipment (e.g., goggles & gloves). Maximize ventilation (open doors and windows). Expose spilled material to UV light source for 2-5 minutes. Lift cured material from substrate and repeat until very little residue remains. Remove remaining spilled material with absorbent material and place into appropriate closed container(s). Dispose of properly in accordance with local, state and federal regulations. Wash all affected areas and outside of container with warm, soapy water. Remove any contaminated clothing and wash before reuse. For large spills (e.g., > 1 gallon [3.785 liters]) deny entery to all unprotected individuals. Dike and contain spill with inert material (e.g., sand or earth). Expose spilled material to UV light source for 2-5 minutes. Lift cured material from substrate and repeat until very little residue remains. Remove remaining spilled material with absorbent material and place into appropriate closed container(s). Dispose of properly in accordance with local, state and federal regulations. Wash all affected areas and outside of container with warm, soapy water. Remove any contaminated clothing and wash before reuse. Keep spills and cleaning runoffs out of municipal sewers and open bodies of water.

## 7. HANDLING AND STORAGE INFORMATION

7.1 Work & Hygiene Practices:

Avoid prolonged contact with this material. Avoid breathing the vapors generated by this product. Use in a well ventilated location (e.g., local exhaust ventilation, fans). Wash exposed skin thoroughly with plenty of soap and water after using this product. If necessary, use a moisturizer after washing. Do not eat, drink or smoke while handling this product.

7.2 Storage & Handling:

Use and store in a cool, dry, well ventilated location. Keep away from excessive heat. Keep away from incompatible materials listed in Section 10. Do not store in damaged or unmarked containers or storage devises. Keep containers securely closed when not in use. Open slowly on a level, stable surface. Empty containers may contain residual amounts of this product; therefore, empty containers should be handled with care. As a precaution against exposure to the eyes, nose, throat and face, this product should not be stored higher than waist level. KEEP AWAY FROM CHILDREN AT ALL TIMES!

7.3 Special Precautions:

Do not store where temperatures can exceed 50 °C (122 °F).

	8. E	XPOSURE CONTROLS & PERSONAL PROTECTION	5 c
8.1	Ventilation & Engineering Controls:	Use with adequate ventilation (e.g., local exhaust ventilation, fans). Ensure appropriate de equipment is available (e.g., sink, safety shower, eye wash station).	contaimination
8.2	Respiratory Protection:	No special respiratory protections is required under typical circumstances of use or handling. In instances where vapors or sprays of this product are generated, and respiratory protection is needed, use only protection authorized by 29 CFR § 1910.134, application U.S. State regulations or the Candaian CAS Standard Z94.4-93 and applicable standards of Canadian Provinces, EC Member States or Australia.	
8.3	Eye Protection:	Wear protective eyewear (e.g., safety glasses with side shields) at all times when handling this product. Always use protective eyewear when cleaning spills or leaks. Contact lenses pose a special hazard; soft lenses may absorb and concentrate irritants.	
8.4	Hand Protection:	None required under normal conditions of use. However, may cause skin irritation in some sensitive individuals. When handling large quantities (e.g., >1 gallon [3.785 liters]), wear nitrile or imprevious gloves.	The state of the s
8.5	Body Protection:	No apron required when handling small quantities. When handling large quantities (e.g., . 1 gallon), eye wash stations and deluge showers should be available. Upon completion of work activities involving large quantities of this product, wash any exposed areas thoroughly with soap and water.	
		9. PHYSICAL & CHEMICAL PROPERTIES	
9.1	Density:	0.9	
9.2	Boiling Point:	57 °C (134 °F)	
9.3	Melting Point:	ND	
9.4	Evaporation Rate:	NA	
9.5	Vapor Pressure:	30.6 kPa @ 25°C	
9.6	Appearance & Color:	Clear liquid	
9.7	Odor Threashold:	NE	
9.8	Solubility:	Not soluble	
9.9	pH:	NA	
9.1	Viscosity:	approximately 300 cps	
9.11	Flash Point:	- 20 °C (-4 °F) calculated	
9.12	Other Information:	NA	
		10. STABILITY & REACTIVITY	
10.1	Stability: Relatively stable under ambient cor	aditions when stored properly	
10.2	Hazardous Decomposition Products		
-0.2	1 Total Control of the Control of th	s. eratures, products of thermal decomposition may include irritating vapors and toxic gases (e	e.g., oxides of
	carbon and nitrogen).		
10.3	Hazardous Polymerization:		
	Will not occur.		
10.4	Conditions to Avoid:		
		nperatures, incompatable chemicals, strong light sources, sparks and flame.	
10.5	Incompatable Substances:	The state of the s	
_ 0.0	Strong oxidizers, peroxides, strong	acids or alkalis	

	11. TOXICOLOGICAL INFORMATION 6 o	f 9			
11.1	Toxicity Data: This product has NOT been tested on animals to obtain toxicology data. There are toxicology data for the components of the produt which are found in scientific literature. These data have not been presented in this document.				
11.2	Acute Toxicity: See Section 2.5				
11.3	Chronic Toxicity: See Section 2.6				
11.4	Suspected Carcinogen: The ingredients of this product are not listed as carcinogens by the National Toxicology Program and have not been evaluated by the Internail Agency for Research on Cancer or the American Conference of Government Industrial Hygenists.				
11.5	Reproductive Toxicity: This product is not reported to cause reproductive toxicity in humans.				
l	Mutagenicity: This product is not reported to produce mutagenic effects in humans.				
	Embryotoxicity:  This product is not reported to produce embryotoxic effects in humans.  Teratogenicity:	_			
	This products is not reported to cause teratogenic effects in humans.	_			
11.6	Irritancy of Product: See Section 2.3				
11.7	Biological Exposure Indicies: NE				
11.8	Physician Recommendations:  Treat syptomatically				
	12. ECOLOGICAL INFORMATION	1			
12.1	Environmental Stability: This product will slowly volatile from soil. Components of this product will slowly decompose into organic compounds. Butyl Acetate: K <sub>OC</sub> = 1.82. Water Solubility: 120 parts H <sub>2</sub> O at 25 °C (77 °F). Bioconcentration Factor = 4-14. Bioconcentration is not anticipated to be significant. This compound can be removed from contaminated environments from volatilization and biodegredation. This compound's half life is 6.1 hours.				
12.2	Effects on Plants & Animals: There is no specific data availble for this product on plant life.				
12.3	Effects on Aquatic Life: There is no specific data availble for this product on aquatic life.				
	13. DISPOSAL CONSIDERATIONS				
13.1	Waste Disposal: Dispose inaccordance with local, state and Federal waste laws.				
13.2	Special Considerations:  This material becomes an inert plastic upon prolonged exposure to sources of UV light and sunlight. Disposal of inert plastics is safer for the				

environment and is more easily handled for disposal according to local, state and Federal regulations.

No other ingredients in this producd, present in a concentration of 1.0% or greater, are listed on any of the following state criteria lists: California Proposition 65 (CA), Delaware Air Quality Management List (DE), Florida Toxic Substances List (FL), Massachusetts Hazardous Substances List (MA), Michigan Critical Substances List (MI), Minnesota Hazardous Substances list, (MN), New Jersey Right-to-Know List (NJ), new Yord Hazardous Substances List (NY), Pennsylvania Right-to-Know list (PA), Washington Permissible Exposures List (WA), Wisconsin Hazardous Substances List (WI)

15.8 67/548/EEC (European Union), Australian NOHSC:2011 (2003), and GHS Requirements:

The primary cononents of this product are not listed in Annex 1 of EU Directive 67/548/EEC.

Ethyl Acetate: Flammable (F). Harmful (Xi).

Risk Phrases (R): 11-36/37/38 - Highly Flammable. Irritating to eyes, skin and respiratory system. Safety Phrases (S): 2-23-29 - Keep out of reach of Children. Do not breath gas, fumes, vapor or spray. Do not empty into drains. Keep away from sources of ignition - No Smoking. Avoid contact with skin and eyes, rinse immediately with plenty of water and seek medical advice.





## **DEFINITION OF TERMS**

A large number of abbreviations and acronyms appear on a SDS. Some of these that are commonly used include the following:

## GENERAL INFORMATION:

CAS No.	Chemical Abstract Service Number
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### **EXPOSURE LIMITS IN AIR:**

ACGIH American Conference on Governmental Industrial Hygienists	
TLV Threshold Limit Value	
OSHA	U.S. Occupational Safety and Health Administration
PEL Permissible Exposure Limit	
IDLH Immediately Dangerous to Life and Health	

### FIRST AID MEASURES:

Cardiopulmonary resuscitation - method in which a person whose heart has
stopped receives manual chest compressions and breathing to circulate blood
and provide oxygen to the body.

### HAZARDOUS MATERIALS IDENTIFICATION SYSTEM: HMIS

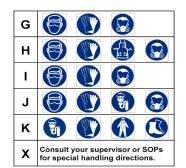
### **HEALTH, FLAMMABILITY & REACTIVITY RATINGS:**

0	Minimal Hazard	
1	1 Slight Hazard	
2	2 Moderate Hazard	
3	3 Severe Hazard	
4	Extreme Hazard	



#### PERSONAL PROTECTION RATINGS:

Α			
В	The second second		
С			
D			
E			
F		TH.	





**Full Face Respirator** 























## OTHER STANDARD ABBREVIATIONS:

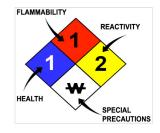
NA	Not Available
NR	No Results
NE	Not Established
ND	Not Determined
ML	Maximum Limit
SCBA	Self-Contained Breathing Apparatus

## NATIONAL FIRE PROTECTION ASSOCIATION: NFPA

FLAMMABILITY LIMITS IN AIR:						
Autoignition Temperature   Minimum temperature required to initiate combustion in air with no othe source of ignition						
LEL	Lower Explosive Limit - lowest percent of vapor in air, by volume, that will explode or ignite in the presence of an ignition source					
UEL	Upper Explosive Limit - highest percent of vapor in air, by volume, that will explode or ignite in the presence of an ignition source					

### HAZARD RATINGS:

	National Control of the Control of t				
0	Minimal Hazard				
1	Slight Hazard				
2	Moderate Hazard				
3	Severe Hazard				
4	Extreme Hazard				
ACD	Acidic				
ALK	Alkaline				
COR	Corrosive				
₩	Use No Water				
ОХ	Oxidizer				
TREFOIL	Radioactive				
IREFOIL	Radioactive				



### TOXICOLOGICAL INFORMATION:

LD <sub>50</sub>	Lethal Dose (solids & liquids) which kills 50% of the exposed animals
	s
LC <sub>50</sub>	Lethal concentration (gases) which kills 50% of the exposed animal
ppm	Concentration expressed in parts of material per million parts
TD <sub>Io</sub>	Lowest dose to cause a symptom
TCLo	Lowest concentration to cause a symptom
TD <sub>Io</sub> , LD <sub>Io</sub> , & LD <sub>o</sub> or	Lowest dose (or concentration) to cause lethal or toxic effects
TC, TC <sub>o</sub> , LC <sub>io</sub> , & LC <sub>o</sub>	
IARC	International Agency for Research on Cancer
NTP	National Toxicology Program
RTECS	Registry of Toxic Effects of Chemical Substances
BCF	Bioconcentration Factor
TL <sub>m</sub>	Median threshold limit
log K <sub>ow</sub> or log K <sub>oc</sub>	Coefficient of Oil/Water Distribution

### REGULATORY INFORMATION:

WHMIS	Canadian Workplace Hazardous Material Information System					
DOT	U.S. Department of Transportation					
тс	Transport Canada					
EPA	U.S. Environmental Protection Agency					
DSL	Canadian Domestic Substance List					
NDSL	Canadian Non-Domestic Substance List					
PSL	Canadian Priority Substances List					
TSCA	U.S. Toxic Substance Control Act					
EU	European Union (European Union Directive 67/548/EEC)					
WGK	Wassergefährdungsklassen (German Water Hazard Class)					

### WORKPLACE HAZARDOUS MATERIALS IDENTIFICATION (WHMIS) SYSTEM:

0	<b>(*)</b>	<b>(2)</b>	<b>②</b>	<b>(T)</b>	<b>®</b>		(R)
Class A	Class B	Class C	Class D1	Class D2	Class D3	Class E	Class F
Compressed	Flammable	Oxidizing	Toxic	Irritation	Infectious	Corrosive	Reactive

## EC (67/548/EEC) INFORMATION:

			*			×	×
С	E	F	N	0	Т	Xi	Xn
Corrosive	Explosive	Flammable	Harmful	Oxidizing	Toxic	Irritant	Harmful

## CLP/GHS (1272/2008/EC) PICTOGRAMS:

				Pal Jan		<b>\cdot\cdot\cdot\cdot\cdot\cdot\cdot\cdot</b>		<b>(1)</b>
GHS01	GHS02	GHS03	GHS04	GHS05	GHS06	GHS07	GHS08	GHS09
Explosive	Flammable	Oxidizer	Pressurized	Corrosive	Toxic	Harmful Irritating	Health Hazard	Environment