

**Section 1. Chemical Product and Company Information**

Common Name: Powdered•Formalin™ Pack A		Code:	8000
Supplier:	BBC Biochemical 8510 Cedarhome Dr. Stanwood, WA 98292	MSDS#:	8000
Synonym:	Not Available	Validation Date:	8/04
Trade Name:	Not Available	Print Date:	8/04
Material Uses:	Not Available	Responsible Name:	Dr. B
Manufacturer:	BBC Biochemical 8510 Cedarhome Dr. Stanwood, WA 98292	<b><u>In Case of Emergency: 1-800-424-9300 Chemtrec</u></b> USA 1-202-483-7616 Chemtrec Intrl 1-800-225-8867	

**Section 2. Composition and Information on Ingredients**

Name	CAS#	% by Weight	Exposure Limits
1) Paraformaldehyde	30525-89-4	Percentage composition is withheld as a trade secret.	Not Available
2) Sodium Phosphate	7558-79-4		Not Available
3) Lithium Carbonate	554-13-2		Not Available

**Section 3. Hazards Identification**

Physical State and Appearance	White Powder
Emergency Overview	Not available.
Routes of Entry	Eye contact, inhalation, ingestion, skin contact.
Potential Acute Health Effects	
Eyes	Irritation, may cause permanent damage.
Skin	Irritation.
Inhalation	Irritation to nose, throat and respiratory system.
Ingestion	May cause allergic reaction. Irritation to throat and respiratory system.
Potential Chronic Health Effects	Prolonged and repeated contact causes a hardening or tanning effect. May cause contact dermatitis.
Medical Conditions	
Aggravated by	
Overexposure	
Overexposure/	
Signs/Symptoms	

**Section 4. First Aid Measures**

Eye Contact	Immediately flush thoroughly with water for at least 15 minutes.
Skin Contact	Wash thoroughly with soap and water. Remove contaminated clothing at once (launder before reuse); discard contaminated shoes.
Inhalation	Remove to fresh air; give artificial respiration if breathing has stopped.
Ingestion	Induce vomiting of conscious patient immediately by giving 2 glasses of water and pressing finger down throat. Get immediate medical attention.
Notes to Physician	Not available.

**Section 5. Fire Fighting Measures**

Flammability of the Product	Slight.
Auto-ignition Temperature	Not available.
Flash Points	160 Degrees F
Flammable Limits	By volume in air: Lower = 7%, Upper = 73%
Products of Combustion	Not available.
Fire Hazards in Presence	Not available.

<b>Of Various Substances</b>	
<b>Explosion Hazards in Presence of Various Substances</b>	Thermal decomposition produces toxic fumes.
<b>Fire Fighting Media and Instructions</b>	CO <sub>2</sub> , foam, water. Wear self-contained breathing apparatus and protective clothing.
<b>Protective Clothing (Fire)</b>	
<b>Special Remarks on Fire Hazards</b>	
<b>Special Remarks on Explosion Hazards</b>	

### Section 6. Accidental Release Measures

<b>Small Spill and Leak</b>	Place leaking containers in well ventilated area. Eliminate ignition sources. Neutralize with ammonium hydroxide or complex with sodium sulfite. Use standard clean up procedures such as vacuuming or sweeping.
<b>Large Spill and Leak</b>	Same as above.

### Section 7, Handling and Storage

<b>Handling</b>	Wear protective gloves and chemical safety glasses when handling.
<b>Storage</b>	Store in cool dry place with adequate ventilation. Keep away from other combustibles, acids, or oxidizing agents.

### Section 8. Exposure Controls / Personal Protection

<b>Engineering Controls</b>	
<b>Personal Protection</b>	
<b>Eyes</b>	Safety glasses with side shields must be worn at all times.
<b>Body</b>	Impervious protective clothing must be worn to prevent skin contact.
<b>Respiratory</b>	If workplace exposure limit(s) of product or any component is exceeded (see TLV/PEL), a NIOSH/MSHA approved air supplied respirator is advised in absence of proper environmental control. OSHA regulations also permit other NIOSH/MSHA respirators (negative pressure type) under specified conditions (see your safety supplier). Engineering and/or administrative controls should be implemented to reduce exposure. Material must be handled or transferred in an approved fume hood or with adequate ventilation.
<b>Hands</b>	Neoprene, nitrile or equivalent gloves.
<b>Feet</b>	Not available.
<b>Personal Protection in Case of a Large Spill</b>	Safety glasses with side shields, impervious protective clothing, respirator if necessary and neoprene, nitrile or equivalent gloves.
<b>Product Name</b>	<b>Exposure Limits</b>
1) Paraformaldehyde	Not available
2) Sodium Phosphate	Not available
3) Lithium Carbonate	Not available
<b>Consult Local authorities before acceptable exposure limits.</b>	

### Section 9. Physical and Chemical Properties

<b>Physical State and Appearance</b>	White powder.	<b>Odor:</b>	Not available.
<b>Molecular Weight</b>	Not applicable.	<b>Taste:</b>	Not available.
<b>Molecular Formula</b>	Not applicable.	<b>Color:</b>	White
<b>pH (1%/Water)</b>	Not applicable.		
<b>Boiling/Condensation Point</b>	Not applicable.		
<b>Melting/Freezing Point</b>	Not applicable.		
<b>Critical Temperature</b>	Not applicable.		
<b>Specific Gravity</b>	Not applicable.		
<b>Vapor Pressure</b>	Not applicable.		
<b>Vapor Density</b>	Not applicable.		
<b>Volatility</b>	Not applicable.		
<b>Odor Threshold</b>	Not applicable.		
<b>Evaporation Rate</b>	Not applicable.		
<b>VOC</b>	Not available.		
<b>Viscosity</b>	Not available.		

<b>Ionicity (in water)</b>	Not available.
<b>Dispersion Properties</b>	Not available.
<b>Solubility</b>	Miscible in water..
<b>Physical Chemical Comments</b>	Not available.

### **Section 10. Stability and Reactivity**

<b>Stability and Reactivity</b>	Stable.
<b>Conditions of Instability</b>	Avoid contact with ignition sources.
<b>Incompatibility with Various Substances</b>	Acids, oxidizers, strong alkalies. Contact with HCl may cause formation of the potent carcinogen, bischloromethyl ether.
<b>Hazardous Decomposition Products</b>	Metal•O, HCl, CL, CO <sub>x</sub>
<b>Hazardous Polymerization</b>	Not available.

### **Section 11. Toxicological Information**

<b>Toxicity to Animals</b>	LD50: Not available. LC50: Not available.
<b>Chronic Effects on Humans</b>	Paraformaldehyde has the potential to cause cancer in humans. Repeated and prolonged exposure increases the risk. In humans, formaldehyde exposure has been associated with cancers of the lungs, nasopharynx and oropharynx , and nasal passages.
<b>Other Toxic Effects on Humans</b>	Tests on laboratory animals indicate paraformaldehyde may cause tumors and may produce adverse mutagenic and reproductive effects
<b>Special Remarks on Toxicity to Animals</b>	Not available.
<b>Special Remarks on Chronic Effects on Humans</b>	Not available.
<b>Special Remarks on Other Toxic Effects on Humans</b>	Not available.

### **Section 12. Ecological Information**

<b>Ecotoxicity</b>	Not available.
<b>BODS and COD</b>	Not available.
<b>Biodegradable/OEDC</b>	Not available.
<b>Mobility</b>	Not available.
<b>Toxicity of the Products of Biodegradation</b>	Not available.
<b>Special Remarks on The Products of Biodegradation</b>	Not available.

### **Section 13. Disposal Considerations**

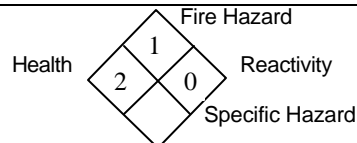
<b>Waste Information</b>	Not available.
<b>Waste Stream</b>	Not available.
<b>Consult your local or regional authorities.</b>	

### **Section 14. Transport Information**

<b>DOT Classification</b>	
<b>Marine Pollutant</b>	Not available.
<b>Hazardous Substances Reportable Quantity</b>	Not available.
<b>Special Provisions for Transport</b>	Not applicable.
<b>TDG Classification</b>	Not controlled under TDG (Canada).
<b>ADR/RID Classification</b>	Not controlled under ADR (Europe).
<b>IMO/IMDG Classification</b>	Not controlled under IMDG.
<b>ICAO/IATA Classification</b>	Not controlled under IATA.

**Section 15. Other Information****Label requirements****Hazardous Material  
Information System  
(U.S.A.)**

<b>Health</b>	2
<b>Fire Hazard</b>	1
<b>Reactivity</b>	0
<b>Personal Protection</b>	

**National Fire  
Protection  
Association  
(U.S.A.)****References****Other Special  
Considerations****Validated by Dr. B on 8/04****Notice to Reader**

To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein.

**BBC Biochemical****MATERIAL SAFETY DATA SHEET****Section 1. Chemical Product and Company Information**

<b>Common Name:</b>	<b>Powdered•Formalin™ Pack B</b>	<b>Code:</b>	<b>8000</b>
<b>Supplier:</b>	<b>BBC Biochemical 8510 Cedarhome Dr. Stanwood, WA 98292</b>	<b>MSDS#:</b>	<b>8000</b>
<b>Synonym:</b>	<b>Not Available</b>	<b>Validation Date:</b>	<b>8/04</b>
<b>Trade Name:</b>	<b>Not Available</b>	<b>Print Date:</b>	<b>8/04</b>
<b>Material Uses:</b>	<b>Not Available</b>	<b>Responsible Name:</b>	<b>Dr. B</b>
<b>Manufacturer:</b>	<b>BBC Biochemical 8510 Cedarhome Dr. Stanwood, WA 98292</b>	<b>In Case of Emergency: 1-800-424-9300 Chemtrec USA 1-202-483-7616 Chemtrec Intrl 1-800-225-8867</b>	

**Section 2. Composition and Information on Ingredients**

<b>Name</b>	<b>CAS#</b>	<b>% by Weight</b>	<b>Exposure Limits</b>
1) Sodium Phosphate Monobasic	7558-80-7	Percentage composition is with held as a trade secret.	Not available.
2) Carboxy Methyl Cellulose	9004-32-4		Not available.

**Section 3. Hazards Identification**

<b>Physical State and Appearance</b>	White crystalline powder.
<b>Emergency Overview</b>	Not available.
<b>Routes of Entry</b>	Eye contact, inhalation, ingestion, skin contact.
<b>Potential Acute Health Effects</b>	
<b>Eyes</b>	Irritation, may cause permanent damage.
<b>Skin</b>	Irritation
<b>Inhalation</b>	Irritation to nose, throat and respiratory system.
<b>Ingestion</b>	May cause allergic reaction. Irritation to throat and respiratory system.
<b>Potential Chronic Health Effects</b>	Not available
<b>Medical Conditions Aggravated by Overexposure</b>	Not available
<b>Overexposure/ Signs/Symptoms</b>	Not available.

**Section 4. First Aid Measures**

<b>Eye Contact</b>	Immediately flush thoroughly with water for at least 15 minutes.
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<b>Skin Contact</b>	Wash thoroughly with soap and water.
<b>Inhalation</b>	Remove to fresh air; give artificial respiration if breathing has stopped.
<b>Ingestion</b>	Induce vomiting of conscious patient immediately by giving 2 glasses of water and pressing finger down throat. Get immediate medical attention.
<b>Notes to Physician</b>	Not available.

### Section 5. Fire Fighting Measures

<b>Flammability of the Product</b>	Not considered flammable.
<b>Auto-ignition Temperature</b>	Not available.
<b>Flash Points</b>	Not available.
<b>Flammable Limits</b>	Not available.
<b>Products of Combustion</b>	Not available.
<b>Fire Hazards in Presence Of Various Substances</b>	Not available.
<b>Explosion Hazards in Presence of Various Substances</b>	Not available.
<b>Fire Fighting Media and Instructions</b>	CO <sub>2</sub> , foam, water.
<b>Protective Clothing (Fire)</b>	
<b>Special Remarks on Fire Hazards</b>	
<b>Special Remarks on Explosion Hazards</b>	

### Section 6. Accidental Release Measures

<b>Small Spill and Leak</b>	Place leaking containers in well ventilated area. Use standard clean up procedures such as vacuuming or sweeping.
<b>Large Spill and Leak</b>	Same as above.

### Section 7. Handling and Storage

<b>Handling</b>	Wear protective gloves and chemical safety glasses when handling.
<b>Storage</b>	Store in cool dry place with adequate ventilation

### Section 8. Exposure Controls / Personal Protection

<b>Engineering Controls</b>	
<b>Personal Protection</b>	
<b>Eyes</b>	Safety glasses with side shields.
<b>Body</b>	Impervious protective clothing must be worn to prevent skin contact.
<b>Respiratory</b>	If workplace exposure limit(s) of product or any component is exceeded (see TLV/PEL), a NIOSH/MSHA approved air supplied respirator is advised in absence of proper environmental control. OSHA regulations also permit other NIOSH/MSHA respirators (negative pressure type) under specified conditions (see your safety supplier). Engineering and/or administrative controls should be implemented to reduce exposure.
<b>Hands</b>	Neoprene, nitrile or equivalent gloves.
<b>Feet</b>	Not available
<b>Personal Protection in Case of a Large Spill</b>	Safety glasses with side shields, impervious protective clothing, respirator if necessary and neoprene, nitrile or equivalent gloves.
<b>Product Name</b>	<b>Exposure Limits</b>
1) Sodium Phosphate Monobasic	Not available
2) Carboxy Methyl Cellulose	Not available
<b>Consult Local authorities before acceptable exposure limits.</b>	

### Section 9. Physical and Chemical Properties

<b>Physical State and Appearance</b>	White crystalline powder.	<b>Odor:</b>	Not available.
<b>Molecular Weight</b>	Not applicable.	<b>Taste:</b>	Not available.
<b>Molecular Formula</b>	Not applicable.	<b>Color:</b>	White.
<b>pH (1%/Water)</b>	Not applicable.		
<b>Boiling/Condensation Point</b>	Not applicable.		

<b>Melting/Freezing Point</b>	Not applicable.
<b>Critical Temperature</b>	Not applicable.
<b>Specific Gravity</b>	Not applicable.
<b>Vapor Pressure</b>	Not applicable.
<b>Vapor Density</b>	Not applicable.
<b>Volatility</b>	Not applicable.
<b>Odor Threshold</b>	Not applicable.
<b>Evaporation Rate</b>	Not applicable.
<b>VOC</b>	Not available.
<b>Viscosity</b>	Not available.
<b>Ionicity (in water)</b>	Not available.
<b>Dispersion Properties</b>	Not available.
<b>Solubility</b>	Miscible in water.
<b>Physical Chemical Comments</b>	Not available.

### ***Section 10. Stability and Reactivity***

<b>Stability and Reactivity</b>	Stable.
<b>Conditions of Instability</b>	Not available.
<b>Incompatibility with Various Substances</b>	Not available.
<b>Hazardous Decomposition Products</b>	Not available.
<b>Hazardous Polymerization</b>	Not available.

### ***Section 11. Toxicological Information***

<b>Toxicity to Animals</b>	LD50: Not available. LC50: Not available.
<b>Chronic Effects on Humans</b>	
<b>Other Toxic Effects on Humans</b>	
<b>Special Remarks on Toxicity to Animals</b>	Not available.
<b>Special Remarks on Chronic Effects on Humans</b>	Not available.
<b>Special Remarks on Other Toxic Effects on Humans</b>	Not available.

### ***Section 12. Ecological Information***

<b>Ecotoxicity</b>	Not available.
<b>BODS and COD</b>	Not available.
<b>Biodegradable/OEDC</b>	Not available.
<b>Mobility</b>	Not available.
<b>Toxicity of the Products of Biodegradation</b>	Not available.
<b>Special Remarks on The Products of Biodegradation</b>	Not available.

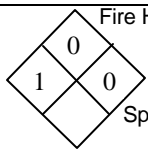
### ***Section 13. Disposal Considerations***

<b>Waste Information</b>	Not available.
<b>Waste Stream</b>	Not available.
<b>Consult your local or regional authorities.</b>	

### ***Section 14. Transport Information***

<b>DOT Classification</b>	
<b>Marine Pollutant</b>	Not available.
<b>Hazardous Substances</b>	Not available.

<b>Reportable Quantity</b>	
<b>Special Provisions for Transport</b>	Not applicable.
<b>TDG Classification</b>	Not controlled under TDG (Canada).
<b>ADR/RID Classification</b>	Not controlled under ADR (Europe).
<b>IMO/IMDG Classification</b>	Not controlled under IMDG.
<b>ICAO/IATA Classification</b>	Not controlled under IATA.

Section 15. Other Information				
Label requirements				
Hazardous Material Information System (U.S.A.)	Health	1	National Fire Protection Association (U.S.A.)	<div><div>Health</div><div>Fire Hazard</div><div>Reactivity</div><div>Specific Hazard</div></div>
	Fire Hazard	0		
	Reactivity	0		
	Personal Protection			
References				
Other Special Considerations				
Validated by Dr. B on 8/04.				
<u>Notice to Reader</u> <i>To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein.</i>				