1. IDENTIFICATION OF SUI	BSTANCE AND SUPPLIER					
Name On Label Product Number Supplier	N-alpha-Toluenesulfonylarginine methyl ester hydrochloride 11154 Johnson Matthey Catalog Company Inc. 30 Bond Street, Ward Hill, Massachusetts, 01835-8099 Emergency Telephone Number: (978) 521-6300; CHEMTREC: (800) 424-9300					
Alternative Names	None in common use.					
2. COMPOSITION AND INF	ORMATION ON COMPONENTS					
Name Minor Impurities CAS No.	N-alpha-Toluenesulfonylarginine methyl ester hydrochloride Not determined 1784-03-8 EINECS No. 2172351 EEC No.					
3. HAZARDS IDENTIFICATION						
Designation	No specific hazard					
Risk Phrases	None specified - Exercise all due care in use					
4. FIRST AID MEASURES						
Inhalation Eye Contact Skin Contact Ingestion	Remove to fresh air. Seek medical advice if symptoms persist. Flush with copious amounts of water for at least 15 minutes. Wash affected area with soap and water. Rinse thoroughly. Rinse out mouth and drink lots of water. If unusual symptoms are observed, seek medical advice.					
5. FIRE FIGHTING MEASUR	RES					
Extinguishing Medium Protective Equipment	Use fire fighting measures which suit the environment and take into account other materials which may be involved. In general, water-based extinguishers should not be used for fires involving organic materials. Use carbon dioxide or dry powder. Wear self-contained breathing apparatus and protective clothing.					
Hazardous Products of Combustion may include: carbon monoxide, carbon dioxide, oxides of nitrogen, nitric acid, sulfur dioxide, sulfuric acid, hydrogen chloride (hydrochloric acid), hydrogen cyanide.						
6. ACCIDENTAL RELEASE	MEASURES					
Personal Protection	Wear protective equipment including rubber gloves, and eye protection. Keep unprotected persons					
Environmental Protection Collection	away. Take precautions to ensure product does not enter the drainage system. Mix with vermiculite or proprietary absorbent material and transfer to sealed containers for disposal.					
7. HANDLING AND STORA	GE					
Handling Storage	Chemicals should be used only by those trained in handling potentially hazardous materials. Rubber gloves, eye protection and protective clothing should be worn. Operations should be carried out in an efficient fume hood or equivalent system. Store in tightly sealed containers in a freezer or cold room at -25 to -30 degrees centigrade. Product is hygroscopic. Take precautions to avoid contact with atmospheric moisture.					
8. EXPOSURE CONTROLS AND PERSONAL PROTECTION						
Respiratory Eye Hands and Body	Avoid inhalation of product. Handle in an efficient fume hood or equivalent system. Avoid eye contact. Wear safety spectacles or goggles. Avoid skin contact. Wear rubber gloves and protective clothing.					

## Continued on next page...

## 11154 continued.

9. PHYSICAL AND CHEMIC Appearance Physical Constants	CAL PROPERTIES White powder					
	White powder					
Appearance Physical Constants Molecular formula Water solubility Flash Point	Not available C <sub>14</sub> H <sub>22</sub> N <sub>4</sub> O <sub>4</sub> S.HCl	-	Formula Wt. Density	378.87 Not available		
	Not available	L	enany			
10. STABILITY AND REACTIVITY						
Specific Hazard						
Incompatibilities Decomposition	Strong oxidising agents. Hazardous products of decomposition may include:carbon monoxide, carbon dioxide, oxides of nitrogen, nitric acid, sulfur dioxide, sulfuric acid, hydrogen chloride (hydrochloric acid), hydrogen cyanide.					
11. TOXICOLOGICAL INFORMATION						
RTECS No.	Not listed					
Acute Toxicity	LD <sub>50</sub> : No data reported	LD <sub>50</sub> : No data reported				
12. ECOLOGICAL EFFECT	S					
General	Take care to prevent chemicals from entering the ground, water courses or drainage systems.					
13. DISPOSAL CONSIDERATIONS						
Disposal	Disposal should be via an approved contractor and should take full account of local regulations.					
14. TRANSPORT INFORMATION						
UN Number						
Land Transport Maritime Transport Air Transport	ADR/RIC Code/Class IMDG Code/Class IATA Code/Class	Not Restricte Not Restricte Not Restricte	ed			
15. REGULATORY INFORMATION						
CAS No. 1784-03-8	EINECS No. 2172351	EEC No.	UN No.	None RTECS No. Not listed		
Hazard Indication	No specific hazard					
Risk & Safety Phrases	None specified - Exercise all due care in use					
TSCA	Not listed. For research and development use only.					
16. OTHER INFORMATION						
It must be recognised that the physical and chemical properties of any product may not be fully understood and that new, possibly hazardous products may arise from reactions between chemicals. The information given in this data sheet is based on our present knowledge and shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.						
on our present knowledge a	nd shall not constitute a	guarantee for	any specific produ	ict features and shall not establish a		