Material Safety Data Sheet Issue Date: 1/27/2004 Section 1: Chemical Product and Company Identification Cat#: 18163A Part Name: MONOMER I SOLUTION (LOWICRYL K11M) Supplier: Polysciences, Inc. 400 Valley Road Warrington, PA 18976 Telephone #215-343-6484 Section 2: Composition/ Information on Ingredients Item # Name CAS# % in product 1 2-Ethoxyethyl methacrylate 002370630 18 2 2-Hydroxyethyl acrylate 000818611 28 2-Propenoic acid, 2-methyl-, butyl ester 000097881 16 3 4-Methoxyphenol 000150765 0.015 4 Hydroxypropyl methacrylate 027813021 38 5 OSHA (ACGIH) Exposure Limits TWA STEL CEILING CAS# IDHL mg/m3 ppm mg/m3 ppm mg/m3 ppm 000097881 NE OSHA: NE NE NE NE NE NE ACGIH: NE NE ΝE ΝE ΝE ΝE 000150765 ___ OSHA: Not --___ ___ ___ ___ ACGIH: -- 5 ___ ___ ___ ___ 000818611 NE NE NE OSHA: NE NE NE NE ACGIH: NE NE NE NE NE NE 002370630 NE ACGIH: NF NE NE NE NE NE NE NE NE 027813021 NE NE NE NE OSHA: NE NE NE NE NE NE ACGIH: NE NE NE Section 3: Hazards Identification Causes respiratory tract irritation. Causes severe skin and eye burns. Harmful if swallowed. May be fatal if absorbed through skin. May cause allergic skin reaction. Hazard Ratings: These ratings are Polysciences' Inc. own assessments of the properties of the material using the ANSI/NFPA 704 Standard. Additional information can be found by consulting in the NFPA published ratings lists (List 325 and List 49). If no data is listed the information is not Health Flammability Reactivity ----- 1 ------2 2 Section 4: First Aid Measures Flush eyes with flowing water for at least 15 minutes. If breathing is difficult, contact emergency personnel.

If swallowed, wash out mouth with water if person is conscious. Remove contaminated clothing.

Remove to fresh air. Separate eyelids with finger tips. Wash skin with deluge of water for at least 15 minutes. Section 5: Fire Fighting Measures Flash point, deg F.: >200 Method: UEL: no data LEL: no data Autoignition temperature, deg. F.: no data Flammability no data Flame Propagation no data Hazardous Combustion Products: no data Section 6: Accidental Release Measures Any information listed below is to be considered in addition to internal guidelines for isolation of spill, containment of spill, removal of ignition sources from immediate area, and collection for disposal of spill by trained, properly protected clean up personnel. Absorb liquids on absorbent material. Contain spilled liquids. Protect personnel from exposure. Ventilate the area. Section 7: Handling and Storage Store at 25 deg. C. Section 8: Exposure Controls/ Personal Protection The use of eye protection in the form of safety glasses with side shields and the use of skin protection for hands in the form of gloves are considered minimum and non-discretionary in work places and laboratories. Any recommended personal protection equipment or environmental equipment is to be considered as additional to safety glasses and gloves. Use chemical splash goggles and face shield. Use latex or equivalent gloves. Use process enclosures, local exhaust ventilation, or other engineering controls. Section 9: Physical and Chemical Properties Formula: no data vapor pressure: no data Formula Weight: no data vapor density: no data boiling point: > 246 C Specific gravity: 1.029 melting point: no data ph: no data solubility: 10.6 g/l appearance: liquid Section 10: Stability and Reactivity Chemical stable Conditions to Avoid: heat, UV light, free radical initiators Incompatibility with other oxidizing and reducing agents Hazardous Decomposition none Hazardous may occur Section 11: Toxicological Information Acute no data Subchronic data: no data Section 12: Ecological Information no data Section 13: Disposal Considerations

The following chart lists the status of the chemical and its components in reference to 40 CFR Part 261.33. If the product is listed by code number the substance may be subject to special federal and state disposal regulations. If no codes are listed the material must be disposed in compliance with all Federal, State and Local Regulations. CAS# Waste Code Regulated Name 000097881 not listed not listed 000150765 not listed not listed 000818611 not listed not listed 002370630 not listed not listed 027813021 not listed not listed Section 14: Transportation Data Refer to bill of lading or container label for DOT or other transportation hazard classification , if any. Section 15: Regulatory Information Prop 65 - Column A identifies those items which are known to the State of California to cause cancer. Column B identified items which are known to the State of California to cause reproductive toxicity. Column A Column B CAS# 000097881 no no 000150765 no no 000818611 no no 002370630 no no 027813021 no no State Regulatory Information : If a CAS# is listed below this material is subject to the listed state right-to-know requirements. CAS# 000097881 FL MA ΡA 000150765 FL MA MN ΡA WΑ 000818611 FL MA ΡA 002370630 not listed 027813021 not listed SARA Toxic Release Chemicals (as defined in Section 313 of SARA Title III) This list identifies the toxic chemicals, including their de minimis concentrations for which reporting is required under Section 313 of the Emergency Planning and Community Right-to-Know Act (EPCRA). The list is also referred to as the Toxics Release Inventory (TRI) List. CAS# Regulated Name de minimis conc. %Rep. Thres. 000097881 not listed not listed not listed 000150765 not listed not listed not listed 000818611 not listed not listed not listed 002370630 not listed not listed not listed 027813021 not listed not listed not listed SARA Extremely Hazardous Substances and TPQs This list includes hazardous chemicals as defined in 29 CFR 1910.1200(c); and extremely hazardous substances regulated under Section 302 of SARA Title III with their TPQs (in pounds), as listed in 40 CFR 355, Appendices A and B. CAS# Regulated Name TPQ (pounds) EHS-RQ (pounds) 000097881 not listed not listed not listed 000150765 not listed not listed not listed

000818611not listednot listednot listed002370630not listednot listednot listed027813021not listednot listednot listed

CERCLA The hazardous substances, and their reportable quantities (RQs) are listed in the federal regulations at 40 CFR Part 302, Table 302.4. Release of a CERCLA hazardous substance in an amount equal to or greater than its RQ, in any 24-hour period, must be reported to the National Response Center at (800) 424-8802. CAS# Regulated name RQ pounds 000097881 Not listed Not listed 000150765 Not listed Not listed 000818611 Not listed Not listed 002370630 Not listed Not listed 027813021 Not listed Not listed

Section 16: Other Information

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END OF MSDS