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## Material Safety Data Sheet

**Catalog Number:** IM109

**Product Name:** Substrate Kit

*The below information is believed to be correct but may not be all inclusive. It is intended to be used as a guide. You, as the user, should independently verify the suitability and safety of the product under your conditions of use. **Cygnus Technologies, Inc.** shall not be liable or responsible for the use of this information or the material supplied and thus the user shall assume all risk in the use of the product. Disposal of hazardous material may be subject to local, state or federal regulations.*

### Description of Contents:

**Stop Solution, Product # IM106**

0.5M Sulfuric Acid

**TMB Substrate, Product # IM105**

3,3', 5,5' Tetramethylbenzidine

Methanol

### Hazardous Ingredients:

Only the ingredients listed below have any known toxicities. For the other materials shown above no biological hazard has been established. At the concentrations used the hazards are minimal, however this kit should only be used by experienced laboratory personnel trained in the proper techniques and general laboratory safety. The following procedures apply for all components of this kit.

**General Toxicological Information** - Inhalation of any aerosols from these components may induce sensitization and cause allergic reactions in sensitized individuals.

**First Aid Measures** -

**Skin Contact:** Wash skin with soap and water. If symptoms occur consult a doctor.

**Eye Contact:** Rinse eyes with water for 10 minutes and contact a doctor.

**Ingestion:** Rinse mouth and throat with water and consult a doctor.

**Inhalation:** Exit from exposure area. If symptoms of irritation, sensitization or if breathing difficulties occur, contact a doctor.

**Fire fighting measures:** No special requirement. Water or foam are suitable. There are no special exposure hazards.

**Accidental release procedures:** Spilled material should be absorbed into paper or cloth towels with the area washed with water. Avoid splashing or aerosolization. Ensure sufficient ventilation.

**Handling and storage:** Store at 2°C to 8°C. Avoid aerosolization.

**Exposure controls and personal protection:** Wear impermeable gloves, protective eye wear.

## **Hazardous Chemicals:**

### **1. Tris{hydroxymethyl}-aminomethane**

- Irritant to eyes, respiratory system, and skin

### **2. Sulfuric Acid**

- Causes severe burns
- May be fatal if swallowed
- Do not get in eyes, skin or clothing
- Immediately flush eyes and skin with water for 15 minutes
- If swallowed do not induce vomiting, give milk or egg whites beaten with water

### **3. Methanol**

- Harmful if swallowed, inhaled or absorbed through the skin.
- Causes irritation of eyes, skin, and mucous membrane of the upper respiratory tract
- Chronic effects may be damage to eyes, liver, kidneys and heart

### **4. 3,3',5,5'-Tetramethylbenzidine (TMB)**

- Mutagenic effects seen in laboratory experiments