

## **Ethidium Bromide Waste Disposal Guidelines**

**Solutions containing ethidium bromide:** Small quantities of **aqueous** solutions containing < 10 µg/ml (10 ppm) EtBr may be flushed down the drain. Stock solutions containing > 10 µg/ml EtBr must either be managed as hazardous waste or deactivated using the Lunn and Sansone Method before disposal to the sanitary sewer.

### **Lunn and Sansone Method**

For each 100ml of ethidium bromide solution:

- Add 5% hypophosphorus acid
- Add 12 ml of 0.5 M sodium nitrate
- Stir briefly and let stand for 20 hours
- Adjust PH to 4-9 using sodium hydroxide
- Pour down drain with copious amounts of water

Solutions can also be filtered using any of the commercially available EtBr filter units. The filtered material must then be managed as hazardous waste. Below is a commonly used charcoal filtration unit available through Fisher Scientific.

### **Schleicher and Schuell Extractor Ethidium Bromide Waste Reduction System**

Provides for rapid removal of EtBr from gel staining solutions.

- One step filtration method.
- Available through Fisher Scientific.
- Cat # - 10448030

**Do not treat or discard non - aqueous solutions down the drain. Collect in a suitable container and manage as hazardous waste.**

### **Gels and “Non Sharp” Lab Debris Contaminated With Ethidium Bromide**

Collect gels and contaminated “non-sharp” lab debris (e.g., gloves, pads, towels, tubes, etc.) into a 5 gallon pail. Label the outside of pail Ethidium Bromide Waste and keep container closed at all times except when immediately adding or removing wastes from the container. Once the pail is 75% full contact EHS @ 3-7352 for removal and delivery of a new pail.

**Sharps** contaminated with ethidium bromide (needles, syringes, slides, broken glass, etc.) must be discarded into an infectious waste sharps container.