Silver Recovery Policy

Silver is found in various materials used in photographic processing. The largest sources of silver are photographic films and papers. Once processed, some silver may be retained on the photographic film and paper while some silver may be transferred to the photographic processing solutions. These solutions may be considered hazardous wastes if they contain greater than or equal to 5 ppm of silver (EPA Hazardous Waste Number D011).

REHS is currently attempting to improve and standardize the silver recovery efforts underway at the university. Silver containing liquid wastes generated by photographic processes may be managed two ways. A silver recovery unit may be used or silver-containing waste may be collected for disposal as hazardous waste via REHS.

Silver recovery units are available through commercial vendors. These units filter the photographic solutions and retain hazardous chemicals and discharge non-hazardous chemicals. These units must be regularly serviced by a contractor in order to maintain the efficiency of the silver recovery filter. If the filter becomes loaded, the unit may suffer mechanical problems and hazardous materials may be discharged into the drain. REHS advocates the use of silver recovery units as a mechanism of waste minimization. Individual departments are responsible for the costs incurred by the use of silver recovery units.

If a department does not have a silver recovery unit to process the photographic waste they generate, the photographic processing solutions must be collected as hazardous waste. Used processing solutions must not be disposed of down the drain. REHS will provide 5-gallon carboys for collection of used solutions. These carboys are maintained in a Satellite Accumulation Area for hazardous waste until ready for disposal via REHS.

REHS requests that individual departments develop and forward to REHS a list of all darkrooms and areas where photographic processes might take place within their department. This information can be submitted on the “Silver Recovery Report Form.” Items to be included in the list are x-ray units, dark rooms, and bench-top automated photo developers. REHS requests that departments submit this information as soon as possible. Departmental assistance in compiling this information is appreciated greatly. This inventory is to be included in the university’s comprehensive environmental management audit currently being negotiated with federal EPA. In light of the current regulatory climate, a sound university-wide silver recovery program is required. Please contact REHS at (732) 445-2550 with any questions or comments concerning this issue.