

## **Chemical Disinfection**

**PURPOSE:** To provide guidelines for disinfection of instrumentation and durable equipment.

**POLICY:** The recommended guidelines for disinfection of instrumentation and

durable equipment will be followed.

## **PROCEDURE:**

1. The selection and use of chemical disinfectants.

- A. Critical items (items that enter sterile tissue of the vascular system) shall be sterile.
  - a. Endoscopes and other endoscopic equipment that enter body cavities are classified as critical items and shall be subject to a sterilization process. If this is not possible, they shall receive at least high-level disinfection.
- B. Semi-critical items (items that encounter mucous membranes of non-intact skin) shall receive high-level disinfection.
- C. Basic cleaning may be sufficient for non-critical items (items that come in contact only with intact skin) and shall receive intermediate to low level disinfection.
- 2. Items shall be thoroughly cleaned before disinfection.
  - A. In accordance to manufacturer's written instructions, medical devices with multiple pieces shall be disassembled for cleaning.
  - B. Enzymatic detergents may be used to facilitate the cleaning process.
  - C. Following the cleaning process, instruments shall be thoroughly rinsed and dried before the disinfection process.
- 3. Chemical disinfectants shall be used per the Association of Practitioners in Infection Control (APIC) recommended guidelines.
  - A. All chemical disinfectants used in the practice setting shall be registered with the Environmental Protection Agency (EPA) and approved for use by the Food and Drug Administration (FDA)
  - B. Manufacturer's written instructions shall be followed when preparing solutions and calculating expiration dates.
  - C. The efficacy of the chemical disinfectant shall be checked and documented once in each 24-hour period of normal operating hours.
  - D. Items shall be completely immersed in the chemical disinfectant.
    - a. Lumens shall be completely immersed in the chemical disinfectant.

- E. Items shall remain immersed for the entire recommended exposure time.
- F. Critical and semi-critical items shall be thoroughly rinsed by immersing them manually in three (3) separate volumes of sterile water, or a continuous rinse with an automated system.
  - a. Lumens shall be flushed with sterile water during each of the three (3) separate manual rinses.
- 4. The practice setting shall provide a safe environment for personnel when using chemical disinfectants.
  - A. Chemical disinfectants shall be kept in a covered container.
  - B. Chemical disinfectants shall be kept in well ventilated areas.
  - C. Protective apparel, including eyewear and gloves shall be worn when using chemical disinfectants.
    - a. Additional protective apparel shall be worn dependent on risk.
  - D. Disposal of chemical disinfectants shall adhere to Federal, State, and Local regulations.