Introduction

This factsheet describes the minimum reprocessing requirements for reusable infant feeding equipment in Queensland Health. It is important that equipment used for the purpose of expressing breast milk and/or feeding infants is managed to prevent contamination of equipment and transmission of infection.

Infant feeding equipment meets the Spaulding classification of semi-critical medical devices\(^1\). Semi-critical medical devices have contact with intact mucous membranes or non-intact skin\(^1\). Semi-critical reusable medical devices require high-level disinfection at a minimum.

Breast milk is classified as a body fluid and may contain potentially infectious matter\(^2\), that is microorganisms, blood and blood-borne viruses.

Recommendations

Reprocessing Reusable Infant Feeding Equipment

1. Disassemble all used equipment and clean all used items thoroughly as soon as possible after using. Cleaning can be undertaken mechanically with a wash cycle in the washer/disinfector or manually using neutral detergent and water.

2. Thermal disinfection or sterilization should then be performed. Chemical disinfection should only be used when thermal disinfection is not suitable\(^3\) (refer section titled Chemical Disinfection for further information).
   - the following temperature-time parameters are recommended to achieve thermal disinfection using moist heat\(^3\)
     - 90 degree centigrade for 1 minute
     - 80 degree centigrade for 10 minutes
     - 75 degree centigrade for 30 minutes
     - 70 degree centigrade for 100 minutes

3. Infant feeding equipment that is not being used immediately after thermal disinfection or sterilization should be stored to prevent environmental contamination\(^3\).

Washer/disinfectors should:
   - include the appropriate accessories to reprocess infant feeding equipment
   - be fit for purpose (i.e. for a hospital setting)
   - meet the technical standard (AS 2945)
   - be maintained according to the manufacturer's instructions, including routine cleaning.

Reprocessing Single Patient Use Infant Feeding Equipment

Equipment that is re-used for mothers and their babies for the purpose of expressing breast milk and feeding babies must undergo cleaning and high-level disinfection or sterilization between each use.

1. Manufacturer's instructions for single patient use infant feeding equipment should be followed. Single patient use infant feeding equipment that is unable to undergo high-level disinfection should be used as single use equipment only.
2. All items must be clearly labelled with the patient’s details
3. Equipment should be cleaned and thermally disinfected/sterilized as outlined in the section above titled Reprocessing Reusable Infant Feeding Equipment
4. After reprocessing, single patient use infant feeding equipment should be stored in a clean labelled container in the mother’s room or designated place in the nursery.

Single Use Only Infant Feeding Equipment

Infant feeding equipment labelled as single use only that has been used, shall not be reprocessed.

High Level Chemical Disinfection

Disinfection of reusable infant feeding equipment should be achieved by thermal means unless the equipment is heat labile. Chemical disinfection should only be used when thermal disinfection is not suitable.

Where chemical disinfection is necessary, the disinfecting agent(s) manufacturer’s directions for use shall be followed in relation to exposure time, temperature, pH, etc., to ensure achievement of the specified level of disinfection.

Any chemical disinfectant that is used shall be entered on the Australian Register of Therapeutic Goods (ARTG) for that purpose with the Therapeutic Goods Administration Australia (TGA).

Commercial Home Sterilizers

Commercial home sterilizers, including boiling and microwaving methods are not recommended for use in hospitals. They do not meet the above criteria for reprocessing of infant feeding equipment in hospitals.

Definitions

Infant Feeding Equipment: is all equipment used for the purpose of expressing breast milk and feeding babies either expressed breast milk or infant formula e.g. breast pumps, membranes, valves, breast shields, bottles and teats.

Reusable Medical Device: is a medical device that is intended by its manufacturer as suitable for reprocessing and reuse.

Semi-critical Reusable Medical Device: semi-critical items according to Spaulding Classification (1968) have contact with mucous membranes or non intact skin.

Single Patient Use: more than one episode of use of a medical device on one patient only, the device may undergo some form of reprocessing between each use in accordance with the manufacturers’ instructions for reuse on the same patient.

Single Use Only: means the medical device is intended to be used on an individual patient during a single procedure and then discarded. It is not intended to be reprocessed and used on another patient.

References

3. AS/NZS 4187