I. PURPOSE:
   A. To provide guidelines for surface disinfection to dialysis related equipments. Association for the Advancement of Medical Instrumentation (AAMI) and Centers for Disease Control (CDC) guidelines for dialysis recommends the use of low-level disinfection, as the method of choice for surface disinfection in a dialysis setting in which the surface is not visibly soiled or visibly contaminated with blood. Low-level disinfection is defined as the use of any soap, detergent, or detergent germicide. If the item is visibly contaminated with blood, intermediate-disinfection level will be performed (registered tuberculocidal). Dialysis machine exterior components are polycarbonate plastics and are not compatible with disinfectants containing quaternary ammonium compounds like N-alkyl (C₁₂ – C₁₈) dimethyl benzyl ammonium chloride.

II. POLICY:
   A. Splash zone shall be defined a 6 feet radius from the patient position and the radius shall segregate contaminated versus non-contaminated contact area. Any item within the splash zone is considered contaminated.
   B. Gloves will be worn when using the healthcare hydrogen peroxide wipes.
   C. Minimum contact time for low-level disinfection with the hydrogen peroxide wipe is 30 seconds. A 1 (one) minute minimum contact time will be adopted as unit policy.
   D. Contact time for intermediate-level disinfection is 5 minutes (per “Visible Blood Procedure below).
   E. Canister cover will be secured at all times except during the act of removing wipes from the canister.
F. Only 12” x 11” wipes will be used to disinfect dialysis machine and dialysis chairs. One wipe per item will be used. One wipe is effective to keep a 26.6 square feet area surface wet for 2 minutes; a 17.55 square feet area surface wet for 3 minutes; a 8.5 square feet area surface wet for 4 minutes. One 12” x 11” wipe will be used for the dialysis machine and a second wipe used for the dialysis chair.

G. 6.75” x 9” wipes can be used on ancillary small surfaces not inclusive in the splash zone. One 6.75” x 9” wipe is effective to keep a 12.32 square feet area surface wet for 2 minutes; 6.21 square feet area wet for 3 minutes; 4.45 square feet surface wet for 4 minutes.

H. In the case of positive *c. difficile*, ONLY bleach product will be used.

### III. PROCEDURE:

A. Supplies


B. Steps

1. Use one 12 x 11 wipe for dialysis chair and a separate 12 x 11 wipe for the dialysis machine and ancillary item in the splash zone.

2. Uncap the canister and remove the amount of wipe to be immediately used. Immediately is defined as within one minute of removing wipes from container.

3. Recap the canister immediately after removing the appropriate wipes needed.

4. Wipe from the cleanest surface to the dirtiest surface.

   a) Dialysis machine wipe shall be from the top, left (non-shunt side), front, right (shunt side).

   b) Chair wipe shall be from head to foot, then non-access side, access side; then (c)

   c) Chair side-arm shall be opened and disinfected.

   d) Use of hydrogen peroxide wipe is a one-step process and does not require pre-cleaning or rinsing.

   e) Allow to air dry.

C. Visible blood procedure

1. In the event of visible blood, a two tier wipe method must be followed

   a) Use an initial CHP wipe and remove all visible blood from surface. Utilize multiple wipes if necessary to remove all visible blood from surface.
b) Perform a second surface disinfection using a fresh CHP wipe to disinfect per normal surface disinfection procedure and allow for a 5 minute wet contact time.

D. Ancillary equipment
1. Ancillary equipment such as work station on wheels, supply carts, medication carts should not cross the “splash zone”. Any ancillary equipment crossing the splash zone barrier shall be surface disinfected using an appropriate size wipe for the surface area per this policy.
2. Items such as sharps container that are prone to blood contamination shall be surface disinfected per the “Visible blood procedure” on an after every shift schedule and PRN when blood is evident on the container.
3. Splash zone area cleaning/disinfection also include the wall coving and dialysis drain pan.

E. Blood Pressure Cuff
1. Disposable cuffs shall be used for multiple visits and will be changed when visibly soiled, dirty or bloody. Cuffs shall also be replaced when the Velcro is unable to maintain a tight fit on the arm.
2. Cuffs are porous and cannot be effectively disinfected.
3. To prevent cross-contamination, cuffs shall be placed in the patient’s designated plastic bag at the conclusion of the treatment. The plastic bag shall be designated with the patient’s name affixed to the inside of the bag.
4. After placement of the cuff into the plastic bag, the plastic bag shall be exteriorly wiped with disinfectant and allowed appropriate wet-contact time prior to placement in the holding bin.

F. Priming Buckets
1. After initiation of dialysis and treatment settings have been established, remove the priming bucket plastic liner. Ensure that no content of the plastic bag is spilled into the priming bucket. The content of the plastic bag can be emptied by two methods: (1) pour the content into the station drain panel, (2) carefully transport and empty the plastic bag into the designated dirty sink.
2. After treatment is concluded, the priming bucket must be included as part of the station surface disinfectant practice.

**Note:** If the priming bucket is contaminated from the content of the priming bag spilling into the bucket or if blood product is evident in the priming bucket, the bucket must undergo a bleach solution dwell of a bleach solution that yield a minimum of 1:100 parts per million sodium hypochlorite and rinsed prior to subsequent use.
G. Wall Station
   1. Machine acid and bicarb tubing lines and red and blue connectors plugged into the central feed wall station A/B ports shall be included into the surface disinfection process. A/B connectors and tubing shall be wiped with the disinfectant in between treatments.

IV. REFERENCES:

A. Association for the Advancement of Medical Instrumentation

B. Centers for Disease Control

C. Conditions for Coverage ESRD

D. Clorox Brand Hydrogen Peroxide Cleaner Disinfectant IFU