Section: HRMC Division of Nursing Index: 8620.154a Page: 1 of 1

Issue Date: March 15, 1995 Review Date: March 25, 2005

PROCEDURE

TITLE: PULSE OXIMETRY

PURPOSE: To outline the steps in pulse oximetry.

SUPPORTIVE DATA: Potentially serious problems can be detected early with pulse oximetry before signs and symptoms

develop.

EQUIPMENT LIST: 1. Finger clip

2. Ear clip

3. Adhesive sensor - neonatal, infant, or pediatric

CONTENT: <u>PROCEDURE STEPS</u> <u>KEY POINTS</u>

1. Choose appropriate sensor.

2. Place sensor on appropriate location.

a. Use finger clip over nail bed on adult or co-

operative child.

There should be no nail polish or acrylic nails on finger. The finger clip is attached to Marquette Monitor. 1-3* appear to indicate strength of pulse sensed. A slight movement of the sensor may alter reception.

b. For infant or pediatric patient, use adhesive sensor over nail of large toe or over foot.

c. Ear clips are placed on ear lobe or upper outer ear with light toward head.

3. Document percentage of 0_2 saturation in appropriate space on record. 97%-100% is the normal 0_2 saturation.

Rub ear with alcohol and allow to dry before placing sensor on ear lobe.

Be aware Sa0₂ values can be influenced by movement, low perfusion due to drugs, P.V.D., venous pulsation, outside light and anemia. Carbon monoxide poisoning produces a misleading Sa0₂. Subtle changes in patient's blood pressure, color, respiration and pulse rate may indicate need for pulse oximetry monitoring.