

## **MOBILE DIABETES CENTER POLICY AND PROCEDURE**

**SUBJECT: BLOOD GLUCOSE SCREENING –STUDENT/FACULTY/HEALTHCARE PERSONNEL**

**EFFECTIVE DATE: 10/16**

**REVIEWED/REVISED DATE: 1/17, 3/18, 9/20**

**PURPOSE: To provide non diagnostic blood glucose screening in the community.**

**MAY BE IMPLEMENTED BY:** trained healthcare personnel and students overseen by faculty nursing administrators. (Nursing students who have completed competency skills and demonstrated competency in Population Health I course).

Responsibilities:

- a. Blood Glucose screening performed by trained healthcare personnel and students is intended to provide a rapid non-diagnostic, blood glucose result that identifies whether glucose level is in within the normal range, or impaired.
- b. Blood glucose screening associated with the Mobile Diabetes Center will be done by healthcare personnel and students trained in the proper use of blood glucose monitoring equipment and appropriate technique for capillary specimen procedure.

**PROCEDURE:**

1. Allow the HemoCue Glucose 201 analyzer and microcuvettes to adjust to the temperature of the location where you are testing. Approximately 30 minutes is required for the microcuvettes to adjust to the temperature of a new location prior to performing a blood glucose test. Microcuvettes taken to room temperature are good for only three days and should be marked as such.
2. Plug in the analyzer. This unit also has batteries if unable to use a reliable power source. Allow the analyzer to perform the SELFTEST. NOTE: The analyzer will perform the SELFTEST at regular intervals if left on.
3. Check expiration and discard dates. Inspect microcuvettes to be sure it does not appear torn or damaged.

4. Perform the quality control check using the Hemocue glucose control solution. Document the high and/or low readings on the quality control log. **Solution must be refrigerated.**
5. A Faculty/Student/Healthcare professional will be assigned to greet screening participants, explain and obtain consent. This person will also have the participant complete the Self-assessment screening for undiagnosed pre-diabetes or diabetes. The consent form will remain with the participant throughout the screening process.
6. A Faculty/Student/Healthcare professional will obtain a blood specimen for screening purposes. Refer to the Hemocue Glucose 201 Operating Manual for all instructional materials.
7. Understand how to correctly use lancing device and prepare lancing device.
8. Ensure the cuvette holder is in the loading position. The display will show ready and three flashing dashes.
9. Clean chosen site with alcohol. Allow to dry or wipe with a dry, lint free gauze pad.
10. Use only the middle or ring fingers and avoid fingers with rings on. Using your thumb, lightly press the finger from the top knuckle towards the tip stimulating blood flow to the sampling site. Use the side of the fingertip. While applying light pressure towards the fingertip, puncture the finger using the lancet.
11. Wipe away the first 3 drops of blood. Re-apply light pressure to the fingertip until another drop of blood appears.
12. When the blood drop is large enough, fill the microcuvette in one continuous process. The microcuvette shall be completely filled. Do not overfill.
13. Wipe off excess blood from the outer surface of the microcuvette with a lint free gauze pad, being careful not to touch the open end of the microcuvette.
14. Look for air bubbles. If present, discard microcuvette and take a new sample.
15. Place microcuvette into the cuvette holder. Gently push the cuvette holder towards the analyzer and into its measuring position. This must be done no later than 40 seconds from the sample being collected.
16. In 40-240 seconds, the sample result will be displayed. Record result on the consent document in the accurate location. Results will be replayed to client in verbal and written format.

17. Place alcohol wipe, gloves, and other trash into trash bag. Place microcuvette, gauze, and other potential Biohazards into red Biohazard bag.
18. Appropriate education will be shared with the participant based on the screening results by the lead RN. Participants will be told that screening results are in no way diagnostic of any disease. Education provided to clients and student projects will be based on the American Association of Diabetes Educators best practice guidelines.
19. Participants with fasting blood glucose results that are outside the normal range of 70-100mg/dl or non-fasting blood glucose results greater than 140mg/dl for non-diabetics and greater than 180mg/dl for diabetics should be referred to their primary provider as outlined below in #20
20. Student/Faculty/Healthcare professional will refer each person with an abnormal screening result to his or her primary provider. If a person does not have a primary provider, assistance in locating/identifying a provider will be offered. If a person does not have a provider and does not have insurance, he or she will be referred to the list of Federally Qualified Health Centers (ie. One World, MCHC, Charles Drew- listing is available on the MDC). Education provided to clients and student projects will be based on the American Association of Diabetes Educators best practice guidelines.
21. Faculty and students will immediately direct persons with symptoms of hypoglycemia or hyperglycemia to the nearest Emergency Department or in the case of severe symptoms activate the Emergency Response System by calling 911.

The following link displays the HemoCue online certified user program and videos:

<http://hemocuecertifieduser.com/>

### **References**

American Association of Diabetes Educators [AADE], (2011), *The Art and Science of Diabetes Self-Management Education Desk Reference*. 2<sup>nd</sup> Ed. Chicago, Illinois.

HemoCue Glucose 201 Operating Manual (n.d.). Retrieved from

<https://www.manualslib.com/manual/939978/Hemocue-Glucose-201Plus.html#manual>