

APPENDIX: 09**TITLE: LUCAS Chest Compression System****REVISED: November 1, 2017**

The LUCAS Chest Compression System is designed to provide chest compressions for adult patients who are unresponsive, pulseless, and apneic. The LUCAS Chest Compression System may be utilized when CPR is appropriate as noted in the adult cardiac arrest protocol.

Contraindications:

Patient is too small- The LUCAS device will alarm with three fast signals when “Pause” or “Active” buttons are depressed.

Patient is too large- The upper part of the LUCAS device must lock to the back plate without compressing the patient’s chest

Instructions:

- Confirm cardiac arrest
- Start manual compressions
- Position the bag with its top towards you
- Turn the unit on while it is in the bag to start the self-test
- Remove the LUCAS back plate from the carry bag
- Stop CPR and support the patient’s head while placing the back plate under the patient, immediately below the arm pits
- Resume manual CPR
- Hold the handles on the support legs to remove the LUCAS upper part from the bag. Pull the release rings once to make sure the claw locks are open.
- Let go of the release rings and attach the support leg that is nearest to you to the back plate
- Attach the other support leg to the back plate
- Pull up once on the legs to make sure the legs are correctly attached
- Adjust the height of the suction cup by pushing the “Adjust” button and using two fingers press the suction cup down until it touches the patient’s chest
- Position the suction cup immediately above the end of the sternum(the compression point is the same location as for manual CPR)
- Push the “Pause” button to lock this setting in place,
- Check for proper position. If needed, push the “Adjust” button and pull the suction cup up and readjust to the proper position
- Push the “Pause” button to lock this setting in place
- To start compressions push “Active continuous” if an advanced airway is in place or “Active 30:2” if an advanced airway is not in place
- **IMPORTANT:** To prevent the LUCAS from migrating and potentially causing an iatrogenic injury, attach the stabilization strap behind the patient’s neck as near the shoulders as possible

LUCAS Chest Compression System

- Secure the patient's arms with the LUCAS arm straps
- Stop compressions by pushing the "Pause" button when lifting the patient to a backboard or stretcher
- Start compressions by pushing "Active continuous" or "Active 30:2"
- The LUCAS Chest Compression system may remain active while moving a patient when it and the patient are safely positioned on the transportation device