

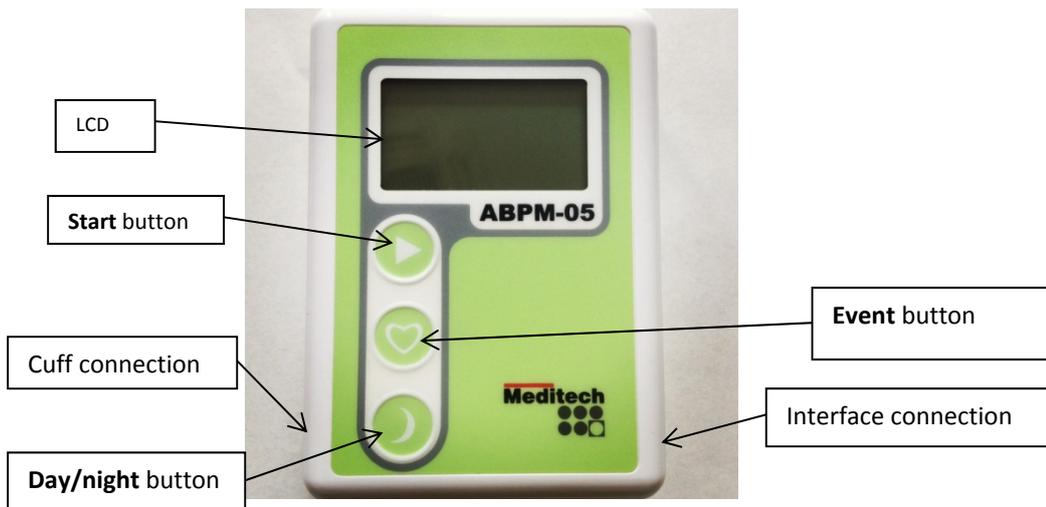
Frequently asked questions ABPM-05 ambulatory blood pressure monitor used with CardioVisions software



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1. Which are the basic interfaces and buttons on the device?



2. What do the symbols on the LCD mean?

1. The LCD indicates important status information, the processes and the results of individual readings. The table below summarizes these symbols.

	Communication with a personal computer	- : -	Event marker set during a button push
	Blood pressure measurement initiated (mmHg)	n 54	Pumping for measurement, current pressure is displayed (mmHg)
	Heart symbol blinking: measurement in progress (mmHg)	u 93	Deflation during measurement, current pressure is displayed (mmHg)
	Systolic value of just completed measurement (mmHg)	- 92	Diastolic value of just completed measurement (mmHg)
	The blood pressure measurement is cancelled by pressing a button	E 1	Error code display (see question 2 for more details)
	Normal status: time is displayed	P 86	Pulse rate value of just completed measurements (beats/minute)
	The device is switched off	16:23	The crossed battery symbol warns of low battery

20:38'	Night mode: time is displayed, moon symbol is lit.	2.37	Battery voltage display (2,37V)
88:88'	LCD check: all segments are displayed		

3. Why is the LCD showing E and a number?

1. This is an error code which can indicate three possibilities:

1. **Unsuccessful measurements**

1. E-1 – too much movement by the patient: instruct patient to move less
2. E-2 – manually aborted measurement: ask patient about the cause of abort
3. E-3 – batteries run down during measurement: replace batteries
4. E-4 – batteries were replaced during measurement: no action necessary
5. E-8 – preset pressure limit exceeded: use higher preset limits
6. E-9 – static discharge, temporary disturbance: no action needed if it is not frequent. If this error happens frequently then please contact your local distributor's support team.

2. **Cuff related errors (31-34)**

1. Check if the cuff is properly connected to the device and properly put on the patient's arm.
2. If you have a spare cuff then connect it to the device and test it. Contact your local distributor's support team if the error is still present.

3. **Device errors**

1. E-90 – if this is a constant error, then please return the device to your local distributor's support team
2. E-99 - check if the cuff size is properly selected in the software. Contact your local distributor's support team if the error is still present.

4. What to do when nothing is shown on the LCD?

1. Check the voltage of the batteries in the device (min. 2,5 V for fully charged rechargeable batteries and over 3 V for fresh alkaline batteries). See section 7/4 for instructions to check the voltage.

2. Check the LCD: press and hold the START button to light up all segments of the LCD to check if they all work correctly. Contact your local distributor's support team if the error is still present.

5. The LCD does not show the correct time, how can I set it?

1. Please connect the device to the PC and program it. The clock should self-adjust to the correct time.

6. The LCD shows 00:00 as current time. Is this an error?

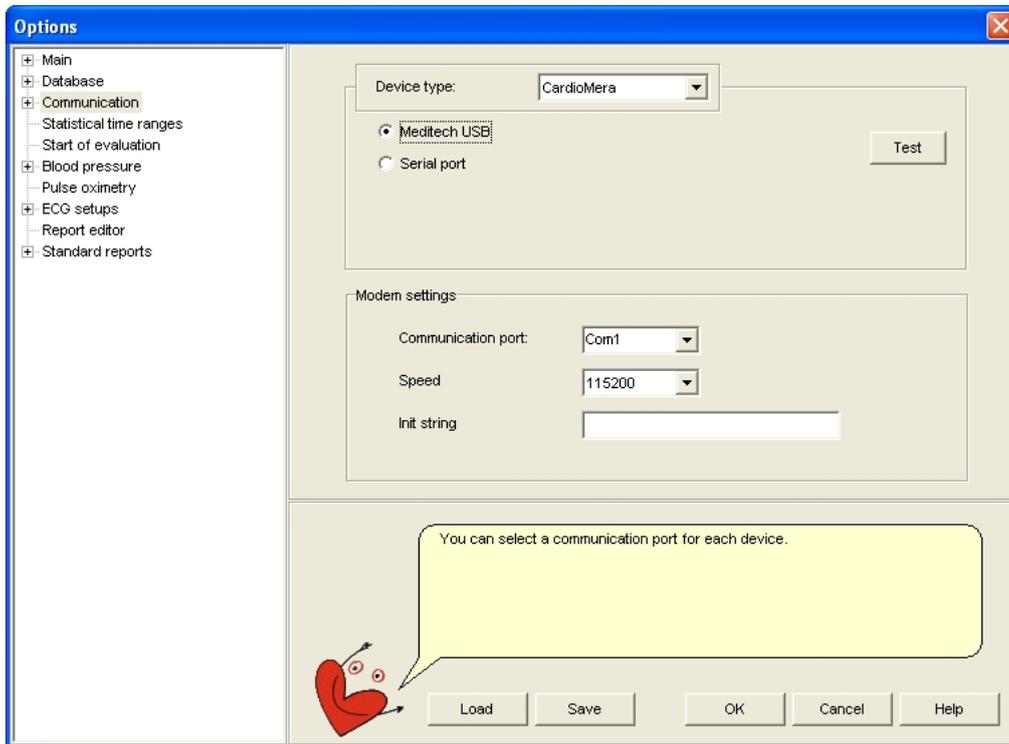
1. Was the device stored without use in the past months? In this case the internal battery might have run down. In order to charge them, put two batteries in the device and leave them there for 24 hours. If this doesn't help, please contact your local distributor's support team.

7. Why is there no communication between the PC and the device (cannot program or read data)?

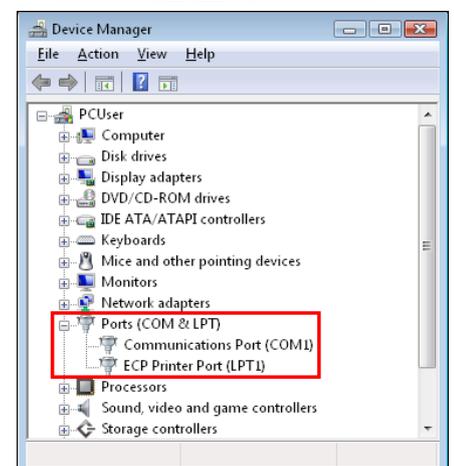
1. Please follow these step by step actions until the problem is resolved.
2. Check if there are batteries in the device.
3. Check if the batteries are put in correctly. (as the marks show on the photo)
4. Check the voltage of the batteries in the device (min. 2,5 V for fully charged rechargeable batteries and over 3 V for fresh alkaline batteries). There are two ways to do this: either check the LCD of the device when you put the batteries in or press and hold the START button for more than 5 seconds, but less than 10 seconds to display voltage on the LCD.
5. Try if a test measurement works by pressing the button with a triangular symbol.
6. Check the PC device connection. The red marker on the cable has to be on same side as it is indicated on the back label of the device (see photo on the right).



7. Go to Settings (F9) and set the connection to USB (see print screen below)



8. Check if you have a spare cable to test the connection with it. If it works, then please return the original cable to your local distributor's support team.
9. Start the programming of the device and check if the LCD shows PC (see photo on the right). If not then remove the cable from the device during programming and look at the cable. Is there a red blinking light on the removed end of the cable? If yes then the PC settings are OK.
10. Check the device manager on your PC (System → Hardware → Device manager). Under PORTS (see print screen from **Windows XP** to the right) please check if any of the COM ports have unusual symbols next to them. If yes remove the COM port manually and install the USB driver which is available on the Meditech CD or at www.meditech.eu
11. If none of these solutions work, please contact your local distributor's support team.



8. How can I make it work on Mac?

1. This software only operates on Windows based PCs.

9. How can I make it work on a network?

1. The CardioVisions software has a Network Edition which is available on the installation CD. Please contact your local distributor's support team in order to receive more information about the network version.

10. Can the device be used with another computer?

1. Yes, if the CardioVisions software is installed on the other computer. You may also export and import databases between different computers.

11. Why cannot I install the CardioVisions software?

1. Check if the error is related to the screen resolution of your computer. Change the resolution to larger than 800*600.

12. Why cannot I print a report?

1. Check if you have a printer installed.
2. Check if the default printer is turned on and connected to the computer (the CardioVisions software can only print via the default printer).
3. Try to print any other document. If you cannot, please adjust the settings of the installed printer.

13. Is there any way to indicate special events (such as taking medication, cardiac pain, etc.)?

1. Yes, you may use the button marked with a heart on the device (some doctors prefer event diaries in these cases).

14. How can the patient start a non-programmed, extra measurement?

1. By pressing the Start (triangle) icon.

15. How can a measurement be stopped?

1. By simply pressing any of three buttons of the device.

16. What should be done with the device during the night?

1. The device should be put next to the person wearing it by loosening or taking of the straps. By default programming the device shifts to a less frequent measurement sequence automatically after 10 p.m.

17. What happens if the patient goes to bed earlier/later than expected?

1. Earlier: before going to bed the patient should press the day/night button which initiates the night mode (less frequent measurement sequence). This button has to be enabled in the software in order to do that (pressing the day/night and making a note could serve as a reminder if disabled).
2. Later: the patient should tell the doctor about the real time of going to bed (pressing the event button and making a note could serve as a reminder)

18. What happens if the patient wakes from bed earlier/later than expected?

1. Earlier: after waking up the patient should press the day/night button which initiates the day mode (initiating a more frequent measurement sequence). This button has to be enabled in the software in order to do that.
2. Later: the patient should tell the doctor about the real time of waking up (pressing the day/night and making a note could serve as a reminder if disabled).

19. Why does the device not pump after starting the measurement?

1. Check the LCD if it shows an error code, see question 3.
2. Check if the cuff is properly connected to the device and properly put on the patient's arm.
3. Check the batteries.

20. The device shows a different value than on the home blood pressure monitor, is it accurate?

1. This device is a professional 24 hour ABP monitor with a validated algorithm and a calibrated pressure sensor. While it is very much possible that the home blood pressure monitor has not been calibrated.
2. Check the production year of the device (the first four digits of the serial number). If the production year is within two years of the current date then the device calibration is still valid. If the device is older then ask your local distributor's support team if it has been checked for calibration in the past two years.

21. What should the patient not do while wearing the device?

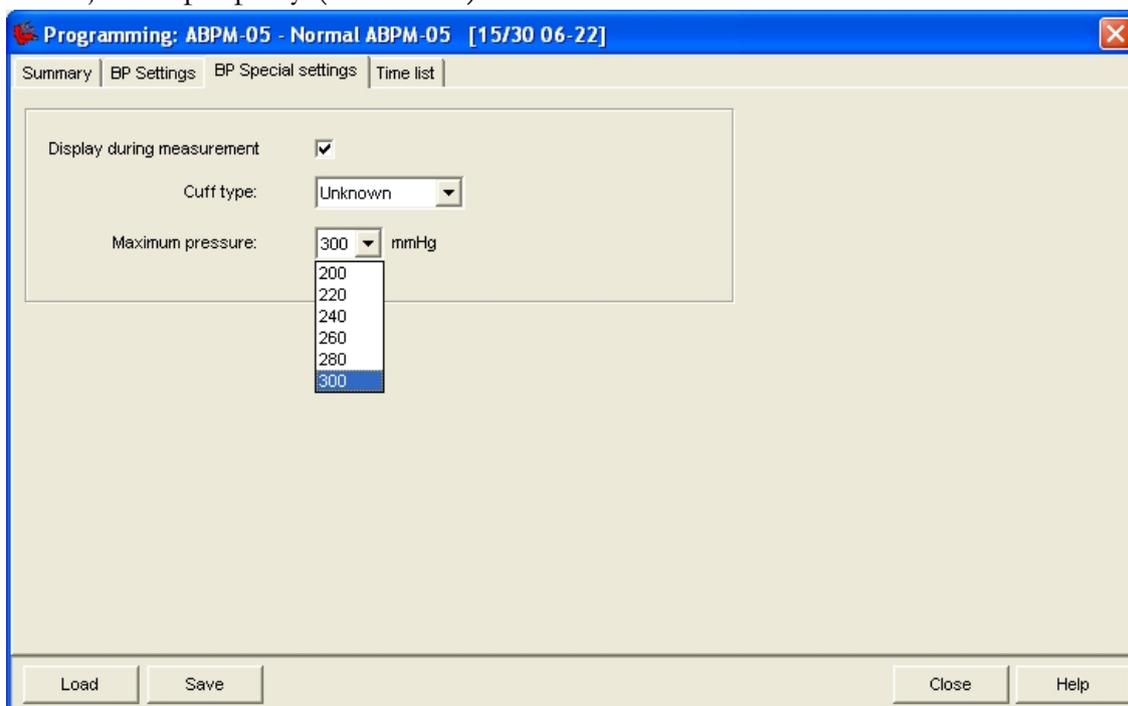
1. This device cannot be used underwater, nor is it waterproof. Please contact your distributor if there is a sign of water ingress.
2. Avoid too much movement during measurements. This can lead to too many unsuccessful measurements.

22. What are the options if the batteries run down during a measurement?

1. Batteries may be changed or replaced at any time. If this is done during a measurement then an E-3 error code will appear. When changing the batteries make sure that the batteries are placed correctly (see question 7).

23. How can I record extremely high blood pressure with the device?

1. Check the programming session if the maximum pressure (300 mmHg) is adjusted properly (see below). The maximum measured value is 260 mmHg.



24. Does the device work with a non-Meditech cuff?

1. Technically it can work but it is not advised to be used. Many types of cuffs contain chalk powder which damages the device in the long run. Moreover Meditech cannot guarantee the precision of measurements with non-Meditech cuffs.