

pedar FAQ

pedar hardware

Q: How often do the insoles need to be recalibrated? How will I know when the insoles need to be recalibrated?

A: The insole calibrations should be checked at least every three months (depending on usage). To check the calibration, place the insoles in the tru-blue calibration device, load the insoles through the load values up to 6 Bar. Check that the values that are displayed in the software with the values that appear on the monometer. If the values match within 5%, the calibration is okay. If the values differ by more than 5%, recalibration of the sensors should be done.

Q: With the pedar-x, Bluetooth has problems establishing a connection.

A: A Bluetooth connection may fail for several purposes. If the wrong COM port is entered into the **Data Acquisition > Test connection** window, the connection will not be established. Please check the outgoing port listed by right clicking the Bluetooth icon in the Windows system tray, selecting the COM port tab, and making note of the outgoing COM port listed for pedar-x. Enter this COM port in the **Data Acquisition > Test connection** window from the pedar online measurement window.

Windows occasionally drops the Outgoing connection (the connection used by the novel pedar software). Right click the Bluetooth icon in the Windows system tray and select Show Bluetooth Connections. Select the pedar connection and click the **Remove** button. After the pedar connection has been removed, select the **Add** button to re-establish connection (for details review the pedar-x manual on establishing Bluetooth connections).

The Bluetooth connection may fail because the middle dip switch on the back of the pedar-x analyzer is in the fiber optic cable measurement position (down position). With the analyzer turned off, switch the dipswitch in the up (Bluetooth position), switch the analyzer on, wait approximately 30 seconds, test connection in the pedar online measurement software with the Outgoing COM port number listed in the Bluetooth software.

Q: I am receiving dropped frames during collection. How can I improve the Bluetooth connection between my pedar analyzer and my Bluetooth dongle?

A: To improve the signal transmission between the pedar analyzer and the Bluetooth dongle, ensure that there is a clear path (no visible obstructions between the Bluetooth dongle and the pedar analyzer antenna). A USB extension cable (up to 5 meters) can be used in conjunction with the Bluetooth dongle to allow the Bluetooth dongle to be placed on a tri-pod or other pole to position the Bluetooth dongle in an unobstructed view with the pedar analyzer. You may also be receiving interference from wireless networks in the area. If possible, disable the wireless network card within the computer during data collection.

Q: Only the bottom half the insole sensors are appearing (working) when I try a data collection or calibration. The rest of the insole sensors show as time outs (TO).

A: Check if the insole connector is inserted into the insole cable connector correctly. The **R** on the right insole connector must line up on the same side as the **R** on the right insole cable connector and the **L** on the left insole connector must line up on the same side as the **L** on the left insole cable connector.

pedar software

Q: How do I increase the sampling rate above the maximum sampling rate of 100 Hz for both insoles (198 sensors) with the pedar-x.

A: The maximum sampling rate for the pedar analyzer is 20,000 sensors per second. If the number of sensors collected from is reduced, the sampling rate can be increased. To increase the maximum sampling rate, the number of sensors collected from must be reduced. To increase the maximum sampling rate, select the insole configuration from the **insole configuration** dropdown menu. Select **Data Acquisition Measurement with masks**. Delete all the masks present (4th icon from the right). Select one of the four masks immediately to the left of the insole graphic. Select the **Rectangle** drawing tool. Left click and hold to the left and above the sensors that you would like to include. Multiple areas can be selected simply by lifting up off the left mouse button and left clicking and holding to the left of the next sensor area. After selecting the sensors to be included, click the **Save masks** button (2nd button from the left) to save the mask and click the **Download all masks** button (2nd button from the right). Save the new configuration (.mfg). After saving, a small window will appear that allows adjustment of the sampling rate. Select sampling rate and click **Download** button. Unload each insole when prompted and click the red record button (5th from the left).

Q: The settings that I select from the menu on the pedar-x online measurement screen (e.g. COM port settings, Automatic scale on graphs, Error code settings, MVP options, etc.) are not saved when I exit from and reopen the software.

A: After selecting the desired measurement and display options, before exiting the software, select File→Exit with storing changes. The settings will be saved, and you will not be required to select the changes the next time you open the program.

Q: Could you explain choices for the Mean Value Picture (MVP) under the Options menu.

A: There are three options for the MVP calculation: over all frames, only over loaded frames, and only over loaded sensors.

1. Over all frames: The mean pressure is calculated using all frames of data, even the frames with no pressure on any of the sensors. This will result in the lowest mean pressure of all the MVP options.
2. Only over loaded frames: The mean pressure is calculated from only frames that had at least one sensor that registered pressure. All frames in which the sensor was completely unloaded will not be used in the mean pressure calculation. If a sensor was unloaded during a frame that other sensors were loaded, the zero value for that unloaded sensor will be used in the mean calculation.
3. Over loaded sensors: The overall sensor (left and right insole) and individual sensor mean pressure with in an insole is calculated with only the frames and only the sensors that were loaded. No zero pressure values will be used in the mean value calculation. This will result in the largest of all the MVP options.

Although most users select the last option, Over loaded sensors, each mean pressure picture option should be considered before using these pictures for review. If you have any further questions regarding these options or which option you should use, please contact novel electronics inc.

Q: I am concerned that the pliance-x analyzer will go out of range of the Bluetooth dongle attached to the PC. Can anything be done to ensure that I do not miss data during data collection?

A: To ensure that you do not miss data during data collection, you can select to collect both to the Flash memory on the analyzer and to the PC memory. Select Data Acquisition --> Mode --> Online+Flash. After selecting this option, select an Insole configuration from the drop down box on the pliance-x Online Measurement screen. Select Data Acquisition --> Flash --> Configure flash. This will download the configuration file selected from the Insole configuration drop down menu to the memory of the analyzer. Note: this will erase any measurements in the analyzer's flash memory. Please download any desired measurements that were collected before erasing the memory.

If the analyzer should go out of range of the Bluetooth dongle attached to the computer, you can download the data measurement file(s) from the analyzer's memory. Select Flash memory --> Download from flash. Select the measurement that the analyzer went out of range and select download. Save this file in stead—with the same name—of the file that you experienced missing frames of data.
