Cyclops®
PLUNGER ARRIVAL SENSOR

Connecting to, Updating, and Troubleshooting Cyclops

ETC®
EXTREME TELEMATICS CORP.

Download and open the free ETC Vision Device Management Software available here:

DOWNLOAD

Establish physical connection with ETC Link Kit available from any ETC channel partner (USB to RS485 connection).

VIEW HERE

Double check to ensure physical wiring from the Cyclops sensor to the Link Kit is correct, and making proper contact.

Ensure the RX switch found on the back of your Link Kit is set to position 2 for Cyclops.

Open ETC Vision and navigate to the "Setup" tab and select "Cyclops" as the device type you are connecting to from the Device dropdown.

Hit the "Refresh" button under Connection to ensure you have a USB to Serial Port (COMxx) connection to choose from the drop down, and hit "Connect".
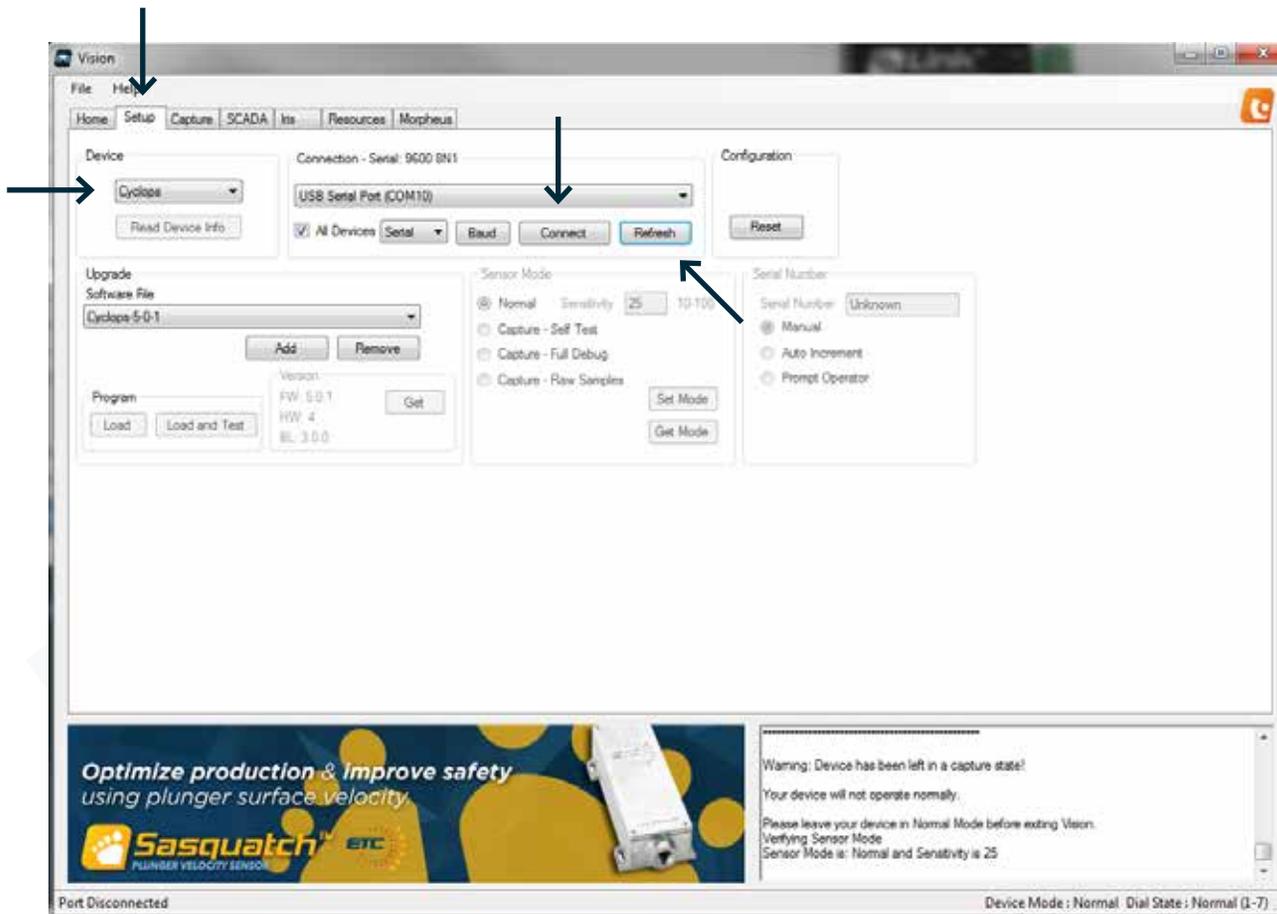
Once you have established a connection, the "Connect" button will read "Disconnect".

Using your instrumentation screwdriver provided with each Cyclops sensor, turn the manual sensitivity dial inside the Cyclops to position "0".

This is the position that puts the Cyclops into Program Mode and is used whenever you are reading or writing any info to the Cyclops.

Confirm the FW Version that is currently on the Cyclops

Once you are connected, hit the "Get" button.

The current FW Version on the Cyclops will be displayed (in example below, current FW Version is 5.0.1).
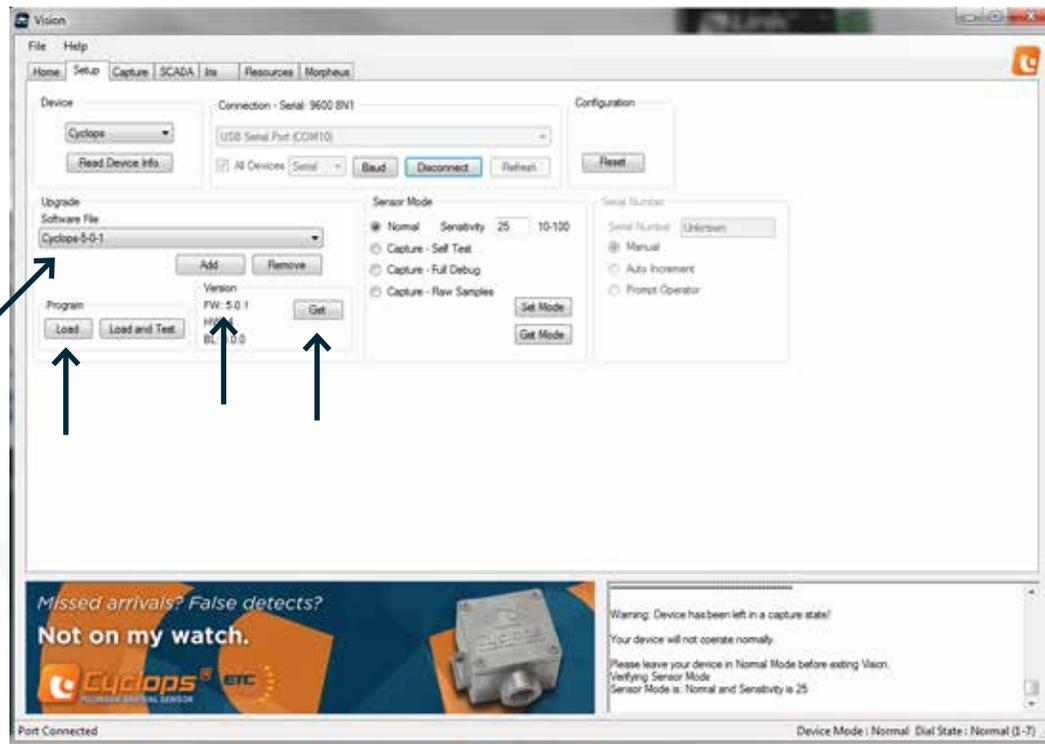
If you wish to change/update the FW from what is currently on the Cyclops you are connected to, choose the preferred file from the "Software File" drop down, and hit "Load".

In the bottom left hand corner of the Vision window, you will see a status bar that tells you the current FW is "Erasing", and the new chosen FW is "Downloading".

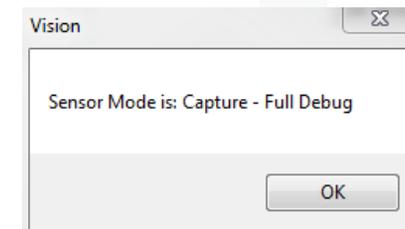You will also get a notification when the download is complete.
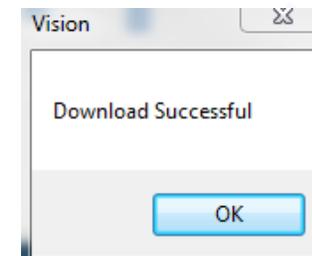
Confirming the Cyclops is functioning properly by performing a live capture

With the Manual Sensitivity Dial still in position "0", select "Capture – Full Debug" under Sensor Mode and hit "Set Mode".
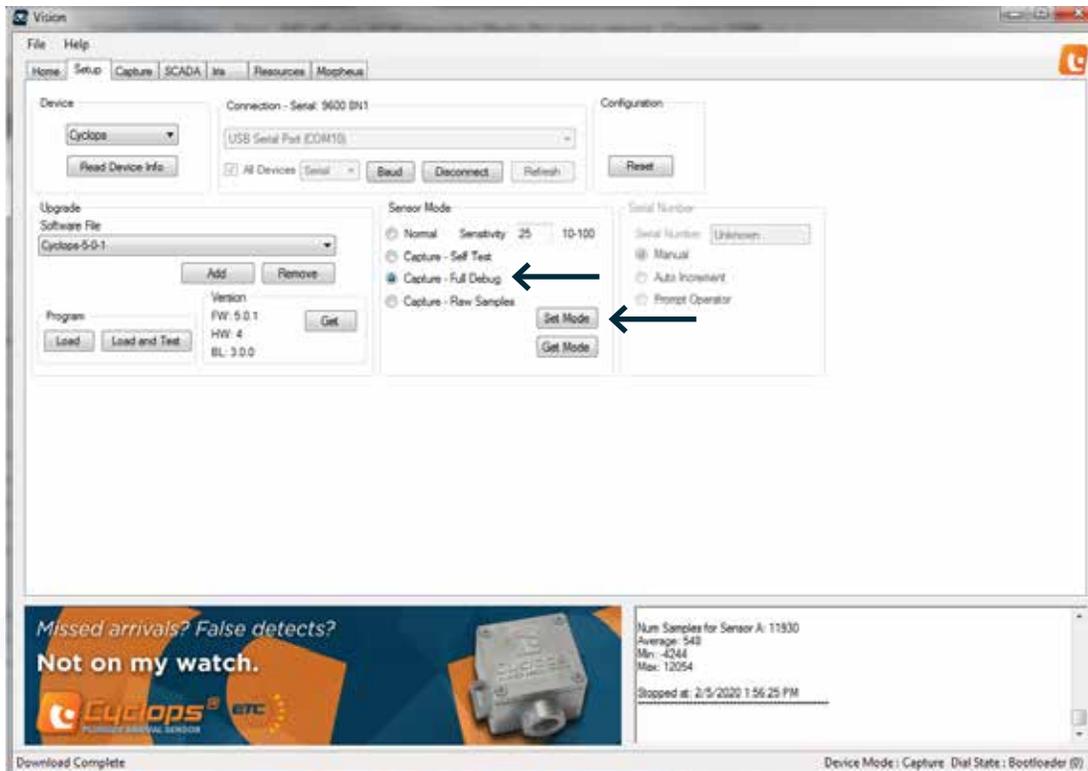
You will get a confirmation that the Sensor Mode has been changed.

Navigate to the "Capture" tab in Vision

When you hit "Start" you will be prompted to ensure the manual sensitivity dial on the Cyclops is set to a position other than "0". Sensitivity dial setting 4 is the most common for the majority of operating conditions.

Once the capture starts, the Cyclops will normalize and start monitoring and analyzing the current environment.

Once this is done, you will see that the switch is in the "Open" state, and the Cyclops is now measuring the baseline environment, and any changes to the environment detected from any ferrous object in the area.
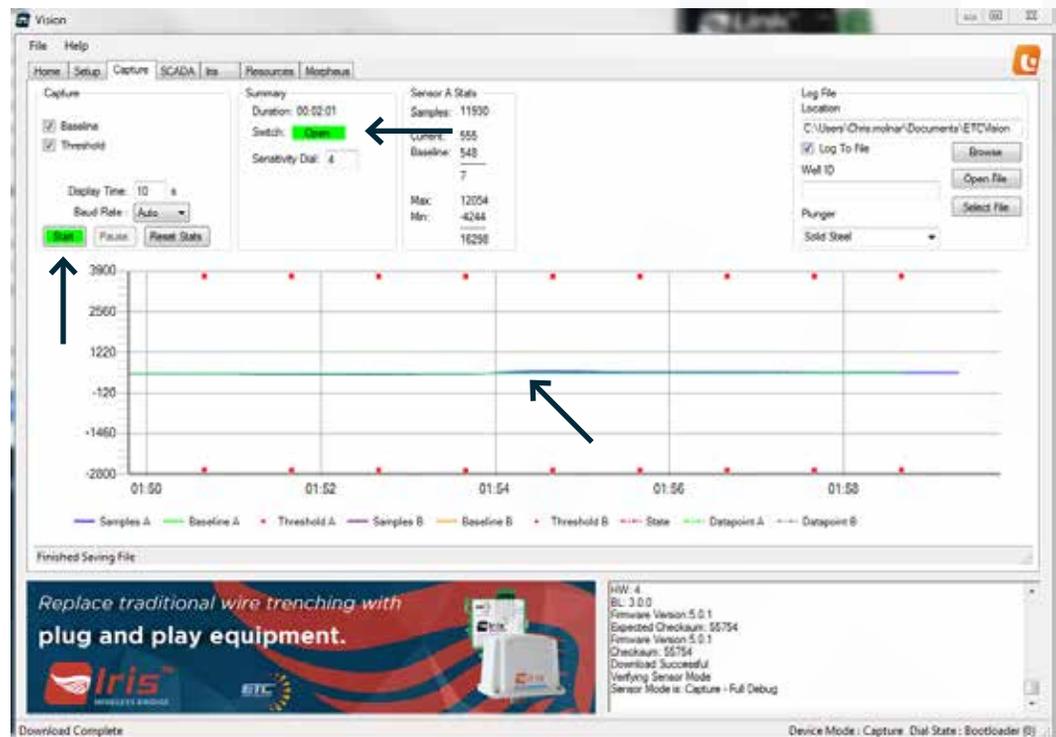
Simply move any ferrous object past the Cyclops to simulate a plunger arrival, and you will see the signature of the introduced change causing the Sample reading to exceed the thresholds.

The Switch state will now read "Closed" for the default 5 seconds, then return to open, and continue the live capture.
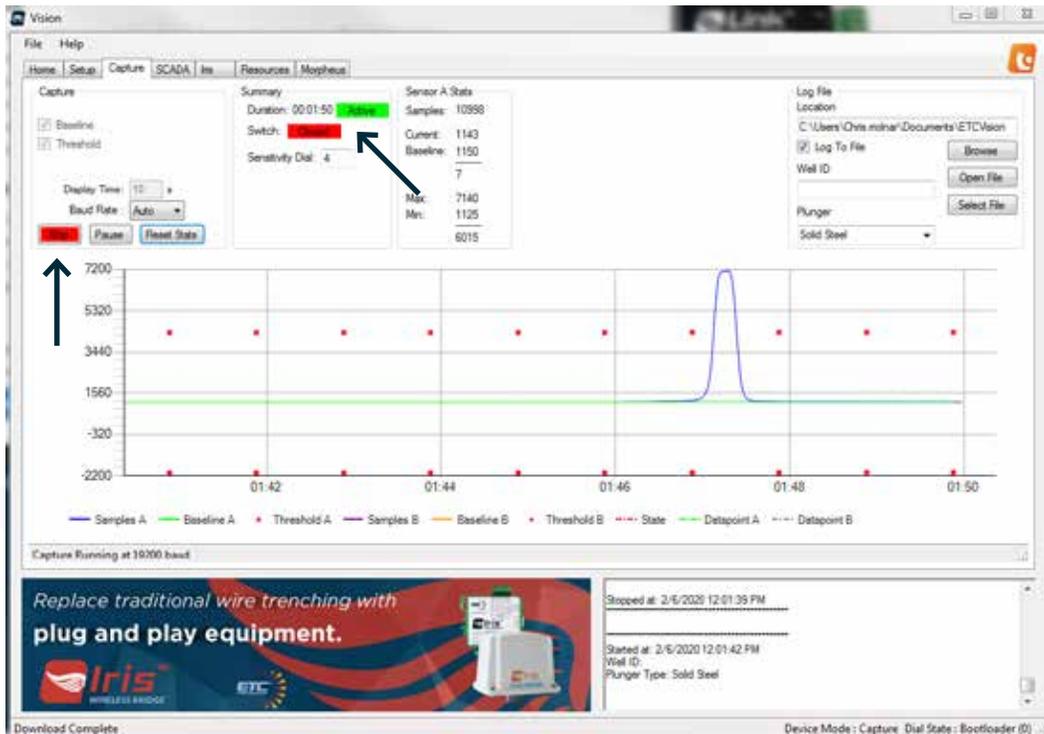
Once you have determined that the Cyclops is working as designed, you can stop the live capture.
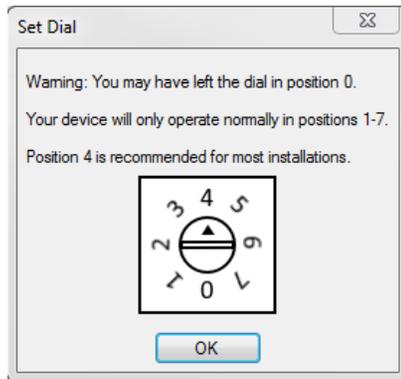
Returning the Cyclops to Normal Operation before disconnecting and closing ETC Vision

Navigate back to the "Setup" tab in Vision, and set Sensor Mode back to "Normal" by selecting the mode, and hitting "Set Mode" *
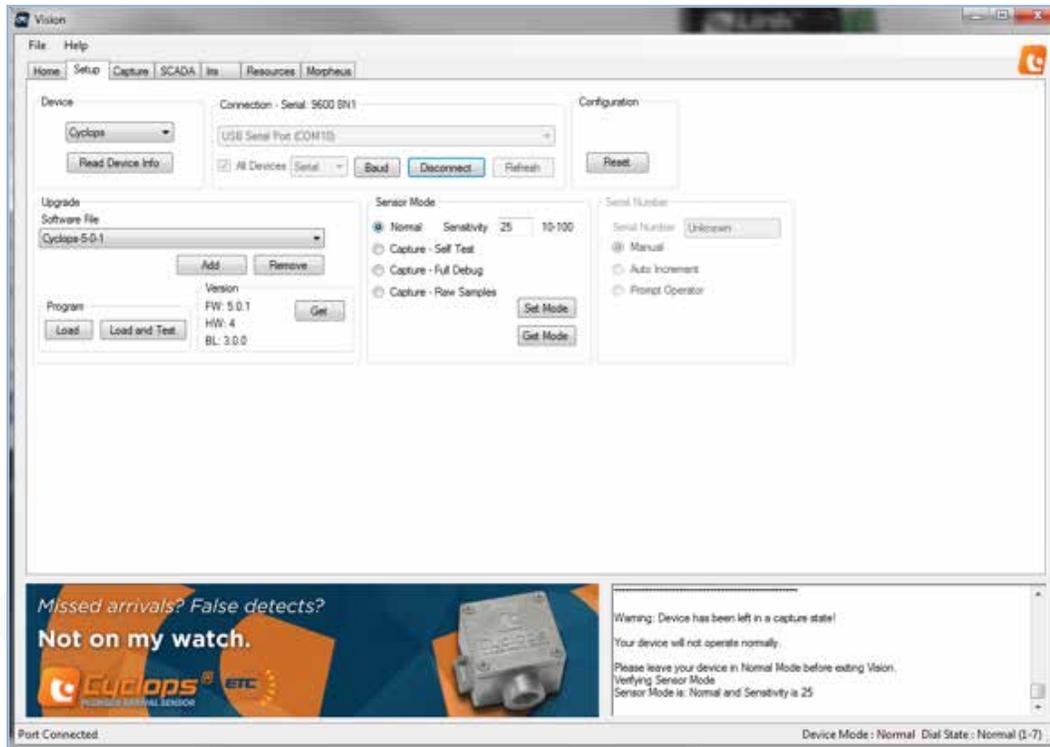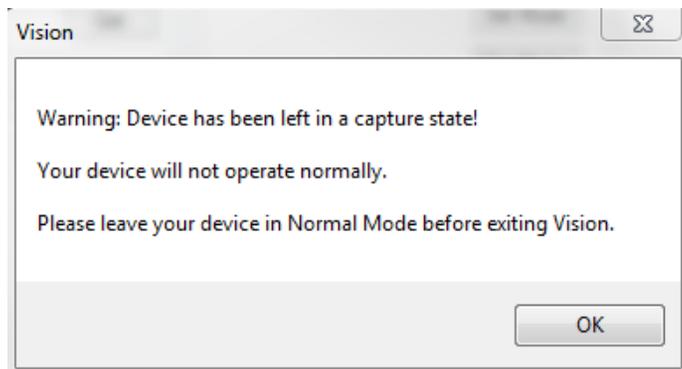

Once you have confirmed the Sensor Mode is "Normal" via the pop up notification on your screen, you can "Disconnect the USB Serial Port connection, and put the sensor back into operation in the field.

*Note you will prompted to ensure the Manual Sensitivity dial position is back on "0" in order to do so.

Set Dial ☒

Warning: You may have left the dial in position 0.

Your device will only operate normally in positions 1-7.

Position 4 is recommended for most installations.

OK

You will also see a reminder to ensure the Manual Sensitivity dial is set to a value other than "0" before going back into operation in Normal mode.

Vision ☒

Warning: Device has been left in a capture state!

Your device will not operate normally.

Please leave your device in Normal Mode before exiting Vision.

OK

If you disconnect without putting the Cyclops back into "Normal" mode, you will see this warning reminding you that you may have left the Cyclops in "Capture Mode".

If you see this warning, you must re-connect, and ensure the Cyclops is set to "Normal Mode" prior to disconnecting again and putting back into operation in the field.