

Imaging Troubleshooting: 3-Minute Microscope Check

Are You Trying to Get an Image But the Screen Is Dark?

In about three minutes, this step-by-step troubleshooting guide can help you identify errors or incorrect settings that may be causing your imaging problems. If at the end of the procedure the problem is not resolved, your system may need to be more thoroughly inspected.

Here is what you should do if you are having imaging problems with your microscope system:

1. Verify the hardware (see Image 1):
 - Follow the illumination light path and check for mechanical barriers (shutters/slides/switches).
 - Check that the excitation light is working (light source on/light coming from the front lens).
 - Ensure that the optical parts (especially the front lens) are clean.
2. Verify the light path (see Image 2):
 - Fluorescence: Check that you have selected the right filters/dichroics.
 - Ensure that the detection light path is correctly guiding the signal (to the oculars or camera/detector).
3. Verify the detection (see Image 3):
 - Using a (known) standard sample or plastic slide, verify that you can acquire a signal.
 - Camera: Make sure that your exposure time is set to a range where you normally detect signals (e.g., 500 ms).
 - FLUOVIEW microscopes: Ensure that the PMT high voltage is at least at 550 V.

Are you getting a signal from the standard sample? Good, the system is working in principle. Try to adapt the settings for the sample you had difficulties with.

Still not getting a signal? Contact the person responsible for the device to do a more thorough inspection or contact a Service Center.

