

# DIGISWAB

Digital Sensor Cleaning Swab

## HOW TO CLEAN YOUR CAMERA

**1**

Remove DIGISWAB from plastic box by handle only.



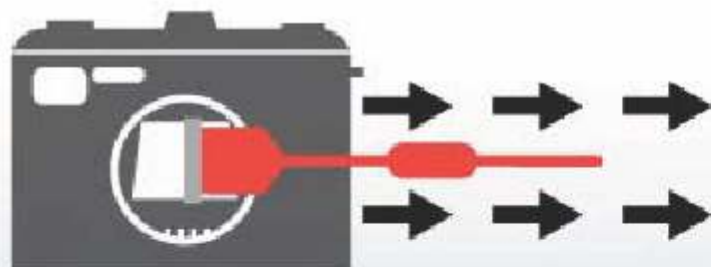
**2**

Place 2 drops of ULTRAPURE™ on DIGISWAB cleaning pad.



**3**

With firm pressure, wipe across sensor chip using one continuous motion.



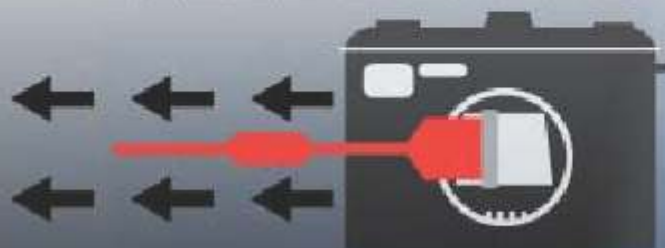
**4**

Flip DIGISWAB over to use reverse side of cleaning pad.



**5**

With firm pressure, wipe across sensor chip using one continuous motion in the opposite direction.



**6**

Do your part and throw away any trash left behind into a trash can.

**DO  
YOUR  
PART!**



Digital cameras have revolutionized photography. However, despite their many advantages, digital single lens reflex (DSLR) cameras have an inherent problem with dust on their imaging sensors. Imaging sensors build up an electrical charge which attracts and holds dust particles floating around in the camera. This appears as black spots on your photographs. Recently, manufactures have started using a self-cleaning system that discharges the sensor and then rapidly vibrates it to shake the dust off. While this works fairly well, it is far from one hundred percent effective. This means that you still have to manually clean the sensor, and it has to be done right—otherwise, you risk damaging the sensor, which is a VERY expensive repair.

Most dust particles on the sensor can usually be removed with a blast of air. This sounds simple but there is a lot to watch out for. The traditional canned air that is available in photo stores contains a propellant which can cause a real mess on the sensor: shake one of these cans or hold it at an angle and you can see the propellant. A better choice is to use an air bulb. These are also called “baby syringes” and consist of a rubber hand bulb with a small tube at one end, a sort of mini bellows. There is no propellant, but the air you are shooting at the sensor is the air around you; unless you are in a “clean-room” it still contains dust. You are possibly shooting dust right back on the sensor you are trying to clean. Plus, even the largest of these air bulbs cannot create a powerful enough air burst to clean off stubborn dust. The solution: compressed Nitrogen.

Nitrogen is an inert gas that reacts with virtually nothing, so it contains nothing that can harm the sensor. American Recorder's Nitro Blast compressed Nitrogen is propellant-free, and the air stream is powerful enough to remove ninety-nine percent of the dust or particle matter you'll ever encounter on the sensor. What about that final one percent? To get to that final, most stubborn dirt and dust, you will have to physically clean the sensor using a swab moistened with an effective cleaner. It is critical to use a cleaning fluid that will not damage the sensor and will not leave a residue behind. There are pre-moistened swabs and swabs that come with the cleaner in separate bottle. I prefer the latter of these, as the pre-moistened ones are usually so saturated with fluid that they leave a significant amount of it behind on the sensor. American Recorder's UltraPure Cleaning Fluid--used with American Recorder's Digiswabs--will do an effective job cleaning without harming the sensor or leaving residue. Since you apply the liquid cleaner to the swab, you can control the amount.

Now that we have the materials, let's get to work.

### How to Clean the Sensor

The sensor is located behind the camera's shutter. You will have to keep the shutter open while you service it. As the shutter is extremely delicate, this has to be done carefully. Most of the newer cameras have a special sensor-cleaning function that will open the shutter, lock it and discharge the sensor to stop the electrical charge. This function is usually a menu item found under the “Tools Menu”. If your camera has no sensor cleaning option, set the shutter speed to “B” and hold down the shutter button. Be sure to use a fully charged battery when you do this, and be careful not to take your finger off the shutter while you are cleaning the sensor or it will close. This could severely damage the shutter—another very expensive repair.

Once the shutter is open you can use your Nitro Blast to blast off most of the dust. If there is still dust on the sensor, apply a couple of drops of UltraPure Cleaning Fluid on a Digiswab and carefully and lightly run it across the sensor. Be careful not to over-saturate the swab. Use a second dry Digiswab to clean off any excess fluid on the sensor. Finally, finish off by removing any remaining particles with a blast of Nitro Blast.

To close the shutter, turn off the sensor cleaning menu item or just exit it. If you're using the “B” setting on the shutter speed dial, simply release the shutter and re-set your shutter speed. You can check the cleanliness of your freshly cleaned sensor by taking a picture of a white sheet of paper. If you don't see any black spots on the photograph then your sensor is pristine. If spots remain, it's time to take your camera in to a service center for a professional cleaning.

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Scott Frier graduated with a Master's Degree in History and Visual Education from State University of New York and taught photography in college. Joined the COUSTEAU SOCIETY as Chief Expedition Photographer and recently retired after 25 years as a technical specialist in digital imaging, underwater and wildlife photography for NIKON.

Today, Scott's Wildlife Photography Workshops offer unique, small group adventure/travel opportunities to those who want to take their wildlife photography to the next level.

For more information visit [www.wildlifephotoworkshops.com](http://www.wildlifephotoworkshops.com) or his personal website [www.frierworks.com](http://www.frierworks.com).