

Grey Scale Technology

UVIScan® offers you the world's leading technology in Under Vehicle Inspection Systems. Our Grey Scale technology is specially designed for Under Vehicle Inspection, where color hardly exists. We have carefully chosen Grey Scale technology because of its numerous advantages over other technologies such as color technology, such as the much higher quality of the image, no sensitivity for sunlight, and no need for (visible) halogen white light.

Advantages of Grey Scale Technology / disadvantages of Color Technology:

1. Most color Under Vehicle Inspection Systems (UVIS) use halogen white light with numerous disadvantages versus LED infrared technology (see LED infrared lighting technology)
 - a. Image quality and contrast
 - b. Invisible to the human eye – much better for security applications
 - c. No sensitivity to sunlight, no overexposure
2. The artificial light of halogen lamps results in color errors.
3. Due to the lack of sensitivity of color cameras, much more light is needed than with a black-and-white camera, which ultimately leads to increased costs, or the exposure time of the cameras is increased, which ultimately leads to much lower travel speeds.
4. The resolution of color cameras is 0.3-x to 0.5-x less than with a black-and-white camera due to the principle technology. This means only an object with the size of 10 to 15mm can be detected (for UVIScan this is 5mm).
5. Due to the much higher sensitivity of a b/w camera, the image quality is much higher. Color images are not as sharply focused as with a b/w camera.
6. The calculation effort for color image processing is higher by a factor of 3, which results in an increase in processing time until the entire picture is displayed on the user interface.