

When To Override Automatic Exposure

Light metering works best when it is reading a flat, middle-gray scene (18% reflectivity). But not all scenes are middle grey. Let's take a look at some of the most common situations where your automatic exposure system will have problems and you'll need to override the suggested exposure settings.

Scenes Lighter Than Middle Gray

Scenes lighter than middle gray, such as beach scenes, or bright sand or snow covered landscapes, reflect more than 18% of the light falling on them. The autoexposure system doesn't know the scene should look bright so it calculates an exposure that produces an image that is too dark. To lighten the image so it matches the original scene, you must override the camera's automatic exposure system to add exposure.

Scenes Darker Than Middle Gray

Scenes that are darker than middle gray, such as deep shadows, dark foliage, and black cloth, reflect less than 18% of the light falling on them. Although such scenes are not as common as scenes lighter than middle gray, you will come across them occasionally. If you photograph such scenes using automatic exposure, they will appear too light. The meter cannot tell if the scene is dark or just an ordinary scene with less light falling on it. In either case it increases the exposure to make the scene lighter. When it does this, it overexposes the image and makes it too light. To produce a picture with an overall tone darker than middle gray, you must override the autoexposure system to decrease the exposure to make it darker. Most digital cameras have an exposure compensation control.

Subject Against Very Light Background

Subjects against a very light background such as a portrait against a bright sky or light sand or snow, can confuse an automatic exposure system, particularly if the subject occupies a relatively small part of the scene. The brightness of the background is so predominant that the automatic exposure system reduces the exposure to render the overall brightness as a middle gray. The result is an underexposed and too-dark main subject. If you compensate for the dark subject, the light background will probably be overexposed. One solution is to use a flash to brighten the face, if the subject is close enough.

Subject Against Very Dark Background

When a small light subject appears against a large dark background, your autoexposure system assumes the overall tone to be darker than it actually is, because so much of the scene is dark compared to the smaller and brighter main subject. The autoexposure system increases the exposure to produce a middle gray tone. The result is an overexposed and too light main subject.

Scenes with High Contrast

Many scenes, especially those with brightly lit highlights and deep shadows, have a brightness range that cannot be completely recorded by an image sensor. When confronted with such scenes, you have to decide whether the highlight or shadow area is most important, then set the exposure so that area is shown accurately in the final picture. In high contrast situations such as these, move close enough so the most important area fills the viewfinder frame. Use exposure lock from that position to lock in the exposure. Another way to deal with high contrast is to lighten the shadows by adding fill flash. A portrait, for example, lit from the back or side is often more effective and interesting than one lit from the front. But when the light on the scene is contrasty, too much of the person's face may be in overly dark shadow. In this case use fill flash or a white reflector card to fill and lighten the shadows.

Hard to Meter Scenes

Occasionally it's not convenient or even possible to meter a scene. Neon street signs, spotlighted circus acts, fireworks, moonlit scenes, and many similar situations are all difficult and sometimes impossible to meter. In these cases, it's easiest simply to experiment, using the exposure compensation control on your camera. After taking a picture at the suggested exposure, use exposure compensation to take other exposures both lighter and darker than the suggested settings.