Metering Modes

In the last chapter, we learnt that the camera's light meter measures the light in the scene you are photographing. By doing this, it assists you in setting the right combination of aperture and shutter speed in order to expose the scene correctly.

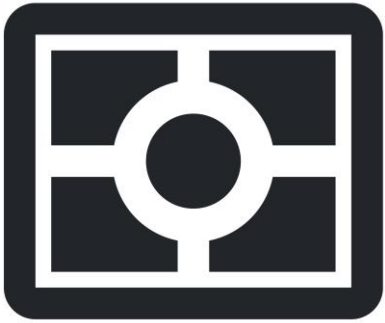
The light meter in your camera is called a "reflected light meter". This means that it measures the light that is reflected off the scene or specific subject you are photographic.

On most cameras, there are three different metering modes:

- evaluative/matrix metering
- centre weighted metering
- spot metering

You can check your camera's manual to see how to switch between the various modes.

Evaluative/Matrix Metering



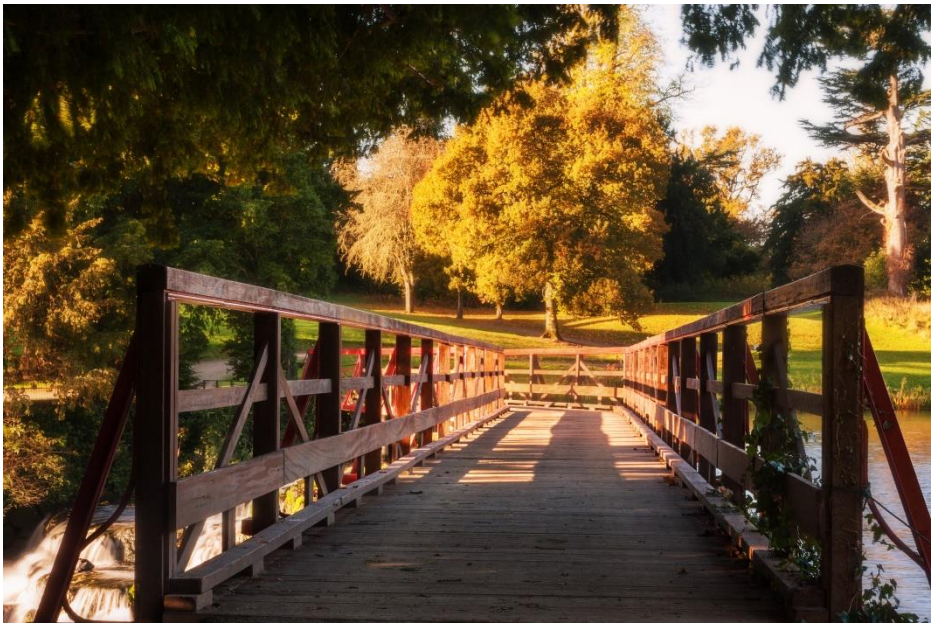
This is the default metering mode on all digital cameras. In this mode the light meter **divides the frame into a grid of zones**. It then **measures the light in each zone** and works out the exposure accordingly.

Many cameras will also **take into account which zone the focus point lies** in and **give greater importance to the light reading from this zone** when calculating the exposure.

This mode is ideal for most landscape photography as it measures light coming from different parts of the scene which may vary greatly. You may have one area illuminated by

sunlight while another is in deep shadow. It is most accurate however when shooting evenly lit scenes.

This is the mode I use the vast majority of the time when shooting urban and natural landscape scenes.



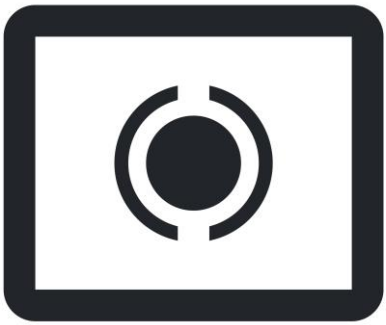
Footbridge on the Rye Water in County Kildare

This scene contains a mix of bright sunlit areas and dark shadows. The evaluative metering mode has done a good job in assisting me to set an

exposure that captures enough detail in both these bright and dark areas.

This photograph was actually taken on a golf course. Shortly after taking this shot, a wayward golf ball missed my head by about two inches. Who ever said landscape photography isn't a dangerous activity? I required several whiskeys in the bar afterwards to recover from the shock.

Centre Weighted Metering



When centre weighted mode is activated, it will come as no surprise that your light meter will **give greater importance to the reading from the centre section of frame**.

This mode can be useful for close up portraits or photos where your subject takes up the centre of the frame. This may be the case with product photography for example.

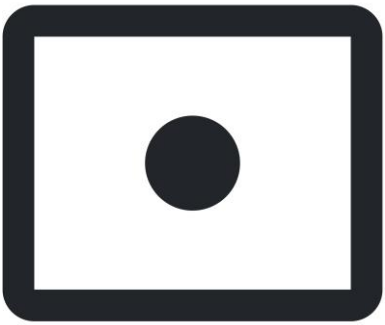
In difficult lighting situations such as when the subject is backlit, it allows you to expose the main subject more accurately. It would however lead to the background being quite overexposed.

Louvre Museum in Paris

In this photograph of the Louvre in Paris, I wanted to capture all of the details in the building. Using centre weighted metering made this possible as the light meter measured the light from the centre of the scene where the building is.

You will notice however that while the building is well exposed, the area under the trees on the left is quite underexposed with very little detail visible in the shadows.

Spot Metering



When using spot metering, the light meter **only measures the light from a very small area in the centre of the frame**. This area covers only about 2-5% of the frame depending on the camera.

On some cameras, the light meter will take its reading from the small area where the focus point was placed rather than simply from the dead centre of the frame.

This is used when it is critical that a very particular part of the image be exposed properly. This may

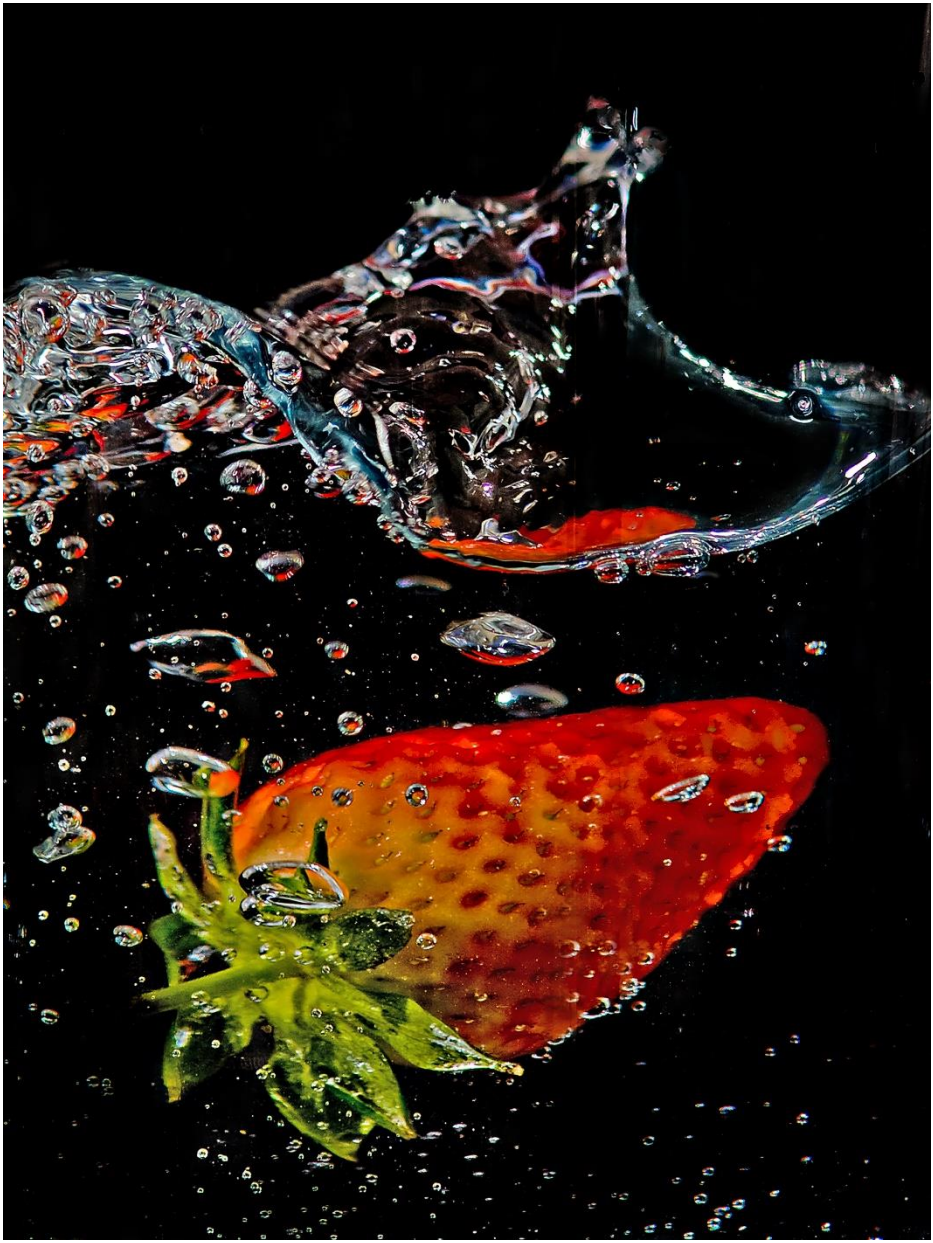
mean that the rest of the scene is underexposed or overexposed though.

It is often used when photographing a dark subject against a bright background or a bright subject against a dark background.

This would be useful when photographing a spot-lit musician in a dark theatre. If you used evaluative metering in this case, the musician would be completely overexposed.

Spot metering is often used by portrait photographers to ensure that the person being photographed is correctly exposed.

By using spot metering while photographing this splashing strawberry, I was able to capture the detail on the strawberry itself. It does mean that the background is completely underexposed though. In this case however, I think it works.



Strawberry Splash

In this case I set the exposure using spot metering before I dropped the strawberry into the water. I simply photographed the strawberry in the same lighting conditions and kept the aperture and shutter speed settings I used for the subsequent water splash shots. I made sure to set a fast shutter speed to freeze the moment.

Which metering mode should I use?

As mentioned earlier, I tend to use evaluative/matrix metering most of the time as I mainly shoot urban and natural landscapes. I would say that this mode will do a decent job in most situations. If in doubt, it's the one to go with.

That is not to say you shouldn't experiment with the others depending on the scene or subject you are photographing. They all do a good job in different types of lighting scenarios.