Beginner’s guide to creative lighting with Nikon off-camera flash

PUBLISHED - 14 OCT 2021

Using off-camera flash is one of the most effective ways of improving your photography, and it’s surprisingly simple to master, especially when you use our Speedlights and top tips with your DSLR or Z series camera. Taking your flash off the camera opens up a vast range of creative lighting opportunities in all types of location and for all genres of photography, but it’s especially good for fashion, portraits and wedding photography.

A single off-camera Nikon Speedlight gives you more control over the quality and direction of light, adding more depth to your images in just a couple of minutes. As you become more experienced and confident with the techniques, you can move to multiple, off-camera Speedlights, firing at different power settings, to create amazing light.

To get started, all you need is a flash trigger and a compatible Speedlight that can be used in ‘remote’ mode. Depending on your Nikon camera, there are several options for triggering the remote off-camera flash. One of the easiest and most effective approaches is to use an SC-29 TTL (through-the-lens) extension cord. Simply attach one end to the camera’s hot shoe and the other to the base of your Speedlight.

Flash extension cords usually have a lot of play in them, so the main limiting factor is normally your reach. If you put the camera on a monopod, with your spare hand you can now move and position the flash to use the light to best effect. If you also mount the remote flash on

another monopod, you'll have even more flexibility in positioning your lighting.

Nikon has two flash triggering systems:

• The Creative Lighting System (CLS) – an optical-based trigger using a pulse of light or infrared.

• The Advanced Wireless Lighting (AWL) system – a more advanced system triggered by radio signals.

For either CLS or AWL to work, you need a commander unit (master trigger) on your camera and a receiver built in or attached to your Speedlight. Depending on which commander unit you use, you may be able to alter individual flash settings remotely from your camera. It's also worth checking that the commander supports high-speed sync and lets you work in TTL mode. Luckily, all current Nikon flash triggers support both of these features when paired with Nikon Speedlights.

Optical and infrared flash triggers are an easy-to-use budget approach compared to radio triggers, although they do have some limitations:

• The operating distance isn't as far as a radio trigger.

• Unlike radio triggers, they have to be used in direct line of sight of the remote flash.

• Bright sunlight or strong lights may interfere with the optical trigger signal.

If you're serious about doing a lot of work with off-camera flash, the AWL system is probably your best option, but if it's going to be more of a sideline, then CLS will do a cracking job.

HOW TO MODIFY, SHAPE AND DIFFUSE THE LIGHT

To get the best quality light from an off-camera flash set-up, you need to carefully control the light from the Speedlight via flash modifiers, shapers or diffusers.

1. Modifiers change the size or shape of the light source. Softboxes are a good example of a light modifier that diffuses and softens the light from the Speedlight while controlling unwanted light spill.

2. Shapers change the direction the light travels. Common types include barn doors (metal

flaps you place around the flash to narrow down the beam of light), flags (which block the light in specific areas), snoots (usually conical or cylindrical tubes that create a very focused beam of light with lots of shadows) and gobo (a panel placed between the light source and subject to create interesting patterns on both subject and background).

3. Diffusers are great for filling a space with light. They include reflectors, scrims and umbrellas to create large light sources with very soft light, although they're less effective at controlling light spill than modifiers.

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SIMPLE TECHNIQUES AND SETTINGS TO MAKE YOUR SUBJECTS STAND OUT

Your aim when using off-camera flash is to balance the ambient background light via your camera settings and the light striking your subject from your flash so the image looks as natural as possible. Do this well, and people won't even notice you've used a Speedlight – and you'll be surprised at how quickly it starts to become second nature.

The key is to get comfortable with using your camera in manual mode to control the ambient light in the scene and your flashgun(s) on either TTL or manual to light the subject. In manual mode on the camera, start by setting a shutter speed of 1/200sec, ISO 200 and an aperture around f/4 or f/5.6. Now take a shot without the flash. This is your baseline on which to build your image. If your lens allows, you can stop down to f/1.4 or f/2.8, depending on the depth of field required. Raising the ISO will make your image brighter but will introduce noise, so it's better to leave your ISO low and control the exposure of the ambient light with your shutter speed. Raise your shutter to underexpose the ambient light or lower it to introduce more ambient light.

On the Speedlights, you need to decide whether you're going to use TTL or manual. TTL will produce consistently good results, so it's a great place to start. You can change the TTL output from the Speedlight by using flash exposure compensation to fine-tune the light as required – around -0.7 works well for portraits if you're using a light modifier such as a softbox.

Using manual mode on the flash will teach you more about how light works and is best employed when you have very specific lighting requirements. First set 1/4 power and put your subject around 2.5m from the Speedlight. You may need to adjust the settings if you move the Speedlight or the subject, and remember to increase the flash power if you use a softbox or light modifier, as these will reduce the output of the flash from anything between 1 and 2 stops.

Another consideration is where to place your Speedlight. A single Speedlight used as a main light will give nice light around 45 degrees to the subject. If you move it wider to, say, 90 degrees you can create some dramatic light with heavy shadows for brooding portraits – but not everyone will appreciate being photographed like that! For a more subtle effect, keep the Speedlight just above the subject's eye level and angled slightly down, and combine with a softbox or diffuser to produce very flattering light.

When you're feeling more confident about balancing the light, you can start to experiment with more advanced techniques. Deliberately underexposing the background by a couple of stops will make your subject much more prominent, while adding a second off-camera Speedlight as a fill or placed behind the subject as a rim light can give you really creative effects, especially if you use coloured gels over your Speedlights.

FLASH TRIGGERS

1. Pop-up flash: On the D7100, D7200, D700, D600, D610 and D750 and some older high-end DLSRs, you can use the pop-up flash as an optical line of sight trigger. From the camera's menu, you can control the flash mode and power and apply flash exposure compensation if required.

2. SU-800 Optical Commander: This can be used if you don't have a pop-up flash or if you want to extend the number of flash groups or possibly increase the line-of-sight trigger distances. The SU-800 is an optical trigger, using infrared signals to send the TTL information between the camera and flash.

3. Speedlight with 'master' mode: Some Speedlights have a 'master' setting that allows them to act as a line-of-sight flash trigger. Put the 'master' Speedlight on the camera's hot shoe, and now in the Speedlight's master control menu you will have options to set groups, channels, flash mode and output power.

4. WR-11 Wireless Trigger: This gives you radio control of the SB-5000 Speedlight, allowing you to get creative with a single Speedlight or multiple off-camera Speedlights. Because radio signals aren't restricted to line of sight, you can place the remote Speedlights almost anywhere within a 100m range. The WR-11 also doubles as a remote shutter release.

USING CHANNELS AND GROUPS TO CONTROL YOUR CREATIVE LIGHTING

The Nikon CLS and AWL systems control the off-camera Speedlight by using channels and groups. To ensure your remote off-camera Speedlight fires when you press the shutter, you need to put the commander unit and remote Speedlight on the same channel (frequency) and group (collections of Speedlights).

With CLS, you have four channels you can assign to the commander and remote Speedlight. It doesn't matter which one you choose as long as both the commander and off-camera flash are on the same one. You now have three groups – A, B and C. Groups really come into play if you're using multiple off-camera flashguns. You can assign a group to each flash and then independently change the mode and power of each group. For example:

• Group A would typically be your main light, maybe on TTL, with flash exposure

compensation of -0.7 EV.

• Group B could be your backlight, in manual mode 1/2 power to create an intense rim light from behind your subject.

• Group C might be an additional fill light set to TTL and -1.3 EV to brighten the shadow areas in the image.

The combinations are almost endless, allowing you a lot of control over the lighting. You can also put more than one flash in a group, although this does mean they will have the same power output. This is useful when using very large softboxes that need two or more flashes set at the same power to provide an even light across the subject. The AWL system works in a very similar manner. You still have channels, which are 5, 10 and 15, but now you have groups A - F, with each group supporting up to 18 Speedlights – giving a huge potential for complex lighting set-ups. 3 x IMAGES

HARNESSING INVERSE SQUARE LAW TO MAKE YOUR SUBJECT STAND OUT

Inverse square law is the technical term to describe how the intensity of light decreases the further it moves from its source. While we could bore you with the physics, all you really need to know is that it allows you great control over your image's background.

In portraiture, for example, it means you can use high-speed flash sync (Auto FP setting in the flash menu) to effectively 'hide' the background, making your subject stand out much more. The trick is to position your subject close enough to the flash to be exposed correctly but far enough from the background that the light from the flash 'falls off' before it lights the background. If you've used a high shutter speed to underexpose the ambient light in the scene, these techniques together give you the ability to turn a white background into a grey or black one. IMAGES

WHICH NIKON SPEEDLIGHT IS BEST OFF-CAMERA?

SB-500, SB-600

The SB-500 is an entry-level Speedlight that can also act as a constant light source. While you can use an SB-500 with Nikon CLS, you're limited with the groups and channels you can choose, and it doesn't have some of the features of the more advanced Speedlights. It's a

similar story with the SB-600 – while it can be used for creative off-camera lighting, it's not the easiest Speedlight to set up for this purpose. IMAGE

SB-700, SB-800, SB-900, SB-910

These are excellent choices for off-camera flash if you know that you won't need to use the AWL radio system. All work really well with the Nikon CLS system and can also be used as 'master' flash triggers if you have more than one flash. The SB-700 or SB-910 have good menu displays, are easy to use and have a wide range of features. IMAGE

SB-5000

If you're serious about your off-camera flash work and want to use the AWL radio system, this is the flash to work with. The SB-5000 has an in-built radio receiver which pairs quickly with the WR-11 transmitter. It has a zoom range from 14-200mm to give very precise control over the light and it's also backwards-compatible with the CLS system if needed. IMAGE

SIX STEPS TO PRO LIGHTING WITH JUST ONE OFF-CAMERA NIKON SPEEDLIGHT

1. Camera settings Put your camera on manual mode. Select the aperture, ISO and shutter speed to control the ambient light – this gives you a baseline exposure to get creative with.

2. Test shot Take a test shot and check the ambient light levels – if they're not quite right, adjust your camera settings, reshoot and repeat until everything is spot on.

3. Position your Speedlight Set it up at a 45 degree angle to your subject to create depth and a pleasing, subtle fall-off in the shadows.

4. Switch the Speedlight to its Remote mode Ensure it matches the channel (frequency) and group settings from the Commander unit. If you want to improve the quality of the light further, use TTL and a softbox.

5. Take a test shot Check the exposure levels of the flash and adjust using flash exposure compensation if required. For portraits, a setting of around -0.7 EV works well for a main light in a softbox.

6. Fine-tune the image Make small adjustments to the angle of the light hitting the subject or get creative by adding coloured flash gels into the shot.

And that's it – creative lighting for better photographs in a flash!

Accelerate your learning curve with a Nikon School course – why not try Evocative Portraiture on Location with Joe McNally

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