

Free Gray/Color Checker Card Inside!

Alan Hess

Nikon®
D3200™
Digital Field Guide



Nikon[®] D3200[™] Digital Field Guide

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Alan Hess is a San Diego-based commercial photographer specializing in concert and live-event photography. He is the author of ten books, including *Exposure Digital Field Guide*, *Composition Digital Field Guide*, *iPad Fully Loaded*, *All Access: Your Backstage Pass to Concert Photography* and *Night and Low-Light Photography Photo Workshop*, all of which are also available from Wiley.

Alan has also been part of the Photoshop World Instructor Dream Team since 2009, where he teaches about concert photography. You can find Alan at www.alanhessphotography.com, where he writes a semi-regular blog, or on Twitter at ShotLivePhoto.

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Introduction

The Nikon D3200 is amazing. It's a camera designed for the photographer who is just starting out with a digital single-lens reflex camera (dSLR). But Nikon has packed this camera with the latest, greatest technology. It packs a huge new, Nikon-designed 24.2 megapixel sensor that shoots both great stills, and full HD video into a compact camera body.

The Nikon D3200 is a major update to the D3100 with a brand-new image-processing engine, the EXPEED 3. This is the same image-processing engine that comes in the Nikon D4, the top-end Nikon professional camera. This processing engine creates photos with great color, and produces low-noise images at high resolutions. The D3200 can photograph using ISO settings ranging from 100 to 6400, and can be pushed to Hi-1 (ISO 12800 equivalent), which allows great images to be taken in low light without a flash.

The purpose of this *Digital Field Guide* is to help you get the most out of this camera. It starts with a Quick Tour, which is designed to get you out and about capturing images without too much reading. Chapter 1 covers all of the external controls on the D3200 (and there are quite few of them). Many of the buttons and dials have different functions depending on which mode the camera is in. Chapter 1 also covers what is displayed when you look through the viewfinder, the information display, and the Guide mode. Chapter 2 covers the exposure, scene, and focus modes, as well as other important settings on the D3200, including the ISO and white balance settings.

The camera has a full menu system that allows you to set everything on it. Chapter 3 covers the Playback, Shooting, Custom Setting, and Setup menus. This is a great chapter to refer to when setting up your camera for the first time, or when you want to change any of the settings.

The Nikon D3200 is part of the whole Nikon system, and Chapter 4 covers lenses, flashes, microphones and the new wireless adapter. Photography is all about capturing light, and no *Digital Field Guide* would be complete without a discussion about it. The direction of light, its quality, and how to measure it in a scene are all covered in Chapter 5. The basics of exposure (including aperture, shutter speed, and ISO settings) and composition (including Rule of Thirds and Leading lines) are covered in Chapter 6.

One of the most exciting advances in photography is the ability to shoot full HD video. Chapter 7 covers the Live View function of the D3200 and, not only how to shoot still images with it, but also the very cool video-recording options. The different focus modes available in Live View are also covered.

Chapter 8 helps you use your D3200 in a variety of photo situations, including when taking abstract images, action and sports photography, and much more. Each situation is explored, and most include sample photos, along with the shooting data.

The Nikon D3200 has an impressive Retouch menu and can be connected to a variety of output devices. Chapter 9 covers viewing your images on the camera or a television, as well as the

retouching capabilities.

This book also has three appendices. The first covers postproduction, including how to use some of the most popular photo-editing software packages and your choices for video editing. The second appendix covers the accessories available for the Nikon D3200, including remote releases, video accessories, tripods, and more. The print version of this book comes with a gray card and color checker, and Appendix C covers how to use these correctly to get the best color and exposure.

As the name implies, this book is designed to be taken with you when you are out in the field photographing. It is meant to be marked up and highlighted—and go ahead and dog ear a page or two. It fits in your camera bag, so you can pull it out to check a setting, or just to review a subject

Quick Tour

If you get as excited as I do when getting a new camera, then this is the section for you. The Quick Tour is designed to get you and your new camera out and photographing quickly by giving you just the basics. If you've already used a dSLR, then just consider this a quick review. If this is your first camera with interchangeable lenses, then consider this section an overview so you can get started right away (assuming you have already unpacked the camera and read the camera manual). With the freshly charged battery inserted, a lens attached, and the memory card formatted, just turn the page and get ready to start taking great photos with your new Nikon D3200.



With the Nikon D3200, you can start capturing great images almost instantly.

Getting Started

The Nikon D3200 is an entry-level dSLR. So, while it is really easy for a beginner to pick up and get great shots, it has enough features and controls to keep any photographer satisfied. Once the basic setup is complete, turn the camera on by rotating the On/Off switch to the right. Now, it's time to set the exposure mode, focus on your subject, and get shooting.

NOTE The camera does not work without a memory card. There is no built-in memory as there is on some point-and-shoot cameras.

Setting the exposure mode

When starting out, the first thing to do is to set the exposure mode to Automatic (📷^{AUTO}) by using the Mode dial on the top right of the camera. Rotate the dial until the word Auto is lined up with the white marker, as shown in Figure QT.2. In this mode, the camera uses the built-in light meter to read the light in the scene, and sets the shutter speed, aperture, and ISO. The camera even raises the built-in flash automatically if it believes that more light is needed to create a proper exposure. This mode turns all of the controls over to the camera, essentially turning it into a point-and-shoot.



QT.1 Using Auto mode and the kit lens allowed me to focus more on the flower than on the camera controls. Exposure: f/5.6, 1/125 second, ISO 200.



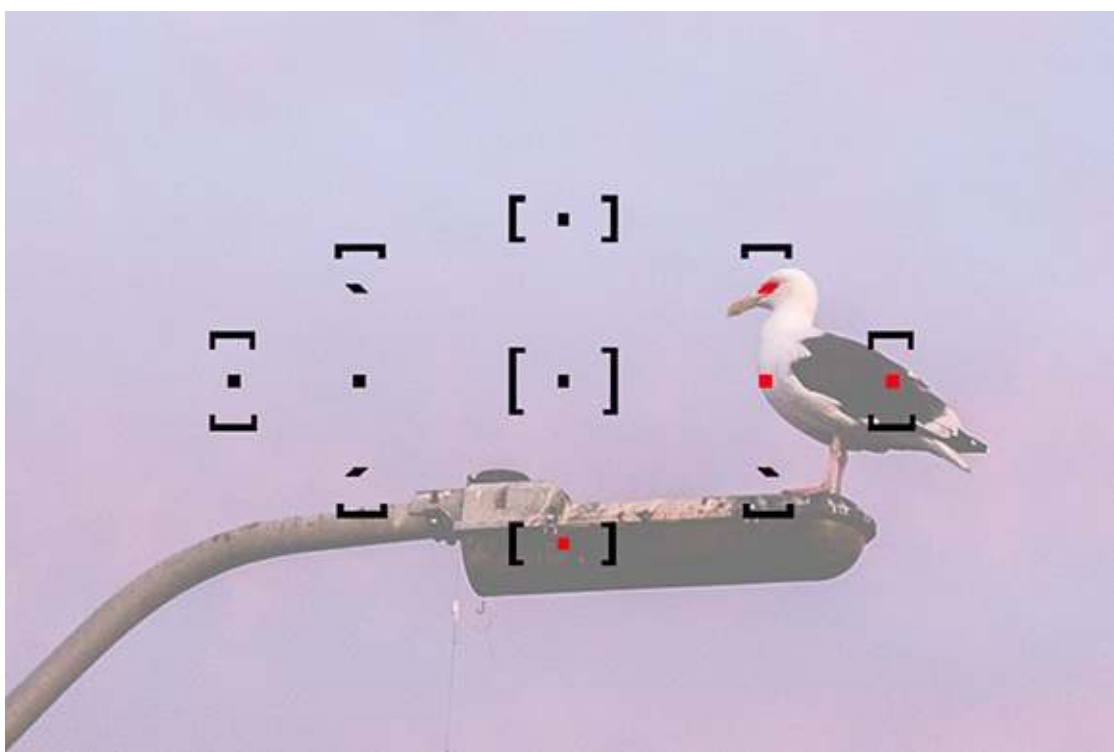
QT.2 The Mode dial showing the camera set to the Auto mode.

CROSS REF For more information on exposure modes, shutter speed, aperture, and ISO, see Chapter 2.

If you want to take a photo without using the flash, then turn the Mode dial to Auto flash off mode (📷). In this exposure mode, the camera still has full control over the exposure settings, but it does not use the flash, even in low light. When the scene is dark, the camera uses slower shutter speeds, wider apertures, and higher ISO settings to get a proper exposure. However, when shutter speeds drop too low to freeze the action, you end up with blurry images. I recommend using Automatic mode (📷) when you start out, unless using a flash will disturb your subject or you're in a location where flash photography is not allowed.

Focusing




With your new Nikon D3200 set to Automatic mode (📷), all you have to do is focus. Raise the camera to your eye and look through the viewfinder. Press the shutter-release button halfway to activate the autofocus. Once the camera achieves focus, a red bracket in the viewfinder briefly lights up. This is the autofocus point that the camera is currently using and the spot on which the camera attempts to focus. There is also an audible beep when focus is achieved, and the in-focus display is shown in the bottom-left corner of the viewfinder. If the camera is not focusing, check the lens and make sure that the A/M (Autofocus/Manual) button is set to A. Once the camera locks the focus on the subject, press the shutter-release button all the way to take the photo.






QT.3 The camera has 11 focus points that can be seen through the viewfinder. Here, those in red are locked onto the subject.

NOTE The camera focuses on the subjects closest to it when it is set to Automatic mode (AUTO .

Playback

After you have taken a few photos, you can review them on the camera using the large, 3-inch LCD screen on the back of the camera. The camera's default setting is to display each image for a few seconds right after it is taken. When you want to see the images again, just press the Playback button () located at the top-left corner of the D3200's back, and the most recent image that you took is displayed on the screen. You can scroll through all of the images on the camera's memory card by using the multi-selector on the back of the camera. Press the multi-selector right () to scroll through the images in the order in which they were taken, or you can press the multi-selector left () to scroll through the images in the reverse order. The camera displays the image along with the name, date, time, and resolution.

As you review your images, if you want to delete any of the photos, you can simply press the Delete button () at the lower right of the camera's back. However, unless an image is completely out of focus or just really bad, it is best to wait and delete images after you see them on a much bigger screen (like your computer). If you are positive an image is not a keeper, while it is on the screen, press the Delete button (). When the camera asks for confirmation, press the Delete button () again to permanently delete the image.



QT.4 The back of the camera showing the last image taken with the photo data on the bottom.

The following options are also available when viewing your photos on the back of the camera:

► **Playback zoom in** (🔍). Press the Playback zoom in button (🔍) to zoom in to your image, and check the sharpness and detail. Every time you press the button, you zoom further into the photo. You can then move around inside the image using the multi-selector. This option is useful for making sure that you get the most important part of the photograph in focus.

► **Playback zoom out/Thumbnail button** (🖼️). When you press the Playback zoom out/Thumbnail button (🖼️), you can view the images stored on the memory card with 4, 9, or 72 images displayed on the screen. Each time you press the button, it shows you more thumbnails. This allows you to quickly scroll through the images to find the one that you want to check. When you are in the thumbnail view you can navigate using the multi-selector to select the image you want to see, and then press the OK button (OK) to have the selected image fill the screen. In the thumbnail view, the selected image has a yellow border. You can also press the Playback zoom in button (🔍) to take you out of the thumbnail view.

► **AE-L/AF-L (AE-L/AF-L)/Protect** (🔒) button. If there are images that you want to make sure aren't deleted inadvertently, you can use the AE-L/AF-L (AE-L/AF-L)/Protect (🔒) button to prevent an image from being deleted. Press the button once when the image you want to protect is on the screen so it cannot be deleted when the Delete button (🗑️) is pressed. A small protect icon (🔒) appears on the top left of the image on the screen.

CAUTION All images, including protected images, are deleted when formatting the memory card.

Downloading Images

Once the memory card is full of images, or you want to edit your images on a computer, you need to connect the camera to a computer and download the files. The Nikon D3200 has some image editing capabilities built in to it, but if you do all of your editing in the camera, at some point you will still run out of space on the memory card and need to download the photos to free up space. There are two ways to download photos from your camera to the computer: Use the supplied USB cable and connect the camera directly to the computer, or use a card reader connected to the computer.

CROSS REF The Nikon D3200 built-in image-editing capabilities are covered in Chapter 9.

To use the camera and the supplied USB cable to download your photos, follow these steps:

- 1. Turn off the camera.** Make sure that the camera is turned off before connecting it to a computer directly to avoid damaging the camera or computer.
- 2. Open the rubber cover on the left side of the camera to expose the USB port.** The USB port is the second one from the top, just under the microphone jack.
- 3. Connect the camera to the computer.** Plug the supplied USB cable into an open USB port on your computer and the USB port on the camera, as shown in Figure QT.5



QT.5 The supplied USB cord connecting the Nikon D3200 to a laptop computer.

- 4. Turn the camera on.** Once the computer and camera are both turned on, the computer should recognize the camera as a storage device and allow you to copy the image files from the camera to the computer. You can also use applications such as iPhoto, Nikon Transfer, Photo Mechanic or Adobe Bridge to transfer the files.
- 5. Disconnect the camera.** When you finish with the image transfer, disconnect your camera from the computer the same way you would disconnect any other external device.

To download the photos using a dedicated memory card reader, follow these steps:

1. Turn off the camera.

2. Eject the memory card. Make sure the memory card access lamp (the little green light next to the memory card access door) isn't blinking before removing the memory card. Open the memory card door and press down on the memory card to eject it.

NOTE Using a card reader saves battery power because the camera does not have to be turned on.

3. Insert the memory card into the card reader attached to your computer. The computer then recognizes the memory card as a storage device and you can now transfer the files to the computer. You can also use programs such as iPhoto, Nikon Transfer, Photo Mechanics, or Adobe Bridge to transfer the files from the memory card to the computer.

4. When you finish transferring the images, eject the card from the computer and put it back in the camera.



QT.6 An SD memory card inserted into a Hoodman Raw Steel card reader, and connected to a laptop computer.

TIP Once your download is complete and your photos are safely transferred to the computer, format the memory card in the camera so it is always ready to save more photos.

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