

### **How to Get your Lesson Files**

Thank you for purchasing this digital version of:

Adobe® Premiere® Pro CC Classroom in a Book® (2014 release)

To work through the projects in this book, you will need to download the lesson files from peachpit.com. The entire set of files is very large (almost 8 GB), and you need to keep the entire collection on your computer while you work through the book. We've divided the file download into smaller chunks and compressed them (using ZIP format) to make downloading easier. You'll reassemble the folders into the proper arrangement after downloading them. Although each lesson stands alone, some lessons use files from other lessons, so you'll need to keep the entire collection of lesson files on your hard drive as you work through the book. You will need about 8 GB of storage space for the downloaded files, then an extra 8 GB to store the uncompressed files. Once the files have been uncompressed, you can delete the compressed files and regain the storage space.

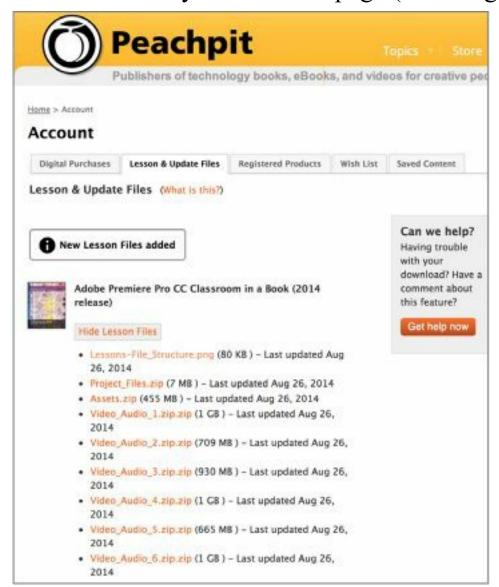
To access the Classroom in a Book files, do the following:

**1.** On a Mac or PC, go to <a href="https://www.peachpit.com/redeem">www.peachpit.com/redeem</a> and enter this code:

#### 92178CD6E345

- **2.** If you do not have a <u>Peachpit.com</u> account, you will be prompted to create one.
- 3. The downloadable files will be listed under Lesson &

Update Files tab on your Account page (see image below).



**4.** Click each file link to download it to your computer. You should end up with eight files (the filename suffix "ZIP" may not be visible on your system, depending on your preference settings):

Project\_Files.zip

Assets.zip

Video\_Audio\_1.zip

Video\_Audio\_2.zip

Video\_Audio\_3.zip

Video\_Audio\_4.zip Video\_Audio\_5.zip Video Audio 6.zip

5. Double-click each file to de-compress it (modern Mac and Windows systems will open ZIP files without any extra software). Each ZIP file opens to create a folder of the same name. Once you have finished this step, you can delete the ZIP files or move them to another storage location to free up space on your main drive.

Important: The files need to be arranged into a specific folder hierarchy in order for Premiere Pro to connect the footage files we have provided (the actual video and audio clips, graphics, etc.) with the project files that you will edit in each lesson. Follow these steps carefully:

- **6.** Create a new folder named Lessons in a convenient spot on your hard drive.
- 7. Drag the folder Assets (created when you decompressed Assets.zip) into the new Lessons folder. Open the Assets folder to reveal its contents.
- **8.** Locate the folder Video and Audio Files in the Assets folder and open it.
- 9. Return to the files you downloaded and unzipped and find the folder named Video\_Audio\_1. Open it and drag its contents into the Assets folder.
- 10. Repeat step 9 for each of the other five folders whose name begins with "Video\_Audio". When you're done, your Assets folder should look like this:



11. Return once more to your downloaded files and find the folder Project\_Files. Open this folder and drag its contents into the Lessons folder so the folders Lesson 01, Lesson 02, etc. reside at the same level as Assets. Here's how your Lessons folder should look:

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▶	Less	son 02
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For more information on working with these files, go to the <u>Getting Started</u> section at the front of the book. Ebook customers can disregard the section Copying the lesson files.

The Premiere Pro projects included in the folders Lesson 01, Lesson 02, etc., have links to specific media files in the Assets folder. Because you are copying the files to a new location, those links may need to be updated when you open projects for the first time.

If you open a project and the Link Media dialog may open, please see the section <u>Relinking the lesson files</u> in <u>Getting Started</u> for instructions.

If you are unable to locate the files for this title by following the steps above, please email <a href="mailto:ask@peachpit.com">ask@peachpit.com</a> and supply the code from step one. Our customer service representatives will assist you as soon as possible.

# Adobe Premiere Pro CC Classroom in a Book® (2014 release)

The official training workbook from Adobe

Maxim Jago



# Adobe<sup>®</sup> Premiere<sup>®</sup> Pro CC Classroom in a Book<sup>®</sup> (2014 release)

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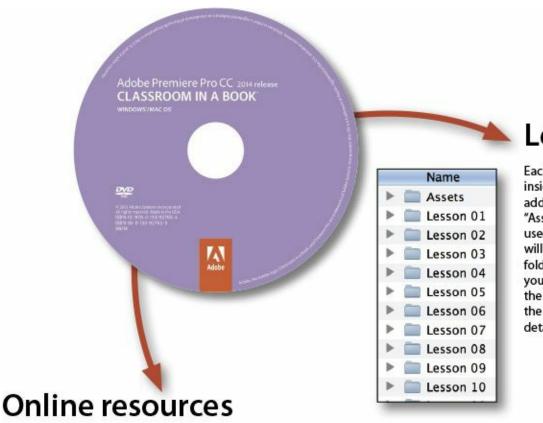
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#### What's on the DISC

# Here is an overview of the contents of the Classroom in a Book disc

#### Lesson files ... and so much more

The Adobe Premiere Pro CC Classroom in a Book (2014 release) disc includes the lesson files that you'll need to complete the exercises in this book, as well as other content to help you learn more about Adobe Premiere Pro CC and use it with greater efficiency and ease. The diagram below represents the contents of the disc, which should help you locate the files you need.



#### Lesson files

Each lesson has its own folder inside the Lessons folder. In addition, there is a folder called "Assets" containing files that are used for multiple lessons. You will need to copy all of these folders to your hard drive before you can begin the lessons. See the Getting Started section in the beginning of this book for details.

Links to Adobe Help and Support pages, Adobe Authorized Training Partners, Adobe TV, other Adobe Press titles, and other useful online resources can be found inside a handy HTML file. Just open it in your Web browser and click on the links.



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## Acknowledgements

Producing effective learning materials for such an advanced technology is a team effort. Friends, colleagues, fellow filmmakers, and technology experts have all contributed to this book. There are too many names to mention but let's say this: I have often joked that in Britain we don't say "awesome." Instead, we say "perfectly acceptable." On this occasion, "perfectly acceptable" simply isn't enough. Instead, I will have to say our British equivalent of "super awesome": those people who make this world better by sharing, nurturing, caring, showing, telling, demonstrating, making, and helping are all "More than acceptable."

By the way, I'm not this good at writing! Everything on these pages is inspected by a team of experienced editors who check and correct typos, spelling errors, naming errors, false attributions, suspect grammar, unhelpful phrasing, and inconsistent descriptions. This wonderful team didn't just highlight text that needed correcting. They offered positive alternatives that I could simply agree to, so in a very literal sense, this book is the product of many people's contributions. I'd like to thank the whole team at Peachpit and Adobe Press, who made it possible to produce such a beautifully finessed work.

As each draft chapter was completed, the most excellent Tim Kolb checked all references to technology and highlighted errors, opportunities to clarify, and potential details to expand upon. Tim's comments are offered with a gentle kindness and a dry wit. Tim would regularly tell me, "Maxim, you're a fool" in "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

a way that felt like he was saying "You're awesome!" His technical knowledge, keen eye, and significant experience are a safety net I came to depend upon and value enormously.

Roughly half the content of this book makes use of, or is derived from, material written by Rich Harrington for the previous edition. The present outline was worked out by the two of us over the past couple of editions, and though I have checked through his chapters and updated, rephrased, and reworded them for this version, a substantial amount remains unchanged and is presented exactly as Richard wrote it.

Finally, let's not forget Adobe. The passion and enthusiasm demonstrated by those wonderful individuals, who are so committed to creatives like you, qualifies as "the most acceptable of all." They are, indeed, quite awesome!

# **Getting Started**

Adobe Premiere Pro CC, the essential editing tool for video enthusiasts and professionals, is the most scalable, efficient, and precise video-editing tool available. It supports a broad range of video formats, including AVCHD, HDV, XDCAM EX, HD, and HD422, P2 DVCPRO HD, AVC-Intra, Canon XF, RED R3D, ARRIRAW, Digital SLR, Blackmagic CinemaDNG, Avid DNxHD, QuickTime and AVI files and many more. Premiere Pro lets you work faster and more creatively without converting your media. The complete set of powerful and exclusive tools lets you overcome any editorial, production, and workflow challenges to deliver the high-quality work you demand.

#### About Classroom in a Book

Adobe Premiere Pro CC Classroom in a Book (2014 release) is part of the official training series for Adobe graphics and publishing software. The lessons are designed so that you can learn at your own pace. If you're new to Premiere Pro, you'll learn the fundamental concepts and features you'll need to use the program. This book also teaches many advanced features, including tips and techniques for using the latest version of this software.

The lessons in this edition include opportunities to use features such as multi-camera editing, keying, dynamic trimming, color correction, tapeless media, audio and video effects, and advanced integration with Adobe After Effects, Adobe SpeedGrade, and Adobe Audition. You'll also learn how to create files for the Internet and mobile devices with Adobe "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

Media Encoder. Premiere Pro CC is available for both Windows and Mac OS.

#### **Prerequisites**

Before beginning to use *Adobe Premiere Pro CC Classroom in a Book*, make sure your system is set up correctly and that you've installed the required software and hardware. You can view updated system requirements by visiting:

<u>helpx.adobe.com/premiere-pro/system-requirements.html</u>

You should have a working knowledge of your computer and operating system. You should know how to use the mouse and standard menus and commands and also how to open, save, and close files. If you need to review these techniques, see the printed or online documentation included with your Windows or Mac OS system.

#### **Installing Premiere Pro CC**

You must purchase an Adobe Creative Cloud subscription separately from this book. For complete system requirements and complete instructions on installing the software, visit <a href="https://www.adobe.com/support">www.adobe.com/support</a>. You can purchase Adobe Creative Cloud by visiting <a href="https://www.adobe.com/products/creativecloud">www.adobe.com/products/creativecloud</a>. Follow the onscreen instructions. You may also want to install Photoshop, After Effects, Audition, Prelude, SpeedGrade, Encore (available only with Premiere Pro CS6), and Adobe Media Encoder, which are included with Adobe Creative Cloud, for some of the exercises in the book.

#### **Optimizing performance**

Editing video places high demands on your computer processor and memory. A fast processor and a lot of memory will make your editing experience faster and more efficient. This translates to a more fluid and enjoyable creative experience.

Premiere Pro takes advantage of multicore processors (CPUs) and multi-processor systems. The faster the processor(s), the better the performance you'll experience.

The minimum system memory is 4 GB, and 8 GB or more is recommended for high-definition (HD) media.

The speed of the storage drives you use for video playback is also a factor. A dedicated 7200 RPM spinning-disk hard drive is recommended for high-definition video (HD) media. A RAID 0 striped disk array or SCSI disk subsystem is strongly recommended for HD. It's common to use fast solid state storage drives for video playback, particularly if you're working with 4K media and beyond.

Performance is affected if you store your media files and program files on the same hard drive. Keep your media files on a separate disk if at all possible.

The Premiere Pro Mercury Playback Engine can utilize the power of your GPU, harnessing the power of your computer's graphics hardware to improve playback performance. GPU acceleration provides a significant performance improvement and is supported with select video cards. Many video cards with at least 1 GB of dedicated memory will also work. You can find a list of supported video cards, along with detailed hardware and software requirements, on the Adobe website at <a href="https://www.adobe.com/products/premiere/tech-specs.html">www.adobe.com/products/premiere/tech-specs.html</a>.

#### Copying the lesson files

The lessons in *Adobe Premiere Pro CC Classroom in a Book* use supplied source files, such as video clips, audio files, and image files created in Adobe Photoshop CC and Adobe Illustrator CC. To complete the lessons in this book, you must copy all the lesson files to your computer's hard drive. Although each lesson stands alone, some lessons use files from other lessons, so you'll need to keep the entire collection of lesson assets on your hard drive as you work through the book. You will need about 8 GB of storage space in addition to the 4 GB you need to install Premiere Pro CC.

If you have purchased an ebook edition of this book, you'll need to download the lesson files from peachpit.com. You'll find instructions for doing so on the first page of this book, headed "How to Get your Lesson Files,"

If you're the proud owner of the printed version of the book, you'll copy the lesson files from the *Adobe Premiere Pro CC Classroom in a Book* DVD (inside the back cover of this book).

Here's how to copy those assets from the DVD to your hard drive:

- **1.** Open the *Adobe Premiere Pro CC Classroom in a Book* DVD in My Computer or Windows Explorer (Windows) or in Finder (Mac OS).
- 2. Right-click the folder called Lessons, and choose Copy.
- 3. Navigate to the location where you decide to store your Premiere Pro projects.
- 4. Right-click and choose Paste.

#### Tip 👅

If you don't have dedicated storage for your video files, placing the lesson files on your computer's Desktop will make them easy to find and work with.

Following these steps will copy all the lesson assets to your local storage. It may take a few minutes to copy the files. If you are accessing the files from the ebook version of this book, follow the directions on the first page of the ebook.

#### Relinking the lesson files

The Premiere Pro projects included with the lesson files have links to specific media files. Because you are copying the files to a new location, those links may need to update when you open projects for the first time.

If you open a project and Premiere Pro is unable to find a linked media file, the Link Media dialog may open, inviting you to relink offline files. If this happens, select an offline clip and click the Locate button to use the browser to locate it.

A browser panel will appear. Locate the Lessons folder using the navigator on the left, and click Search. Premiere Pro will locate the media file inside the Lessons folder. To hide all other files, making it easy to select the right one, select the option to display only exact name matches.

The last known file path and file name and the currently selected file path and file name are displayed at the top of the panel for reference. Select the file and click OK.

The option to relink other files is enabled by default, so once you've located one file, the rest should reconnect automatically.

#### Note

If media files were originally stored in multiple locations, you may need to search more than once to relink all the media for a project.

For more information about relocating offline media files, see Chapter 17, "Managing Your Projects."

#### How to use these lessons

The lessons in this book provide step-by-step instructions for editing skills. Each lesson stands alone, but most build on previous lessons in terms of concepts and skills. The best way to learn from this book is to proceed through the lessons one after another.

The lessons teach you new skills in the order you might use them while performing post-production for a real project. Rather than being feature-oriented, this book uses a real-world approach. The lessons begin with acquiring media files like video, audio, and graphics, and go on to creating a rough cut sequence, adding effects, sweetening the audio, and ultimately exporting the project.

By the end of these lessons, you will have a good understanding of the complete end-to-end post-production workflow, with the specific skills you need to edit on your own.

#### How to access updates to this book

Purchasing this book gives you access to electronic book updates that cover new features that Adobe releases for Creative Cloud customers. For access, follow these steps:

- 1. On a Mac or PC, go to <a href="https://www.peachpit.com/redeem">www.peachpit.com/redeem</a>.
- **2.** Enter the code 92178CD6E345.
- **3.** If you do not have a <u>Peachpit.com</u> account, you will be prompted to create one.
- 4. The downloadable files will be listed under the Lesson & Update Files tab on your Account page. The page is now live, and the code works as promised.
- 5. Click the file links to download them to your computer. This page is now live; the code works as promised.

#### Additional resources

Adobe Premiere Pro CC Classroom in a Book is not meant to replace documentation that comes with the program or to be a comprehensive reference for every feature. Only the commands and options used in the lessons are explained in this book. For comprehensive information about program features and tutorials, refer to these resources:

#### **Adobe Premiere Pro CC Help and Support:**

helpx.adobe.com/premiere-pro.html (accessible in Premiere Pro by choosing Help > Premiere Pro Help) has comprehensive content you can search or browse provided by Adobe. This includes key techniques, cross-product workflows, updates on new features, tutorials, and technical support. Help is also available as a PDF document, optimized for printing. Download the document at

#### helpx.adobe.com/pdf/premiere\_pro\_reference.pdf

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Adobe Creative Cloud Learn: <a href="helpx.adobe.com/creative-cloud/learn/tutorials.html">helpx.adobe.com/creative-cloud/learn/tutorials.html</a> provides inspiration, key techniques, cross-product workflows, and updates on new features.

**Adobe TV:** <u>tv.adobe.com</u> is an online video resource for expert instruction and inspiration about Adobe products, including a How To channel to get you started with your product.

Resources for educators: <a href="www.adobe.com/education">www.adobe.com/education</a> and <a href="edex.adobe.com">edex.adobe.com</a> offer a treasure trove of information for instructors who teach classes on Adobe software. You'll find solutions for education at all levels, including free curricula that use an integrated approach to teaching Adobe software and can be used to prepare for the Adobe Certified Associate exams. Also check out these useful links:

Adobe Add-ons: <u>creative.adobe.com/addons</u> is a central resource for finding tools, services, extensions, code samples, and more to supplement and extend your Adobe products.

Adobe Premiere Pro CC product home page: <a href="https://www.adobe.com/products/premiere">www.adobe.com/products/premiere</a> has more information about the product.

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http://partners.adobe.com.

## 1. Touring Premiere Pro CC

#### Lesson overview

In this lesson, you'll learn about the following:

- What's new
- Nonlinear editing
- Standard digital video workflow
- Enhancing the workflow with high-level features
- Incorporating Adobe® Creative Cloud® into your workflow
- The Adobe Creative Cloud workflow
- The workspace
- Customizing your workspace



This lesson will take approximately 45 minutes.

Before you begin, you'll walk through a brief overview of video editing and an explanation of how Adobe Premiere Pro CC functions as the hub of your post-production workflow.



Premiere Pro is a video editing system that supports the latest technology and cameras with powerful tools that are easy to use and that integrate perfectly with almost every video acquisition source.

#### **Getting started**

There's enormous demand for high-quality video content, and you're working in an ever-changing landscape of old and new technologies. Despite all this rapid change, however, the goal of video editing is the same as it was in the early days of cinema: You want to take your footage and shape it, guided by your

original vision, so that you can communicate ideas and understanding with your audience.

In Premiere Pro CC, you'll find a video editing system that supports the latest technology and cameras with powerful tools that are easy to use and that integrate perfectly with almost every type of media, as well as a wide range of third-party plugins and other post-production tools.

You'll begin by reviewing the essential post-production workflow that most editors follow. Next you'll see how Premiere Pro fits into Adobe Creative Cloud. Finally, you'll learn about the main components in the Premiere Pro interface and how to create custom workspaces.

#### Nonlinear editing in Premiere Pro

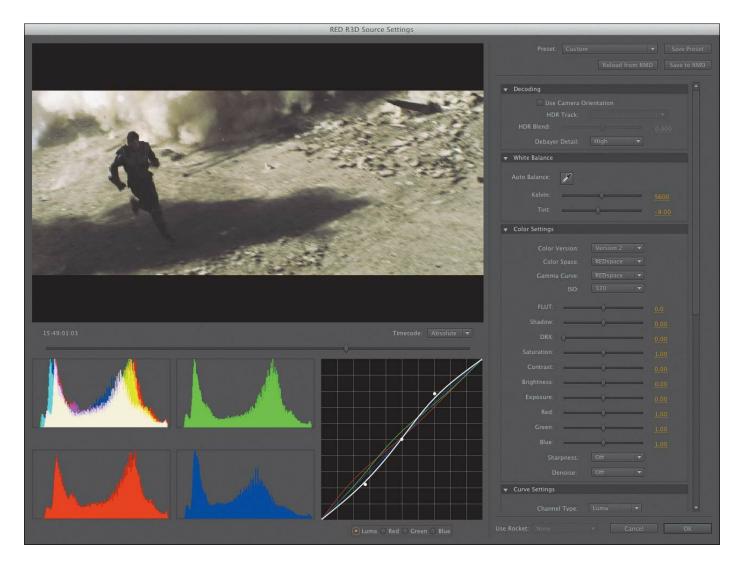
Premiere Pro is a *nonlinear editing system* (NLE). Like a word processor, Premiere Pro lets you place, replace, and move footage anywhere you want in your final edited video. You can also adjust any parts of the video clips you use at any time. You don't need to perform edits in a particular order, and you can make changes to any part of your video project at any time.

You'll combine multiple clips to create a sequence that you can change simply by clicking and dragging with your mouse. You can edit any part of your sequence, in any order, and then change the contents, move clips so that they play earlier or later in the video, blend layers of video together, add special effects, and more.

You can even combine multiple sequences and jump to any moment in a video clip without needing to fast-forward or rewind. It's as easy to organize the clips you're working with as

it is to organize files on your computer.

Premiere Pro supports both tape and tapeless media formats, including XDCAM EX, XDCAMHD 422, DPX, DVCProHD, AVCHD (including AVCCAM and NXCAM), AVC-Intra, and DSLR video. It also has native support for the latest in raw video formats, including media from RED, ARRI, and Blackmagic cameras.



# Presenting the standard digital video workflow

As you gain editing experience, you'll develop your own preference for the order in which to work on the different aspects of your project. Each stage requires a particular kind of attention and different tools. Also, some projects call for more time spent on one stage than another.

Whether you skip through some stages with a quick mental check or spend hours (even days!) dedicated to perfecting an aspect of your project, you'll work through the following steps:

1. Acquire the video. This can mean recording original footage or gathering assets for a project.

- 2. Capture (transfer or ingest) the video to your hard drive. With tape-based formats, Premiere Pro (with the appropriate hardware) can convert the video into digital files. With tapeless media, Premiere Pro can read the media directly, with no need for conversion. If you're working with tapeless media, be sure to back up your files to a second location because physical drives sometimes fail unexpectedly.
- **3.** Organize your clips. There can be a lot of video content to choose from in your project. Spend the time to organize clips together into special folders (called *bins*) in your project. You can add color labels and other metadata (additional information about the clips) to help keep things organized.
- **4.** Combine the parts of the video and audio clips you want as a sequence and add them to the Timeline.
- **5.** Place special transition effects between clips, add video effects, and create combined visual effects by placing clips on multiple layers (*tracks*).
- **6.** Create titles or graphics, and add them to your sequence in the same way you would add video clips.
- 7. Mix your audio tracks to get the combined level just right, and use transitions and effects on your audio clips to improve the sound.
- **8.** Export your finished project to videotape, to a file for a computer or for Internet playback, to a mobile device, or to a DVD or Blu-ray Disc.

Premiere Pro supports each of these steps with industry-leading

tools.

## **Enhancing the workflow with Premiere Pro**

Premiere Pro has easy-to-use tools for video editing. It also has advanced tools for manipulating, adjusting, and fine-tuning your projects.

You may not incorporate all of the following features in your first few video projects. However, as your experience and understanding of nonlinear editing grows, you'll want to expand your capabilities.

The following topics will be covered in this book:

- Advanced audio editing: Premiere Pro provides audio effects and editing unequaled by any other nonlinear editor. Create and place 5.1 surround-sound audio channels, make sample-level edits, apply multiple audio effects to audio clips or tracks, and use state-of-the-art plug-ins as well as third-party Virtual Studio Technology (VST) plug-ins.
- Color correction: Correct and enhance the look of your footage with advanced color-correction filters. You can also make secondary color-correction selections that allow you to adjust isolated colors and adjust parts of an image to improve the composition.
- **Keyframe controls:** Premiere Pro gives you the precise control you need to fine-tune visual and motion effects without exporting to a compositing or motion graphics application. Keyframes use a standard interface design, so you can learn how to use them once, and know how to use them in all Adobe Creative Cloud products in which

they're available.

- **Broad hardware support:** Choose from a wide range of dedicated capture cards and other hardware to assemble a system that best fits your needs and budget. Premiere Pro system specifications extend from low-cost computers for digital video editing up to high-performance workstations that can easily edit 3D stereoscopic video, HD, 4K, and beyond.
- Mercury Playback Engine graphics card acceleration: The Mercury Playback Engine operates in two modes: software-only and GPU acceleration. GPU acceleration mode requires a graphics card that meets minimum specifications in your workstation. See <a href="http://helpx.adobe.com/premiere-pro/system-requirements.html">http://helpx.adobe.com/premiere-pro/system-requirements.html</a> for a list of compatible graphics cards. Even if your graphics card is not listed, it's likely to work if it's reasonably modern and has at least of 1GB of dedicated memory.
- Multi-camera editing: You can easily and quickly edit productions shot with multiple cameras. Premiere Pro displays multiple camera sources in a split-view monitor, and you can choose a camera view by clicking the appropriate screen or using shortcut keys. You can even automatically sync multiple camera angles based on clip audio or timecode.
- **Project management:** Manage your media through a single dialog. View, delete, move, search for, and reorganize clips and bins. Consolidate your projects by moving just the media actually used in a project and

- copying that media to a single location. Then reclaim drive space by deleting unused files.
- **Metadata:** Premiere Pro supports Adobe XMP, which stores additional information about media as metadata that can be accessed by multiple applications. This information can be used to locate clips or communicate valuable information such as preferred takes.
- Creative titles: Create titles and graphics using the Premiere Pro Title Designer. You can also use graphics created in almost any suitable software, plus Adobe Photoshop documents can be used as automatically flattened images or as separate layers you can incorporate, combine, and animate selectively.
- Advanced trimming: Use special trimming tools to adjust each clip and cut point in a sequence. Premiere Pro provides both quick, easy trimming features and advanced trimming tools, allowing you to make complex timing adjustments to multiple clips.
- Media encoding: Export your sequence to create a video and audio file that is perfect for your needs. Use the advanced features of Adobe Media Encoder to create copies of your finished sequence in several different formats, based on presets or your own detailed preferences.

# **Expanding the workflow**

Although it's possible to work with Premiere Pro as a standalone application, it is also a team player. Premiere Pro is part of Adobe Creative Cloud, which means you have access to a

number of other specialized tools, including Adobe After Effects, Adobe SpeedGrade, Adobe Audition, and Adobe Prelude. Understanding how the software components work together will improve your efficiency and give you more creative freedom.

# Incorporating other components into the editing workflow

Premiere Pro is a versatile video and audio post-production tool, but it's just one component of Adobe Creative Cloud, Adobe's complete print, web, and video environment that includes video-focused software for the following:

- High-end 3D motion effects creation
- Complex text animation generation
- Layered graphics production
- Vector artwork creation
- Audio production

To incorporate one or more of these features into a production, you can use other components of Adobe Creative Cloud. The software set has everything you need to produce advanced, professionally finished videos.

Here's a brief description of the other components:

- Adobe After Effects: The tool of choice for motion graphics and visual effects artists.
- Adobe Photoshop: The industry-standard image-editing and graphic-creation product. You can work with photos, video, and 3D objects to prepare them for your project.

- Adobe Audition: A powerful tool for audio editing, audio cleanup, audio sweetening, music creation, and automatic speech alignment.
- Adobe Encore: A high-quality DVD authoring application. Encore produces DVDs, Blu-ray Discs, and interactive SWF files.
- Adobe Illustrator: Professional vector graphics creation software for print, video production, and the web.
- Adobe Dynamic Link: A cross-product connection that allows you to work in real time with media, compositions, and sequences shared natively between After Effects and Premiere Pro.
- Adobe Bridge: A visual file browser that provides centralized access to your Creative Suite project files, applications, and settings.
- Adobe Flash Professional: The industry standard for creating rich, interactive web content.
- Adobe SpeedGrade: Professional, sophisticated color grading/finishing with support for high-end and 3D (visual stereo) video formats.
- Adobe Prelude: Ingest, transcode, and add metadata, markers, and tags to file-based footage. Then create rough cuts you can share with Premiere Pro directly, or with other NLEs via XML.
- Adobe Media Encoder: Batch-process files to produce content for any screen from Premiere Pro and Adobe After Effects.

#### Adobe pro video workflow

Your Premiere Pro/Creative Cloud workflow will vary depending on your production needs. Here are a few scenarios:

- Use Photoshop CC to touch up and apply effects to still images from a digital camera, a scanner, or a video clip. Then use them as media in Premiere Pro.
- Create a layered graphic in Photoshop CC, and then open it in Premiere Pro. You can opt to work with each layer independently, allowing you to apply effects and animation to selected layers.
- Import large numbers of media files with Adobe Prelude CC, adding valuable metadata, temporal comments, and tags. Create sequences from subclips in Adobe Prelude and send them to Premiere Pro to continue editing them.
- Send a clip straight from the Premiere Pro timeline to Adobe Audition for professional audio cleanup and sweetening.
- Send your Premiere Pro sequence to Adobe Audition to complete a professional audio mix. Premiere Pro can create an Adobe Audition session based on your sequence, with mixed-down video so you can compose based on the action.
- Using Dynamic Link, open Premiere Pro video clips in After Effects. Apply special effects and animation, and then view the results in Premiere Pro. You can play After Effects compositions in Premiere Pro without waiting to render them and also benefit from After Effects Global Cache, which saves previews for later use.
- Use After Effects CC to create and animate text in ways

far beyond the capabilities of Premiere Pro. Use those compositions in Premiere Pro with Dynamic Link. Adjustments made in After Effects appear inside Premiere Pro immediately.

• Export video projects as Blu-ray—compliant H.264 files using built-in presets, and use them in Encore CS6 to create a DVD, a Blu-ray Disc, or an interactive Flash application.

Most of this book will focus on standard workflows involving only Premiere Pro. However, several lessons and sidebars will demonstrate how you can use Adobe Creative Cloud components as part of your workflow for powerful effects work and fine finishing.

# **Touring the Premiere Pro workspace**

It's helpful to begin by getting familiar with the editing interface so you can recognize the tools as you work with them in the following lessons. To make it easier to configure the user interface, Premiere Pro offers *workspaces*. Workspaces quickly configure the various panels and tools onscreen in ways that are helpful for particular activities, such as editing, special effects work, or audio mixing.

To begin with, you'll take a brief tour of the Editing workspace. In this exercise, you'll use a Premiere Pro project from this book's companion DVD (or downloaded lesson files if you are using the ebook).

Be sure to copy the lesson files from the DVD to your computer's hard drive for best performance.

1. Make sure you've copied all the lesson folders and "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

contents from the DVD to your hard drive.

2. Launch Premiere Pro.



On the welcome screen of Premiere Pro, you can start a new project or open a saved one.

#### Note

It's best to copy all the lesson assets from the DVD to your hard drive and leave them there until you complete this book; some lessons refer to assets from previous lessons.

- 3. Click Open Project.
- **4.** In the Open Project window, navigate to the Lesson 01 "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

folder in the Lessons folder, and then double-click Lesson 01.prproj to open the first lesson.



#### Note

You may be prompted with a dialog asking where a particular file is. This will happen when the original files are saved on a hard drive (or hard drive letter) different from the one you're using. You'll need to tell Premiere Pro where the file is. In this case, navigate to the Lessons/Assets folder, and select the file that the dialog is prompting you to open. Premiere Pro will remember this location for the rest of the files.

#### Note

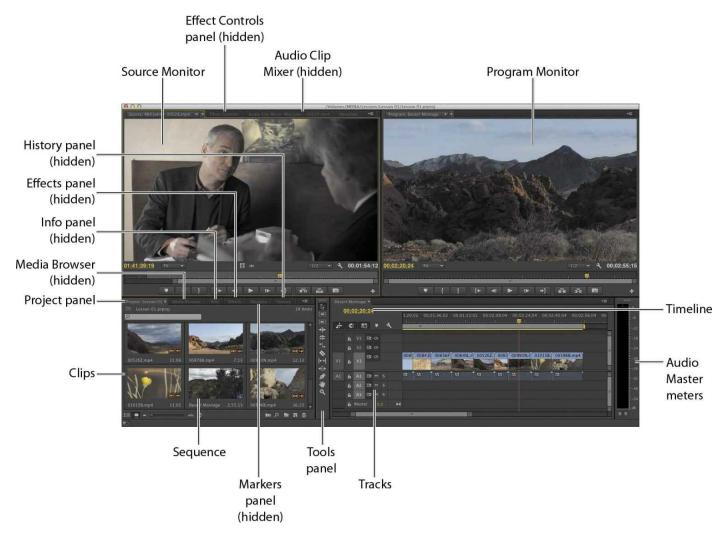
All Premiere Pro project files have a .prproj extension.

#### The workspace layout

Before you begin, make sure you're using the default Editing workspace.

- **1.** Choose Window > Workspace > Editing.
- 2. Choose Window > Workspace > Reset Current Workspace.
- 3. Click Yes in the Reset Workspace dialog.

If you're new to nonlinear editing, the default workspace might look like rather a lot of buttons. Don't worry. Things become much simpler when you know what the buttons are for. The interface is designed to make video editing easy. The principal elements are shown here.



Each workspace item appears in its own panel, and multiple panels can be combined into a single frame. Some items with common industry terms stand alone, such as Timeline, Audio Clip Mixer, and Program Monitor. The main user interface elements are as follows:

- **Timeline panel:** This is where you'll do most of your actual editing. You view and work on *sequences* (the term for edited video segments or entire projects) in the Timeline panel. One strength of sequences is that you can *nest* them (place sequences inside other sequences). In this way, you can break up a production into manageable chunks or create unique special effects.
- **Tracks:** You can layer—or *composite*—video clips, "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

images, graphics, and titles on an unlimited number of tracks. Video clips on upper video tracks cover whatever is directly below them on the Timeline. Therefore, you need to give clips on higher tracks some kind of transparency or reduce their size if you want clips on lower tracks to show through.

- Monitor panels: You use the Source Monitor (on the left) to view and select parts of clips (your original footage). To view a clip in the Source Monitor, double-click it in the Project panel. The Program Monitor (on the right) is for viewing your current sequence.
- **Project panel:** This is where you place links to your project's media files: video clips, audio files, graphics, still images, and sequences. You can use bins—similar to folders—to organize your assets.
- **Media Browser:** This panel allows you to browse your hard drive to find footage. It's especially useful for filebased camera media.
- Effects panel: This panel contains all the clip effects you will use in your sequences, including video filters, audio effects, and transitions. It's docked, in this workspace, with the Project panel. Effects are grouped by type to make them easier to find.



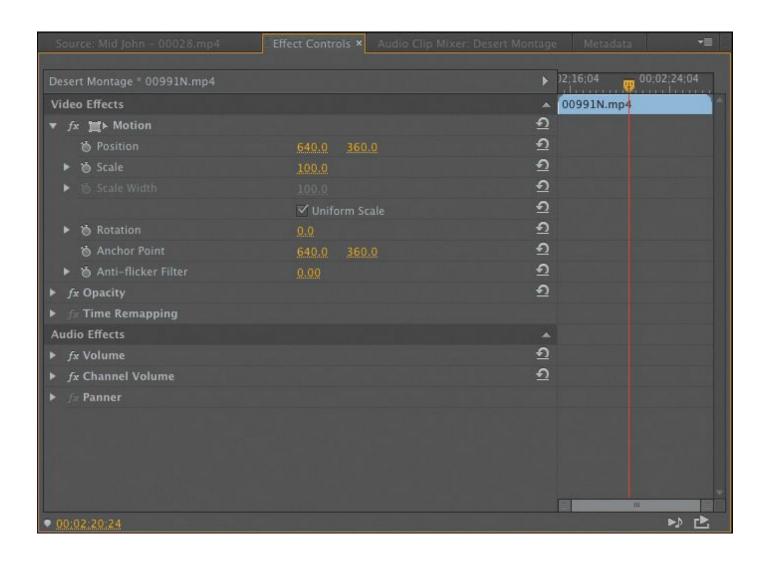
Effects panel

• Audio Clip Mixer: This panel (docked, by default, with the Source, Metadata, and Effect Controls panels) is based on audio production studio hardware, with volume sliders and panning knobs. There is one set of controls for each audio track on the Timeline. The adjustments you make are applied to audio clips. There's also a dedicated Audio Track Mixer, for applying audio adjustments to tracks.



Audio Clip Mixer

• Effect Controls panel: This panel (docked, by default, with the Source, Audio Clip Mixer, and Metadata panels) displays the controls for any effects applied to a clip you select in a sequence. Motion, Opacity, and Time Remapping controls are always available for visual clips. Most effect parameters are adjustable over time.



Effect Controls panel

• Tools panel: Each icon in this panel represents a tool that performs a specific function, typically a type of edit in a sequence. The Selection tool is context-sensitive, which means it changes appearance to indicate the function that matches the positioning. If you find your cursor doesn't work as you expect, it might be because you have the wrong tool.



#### Tools panel

- **Info panel:** The Info panel (docked, by default, with the Project panel and Media Browser) presents useful information about any asset you select in the Project panel or any clip or transition selected in a sequence.
- **History panel:** This panel (docked, by default, with the Effects and Info panels) tracks the steps you take and lets you back up easily. It's a kind of visual Undo list. When you select a previous step, all steps that came after it are also undone.

#### Note

As you move a panel, Premiere Pro displays a drop zone. If the panel is a rectangle, it will go into the selected frame as an additional tab. If it's a trapezoid, it will go into its own frame.

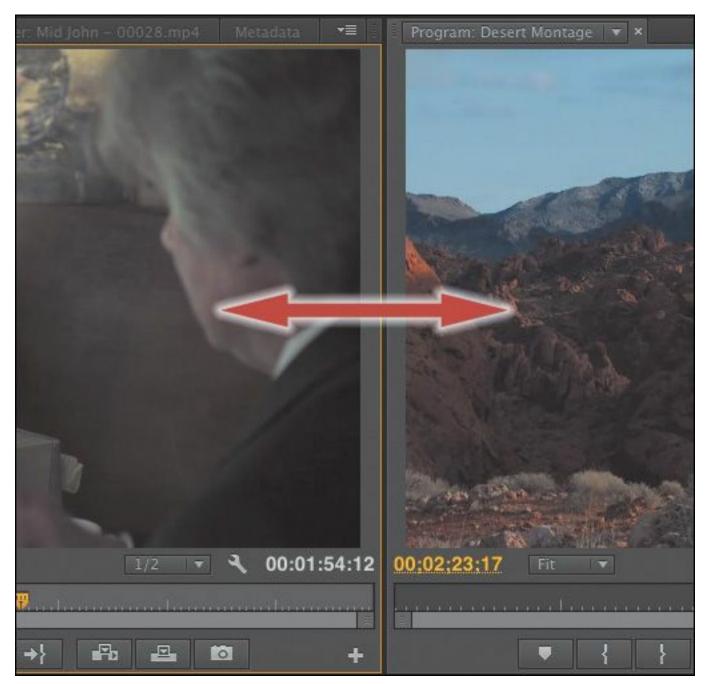
# Customizing the workspace

In addition to customizing the default workspaces (based on tasks), you can adjust the position and location of panels to create a workspace that works best for you. You can then store a workspace or even create multiple workspaces for different tasks.

- As you change the size of a frame, other frames change size to compensate.
- All panels within frames are accessible via tabs.
- All panels are dockable—you can drag a panel from one frame to another.
- You can drag a panel out of a frame to become a separate floating panel.

In this exercise, you'll try all these functions and save a customized workspace.

1. Click the Source Monitor panel (selecting its tab if necessary), and then position your pointer on the vertical divider between the Source Monitor and the Program Monitor. Then, drag left and right to change the sizes of those frames. You can choose to have different sizes for your video displays.



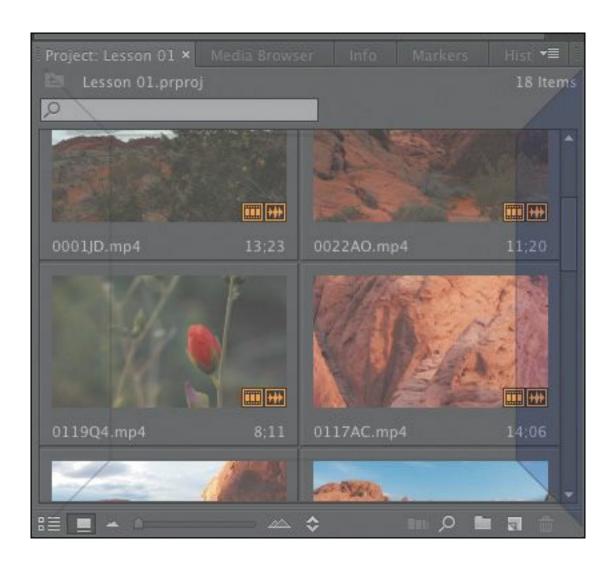
- 2. Now place the pointer on the horizontal divider between the Source Monitor and the Timeline. Drag up and down to change the sizes of these frames.
- 3. Click the gripper area in the upper-left corner of the tab for the Effects panel (to the left of the name), and drag it to the middle of the Source Monitor to dock the Effects panel in that frame.



The drop zone is displayed as a center highlight.

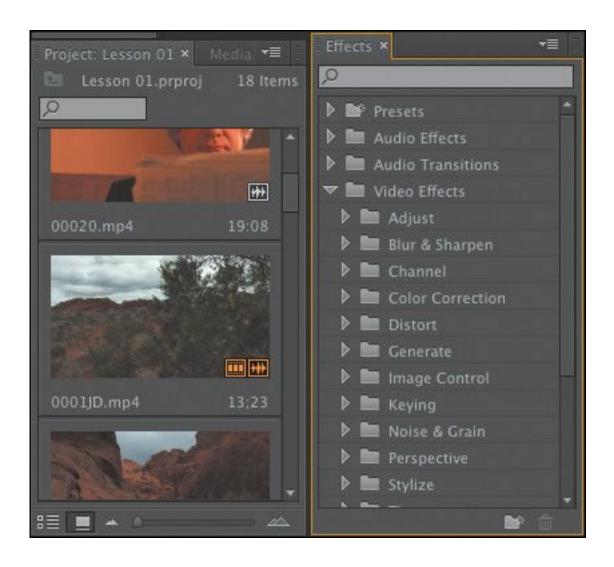
When many panels are combined in a single frame, you may not be able to see all the tabs. A navigation slider appears above the tabs to navigate between them. Slide it left or right to reveal hidden tabs. You can also display a panel by choosing it in the Window menu.

4. Drag the Effects drag handle to a point near the right of the Project panel to place it in its own frame.



The drop zone is displayed as a trapezoid.

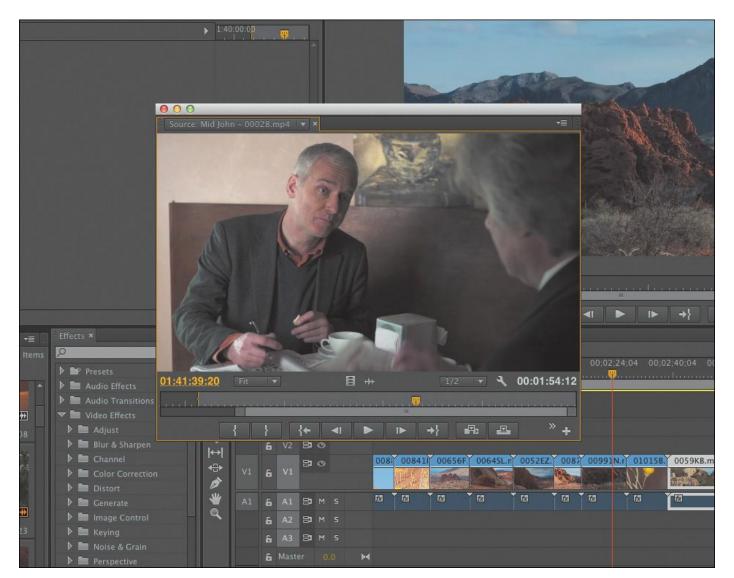
The drop zone is a trapezoid that covers the right portion of the Project panel. Release the mouse button, and your workspace should look something like the example.



You may need to resize your panels to see the controls you want.

You can also pull panels out into their own floating panel.

- 5. Click the Source Monitor's drag handle, and hold down the Control (Windows) or Command (Mac OS) key while dragging it out of its frame. Its drop zone image is much more distinct, indicating that you are about to create a floating panel.
- **6.** Drop the Source Monitor anywhere, creating a floating panel. Resize it by dragging from a corner or a side like any other panel.



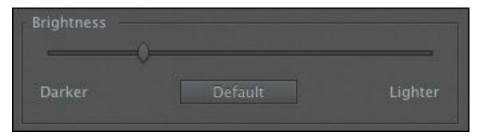
- 7. As you gain experience, you might want to create and save the layout of your panels as a customized workspace. To do so, choose Window > Workspace > New Workspace. Type a name, and click OK.
- 8. If you want to return a workspace to its default layout, choose Window > Workspace > Reset Current Workspace. To return to a recognizable starting point, choose the preset Editing workspace and reset it now.

# **Introducing preferences**

The more you edit video, the more you'll want to customize Premiere Pro to match your specific needs. There are several "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

types of preferences, all grouped into one panel for easy access. Preferences will be covered in depth as they relate to the individual lessons in this book. Let's look at a simple one:

- 1. Choose Edit > Preferences > Appearance (Windows) or Premiere Pro > Preferences > Appearance (Mac OS).
- 2. Drag the Brightness slider to the left or right to suit your needs. When you're done, click OK, or click Cancel to return to the default setting.



The default brightness is a neutral gray to help you see colors correctly.

# Tip 👅

Notice that as you approach the darkest setting, the text switches to white on gray. This is to accommodate those editors who work in editing bays in darkened rooms.

3. Switch to the Auto Save preferences.

Imagine if you had worked for hours and then there was a power cut. If you hadn't saved recently, you'd have lost a lot of work.

Premiere Pro automatically saves a backup copy of your project file while you work, in case of system failure. Premiere Pro is integrated with Adobe Creative Cloud, so

an additional backup project file can be saved to your Creative Cloud shared files folder if you check the box in this dialog box.

4. Click Cancel.

## Moving, backing up, and syncing user settings

User preferences include a number of important options. The defaults work well in most cases, but as you become more familiar with the editing process, it's likely you'll want to make a few adjustments.

Premiere Pro includes the option to share your user preferences between multiple machines: When installing Premiere Pro, you will have entered your Adobe ID to confirm your software license. You can use the same ID to store your user preferences in Creative Cloud, allowing you to sync and update them from any installation of Premiere Pro.

You can sync your preferences on the Welcome screen by choosing Sync Settings Now, r you can sync your preferences while working with Premiere Pro by choosing File > Sync Settings > Sync Settings Now (Windows) or Premiere Pro > Sync Settings > Sync Settings Now (Mac OS).

This new option to sync preferences between multiple machines makes it easier than ever to move your creative work from one location to another.

## **Review questions**

- **1.** Why is Premiere Pro considered a nonlinear editor?
- 2. Describe the basic video-editing workflow.

- 3. What is the Media Browser used for?
- **4.** Can you save a customized workspace?
- 5. What is the purpose of the Source Monitor? What is the purpose of the Program Monitor?
- **6.** How can you drag a panel to its own floating panel?

#### **Review answers**

- 1. Premiere Pro lets you place video clips, audio clips, and graphics anywhere in a sequence; rearrange items already in a sequence; add transitions; apply effects; and do any number of other video-editing steps in any order that suits you.
- 2. Shoot your video; transfer it to your computer; create a sequence of video, audio, and still-image clips on the Timeline; add effects and transitions; add text and graphics; mix your audio; and export the finished product.
- 3. The Media Browser allows you to browse and import media files without having to open an external file browser. It's particularly useful when you're working with file-based camera footage.
- **4.** Yes. You can save any customized workspace by choosing Window > Workspace > New Workspace.
- 5. You use the monitor panels to view your original clips and your sequence. You can view and trim your original footage in the Source Monitor and use the Program Monitor to view the Timeline sequence as you build it.
- **6.** Drag the panel with your mouse while holding down Control (Windows) or Command (Mac OS).

# 2. Setting Up a Project

#### Lesson overview

In this lesson, you'll learn about the following:

- Choosing project settings
- Choosing video rendering and playback settings
- Choosing video and audio display settings
- Choosing capture format settings
- Creating scratch disks
- Using sequence presets
- Customizing sequence settings

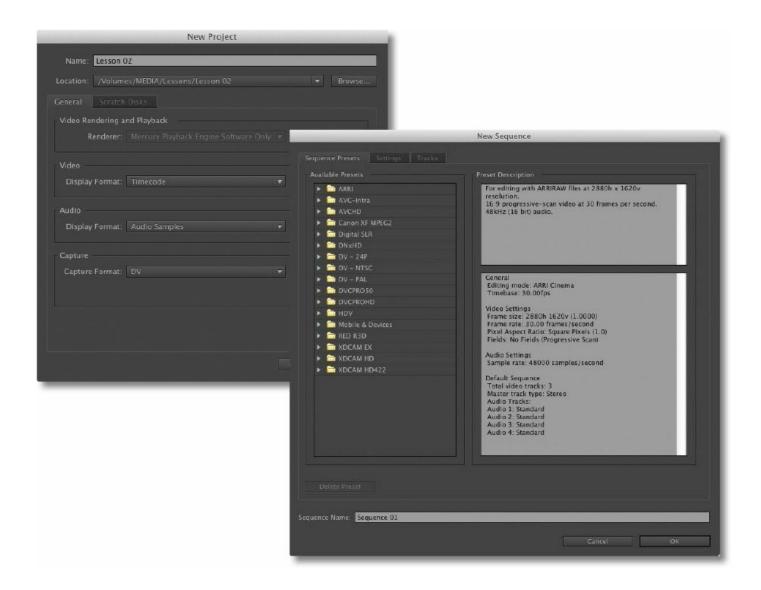


This lesson will take approximately 45 minutes.

Before you begin editing, you need to create a new project and choose some settings for your first sequence. If you're not familiar with video and audio technology, all the options might be a little overwhelming. Luckily, Adobe Premiere Pro CC gives you easy shortcuts. Plus, the principles of video and sound reproduction are the same no matter what you're creating.

It's just a question of knowing what you want to do. To help you plan and manage your projects, this lesson contains information about formats and video technology. You may decide to revisit this lesson

later, as your familiarity with Premiere Pro grows. In practice, you are likely to make very few changes to the default settings, but it's good to know what all the options mean.



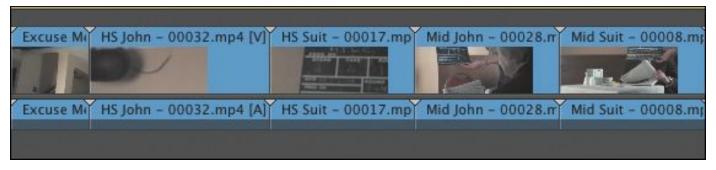
In this lesson, you'll learn how to create a new project and choose sequence settings that tell Premiere Pro how to play your video and audio clips.

## **Getting started**

A Premiere Pro project file stores links to all the video and sound files—aka *clips*—used in your Premiere Pro project. A project file also has at least one *sequence*—that is, a series of clips that play, one after another, with special effects, titles, and sound, to form your completed creative work. You'll choose which parts of your clips to use and in which order they'll play.

The beauty of editing with Premiere Pro is that you can change your mind about almost anything.

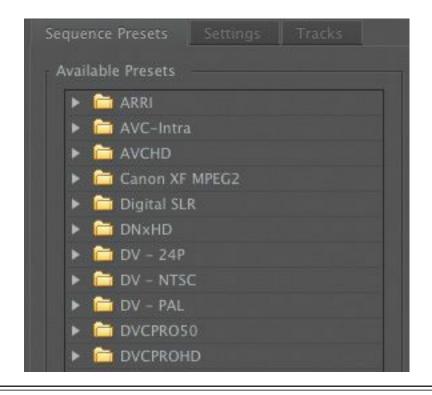
Premiere Pro project files have the file extension .prproj.



Starting a new Premiere Pro project is simple. You create a new project file, choose a sequence preset, and get on with editing.

You create a sequence, with particular playback settings, and place multiple clips inside it. It's important to understand how the sequence settings change the way Premiere Pro plays your video and audio clips. To speed things up, you can use a built-in preset to choose sequence settings and then make adjustments if you need to.

You need to know the kind of video and audio your camera records, because your sequence settings will usually be based on your original source footage. To make it easier for you to choose the right settings, Premiere Pro sequence presets are named after different camera recording formats. If you know which video format your camera records, you'll know what to choose.



#### Note

Many of the terms used in Premiere Pro come from film editing, including the term *clip*. In traditional film editing, film editors cut a piece of celluloid with a clipper and then put the piece aside for use in the edit.

In this lesson, you'll learn how to create a new project and choose sequence settings that tell Premiere Pro how to play your clips. You'll also learn about different kinds of audio tracks, what preview files are, and how to open projects created in Apple Final Cut Pro and Avid Media Composer.

#### Note

Presets preselect several settings, saving you time. You can use an existing sequence preset or

# Setting up a project

Let's begin by creating a new project.

1. Launch Premiere Pro. The Welcome screen appears.



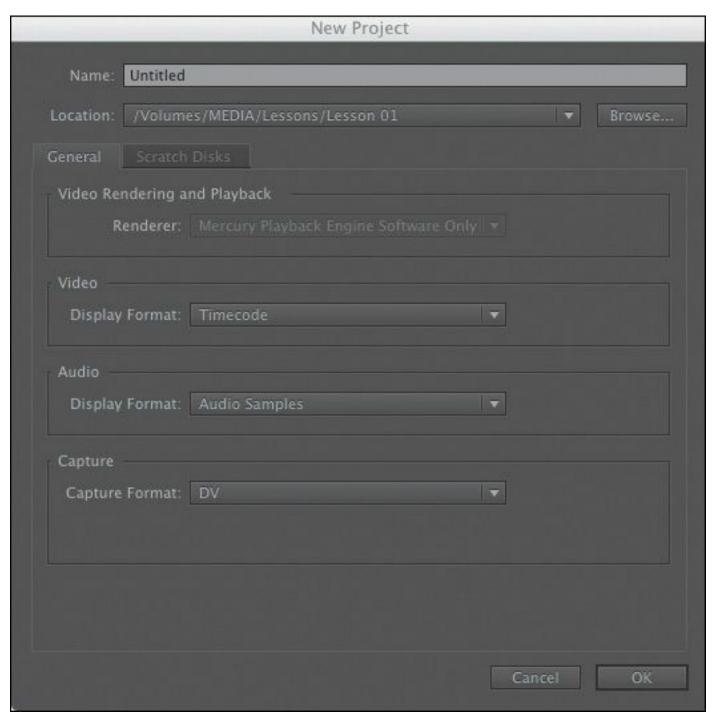
Previously opened projects are displayed as Recent Items. If this is your first time launching Premiere Pro, this area of the Welcome Screen will be blank.

There are several buttons in this window:

- New Project: Opens the New Project dialog.
- Open Project: Lets you browse to an existing project file and open it to continue working on it.
- Resources: Opens the online Help system. You'll need "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

to be connected to the Internet to access the online Premiere Pro Help.

- Exit: Exits Premiere Pro.
- Sync Settings Now: Allows you to synchronize your user preferences with those you store in Creative Cloud. This makes it easy to move from one editing system to another.
- Use Settings from a Different Account: Allows you to choose which Adobe ID you would like to use to synchronize user preferences.
- 2. Click New Project to open the New Project dialog.



This dialog has two tabs: General and Scratch Disks. All of the settings in this dialog can be changed later. In most cases, you'll want to leave them as they are. Let's take a look at what they mean.

## Note

You'll notice that tabbed panels and dialogs "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

appear a lot in Premiere Pro. They are a useful way of packing extra options into a smaller space.

# Video Rendering and Playback settings

While you're working creatively with video clips in your sequences, it's likely you'll apply some visual effects. Many effects can be played immediately, combining your original video with the effect and displaying the results as soon as you click Play. When this happens, it's called *real-time playback*.

Real-time playback is desirable because it means you can watch the results of your creative choices right away.

If you use lots of effects or if you use effects that are not GPU-accelerated, your computer may not be able to display the results at the full frame rate. That is, Premiere Pro will attempt to display your video clips, combined with the special effects, but it will not show every single frame each second. When this happens, it is described as *dropping* frames.

#### What do rendering and real time actually mean?

Think of rendering as an artist's rendering, where something is visualized, taking up paper and taking time to draw. Imagine you have a piece of video that is too dark. You add a special effect to make it brighter, but your video-editing system is unable to both play the original video *and* make it brighter. In this situation, you'd have your system render the effect, creating a new temporary video file that looks like your original video combined with the

visual effect to make it brighter.

When the part of your edited sequence is played that contains the clip with the rendered effect, your system plays the newly rendered video file instead of the original. The process is invisible and seamless. The rendered file plays back like the original video file, but brighter.

When the part of your sequence with the brightened clip is finished, your system invisibly and seamlessly switches back to playing your other original video files.

The downside with rendering is that it takes up extra space on your hard drive, and it takes time. Also, because you are viewing a new video file that is based on your original media, there might be some minor loss of quality. The upside with rendering is that you can be confident your system will be able to play the results of your effect at full quality, with all the frames per second.

Real time is...instant! When using a real-time special effect, your system plays the original video clip combined with the special effect right away, without waiting for it to render. The only downside with real-time performance is that the amount you can do without rendering depends on how powerful your system is. In the case of Premiere Pro, you can dramatically improve real-time performance by using the right graphics card (see the sidebar "The Mercury Playback Engine"). Plus, you'll need to

use effects that are designed for GPU acceleration—and not all effects are.

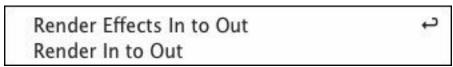
Premiere Pro displays colored lines along the top of the Timeline panel to tell you when extra work is required to play back your video.



If you can't see every frame when you play your sequence, it's OK! It won't affect the final results. When you're done editing and you output your finished sequence (more on that in <u>Lesson 18</u>, "<u>Exporting Frames, Clips, and Sequences</u>"), it'll be full quality, with all the frames.

Real-time playback can make a difference to your editing experience and your ability to preview the effects you apply with confidence. It also helps clients see your work in the best light. Premiere Pro offers a simple solution: preview rendering.

When you render, Premiere Pro can play back the results of your special effects at full quality and full frame rate, without your computer having to do any more work than playing a regular video file.



In the New Project dialog, if the Renderer menu is available, it means you have graphics hardware in your computer that meets

the minimum requirements for GPU acceleration and it is installed correctly.

The menu has two options:

- Mercury Playback Engine GPU Acceleration: If you choose this option, Premiere Pro will send many playback tasks to the graphics hardware on your computer, giving you lots of real-time effects and easy playback of mixed formats in your sequences.
- Mercury Playback Engine Software Only: This is still a major advancement in playback performance, giving you excellent performance that uses all of the available power in your computer. If you don't have the right graphics hardware on your computer, only this option will be available, and you won't be able to click this menu.

If you have a compatible graphics card, you can achieve much better performance by choosing GPU acceleration. It allows Premiere Pro to give some of the work of playing back video and applying visual effects to the GPU.

You will almost certainly want to choose the GPU option and benefit from the additional performance if you can.

Do so now, if the option is available.

### The Mercury Playback Engine

The Mercury Playback Engine dramatically improves playback performance, making it faster and easier than ever to work with multiple video formats, multiple special effects, and multiple layers of video (for effects such as picture-in-

picture).

The Mercury Playback Engine has three main features:

- Playback performance: The way Premiere Proplays back video files is improved, especially for some of the types of video that are really difficult to play back. If you're filming with a DSLR camera, for example, chances are your media is recorded using the H.264 codec, which is particularly hard to play back. With the new Mercury Playback Engine, you'll find that these files play back with ease.
- 64-bit and multithreading: Premiere Pro is a 64-bit application, which simply means it can use all of the random access memory (RAM) on your computer. This is particularly useful when you're working with High Definition or Ultra-High Definition video (or 4K and above). The Mercury Playback Engine is also multithreaded, which means it uses all of the CPU cores in your computer. The more powerful your computer is, the more performance you get in Premiere Pro.
- CUDA, Open CL, and Intel® Graphics support: If you have the right graphics hardware, Premiere Pro can delegate some of the work for playing back video to the graphics card, rather than putting the entire processing burden on the CPU in your computer. The result is even better performance and responsiveness when working

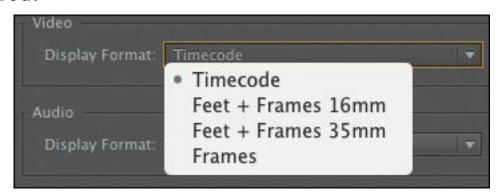
with your sequences, and lots of special effects that will play in real time.

For a list of supported graphics cards, see <a href="https://www.adobe.com/products/premiere/tech-specs.html">www.adobe.com/products/premiere/tech-specs.html</a>.

# Video/Audio Display Format settings

The next two options tell Premiere Pro how to measure time for your video and audio clips.

In most cases, you'll choose the default options: Timecode for video, and Samples for Audio. These settings don't change the way Premiere Pro plays video or audio clips, only the way time is measured.



#### Video Display Format

There are four options for Video Display Format. The correct choice for a given project largely depends on whether you are working with video or film as your source material.

#### About seconds and frames

When a camera records video, it captures a series of still images of the action. If there are enough images captured each second, it looks like moving

video when played back. Each picture is called a *frame*, and the number of frames each second is usually called *frames per second* (fps).

The fps will vary depending on your camera/video format and settings. It could be any number, including 23.976, 24, 25, 29.97, 50, or 59.94 fps. Some cameras allow you to choose between more than one frame rate, with different options for accompanying frame sizes.

#### The choices are as follows:

- **Timecode:** This is the default option. Timecode is a universal standard for counting hours, minutes, seconds, and individual frames of video. The same system is used by cameras, professional video recorders, and nonlinear editing systems all around the world.
- Feet + Frames 16mm or Feet + Frames 35mm: If your source files are captured from film and you intend to give your editing decisions to a lab so they can cut the original negative to produce a finished film, you may want to use this standard method of measuring time. Rather than measuring time, this is the number of feet plus the number of frames since the last foot. It's a bit like feet and inches but with frames rather than inches. Because 16mm film and 35mm film have different frame sizes (and so different numbers of frames per foot), there's an option for each.
- Frames: This option simply counts the number of frames of video, starting at 0. This is sometimes used for

animation projects and is another way that labs like to receive information about edits for film-based projects.

For this exercise, leave Video Display Format set to Timecode.

### **Audio Display Format**

For audio files, time can be displayed as samples or milliseconds.



- Audio Samples: When digital audio is recorded, a sound sample is taken, as captured by the microphone, thousands of times a second. In the case of most professional video cameras, this happens 48,000 times per second. In Audio Samples mode, Premiere Pro can display time in your sequences as hours, minutes, seconds, and samples. The number of samples per second will depend on your sequence settings.
- **Milliseconds:** With this mode selected, Premiere Pro will display time in your sequences as hours, minutes, seconds, and thousandths of a second.

By default, Premiere Pro lets you zoom in to your sequences to view individual frames. However, you can easily switch to displaying your audio display format instead. This powerful feature lets you make the tiniest adjustments to your audio.

For this project, leave the Audio Display Format option set to Audio Samples.

<sup>&</sup>quot;\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

### **Capture Format settings**

It's most common to record video as data files you can work with immediately. However, if you're working with archival material, you might need to capture from videotape.

The Capture Format settings menu tells Premiere Pro what tape format you are using when capturing video to your hard drive through your computer's FireWire port.

### DV and HDV capture

Premiere Pro can capture from DV and HDV cameras using the FireWire connection on your computer, if it has one. FireWire is also known as IEEE 1394 and i.LINK.

FireWire is a convenient connection for tape-based media because it uses one cable to transmit video and sound, device control (so your computer can tell the video deck to play, fastforward, pause, and so on), and timecode information.



### Third-party hardware capture

Not all video decks use a FireWire connection, so you may need additional third-party hardware installed to be able to connect your video deck for capture.

If you have additional hardware, you should follow the directions provided by the manufacturer to install it. Most likely you'll install software supplied with your hardware, and

this will discover that Premiere Pro is installed on your computer, automatically adding extra options to this menu and other menus.

Follow the directions provided with your third-party equipment to configure new Premiere Pro projects.

For more information about video capture hardware and video formats supported by Premiere Pro, visit <a href="https://www.adobe.com/products/premiere/extend.html">www.adobe.com/products/premiere/extend.html</a>.

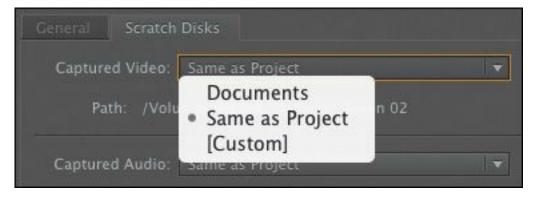
Ignore this setting for now because we will not be capturing from a tape deck in this exercise, and you can change the setting as needed later.



The Mercury Playback Engine can share performance with video capture cards for playback, thanks to a feature called Adobe Mercury Transmit.

### **Scratch Disks settings**

Whenever Premiere Pro *captures* (records) from tape or renders effects, new media files are created on your hard drive.



Scratch disks are the places these files are stored. They can be "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

separate disks, as the name suggests, or any folder in your storage locations. Scratch disks can be created all in the same place or in separate locations, depending on your hardware and workflow requirements. If you're working with really large media files, you may get a performance boost by putting all of your scratch disks on different hard drives.

There are generally two approaches to storage for video editing:

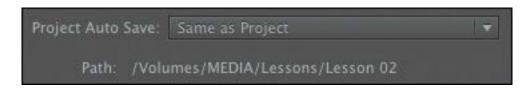
- **Project-based setup:** All associated media files are stored with the project file in the same folder.
- System-based setup: Media files associated with multiple projects are saved to one central location, and the project file is saved to another. This might include storing different kinds of media files in different locations.

Your scratch disks might be stored in local hard drives or on a network-based storage system—any storage location your computer has access to will work. It's worth noting that the speed of your scratch disks can have quite an impact on playback performance.

## **Project Files settings**

In addition to choosing where new media files are created, Premiere Pro also allows you to choose the location for storing Auto Save files. These are additional copies of your project file that are created automatically while you work.

If you need to go back to an earlier version of your project, you can open one of these additional copies. If you store your Auto Save files in a different location than your project file, they serve as a useful backup in case of system failure.



### Using a project-based setup

By default, Premiere Pro keeps any newly created media together with the project file (this is the Same as Project option). Keeping everything together this way makes finding associated files simple. You can stay even more organized by moving any media files you intend to import into your project into the same folder before you import them. When you're finished with your project, you can remove everything from your system by deleting the folder your project file is stored in. There's a downside though: Storing your media files on the same drive as your project file means the drive has to work harder while you edit, and this can impact playback performance.

### Using a system-based setup

Some editors prefer to have all of their media stored in a single location. Others choose to store their capture folders and preview folders in a different location from their project. This is a common choice in editing facilities where multiple editors share multiple editing systems, all connected to the same storage drives. It's also common among editors who have very fast hard drives for video media and slower hard drives for everything else.

There's a downside with this setup too: Once you finish editing, you're likely to want to gather everything together for archiving. This is slower and more complex when your media

files are distributed across multiple storage locations.

### Typical drive setup and network-based storage

Although all file types can coexist on a single hard drive, a typical editing system will have two hard drives: Drive 1, dedicated to the operating system and programs, and Drive 2 (often a faster drive), dedicated to footage items, including captured video and audio, video and audio previews, still images, and exported media.

Some storage systems use local computer networks to share storage between multiple systems. If this is the case for your Premiere Pro setup, check with your system administrators to make sure you have the right settings.

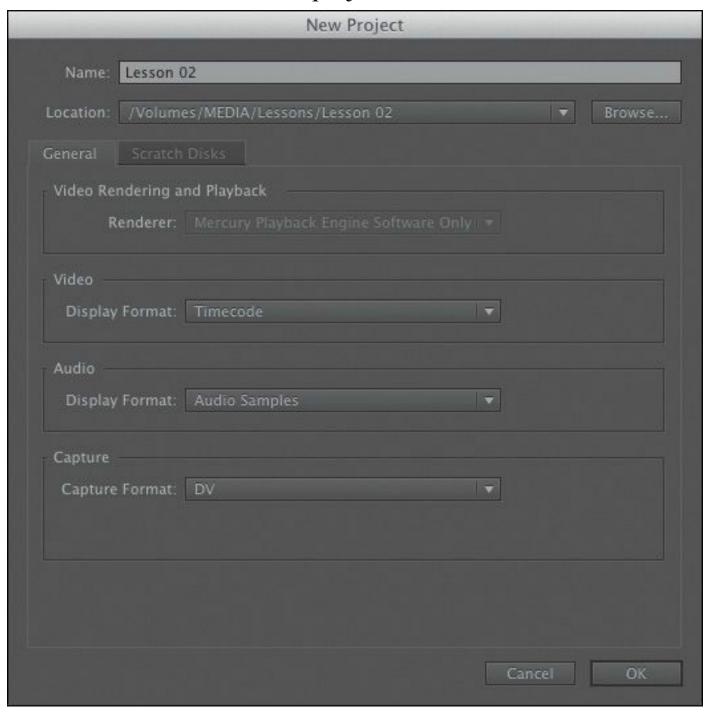
For this project, we recommend you leave all your scratch disks set to the default option: Same as Project.

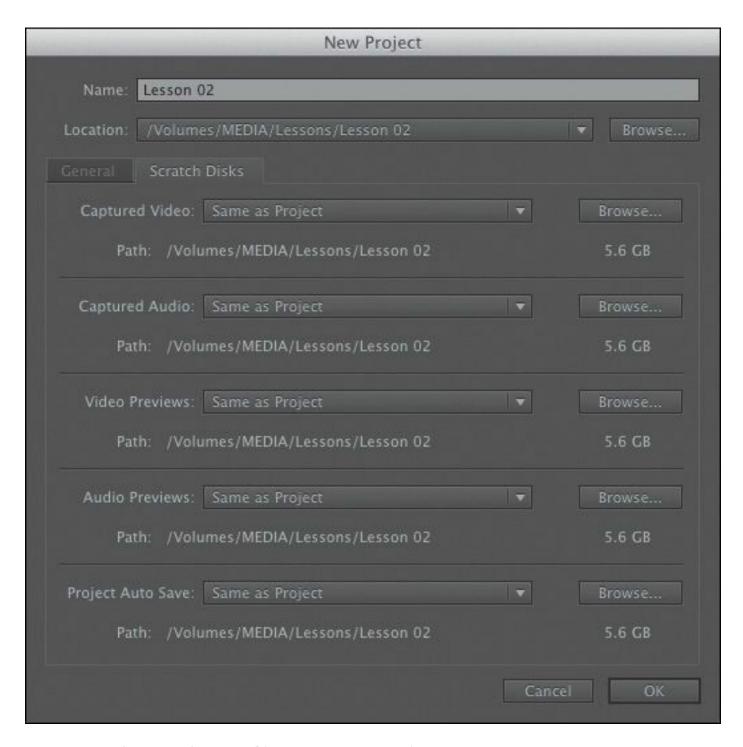
- Click in the Name box and name your new project Lesson
   02.
- 2. Click the Browse button; then choose your preferred location on your computer hard drive for these lessons.

### Note

When choosing a location for your project file, you might be able to choose a recently used location from the drop-down menu.

3. If your project is set up correctly, the General and Scratch Disks tabs in your New Project window should look identical to the screens shown here. If the settings match, click OK to create the project file.





# **Importing Final Cut Pro projects**

Premiere Pro CC can import and export sequences and links to media files using Final Cut Pro 7 XML. XML files store information about editing decisions in a way that can be understood by both Final Cut Pro and Premiere Pro. This makes it ideal for sharing creative work between both applications.

### **Exporting an XML file from Final Cut Pro 7**

You'll need to open the Final Cut Pro project file in Final Cut Pro to create an XML file. When you import the XML file into Premiere Pro, you'll need the media files used by Final Cut Pro. Premiere Pro can share the same files if both applications are installed on the same editing system.

- 1. Open the existing project in Final Cut Pro.
- 2. Either choose nothing in the project, in which case Final Cut Pro will export the entire project, or select some specific items, in which case Final Cut Pro will export only those items.
- 3. Choose File > Export > XML.

  In the XML dialog you'll see a report of how many bins, clips, and sequences are selected.
- **4.** Choose the "Apple XML Interchange Format, version 4" option for maximum compatibility with Premiere Pro.
- 5. Save the XML file in an easy-to-find location (such as with your project).

### **Exporting an XML file from Final Cut Pro 10**

If you're working with Final Cut Pro X, you can still export an XML file by going to File > Export > XML. However, you'll need to convert the XML created to Final Cut Pro 7 XML using a third-party application such as Xto7

(<a href="http://assistedediting.intelligentassistance.com/Xto7/">http://assistedediting.intelligentassistance.com/Xto7/</a>).

### Media best practice

If you intend to work with both Final Cut Pro and

Premiere Pro, you'll want to use a media format that both editing systems can handle easily.

Premiere Pro has wide-ranging support for media formats and can easily work with Final Cut Pro ProRes media files.

For this reason, it's best for editors working with both applications to use Final Cut Pro to import media and capture video from tapes. You can set up your project using ProRes media in Final Cut Pro and then easily exchange projects with Premiere Pro.

See

www.adobe.com/products/premiere/extend.html for more information about sharing projects with Final Cut Pro.

### Importing a Final Cut Pro 7 XML file

You import a Final Cut Pro 7 XML file into Premiere Pro just like any other kind of file (for more detail, see Lesson 3, "Importing Media"). When you import an XML file, Premiere Pro guides you through connecting the sequence and clip information to the original media files used by Final Cut Pro. There is a limit to the amount of information Final Cut Pro will include in an XML file, so you will find that some proprietary effects won't make it to Premiere Pro. Test this workflow before you depend upon it.

# Importing Avid Media Composer projects

Premiere Pro can import and export sequences and links to "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

media files using AAF files exported from Avid Media Composer. AAF files store information about editing decisions in a way that can be understood by both Avid and Premiere Pro. This makes it ideal for sharing creative work between both applications.

### **Exporting an AAF file from Avid Media Composer**

You'll need to open the Avid project file in Avid Media Composer to create an AAF file. When you import the AAF file into Premiere Pro, you'll need the media files used by Avid Media Composer—Premiere Pro can share the same files.

- 1. Open an existing project in Media Composer.
- 2. Choose the sequence you'd like to transfer.
- 3. Choose File > Export. Click the Options button.

  In the standard Avid Export dialog, there's a menu at the bottom that contains templates. The Options button at the bottom allows customization.
- 4. In the Export Settings dialog, do the following:
  - Select AAF Edit Protocol.
  - Include marks—export only between In/Out points (optional).
  - Use enabled tracks (optional).
  - Include all video tracks in the sequence.
  - Include all audio tracks in the sequence.
  - Video Details: For Export Method, choose Link to (Don't Export) Media.
  - Audio Details: For Export Method, choose Link to

(Don't Export) Media.

- Audio Details: Include Rendered Audio Effects.
- 5. Save the AAF file in an easy-to-find location.

#### Importing an Avid AAF file

You import an Avid AAF file like any other kind of file (see Lesson 3). When you import an AAF file, Premiere Pro guides you through connecting the sequence and clip information to the original media files used by Avid. There is a limit to the amount of information Avid will include in an AAF file, so you will find that some proprietary effects will not make it to Premiere Pro. Test this workflow before you rely upon it.

### Media best practice

Avid Media Composer uses a media management system that's completely different from the Premiere Pro system. However, since version 3.5 of Media Composer, a new system called AMA has permitted linking to media outside of Avid's own media organization system. Media files imported into Avid Media Composer using AMA tend to relink better when an AAF file is imported into Premiere Pro. Media in an Avid Media Composer AMA folder can be anything that Apple QuickTime can play, including P2, XDCAM, and even RED. You'll need to have the appropriate codec available on your Premiere Pro editing system. Consider using Avid DNxHD, which is a popular codec created by Avid and supported natively in Premiere

Pro.

You will usually achieve the best results if you use Avid Media Composer's AMA system to link to original media with P2 or XDCAM media.

See

www.adobe.com/products/premiere/extend.html for more information about sharing projects with Avid Media Composer.

### Setting up a sequence

In your Premiere Pro projects you will create sequences, into which you'll place video clips, audio clips, and graphics. If necessary, Premiere Pro adapts video and audio clips that you put into a sequence so they match the settings for that sequence. Each sequence in your project can have different settings, and you'll want to choose settings that match your original media as precisely as possible. Doing so reduces the work your system must do to play back your clips, improves real-time performance, and maximizes quality.

If you're editing a mixed-media format project, you may have to make careful choices about which format to match with your sequence settings. You can mix formats easily but playback performance is best when the sequence settings match.

# Tip 👅

If the first clip you add to a sequence does not match the playback settings of your sequence, Premiere Pro asks if you would like to change the

# Creating a sequence that automatically matches your source

If you're not sure what sequence settings you should choose, don't worry. Premiere Pro has a special shortcut to create a sequence based on your original media.

At the bottom of the Project panel, there is a New Item menu . You can use this menu to create new items, such as sequences and titles.

To automatically create a sequence that matches your media, drag and drop any clip (or multiple clips) in the Project panel onto this New Item menu button. Premiere Pro creates a new sequence with the same name as the clip and a matching frame size and frame rate. Now you're ready to start editing, and you can be confident your sequence settings will work with your media.

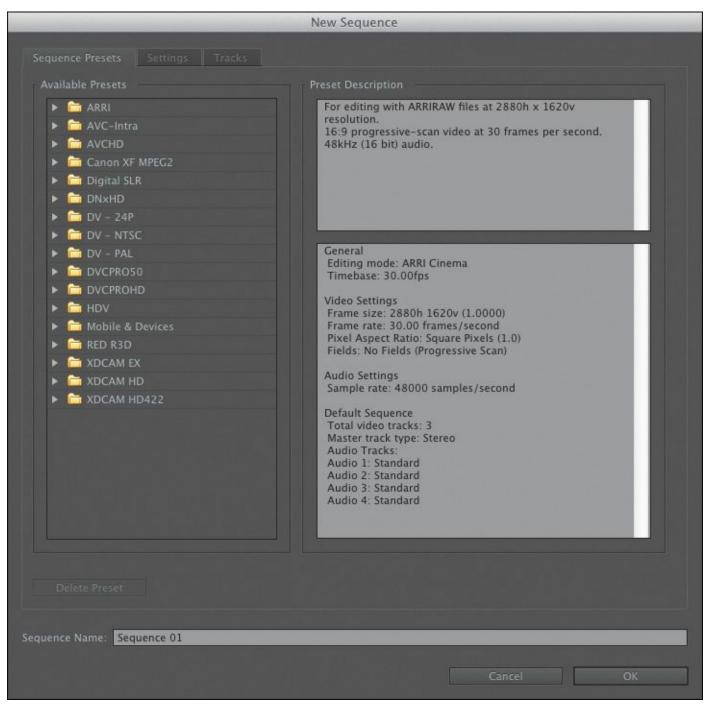
If the Timeline panel is empty, you also can drag a clip (or multiple clips) into it to create a sequence automatically.

### **Choosing the correct preset**

If you know exactly which settings you need, Premiere Progives you access to all the options to configure a sequence. If you're not so sure, you can choose from a list of presets.

Click the New Item menu button on the Project panel, and choose Sequence.

The New Sequence dialog has three tabs: Sequence Presets, Settings, and Tracks. We'll start with Sequence Presets.



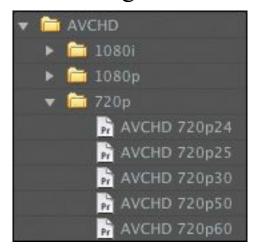
The Sequence Presets tab makes setting up a new sequence much easier. When you choose a preset, Premiere Pro chooses settings for your sequence that closely match a particular video and audio format. After choosing a preset, you can tweak these settings on the Settings tab.



You'll find a wide range of preset configuration options for the most commonly used and supported media types. These settings are organized based on camera formats (with specific settings inside a folder named after the recording format).

Click the disclosure triangle to see specific settings in a group. These settings are typically designed around frame rates and frame sizes. Let's look at an example.

1. Click the disclosure triangle next to the group AVCHD.



You can now see three subfolders, based on frame sizes and interlacing methods. Remember that video cameras can often shoot video using resolutions of HD, as well as different frame rates and recording methods. The media used for the next exercise will be AVCHD at 720p and a frame rate of 25fps.

- 2. Click the disclosure triangle next to the 720p subgroup.
- 3. To best match the footage we'll be using, choose the "\*\*\*\*\*ebook converter DEMO www.ebook-

converter.com\*\*\*\*\*\*

### AVCHD 720p25 preset by clicking its name.



When you're starting out in video editing, the number of formats available can be a little overwhelming. Premiere Pro can play back and work with a very wide range of video and audio formats and will often play back mismatched formats smoothly.

However, when Premiere Pro has to adjust video for playback because of mismatched sequence settings, your editing system must work harder to play the video, and this will impact real-time performance. It's worth taking the time before you start editing to make sure you have sequence settings that closely match your original media files.

The essential factors are always the same: The number of frames per second, the frame size (the number of pixels in the picture), and the audio format. If you turn your sequence into a file, then the frame rate, frame size, and audio format will match the settings you choose here.

When you output to a file, you can choose to convert your sequence to any format you like (for more on exporting, see <u>Lesson 18</u>).

While the standard presets usually fit, you may need to create a custom setting. To do so, first choose a sequence preset that matches your media closely and then make custom selections in the Settings tab. You can save your custom preset by clicking the Save Preset button near the bottom of the Settings tab. Give your customized project settings preset a name in the Save

Settings dialog, add notes if you want, and click OK. The preset will appear in a Custom folder under Sequence Presets.

You can use Apple ProRes as your preview file codec if you have it installed on your system. Choose a custom editing mode, and then choose QuickTime as your preview file format and Apple ProRes as your codec.

### 0

#### Note

The Preset Description area of the Sequence Presets tab often describes the kind of camera used to capture media in this format.

# Customizing a sequence

Once you've selected the sequence preset that most closely matches your source video, you may want to adjust the settings to suit the specifics of your sequence.

To begin making adjustments, you would click the Settings tab and choose any options that better suit the way you would like Premiere Pro to play back your video and audio files.

Remember, Premiere Pro will automatically adapt footage you add to your Timeline so that it matches your sequence settings, giving you a standard frame rate and frame size, regardless of the original format. This process is called conforming.

New Sequence							
Sequence Presets Se	ettings Tracks						
Editing Mode:	AVCHD 720p square pixel	T V					
Timebase:	25.00 frames/second	-					
Video							
Frame Size:	horizontal vert	ical	16:9				
Pixel Aspect Ratio:	Square Pixels (1.0)	▼					
Fields:							
Display Format:	25fps Timecode	v					
Audio							
Sample Rate:	48000 Hz	v					
Display Format:	Audio Samples	<b>v</b>					
Video Previews							
Preview File Format:							
Codec:							
Width:	1280						
Height:	720 Reset						
Maximum Bit Dep	th 🔲 Maximum Render Quality						
Composite in Line	ar Color (requires GPU acceleration o	or ma:	x render quality)				
Sequence Name: Sequen	ce 01						
				Cancel		OK	7
				Carreer		- Oic	

You will notice that some settings cannot be changed when you use a preset. This is because they are optimized for the media type you selected on the Preset tab. For complete flexibility, change the Editing Mode menu to Custom, and you will be able to change all of the available options.

The Settings tab allows you to customize the individual settings of a preset. If your media matches one of the presets, it's not

necessary to make changes on the Settings tab. In fact, it's recommended that you use the default settings.

#### Formats and codecs

Video file types like Apple QuickTime, Microsoft AVI, and MXF are containers that can carry many different video and audio codecs. The file is referred to as the *wrapper*, and the video and audio are referred to as the *essence*.

Codec is a shortening of the words compressor and decompressor. It's the way video and audio information is stored.

If you output your finished sequence to a file, you'll choose a file type and a codec separately.

### Maximum bit depth and maximum render quality

If you enable the Maximum Bit Depth option, Premiere Pro will render special effects at the maximum quality possible. For many effects, this means 32-bit floating-point color, which allows for trillions of color combinations. This is the best possible quality for your effects but requires more work for your computer, so expect less real-time performance if you enable it.

If you enable the Maximum Render Quality option or if you have GPU acceleration, Premiere Pro uses a more advanced system for scaling images smaller. Without this option, you might see minor

artifacts or noise in the picture when making images smaller. Without GPU acceleration, this option will impact playback performance.

Both of these options can be turned off or on at any time, so you can edit without them and then turn them on when you output your finished work. Even with both options on, you can use real-time effects and get good performance from Premiere Pro.

### Tip 🕟

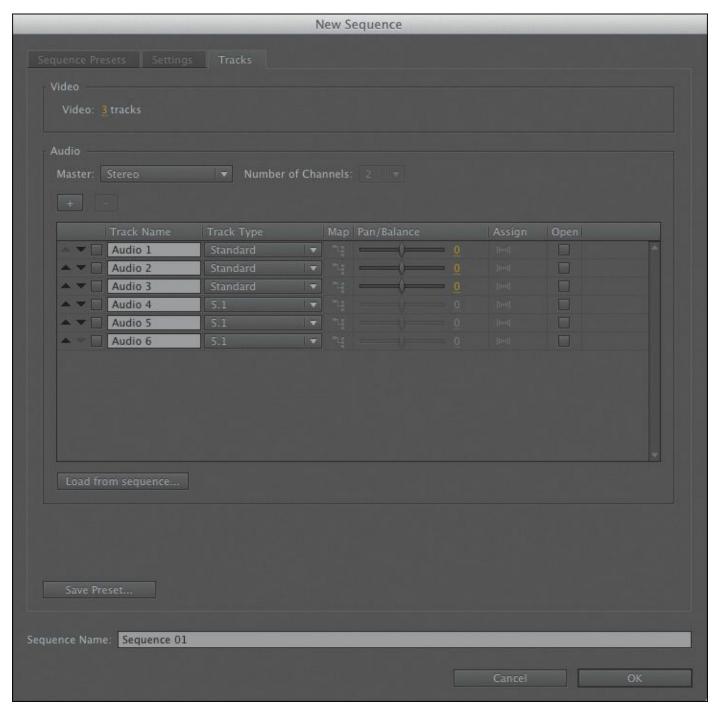
For now, leave the settings as they are, but examine how the preset is going to configure the new sequence. Look at each setting from top to bottom to become familiar with the choices required to configure a video-editing sequence.

# Understanding audio track types

When you add a video or audio clip to a sequence, you'll put it on a *track*. Tracks are horizontal areas in the sequence that hold clips in a particular position in time. If you have more than one video track, any video clips placed on an upper track will appear in front of clips on a lower track. For example, if you have text or a graphic on your second video track and a video clip on your first video track, you'll see the text or graphic in front of the video.

The Tracks tab of the New Sequence dialog allows you to preselect the track types for the new sequence.

All audio tracks are played at the same time, creating a complete audio mix. To create the mix, position your audio clips on different tracks, lined up in time. Narration, sound bites, sound effects, and music can be organized by putting them on different tracks. You can easily rename tracks, making it easier to find your way around your sequence. Premiere Pro lets you specify how many video and audio tracks will be added when the sequence is created. You can add and remove audio or video tracks later, but you can't change your Audio Master setting.



You can choose from several audio track types. Each track type is designed for specific types of audio. When you choose a particular track type, Premiere Pro gives you the right controls to make adjustments to the sound, based on the number of audio channels. For example, Stereo clips need different controls than 5.1 Surround clips.

When you add a clip to a sequence that has both video and

audio, Premiere Pro makes sure the audio part goes to the right kind of track. You can't accidentally put an audio clip on the wrong kind of track; Premiere Pro will automatically create the right kind of track if one doesn't exist.

### Note

After a sequence is created, you can't change the Audio Master setting. This setting is for choosing mono, stereo, 5.1, or multi-channel output. For the purposes of these lessons, we'll choose the Stereo setting.

#### Audio tracks

Audio tracks are the horizontal areas where you'll put your audio clips. The types of audio tracks available in Premiere Pro are as follows:

• **Standard:** These tracks are for both mono and stereo audio clips.



- 5.1: These tracks are for audio clips with 5.1 audio (the kind used for surround sound mixes).
- Adaptive: Adaptive tracks are for both mono and stereo audio, and give you precise control over the output routing for each audio channel. For example, you could decide the track audio channel 3 should be output to your

mix in channel 5. This workflow is commonly used for multilingual broadcast TV.

• Mono: This track type will accept only mono audio clips.

You'll explore audio more in <u>Lesson 11</u>, "<u>Editing and Mixing Audio</u>."

#### **Submixes**

Submixes are an advanced feature of the audio finishing tools in Premiere Pro. You can send the output from a track in your sequence to a submix track, rather than directly to the master output. You can then use the submix to apply audio effects and make changes to the volume. This may not seem useful for a single track, but you can send as many tracks as you like to a single submix. That means you could have, for example, ten audio tracks controlled by a single submix. Put simply, this means far less clicking and much more action.

You choose submixes based on the output options you want:

- Stereo Submix: For submixing to stereo tracks.
- 5.1 Submix: For submixing to 5.1 tracks.
- Adaptive Submix: For submixing to mono or stereo tracks.
- Mono Submix: For submixing to mono tracks.

Stereo Submix 5.1 Submix Adaptive Submix Mono Submix

For this sequence, you'll use the default settings. Take a moment to familiarize yourself with the available choices, then

### do the following:

- 1. Click in the Sequence Name box and name your sequence First Sequence.
- 2. Click OK to create the sequence.
- **3.** Choose File > Save. Congratulations! You have made a new project and sequence with Premiere Pro.

If you have not already copied the media and project files to your computer, please do so before continuing to <u>Lesson 3</u> (you'll find instructions in the <u>Getting Started</u> section of this book).

# **Review questions**

- 1. What is the purpose of the Settings tab in the New Sequence dialog?
- 2. How should you choose a sequence preset?
- 3. What is timecode?
- 4. How do you create a custom sequence preset?
- 5. What options are available inside Premiere Pro to capture video from tape with no additional third-party hardware?

#### **Review answers**

- 1. The Settings tab is used to customize an existing preset or to create a new custom preset.
- 2. It's generally best to choose a preset that matches your original footage. Premiere Pro makes this easy by describing the presets in terms of camera systems.
- 3. Timecode is the universal system for measuring time in

- hours, minutes, seconds, and frames. The number of frames per second varies depending on the recording format.
- 4. When you've selected the settings you want for your custom preset, click the Save Preset button, give it a name and a description, and click OK.
- 5. Premiere Pro records DV and HDV files if you have a FireWire connection on your computer. If you have additional connections provided by installed third-party hardware, consult the documentation for that hardware for the best settings.

# 3. Importing Media

#### **Lesson overview**

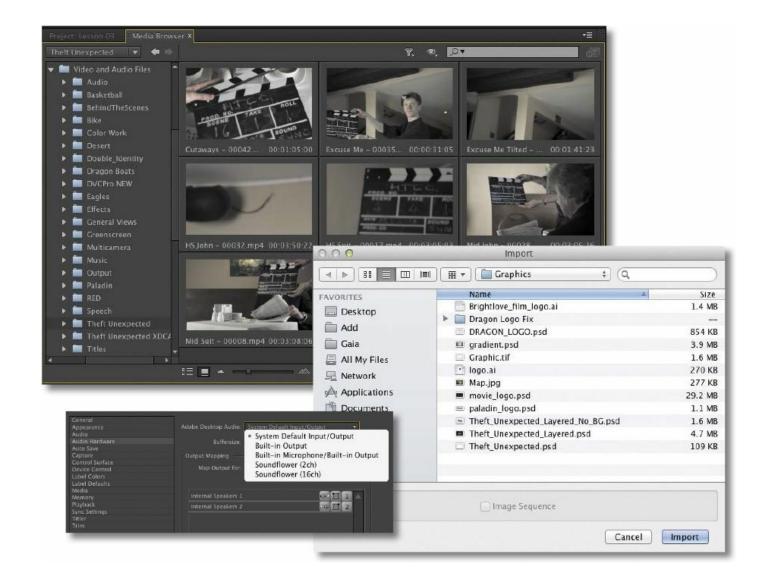
In this lesson, you'll learn about the following:

- Using the Media Browser to load video files
- Using the Import command to load graphic files
- Choosing where to place cache files
- Capturing from tape



This lesson will take approximately 40 minutes to complete.

To edit your video assets, you need to import media files into your project. This might include video footage, animation files, narration, music, atmospheric sound, graphics, or photos. Everything you include in a sequence must be imported before it can be used.



Because Adobe Premiere Pro can work with so many types of assets, it offers multiple methods for browsing and importing media.

### **Getting started**

In this lesson, you'll learn to import media assets into Adobe Premiere Pro CC. For most files, you'll use the Adobe Media Browser, a robust asset browser that works with all the media types you may need to import into Premiere Pro. You'll also learn about special cases such as importing graphics or capturing from videotape.

For this lesson, you'll use the project file you set up in <u>Lesson</u> <u>2</u>.

- 1. Continue to work with the project file from the previous lesson, or open it from your hard drive.
- 2. Choose File > Save As.
- 3. Rename the file Lesson 03.prproj.
- **4.** Choose a location on your hard drive, and click Save to save the project.

If you do not have the previous lesson file, you can open the file Lesson 03.prproj from the Lesson 03 folder.

### Importing assets

When you import items into a Premiere Pro project, you are creating a link from the original media file to a pointer that lives inside your project. This means you are not actually modifying the original files; you're just manipulating them in a nondestructive manner. For example, if you choose to edit only part of a clip into your sequence, you're not throwing away the unused media.

You'll import media into Premiere Pro in two principal ways:

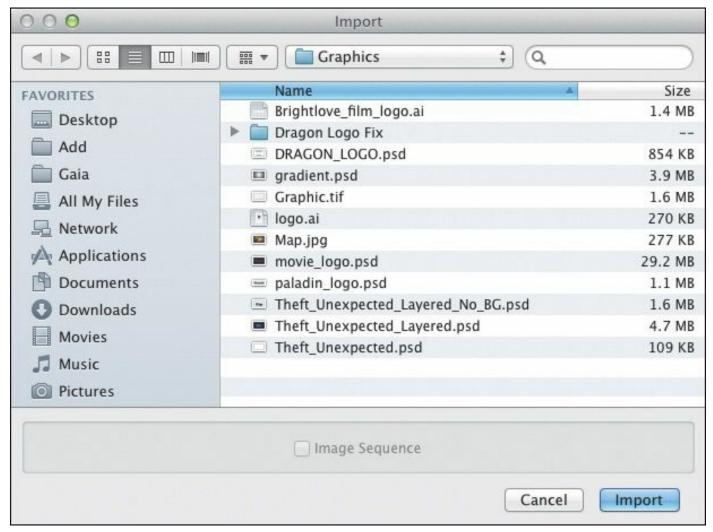
- Standard importing by choosing File > Import
- Using the Media Browser panel

Let's explore the benefits of each.

# When to use the Import command

Using the Import command is straightforward (and may match what you're used to from other applications). To import any file, just choose File > Import.

You can also use the keyboard shortcut Control+I (Windows) or Command+I (Mac OS) to open the standard Import dialog box.



This method works best for self-contained assets such as graphics and audio, especially if you know exactly where those assets are on your drive and you want to quickly navigate to them. This importing method is not ideal for file-based camera footage, which often uses complex folder structures with separate files for audio, video, and important additional data. For camera-originated media, you'll instead use the Media Browser.

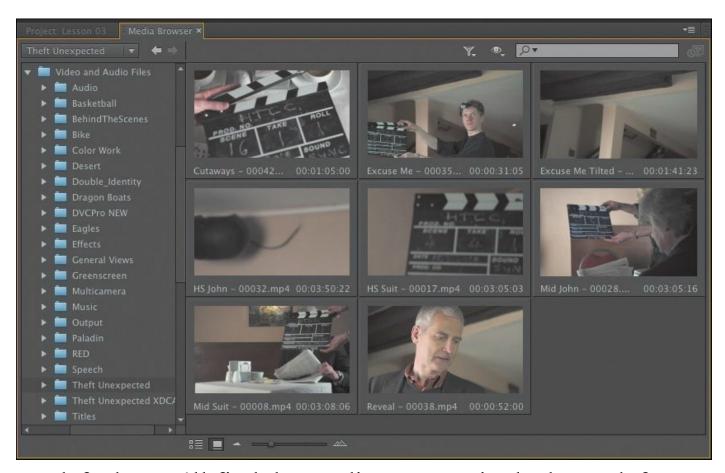


Another way to open the Import dialog box is to simply double-click an empty area of the Project panel.

#### When to use the Media Browser

The Media Browser is a robust tool for reviewing your media assets and then importing them into Premiere Pro. The Media Browser shows the fragmented files you might get from a digital video camera as whole clips; you'll see each recording as a single clip, with the video and audio combined, regardless of the recording format.

This means you can avoid dealing with complex camera folder structures and instead work with easy-to-browse icons and metadata. Being able to see this metadata (which contains important information, such as clip duration, recording date, and file type) makes it easier to select the correct clip from a long list.



By default, you'll find the Media Browser in the lower-left corner of your Premiere Pro workspace (if your workspace is set to Editing). It's docked in the same frame as the Project panel. You can also quickly access the Media Browser by pressing Shift+8.

You can position the Media Browser elsewhere onscreen by dragging it, or you can undock it and make it a floating panel by clicking the panel menu in the upper-right corner and choosing Undock Panel.

You'll find that working in the Media Browser is not significantly different from browsing using your computer's operating system. There are a series of navigation folders on the left side and buttons to navigate forward and backward at the top. You can use the Up Arrow and Down Arrow keys to select items within a list and the Left Arrow and Right Arrow keys to

move further along a file directory path (such as stepping into a folder to examine its contents).

The major benefits of the Media Browser include the following:

- Narrowing the display to a specific file type, such as JPEG, Photoshop, XML, or AAF.
- Autosensing camera data—AVCHD, Canon XF, P2, RED, ARRIRAW, Sony HDV, or XDCAM (EX and HD)—to correctly display the clips.
- Viewing and customizing the kinds of metadata to display.
- Correctly displaying media that has spanned clips across multiple camera media cards. This is common in professional cameras, and Premiere Pro will import the files as a single clip even if a longer video file filled one card and continued on a second one.

## Tip 👅

If you need to use assets from another Premiere Pro project, you can import that project into your current one. Just use the Media Browser to locate it; once you double-click a project, Premiere Pro will reveal all of its assets and its bin structure. You can then navigate through it to select individual clips and sequences or drag the whole project into your current project.

#### **Importing from Adobe Prelude**

A component of Adobe Creative Suite CC is Adobe Prelude, which you can use to organize footage in a simple, streamlined interface. The use of Adobe Prelude is beyond the scope of this book, but in the component's documentation you'll find extensive coverage on how to use it and on best practices for organizing clips.

Adobe Prelude is designed so producers or assistants can quickly and efficiently ingest (import), log, and even transcode media for tapeless workflows.

If you have an Adobe Prelude project, here's how to send it to Premiere Pro:

- 1. Launch Adobe Prelude.
- 2. Open the project you want to transfer.



**3.** Choose File > Export > Project.

Export Project	
Destination: Local Disk	<b>*</b>
✓ Project	
Name: Theft Unexpected	_
Type: Premiere Pro	▼
Media	120
Use Subfolder	
Subfolder: Port Editable Res 2010	
Cancel OK	

- 4. Select the Project check box.
- 5. Enter a name in the Name field.
- **6.** In the Type menu, choose Premiere Pro.
- 7. Click OK. The Choose Folder dialog box opens.
- **8.** Navigate to a destination for the new project, and click Choose. A new Premiere Pro project is created.

When you're ready to import the clips into Premiere Pro, import the newly created project file as you would any other clip, by choosing File > Import and browsing to it. Premiere Pro will import all of the clips and maintain their organization as set up in Prelude.

If both applications are running at the same time, you can also send clips from Prelude to Premiere Pro by selecting them, right-clicking the selection, and choosing Send to Premiere Pro.

## Working with the Media Browser

The Media Browser in Premiere Pro allows you to easily browse for files on your computer. It can also stay open all the time, giving you immediate access to the media files on your hard drive. It's fast and convenient and highly optimized for locating and importing footage.

## Using a tapeless workflow

A *tapeless* workflow (also known as a *file-based* workflow) is "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

simply the process of importing video from a tapeless camera, editing it, and exporting it. Premiere Pro CC makes this especially easy because it does not require the media from these tapeless formats to be converted before editing. Premiere Pro can edit tapeless formats (such as P2, XDCAM, AVCHD, and even formats from DSLRs that shoot video) natively with no conversion.

For best results when working with your own camera media, follow these guidelines:

- 1. Create a new folder for each project.
- 2. Copy the camera media to your editing hard drive with the existing folder structure intact. Be sure to transfer the complete data folder directly from the root directory of the card. For best results, you can use the transfer application that is often included by the camera manufacturer for moving your video clips. Visually inspect it to ensure that all media files have been copied and that the card and new copied folder sizes match.
- 3. Clearly label the copied folder of the media with the camera information, including card number and date of shoot.

#### Note

To complete this lesson, you will import files from your computer. Be sure you have copied all of the lesson files included with this book to your computer. For more details, see the <u>Getting</u> <u>Started</u> section in the front of the book.

- **4.** Create a second copy of the cards on a physically separate, second drive.
- 5. Ideally, create a long-term archive using another backup method, such as Blu-ray Disc, LTO tape, and so on.

#### Note

You may want to use Adobe Prelude to manage the process of copying and importing tapeless media sources.

## Supported video file types

It's not unusual to work on a project and end up with video clips from different cameras using different file formats. This is no problem for Premiere Pro, because you can mix different clip formats on the same Timeline. The Media Browser can see just about any file format. It's particularly well suited for native support of tapeless formats.

The major tapeless formats supported by Premiere Pro include the following:

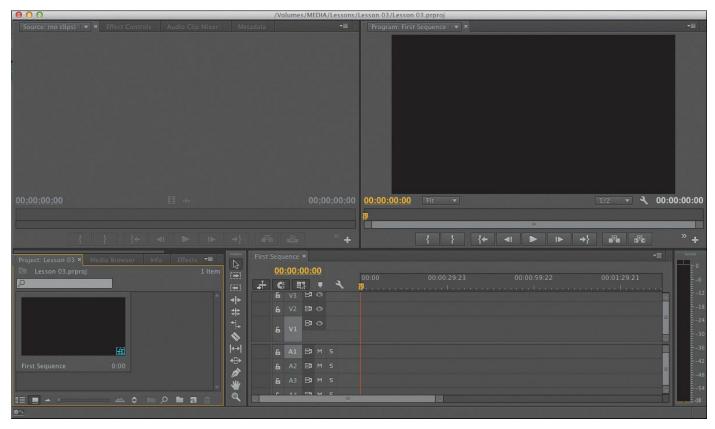
- Any DSLR camera that shoots H.264 directly as a .mov or .mp4 file
- Panasonic P2 (DV, DVCPRO, DVCPRO 50, DVCPRO HD, AVC-Intra)
- RED ONE, RED EPIC, RED Mysterium X, and the 6K RED Dragon
- ARRIRAW
- XDCAM SD, XDCAM EX, XDCAM HD, and HD422

- Sony HDV (when shot on removable tapeless media)
- AVCHD cameras
- Canon XF
- Apple ProRes
- Avid DNxHD MXF files
- Blackmagic Cinema DNG

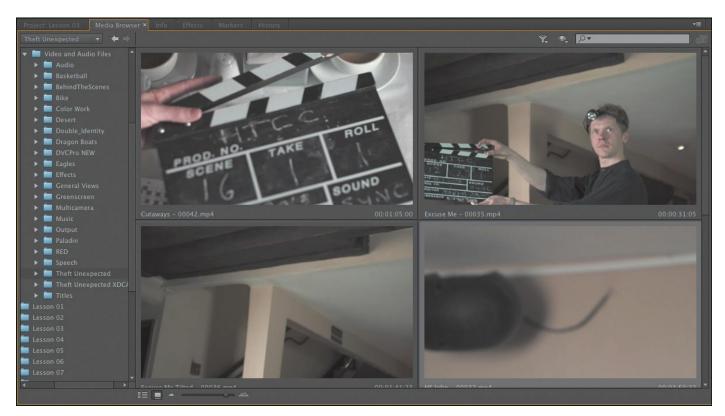
## Finding assets with the Media Browser

The good news is that the Media Browser is self-explanatory. In many ways, it's like a web browser (it has forward and back buttons to go through your recent navigation). It also has a list of shortcuts on the side. Finding materials is easy. For this exercise, you'll work with the Lesson 03.prproj file from earlier. This project should have no assets imported yet.

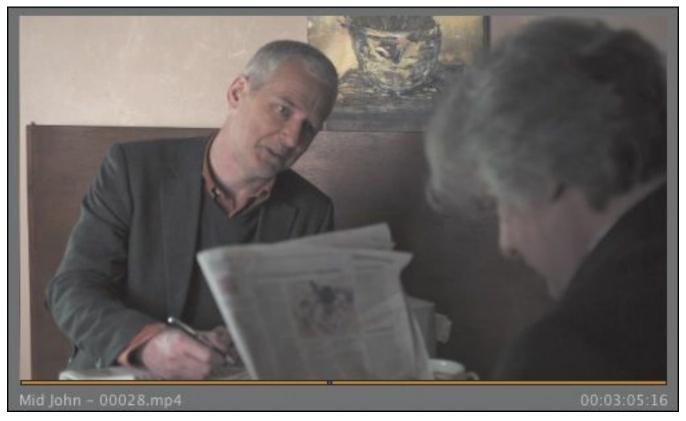
1. To begin, reset the workspace to the default. Choose Window > Workspace > Editing. Then choose Window > Workspace > Reset Current Workspace, and click Yes.



- 2. Click the Media Browser (it should be docked with the Project panel by default). Make it larger by dragging its right edge to the right.
- 3. To make the Media Browser easier to see, place your mouse pointer over the panel and then press the `(grave) key (it is often in the upper-left corner of a keyboard). The Media Browser panel should now fill the screen. You may need to adjust the width of columns to make it easier to see items.
- 4. Using the Media Browser, navigate to the folder Lessons/Assets/Video and Audio Files/Theft Unexpected XDCAM. You can open each folder by double-clicking.
- 5. Drag the resize slider in the lower-left corner of the Media Browser to enlarge the thumbnails of the clips. You can use any size you like.



- 6. Click a clip in a folder to select it.
  You can now preview the clip using keyboard shortcuts.
- 7. Press the L key to play a clip.
- **8.** To stop playback, press the K key.
- 9. To play backwards, press the J key.



- 10. Experiment with playing back other clips. If the volume of your computer is turned up, you should be able to hear the audio playback clearly.
  - You can press the J or L keys multiple times to increase the playback rate for fast previews. Use the K key or the spacebar to pause.
- 11. Now you'll import all of these clips into your project. Press Control+A (Windows) or Command+A (Mac OS) to select all of the clips.
- 12. Right-click one of the selected clips and choose Import.



Alternatively, you can drag all of the selected clips onto the Project panel's tab and then down into the empty area to import the clips.

### Tip 👅

Filter the assets you're looking for by using the Files of Type menu in the Media Browser.

13. Press the `(grave) key to restore the Media Browser to its original size. Then switch to the Project panel.

#### Note

The Media Browser filters out non-media files, making it easier to browse for video or audio assets.

### Making the most of the Media Browser

The Media Browser has a number of features that make it easy to navigate your drives:

- The Forward and Back buttons work like an Internet browser, allowing you to navigate to locations you have viewed previously.
- If you expect to import files from a location often, you can add the folder to a list of favorites at the top of the navigation panel. To create a favorite, right-click the folder and choose Add to Favorites.
- You can easily open multiple Media Browser panels and access the contents of several different folders at once. To open a new Media Browser panel, click the Panel menu (at the top right) and choose New Media Browser Panel.

## **Importing images**

Graphics have become an integral part of the modern video edit. People expect graphics to both convey information and add to the visual style of a final edit. Fortunately, Premiere Pro can import just about any image and graphic file type. Support is especially excellent when you use the native file formats created by Adobe's leading graphic tools, Adobe Photoshop and Adobe Illustrator.

## Importing flattened Adobe Photoshop files

Anyone who works with print graphics or does photo retouching has probably used Adobe Photoshop. It's the workhorse of the

graphic design industry. Adobe Photoshop is a powerful tool with great depth and versatility, and it's becoming an increasingly important part of the video production world. Let's explore how to properly import two files from Adobe Photoshop.

To start, you'll import a basic Adobe Photoshop graphic:

- 1. Click the Project panel to select it.
- 2. Choose File > Import, or press Control+I (Windows) or Command+I (Mac OS).
- 3. Navigate to Lessons/Assets/Graphics.
- **4.** Select the file Theft\_Unexpected.psd, and click Import. The graphic is a simple logo file and imports into the Premiere Pro project.

#### An introduction to Dynamic Link

One way to work with Premiere Pro is with a suite of tools. You may be using a version of Adobe Creative Cloud that includes other components for the related tasks for video editing. To make things easier, you'll find several options for speeding up your post-production workflow.

The options for Dynamic Link exist between Premiere Pro and Adobe After Effects, but behave a little differently depending upon the options being used. The principal goal with Dynamic Link is to minimize time lost from rendering or exporting.

We'll explore the Dynamic Link workflow throughout this book, but this is a good time to

point out an example that will help you understand how Adobe software components can work together. Using Dynamic Link, you can import After Effects compositions into a Premiere Pro project. Once added, the After Effects compositions will look and behave like any other clip in your project.

If you make changes in After Effects, they'll automatically update in the Premiere Pro project. This sort of time-saving is useful as you begin to set up your projects.

## Importing layered Adobe Photoshop files

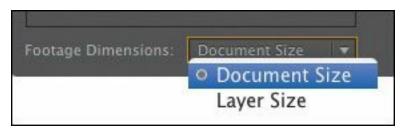
Adobe Photoshop can also create graphics using multiple layers. Layers are similar to tracks in your Timeline and allow for separation between elements. You can import Photoshop layers into Premiere Pro individually to allow for isolation or animation.

- 1. Double-click an empty area of the Project panel to open the Import dialog box.
- 2. Navigate to Lessons/Assets/Graphics.
- **3.** Select the file Theft\_Unexpected\_Layered.psd, and click Import.
- 4. A new dialog box opens, giving you a choice of how to interpret the layered file. There are four ways to import the file, controlled by a pop-up menu in the Import Layered File dialog box:

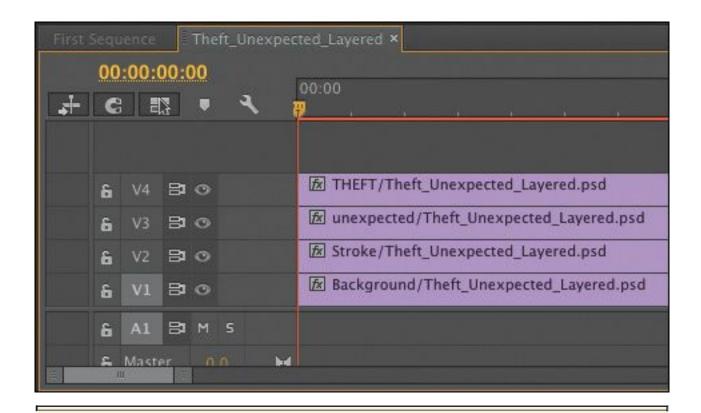


- Merge All Layers: Merges all layers, importing the file into Premiere Pro as a single, flattened clip.
- Merged Layers: Merges only the layers you select into a single, flattened clip.
- Individual Layers: Imports only the layers you select, with each layer becoming a separate clip in a bin.
- Sequence: Imports only the layers you select, each as a single clip. Premiere Pro also then creates a new sequence (with its frame size based on the imported document) containing each layer on a separate track (that matches the original stacking order).

Choosing Sequence or Individual Layers allows you to select one of the following options from the Footage Dimensions menu:



- Document Size: Brings the selected layer in at the size of the original Photoshop document.
- Layer Size: Matches the frame size of the clips to the frame size of their content in the original Photoshop file. Layers that do not fill the entire canvas will be cropped tightly, as transparent areas are removed. They'll also be centered in the frame, losing their original relative positioning.
- **5.** For this exercise, choose Sequence and use the Document Size option. Click OK.
- **6.** Looking in the Project panel, locate the new bin Theft\_Unexpected\_Layered. Double-click it to open it and reveal its contents.
- 7. Double-click the sequence Theft\_Unexpected\_Layered to load it.
- **8.** Examine the sequence in the Timeline panel. Try turning the visibility icons off and on for each track to see how the layers are isolated.



#### **Image tips for Adobe Photoshop files**

Here are a few tips for importing images from Adobe Photoshop:

- Remember that when you import a layered Photoshop document as a sequence, the frame size will be the pixel dimensions of the document.
- If you don't plan to zoom or pan, try to create files with a frame size at least as large as the frame size of the project. Otherwise, you will have to scale up the image, and it will lose some of its sharpness.
- If you do plan to zoom or pan, create images so that the zoomed or panned area has a frame size at least as large as the frame size of the project. For example, if you were working in 1080p and

you wanted to do a 2X zoom, you'd need 3840x2160 pixels.

- Importing large files uses more system memory and can slow down your project.
- Make sure your Photoshop files use 8-bit RGB color. CMYK color is for print workflows, while video editing is RGB or YUV color.

## **Importing Adobe Illustrator files**

Another graphics component in Adobe Creative Suite is Adobe Illustrator. Unlike Adobe Photoshop, which is primarily designed to work with pixel-based (or *raster*) graphics, Adobe Illustrator is a vector application. Vector graphics are mathematical descriptions of shapes rather than drawn pixels. This means you can scale them to any size and they always look sharp.

Vector graphics are typically used for technical illustrations, line art, or complex graphics.

Now you'll import a vector graphic.

- 1. Double-click an empty area of the Project panel to open the Import dialog box.
- 2. Navigate to Lessons/Assets/Graphics.
- 3. Select the file Brightlove\_film\_logo.ai, and click Import. This file type is Adobe Illustrator Artwork. Here's how Premiere Pro deals with Adobe Illustrator files:
  - Like the Photoshop CC file you imported in the previous exercise, this is a layered graphic file.

However, Premiere Pro doesn't give you the option to import Adobe Illustrator files in separate layers. It always merges them.

#### Note

If you right-click Brightlove\_film\_logo.ai in the Project panel, you'll note that one option is Edit Original. If you have Illustrator installed on your computer, selecting Edit Original will open this graphic in Illustrator, ready to be edited. So even though the layers are merged in Premiere Pro, you can return to Adobe Illustrator, edit the original layered file, and save it, and the changes will immediately show up in Premiere Pro.

- Premiere Pro uses a process called rasterization to convert the vector Adobe Illustrator art into the pixel-based image format used by Premiere Pro. This conversion happens during the import stage, so be sure your graphics are large enough in Illustrator before importing them into Premiere Pro.
- Premiere Pro automatically anti-aliases, or smooths the edges of, the Adobe Illustrator art.
- Premiere Pro sets all empty areas as transparent so that clips below those areas in your sequence can show through.

## Importing subfolders

When you import by going to File > Import, you don't have to "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

select individual files. You can also select a whole folder. In fact, if you have already organized your files into folders and subfolders, when you import them, the folders are automatically re-created as bins in Premiere Pro.

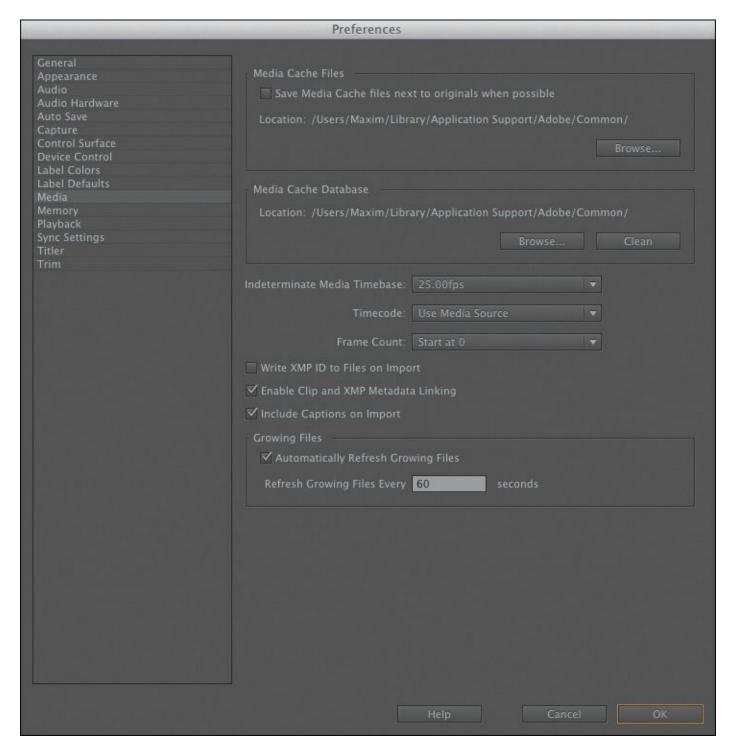
Try this now.

- **1.** Choose File > Import, or press Control+I (Windows) or Command+I (Mac OS).
- 2. Navigate to Lessons/Assets/Stills. Don't browse inside the Stills folder; just select it.
- 3. Click the Import Folder button (Windows) or Import button (Mac OS). Premiere Pro imports the whole folder, including two subfolders containing photos.

#### The media cache

When you import certain video and audio formats, Premiere Pro may need to process and cache a version. This is particularly true for highly compressed formats. Imported audio files are conformed to a new .cfa file. Most MPEG files are indexed to a new .mpgindex file. You'll know that the cache is being built if you see a small progress indicator in the lower-right corner of the screen when importing media.

The benefit of the media cache is that it greatly improves performance for preview playback. It does this by lessening the load on a computer's CPU. You can customize the cache to further improve responsiveness. This media cache database is shared with Adobe Media Encoder, After Effects, Premiere Pro, and Adobe Audition. Each of these applications can read from and write to the same set of cached media files.



To access controls for the cache, choose Edit > Preferences > Media (Windows) or Premiere Pro > Preferences > Media (Mac OS). Here are the relevant options to consider:

• To move the media cache or the media cache database to a new disk, click the respective Browse button, select the desired location, and click OK. In most cases, you should

not move the media cache database after you start to edit.

- You should clean the media cache database on a regular basis, to remove conformed and indexed files. To do so, click the Clean button. Any connected drives will have their cache files removed. It's a good idea to do this after you wrap up projects, because it removes unnecessary previews.
- Select "Save Media Cache files next to originals when possible" in order to keep cache files stored on the same drive as the media. This will distribute the media cache files to the same drive as the media. If you want to keep everything in one central folder, leave this check box unselected. Remember, the faster the drive for the Media Cache, the better the playback performance you're likely to experience in Premiere Pro.

## Tape vs. tapeless workflow

Although tapeless media has become the most common format for video, there are still plenty of video cameras that record to tape. Fortunately, tape is still a relevant source, and it is fully supported by Premiere Pro. To bring footage into a Premiere Pro project, you can capture it.

You capture digital video from a tape to the hard disk before using it in a project. Premiere Pro captures video through a digital port, such as a FireWire or Serial Digital Interface (SDI) port (if you have third-party hardware) installed on your computer. Premiere Pro saves captured footage to

disk as files and imports the files into projects as clips. Premiere Pro features tools that take some of the manual labor out of the capturing process. There are three basic approaches:

- You can capture your entire videotape as one long clip.
- You can log the beginning and end of each clip (each clip's In and Out points) for automated batch capturing.
- You can use the scene detection feature in Premiere Pro to automatically create separate clips based on every time you pressed Record on your camera.

By default, you can use DV and HDV sources with Premiere Pro if your computer has a FireWire port. If you'd like to capture other higher-end professional formats, you'll need to add a third-party capture device. They come in several form factors, including internal cards as well as breakout boxes that connect via FireWire, USB 3.0, and Thunderbolt ports. Premiere Pro CC helps unify support for third-party hardware, which can now often take advantage of Mercury Playback Engine features for previewing effects and video on a connected professional monitor. You can find a detailed list of supported hardware by visiting <a href="https://www.adobe.com/products/premiere/extend.html">www.adobe.com/products/premiere/extend.html</a>.

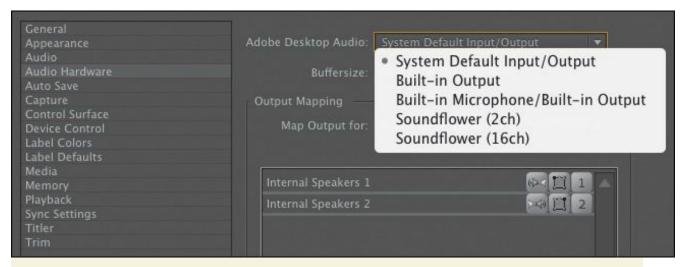
#### Recording a scratch narration track

Many times, you may be working with a video project that has a narration track. While most choose to eventually get these recorded by professionals (or at least recorded in a location quieter than their desks), you can record temporary audio right into Premiere Pro.

This can be helpful if you need something to edit your video to, especially as it will give you a sense of timing for your edits.

Here's how to go about recording a scratch audio track:

- 1. If you're not using a built-in microphone, make sure your external microphone is properly connected to your computer. You may need to see the documentation for your computer or sound card.
- 2. Choose Edit > Preferences > Audio Hardware (Windows) or Premiere Pro > Preferences > Audio Hardware (Mac OS) to properly configure your microphone so Premiere Pro can use it. Use one of the choices from the Default Device pop-up menu, such as System Default Input/Output or Built-in Microphone/Built-in Output, and click OK.



- **3.** Turn down the speakers on your computer to prevent feedback or echo.
- **4.** Open a sequence, and select an empty track in the Timeline.
- 5. Choose Window > Audio Track Mixer (which is likely to be docked in the same frame as your Source Monitor).
- **6.** In the Audio Track Mixer, click the Enable Track For Recording icon (R) for the track you have chosen.



7. Choose the recording input channel from the Track Input Channel menu, at the top of the

Audio Track Mixer.

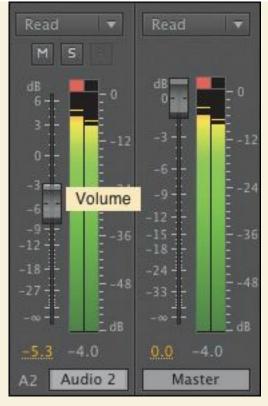
**8.** Click the Record button at the bottom of the Audio Track Mixer to enter Record mode.



9. Click the Play button to start recording.



- 10. If the levels are too loud or too quiet, you can adjust the track volume fader up (louder) or down (quieter) as you record. If you see the red indicators at the top of the VU meters light up, you likely have distortion. A good target to aim for is loud audio registering near 0 dB and quiet audio registering around –18 dB.
- 11. Click the Stop icon to stop recording.
- 12. Locate both instances of the recorded audio. The newly recorded audio appears both on the audio track in the Timeline and as a clip in the Project panel. You can select the clip in the Project panel and rename it or delete it from your project.



Premiere Pro CC allows you to customize the Timeline by adding and removing buttons on the track headers (the far left of the Timeline panel). You can add a Voice-over Record button that begins recording audio immediately. See <u>Lesson 11</u>, "<u>Editing and Mixing Audio</u>," for more information.

## **Review questions**

- 1. Does Premiere Pro CC need to convert P2, XDCAM, or AVCHD footage when it is imported?
- 2. What is one advantage of using the Media Browser rather than the File > Import method to import tapeless media?
- 3. When you're importing a layered Photoshop file, what are the four different ways to import the file?

**4.** Where can media cache files be stored?

#### **Review answers**

- 1. No. Premiere Pro CC can edit P2, XDCAM, and AVCHD natively.
- 2. The Media Browser understands the P2 and XDCAM folder structures and shows you the clips in a visually friendly way.
- 3. You can choose Merge All Layers for a single file, or select the specific layers you want by choosing Merged Layers. If you want layers as individual graphics, choose Individual Layers to choose which ones to import, or choose Sequence to import the selected layers and create a new sequence from them.
- 4. You can store media cache files in a specified location or automatically on the same drive as the original files (when possible).

# 4. Organizing Media

#### **Lesson overview**

In this lesson, you'll learn about the following:

- Using the Project panel
- Staying organized with bins
- Adding metadata to your clips
- Using essential playback controls
- Interpreting footage
- Making changes to your clips



This lesson will take approximately 50 minutes.



Once you have some video and sound assets in your project, you'll want to begin looking through your footage and adding clips to a sequence. Before you do, it's well worth spending a little time organizing the assets you have. Doing so can save you hours of hunting for things later.

## **Getting started**

When you have lots of clips in your project, imported from several different media types, it can be a challenge to stay on top of everything and always find that magic shot when you need it.

In this lesson, you'll learn how to organize your clips using the Project panel, which is the heart of your project. You'll create special folders, called *bins*, to divide your clips into categories. You'll also learn about adding important metadata and labels to your clips.

You'll begin by getting to know the Project panel and organizing your clips.

Before you begin, make sure you're using the default Editing workspace.

- **1.** Choose Window > Workspace > Editing.
- 2. Choose Window > Workspace > Reset Current Workspace.
- 3. Click Yes in the Reset Workspace dialog box.
- 4. For this lesson, you'll use the project file you used in Lesson 3. Continue to work with the project file from the previous lesson, or open it from your hard drive.
- **5.** Choose File > Save As.
- 6. Rename the file Lesson 04.prproj.
- 7. Choose a preferred location on your hard drive, and click Save to save the project.

If you do not have the previous lesson file, you can open the file Lesson 04.prproj from the Lessons/Lesson 04 folder.

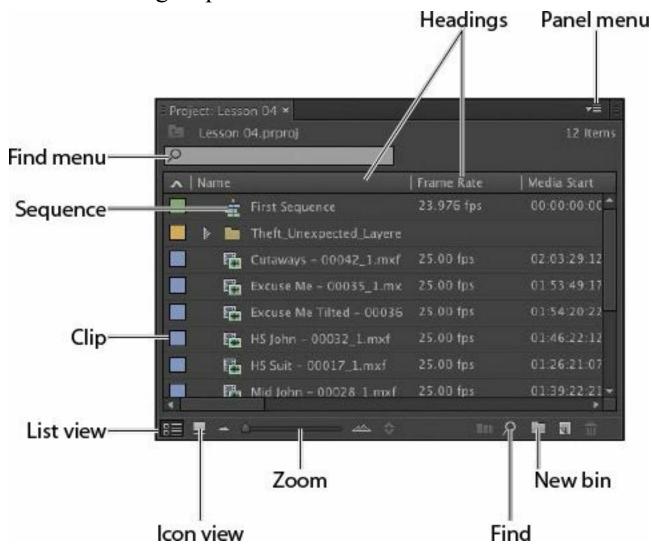
## The Project panel

Anything you import into your Adobe Premiere Pro CC project will appear in the Project panel. As well as giving you excellent tools for browsing your clips and working with their metadata, the Project panel has special folders, called *bins*, that you can "\*\*\*\*\*ebook converter DEMO - www.ebook-

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use to organize everything.

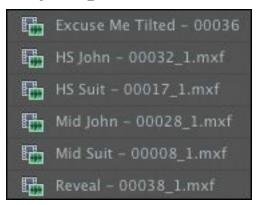
Everything that appears in a sequence must be in the Project panel. If you delete a clip in the Project panel that is already used in a sequence, the clip will automatically be removed from the sequence. Premiere Pro will warn you if deleting a clip will affect an existing sequence.



As well as acting as the repository for all of your clips, the Project panel gives you important options for interpreting media. All of your footage will have a frame rate (frames per second, or fps) and a pixel aspect ratio (pixel shape), for example. You may want to change these settings for creative reasons.

You could, for example, interpret video recorded at 60fps video as 30fps to achieve a 50% slow-motion effect. You might also receive a video file that has the wrong pixel aspect ratio setting.

Premiere Pro uses metadata associated with footage to know how to play it back. If you want to change the clip metadata, you can do so in the Project panel.



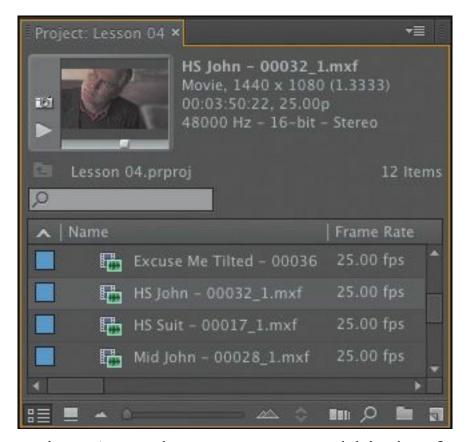
## **Customizing the Project panel**

It's likely that you'll want to resize the Project panel from time to time. You'll alternate between looking at your clips as a list or as thumbnail icons. Sometimes it's quicker to resize the panel than to scroll over to see more information.

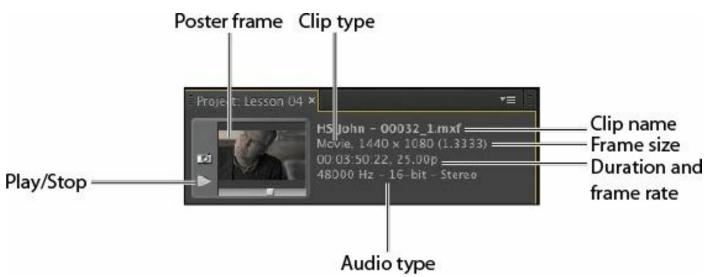
The default Editing workspace is designed to keep the interface as clean as possible so you can focus on your creative work. Part of the Project panel that's hidden from view, called the Preview Area, gives additional information about your clips.

Let's take a look at it:

- 1. Click the panel menu for the Project panel (at the top right).
- 2. Choose Preview Area.



The Preview Area shows you several kinds of useful information about a clip when you select it in the Project panel, including the frame size, pixel aspect ratio, and duration.



If it is not already selected, click the List View button (
) at the bottom left of the Project panel. In this view you'll find a lot of information about each clip in the

Project panel, but you need to scroll horizontally to see it. The Preview Area gives you a mix of information about clips when you need it.

- 3. Click the panel menu for the Project panel.
- 4. Choose Preview Area to hide it.

# Tip 🕟

There's a quick way to toggle between seeing the Project panel in a frame and seeing it full-screen: Hover your mouse cursor over the panel and press the `(grave) key. You can do this with any panel in Premiere Pro.

## Finding assets in the Project panel

Working with clips is a little like working with pieces of paper at your desk. If you have just one or two clips, it's easy. But when you have one or two hundred, you need a system.

One way you can help make things smoother during the edit is to take a little time to organize your clips at the beginning. If you name your clips during capture or after importing them, it can help enormously. Even if you don't give each clip its own name during capture from tape, you can give a name to each type of shot and let Premiere Pro add 01, 02, 03, and so on (see Lesson 3, "Importing Media").

1. Click the Name heading at the top of the Project panel. The items in the Project panel are displayed in alphabetical order or reverse alphabetical order each time you click the Name heading again.

If you're searching for several clips with particular features—such as a duration or a frame size—it can be helpful to change the order in which the headings are displayed.

#### Tip 🛚

You can scroll the Project panel view up and down using the scroll wheel on your mouse.

- 2. Scroll to the right until you can see the Media Duration heading in the Project panel. This shows the total duration of each clip's media file.
- 3. Click the Media Duration heading. Premiere Pro now displays the clips in order of media duration. Notice the direction arrow on the Media Duration heading. Each time you click the heading, the direction arrow toggles between showing clips in duration order or reverse duration order.

Video Duration A

Video Duration V



#### Note

When you scroll to the right in the Project panel, Premiere Pro always maintains the clip names on the left so you know which clips you're seeing information about.

4. Drag the Media Duration heading to the left until you see a blue divider between the Frame heading and the Name

heading. When you release the mouse button, the Media Duration heading will be repositioned right next to the Name heading.

Name Frame Rate | Media Start | Media End | Media Duration 🔥

The blue divider shows where you will drop the heading.

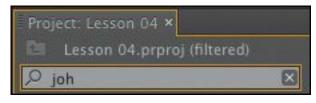


You may need to drag a divider to expand the width of a column before you can see its arrow.

#### Find box

Premiere Pro has built-in search tools to help you find your media. Even if you're using non-descriptive original clip names assigned in-camera, you can search for clips based on a number of factors, such as frame size or file type.

At the top of the Project panel, you can type in the Find box to display only clips with names or metadata that match the text you enter. This is a quick way of locating a clip if you remember its name (or even part of its name). Clips that don't match the text you enter are hidden and clips that do match are revealed, even if they are inside a bin.





Graphic and photo files like Photoshop PSD, JPEG, or Illustrator AI files import with a default

frame duration you set in Preferences > General > Still Image Default Duration.

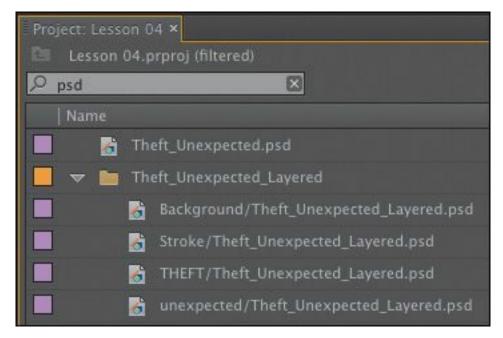
#### Try this now.

- 1. Click in the Find box, and type the letters **joh**.
  - Premiere Pro displays only clips with the letters "joh" in the name or in the metadata. Notice that the name of the project is displayed above the text entry box, along with "(filtered)."
- 2. Click the X on the right of the Find box to clear your search.

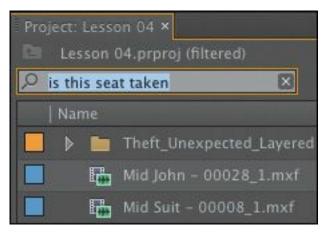
#### Lesson 04.prproj (filtered)

**3.** Type the letters **psd** in the box.

Premiere Pro displays only clips that have the letters "psd" in their name or metadata, along with all the project bins. In this case, it's the Theft\_Unexpected title you imported earlier as both a flattened image and a layered image—these are both Photoshop PSD files. Using the Find box in this way, you can search for particular types of files.



Searches can include clip dialogue if speech analysis has been performed (see "Organizing media with content analysis" later in this lesson).



Normally, it isn't necessary to choose anything in this menu, because the filtering works well when using the All option if you type selections carefully.

Be sure to click the X on the right of the Find box to clear your filter when you have found the clip(s) you want.



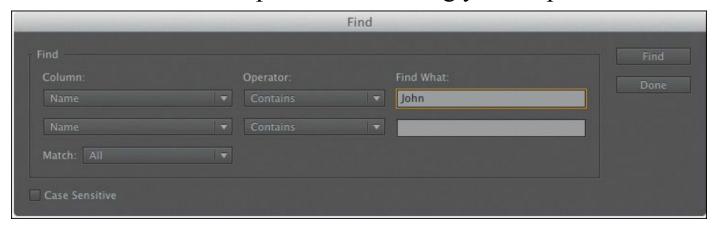
The folders you create inside the Project panel are

called bins. The name "bin" is taken from film editing. The Project panel is also effectively a bin, since it can contain clips and it functions exactly like any other bin.

#### **Advanced Find**

Premiere Pro also has an advanced Find option. To learn about it, you'll import a couple more clips.

- 1. Using any of the methods described in <u>Lesson 3</u>, import these items:
  - Seattle\_Skyline.mov from the Assets/Video and Audio Files/General Views folder.
  - Under Basket.MOV from the Assets/Video and Audio Files/Basketball folder.
- 2. At the bottom of the Project panel, click the Find button (
  Decomposed 2. Decompose



You can perform two searches at once with the advanced Find panel. You can choose to display clips that match *both* search criteria or *either* search criterion. For example, you could do either of the following:

 Search for a clip with the words dog AND boat in its name.

or

- Search for a clip with the word dog OR boat in its name. Then choose a few options:
  - Column: Selects from the available headings in the Project panel. When you click Find, Premiere Pro will search using only the heading you select.
  - Operator: Gives you a set of standard search options. Use this menu to choose whether you want to find a clip that contains, matches exactly, begins with, or ends with whatever you search for.
  - Match: Choose All to find a clip with both your first and second search text. Choose Any to find a clip with either your first or your second search text.
  - Case Sensitive: Tells Premiere Pro whether you want your search to exactly match the upper- and lowercase letters you enter.
  - Find What: Type your search text here. You can add up to two sets of search text.

When you click Find, Premiere Pro highlights a clip that matches your search criteria. Click Find again, and Premiere Pro highlights the next clip that matches your search criteria. Click Done to exit the Find dialog box.

## Working with bins

Bins allow you to organize clips by dividing them into groups. Just like folders on your hard drive, you can have multiple bins "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

inside other bins, creating a folder structure as comprehensive as your project requires.



There's an important difference between bins and folders on your hard drive: Bins exist only inside your Premiere Pro project file to organize your media within your project. You won't find individual folders representing project bins on your hard drive.

# **Creating bins**

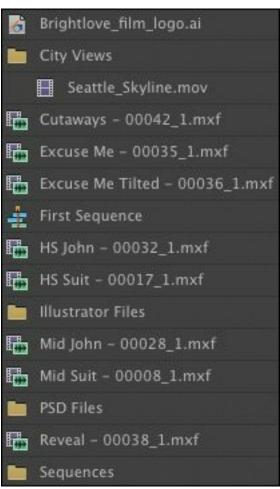
Let's create a bin.

- 1. Click the New Bin button ( ) at the bottom of the Project panel.
  - Premiere Pro creates a new bin and automatically highlights the name, ready for you to rename it. It's a good habit to name bins as soon as you create them.
- 2. We have already imported some clips from a film, so let's give them a bin. Name the new bin **Theft Unexpected**.
- 3. You can also create a bin using the File menu. Let's do this now: Make sure the Project panel is active and choose

File > New > Bin.

- 4. Name the new bin **PSD Files**.
- 5. You can also make a new bin by right-clicking a blank area in the Project panel and choosing New Bin. Try this now.
- 6. Name the new bin Illustrator Files.

One of the quickest and easiest ways to create a new bin for clips you already have in your project is to drag and drop the clips onto the New Bin button at the bottom of the Project panel.



- 7. Drag and drop the clip Seattle\_Skyline.mov onto the New Bin button.
- **8.** Name the newly created bin **City Views**.

- 9. Make sure the Project panel is active but no existing bins are selected. Press the keyboard shortcut Control+B (Windows) or Command+B (Mac OS) to make another bin.
- 10. Name the bin Sequences.

If your Project panel is set to List view, bins are displayed in name order among the clips.

#### Note

It can be difficult to find a blank part of the Project panel to click when it is full of clips. Try clicking just to the left of the icons, inside the panel.

## Managing media in bins

Now that we have some bins, let's put them to use. As you move clips into bins, use the disclosure triangles to hide their contents and tidy up the view.

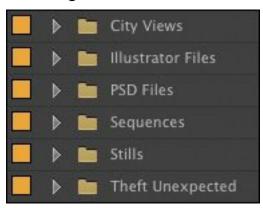
- 1. Drag the clip Brightlove\_film\_logo.ai into the Illustrator Files bin.
- 2. Drag Theft\_Unexpected.psd into the PSD Files bin.

#### Note

When you import an Adobe Photoshop file with multiple layers and choose to import as a sequence, Premiere Pro automatically creates a bin for the individual layers and their sequence.

- **3.** Drag the Theft\_Unexpected\_Layered bin (created automatically when you imported the layered PSD file as individual layers) into the PSD Files bin. Bins inside bins work just like folders inside folders.
- 4. Drag the clip Under Basket.MOV into the City Views bin. You may need to resize the panel or switch it to full-screen to see both the clip and the bin.
- 5. Drag the sequence called First Sequence into the Sequences bin.
- **6.** Drag all of the remaining clips into the Theft Unexpected bin.

You should now have a nicely organized Project panel, with each kind of clip in its own bin.



Notice that you can also copy and paste clips to make extra copies if this suits your organizational system. You have a Photoshop document that might be useful for the Theft Unexpected content. Let's make an extra copy.

- 7. Click the disclosure triangle for the PSD Files bin to display the contents.
- **8.** Right-click the Theft\_Unexpected.psd clip, and choose Copy.
- **9.** Click the disclosure triangle for the Theft Unexpected bin "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

to display the contents.

10. Right-click the Theft Unexpected bin, and choose Paste. Premiere Pro places a copy of the clip in the Theft Unexpected bin.

## Tip 🕟

You can make Shift-click and Control-click (Windows) or Command-click (Mac OS) selections in the Project panel, just as you can with files on your hard drive.

## Finding your media files

If you're not sure where a media file is on your hard drive, right-click the clip in the Project panel and choose Reveal in Explorer (Windows) or Reveal in Finder (Mac OS).

Premiere Pro will open the folder on your hard drive that contains the media file and highlight it. This can be useful if you are working with media files stored on multiple hard drives or if you have renamed your clips in Premiere Pro.

#### Note

When you make copies of clips, you are not making copies of the media files they are linked to. You can make as many copies as you like of a

clip inside your Premiere Pro project. Those copies will all link to the same original media file.

# Changing bin views

Though there is a distinction between the Project panel and bins, they have the same controls and viewing options. For all intents and purposes, you can treat the Project panel as a bin; many Premiere Pro editors use the terms *bin* and *Project panel* interchangeably.

Bins have two views. You choose between them by clicking the List View or Icon View button at the bottom left of the Project panel.

- List view: Displays your clips and bins as a list, with a significant amount of metadata displayed. You can scroll through the metadata, and use it to sort clips by clicking on column headers.
- Icon view: Displays your clips and bins as thumbnails you can rearrange and play back.

The Project panel has a Zoom control, which changes the size of the clip icons or thumbnails.

1. Double-click the Theft Unexpected bin to open it in its own panel.

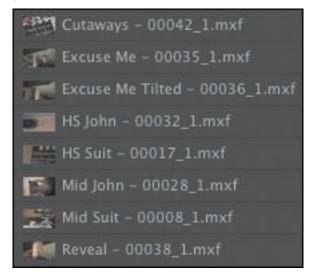


- 2. Click the Icon View button on the Theft Unexpected bin to display thumbnails for the clips.
- **3.** Try adjusting the Zoom control.

Premiere Pro can display large thumbnails to make browsing and selecting your clips easier.

You can also apply various kinds of sorting to clip thumbnails in Icon view by clicking the Sort Icons ( ) menu.

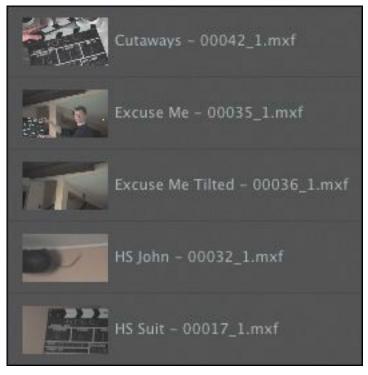
- 4. Switch to List view.
- 5. Try adjusting the Zoom control for the bin.



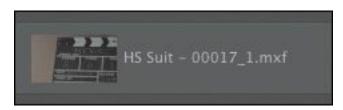
When you're in List view, it doesn't make that much sense to zoom, unless you turn on the display of thumbnails in this view.

- 6. Click the panel menu, and choose Thumbnails.

  Premiere Pro now displays thumbnails in List view, as well as in Icon view.
- 7. Try adjusting the Zoom control.

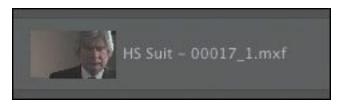


The clip thumbnails show the first frame of the media. In some clips, the first frame will not be particularly useful. Look at the clip HS Suit, for example. The thumbnail shows a clapperboard, but it would be useful to see the character.



- **8.** Click the panel menu, and choose Preview Area.
- **9.** Select the clip HS Suit so that information about it is displayed in the Preview Area.
- 10. The Thumbnail Viewer in the Preview Area allows you to play your clip, drag through it, and set a new poster frame. Drag through the clip using the Thumbnail Viewer until you see the character.
- 11. Click the Poster Frame button on the Thumbnail Viewer.

Premiere Pro shows your newly selected frame as the thumbnail for this clip.



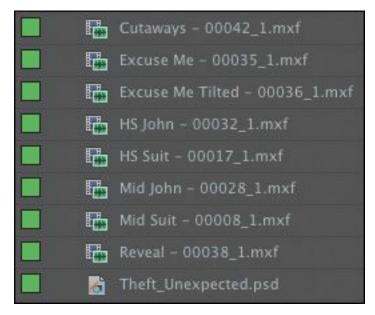
- 12. Use the panel menu to turn off thumbnails in List view.
- 13. Use the panel menu to hide the Preview Area.

## **Assigning labels**

Every item in the Project panel has a label color. In List view, the Label column shows the label color for every clip. When you add clips to a sequence, they are displayed in the Timeline panel with this label color.

Now you'll change the color for the title so that it matches the other clips in this bin.

- 1. Right-click Theft\_Unexpected.psd and choose Label > Iris.
- 2. Make sure the floating Theft Unexpected bin is active by clicking once somewhere inside the panel.
- **3.** Press Control+A (Windows) or Command+A (Mac OS) to select every clip in the bin.
- 4. You can change label colors for multiple clips in a single step. Right-click any of the clips in the bin, and choose Label > Forest.



5. Change the Theft Unexpected video clips back to Iris, and the Theft\_Unexpected.psd clip back to Lavender (be sure to change both copies). If you have these clips visible in two bin panels, you'll see them update in both views.

#### Note

You can change the label color for multiple clips by choosing them first.

#### Changing the available label colors

Eight available colors can be assigned as labels to items in your project. There are also eight types of items that label colors can be assigned to, and this means there aren't any spare label colors.

If you choose Edit > Preferences > Label Colors (Windows) or Premiere Pro > Preferences > Label Colors (Mac OS), you'll see the list of colors, each with a color swatch you can click to change the

color to something else.

If you select Label Defaults in the preferences, you can choose different default labels for each kind of item in your project.

# **Changing names**

Because clips in your project are separate from the media files they link to, you can rename items inside Premiere Pro, and the names of your original media files on the hard drive are left untouched. This makes renaming clips safe to do.

- 1. Right-click either instance of the clip Theft\_Unexpected.psd, and choose Rename.
- 2. Change the name to TU Title BW.
- 3. Right-click the newly renamed clip, TU Title BW, and choose Reveal in Explorer (Windows) or Reveal in Finder (Mac OS).

The file is displayed. Notice that the original filename has not changed. It's helpful to be clear about the relationship between your original media files and the clips inside Premiere Pro, because it explains much of the way the application works.



## Note

When you change the name of a clip in Premiere Pro, the new name is stored in the project file. Two project files could easily have different

# **Customizing bins**

The Project panel displays a limited amount of clip information headings by default. You can easily add or remove headings. Depending on the clips you have and the types of metadata you are working with, you might want to display or hide different headings.

- 1. If it's not open already, open the Theft Unexpected bin.
- 2. Click the panel menu, and choose Metadata Display.



The Metadata Display panel allows you to choose any kind of metadata to use as a heading in the List view of the Project panel (and any bins). All you have to do is select the check box for the kind of information you would like to be included.

- 3. Click the disclosure triangle for Premiere Pro Project Metadata to show those options.
- 4. Select the Media Type check box.
- 5. Click OK.

You'll notice that Media Type is now added as a heading for the Theft Unexpected bin but not for any other bins. To make this kind of change to every bin in one step, use the panel menu on the Project panel rather than on an individual bin.

Some of the headings are for information only, while others can be edited directly in the bin. The Scene heading, for example, allows you to add a scene number for each clip.

Notice that if you enter a number for a scene and then press the Enter key, Premiere Pro activates the next scene box. This way, you can use the keyboard to quickly enter information about several clips, jumping from one box to the next.

Status	Scene
Online	5
Online	4
Online	5
Online	1
Online	1

The Scene heading is a special one. It gives you information about what the scene clips are intended for; it also gives Premiere Pro information about which scene from an original script should be used for automatic analysis of the audio (see "Organizing media with content analysis" later in this lesson).

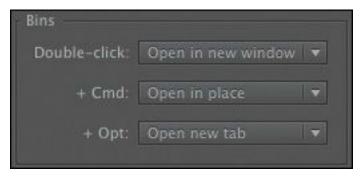
# Having multiple bins open at once

When you double-click on a bin, by default Premiere Pro opens the bin in a floating panel. Every bin panel behaves in the same way, with the same options, buttons, and settings.

You can have as many bins open as you like.

Bins open in their own panel when you double-click them because of the default preferences, which you can change if you prefer.

To change the options, choose Edit > Preferences > General (Windows) or Premiere Pro > Preferences > General (Mac OS).



The options let you choose what will happen when you double-click, double-click with the Control (Windows) or Command (Mac OS) key, or double-click with the Alt (Windows) or Option (Mac OS) key.

# Organizing media with content analysis

Using metadata can help you stay organized and share information about your clips. The challenge with metadata is in finding efficient ways to create it and add it to your clips.

To make this process much easier, Premiere Pro can analyze your media and automatically create metadata based on the content. The words that are spoken can be added as time-based text, making it easier to identify useful shots and find content.

# Using the Adobe Story panel

The Speech to Text function converts spoken words into text associated with your clips. The text is linked in time to when the words are spoken, so you can easily locate the part of a clip you want.

The accuracy of the analysis depends on several factors. You can help Premiere Pro correctly identify the words that are spoken by providing a script or transcript.

The built-in Adobe Story panel gives you access to your Adobe Story projects, allowing you to drag and drop script scenes onto clips. When you analyze the clips, the script dialogue is automatically used to improve the accuracy of speech analysis.

To access the Adobe Story panel, go to the Window menu and log in, and you'll have access to your scripts.

Dragging scenes from the Adobe Story panel is one method of associating text with clips. Another method is to browse for a text file on your local storage drive.



# Speech analysis

To initiate the Speech to Text function, do the following:

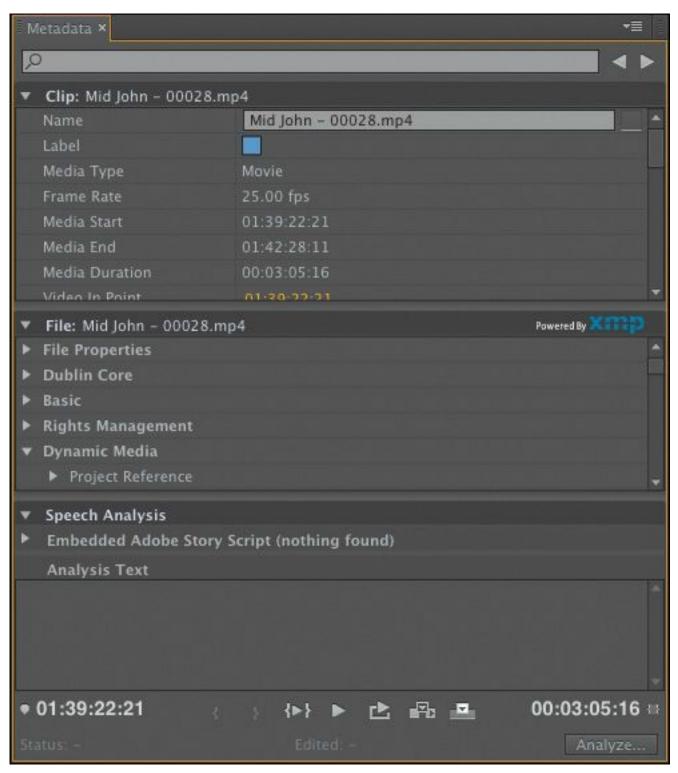
- **1.** Import the video file Mid John 00028.mp4 from the Lessons/Assets/Speech folder.
- 2. Scroll along in the Project panel until you can see the Scene heading. If necessary, add the scene number 1 for the new Mid John clip.



3. Double-click the new Mid John clip. If the Theft Unexpected bin obscures the Source Monitor, you can close the bin by clicking the X on the bin's panel tab.

- Premiere Pro displays the clip in the Source Monitor.
- 4. Click the tab for the Metadata panel to display it. In the default Editing workspace, you'll find that the Metadata panel shares a frame with the Source Monitor. If it isn't there, click the Window menu and choose Metadata.

  The Metadata panel shows you many different kinds of metadata about clips in your project. To view the Metadata panel at the same time as the Source Monitor, drag it onto the Program Monitor using the tab. Then click the Source Monitor tab to bring it into view.



5. Click the Analyze button at the bottom right of the Metadata panel.

## o Note

You may need to resize the panel to see the "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

The Analyze Content panel gives you options for how the automatic analysis will take place. You simply need to decide whether you want Premiere Pro to detect faces, identify speech, or both, and then choose the language and the quality settings.

To improve the speech detection accuracy, we're going to attach a script file.

- 6. Click the Reference Script menu, and choose Add.
- 7. Browse to the Lessons/Assets/Speech folder, and open Theft Unexpected.astx. Premiere Pro displays the Import Script dialog box so you can confirm you have chosen the right script. Check the box to confirm that the script text exactly matches the recorded dialogue. This forces Premiere Pro to use only the words in the original script (useful for interview transcriptions). Click OK.

## Note

A limited number of file formats can be imported as a reference for Speech Analysis. The file you're importing for this exercise is exported from Adobe Story for this purpose but you can also use .txt files.

**8.** Select Identify Speakers in the Analyze Content panel. This tells Premiere Pro to separate dialogue from different voices.

9. Leave the other settings at their defaults, and click OK. Premiere Pro starts Adobe Media Encoder, which conducts the analysis in the background. This allows you to carry on working in your project while the analysis happens. When the analysis is complete, a text description of the spoken words is displayed in the Metadata panel.

Adobe Media Encoder starts the analysis automatically and plays a completion sound when it has finished. You can set off multiple clips for analysis, and Adobe Media Encoder will automatically add them to a queue. You can quit Adobe Media Encoder when it has completed its tasks.

#### Note

There's a zip file in the Lessons/Assets/Speech folder with an original copy of the video clip, so you can try this again if you'd like. After you've used the Premiere Pro Speech to Text feature, the original file has the additional metadata added, which will be available whenever you import it to a project.

# Monitoring footage

The greater part of video editing is spent watching clips and making creative choices about them. It's important to feel comfortable browsing media.

Premiere Pro has multiple ways of performing common tasks such as playing video clips. You can use the keyboard, click

buttons with your mouse, or use an external device like a jog/shuttle controller.

You can also use a feature called *hover scrub* to quickly and easily view the contents of your clips right in the bin, and in the Media Browser.

- 1. Double-click the Theft Unexpected bin to open it.
- 2. Click the Icon View button at the lower-left corner of the bin.

## Tip 🕟

Adding a scene number for your clips helps Premiere Pro identify the part of the script that the dialogue relates to. This is particularly useful for longer scripts.

3. Drag your mouse, without clicking, across any of the images in the bin.

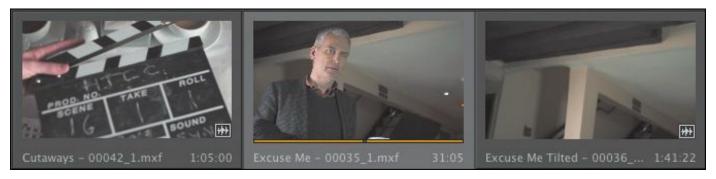
Premiere Pro displays the contents of the clip as you drag. The left edge of the thumbnail represents the beginning of the clip, and the right edge represents the end. In this way, the width of the thumbnail represents the whole clip.



4. Select a clip by clicking it once. Hover scrubbing is now turned off, and a mini scroll bar appears at the bottom of the thumbnail. Try dragging through the clip using the scroll bar.

When a clip is selected, Premiere Pro uses the J, K, and L keys on your keyboard to perform playback too, just like the Media Browser.

- J: Play backward
- K: Pause
- L: Play forward
- **5.** Select a clip, and use the J, K, and L keys to play the thumbnail. Be sure to click the clip only once. If you double-click, the clip will open in the Source Monitor.

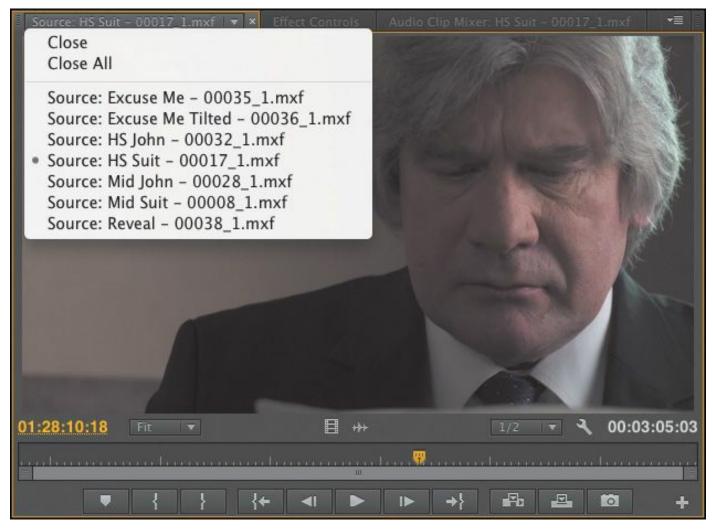


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## Tip 👅

If you press the J or L key multiple times, Premiere Pro will play the video clips at multiple speeds.

When you double-click a clip, not only does Premiere Pro display the clip in the Source Monitor, but it also adds it to a list of recent clips.



- **6.** Double-click to open four or five clips from the Theft Unexpected bin.
- 7. Click the Recent Items menu, on the tab at the top of the

Source Monitor, to browse between your recent clips.

8. Click the Zoom menu at the bottom of the Source Monitor. By default, this is set to Fit, which means Premiere Pro will display the whole frame, regardless of the original size. Change the setting to 100%.



These clips are high-resolution, and they are probably much bigger than your Source Monitor. You're likely to have scroll bars at the bottom and on the right of your Source Monitor now, so you can view different parts of the image.

## Tip 🕟

Notice that you have the option to close a single clip or close all clips, clearing the menu and the monitor. Some editors like to clear the menu and then open several clips that are part of a scene by selecting them all in the bin and dragging them into the Source Monitor together. They can then use the Recent Items menu to browse only the clips from that selection.

The benefit of viewing with Zoom set to 100% is that you see every pixel of the original video, which is useful for checking the quality.

9. Set the Zoom menu back to Fit.

#### Playback resolution

If you have an older or slower processor, or are working with very large frame sizes like Ultra High-Definition (4K or above), your computer may struggle to play back high-quality video clips. To work with a wide variety of computer hardware configurations, from powerful desktop workstations to lightweight portable laptops, Premiere Pro can lower the playback resolution to make playback smoother.

You can switch the playback resolution as often as you like, using the Select Playback Resolution menu on the Source Monitor and Program Monitor panels.



Some lower resolutions are available only when working with particular media types.

#### **Timecode information**

At the bottom left of the Source Monitor, a timecode display shows the current position of the playhead in hours, minutes, seconds, and frames (00:00:00:00).

For example, 00:15:10:01 would be 0 hours, 15 minutes, 10 seconds, and 1 frame.

Note that this is based on the original timecode for the clip, which probably does not begin at 00:00:00:00.

At the bottom right of the Source Monitor, a timecode display shows the duration of your clip. By default, this shows the whole clip duration, but later you'll be adding special marks to make a partial selection.

#### Safe margins

Old-style CRT monitors crop the edges of the picture to achieve "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

a clean edge. If you're producing video for a CRT monitor, click the Settings (wrench icon) button at the bottom of the Source Monitor and choose Safe Margins. Premiere Prodisplays white outlines over the image.

The outer box is the action-safe zone. Aim to keep important action inside this box so that when the picture is displayed, edge cropping does not hide what is going on.

The inner box is the title-safe zone. Keep titles and graphics inside this box so that even on a badly calibrated display, your audience will be able to read the words.



Premiere Pro also has advanced overlay options that can be configured to display useful information in the Source Monitor and Program Monitor. To enable or disable overlays, go to the Settings (wrench icon) button and choose Overlays.



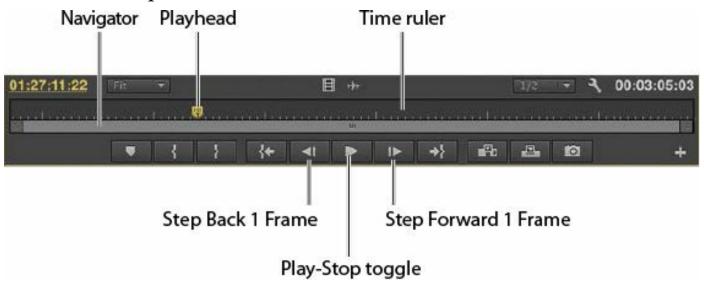
You can access the settings for the overlays and safe margins by clicking the Settings button and choosing Overlay Settings > Settings.

Click the Settings button at the bottom of the Source Monitor and choose Safe Margins to turn them off.

## **Essential playback controls**

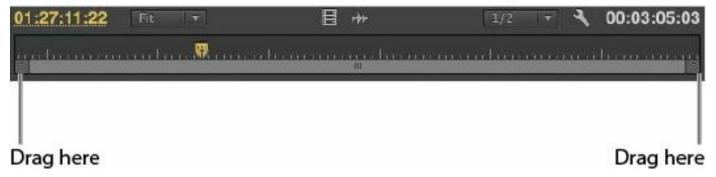
Let's look at the playback controls.

1. Double-click the shot Excuse Me in the Theft Unexpected bin to open it in the Source Monitor.



2. At the bottom of the Source Monitor, there's a yellow playhead marker. Drag it along the bottom of the panel to view different parts of the clip. You can also click wherever you want the playhead to go, and it will jump to that spot.

3. Below the Time Ruler and the playhead, there's a scroll bar that doubles as a Zoom control. Drag one end of the scroll bar to zoom in on the clip navigator.



- 4. Click the Play-Stop button to play the clip. Click it again to stop playback. You can also use the spacebar to play and stop playback.
- 5. Click the Step Back 1 Frame and Step Forward 1 Frame buttons to move through the clip one frame at a time. You can also use the Left Arrow and Right Arrow keys on your keyboard.
- **6.** Try using the J, K, and L keys to play your clip.

# **Customizing the monitors**

To customize your monitors, click the Settings button ( ) on the Source Monitor.

This menu gives you several display options for your Source Monitor (the Program Monitor has a similar menu). You can choose to view waveforms and the Vectorscope to analyze your video.

For now, you just need to know how to display regular video. Make sure Composite Video is selected in this menu.

You can change the buttons displayed at the bottom of the Source Monitor and Program Monitor.

- 1. Click the Button Editor button at the bottom right of the Source Monitor.
  - A special set of buttons appears on a floating panel.
- 2. Drag the Loop button ( ) from the floating panel to a spot to the right of the Play button on the Source Monitor, and click OK.
- **3.** Double-click the Excuse Me clip in the Theft Unexpected bin to open it in the Source Monitor if it isn't there already.
- 4. Click the Loop button to enable it, and then play the video using the spacebar or the Play button on the Source Monitor. Stop the playback when you've seen enough. With Loop turned on, Premiere Pro continuously repeats playback or a clip or sequence.
- 5. Click the Play button to play the clip. Click it again to stop playback. You can also use the spacebar to play and stop playback.
- 6. Click the Step Back and Step Forward buttons to move through the clip one frame at a time. You can also use the Left Arrow and Right Arrow keys on your keyboard.
- 7. Use the J, K, and L keys to play your clip.

# Modifying clips

Premiere Pro uses metadata associated with clips to know how to play them back. Occasionally, this metadata will be wrong, and you'll need to tell Premiere Pro how to interpret a clip.

You can change the interpretation of clips for one file or multiple files in a single step. All clips you have selected are "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

affected by changes to interpretation.

### Adjusting audio channels

Premiere Pro has advanced audio management features. You can create complex sound mixes and selectively target output audio channels with original clip audio. You can produce mono, stereo, 5.1, and even 32-channel sequences with precise control over the routing of audio channels.

If you're just starting out, you'll probably want to produce sequences mastered in stereo using stereo clips. In this case, the default settings are most likely exactly what you need.

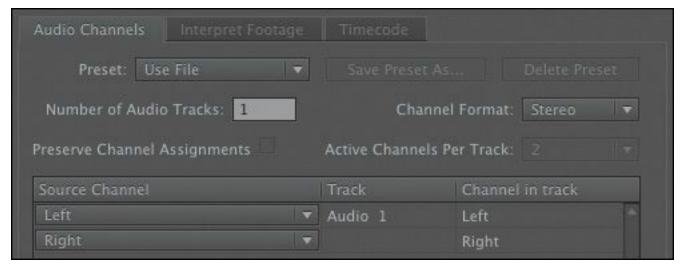
When recording audio with a professional camera, it's common to have one microphone record onto one audio channel and a different microphone record onto another audio channel. These are the same audio channels that would be used for regular stereo audio, but they now contain completely separate sound.

Your camera adds metadata to the audio to tell Premiere Pro whether the sound is meant to be mono (separate audio channels) or stereo (channel 1 audio and channel 2 audio combined to produce the complete stereo sound).

You can tell Premiere Pro how to interpret audio channels when new media files are imported by going to Edit > Preferences > Audio (Windows) or Premiere Pro > Preferences > Audio (Mac OS).

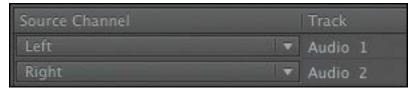
If the setting was wrong when you imported your clips, it's easy to tell Premiere Pro how to correctly interpret the audio channels.

1. Right-click the Reveal clip in the Theft Unexpected bin, and choose Modify > Audio Channels.



2. This clip is set to use the file's metadata to identify the channel format for the audio. Click the Preset menu, and change it to Mono.

Premiere Pro switches the Channel Format menu to Mono. You'll see that the Left and Right source channels are now linked to tracks Audio 1 and Audio 2. This means that when you add the clip to a sequence, each audio channel will go on a separate track, allowing you to work on them independently.



3. Click OK.

### Merging clips

It's quite common for video to be recorded on a camera with relatively low-quality audio, while high-quality sound is recorded on a separate device. When working this way, you will want to combine the high-quality audio with the video by merging them.

The most important factor when merging video and audio files in this way is synchronization. You will either manually define a sync point—like a clapperboard mark—or allow Premiere Pro to sync your clips automatically based on their timecode information or audio.

If you choose to sync clips using audio, Premiere Pro will analyze both the in-camera audio and the separately captured sound and match them up.

- If you don't have matching audio in the clips you wish to merge, you can manually add a marker. If you're adding a mark, place it on a clear sync point like a clapperboard.
- Select the camera clip and the separate audio clip. Rightclick either item, and choose Merge Clips.
- Under Synchronize Point, choose your sync point, and click OK.

A new clip is created that combines the video and the "good" audio in a single item.

### **Interpreting footage**

For Premiere Pro to interpret a clip correctly, it needs to know the frame rate for the video, the pixel aspect ratio (the shape of the pixels), and, if your clip is interlaced, the order in which to display the fields. Premiere Pro can find out this information from the file's metadata, but you can change the interpretation easily.

1. Import RED Video.R3D from the Lessons/Assets/Video and Audio Files/RED folder. Double-click the clip to open it in the Source Monitor. It's full anamorphic widescreen, which is a little too wide for our project.

- 2. Right-click the clip in the bin, and choose Modify > Interpret Footage.
- 3. Right now, the clip is set to use the pixel aspect ratio setting from the file: Anamorphic 2:1. This means the pixels are twice as wide as they are tall.
- **4.** Use the Conform To menu to change the Pixel Aspect Ratio setting to DVCPRO HD (1.5). Then click OK.

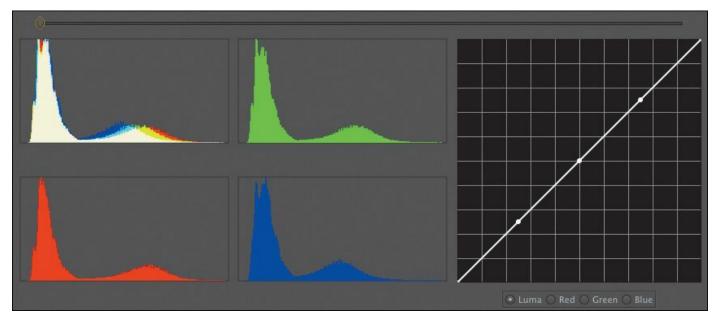
From now on, Premiere Pro will interpret the clip as having pixels that are 1.5 times wider than they are tall. This reshapes the picture to make it standard 16:9 widescreen.

This won't always work—in fact, it often introduces unwanted distortion—but it can provide a quick fix for mismatched media (a common problem for news editors).

### Working with raw files

Premiere Pro has special settings for R3D files created by RED cameras, and for ARI files created by ARRI cameras. These files are similar to the Camera Raw format used by professional DSLR still cameras. Raw files always have a layer of interpretation applied to them in order to view them. You can change the interpretation at any time without impacting playback performance. This means you can make changes, for example, to the colors in a shot without requiring any extra processing power. You could achieve a similar result using a special effect, but your computer would have to do more work to play the clip.

1. Right-click the RED Video.R3D clip in the Project panel, and choose Source Settings.



The RED R3D Source Settings dialog box appears, giving you access to the original interpretation controls for the clip. In many ways, this is a color correction tool, with automatic white balance and individual adjustments for the red, green, and blue values.

- 2. On the right, you'll see a series of individual controls for adjusting the picture. Scroll down to the end of the list, where you'll find Gain settings. Since this is a RED clip, increase the Red gain to about 1.5. You can drag the slider control, drag the orange number, or click and type over the number.
- **3.** Click OK, and take another look at the clip in the Source Monitor.

The picture has updated. If you had already edited this clip into a sequence, it would update inside the sequence too.

For more information about working with RED media, go to <a href="https://www.adobe.com/products/premiere/extend">www.adobe.com/products/premiere/extend</a>.

The ARRI AMIRA camera can associate color interpretation "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

settings (known as a lookup table, or LUT) with the media files as it creates them. Premiere Pro recognizes these LUTs and applies them as a Lumetri Look Master clip effect (see <u>Chapter 13</u>, "<u>Adding Video Effects</u>," for more information about Master clip effects).

# **Review questions**

- 1. How do you change the List view headings displayed in the Project panel?
- 2. How can you quickly filter the display of clips in the Project panel to make finding a clip easier?
- 3. How do you create a new bin?
- 4. If you change the name of a clip in the Project panel, does it change the name of the media file it links to on your hard drive?
- 5. What keys can you use to play back video and sound clips?
- **6.** How can you change the way clip audio channels are interpreted?

#### **Review answers**

- 1. Click the panel menu for the Project panel, and choose Metadata Display. Select the check box for any heading you would like to appear.
- 2. Click the Find box, and start typing the name of the clip you are looking for. Premiere Pro hides any clips that don't match and displays those that do.
- 3. Click the New Bin button at the bottom of the Project

- panel. Or, go to the File menu and choose New > Bin. Or, right-click a blank area in the Project panel and choose New Bin. Or, press Ctrl+B (Windows) or Command+B (Mac OS). You can also drag and drop clips onto the New Bin button on the Project panel.
- 4. No, you can duplicate, rename, or delete clips in your Project panel, and nothing will happen to your original media files. Premiere Pro is a nondestructive editor and will not modify your original files.
- 5. The spacebar plays and stops. J, K, and L can be used like a shuttle controller to play backward and forward, and the arrow keys can be used to move one frame backward or one frame forward.
- **6.** In the Project panel, right-click the clip you want to change, and choose Modify > Audio Channels. Choose the correct option (usually by selecting a preset), and click OK.

# 5. Essentials of Video Editing

#### **Lesson overview**

In this lesson, you'll learn about the following:

- Working with clips in the Source Monitor
- Creating sequences
- Using essential editing commands
- Understanding tracks



This lesson will take approximately 45 minutes.

This lesson will teach you the core editing skills you will use again and again when creating sequences with Adobe Premiere Pro CC.



Editing is much more than choosing shots. You'll choose your cuts precisely, placing clips in sequences at exactly the right point in time and on the track you want (to create layered effects), adding new clips to existing sequences, and removing old ones.

### **Getting started**

No matter how you like to approach video editing, there are a few simple techniques you'll employ time and again. You'll make partial selections of your clips and selectively place them in your sequence. There are several ways of doing this in Premiere Pro.

Before you begin, make sure you're using the default Editing workspace.

- **1.** Choose Window > Workspace > Editing.
- 2. Choose Window > Workspace > Reset Current Workspace.
- 3. Click Yes in the Reset Workspace dialog box. For this lesson, you'll use the project file you used in Lesson 4.
- **4.** Continue to work with the project file from the previous lesson, or open it from your hard drive.
- **5.** Choose File > Save As.
- 6. Rename the file Lesson 05.prproj.
- 7. Choose a preferred location on your hard drive, and click Save to save the project.

If you do not have the previous lesson file, you can open the Lesson 05.prproj file from the Lesson 05 folder.

You'll begin by learning more about the Source Monitor and how to mark your clips to get them ready to be added to a sequence. Then you'll learn about the Timeline panel, where you'll work on your sequences.

# **Using the Source Monitor**

The Source Monitor is the main place you'll go when you want to check your assets before including them in a sequence.

When you view video clips in the Source Monitor, you watch them in their original format. They will play back with their frame rate, frame size, field order, audio sample rate, and audio bit depth exactly as they were recorded.

When you add a clip to a sequence, Premiere Pro conforms it to the sequence settings. This means the frame rate and audio type might be adjusted so that all the clips in the sequence play back the same way.



As well as being a viewer for multiple file types, the Source Monitor provides important additional functions. You can use two special kinds of markers, called In points and Out points, to select part of a clip for inclusion in a sequence. You can also add comments in the form of markers that you can refer to later or use to remind yourself about important facts relating to a clip. You might include a note about part of a shot you don't

have permission to use, for example.

### Loading a clip

To load a clip, do the following:

- 1. Browse to the Theft Unexpected bin. With the default preferences, double-click the bin in the Project panel while holding the Control (Windows) or Command (Mac OS) key to open the bin inside the existing panel. To navigate back to the Project panel contents, click the Navigate Up button ( ).
- 2. Double-click a video clip, or drag and drop a clip into the Source Monitor.
  - Either way, the result is the same: Premiere Pro displays the clip in the Source Monitor, ready for you to watch it and add markers.
- 3. Position your mouse pointer so that it is over the Source Monitor, and press the `(grave) key. The panel fills the Premiere Pro application frame, giving you a larger view of your video clip. Press the `(grave) key again to restore the Source Monitor to its original size.

### Tip 👅

Notice that the active panel has an orange outline. It's important to know which panel is active, because menus and keyboard shortcuts sometimes give different results depending on your current selection. For example, if you press Shift+' (grave), the currently selected frame will toggle

to full-screen, regardless of the location of your mouse.

#### Viewing video on a second monitor

If you have a second monitor connected to your computer, Premiere Pro can use it to display full-screen video.

Choose Edit > Preferences > Playback (Windows) or Premiere Pro > Preferences > Playback (Mac OS), and select the check box for the monitor you would like to use for full-screen playback.

You also have the option of playing video via a DV device if you have one connected, or via third-party hardware.



### Loading multiple clips

Next you'll create a selection of clips to work with in the Source Monitor.

1. Click the Recent Items menu at the top left of the Source Monitor, and choose Close All.

Close All

Source: Mid John - 00028.mp4
Source: Music - Sonoma-Bass.wav
Source: Music - Sonoma-Clarinet.wav
Source: Music - Sonoma Stereo Mix.wav
Source: 0111KS.mov
Source: 0137SZ.mov

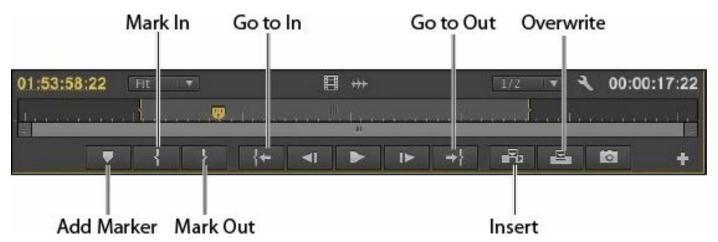
Source: Brightlove\_film logo.ai

- 2. Click the List View button on the Theft Unexpected bin, and make sure the clips are displayed in alphabetical order by clicking the Name heading.
- 3. Select the first clip, Cutaways, and then hold down the Shift key and click the clip Mid John 00028. This makes a selection of multiple clips in the bin.
- 4. Drag the clips from the bin to the Source Monitor.

  Now just the clips selected will be displayed in the Source Monitor Recent Items menu. You can use the menu to choose which clip to view.

#### **Source Monitor controls**

As well as playback controls, there are some important additional buttons in the Source Monitor.



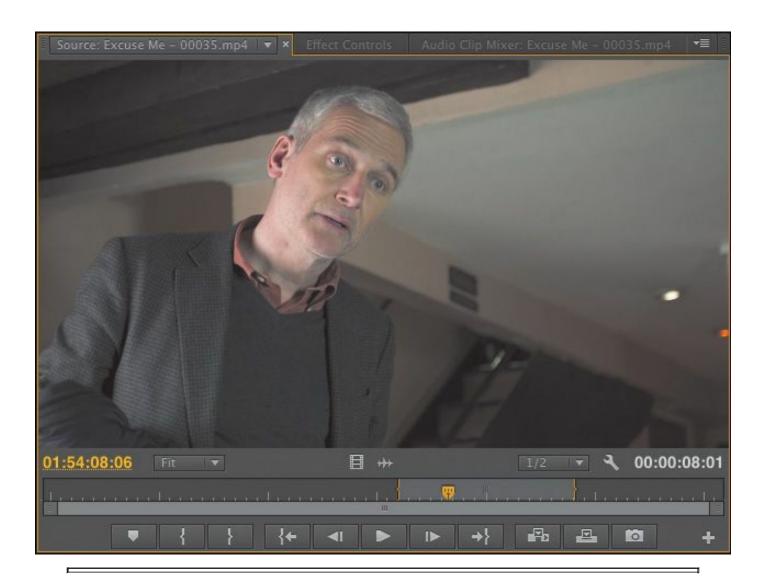
- Add Marker: Adds a marker to the clip at the location of the playhead. Markers can provide a simple visual reference or store comments.
- Mark In: Sets the beginning of the part of the clip you intend to use in a sequence. You can have only one In point. A new In point will automatically replace the existing one.
- Mark Out: Sets the end of the part of the clip you intend to use in a sequence. You can have only one Out point. A new Out point will automatically replace the existing one.
- Go to In: Moves the playhead to the clip In point.
- Go to Out: Moves the playhead to the clip Out point.
- Insert: Adds the clip to the sequence currently displayed in the Timeline panel using the insert edit method (see "Essential editing commands" later in this lesson).
- Overwrite: Adds the clip to the sequence currently displayed in the Timeline panel using the overwrite edit method (see "<u>Essential editing commands</u>" later in this lesson).

# Selecting a range in a clip

You will usually want to include only a specific part of a clip in a sequence. Much of an editor's time is spent watching video clips and choosing not only which ones to use but also which parts to use. Making a selection is easy.

- 1. Use the Recent Items menu to select the clip Excuse Me 00035. It's a shot of John nervously asking if he can sit down.
- 2. Play the clip to get an idea of the action.

  John walks onscreen about halfway through the shot but takes a moment to speak.
- **3.** Position the playhead just before John enters the shot or just before he speaks. Around 01:54:06:00, he pauses briefly and speaks. Note that the timecode reference is based on the original recording and does not start at 00:00:00:00.
- **4.** Click the Mark In button. You can also press the I key on your keyboard.
  - Premiere Pro highlights the section of the clip that is selected. You have excluded the first part of the clip, but you'll be able to reclaim this part later if you need to do so—that's the wonderful freedom of nonlinear editing.
- **5.** Position the playhead just as John sits down. Around 01:54:14:00 is perfect.
- 6. Press the O key on your keyboard to add an Out point.



#### Note

In and Out points added to clips are persistent. That is, they will still be present if you close and open the clip again. Now you'll add In and Out points for the following two clips as well.

- 7. For the HS Suit clip, add an In point just after John's line, about a quarter of the way into the shot (01:27:00:16).
- **8.** Add an Out point just as the screen goes dark (01:27:02:14).



- **9.** For the Mid John clip, add an In point just as John sits down (01:39:52:00).
- **10.** Add an Out point after he has a sip of tea (01:40:04:00).



#### Note

Some editors prefer to go through all available clips, adding In and Out points as required, before building a sequence. Some editors prefer to add In and Out points only as they use each clip. Your preference may depend on the kind of project you are working on.

# Tip 🕟

To help you find your way around your footage,

Premiere Pro can display timecode numbers on the time ruler. Toggle this option on and off by clicking the Settings button ( ) and choosing Time Ruler Numbers.

#### **Editing from the Project panel**

Because In and Out marks remain active in your project until you change them, you can add clips to a sequence directly from the Project panel, as well as from the Source Monitor. If you have already looked at all of your clips and chosen the parts you want, this can be a quick way to create a rough version of a sequence.

Premiere Pro CC applies the same track controls when you're editing from the Project panel as it does when you're editing from the Source Monitor, so the experience is very similar—and a few clicks quicker. While it's faster to work this way, there's also a value in having one last look at your clips in the Source Monitor before you add them to a sequence. The more familiarity you have with your media, the better.

### **Tip**

If your keyboard has a separate numerical keypad, you can use it to enter timecode directly. For example, if you type 700, Premiere Pro will

position the playhead at 00:00:07:00. There's no need to enter the leading zeros. Be sure to use the numerical keypad, on the right on your keyboard, and not the numbers along the top of your keyboard (these have a different use).

#### Tip 🏲

The tool tip that pops up if you hover your mouse over a button tells you the keyboard shortcut key in brackets after the name of the button.

### **Creating subclips**

If you have a long clip, there might be several parts you would like to use in your sequence. It can be useful to separate the parts so they can be organized prior to building your sequence.

This is exactly what subclips were created for. Subclips are partial copies of clips. They are commonly used when working with very long clips, especially when there are several parts of the same original clip that might be used in a sequence.

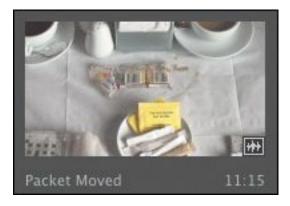
Subclips have a few notable characteristics:

- They can be organized in bins, just like regular clips, though they have a different icon ( ) in the Project panel List view.
- They have a limited duration based on the In and Out points used to create them, which makes it easier to view their contents when compared with viewing potentially much longer original clips.

- They share the same media files as the original clip they're based on.
- They can be edited to change their contents and even converted into a copy of the original full-length clip.

#### Let's make a subclip:

- 1. Double-click the Cutaways clip in the Theft Unexpected bin to view it in the Source Monitor.
- 2. While viewing the contents of the Theft Unexpected bin, click the New Bin button at the bottom of the panel to create a new bin. The new bin will appear inside the existing Theft Unexpected bin.
- 3. Name the bin **Subclips**, and open it to see the contents. Hold the Control key (Windows) or Command (Mac OS) key while double-clicking the bin to have it open in the same frame, rather than floating as an independent frame.
- 4. Choose a section of the clip to make into a subclip by marking the clip with an In point and an Out point. The moment slightly more than halfway through when the packet is removed and replaced might work well.
- **5.** To create a subclip from the selection between your In and Out points, do one of the following:
  - Right-click inside the picture display of the Source Monitor, and choose Make Subclip. Name the subclip **Packet Moved**, and click OK.
  - Click the Clip menu, and choose Make Subclip. Name the subclip **Packet Moved**, and click OK.



The new subclip is added to the Subclips bin, with the duration you specified with your In and Out marks.

#### Using a keyboard shortcut to make subclips

If you expect to make lots of subclips, there's a keyboard shortcut you can use. This is a good idea because keyboard shortcuts are often faster than using the mouse.

To use the keyboard, simply mark your clip as usual with an In mark and Out mark, and press Control+U (Windows) or Command+U (Mac OS).

Enter the subclip name, and click OK.

#### Note

If you select Restrict Trims To Subclip Boundaries, you won't be able to access the parts of your clip that are outside your selection when viewing the subclip. This might be exactly what you want (and you can change this setting by right-clicking the subclip and choosing Edit Subclip).

### **Navigating the Timeline**

If the Project panel is the heart of your project, then the Timeline panel is the canvas. The Timeline is where you will add clips to your sequences, make editorial changes to them, add visual and audio special effects, mix soundtracks, and add titles and graphics.

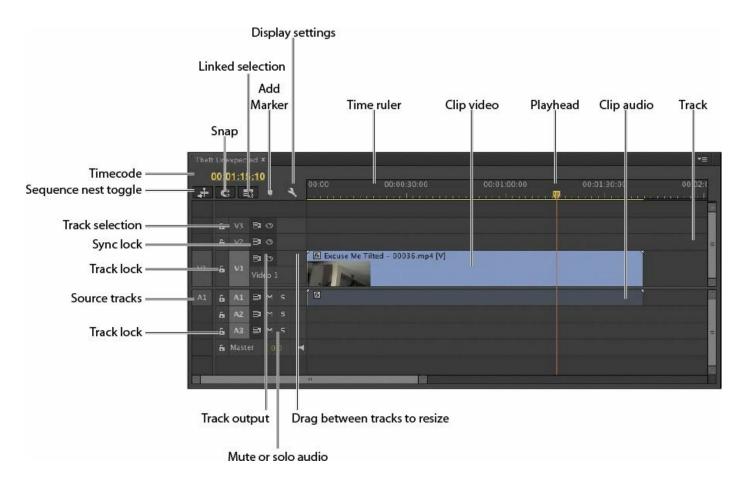
Here are a few facts about the Timeline panel:

- You view and edit sequences in the Timeline panel.
- You can open multiple sequences at the same time, and each will be displayed in its own Timeline panel.
- The terms sequence and *Timeline* are often used interchangeably, as in "in the sequence" or "on the Timeline."
- You can have up to 99 video tracks. Upper video tracks play "in front" of lower ones, so you would normally place graphics clips on tracks above background video clips.
- You can have up to 99 audio tracks that all play at the same time to create an audio mix. Audio tracks can be mono (1 channel), stereo (2 channels), 5.1 (6 channels), or adaptive—with up to 32 channels.
- You can change the height of Timeline tracks to gain access to additional controls and thumbnails on your video clips.
- Each track has a set of controls, shown on a track header, that change the way it functions.
- Time always moves from left to right on the Timeline.

- The Program Monitor shows you the contents of the currently displayed sequence at the position of the playhead.
- For most operations on the Timeline, you will use the standard Selection tool. However, there are several other tools that serve different purposes, and each tool has a keyboard shortcut. If in doubt, press the V key. This is the keyboard shortcut for the Selection tool.



• You can zoom in and out of the Timeline using the + and – keys at the top of your keyboard to get a better view of your clips. If you press the \ key, Premiere Pro toggles the zoom level between your current setting and showing your whole sequence. You can also double-click the navigator at the bottom of the Timeline panel to view the whole timeline.



### What is a sequence?

A *sequence* is a series of clips that play, one after another—sometimes with multiple blended layers, and often with special effects, titles, and audio—making a complete film.

You can have as many sequences as you like in a project. Sequences are stored in the Project panel, just like clips. They have their own icon.



Let's make a new sequence for our Theft Unexpected drama:

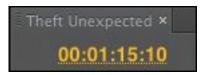
1. In the Theft Unexpected bin, drag the clip Excuse Me (not Excuse Me Tilted) onto the New Item button at the bottom of the panel.

#### Note

You may need to click the Navigate Up button to see the Theft Unexpected bin.

This is a shortcut to make a sequence that perfectly matches your media. Premiere Pro creates a new sequence, which shares the name of the clip you selected.

2. The sequence is highlighted in the bin, and it would be a good idea to rename it right away. Right-click the sequence in the bin, and choose Rename. Name the sequence **Theft Unexpected**.



The sequence is automatically open, and it contains the clip you used to create it. This works for our purposes, but if you had used a random clip to perform this shortcut, you might choose to select it in the sequence and delete it now (by pressing the Delete key).

Close the sequence by clicking the *x* on its name tab in the Timeline panel.

#### **Conforming**

Sequences have a frame rate, a frame size, and an audio mastering format (mono or stereo, for example). They *conform*, or adjust, any clips you add to match these settings.

You can choose whether or not clips should be scaled visually to match your sequence frame size.

For example, for a sequence with a frame size of 1920 x 1080 (regular high-definition) and a video clip that is 4096 x 2160 (Cinema 4K), you might decide to automatically scale the high-resolution clip down to match your sequence resolution or leave it as it is, viewing only part of the picture through the reduced "window" of the sequence.

When clips are scaled, the vertical and horizontal sizes are scaled equally to keep the original aspect ratio. This means that if a clip has a different aspect ratio from your sequence, it may not completely fill the frame of your sequence when it is scaled. For example, if your clip had a 4:3 aspect ratio and you added it, scaled, to a 16:9 sequence, you'd see gaps at the sides.

Using Motion controls (see <u>Lesson 9</u>, "<u>Putting Clips in Motion</u>"), you can animate which part of the picture you see, creating a dynamic pan-and-scan effect inside the picture.

# Opening a sequence in the Timeline panel

To open a sequence in the Timeline panel, do one of the following:

- Double-click the sequence in a bin.
- Right-click the sequence in a bin, and choose Open in Timeline.

Open the Theft Unexpected sequence now, and take a look at it in the Timeline panel.

#### Tip 🕟

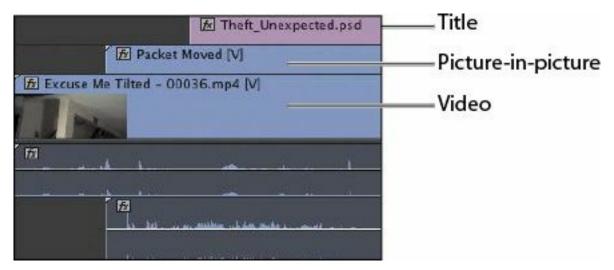
You can also drag a sequence into the Source Monitor to use it as if it were a clip. Be careful not to drag a sequence into the Timeline panel to open it, because this will add it to your current sequence as a clip.

### **Understanding tracks**

Much in the way that railway tracks keep trains in line, sequences have video and audio tracks that constrain the positions of clips you add to them. The simplest form of sequence would have just one video track and perhaps one audio track. You add clips to tracks, one after another, from left to right, and they play in the order you place them.

Sequences can have additional video and audio tracks. These become layers of video and additional audio channels. Since the higher video tracks appear in front of lower ones, you can use them to creatively produce layered compositions.

You might use an upper video track to add titles to a sequence or to blend multiple layers of video using special effects.



You might use multiple audio tracks to create a complete audio composition for your sequence, with original source dialogue, music, spot audio effects like gunshots or fireworks, atmospheric sound, and voice-over.



Adobe Premiere Pro CC has multiple scrolling options, giving you different results depending on the location of your cursor:

- If you hover your mouse over tracks, you can scroll left and right; trackpad gestures work too.
- If you hover your mouse over video or audio tracks and hold the Control key (Windows) or the Command key (Mac OS) while scrolling, you'll scroll just that type of track up and down.
- If you hover your mouse over a track header and scroll, you'll increase or decrease the height of the track.
- If you hover your mouse over a video or audio track header and scroll while holding the Shift key, you'll

increase or decrease the height of all tracks of that type.

### Tip 🏲

If you hold the Control key (Windows) or Command key (Mac OS) while you scroll to adjust track height, you'll have finer control.

# **Targeting tracks**

Track headers are more than nameplates. They also act as enable/disable buttons for the tracks when making selections to remove parts of a sequence, or when rendering effects.

To the left of the track headers, you'll see a set of buttons that represent the available tracks for the clip currently displayed in the Source Monitor or selected in the Project panel. These are the source track indicators, and they are numbered, just like the Timeline tracks. This helps keep things clear when performing more complex edits.

If you drag and drop a clip into a sequence, the source track indicators are ignored. However, when you use the keyboard or the buttons on the Source Monitor to add a clip to a sequence, source track indicators become very important.

In the following example, the position of the source track indicators means a clip with one video track and one audio track would be added to the Video 1 and Audio 1 tracks on the Timeline.



In the following example, the source track indicators have been moved by dragging and dropping. In this example, the clip would be added to the Video 2 and Audio 2 tracks on the Timeline.



The source track indicators enable or disable the video and audio channels of your source clips. You can make advanced edits by carefully positioning the source track indicators and selecting which tracks you have on or off.

The difference in button appearance is subtle, but the impact on the edit is significant.





Source V1 off

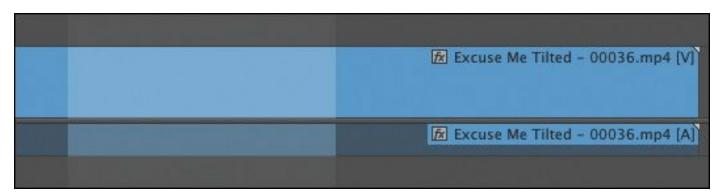
Source V1 on

### In and Out points

The In and Out points used in the Source Monitor define the part of a clip you will add to a sequence.

The In and Out points you use on the Timeline have two primary purposes:

- To tell Premiere Pro where a clip should be positioned when it is added to a sequence.
- To select parts of a sequence you would like to remove. You can make precise selections to remove whole clips, or parts of clips, from multiple tracks by using In and Out marks in combination with the track headers controls.



The light region indicates the selected part of the sequence.

#### **Setting In and Out points**

Adding In and Out points on the Timeline is almost the same as adding them in the Source Monitor. One key difference is that, unlike the controls in the Source Monitor, the controls on the "\*\*\*\*\*ebook converter DEMO - www.ebook-

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Program Monitor also apply to the Timeline.

To add an In point to the Timeline at the current position of the playhead, make sure the Timeline panel or Program Monitor is active, and then press the I key or click the Mark In button on the Program Monitor.

To add an Out point to the Timeline at the current position of the playhead, make sure the Timeline panel or program monitor is active, and then press the O key or click the Mark Out button on the Program Monitor.

#### Tip 👅

There's also a shortcut to adding In and Out points to your Timeline based on the duration of a clip (or a group of clips) in your sequence. To try it, select a clip segment in your sequence and press /.

#### **Clearing In and Out points**

If you open a clip that already has In and Out points and you would like to remove them (or there are In and Out points on the Timeline that are cluttering up your view), it's easy to remove them. It's the same technique to remove In and Out points on the Timeline, in the Program Monitor, and in the Source Monitor.

- 1. On the Timeline, select the Excuse Me clip by clicking it.
- 2. Press the / key. This adds an In mark to the Timeline at the start of the clip (on the left) and an Out mark at the end of the clip (on the right). Both are added to the time

ruler at the top of the Timeline panel.

3. Right-click the time ruler at the top of the Timeline panel, and take a look at the menu options.

Clear In Clear Out Clear In and Out

Select the option you need in this menu, or use one of the following keyboard shortcuts:

- Control+Shift+I (Windows) Alt+I (Mac OS): Remove In point (Clear In)
- Control+Shift+O (Windows) Alt+O (Mac OS): Remove Out point (Clear Out)
- Control+Shift+X (Windows) Alt+X (Mac OS): Remove In point and Out point (Clear In and Out)
- **4.** That last option is particularly useful. It's easy to remember and quickly removes both points. Try it now to remove the marks you added.

### Using time rulers

The time rulers at the bottom of the Source Monitor and Program Monitor and at the top of the Timeline all serve the same purpose: They allow you to navigate through your clips or your sequences in time.

Time always goes from left to right, and the location of the playhead gives you a visual reference in relation to your clips.

Click the Timeline time ruler now, and drag left and right. The playhead moves to follow your mouse. As you drag across the Excuse Me clip, you see the contents of the clip in the Program "\*\*\*\*\*ebook converter DEMO - www.ebook-

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Monitor. Dragging through your content in this way is called *scrubbing*.

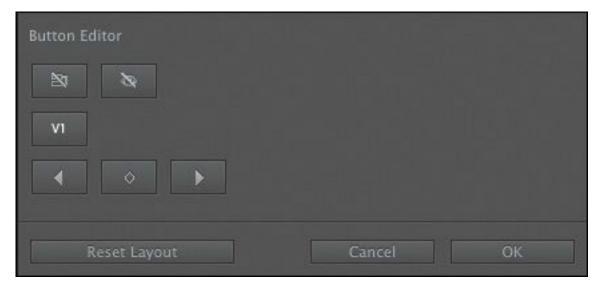
Notice that the Source Monitor, Program Monitor, and Timeline all have scroll bars at the bottom of the panel. You can zoom the time ruler by hovering over the bar and using your mouse wheel to scroll. Once you have zoomed in, you can navigate the time ruler by clicking and dragging the bar.



The Navigator on the Program Monitor

# Customizing track headers

There are options for choosing the controls available on the track headers. To access these options, right-click a video or audio track header and choose Customize.



The video track Button Editor



The audio track Button Editor

To find out the name of an available button, hover your mouse over it to see the tool tip. Some of the buttons will be familiar to you already. The others will be explained in later lessons.

You add a button to a track header by dragging and dropping it from the Button Editor onto a track header. You remove a button from a track header by dragging it away.

Feel free to experiment with this feature now, and when you have finished, click the Reset Layout button on the Button Editor to return the track header to the default options. Finally, click Cancel to leave the Button Editor.

### **Essential editing commands**

Whether you use the mouse to drag and drop a clip into a sequence, use a button on the Source Monitor, or use a keyboard shortcut, you'll apply one of two kinds of edits: an insert edit or an overwrite edit.

When you add a clip to a sequence that has existing clips at the

location at which you want to position the new clip, these two choices—insert and overwrite—will give markedly different results.

#### Overwrite edit

First you'll use an overwrite edit to add a reaction shot to John's request for a chair.

- 1. Open the shot HS Suit in the Source Monitor. You added In and Out marks to this clip already.
- 2. You'll need to set up the Timeline carefully for this edit. Position the Timeline playhead just after John makes his request. Around 00:00:04:00 is perfect.

Unless an In or Out mark has been added to the Timeline, the playhead is used to position new clips when editing with the keyboard or onscreen buttons. When you use the mouse to drag and drop a clip into a sequence, the location of the playhead is ignored.



- 3. Though the new clip has an audio track, you don't need it. You'll keep the audio on the Timeline. Click the source track selection button A1 to turn it off. The difference is subtle, but the button turns a darker gray when it's switched off.
- **4.** Check that your track headers look like the following example (check the track enable/disable buttons carefully).



5. Click the Overwrite button on the Source Monitor.

The clip is added to the Timeline, but only on the Video 1 track. Once again, the timing might not be perfect, but you're building a nice dialogue scene!



By default, when you drag and drop a clip into a sequence using the mouse, you perform an overwrite edit. You can perform an insert edit by holding down the Control (Windows) or Command (Mac OS) key while you drag and drop.

#### o Note

The terms *shot* and clip are often used interchangeably.

#### Note

The sequence does not get any longer when you perform an overwrite edit.

#### **Insert edit**

To perform an insert edit in the Premiere Pro Timeline, do the following:

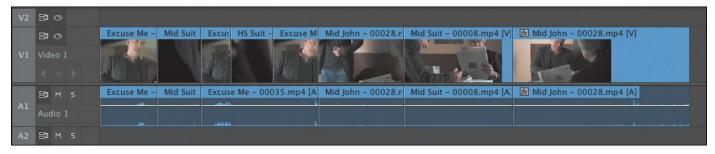
- 1. Drag the Timeline playhead so that it is positioned over the Excuse Me clip just after John says, "Excuse me" (around 00:00:02:16).
- 2. Open the clip Mid Suit in the Source Monitor, add an In mark at 01:15:46:00, and add an Out mark at 01:15:48:00. This is actually from a different part of the action, but it will work well as a reaction shot.
- 3. Check that your Timeline has the source track indicators lined up as in the following example.



**4.** Click the Insert button on the Source Monitor.

Congratulations! You have completed an insert edit. The clip Excuse Me, already in the sequence, has been split, with the part after the playhead moved later to accommodate the new clip.

- 5. Position the playhead at the beginning of the sequence, and play through your edit. You can use the Home key on your keyboard to jump to the beginning, you can drag the playhead with the mouse, or you can press the Up Arrow key to jump the playhead to earlier edits (the Down Arrow key jumps to later edits).
- **6.** Open the clip Mid John in the Source Monitor. This clip already has In and Out points.
- 7. Position the Timeline playhead at the end of the sequence—on the end of the Excuse Me clip. You can hold the Shift key to have the playhead snap to the ends of clips.
- **8.** Click either the Insert or Overwrite button on the Source Monitor. Since the Timeline playhead is at the end of the sequence, there are no clips in the way, and it makes no difference which kind of edit you perform.
  - Now you'll insert one more clip.
- **9.** Position the Timeline playhead just before John takes a sip of tea, around 00:00:14:00.
- 10. Open the clip Mid Suit in the Source Monitor, and use In and Out points to choose a part you think would go well between John sitting down and his first sip of tea. An In mark around 01:15:55:00 and an Out mark around 01:16:00:00 might work well.
- 11. Edit the clip into the sequence using an insert edit.



The timing of the edit may not be perfect, but that's OK. The beauty of working with a nonlinear editing system like Premiere Pro is that you can change your mind about the timing later. The important thing, to begin with, is to get the order of the clips right.

#### Note

If you have an In point or an Out point on the Timeline, Premiere Pro will use it in preference to the location of the playhead when performing an edit.

#### Three-point editing

To perform an edit, Premiere Pro needs to know the clip duration you'll work with, in both the Source Monitor and the Timeline panel. The duration of one can be worked out from the other, so you need only three points (or marks), not four. For example, if you choose four seconds of a clip in the Source Monitor, Premiere Pro automatically knows it will take four seconds of time in your sequence.

When you made your last edit, Premiere Pro aligned the In point from the clip (the start of the clip) with the In point on the Timeline (the playhead).

#### Note

When you use an insert edit, it makes your sequence longer. More specifically, the clips already on the selected track will move later in the sequence to make room for the new clip.

Even though you didn't manually add an In mark to the Timeline, you're still performing a three-point edit, with the duration calculated from the Source Monitor clip.

If you add an In point to the Timeline, Premiere Pro uses that to place the new clip, ignoring the playhead.

You can achieve a similar result by adding an Out point to the Timeline instead of an In point. In this case, Premiere Pro will align the Out point of the clip with the Out point on the Timeline when you perform the edit. You might choose to do this if you have a piece of timed action, like a door closing at the end of a clip in the sequence, and your new clip needs to line up in time with it.

#### ote 🁝 Note

You can also edit clips into a sequence by dragging from the Project panel or Source Monitor into the Program Monitor. Hold the Control key (Windows) or Command key (Mac OS) to perform an insert edit.

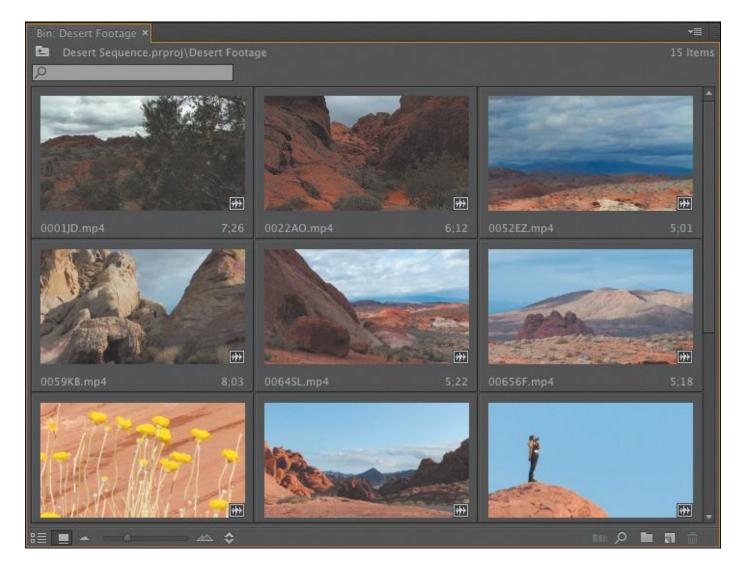
### What happens if you use four points?

You can use four points to make an edit. If the clip duration you select matches the sequence duration, the edit will take place as usual. If they are different, Premiere Pro will invite you to choose what you would like to happen. You can stretch or compress the playback speed of the new clip or selectively ignore one of your In or Out points.

## Storyboard editing

The term *storyboard* usually describes a series of drawings that show the intended camera angles and action for a film. Storyboards are often quite similar to comic strips, though they usually include technical information, such as intended camera moves, lines of dialogue, and sound effects.

You can use clip thumbnails in a bin as storyboard images. Arrange the thumbnails by dragging and dropping them in the order in which you would like the clips to appear in your sequence, from left to right and from top to bottom. Then drag and drop them into your sequence, or use a special automated edit feature to add them to your sequence with transition effects.



#### Using a storyboard to build a rough cut

An assembly edit is a sequence in which the order of the clips is correct but the timing has yet to be worked out. It is common to build sequences as an assembly first, just to make sure the structure works, and then adjust the timing later.

You can use storyboard editing to quickly get your clips in the right order.

- **1.** Save the current project.
- 2. Open Desert Sequence.prproj in the Lessons/Lesson 05 folder.

This project has a Desert Montage sequence that already has "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

music. You'll add some beautiful shots.

The audio track A1 has been locked (click the padlock icon to lock and unlock tracks). This means you can make adjustments to the sequence without risking making changes to the music track.

#### Arranging your storyboard

Double-click the Desert Footage bin to open it. There are a series of short shots in this bin.

- 1. If necessary, click the Icon View button ( ) on the bin to see thumbnails for the clips.
- 2. Drag and drop the thumbnails inside the bin to position them in the order in which you would like them to appear in the sequence.
- **3.** Make sure the Desert Footage bin is selected. Select all of the clips in the bin by pressing Control+A (Windows) or Command+A (Mac OS).
- **4.** Drag and drop the clips into the sequence, positioning them on the Video 1 track right at the beginning of the Timeline, above the music clip.

#### Setting the duration for still images

These video clips already have In and Out points. These In and Out points are used automatically when you're adding the clips to your sequence, even when adding them directly from the bin.

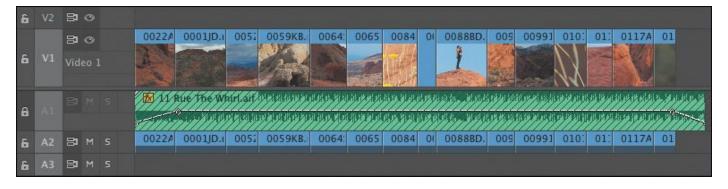
Graphics and photos can have any duration in a sequence. However, they have a default duration

that is set as you import them. The default duration can be changed in the Premiere Pro preferences.

Choose Edit > Preferences > General (Windows) or Premiere Pro > Preferences > General (Mac OS) to change the duration in the Still Image Default Duration box. The change you make applies only to clips when you import them. It does not affect clips that are already in the project.

Still images also have no *Timebase*; that is, the number of frames that should play each second. You can set the default Timebase for still images by choosing Edit > Preferences > Media (Windows) or Premiere Pro > Preferences > Media (Mac OS) and setting an option for the Indeterminate Media Timebase.

**5.** Play your sequence to see the result.



#### Note

Premiere Pro has the option to sort clips in Icon view based on a number of criteria. Click the Sort Icons button ( ) for the options. Be sure to leave the menu set to User Order to be able to

#### Automating your storyboard to a sequence

In addition to dragging and dropping your storyboard edit into the Timeline, you can use the special Automate To Sequence option.

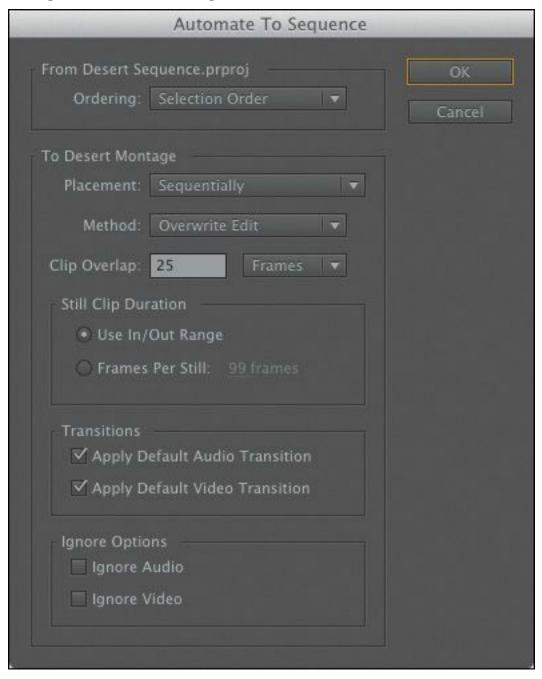
- 1. Undo your edit by pressing Control+Z (Windows) or Command+Z (Mac OS), and position your Timeline playhead at the very beginning of the Timeline.
- 2. In the bin, with your clips still selected, click the Automate To Sequence button (\_\_\_\_\_).

Automate To Sequence, as the name suggests, automatically adds your clips to the currently displayed sequence. Here are the options:

- Ordering: This positions clips in your sequence in the order in which they appear in the bin or in the order in which you click to select them.
- Placement: By default, the clips will be added one after another. If you have markers on the Timeline (perhaps in time with the beat of your music), you can add clips wherever there is a marker.
- Method: Choose between Insert and Overwrite.
- Clip Overlap: Automatically overlaps the clips to allow for a special-effect transition.
- Still Clip Duration: Allows you to choose a duration for still images in this dialog box or to set individual durations using In and Out points in the Source

Monitor.

- Transitions: Choose to have a video or audio transition automatically added between each clip.
- Ignore Options: Choose to exclude the video or audio parts of your clips.
- 3. Set up the Automate To Sequence dialog so that the settings match the figure, and click OK.



This time, the clips are overlapping with a special-effect dissolve. Note that the overlap used to create the transition effects decreases the total duration of the sequence.

## **Review questions**

- **1.** What do In and Out points do?
- 2. Is the Video 2 track in front of the Video 1 track or behind it?
- 3. How do subclips help you stay organized?
- 4. How would you select a sequence time range to work with?
- 5. What is the difference between an overwrite edit and an insert edit?
- **6.** How much of your source clip will be added to a sequence if the source clip has no In or Out point?

#### **Review answers**

- 1. In the Source Monitor, In and Out points define the part of a clip you would like to use in a sequence. On the Timeline, In and Out points are used to define parts of your sequence you would like to remove, edit, render or export. They can also be used to define parts of your sequence you would like to render, when working with effects and parts of your Timeline you would like to export to create a new video file.
- 2. Upper video tracks are always in front of lower ones.
- 3. Though subclips make little difference to the way

Premiere Pro plays back video and sound, they make it easier for you to divide up your footage into different bins. For larger projects with lots of longer clips, it can make a big difference to be able to divide up content this way.

- 4. You'll use In and Out marks to define parts of your sequence you would like to work with. For example, you might render when working with effects or export parts of your sequence you would like to make a file you can share. You also have the option to enable a Timeline Work Area Bar you can position to make sequence time range selections. Enable the Work Area by clicking on the Timeline panel menu and choosing Work Area Bar. The bar appears at the top of the Timeline panel and replaces the In point and Out point for rendering or exporting.
- 5. Clips added to a sequence using an overwrite edit replace any content already in the sequence where they are placed. Clips added to a sequence using an insert edit displace existing clips, pushing them later (to the right).
- 6. If you don't add In or Out points to your source clip, Premiere Pro will use the entire clip when you add it to a sequence. Setting an In point, an Out point, or both will limit the portion of the source clip used in the edit.

## 6. Working with Clips and Markers

#### Lesson overview

In this lesson, you'll learn about the following:

- The differences between the Program Monitor and the Source Monitor
- Using markers
- Applying sync locks and track locks
- Selecting items in a sequence
- Moving clips in a sequence
- Removing clips from a sequence



This lesson will take approximately 60 minutes.

Once you have some clips in a sequence, you're ready for the next stage of fine-tuning. You'll move clips around inside your edit and remove the parts you don't want. You can also add comment markers to store information about clips and sequences, which can be useful during your edit or when you send your sequence to other Adobe Creative Cloud applications.



Adobe Premiere Pro CC makes it easy to fine-tune your edits with markers and advanced tools for syncing and locking tracks when you're editing clips in your video sequence.

#### **Getting started**

The art and craft of video editing is perhaps best demonstrated during the phase *after* your assembly edit. Once you've chosen your shots and put them in approximately the right order, the process of carefully adjusting the timing of your edits begins. In this lesson, you'll learn about additional controls in the Program Monitor and discover how markers help you stay

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organized.

You'll also learn about working with clips that are already on the Timeline—the "nonlinear" part of nonlinear editing with Adobe Premiere Pro CC.

Before you begin, make sure you are using the default Editing workspace.

- **1.** Choose Window > Workspace > Editing.
- 2. Choose Window > Workspace > Reset Current Workspace.

The Reset Current Workspace dialog opens.

3. Click Yes.

#### **Program Monitor controls**

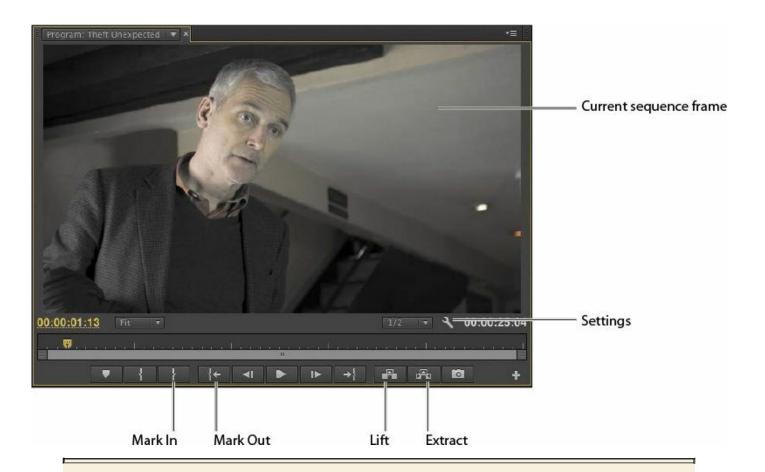
The Program Monitor is almost identical to the Source Monitor. There are a small number of important differences.

Let's take a look. For this lesson, open Lesson 06.prproj.

### What is the Program Monitor?

The Program Monitor displays the frame your sequence playhead is sitting on, or playing. The sequence in the Timeline panel shows the clip segments and tracks, while the Program Monitor shows the resulting video output. The Program Monitor time ruler is a miniature version of the Timeline.

In the early stages of editing, you're likely to spend a lot of time working with the Source Monitor. Once your sequence is roughly edited together, you will spend most of your time using the Program Monitor and the Timeline panel.



#### The Program Monitor vs. the Source Monitor

The key differences between the Program Monitor and the Source Monitor are as follows:

- The Source Monitor shows the contents of a clip; the Program Monitor shows the contents of whichever sequence is currently displayed in the Timeline panel.
- The Source Monitor has Insert and Overwrite buttons for adding clips (or parts of clips) to sequences. The Program Monitor has equivalent Extract and Lift buttons for removing clips (or parts of clips) from sequences.
- While both monitors have a time ruler, the playhead on the Program Monitor matches the

playhead in the sequence you're currently viewing (the name of the sequence is displayed in the top left of the Program Monitor). As one playhead moves, so does the other, allowing you to use either panel to change the currently displayed frame.

- When you work with special effects in Premiere Pro, you'll preview them (and see the results) in the Program Monitor. There's one exception to this rule: master clip effects are viewed in both the Source Monitor and the Program Monitor (for more information about effects, see <a href="Lesson 13">Lesson 13</a>, "Adding Video Effects").
- The Mark In and Mark Out buttons on the Program Monitor work in the same way as the ones on the Source Monitor. However, In and Out marks are added to the currently displayed sequence when you add them to the Program Monitor.

## Adding clips to the Timeline with the Program Monitor

You've already learned how to make a partial clip selection with the Source Monitor and then add the clip to a sequence by pressing a key, clicking a button, or dragging and dropping.

You can also drag and drop a clip from the Source Monitor into the Program Monitor to add it to the Timeline.

1. In the Sequences bin, open the Theft Unexpected

- sequence. This is the scene you have been editing.
- 2. Position the Timeline playhead at the end of the sequence, just after the last frame of the clip Mid John. You can hold the Shift key to snap the playhead to edits, or you can press the Up Arrow and Down Arrow keys to navigate between edits.

## Tip 👅

You can press the End key (Windows) or fn+Right Arrow key (Mac OS) to move the playhead to the end of the sequence.

- 3. Open the clip HS Suit from the Theft Unexpected bin in the Source Monitor. This is a clip that has already been used in the sequence, but we want a different part.
- 4. Set an In point for the clip around 01:26:49:00. There's not much going on in the shot, so it works well as a cutaway. Add an Out point around 01:26:52:00, so we have a little time with Suit.

#### Tip 👅

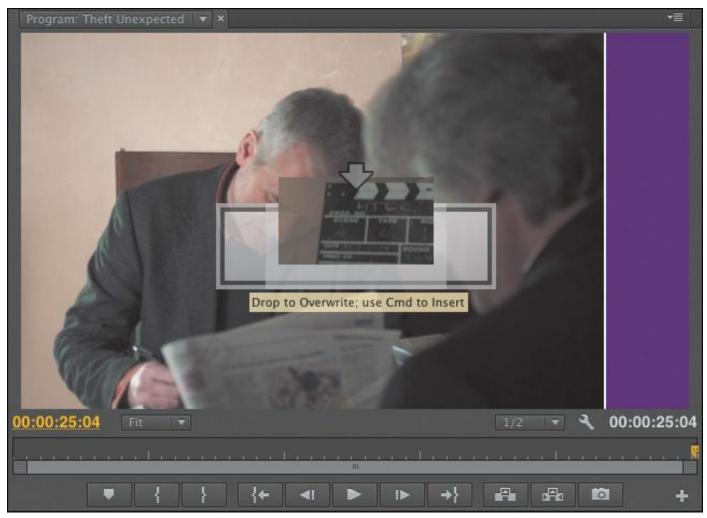
Remember that you can click the Timecode display, type the numbers without punctuation, and then press Enter to send the playhead to that time.

5. Click in the middle of the picture in the Source Monitor and drag the clip into the Program Monitor.

#### Note

When you drag a clip into your sequence using the mouse, Premiere Pro still uses the Source Channel Selection buttons to control which parts of the clip (video and audio channels) are used.

A large Overwrite icon appears in the middle of the Program Monitor. When you release the mouse button, Premiere Pro adds the clip at the sequence playhead position, and your edit is complete.



### **Insert editing with the Program Monitor**

Let's try an insert edit using the same technique.

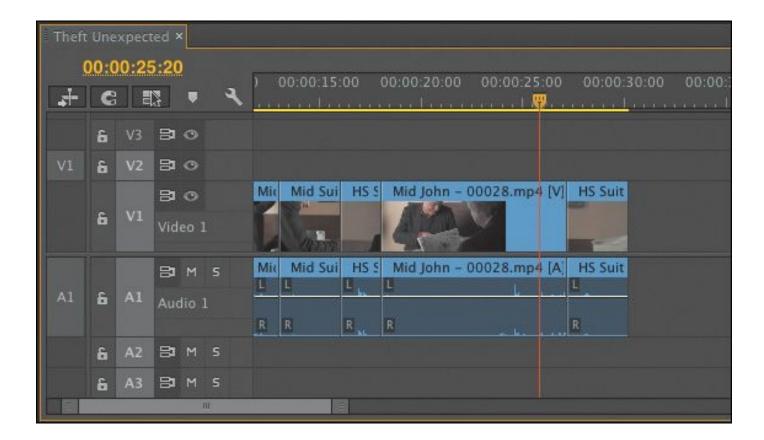
- 1. Position the Timeline playhead on the edit at 00:00:16:01, between Mid Suit and Mid John. The continuity of movement isn't very good on this cut, so let's add another part of that HS Suit clip.
- 2. Add a new In point and Out point to the HS Suit clip in the Source Monitor, selecting about two seconds in total. You can see the selected duration at the lower-right corner of the Source Monitor (00:00:02:00), displayed in white numbers.
- 3. Hold down the Control (Windows) or Command (Mac OS) key, and drag the clip from the Source Monitor into the Program Monitor. When you release the mouse button, the clip is inserted into your sequence.



If you prefer to use the mouse for editing in this way, rather than the keyboard shortcuts or the Insert and Overwrite buttons on the Source Monitor, there is a way to bring in just the video or audio part of a clip.

Let's try a combination of techniques. You'll set up your Timeline track headers and then drag and drop into the Program Monitor.

- 1. Position the Timeline playhead at around 00:00:25:20, just as John takes out his pen.
- 2. In the Timeline panel, patch the Source V1 track to the Timeline V2 track by dragging and dropping it. For the technique you're about to use, the track targeting is used to set the location of the clip you are adding.



Your Timeline track headers should look like this.

- **3.** Open the clip Mid Suit in the Source Monitor. At about 01:15:54:00, John is wielding his pen. Mark an In point there.
- **4.** Add an Out point at about 01:15:56:00. We just need a quick alternative angle.

At the bottom of the Source Monitor, you'll see the Drag Video Only and Drag Audio Only icons ( ).

These icons serve two purposes:

- They tell you whether your clip has video, audio, or both. If there is no video, for example, the filmstrip icon is dimmed. If there is no audio, the waveform is dimmed.
- You can drag them with the mouse to selectively edit

video or audio into your sequence.

- 5. Drag the filmstrip icon from the bottom of the Source Monitor into the Program Monitor. You'll see a familiar Overwrite icon in the Program Monitor. When you release the mouse button, just the video part of the clip is added to the Video 2 track on the Timeline. This works even if both the Source Video and Source Audio channel selection buttons are enabled, so it's a quick, intuitive way to select the part of a clip you want.
- **6.** Play your sequence from the beginning.

The timing needs a little work, but the edit is off to a good start. The clip you just added plays in front of the end of the Mid John clip and the start of the HS Suit clip, changing the timing. Because Premiere Pro is a nonlinear editing system, it's fine if the timing needs adjusting later. You'll learn how to do this in Lesson 8, "Advanced Editing Techniques."

# Why are there so many ways to edit clips into a sequence?

This method may seem like yet another way to achieve the same thing, so what's the benefit? It's simple: As screen resolution increases and buttons get smaller, it's an increasingly delicate maneuver to aim and click in the right place.

If you prefer to use the mouse to edit (rather than the keyboard), the Program Monitor represents a conveniently large drop zone for you to add clips to the Timeline. It gives you accurate placement of clips—using the track header controls and the

position of the playhead (or your In and Out marks) —while allowing you to work intuitively with the mouse.

## **Controlling resolution**

The powerful Mercury Playback Engine enables Premiere Pro to play multiple media types, special effects, and more in real time. Mercury uses the power of your computer hardware to boost performance. This means that the speed of your CPU, the amount of RAM you have, and the speed of your hard drives are all factors that impact playback performance.

If your system has difficulty playing back every frame of video in your sequence (in the Program Monitor) or in your clip (in the Source Monitor), you can choose to lower the playback resolution to make it easier. When you see your video playback stuttering, stopping, and starting, it usually indicates that your system is unable to play the file because of CPU speed or hard drive speed.

Reducing the resolution means you won't see every pixel in your pictures, but it can dramatically improve performance, making creative work much easier. It's common for video to have a much higher resolution than is displayed, simply because your Source Monitor and Program Monitor are usually smaller than the original media size. This means you may not see a difference in the display when you lower the playback resolution.

## Adjusting playback resolution

Let's try adjusting playback resolution.

1. Open the clip Cutaways from the Theft Unexpected bin. By default, the clip should be displayed at half quality in the Source Monitor.

At the bottom right of the Source Monitor and Program Monitor, you'll see the Select Playback Resolution menu.



- 2. Play the clip to get a sense of the quality when it's set to half resolution.
- 3. Change the resolution to Full, and play it again to compare. It probably looks similar.
- 4. Try reducing the resolution to 1/4. Now you might begin to see a difference during playback. Notice that the picture goes sharp when you pause playback. This is because the pause resolution is independent of the playback resolution (see the next section).
- 5. Try dropping the playback resolution to 1/8—with this clip, you can't! Premiere Pro makes an assessment of each kind of media you work with, and if the benefits of reducing resolution are less than the effort it takes to drop the resolution, the option is unavailable.



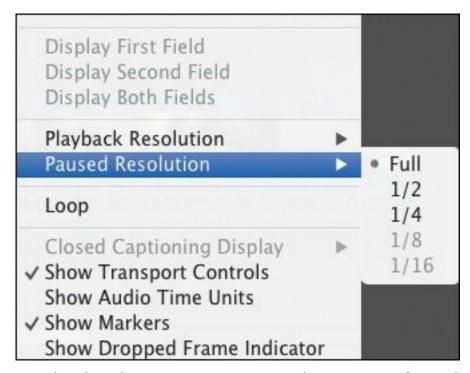
#### Note

The playback resolution controls are the same on the Source Monitor and the Program Monitor.

#### Paused resolution

You can also change the playback resolution using the panel menu or the Settings menu on the Source and Program Monitors.

If you look in the Settings menu on either monitor, you'll find a second option related to display resolution: Paused Resolution.



This menu works in the same way as the menu for playback resolution, but as you might have guessed, it changes the resolution only when the video is paused.

Most editors choose to leave Paused Resolution set to Full. That way, during playback you may see lower-resolution video, but when you pause, Premiere Pro reverts to showing you full resolution. This means, when working with effects, you'll see the video at full resolution.

If you work with third-party special effects, it's possible you'll find they do not make use of your system hardware as efficiently as Premiere Pro does. As a consequence, it might take a long time to update the picture when you make changes to the effect settings. You can speed things up by lowering the paused resolution.

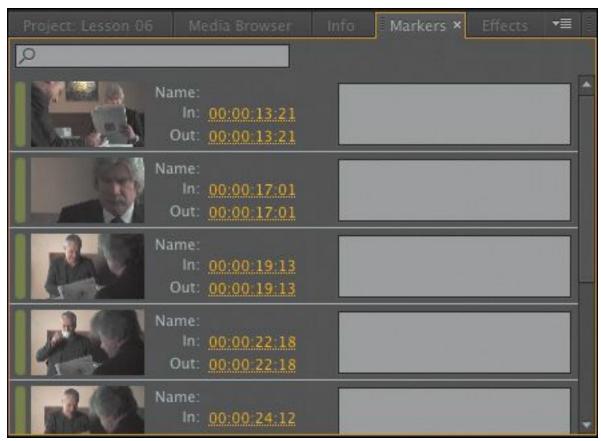
#### Using markers

Sometimes it can be difficult to remember where you saw that useful shot or what you intended to do with it. Wouldn't it be "\*\*\*\*\*ebook converter DEMO - www.ebook-

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useful if you could mark clips with comments and flag areas of interest for later?

What you need are markers.



#### What are markers?

Markers allow you to identify specific times in clips and sequences and add comments to them. These temporal (time-based) markers are a fantastic aid to help you stay organized and communicate with co-editors.

You can use markers for personal reference or for collaboration. They can be connected to individual clips or a sequence.

When you add a marker to a clip, it's included in the metadata for the original media file. This means you can open the clip in another Premiere Pro project and see the same markers.

You can export markers associated with a clip or sequence as an HTML page, with thumbnails or a .CSV (comma-separated value) file readable by spreadsheet editing applications. This is useful for collaboration and as a reference.

Export markers by choosing File > Export > Markers.

## Types of markers

More than one type of marker is available:

Marker @ 00:00:17:01			
Name:			ОК
Time: 00:00:	17:01 Duration: 0	0:00:00:00	Cancel
Comments:			Prev
0.000		_	
2000		_	Next
			Delete
Options:			
Comment Ma	rker		
Chapter Mark	er		
<ul> <li>Segmentation</li> </ul>	n Marker		
O Web Link			
Frame Target:			
C Flash Cue Poi	nt		
Name	▲ Value		
Marker Op	otions will only work with	n compatible outp	out types.

"\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

- Comment Marker: A general marker you can assign a name, duration, and comments.
- Chapter Marker: A special kind of marker that Adobe Encore can convert into a regular chapter marker when making a DVD or Blu-ray Disc.
- Segmentation Marker: A special kind of marker that allows certain video servers to divide content into parts.
- Web Link: A special kind of marker that supported video formats such as QuickTime can use to automatically open a webpage while the video plays. When you export your sequence to create a supported format, web link markers are included in the file.
- Flash Cue Point: A marker used by Adobe Flash. By adding these cue points to the Timeline in Premiere Pro, you can begin to prepare your Flash project while still editing your sequence.

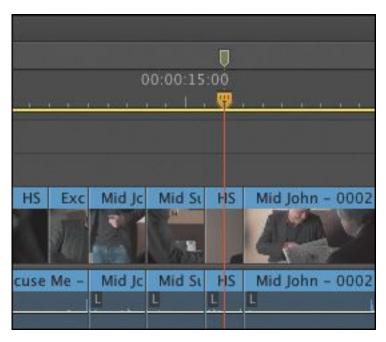
#### Sequence markers

Let's add some markers.

- 1. Open the sequence Theft Unexpected 02 in the Sequences bin.
  - Around 17 seconds into the sequence, the HS Suit shot is not particularly good—the camera movement is a little shaky. Let's leave a marker as a reminder to replace it later.
- 2. Set the Timeline playhead to around 00:00:17:00 and make sure no clips are selected (you can click on the background of the Timeline panel to deselect clips).

- 3. Add a marker in one of the following ways:
  - Click the Add Marker button at the top left of the Timeline.
  - Right-click the Timeline time ruler and choose Add Marker.
  - Press M.

Premiere Pro adds a green marker to the Timeline, just above the playhead. You can use this as a simple visual reminder or go into the settings and change it into a different kind of marker.



#### o Note

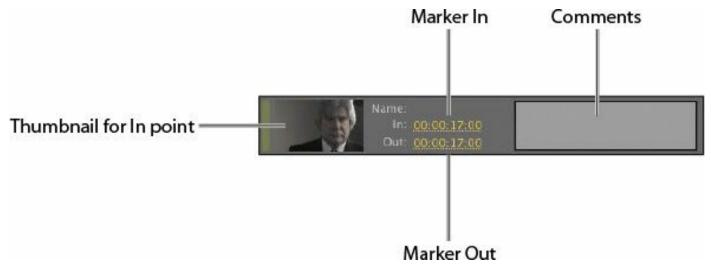
You can add markers on the time ruler for the Timeline, Source Monitor, or Program Monitor.

You'll do that in a moment, but first let's look at this marker in the Markers panel.

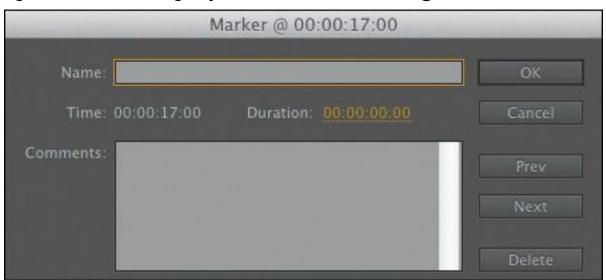
**4.** Open the Markers panel. By default, the Markers panel is "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

grouped with the Project panel. If you don't see it there, go to the Window menu and choose Markers.

The Markers panel shows you a list of markers, displayed in time order. The same panel shows you markers for a sequence or for a clip, depending on whether the Timeline panel or the Source Monitor is active.



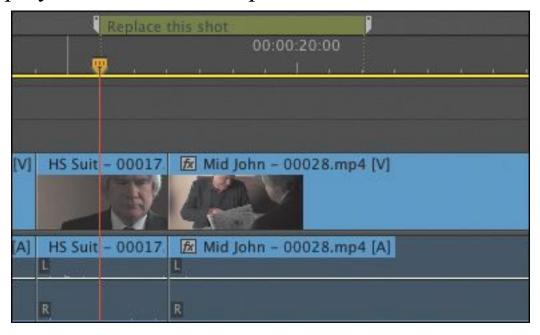
5. Double-click the thumbnail for the marker in the Markers panel. This displays the Marker dialog.



6. Click the Duration field and type **400**. Avoid the temptation to press Enter or Return, or the panel will close. Premiere Pro automatically adds punctuation, turning this into 00:00:04:00 (4 seconds).

7. Click in the Comments box and type a comment, such as **Replace this shot**. Then click OK.

Notice that the marker now has a duration on the Timeline. Zoom in a little, and you'll see the comment you added. It's also displayed in the Markers panel.



# Tip 🗾

You may need to click the Timeline panel to make it active before your current Timeline markers are shown in the Markers panel.

8. Click the Marker menu, at the top of the Premiere Pro interface, to view the options.

Notice the option at the bottom of the Marker menu: Ripple Sequence Markers. With this option selected, markers you add to sequences will move in sync with clips when you use insert or extract edits to add or remove clips. These kinds of edits change the duration of your sequence. With the Ripple

Sequence Markers option disabled, markers stay where they are when your clips move.

# Tip 🏲

Notice that the entries in the Marker menu all have keyboard shortcuts. Working with markers using the keyboard is generally much faster than using the mouse.

#### Clip markers

Let's add markers to a clip.

- 1. Open the clip Seattle\_Skyline.mov from the Further Media bin in the Source Monitor.
- 2. Play the clip, and while it plays, press the M key several times to add markers.
- **3.** Look in the Markers panel. Every marker you added is listed. When clips with markers are added to a sequence, they retain their markers.

# Tip 🕟

You can get to the same option to remove all markers—or a current marker—by right-clicking in the Source Monitor, the Program Monitor, or on the Timeline Time Ruler and choosing Clear All Markers.

4. Make sure the Source Monitor is active by clicking it. Go

to the Marker menu and choose Clear All Markers.

Premiere Pro removes all the markers from the clip in the Source panel.

Clear Selected Marker てM Clear All Markers て第M

You can add a marker to a clip in a sequence by selecting it before you add the marker. Markers added to clips already edited into a sequence still appear in the Source Monitor when you view the clip.

### Note

Markers can be added using a button or a keyboard shortcut. If you use the keyboard shortcut, M, it's easy to add markers that match the beat of your music, because you can add them during playback.

#### Interactive markers

Adding an interactive marker is as easy as adding a regular marker.

- 1. Position the playhead anywhere you would like a marker on the Timeline, and click the Add Marker button or press M. Premiere Pro adds a regular marker.
- 2. Double-click the marker you have added, either on the Timeline or in the Markers panel.
- 3. Change the marker type to Flash Cue Point, and add the Name and Value details you need by clicking the + button

# Tip 🕟

You can use markers to quickly navigate your clips and sequences. If you double-click a marker in the Markers panel, you'll access the options for that marker. If you single-click it instead, Premiere Pro will take the playhead to the location of the marker—a fast way to find your way around.

# **Automated editing to markers**

In the previous lesson, you learned how to automate editing clips into a sequence from a bin. One of the options in that workflow is to automatically add clips to a sequence where you have markers. Let's try it:

1. Open the sequence Desert Montage in the Sequences bin. This is the sequence you worked on earlier, with music already on the Timeline but no clips added yet.

#### Adding markers with Adobe Prelude

Adobe Prelude is a logging and ingest application included with Adobe Creative Cloud. Prelude provides excellent tools for managing large quantities of footage and can add markers to footage that are fully compatible with Premiere Pro.

Markers are added to clips in the form of metadata,

and like the markers you add in Premiere Pro, they will travel with your media into other applications.

If you add markers to your footage using Adobe Prelude, those markers will automatically appear in Premiere Pro when you view the clips. In fact, you can even copy and paste a clip from Prelude into your Premiere Pro project, and the markers will be included.

- 2. Set the Timeline playhead at the beginning and play the sequence; then press the M key to add an initial marker.
- 3. Play the sequence for a while, and as it plays, press the M key to the beat of the music. You should be adding markers about two seconds apart.
- 4. Set your Timeline playhead to the start of the sequence. Then open the Desert Footage bin and select all of the clips by pressing Control+A (Windows) or Command+A (Mac OS).
- 5. Click the Automate To Sequence button at the bottom of the bin. Choose settings to match this example, and click OK.

Automate To Sequence	
From Lesson 06 2.prproj Ordering: Sort Order	OK Cancel
To Desert Montage	
Placement: At Unnumbered Markers	
Method: Overwrite Edit ▼	
Clip Overlap: Frames =	
Still Clip Duration	
Use In/Out Range	
O Frames Per Still: 99 frames	
Transitions	
✓ Apply Default Audio Transition	
Ignore Options  Ignore Audio	
☐ Ignore Video	

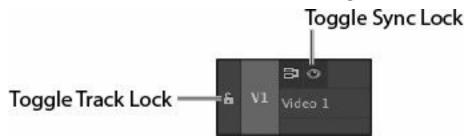
The clips are added to the sequence, with the first frame of each clip lined up to a marker, starting with the position of the playhead.

This is a fast way of building a montage if you have music or sound effects you'd like to synchronize with your pictures.

# **Using Sync Lock and Track Lock**

There are two distinct ways to lock tracks on the Timeline:

- You can lock clips in sync, so when you use an insert edit to add a clip, other clips stay together in time.
- You can lock a track so that no changes can be made to it.



# Using sync locks

Sync is not just for speech! It's helpful to think of sync as any two things that are meant to happen at the same time. You might have a musical event that happens at the same time as some climactic action, or something as simple as a lower-third title that identifies a speaker. If it happens at the same time, it's synchronized.

Open your original Theft Unexpected sequence in the Sequences bin.

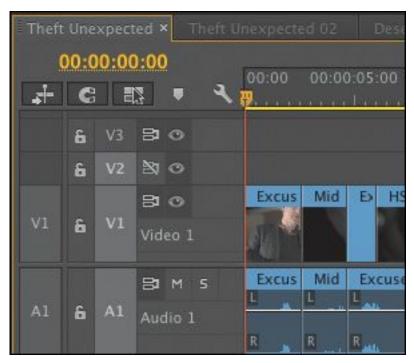
Right now, John arrives but we don't know what he's looking at. We could use a little more of the Suit sitting quietly in this sequence.

- 1. Double-click to open the shot Mid Suit, from the Theft Unexpected bin, in the Source Monitor. Add an In point around 01:15:35:18, and add an Out point around 01:15:39:00.
- 2. Position the Timeline playhead at the very beginning of the sequence, and make sure there are no In or Out marks on the Timeline.

### Tip 👅

You can press the Home key (Windows) or fn+Left Arrow key (Mac OS) to move the playhead to the end of the sequence.

3. Switch off the Sync Lock for the Video 2 track. Check that your Timeline is configured as in the following example, with the Source V1 track patched to the Timeline V1 track. The Timeline track header buttons are not important now, but having the right source track buttons on does.



4. Notice the position of the Mid Suit cutaway clip on the Video 2 track. It's just over the cut between the clips Mid John and HS Suit on Video 1, at the end of the sequence. Insert-edit the source clip into the sequence, and take another look at the location of the Mid Suit cutaway clip. The cutaway clip Mid Suit stays where it is, while the

other clips move to the right to accommodate the new clip. This is a problem, because the cutaway is now out of position with the clips to which it relates.

- 5. Undo by pressing Control+Z (Windows) or Command+Z (Mac OS), and try it again with Sync Lock turned on.
- **6.** Turn on Sync Lock for the Video 2 track, and perform the insert edit again.

#### Note

You may need to zoom out to see the other clips in the sequence.

This time, the cutaway clip moves with the other clips on the Timeline, even though nothing is being edited onto the Video 2 track. This is the power of sync locks—they keep things in sync!

# Using track locks

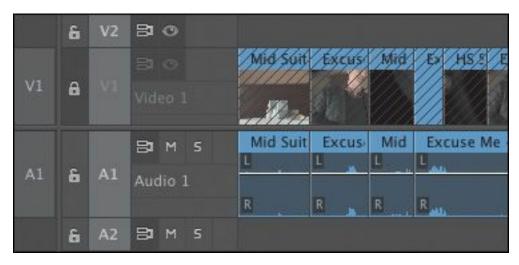
Track locks prevent you from making changes to a track. They are an excellent way to avoid making any kind of accidental changes to your sequence, or to fix clips on specific tracks in place while you work.

### Note

Overwrite edits do not change the duration of your sequence, so they are not affected by sync locks.

For example, you could lock your music track while you insert different video clips. By locking the music track, you can simply forget about it while editing, because no changes can be made to it.

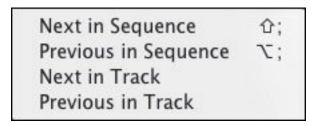
Lock and unlock tracks by clicking the Toggle Track Lock button. Clips on a locked track are highlighted with diagonal lines.



# Finding gaps in the Timeline

Until now, you've been adding clips to a sequence. Part of the power of nonlinear editing is in having the freedom to move clips around in a sequence and remove the parts you don't want.

When removing clips or parts of clips, you'll either leave a gap by performing a lift edit or not leave a gap by performing an extract edit.



When you zoom out of a complex sequence, it can be difficult to see gaps left behind after performing an edit. To

automatically locate the next gap, choose Sequence > Go to Gap > Next in Sequence.

Once you've found a gap, you can remove it by selecting it and pressing Delete.

Let's learn a little more about working with clips on the Timeline. Continue working with the Theft Unexpected sequence.

# **Selecting clips**

Selection is an important part of working with Premiere Pro. Depending on the panel you have selected, different menu options will be available. You'll want to select clips in your sequences carefully before applying any adjustments to them.

When working with clips that have video and audio, you'll have two or more segments for each clip. You'll have one video segment and at least one audio segment.

When the video and audio clip segments come from the same original camera recording, they are automatically linked. Click one, and the other is automatically selected.

You can switch on and off the option to maintain links between clips by clicking the Linked Selection button ( ) at the top

left of the Timeline panel. When Linked Selection is on, video and audio clips in a sequence are automatically selected together when you click them. When Linked Selection is off, clicking the video or audio part of a clip selects only that part.

When selecting clips on the Timeline, it's useful to think in terms of two approaches:

Make time selections by using In and Out points

Make selections by choosing clip segments

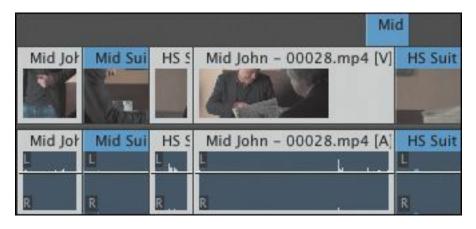
# Selecting a clip or range of clips

The simplest way to select a clip in a sequence is to click it. Be careful not to double-click, because this will open the clip in the Source Monitor, ready for you to adjust the In or Out points.

When making selections, you'll want to use the default Timeline tool—the Selection tool ( ). This tool has the keyboard shortcut V.

If you hold the Shift key while you click with the Selection tool, you can select or deselect additional clips.

You can also lasso to select multiple clips. Begin by clicking an empty part of the Timeline, and then drag to create a selection box. Any clip you drag over with the selection box will be selected.



# Selecting all the clips on a track

If you want to select every clip on a track, there are two handy tools to do just that: the Track Select Forward tool ( ), which has the keyboard shortcut A, and the Track Select Backward tool ( ), which has the keyboard shortcut Shift+A.

Try it now. Choose the Track Select Forward tool, and click any clip on the Video 1 track.

Every clip from the one you select until the end of the sequence is selected. This is useful if you want to add a gap to your sequence to make space for more clips. You can drag all the selected clips to the right to introduce a gap.

Try the Track Select Backward tool. When you click a clip with this tool, every clip up to the one you clicked is selected.

If you hold the Shift key while using either of the Track Select tools, you'll select clips on only one track.

When you have finished, switch to the Selection tool by clicking it on the Tools panel or by pressing the V key.

# Selecting audio or video only

It's common to add a clip to a sequence and later realize you don't need the audio or video part of the clip. You'll want to remove one or the other, and there is an easy way to make the correct selection: If Linked Selection is on, you can temporarily override it.

Try clicking some clip segments on the Timeline by using the Selection tool while holding the Alt (Windows) or Option (Mac OS) key. When you select using the Alt (Windows) or Option (Mac OS) key, Premiere Pro ignores the link between video and audio parts of your clips. You can even lasso in this way!

# **Tip**

If you drag a sequence clip while holding the Alt (Windows) or Option (Mac OS) key, you will

# Splitting a clip

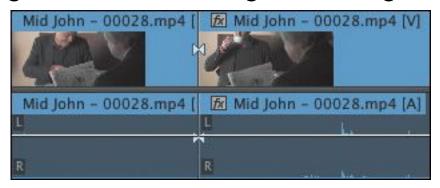
It's also common to add a clip to a sequence and then realize you need it in two parts. Perhaps you want to take just a section of a clip and use it as a cutaway, or maybe you want to separate the beginning and the end to make space for new clips.

You can split clips in several ways:

- Use the Razor tool ( ), with the keyboard shortcut C. If you hold the Shift key while clicking with the Razor tool, you'll add an edit to clips on every track.
- Make sure the Timeline panel is selected, go to the Sequence menu, and choose Add Edit. Premiere Pro adds an edit, at the location of your playhead, to clips on any tracks that are turned on. If you have selected clips, Premiere Pro adds the edit only to the selected clips.
- If you go to the Sequence menu and choose Add Edit to All Tracks, Premiere Pro adds an edit to clips on all tracks, regardless of whether they are turned on.
- Use the Add Edit keyboard shortcuts. Press Control+K (Windows) or Command+K (Mac OS) to add an edit to selected tracks or clips, or press Shift+Control+K (Windows) or Shift+Command+K (Mac OS) to add an edit to all tracks regardless of selection.

Clips that were originally continuous will play back seamlessly unless you move them or make separate adjustments to different parts.

If you click the Settings button for the Timeline ( ), you can select Show Through Edits to see a special icon on edits of this kind. You can rejoin clips that have the Through Edit icon by right-clicking the edit and choosing Join Through Edits.



You can also click a Through Edit icon and press the Delete key to rejoin the two parts of a clip.

Try it with this sequence. Be sure to Undo to remove the new cuts you add.

# Linking and unlinking clips

The link between connected video and audio segments can be switched off and on very easily. Just select the clip or clips you want to change, right-click one of them, and choose Unlink. You can also use the Clip menu.

You can link a clip with its audio again by selecting both, right-clicking one of the segments, and reselecting Link. There's no harm in linking or unlinking clips—it won't change the way Premiere Pro plays your sequence. It's just a question of giving you the flexibility to work with clips the way you want.



Selecting one part of a linked clip will select only the other part(s) if Linked Selection is turned on for the Timeline panel (see above).

# Moving clips

Insert edits and overwrite edits add new clips to sequences in dramatically different ways. Insert edits push existing clips out of the way, whereas overwrite edits simply replace them. This theme of having two ways of working with clips extends to the techniques you'll employ to move clips around the Timeline and to remove clips from the Timeline.

When moving clips using the Insert mode, you may want to ensure you have the sync locks on for your tracks to avoid any possible loss of sync.

Let's try a few techniques.

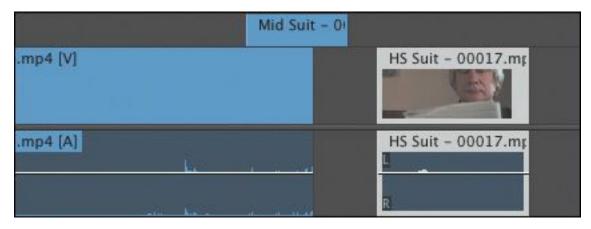
# **Dragging clips**

At the top left of the Timeline panel, you'll see the Snap button (). When snapping is enabled, clip segments snap automatically to each other's edges. This simple but useful feature will help you position clip segments accurately.

1. Click the last clip on the Timeline, HS Suit, and drag it a little to the right.

Because there are no clips after this one, you simply

introduce a gap before the clip. No other clips are affected.



- 2. Drag the clip back to its original position. If you move the mouse slowly and if Snap mode is on, you'll notice that the clip segment slightly jumps into position. When this happens, you can be confident it is perfectly positioned. Notice that the clip also snaps to the end of the cutaway shot on Video 2.
- 3. Drag the clip to the left so it's positioned earlier in the Timeline. Slowly drag the clip until it snaps to the end of the clip before. When you release the mouse button, the clip simply replaces the end of that clip.

When you drag and drop clips, the default mode is Overwrite.



4. Undo to restore the clip to its original position.

# **Nudging clips**

Many editors prefer to use the keyboard as much as possible, minimizing the use of the mouse. Working with the keyboard is often faster.

It's common to move clip segments inside a sequence by using the arrow keys in combination with a modifier key, nudging the selected items left and right in time, or up and down between tracks.

#### **Clip-nudging shortcuts**

Here are the shortcuts for nudging clips using the keyboard:

- Nudge Clip Selection Left 1 Frame (add Shift for 5 frames): Alt+Left Arrow (Windows) or Command+Left Arrow (Mac OS)
- Nudge Clip Selection Right 1 Frame (add Shift for 5 frames): Alt+Right Arrow (Windows) or Command+Right Arrow (Mac OS)
- Nudge Clip Selection Up: Alt+Up Arrow (Windows) or Option+Up Arrow (Mac OS)
- Nudge Clip Selection Down: Alt+Down Arrow (Windows) or Option+Down Arrow (Mac OS)

You won't be able to nudge linked video and audio clips on V1 and A1 up and down until you separate them, or unlink them, because the separator between the video and audio tracks blocks the movement.

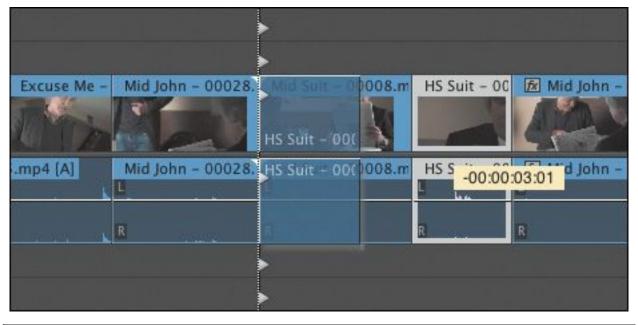
Premiere Pro includes many keyboard shortcut options, some of which are available, but not yet assigned keys. You can set these up, prioritizing the use of available keys to suit your workflow.

# Rearranging clips in a sequence

If you hold the Control (Windows) or Command (Mac OS) key while you drag clips on the Timeline, Premiere Pro uses Insert mode instead of Overwrite mode.

The HS Suit shot around 00:00:20:00 might work well if it appeared before the previous shot—and it might help us hide the poor continuity between the two shots of John.

1. Drag and drop that HS Suit clip to the left of the clip before it. The left edge of the HS Suit clip should line up with the left edge of the Mid Suit clip. Once you have begun dragging, hold the Control key (Windows) or Command key (Mac OS). Release the key after you've dropped the clip.



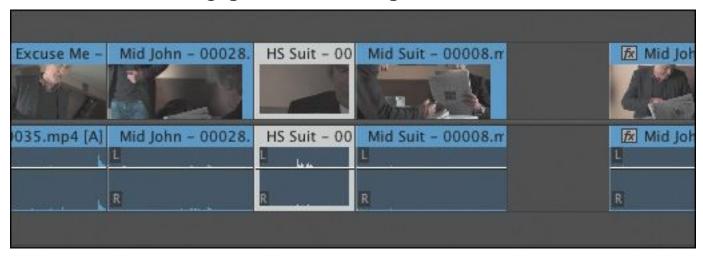
### Tip 👅

You may need to zoom in to the Timeline to see the clips clearly and move them easily.

### Tip 🕟

Be careful when dropping the clip into position. The ends of clips snap to edges just as the beginnings do.

2. Play the result. This creates the edit you want, but it introduces a gap where the clip HS Suit used to be.



Let's try that again with an additional modifier key.

- 3. Undo to restore the clips to their original positions.
- 4. Holding Control+Alt (Windows) or Command+Option (Mac OS), drag and drop the HS Suit clip to the beginning of the previous clip again.

0 Excuse Me -	Mid John - 00028.	HS Suit - 00	Mid Suit - 00008.m	Mid John - 00028.mp4 [V]
				4
00035.mp4 [A]	Mid John - 00028.	HS Suit - 00	Mid Suit - 00008.m	Mid John - 00028.mp4 [A]
N K	L	L	L	L
	R	R	R	R

This time, no gap is left in the sequence. Play through the edit to see the result.

# Using the clipboard

You can copy and paste clip segments on the Timeline just as you might copy and paste text in a word processor.

- 1. In a sequence, select any clip segment (or segments) you want to copy, and then press Control+C (Windows) or Command+C (Mac OS) to add them to the clipboard.
- 2. Position your playhead where you would like to paste the clips you copied, and press Control+V (Windows) or Command+V (Mac OS).

Premiere Pro adds copies of the clips to your sequence based on the tracks you enable. The lowest enabled track receives the clip (or clips).

# **Extracting and deleting segments**

Now that you know how to add clips to a sequence and how to move them around, all that remains is to learn how to remove them. Once again, you'll be operating in Insert or Overwrite mode.

There are two ways of selecting parts of a sequence you want to remove. You can use In and Out points combined with track selections, or you can select clip segments. If you use In and Out points, selecting clips overrides selecting tracks, so you can ignore track selection if you make careful clip selections.

You will still be working with a selected amount of time, but selecting clips can be quicker than selecting tracks.

#### Lift

Open the sequence Theft Unexpected 03 in the Sequences bin. This sequence has some unwanted extra clips. They have different label colors to make them easier to identify. A lift edit will remove the selected part of a sequence, leaving blank space. It's similar to an overwrite edit but in reverse.

You'll need to set In and Out points on the Timeline to select the part that will be removed. You can do this by positioning the playhead and pressing I or O. You can also use a handy shortcut:

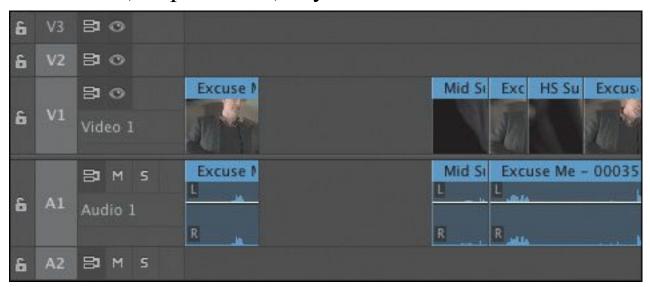
- 1. Position the playhead so that it's somewhere over the first additional clip, Excuse Me Tilted.
- 2. Make sure the Video 1 track header is turned on, and press X.

Premiere Pro automatically adds an In point and an Out point that match the beginning and end of the clip. You'll see a highlight that shows the selected part of the sequence.

The correct tracks are already selected, so there's no need to do anything else to prepare for the lift edit. In fact, because you have selected a clip, the track selection has no effect anyway. The edit you're about to perform will apply to the selected clip. "\*\*\*\*\*ebook converter DEMO - www.ebook-

converter.com\*\*\*\*\*\*

3. Click the Lift button ( ) at the bottom of the Program Monitor, or press the ; key.



Premiere Pro removes the part of the sequence you selected, leaving a gap behind. This might be fine on another occasion, but in this instance you don't want the gap. You could right-click inside the gap and choose Ripple Delete, but for this exercise you'll use an extract edit.

#### **Extract**

An extract edit removes the selected part of your sequence and does not leave a gap. It's similar to an insert edit, but in reverse.

- 1. Undo the last edit.
- 2. Click the Extract button ( ) at the bottom of the Program Monitor, or press the ' (apostrophe) key.

This time, Premiere Pro removes the selected part of the sequence and doesn't leave a gap.

# **Delete and Ripple Delete**

There are also two ways of removing clips by selecting segments: Delete and Ripple Delete.

Click the second unwanted clip, Cutaways, and try these two options:

- Pressing the Delete key removes the selected clip (or clips), leaving a gap behind. This is the same as a lift edit.
- Pressing Shift+Delete removes the selected clip (or clips) without leaving a gap behind. This is the same as an extract edit. If you're using a Mac keyboard without a dedicated Delete key, use the Function key to convert the Backspace key into a Delete key.

The result seems similar to what is achieved using In and Out points because you used the In and Out points to select a whole clip. You can use In and Out points to choose any parts of clips, while selecting clip segments and pressing Delete will whole clips.

# Disabling a clip

Just as you can turn a track output off or on, you can also turn individual clips off or on. Clips that you disable are still in your sequence, but they cannot be seen or heard during playback or scrubbing.

This is a useful feature for selectively hiding parts of a complex, multilayered sequence when you want to see background layers or compare different takes.

Try this on the cutaway shot on the Video 2 track.

1. Right-click the clip Mid Suit on the Video 2 track, and choose Enable.



This disables the clip by deselecting the Enable option. Play through that part of the sequence, and you'll notice that the clip is present but you can no longer see it.

2. Right-click the clip again, and choose Enable. This reenables the clip.

# **Review questions**

- 1. When dragging clips into the Program Monitor, what modifier key (Control/Command, Shift, or Alt) should you use to make an insert edit rather than an overwrite edit?
- 2. How do you drag and drop just the video or audio part of a clip into a sequence?
- 3. How do you reduce the playback resolution in the Source Monitor or Program Monitor?
- 4. How do you add a marker to a clip or sequence?
- 5. What is the difference between an extract edit and a lift edit?
- **6.** What is the difference between the Delete and Ripple Delete functions?

### **Review answers**

- 1. Hold the Control (Windows) or Command (Mac OS) key when dragging a clip into the Program Monitor to make an insert edit rather than an overwrite edit.
- 2. Rather than grabbing the picture in the Source Monitor, drag and drop the filmstrip icon or the audio waveform icon to select only the video or audio part of the clip.
- 3. Use the Select Playback Resolution menu at the bottom of the monitor to change the playback resolution.
- 4. To add a marker, click the Add Marker button at the bottom of the monitor or on the Timeline, press the M key, or use the Marker menu.
- 5. When you extract a section of your sequence using In and Out points, no gap is left behind. When you lift, a gap remains.
- 6. When you delete a clip, a gap is left behind. When you ripple delete a clip, no gap is left.

# 7. Adding Transitions

#### **Lesson overview**

In this lesson, you'll learn about the following:

- Understanding transitions
- Understanding edit points and handles
- Adding video transitions
- Modifying transitions
- Fine-tuning transitions
- Applying transitions to multiple clips at once
- Using audio transitions



This lesson will take approximately 60 minutes to complete.



Transitions can help create a seamless flow between two video or audio clips. Video transitions are often used to signify a change in time or location. Audio transitions provide a useful way to avoid abrupt edits that jar the listener.

### **Getting started**

In this lesson, you'll learn to use transitions between video and audio clips. Video editors often use transitions to help an edit flow more smoothly. You'll learn best practices for choosing transitions selectively.

For this lesson, you'll use a new project file.

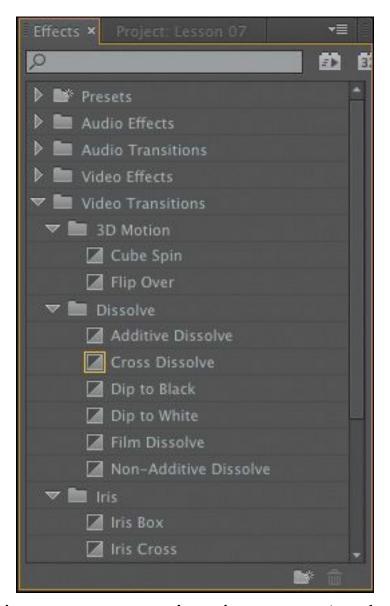
- 1. Start Adobe Premiere Pro CC, and open the project Lesson 07.prproj.
  - The sequence 01 Transitions should already be open.
- 2. Choose Window > Workspace > Effects.

This changes the workspace to the preset that was created to make it easier to work with transitions and effects.

3. If necessary, click the Effects panel to make it active.

#### What are transitions?

Adobe Premiere Pro offers several special effects and preset animations to help you bridge neighboring clips in the Timeline. These transitions—such as dissolves, page wipes, dips to color, and so on—provide a way to ease viewers from one scene to the next. Occasionally, a transition can also be used to grab viewers' attention to signify a major jump in the story.

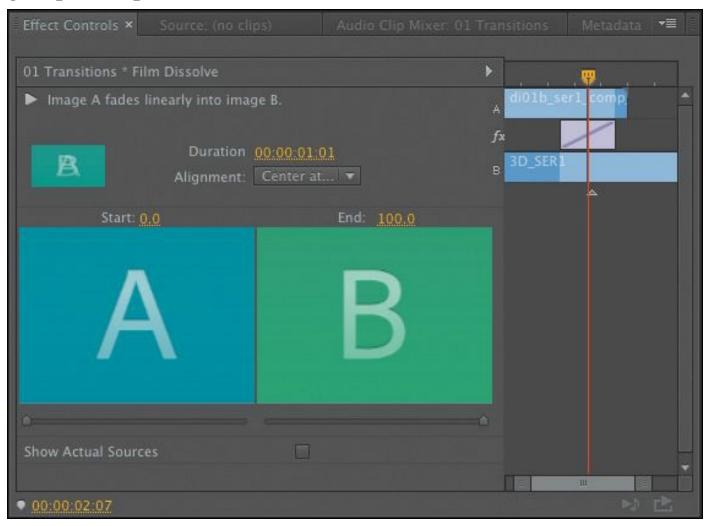


Adding transitions to your project is an art. Applying them starts simply enough; it's a mere drag-and-drop process. The skill comes in their placement, length, and parameters, such as direction, motion, and start/end locations.

Most transition work takes place in the Effect Controls panel. In addition to the various options unique to each transition, the Effect Controls panel displays an *A/B timeline*. This feature makes it easy to move transitions relative to the edit point, change the transition duration, and apply transitions to clips that don't have sufficient head or tail frames (additional content to provide an overlap). You can also apply a transition to a "\*\*\*\*\*ebook converter DEMO - www.ebook-

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group of clips.



#### When to use transitions

Transitions are most effective when you have no options other than making a distracting edit that makes your sequence appear jarring when viewed. For example, you may switch from indoors to outdoors in a video, or you may jump forward in time by several hours. An animated transition or a dissolve helps the viewer understand that time has passed or that the location has changed.

Transitions are a standard storytelling tool in video editing. For many years, viewers have gotten used to seeing transitions applied in standard ways, such as the changing of one section to "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

another in a video or the slow fade to black at the end of a scene. The key with transitions is to use restraint.

### **Best practices with transitions**

Many editors have a tendency to overuse transitions. Some come to rely on them as a crutch and think that they add visual interest. Once you discover the many options Premiere Pro offers, you may be tempted to use them for every edit point. Don't! Or at least, get them out of your system with your first edit...

Think of transitions as seasoning or spice. When added in small amounts and at the right time, they can make a meal tastier and more enjoyable. When overdone, they can quickly ruin that meal. Keep this in mind when you're applying transitions to your projects.

Watch some TV news stories. Most use cuts-only edits. You'll rarely see any transitions. Why? The principal reason for the lack of transitions is that they can be distracting. If a TV news editor uses one, it's for a purpose. Their most frequent use in newsroom editing bays is to take what would have been a jarring or abrupt edit—often called a *jump cut*—and make it more palatable.

That's not to say transitions don't have their place in carefully planned stories. Consider the *Star Wars* movies with their highly stylized transitions, such as obvious, slow wipes. Each of those transitions has a purpose. George Lucas purposely created a look reminiscent of old serialized movies and TV shows. Specifically, they send a clear message to the audience: "Pay attention. We're transitioning across space and time."

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#### Note

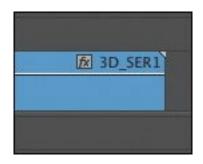
Transitions are fun and interesting to add to your project. However, overuse can make a video seem amateurish. When choosing a transition, make sure it adds meaning to your project. Watch your favorite movies and TV shows to learn how the pros use transitions.

# Edit points and handles

Two crucial concepts to understand with transitions are edit points and handles. An edit point is the point in your Timeline where one clip ends and the next begins. These are easy to see because Premiere Pro draws vertical lines to show where one clip ends and another begins (much like two bricks next to each other).

A handle is the trickier item to understand. During the process of editing, you'll end up with portions of clips that you won't use in your project. When you first edited a clip into your Timeline, you set In and Out points to define each shot. The handle between a clip's original Media Start time and the In point you chose is called the *head* material, and the handle between a clip's Out point and the Media End time is called the *tail* material.

If you see a little triangle in the upper-right or upper-left corner of a clip, it means you've reached the end of the original clip.



There are no additional frames. For transitions to work smoothly, you need handles. When your clip has handles, there are no triangles displayed in the upper corners of the clip.

Portions of a clip that are not normally visible will be used when you apply a transition. Essentially, the outgoing clip is overlapped with the incoming clip to create an area for transitions to occur. For example, if you apply a two-second Cross Dissolve transition centered between two video clips, you'd need a one-second handle on both clips (one additional second each that would normally be invisible in the Timeline panel).



# Adding video transitions

Premiere Pro contains several video transitions (plus three audio transitions). You'll find two types of video transitions inside Premiere Pro. The most commonly used transitions are those in the Video Transitions group. These are organized into

seven categories based on style. You'll also find additional transitions in the Video Effects group in the Effects panel. These are meant to be applied to an entire clip and can be used to reveal the footage (typically between its start and end frame). This second category works well for superimposing text or graphics.

### o Note

If you need more transitions, check the Adobe website. Visit <a href="https://www.adobe.com/products/premiere/extend.html">www.adobe.com/products/premiere/extend.html</a> and click the Plug-ins tab. There, you'll find several third-party effects to explore.

# Applying a single-sided transition

The easiest transition to understand is one that applies to just one end of a single clip. This could be a fade from black on the first clip in a sequence or a dissolve into an animated graphic that leaves the screen on its own.

Let's give it a try.

- 1. Use the opened sequence, 01 Transitions.

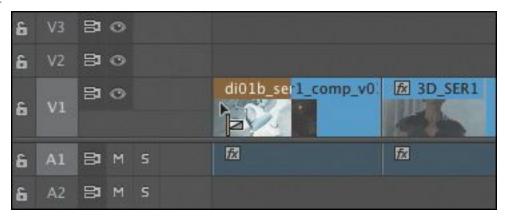
  This sequence has four video clips. The clips have long enough handles for transitions to be applied.
- 2. The Effects panel should be docked with the Project panel. In the Effects panel, open the Video Transitions > Dissolve bin. Find the Film Dissolve effect.

You can use the Search field, at the top of the panel, to locate the effect by name, or you can manually open the "\*\*\*\*\*ebook converter DEMO - www.ebook-

converter.com\*\*\*\*\*\*

folders of effects. The Film Dissolve effect works the same way as a regular Cross Dissolve but with different timing.

3. Drag and drop the effect onto the start of the first video clip. You can set the effect only to Start at Cut for the first clip.



**4.** Drag the Film Dissolve effect onto the end of the last video clip.

The Dissolve icon shows that the effect will start before the end of the clip and complete by the time it reaches the clip's end.



Because you are applying the Film Dissolve transition onto the ends of clips, where there is no connected clip, the picture dissolves into the background of the Timeline (which happens to be black).

Transitions of this kind don't extend the clip (using the handle) because the transition doesn't reach past the end of the clip.

**5.** Play the sequence to see the result.

You should see a fade from black at the start of the sequence and a fade to black at the end.

#### Note

You can copy a transition from one part of a sequence to another. Just select the transition using your mouse, and choose Edit > Copy. Then move the playhead to the edit point where you want the transition, and choose Edit > Paste.

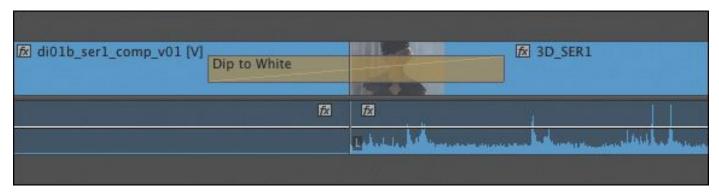
## Applying a transition between two clips

Let's apply transitions between several clips. For the purposes of exploration, we'll break the rules and try a few different options.

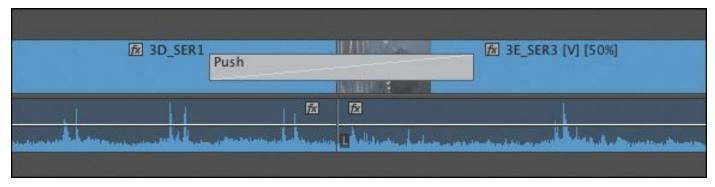
**1.** Continue working with the previous sequence, 01 Transitions.

To make the transition you are about to apply easier to see, you need to zoom in closer to the Timeline.

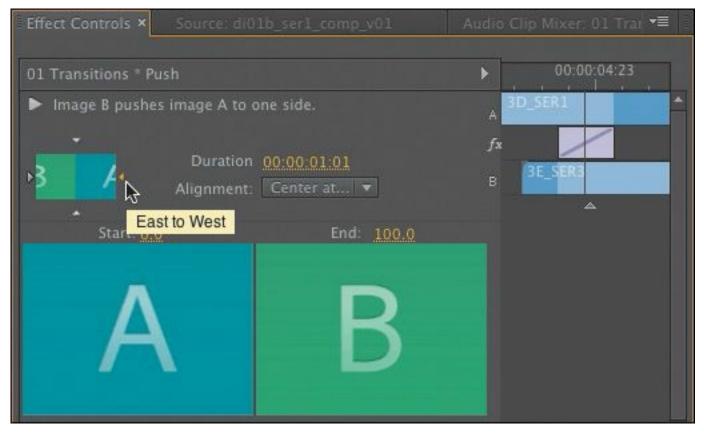
- 2. Move the playhead to the edit point between clip 1 and clip 2 on the Timeline, and then press the equal sign (=) three times to zoom in fairly close.
- 3. Drag the Dip to White transition from the Dissolve category onto the edit point between clip 1 and clip 2.



**4.** Next, drag the Push transition from the Slide category onto the edit point between clip 2 and clip 3.



5. Click the Push transition effect on the Timeline and go to the Effect Controls panel. Change the direction of the clip from West to East to East to West.



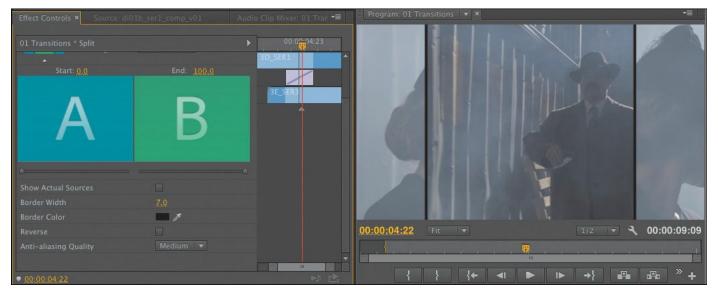
- 6. Drag the Flip Over transition from the 3D Motion category onto the edit point between clip 3 and clip 4.
- 7. Review the sequence by playing it from beginning to end. Having watched this sequence, you can probably see why it's a good idea to use transitions with restraint. Let's try replacing an existing effect.
- 8. Drag the Split transition from the Slide category onto the existing effect between clip 2 and clip 3. The new transition replaces the old one.

#### Note

When you drag a new video or audio transition from the Effects panel on top of an existing transition, it replaces the existing effect. It also preserves the alignment and duration of the

previous transition. This is an easy way to swap out transitions and experiment.

9. Select the Split transition on the Timeline. In the Effect Controls panel, set Border Width to 7 and Anti-aliasing Quality to Medium to create a thin black border at the edge of the wipe.

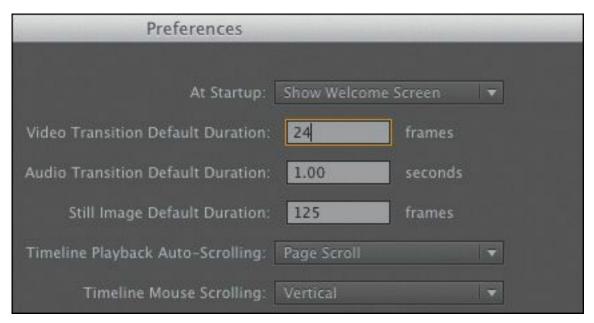


The anti-aliasing method reduces potential flicker when the line animates.

10. Watch the sequence to see the new transition.

Transitions have a default duration, which is measured in frames, not seconds. This means the frame rate of your sequence will change the time it will take to play a transition. The default transition duration can be changed to match your sequence settings in the General tab of the Preferences panel.

11. Choose Edit > Preferences > General (Windows) or Premiere Pro > Preferences > General (Mac OS).



12. This is a 24-frames-per-second sequence, so enter a value of 24 frames for Video Transition Default Duration and click OK. Because this matches the frame rate of the sequence, the default duration is now 1 second.

The existing transitions stay the same, but any future ones you add will have the new duration. Be sure to update this value to match your specific needs if you're using 25, 30, or 60 fps sequence settings, keeping in mind that few transitions employed by professional editors are actually a full second in duration. You'll learn more about how to customize transitions later in this lesson.

# Applying transitions to multiple clips at once

So far, you've been applying transitions to video clips. However, you can also apply transitions to still images, graphics, color mattes, and even audio, as you'll see in the next section of this lesson.

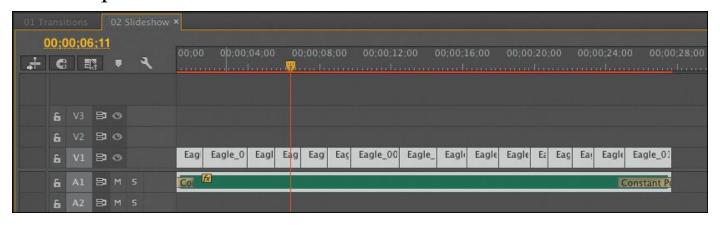
A common project that editors encounter is the photo montage. Often these montages look nice with transitions between

photos. Applying transitions one at a time for 100 images would take a long time. Premiere Pro makes it easy to automate this process by allowing the default transition (that you define) to be added to any group of contiguous or noncontiguous clips:

**1.** In the Project panel, double-click to load the sequence 02 Slideshow.

This sequence has several images edited sequentially.

- 2. Play the Timeline by pressing the spacebar.
  You'll notice that there's a cut between each pair of clips.
- **3.** Press the backslash (\) key to zoom out the Timeline to make the whole sequence visible.
- 4. With the Selection tool, draw a marquee around all the clips to select them.

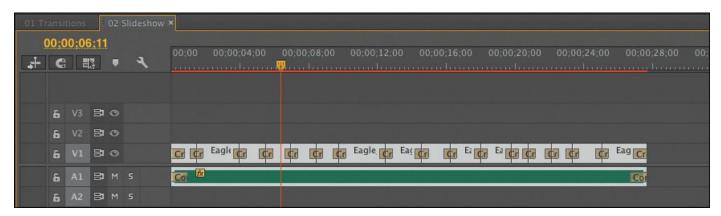


#### Note

If you're working with clips that have audio and video linked, you can select just the video or audio portions. Simply Alt-drag (Windows) or Option-drag (Mac OS) with the Selection tool to select just the audio or video of the clips that you want to affect. Then choose Sequence > Apply

Default Transitions to Selection. Note that this command works only with double-sided transitions.

**5.** Go to the Sequence menu and choose Apply Default Transitions to Selection.



This will apply the default transition between all the currently selected clips. The standard transition is a one-second Cross Dissolve effect. However, you can change the default transition by right-clicking an effect in the Effects panel and choosing Set Selected as Default Transition.

**6.** Play the Timeline, and see the difference the Cross Dissolve transition makes to the montage.

You can also copy an existing transition effect to multiple edits using the keyboard. To do this, select the transition effect and press Control+C (Windows) or Command+C (Mac OS). Then hold the Control key (Windows) or Command key (Mac OS) while you lasso to select other edits.

When you lasso this way, you select edits rather than clips. With the edits selected, you can press Control+V (Windows) or Command+V (Mac OS) to paste the effect onto all the selected

edits.

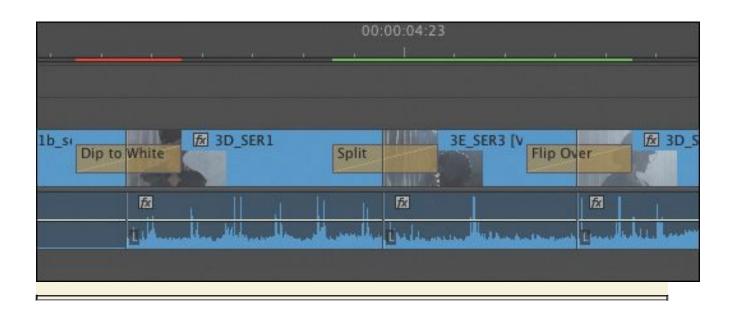
This is a great way to create matching transition effects between multiple clips.

#### Sequence display changes

When you add a transition to a sequence, a red horizontal line may appear above it in the Timeline panel. The red line means that this section of the sequence must be rendered before you can record it to tape or create a file of your finished project.

Rendering happens automatically when you export your project, but you can choose to render your sequence at any time to make sections that need to render display more smoothly on slower computers. The easiest way to render is to press the Enter key. You can also add In and Out points to select a part of your sequence and then render—only the selected part will render. This is useful if you have many effects that need to render but you're only concerned with one part for now.

Premiere Pro will create a video clip of that segment (tucked away in the Preview Files folder) and will change the line from red or yellow to green. As long as the line is green, playback should be smooth.



## Using A/B mode to fine-tune a transition

The Effect Controls panel's A/B editing mode splits a single video track into two. What would normally be two consecutive and contiguous clips on a single track are now displayed as individual clips on separate tracks, giving you the option to apply a transition between them, to manipulate their head and tail frames (or handles), and to change other transition options.

## Changing parameters in the Effect Controls panel

All transitions in Premiere Pro can be customized. Some effects have very few customizable properties (such as duration or starting point). Other effects offer more options for direction, color, border, and so on. The major benefit of the Effect Controls panel is that you can see the outgoing and incoming footage. This makes it easy to adjust the positioning of an effect.

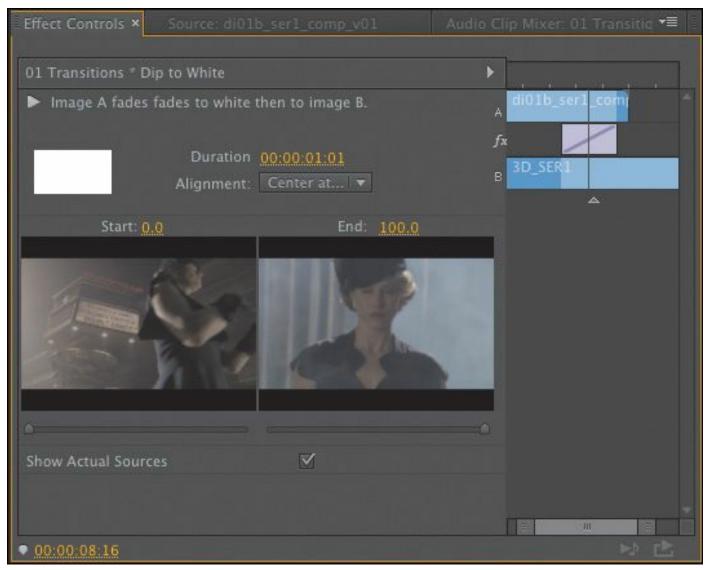
Let's modify a transition.

- 1. Switch back to the sequence 01 Transitions.
- 2. Click the Dip to White transition you added between clips "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

1 and 2.

The Effect Controls panel opens with the transition loaded.

**3.** If necessary, select the Show Actual Sources check box to view frames from the actual clips.



It's now easier to judge changes you make to the transition's source clips.

4. In the Effect Controls panel, click the alignment menu, and switch the effect to Start at Cut.

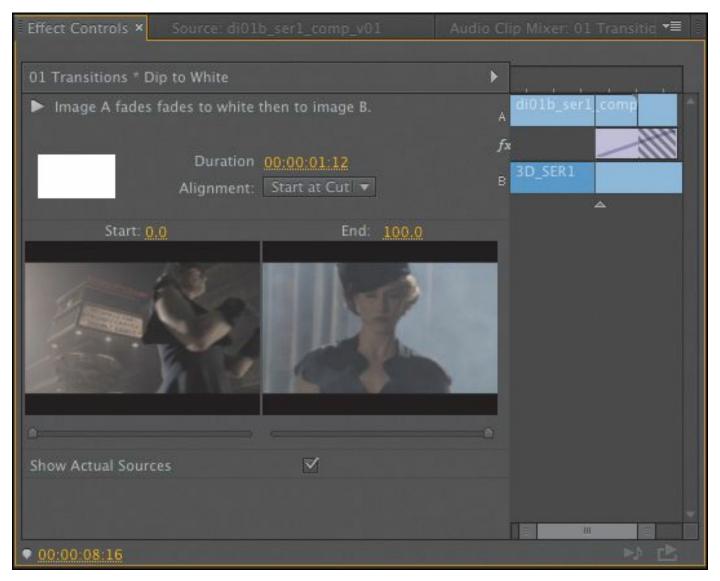
The transition icon switches to show the new position.

5. Click the Play the Transition button to play the transition in the panel.

#### Note

You might need to resize the Effect Controls panel to make the Show/Hide Timeline View button visible. Also, the Effect Controls Timeline may already be visible. Clicking the Show/Hide Timeline View button in the Effect Controls panel toggles it on and off.

**6.** Click the duration field, and enter 1:12 for a 1.5-second duration effect. The diagonal bars (often called zebra stripes) indicate that freeze frames have been inserted.

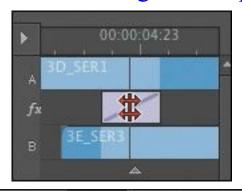


Play the transition to see the changes. Let's customize the next effect.

- 7. Click the transition between clip 2 and clip 3 in the Timeline.
- 8. In the Effect Controls panel, hover the pointer over the edit line at the center of the transition rectangle.

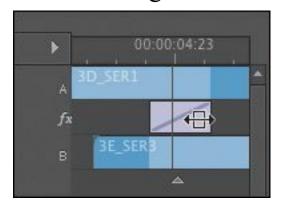
  That's the edit point between the two clips, and the pointer that appears there is the Rolling Edit tool. This tool lets you reposition the edit point.
- 9. Drag the Rolling Edit tool left and right, and note that the changing Out point of the left clip and the changing In "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

point of the right clip show up in the Program Monitor. This is also called *trimming*, and you'll explore it more in Lesson 8, "Advanced Editing Techniques."





10. Move the pointer slightly to the left or right of the edit line, and notice that it changes to the Slide tool.



Using the Slide tool changes the start and end points of the transition without changing its overall length. The new start and end points show up in the Program Monitor, but

unlike using the Rolling Edit tool, moving the transition rectangle by using the Slide tool does not change the edit point between the two clips.

11. Use the Slide tool to drag the transition rectangle left and right.

#### Note

When trimming, it's possible to shorten a transition to a duration of one frame. This can make it hard to grab and position the transition, so try using the Duration and Alignment controls. If you want to remove a transition, select it in the sequence and press Delete.

# Dealing with inadequate (or nonexistent) head or tail handles

If you try to extend a transition for a clip that doesn't have enough frames as a handle, the transition appears but has diagonal warning bars through it. This means Premiere Pro is using a freeze frame to extend the duration of the clip.

You can adjust the duration and position of the transition to resolve the issue.

- **1.** In the Project panel, double-click the sequence called 03 Handles.
- 2. Locate the first edit in the sequence.

  Notice that the two clips on the Timeline have no heads or tails. You can tell this because of the little triangles in the

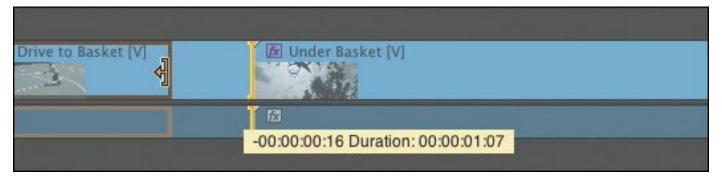
corners of the clips; the triangles indicate the very ends of the clips.





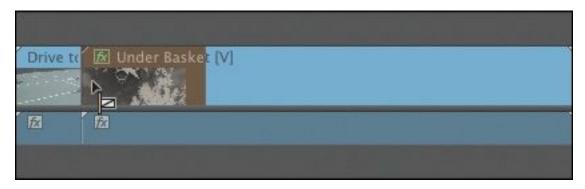
You can position the start time of a dissolve asymmetrically by dragging it. This means you don't have to settle for the Centered, Start at Cut, or End at Cut options. You can drag the position of a transition effect directly on the Timeline too – no need to use the Effect Controls panel.

3. Using the Ripple Edit tool (on the Tools panel), drag the right edge of the first clip to the left. Drag to shorten the duration of the first clip to about 1:10, and then release.



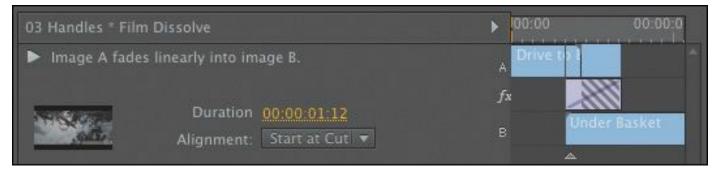
The clip after the edit point ripples to close the gap. Notice that the little triangle at the end of that clip is no longer visible.

**4.** Drag a Film Dissolve effect onto the edit point between the two clips.

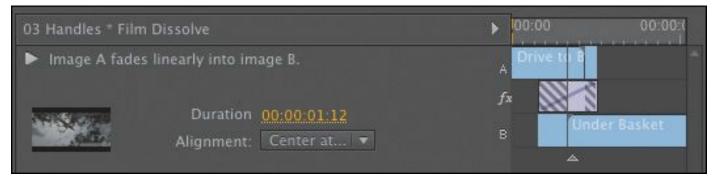


You can only drag the transition to start at the edit point, because there's no handle available to create a dissolve overlapping the end of the clip without using freeze frames.

- 5. With the standard Selection tool, click the transition to load it in the Effect Controls panel. You may need to zoom in to make it easier to select a transition.
- **6.** Set the duration of the effect to 1:12.



7. Change the alignment of the transition to Center at Cut.



In the Effect Controls panel, notice that the transition rectangle has parallel diagonal lines running through it, indicating the lack of head frames. This means you'll see

a freeze frame for that part of the effect.

- **8.** Drag the playhead slowly through the transition, and watch the result:
  - For the first half of the transition (up to the edit point), the B clip is a freeze frame, while the A clip continues to play.
  - At the edit point, the A clip and the B clip start to play.
  - After the edit, a short freeze frame is used.
- **9.** There are several ways to fix the issue:
  - You can change the duration or alignment of the effect.
  - You can use the Rolling Edit tool to reposition the transition.
  - You can use the Ripple Edit tool to shorten a clip.





#### Rolling Edit tool

Ripple Edit tool

You'll learn more about the Rolling Edit and Ripple Edit tools in Lesson 8.



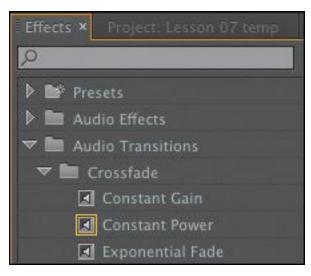
Using the Rolling Edit tool lets you move the transition left or right but does not change the

## Adding audio transitions

Audio transitions can dramatically improve a sequence's soundtrack by removing unwanted audio pops or abrupt edits. The use of a crossfade transition at the end of (or between) audio clips is a fast way to add a fade-in, a fade-out, or a fade between your audio clips.

## Creating a crossfade

Because all audio is different, you'll find three styles of crossfades to choose from. The subtle differences between the types are important to understand if you want to create a professional mix.



#### Constant Gain:

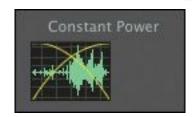
The Constant Gain crossfade (as its name implies) transitions audio by using a constant audio gain (volume) between the clips. Some find this transition type useful. It can, however, create a very sudden transition in the audio as the sound of the outgoing clip fades out and the

incoming clip then fades in at an equal gain. The Constant Gain crossfade is most useful in situations where you do not want much blending between two clips but rather more of a dip out and in between the clips.



#### • Constant Power:

The default audio transition in Premiere Pro creates a smooth, gradual transition between two audio clips. The Constant Power crossfade works very similarly to a video dissolve. When this crossfade is applied, the outgoing clip fades out slowly at first and then faster toward the end of the clip. On the incoming clip, the opposite occurs. The audio level increases quickly at the start of the incoming clip and more slowly toward the end of the transition. This crossfade is useful in most situations where you want to blend the audio between two clips.



#### Exponential Fade:

This effect is similar to the Constant Power crossfade.

The Exponential Fade transition is a fairly smooth fade between clips. It uses a logarithmic curve to fade out and fade up audio. This results in very good natural blending between audio clips. Some prefer the Exponential Fade transition when performing a single-sided transition (such "\*\*\*\*\*ebook converter DEMO - www.ebook-

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as fading in a clip from silence at the start or end of a program).



## Applying audio transitions

There are several ways to apply an audio crossfade to a sequence. You can, of course, drag and drop an audio transition just as you would a video transition, but there are useful shortcuts to speed up the process.

Audio transitions have a default duration, measured in seconds.

You can change the default duration by choosing Edit >

Preferences > General (Windows) or Premiere Pro >

Preferences > General (Mac OS).

Let's take a look at the three methods of applying audio transitions.

- 1. Double-click to load the sequence 04 Audio. The sequence has several audio clips.
- 2. In the Audio Transitions bin in the Effects panel, open the Crossfade bin.
- **3.** Drag the Exponential Fade transition to the start of the first audio clip.
- **4.** Move to the end of the sequence.
- 5. Right-click the final edit point in the Timeline and choose Apply Default Transitions.



Premiere Pro adds a new video and audio transition. To add only an audio transition, hold down the Alt (Windows) or Option (Mac OS) key when right-clicking. The Constant Power transition is added to the end audio clip as a transition to create a smooth blend as the audio ends.

- 6. You can change the length of a transition by dragging its edge in the Timeline. Drag the length of the audio transition longer now, and listen to the effect when you play the Timeline.
- 7. To polish the project, add a Video Dissolve transition to the beginning and end of the sequence. Move the playhead near the beginning, select the first clip, and press Control+D (Windows) or Command+D (Mac OS) to add the default video transition.

Repeat this for the end of the last clip in the sequence. This will create a fade from black at the beginning and a fade to black at the end. Now let's add a series of short audio dissolves to smooth out the background sound.

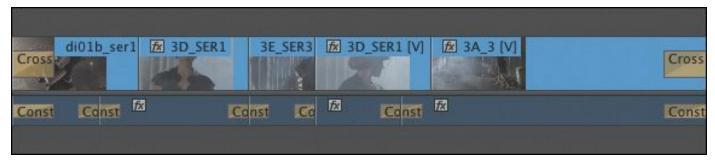
8. With the Selection tool, hold down the Alt (Windows) or Option (Mac OS) key and lasso all of the audio clips on track Audio 1. The Alt (Windows) or Option (Mac OS)

key lets you temporarily unlink the audio clips from the video clips to isolate the transitions. Drag from below the audio clips to avoid accidentally selecting items on the video track.

#### Tip 🕟

Shift+Ctrl+D (Windows) or Shift+Command+D (Mac OS) is the keyboard shortcut for adding the default audio transition to an edit point near the playhead. Track selection (or clip selection) is used to work out where the effect should be applied.

**9.** Choose Sequence > Apply Default Transitions to Selection.



10. Play the Timeline and evaluate the changes you made.

#### Note

The selection of clips does not have to be contiguous. You can Shift-click clips to select only a portion of the clips on the Timeline.

## **Review questions**

- 1. How can you apply the default transition to multiple clips?
- 2. How do you track down a transition by name?
- 3. How do you replace a transition with another one?
- 4. Explain three ways to change the duration of a transition.
- 5. What is an easy way to fade audio at the beginning or end of a clip?

#### **Review answers**

- Select clips already on the Timeline and choose Sequence
   Apply Default Transitions to Selection.
- 2. Start typing the transition name in the Contains text box in the Effects panel. As you type, Premiere Pro displays all effects and transitions (audio and video) that have that letter combination anywhere in their names. Type more letters to narrow down your search.
- 3. Drag the replacement transition on top of the transition you're rejecting. The new one automatically replaces the old one.
- 4. Drag the edge of the transition rectangle in the Timeline, do the same thing in the Effect Controls panel's A/B timeline, or change the Duration value in the Effect Controls panel.
- 5. An easy way to fade audio in or out is to apply an audio crossfade transition to the beginning or end of a clip.

# 8. Advanced Editing Techniques

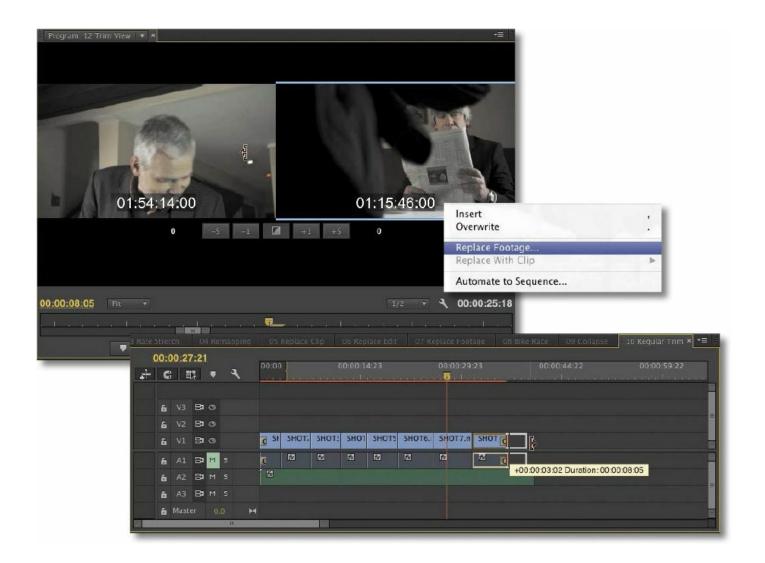
#### **Lesson overview**

In this lesson, you'll learn about the following:

- Performing a four-point edit
- Changing the speed or duration of clips in your Timeline
- Replacing a clip in your Timeline with a new shot
- Permanently replacing footage in a project
- Creating a nested sequence
- Performing basic trimming on media to refine edits
- Implementing slip and slide edits to refine your clips' position or content
- Dynamically trimming media using keyboard shortcuts



This lesson will take approximately 90 minutes.



The basic editing commands in Adobe Premiere Pro CC are relatively easy to master. Several advanced techniques, though, take time to learn. These techniques accelerate editing and provide a level of professional refinement that makes the extra effort to learn them truly worth it.

# **Getting started**

In this lesson, you'll use several short sequences to explore advanced editing concepts in Adobe Premiere Pro CC. The goal here is to get hands-on with the techniques you'll need for advanced editing.

For this lesson, you'll use a new project file.

1. Start Premiere Pro, and open the project Lesson 08.prproj.

The sequence 01 Four Point should already be open, but if it's not, open it now.

**2.** Choose Window > Workspace > Editing.

This changes the workspace to the preset that the Premiere Pro development team created to make it easier to work with transitions and effects.

## Four-point editing

In previous lessons, you used the standard technique of three-point editing. You used three In and Out points (split between the Source Monitor as well as the Program Monitor or Timeline) to describe the source, duration, and location of an edit.

But what happens when you have four points defined?

The short answer is that you have a discrepancy that must be resolved. Most likely, the duration you've set in the Source Monitor differs from the duration you've chosen in the Program Monitor or Timeline. At this point, Premiere Pro alerts you to the discrepancy and asks you to make an important decision.

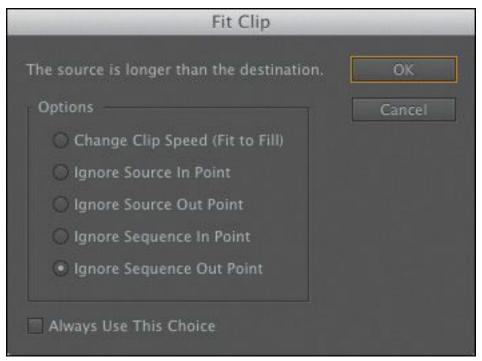
# Tip 👅

A four-point edit is often a mistake caused by setting too many points. The reason to use one is when you want to define which parts of a source clip should be used as well as define a different duration that you need the footage to fill in the

Timeline. In this case, you will use the Change Clip Speed option (also called Fit to Fill).

## **Editing options for four-point edits**

If you've defined a four-point edit, Premiere Pro opens the Fit Clip dialog to alert you to the problem. You'll need to choose from five options to resolve the conflict. You can ignore one of the four points or change the speed of the clip.



- Change Clip Speed (Fit to Fill): The first choice assumes that you set four points deliberately. Premiere Pro preserves the source clip's In and Out points but adjusts its playback speed to match the duration you set with the In and Out points in the Timeline or Program Monitor.
- Ignore Source In Point: If you choose this option, the source clip's In point is ignored, converting your edit back to a three-point edit. When you have an Out point

and no In point in the Source Monitor, the In point is worked out based on the duration set in the Timeline or Program Monitor (or the end of the clip). This option is available only if the source clip is longer than the range set in the sequence.

- Ignore Source Out Point: When you select this option, the source clip's Out point is ignored, converting your edit back to a three-point edit. When you have an In point and no Out point in the Source Monitor, the In point is worked out based on the duration set in the Timeline or Program Monitor (or the end of the clip). This option is also available only if the source clip is longer than the targeted duration.
- Ignore Sequence In Point: This choice tells Premiere Pro to ignore the In point you've set in the sequence and perform a three-point edit using only the sequence Out point. The duration is taken from the Source Monitor.
- Ignore Sequence Out Point: This option is similar to the previous one. It tells Premiere Pro to ignore the Out point in the sequence you set and perform a three-point edit. Again, the duration is taken from the Source Monitor.

## Making a four-point edit

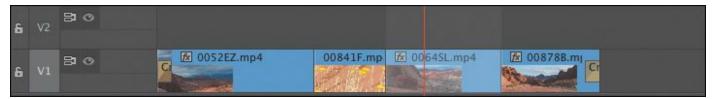
Let's make a four-point edit. We'll change the duration of the clip to match the duration set in the sequence.

1. If it's not loaded already, locate 01 Four Point in the Project panel and load the sequence.

We want to cut a new shot into this rough edit. The clip we'll use is a different duration than what's needed for the

cutaway angle.

2. Scroll through the sequence and locate the section with In and Out marks already set. You should see a highlighted range in the Timeline.



- 3. Locate the bin called Clips to Load, and load the Desert New clip into the Source Monitor.
  - Clip In and Out points should already be set.
- 4. Check the Source Track Selection buttons in the Timeline panel. Make sure the source video track is patched to track V1 (drag and drop to reposition the Source Track Selection button if you need to).



- 5. Click the Overwrite button to make the edit.
- **6.** In the Fit Clip dialog, choose the Change Clip Speed (Fit to Fill) option, and click OK.

Premiere Pro applies the edit. On the Desert New clip in the sequence, you'll see numbers that show the new playback speed.



7. Watch the sequence to see the effects of your edit and the speed change.

## Tip 🕟

You can choose to set a default behavior when a four-point edit occurs. Just choose the desired standard and select the Always Use This Choice option at the bottom of the Fit Clip dialog. If you change your mind, open the Premiere Pro General Preferences and select the option "Fit Clip dialog opens for edit range mismatches."

## **Retiming clips**

You might change the speed of a clip for technical reasons or for artistic impact. A Fit to Fill edit is just one way to change clip playback speed.

Slow motion is one of the most often used effects in video production. It can be an effective way to add drama or to give the viewer more time to study or savor a moment. We're going to review fixed speed changes, the time-remapping feature, and some other options that let you make changes to clip playback speed.

## Changing the speed/duration of a clip

Although it's more common to slow clips down, speeding up clips is a useful effect as well. The Speed/Duration command can change the playback speed for a clip in two very different ways. You can set the duration of a clip to match a certain time, or you can set the playback speed as a percentage.

For example, if you set a clip to play at 50% speed, it will play back at half speed. 25% would be one quarter speed. Premiere Pro allows you to set playback speeds up to two decimal places, so you could have 27.13% if you want.

Let's explore this technique.

- **1.** In the Project panel, load the sequence 02 Speed/Duration.
- 2. Right-click the Eagle\_Walk clip, and choose Speed/Duration from the context menu. Alternatively, you can select the clip in the Timeline and choose Clip > Speed/Duration.
- 3. You now have several options to control how the clips play back. Consider these choices:



- Leave Duration and Speed ganged together (the chain icon between them). This means that changing one updates the other.
- Click the link icon so that it shows a broken link. Now, if you enter a new speed, the duration won't update, with one exception: If a new, higher speed reduces the duration so much that *all* of the original clip media is used and the result is shorter than the Timeline clip, then the Timeline clip will shorten to fit. This way, you won't have blank video frames in your sequence.
- Once the settings are unganged, you can also change duration without changing speed. If there's another clip immediately after this one on the Timeline, shortening a clip will leave a gap. By default, if you make the clip longer than the space available, the speed change will have no effect. That's because the clip can't move the next clip to make room for the new duration when you change these settings. If you select the Ripple Edit, Shifting Trailing Clips option, you'll enable the clip to make space for itself.
- To play a clip backward, select the Reverse Speed option. You'll see a negative symbol next to the new speed displayed in the sequence.
- If you're changing the speed of a clip that has audio, consider selecting the Maintain Audio Pitch check box. This will keep the clip's original pitch at the new speed. With this option disabled, the pitch will naturally go up or down. This option is really effective for small speed changes; dramatic resampling can

produce unnatural results.

- 4. Make sure the Speed and Duration are linked (with the chain icon on), change the speed to 50%, and click OK. Play the clip in the Timeline. Render the clip by pressing Enter to see smooth playback. Notice that the clip is now 10 seconds long. That's because you slowed the clip to 50%: Half playback speed means twice the original length.
- **5.** Choose Edit > Undo or press Control+Z (Windows) or Command+Z (Mac OS).
- **6.** With the clip selected, press Control+R (Windows) or Command+R (Mac OS) to open the Clip Speed/Duration dialog.
- 7. Click the chain icon to make sure Speed and Duration settings are unlinked (shown here). Then change Speed to 50%.



Notice that with Speed and Duration unlinked, the duration remains five seconds.

#### Note

The Clip Speed/Duration dialog shows a Maintain Audio Pitch option if the clip has audio. Selecting this option keeps audio at the original pitch regardless of the speed at which the clip is running. This can be helpful when making small speed adjustments to clips when you want to maintain pitch in the audio or keep a character's voice at its normal pitch, even as it slows down or speeds up.

**8.** Click OK; then play the clip.

Notice that the clip plays at 50% speed, but the last five seconds have automatically been trimmed to keep the clip at its original duration.

Occasionally you'll need to reverse time. You can do this in the same Clip Speed/Duration dialog.

- 9. Open the Clip Speed/Duration dialog again.
- 10. Leave Speed at 50%, but this time select the Reverse Speed option; then click OK.
- 11. Play the clip. Now it plays in reverse at 50% slow motion.

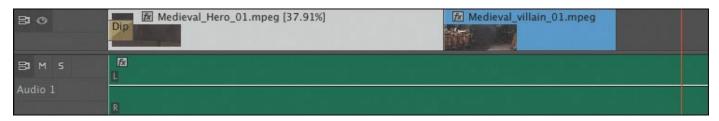
## Tip 🕟

Premiere Pro has the ability to change the speed of multiple clips at the same time. Simply select multiple clips and go to the Clip menu to choose Speed/Duration. When you change the speed of multiple clips, be sure to pay attention to the Ripple Edit, Shifting Trailing Clips option. This will automatically close or expand gaps for all of the selected clips after the speed change.

# Changing speed and duration with the Rate Stretch tool

Sometimes you'll search for a clip that's just the right length to fill a gap in your Timeline. Often, you'll find a clip that's just a little too short or a little too long. This is where the Rate Stretch tool comes in handy.

- 1. In the Project panel, load the sequence 03 Rate Stretch. The situation in this example is fairly common. The Timeline is synchronized to music, and the clips contain the content you want, but the clips are just too short. You can make a guess and try to make an exact Speed/Duration adjustment, but it's much easier and faster to use the Rate Stretch tool to drag the end of the clip to fill the gap.
- 2. Select the Rate Stretch tool ( ) in the Tools panel.
- 3. With the Rate Stretch tool selected, drag the right edge of the first video clip until it meets the second video clip. The speed of the first clip changes to fill the space into which you stretched it. The contents haven't changed; the clip is playing more slowly.



- 4. Drag the right edge of the second clip until it meets the third clip.
- 5. Drag the right edge of the third clip until it matches the end of the audio.
- **6.** Play the Timeline to view the result.
- 7. Press the V key or click the Selection tool to select it.

## Tip 👅

If you change your mind about the Rate Stretch tool, you can always use it to stretch a clip back. Alternatively, you can use the Speed/Duration command and enter a Speed of 100% to restore natural motion.

# Changing speed and duration with time remapping

Time remapping lets you vary the speed of a clip by using keyframes. This means one portion of a clip could play in slow motion while another portion of the same clip plays in fast motion.

In addition to giving you flexibility, variable-speed time remapping enables you to smoothly transition from one speed to another, whether from fast to slow or from forward motion to reverse motion.

1. In the Project panel, load the sequence 04 Remapping.

The sequence has a single shot. As you add time adjustments to the clip, it will change length.

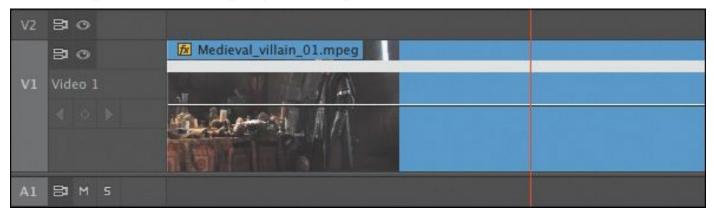
2. Adjust the height of the Video 1 track by positioning the Selection tool over the horizontal divider between the audio and video tracks. Drag down to make more room to see the video tracks.



Increasing the track height makes adjusting keyframes on the clip right in the Timeline much easier.

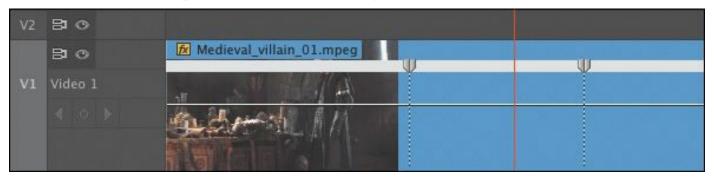
**3.** Right-click the clip, and choose Show Clip Keyframes > Time Remapping > Speed.

With this option selected, the white line across the clip represents the playback speed.

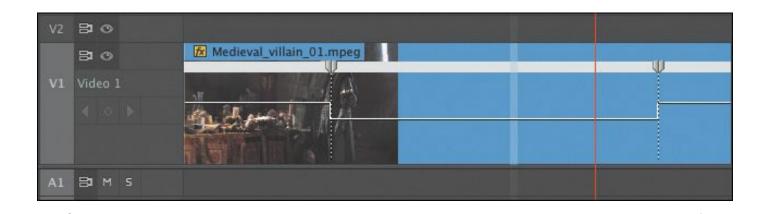


**4.** Drag the playhead on the Timeline to the point where the villain turns and starts walking across the room (about 00:00:10:00).

- 5. Press and hold the Control (Windows) or Command (Mac OS) key as you hover your mouse over the white line. The pointer changes to a small cross.
- **6.** Click the white line to create a keyframe, visible at the top of the clip.
  - You're not changing the speed yet; you're just adding keyframes.
- 7. Using the same technique, add another speed keyframe at about 00:00:17:00, just as the villain points to the wall. By adding those two speed keyframes, you've divided the clip into three "speed sections." You will now set different speeds between keyframes.



- 8. Leave the first section, between the beginning of the clip and the first keyframe, with the default Speed setting of 100%.
- **9.** Position the Selection tool over the white line between the first and second keyframes, and drag it down to approximately 30%.
  - The clip stretches in length to accommodate the speed change.



#### Note

If you have problems setting the speed keyframes, open the 04 Remapping Complete sequence to see the completed process.

- 10. Choose Sequence > Render Effects In to Out to render the clip for the smoothest playback. If you have the Timeline Work Area option enabled, this menu option changes to Sequence > Render Effects in Work Area.
- 11. Play the clip. The speed changes from 100% to 30% and back to 100% at the end.

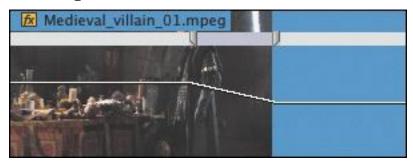
Setting variable speed changes on a clip can be a very dramatic effect. So far, you have created a speed change that switches from one speed to another instantly. That can be highly effective, but it's possible to smoothly transition from one speed to another by adjusting the speed keyframes.

#### o Note

To remove a time-remapping effect, select the clip and view the Effect Controls panel. Click the

disclosure triangle next to the Time Remapping effect to open it. Click the toggle animation button (stopwatch) next to the word Speed. This sets it to the off position. A warning dialog appears. Click OK to remove the effect.

12. Speed keyframes are actually in two halves. You can drag to separate them. Try it now: Drag the right half of the first speed keyframe to the right to create a speed transition ramp.



The white line ramps down now, rather than making a sudden change from 100% to 30%.

13. Drag the left half of the second speed keyframe to create a transition there as well.

#### o Note

You may need to adjust the height of the Video 1 track by positioning the Selection tool over the Video 1 track header and dragging the edge of the track up. This gives you more visible control over the keyframes.

14. Right-click the video clip, and choose Frame Blend. This

smooths playback when changing the speed.

**15.** Render and play the clip to see the effect.

#### Tip 🕟

With a Speed keyframe selected, you can drag the blue Bezier handles to improve the ramping to further smooth out the transition.

# Recognizing the downstream effects of changing time

You may decide to change the speed at the beginning of the Timeline after assembling many clips in your sequence. It's important to understand how changing the speed of a clip affects the rest of the clips "downstream." Speed changes can create several issues in your sequence:

- Unwanted gaps caused by clips growing shorter because they are playing faster than they did originally
- Unwanted duration changes to the overall sequence because of the Ripple Edit option
- Potential audio problems created by changes in speed—including changing pitch

When you're making speed or duration changes, be careful to view the overall impact on the sequence. You may want to change the zoom level of the Timeline to view the entire sequence or segment at

once. Another option is to edit the clip into a new, separate sequence, and adjust it there. Then you can copy and paste the clip to put it back into the original sequence. This can help you focus on the clip you're adjusting.

# Replacing clips and footage

During the editing process, you'll frequently want to swap one clip for another. This might mean making a global replacement, such as replacing one version of an animated logo with a newer file. You might also want to swap out one clip in your sequence for another that you have in a bin. Depending on the task at hand, there are a few methods to swap shots or media.

#### Dragging in a replacement clip

One method for replacing a clip in a sequence is to drag the new shot onto the existing clip you'd like to replace. This is called a replace edit.

#### Let's try it:

- 1. In the Project panel, load the sequence 05 Replace Clip.
- 2. Play back the Timeline.

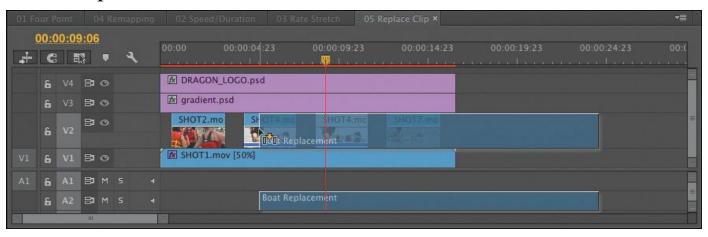
Notice that the same clip is played twice as a picture-inpicture (PIP) for clips two and three. The clip has some animated motion keyframes that cause it to spin onto the screen and then spin off. You'll learn how to create these kinds of effects in the next lesson.

We want to replace the first instance of the clip (SHOT4) in the V2 track with a new clip called Boat Replacement.

But we don't want to have to re-create all the effects and animation. This is a perfect scenario for using the Replace Clip feature.

3. In the bin Clips to Load, locate the Boat Replacement clip and drag it on top of the first SHOT4 clip—but don't drop it yet.

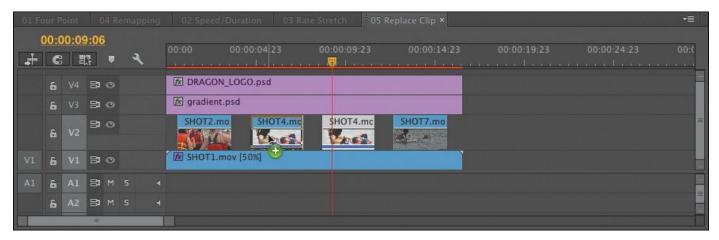
Notice that the clip is longer than the existing clip in the sequence.



# Tip 🕟

The purple lines on two clips in this picture indicate duplicate frames. Premiere Pro can warn you if two shots are repeated in the same sequence. To see these useful warning lines, click the Settings button (wrench icon) in the Timeline and choose Show Duplicate Frame Markers.

4. Hold Alt (Windows) or Option (Mac OS).



The replacement clip now fits the exact length of the clip it's replacing. Release the mouse button to complete the Replace Clip function.

5. Play the Timeline. All the PIP clips have the same effect applied to different footage. The new clip inherited the settings and effects from the clip it replaced.

#### Tip 🏲

If you want to adjust what portion of the clip is used for the first PIP, you could use the Slip tool to slide its contents. You'll learn how to use this tool later in the lesson.

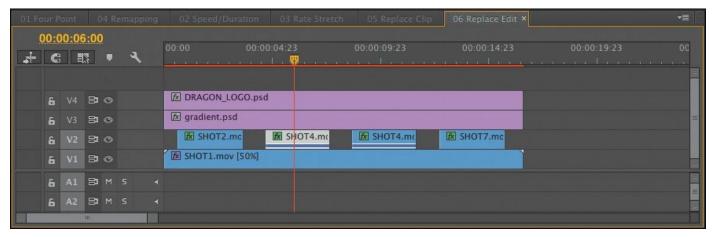
# Making a replace edit

When you drag and drop a clip to perform a replace edit, Premiere Pro synchronizes the first frame (or In point) of the replacement clip with the first visible frame of the clip in the sequence. This is often fine, but what if you need to synchronize a particular moment in the action, like a handclap or a door closing?

If you'd like to have more control over a replace edit, you can "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

use the Replace Edit command. This allows you to synchronize a part of the replacement clip with a part of the clip it is replacing. Let's try this:

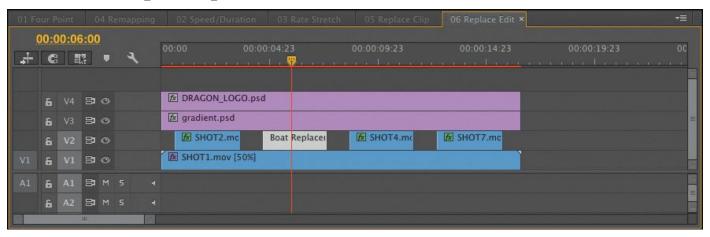
- 1. In the Project panel, load the sequence 06 Replace Edit. This is the same sequence you previously fixed, but this time you'll position the replacement clip precisely.
- 2. Place the playhead in the sequence at approximately 00:00:06:00. The playhead will be the sync point for the edit.
- 3. Click the first instance of the SHOT4 clip in the Timeline to select it as the target for replacement.



- 4. From the Clips to Load bin, load the clip called Boat Replacement into the Source Monitor.
- 5. In the Source Monitor, position the playhead to choose a good piece of action for the replacement. There's a marker on the clip for guidance.



6. Make sure the Timeline panel is active, with the first instance of SHOT4.mov selected, and choose Clip > Replace With Clip > From Source Monitor, Match Frame. The clip is replaced.



7. Play the newly edited sequence to check the edit.

The playhead position in the Source Monitor and Program Monitor was synchronized. The sequence clip duration, effects, and settings are all applied to the replacement

clip. This technique can be a huge time saver!

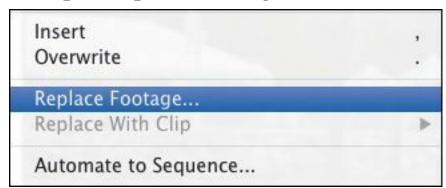
#### Using the Replace Footage feature

The Replace Footage feature replaces footage in the Project panel so that the clip links to a different media file. This can be of great benefit when you need to replace a clip that occurs several times in a sequence or in multiple sequences. You might use this to update an animated logo or a piece of music.

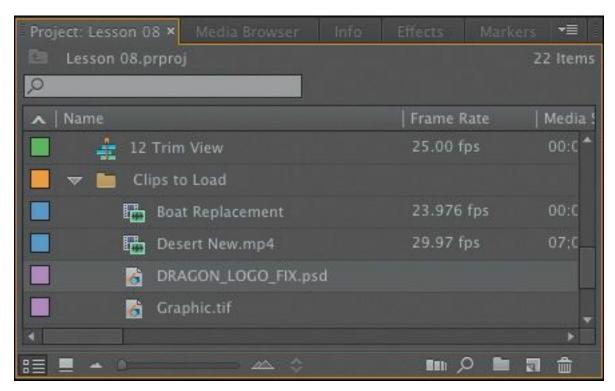
When you use Replace Footage, all instances of the clip you replace are changed anywhere the clip was used.

- 1. Load the sequence 07 Replace Footage.
- 2. Play the sequence.

  Let's replace the graphic with something more interesting.
- 3. In the Clips to Load bin, select the clip DRAGON LOGO.psd in the Project panel.
- **4.** Choose Clip > Replace Footage.



**5.** Navigate to the Lessons/Assets/Graphics folder, and choose the DRAGON\_LOGO\_FIX.psd file. You can double-click to select it.



6. Play the Timeline. The graphic has been updated throughout the sequence and project. Even the clip name in the Project panel has updated to match the new file.



#### Note

The Replace Footage command cannot be undone. If you want to switch back to the original clip, choose Clip > Replace Footage again to navigate to and relink the original file.

# **Nesting sequences**

A nested sequence is a sequence contained within another sequence. You can break up a long project into more manageable parts by creating separate sequences for each

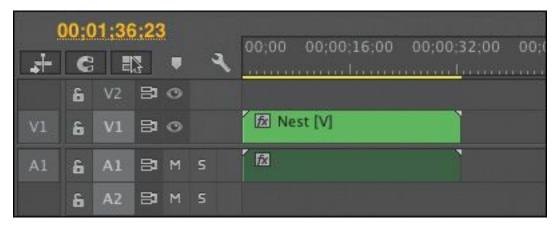
section. Then, you can drag each sequence—with all its clips, graphics, layers, multiple audio/video tracks, and effects—into another, "master" sequence. Nested sequences look and behave like single audio/video clips, but you can edit their contents and see the changes update inside the master sequence.

Nested sequences have many potential uses:

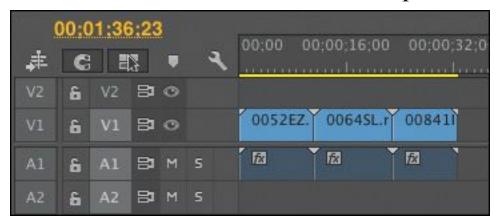
- They simplify editing by allowing you to create complex sequences in separate parts. This can help you avoid running into conflicts or accidentally moving clips and ruining your edit.
- They allow you to apply an effect to a group of clips in a single step (you'll learn more about this in the next lesson).
- They let you re-use sequences as a source in multiple sequences. You can create one intro sequence for a multipart series and add it to each episode. If you need to change the intro sequence, you can do so once and see the results update everywhere it's nested.
- They allow you to organize your work in the same way you might create subfolders in the Project panel.
- They allow you to apply transitions to a group of clips as a single item.

The Timeline panel has a Nest Source Sequence toggle option to choose between two ways of editing one sequence into another. Toggle this option on to nest sequences or off to add the contents of the sequence instead.

For example, if you have the toggle on ( ), dragging one sequence into another will create a nest.



If you have the toggle off ( ), dragging one sequence into another will add the contents of the second sequence.



#### Adding a nested sequence

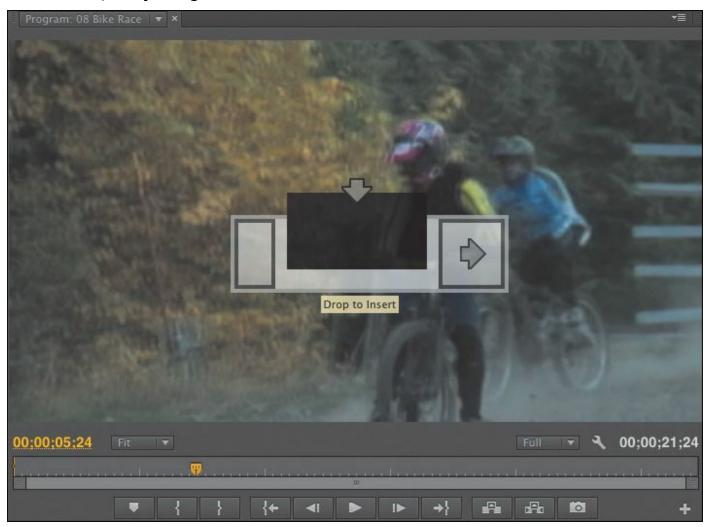
One reason to use a nest is to re-use an existing edited sequence. Let's add an edited opening title into a sequence now.

- 1. Open the sequence 08 Bike Race and make sure the Nest Source Sequence toggle button is on.
  - This sequence contains an edited bike race that was created using multicamera editing techniques that you'll explore in <u>Lesson 10</u>.
- 2. Set an In point at the start of the sequence.
- **3.** Make sure that track V1 is targeted in the sequence loaded in the Timeline.
- **4.** In the Project panel, find the sequence 08A Race Open. "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

**5.** Drag the sequence 08A Race Open over the Program Monitor.

A tool tip appears prompting you to choose the type of edit you want to make.

**6.** Hold down the Control (Windows) or Command (Mac OS) key to perform an insert edit.



- 7. Release the key to perform an insert edit and add the graphic open to your sequence.
- **8.** Play the 08 Bike Race sequence to see the result. The 08A Race Open sequence is added as a single clip, even though it contains multiple video tracks and audio clips.

#### Tip 🕟

A quick way to create a nested sequence is to drag a sequence from the Project panel into the appropriate track or tracks of the active sequence. You can also drag a sequence into the Source Monitor, apply In and Out points, and use the standard Insert and Overwrite commands.

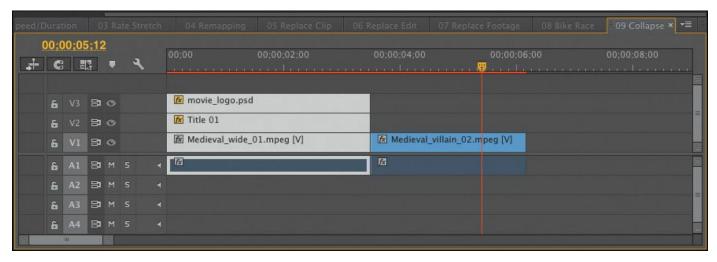
# Nesting clips already in a sequence

In the previous exercise, you nested an entire sequence in another sequence. It's also possible to select a group of clips already in a sequence and nest them into a new sequence that takes their place on the Timeline. It does not have to be all the clips in the sequence. This can be useful for collapsing a section of a sequence into a single nested sequence that you can work with as a single clip.

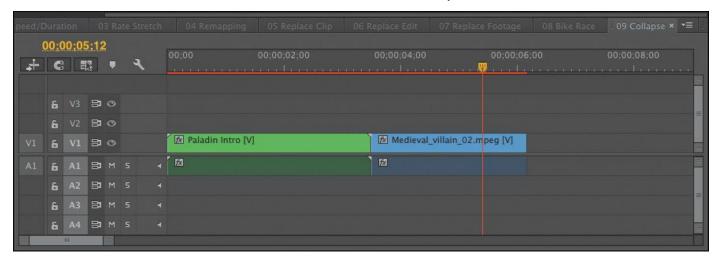
- 1. In the Project panel, load the sequence 09 Collapse.

  Let's create a Cube Spin transition at the edit point between the Medieval\_wide\_01 and Medieval\_villain\_02 clips. We want to incorporate the two title layers into the transition, but they are on separate tracks.

  Let's nest them.
- 2. Shift-click or lasso the three clips that make up the first segment—movie\_logo.psd, Title 01, and Medieval\_wide 01—to select them.



- 3. Right-click the selected clips, and choose Nest.
- 4. Name the new nest Paladin Intro, and click OK.



The three clips are collapsed to a single nested clip. Play the clip to see that the nest contains the three clips.

- **5.** In the Effects panel, click the Video Transitions folder to open it. Then open the 3D Motion subfolder.
- **6.** Drag the Cube Spin transition to the edit point between the two clips.
- 7. Play the sequence to see the impact of your work.

  If necessary, render the sequence for smoother playback.



If you need to make a change to a nested sequence, simply double-click a nested sequence clip to open the sequence.

# Regular trimming

You can adjust the length of a clip in a sequence in several ways. This process is generally called *trimming*. When you trim, you can make the selected part of the original clip shorter or longer. Some trimming types affect a single clip, whereas others adjust the relationship between two adjacent clips.

#### **Trim in the Source Monitor**

If you view a sequence clip in the Source Monitor, you can easily adjust its In and Out points and the clip will update in the sequence. There are two basic ways of changing existing In and Out points in the Source Monitor:

- Mark new In and Out points: Simply add new In or Out points. Double-click a clip on the Timeline to load it. With the clip loaded, position the playhead and press the I or O key for In or Out. Alternatively, you can use the Mark In and Mark Out buttons at the bottom of the Source Monitor. If the clip has another clip adjacent to it in the Timeline, you can only make it shorter, leaving a gap on the side where you made the trim.
- **Drag In and Out points:** You can change the In and Out points by dragging them. Simply place your cursor over an In or Out point in the mini Timeline at the bottom of the Source Monitor. The cursor changes into a red-and-

black icon, indicating that a trim can be performed. You can drag left or right to change the In or Out point. Once again, if the clip has another clip adjacent to it on the Timeline, you can only make it shorter, and a gap will appear on the side after making a trim.

# Trim in a sequence

Another, faster way to trim clips is directly on the Timeline. Making a single clip shorter or longer is called a regular trim, and it's fairly easy:

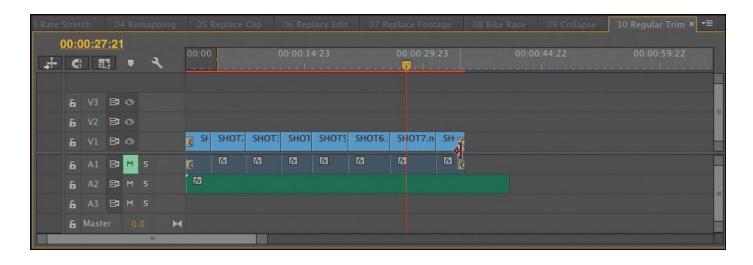
- 1. In the Project panel, load the sequence 10 Regular Trim.
- 2. Play the sequence.

The last shot is cut off, and it needs to be extended to match the end of the music.

#### Note

A regular trim is also referred to as a single-sided or overwrite trim in other editing applications.

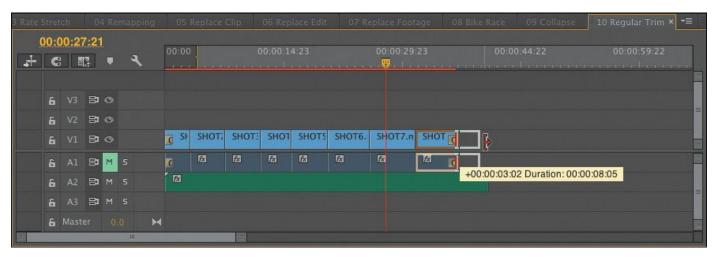
- **3.** Choose the Selection tool (V).
- **4.** Place the pointer over the Out point of the last clip in the sequence.



Music: "Reverie (small theme)," by \_ghost (http://ccmixter.org/files/\_ghost/25389)

The pointer changes into the red Trim In tool (head side) or Trim Out tool (tail side) with directional arrows. Hovering the mouse over the edge of the clip changes it between trimming the Out point (open to the left) or In point (open to the right) of a clip.

5. Drag an edge to the right until it meets the end of the audio file.



A timecode tool tip appears to show you how much you've trimmed the clip.

**6.** Release the mouse button to make the edit.

#### Note

If you make a clip shorter, it will leave a gap between it and any adjacent clips. You'll learn to use the Ripple Edit tool later in this lesson to automatically remove any gaps or push clips later to avoid overwriting them.

#### **Advanced trimming**

The trimming methods you've learned so far have their limitations. They can leave unwanted gaps in the Timeline caused by shortening a clip. They can also prevent you from lengthening a shot if there's an adjacent clip.

Fortunately, Premiere Pro offers several more ways of trimming.

#### Ripple edit

You can avoid creating gaps when trimming by using the Ripple Edit tool ( ). It's one of the many tools in the Tools panel. Use the Ripple Edit tool to trim a clip in the same way you used the Selection tool.

When you use the Ripple Edit tool to change the duration of a clip, the adjustment ripples through the sequence. That is, clips after the clip you adjust slide to the left to fill the gap, or slide to the right to make room for the longer clip.

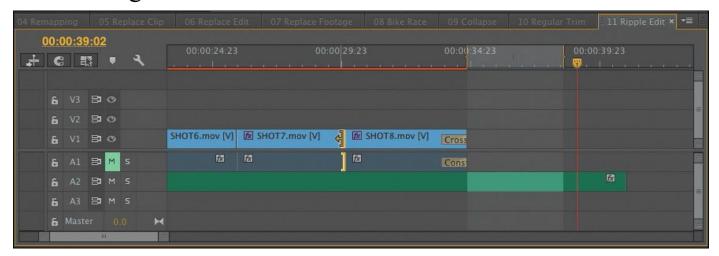
#### Note

When performing a ripple edit, you can knock items on other tracks out of sync. Be sure to pay "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

attention to the use of sync locks for any sequence on which you're using a ripple edit.

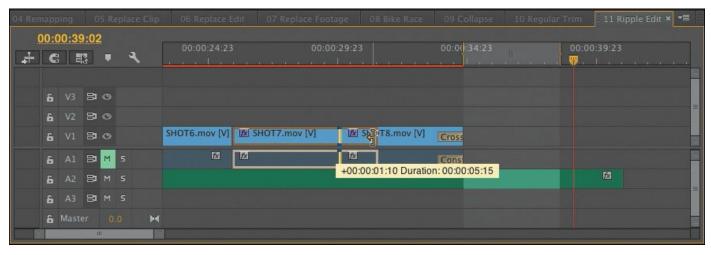
#### Let's try this:

- 1. In the Project panel, open the sequence 11 Ripple Edit.
- 2. Select the Ripple Edit tool (or press B on your keyboard).
- **3.** Hover the Ripple Edit tool over the inside right edge of the seventh clip (SHOT7) until it turns into a yellow, left-facing bracket and arrow.



The shot is too short, so let's add some more footage from the clip.

**4.** Drag to the right until the timecode reads +00:00:01:10.



Notice that while you're using the Ripple Edit tool, the Program Monitor displays the last frame of the first clip on the left and the first frame of the second clip on the right. Watch the moving edit position on the left half of the Program Monitor.



5. Release the mouse button to complete the edit.

The clip expands, and the clip to its right slides along with it. Play that portion of the sequence to see whether the edit works smoothly. The edit has exposed a slight oncamera shake that we'll work on next.



You can temporarily use the Selection tool as a Ripple Edit tool by holding Control (Windows) or Command (Mac OS).

#### Rolling edit

When you used the Ripple Edit tool, it made changes to the overall length of the sequence. This is because one clip got longer or shorter while the rest of the sequence moved to close the gap (or move out of the way).

There's another way to change the location of an edit: a rolling edit.

With a rolling edit, the overall length of the sequence does not change. Instead, a rolling edit shortens one clip and lengthens another at the same time, simultaneously adjusting them by the same number of frames.

For example, if you use the Rolling Edit tool to extend a clip by two seconds, you will also shorten the adjacent clip after it by two seconds.

1. Continue working with the sequence 11 Ripple Edit.

Three clips are already on the Timeline, with enough handle frames to allow the edits you're about to make.

# Note

A rolling edit trim is sometimes referred to as a double roller trim in other editing applications.

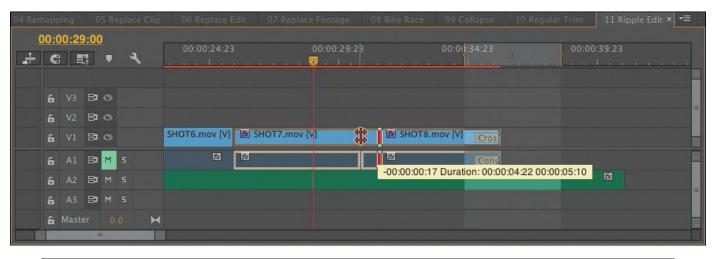
2. Select the Rolling Edit tool (N) ( ) in the Tools panel.



When trimming, it's possible to trim a clip to a zero duration (removing it from the Timeline).

3. Drag the edit point between SHOT7 and SHOT8 (the last two clips on the Timeline). Use the Program Monitor split screen to find a better matching edit between the two shots. Drag left to remove the camera shake.

Try rolling the edit to the left to 00:17 (17 frames). You can use the Program Monitor timecode or the pop-up timecode in the Timeline to find that edit.



#### Tip 👅

Zoom in to the Timeline to make more accurate adjustments.

#### Sliding edits

The slide edit is a special kind of trim. It's not used often but can be a time saver in some situations. The Slide tool works by

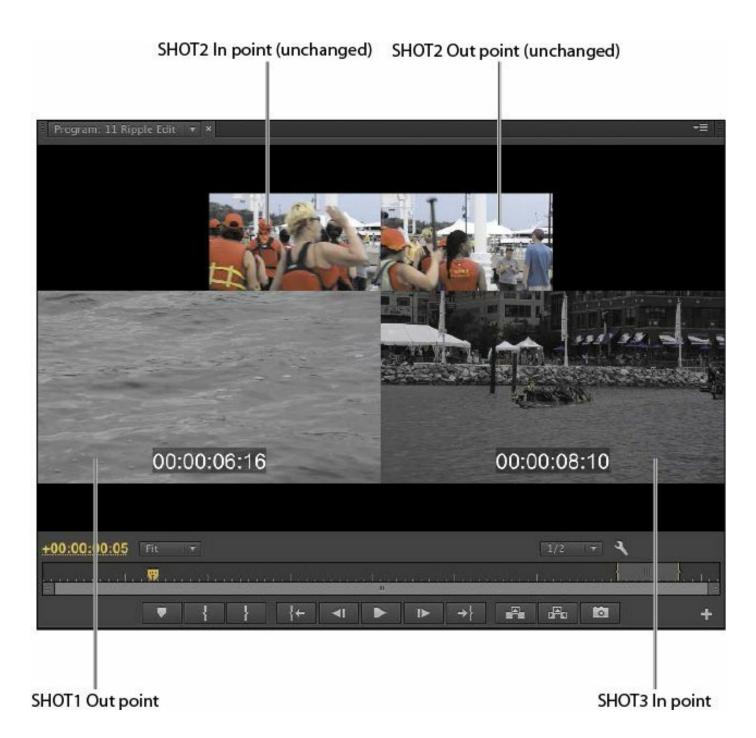
leaving the duration of the clip you're sliding the same. What changes is the Out point of the clip to the left and the In point of the clip to the right. They are modified an equal number of frames.

You slide the clip earlier or later in the Timeline, changing the contents of the shots adjacent to it. The clip's In and Out points remain unchanged, and because you're changing the other clip durations by equal amounts, the length of the sequence doesn't change.

#### Try this:

- 1. Continue working with the sequence 11 Ripple Edit.
- **3.** Position the Slide tool over the second clip in the sequence.
- 4. Drag the second clip left or right.
- **5.** Take a look at the Program Monitor as you perform the slide edit.

The two top images are the In point and Out point of clip B. They do not change. The two larger images are the Out point and In point of the adjacent clips—clip A and clip C, respectively. These edit points change as you slide the selected clip over those adjacent clips.



The Slide tool moves a clip over two adjacent clips.



# Slip edits

A slip trim changes the start and end of a clip at the same time, by the same amount, rolling the visible contents in position. Because a slip edit changes the beginning and end by equal amounts, it doesn't change the duration of your sequence. In this respect, it's the same as rolling trims and slide trims.

Slip trims change only the clip you select, so adjacent clips before or after the clip you click are not affected. Using the Slip tool to adjust a clip is a little like moving a conveyor belt: The visible part of the original clip changes inside the Timeline clip segment without changing the length of the clip or the sequence.

#### Try this:

- 1. Continue working with the sequence 11 Ripple Edit.
- 2. Select the Slip tool (Y) (
- 3. Drag Shot5 left and right.
- **4.** Take a look at the Program Monitor while you perform the slip edit.

The two top images are the Out point and In point of SHOT4 and SHOT6; they don't change. The two larger images are the In point and Out point of SHOT5; these edit points change.



The Slip tool changes the contents of a clip in position.

# **Trimming in the Program Monitor**

If you'd like to trim with a great deal of visual feedback, then you should use the Trim mode of the Program Monitor. This approach allows you to see both the outgoing and incoming frames of the trim you're working on.

You can perform three types of trim in the Program Monitor. You learned about each of these earlier in this lesson:

- Regular trim: This basic type of trim moves the edge of the selected clip. This method trims only one side of the edit point. It moves the selected edit point either forward or backward in the Timeline, but it doesn't shift any of the other clips.
- Roll trim: The roll trim moves the tail of one clip and the head of the adjacent clip. It lets you adjust an edit point (provided there are handles). No gap is created, and the sequence duration doesn't change.
- **Ripple trim:** This moves the selected edge of the edit either earlier or later. Clips after the edit shift to close a gap or make room for a longer clip.

# Using Trim mode in the Program Monitor

When you're in Trim mode, some of the Program Monitor controls change to make it easier to focus on trimming. To use Trim mode, you need to activate it by selecting an edit point between two clips. There are three ways to do this:

- Double-click an edit point on the Timeline with a selection tool or trimming tool.
- Press the T key. The playhead will move to the nearest edit point and Trim mode will open in the Program Monitor.
- Drag around one or more edits using the Ripple Edit tool or Rolling Edit tool to select them and open the Program Monitor to Trim mode.

When invoked, Trim mode shows two video clips. The box on the left shows the outgoing clip (also called *A side*). The box on the right shows the incoming clip (also called *B side*). Below the frames are five buttons and two indicators.



- **A.** Out Shift counter: Shows how many frames the Out point for the A side has changed.
- **B. Trim Backward Many:** When clicked, this performs the selected trim, adjusting by multiple frames earlier. The size of the adjustment depends on the Large Trim Offset option in the Trim Preferences tab of Preferences.

- **C. Trim Backward:** This performs the selected trim, adjusting by one frame at a time earlier.
- **D.** Apply Default Transitions to Selection: This applies the default transition (usually a dissolve) to video and audio tracks that have their edit points selected.
- **E. Trim Forward:** This is like Trim Backward except it adjusts the edit one frame later.
- **F. Trim Forward Many:** This is like Trim Backward Many except it adjusts the edit multiple frames later.
- **G.** In Shift counter: Shows how many frames the In point for the B side has changed.

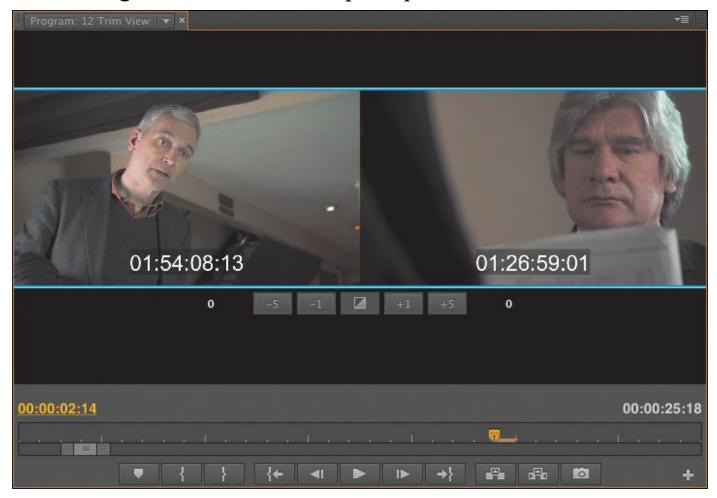
# **Choosing a trimming method in the Program Monitor**

You've already learned about the three types of trims that you can perform (regular, roll, and ripple). You also tried each in the Timeline. Using Trim mode in the Program Monitor makes the process easier because it provides richer visual feedback.

- 1. In the Project panel, load the sequence 12 Trim View.
- 2. With the Selection tool, hold down Alt (Windows) or Option (Mac OS) and double-click the edit between clip 1 and clip 2 in the Timeline. This selects just the video edits and leaves the audio tracks untouched.
- 3. In the Program Monitor, move the cursor slowly across the A and B clips.

As you drag from left to right, you'll see the tool change from Trim Out (left side) to Roll (center) to Trim In (right).

4. Drag in between both clips to perform a roll edit.



The time display on the right should read 01:26:59:01.

#### Note

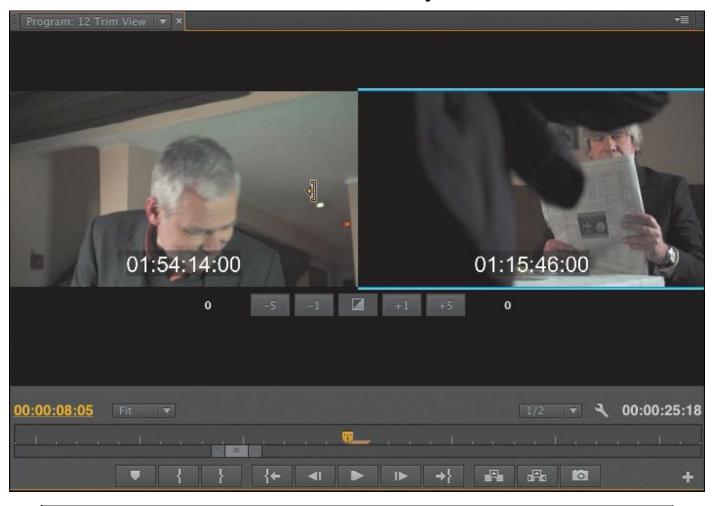
Clicking the A or B side will switch which side is being trimmed. Clicking in the center will switch to a roll.

5. Press the Down Arrow key three times to go to the edit between the third and fourth clips.

The outgoing shot is too long and shows the actor sitting down twice.

**6.** Change your trimming method to a ripple edit.

The easiest way to change the trimming method is to press the shortcut Shift+T (Windows) or Control+T (Mac OS) to cycle Trim modes. There are five options to cycle through. Tap the key combo once to cycle to the next shortcut. The five choices loop. You've selected a ripple edit when the Trim tool shows a yellow roller.

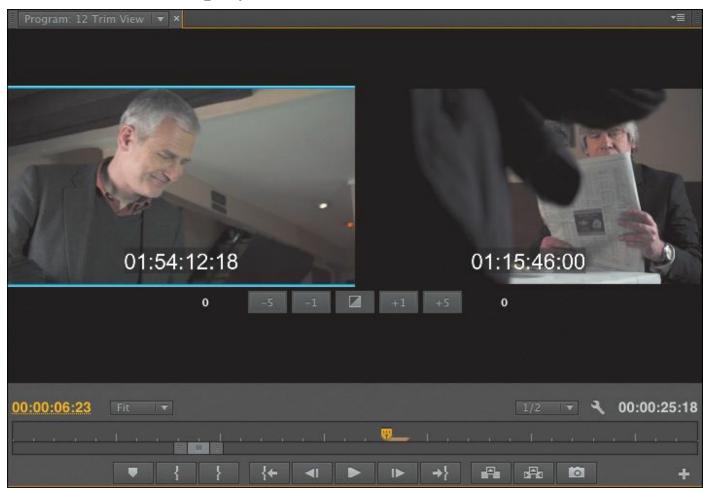


# Tip 🕟

You can also right-click an edit point to choose the trim type from a pop-up menu.

7. Drag to the left for the outgoing clip (on the right) to make the clip shorter.

The time display should read 01:54:12:18.



The rest of the clips ripple to close the gap. The timing of the edit works now.

#### Note

The type of trim that's used by default may seem random, but it's not. The initial setting is chosen by the type of tool that was used to select the edit point. If you click with the Selection tool, Premiere Pro chooses a regular Trim In or Trim Out. If you click with the Ripple Edit tool, then the Ripple In or Ripple Out trim is chosen. In both cases, cycling the roller will result in a

#### **Modifier keys**

There are multiple modifier keys that can be used to refine a trim selection.

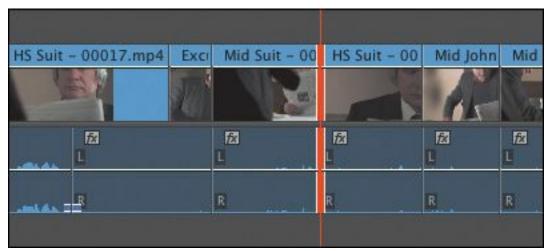
- Hold down Alt (Windows) or Option (Mac OS) when selecting clips to temporarily unlink audio and video. This makes it easier to select just the audio or video portion of a clip.
- Hold down the Shift key to select multiple edit points. You can trim multiple tracks or even multiple clips at the same time. Wherever you see a trim "handle," adjustments will be made when you apply a trim.
- Combine these two modifier keys to make advanced selections for trimming.

## **Dynamic trimming**

You'll often trim to find the proper rhythm for an edit. It's possible to do this while the sequence is playing back. Premiere Pro lets you update a trim using keyboard shortcuts or buttons while the sequence plays back in real time.

- 1. Continue working with the sequence 12 Trim View.
- 2. Press the Down Arrow key twice to move to the next video edit point. Set the trim type to be a roll. You can use the shortcut Shift+T (Windows) or Control+T (Mac OS) to cycle Trim modes.

You can stay in Trim mode while switching between edit points.



**3.** Press the spacebar to loop playback.

#### Note

To control the preroll and postroll times, open Preferences and select the Playback category. You can set the duration in seconds. Most editors find a duration of two to five seconds most useful.

The sequence starts to play back. You'll see a few seconds loop, with the shot before and after the cut playing back. This helps you get a feel for the content of the edit.

**4.** Try adjusting the trim using the methods you've already learned while the clip loops play.

The Trim Forward and Trim Backward buttons at the bottom of Trim mode view work well and can adjust the edit while the clip plays back.



Let's try using the keyboard for more dynamic control. The same J, K, and L keys you use to control playback can also be used to control trimming.

- **5.** Click Stop or press the spacebar to stop the playback loop.
- 6. Press the L key to shuttle the trim to the right.

  Pressing once trims in real time. You can tap the L key multiple times to trim faster.
- 7. Press the K key to stop trimming.

## Note

The Timeline clip duration updates when you press K to stop trimming.

Let's refine and trim back a little earlier.

- **8.** Hold down the K key and press the J key to shuttle left in slow motion.
- **9.** Release both keys to stop the trim.
- 10. To exit Trim mode, click away from the edit on the Timeline to deselect the edit.

## Trimming with the keyboard

The following table illustrates some of the most useful keyboard shortcuts you can use when trimming.

MAC	WINDOWS
Trim Backward: Option+Left Arrow	Trim Backward: Alt+Left Arrow
Trim Backward Many: Option+Shift+Left Arrow	Trim Backward Many: Alt+Shift+Left Arrow
Trim Forward: Option+Right Arrow	Trim Forward: Alt+Right Arrow
Trim Forward Many: Option+Shift+Right Arrow	Trim Forward Many: Alt +Shift+Right Arrow
Slide Clip Selection Left Five Frames:	Slide Clip Selection Left Five Frames:
Option+Shift+, (comma)	Alt+Shift+, (comma)
Slide Clip Selection Left One Frame: Option+,	Slide Clip Selection Left One Frame: Alt+,
(comma)	(comma)
Slide Clip Selection Right Five Frames:	Slide Clip Selection Right Five Frames:
Option+Shift+. (period)	Alt+Shift+. (period)
Slide Clip Selection Right One Frame:	Slide Clip Selection Right One Frame: Alt+.
Option+. (period)	(period)
Slip Clip Selection Left Five Frames:	Slip Clip Selection Left Five Frames:
Command+Option+Shift+Left Arrow	Control+Alt+Shift+Left Arrow
Slip Clip Selection Left One Frame:	Slip Clip Selection Left One Frame:
Command+Option+Left Arrow	Control+Alt+Left Arrow
Slip Clip Selection Right Five Frames:	Slip Clip Selection Right Five Frames:
Command+Option+Shift+Right Arrow	Control+Alt+Shift+Right Arrow
Slip Clip Selection Right One Frame:	Slip Clip Selection Right One Frame:
Command+Option+Right Arrow	Control+Alt+Right Arrow

Table 8.1 Trimming in the Timeline

# **Review questions**

- 1. Changing the Speed parameter of a clip to 50% has what effect on the length of the clip?
- 2. What tool is useful in stretching a clip in time to fill a gap?
- 3. Can you make time-remapping changes directly on the Timeline?
- 4. How do you create a smooth ramp-up from slow motion to normal speed?
- 5. What's the basic difference between a slide edit and a slip edit?
- **6.** What is the difference between a Replace edit and the Replace Footage feature?

#### **Review answers**

- 1. Reducing a clip's speed causes the clip to become longer, unless the Speed and Duration parameters have been unlinked in the Clip Speed/Duration dialog or the clip is bound by another clip. The clip will be twice as long.
- 2. The Rate Stretch tool is useful for the common situation of needing to fill a small extra amount of time with a clip.
- 3. Time remapping is best done on the Timeline; because it affects time, it is best (and most easily) adjusted and seen within the Timeline sequence.
- 4. Add a speed keyframe, and split it by dragging away half of the keyframe to create a transition between speeds.
- 5. You slide a clip over adjacent clips, retaining the selected clip's original In and Out points. You slip a clip under adjacent clips, changing the selected clip's In and Out

points.

6. Replace Clip replaces a single targeted clip on the Timeline with a new clip from the Project panel. Replace Footage replaces a clip in the Project panel with a new source clip. Any instance of the clip in any sequence in the project is replaced. In both cases, effects applied to the replaced clip are maintained.

# 9. Putting Clips in Motion

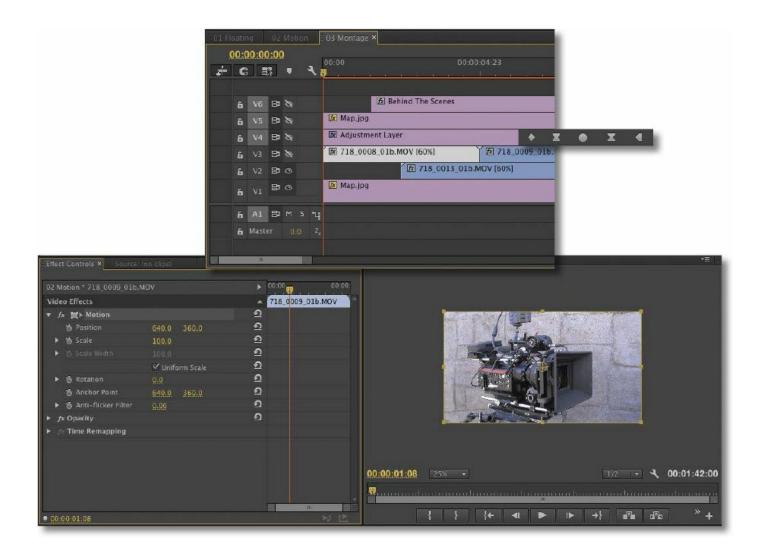
#### **Lesson overview**

In this lesson, you'll learn about the following:

- Adjusting the Motion effect for clips
- Changing clip size and adding rotation
- Adjusting the anchor point to refine rotation
- Working with keyframe interpolation
- Enhancing motion with shadows and beveled edges



This lesson will take approximately 50 minutes.



The Motion fixed effect controls can add motion to an entire clip. This can be useful for animating a graphic or for sizing and repositioning a video clip within the frame. You can animate an object's position using keyframes and enhance that animation by controlling their interpolation between values.

## **Getting started**

As video projects become more motion graphics—oriented, it's common to see multiple shots combined on the screen. These are often put into motion. Perhaps you'll see multiple video clips streaming past in floating boxes, or you'll see a video clip shrunk down and placed next to an on-camera host. You can

create those effects (and more) in Adobe Premiere Pro CC by using the Motion controls or a number of clip-based effects that offer Motion settings.

The Motion effect allows you to position, rotate, or scale a clip within the frame. You can make some adjustments directly in the Program Monitor by dragging to change the clip's position, or you can drag or rotate a clip's frame handles to change its size, shape, or orientation.

A *keyframe* is a kind of marker that defines settings at a particular point in time. If you use two (or more) keyframes, Premiere Pro can automatically animate the settings between them. You can use advanced Bezier controls to make subtle adjustments to the timing or settings for an effect.

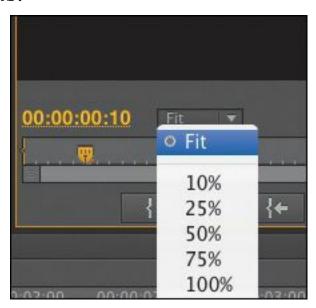
## Adjusting the Motion effect

Every clip in a Premiere Pro sequence automatically has a Motion effect applied as a fixed effect (sometimes called an intrinsic effect). To adjust the effect, select the clip in a sequence and look in the Effect Controls panel—just click the disclosure triangle next to the Motion effect to adjust the settings.

The Motion effect allows you to adjust the position, scale, or rotation of a clip. Let's explore how this effect has been used to reposition a clip.

- 1. Open Lesson 09.prproj in the Lesson 09 folder.
- 2. Choose Window > Workspace > Effects to switch to the Effects workspace. Then choose Window > Workspace > Reset Current Workspace and click OK to ensure the default layout.

- **3.** Locate the sequence 01 Floating. It should already be loaded; if not, double-click the sequence to load it.
- 4. Open the Select Zoom Level menu in the Program Monitor, and make sure the zoom level is set to Fit. It's important to see the whole composition when setting up visual effects.



5. Play the clip in the Timeline.

This clip's Position, Scale, and Rotation properties have been modified. Keyframes have been added, with different settings at different points in time, so the clip is animated.

## **Understanding Motion settings**

Though the effect is called Motion, there's no animation at all until you add it. Clips appear at 100% scale in the center of the Program Monitor.

You can choose to adjust the following properties:

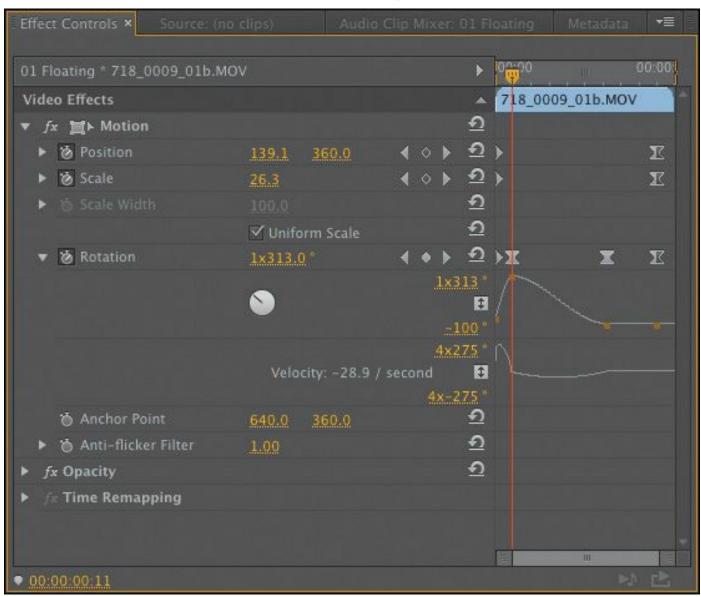
• **Position:** This places the clip along x and y axes. Coordinates are calculated based on the pixel position of

the anchor point (see below) from the upper-left corner. So the default position for a 1280 x 720 clip would be 640, 360; that is, the exact center.

- Scale (Scale Height, when Uniform Scale is deselected): Clips are set to their full size by default (100%). To shrink a clip, reduce the number. You can scale up to 600%, but this will make the image pixelated and soft.
- Scale Width: Deselect Uniform Scale to make Scale Width available. This lets you change the clip width and height independently.
- **Rotation:** You can rotate an image along the z-axis—a flat spin (as if viewing a spinning turntable or carousel from above). You can enter degrees or a number of rotations. For example, 450 is the same as 1 x 90 (the 1 counts as one full 360-degree turn). Positive numbers give clockwise rotation, and negative numbers give counterclockwise rotation.
- Anchor point: Rotation and position adjustments are all based on the anchor point, which is at the center of a clip by default. This can be changed to any point, including one of the clip's corners or even a point outside the clip. For example, if you set the anchor point to the corner of the clip, when you adjust the Rotation setting, the clip will rotate around that corner rather than around the center of the image. If you change the anchor point in relation to the image, you may have to reposition the clip to compensate for the adjustment.
- Anti-flicker Filter: This feature is useful for images that "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

contain high-frequency detail, such as fine lines, hard edges, parallel lines (that can cause moiré problems), or rotation. Those characteristics can cause flickering during motion. To add some blurring and eliminate flicker, use 1.00. The default setting (0.00) adds no blurring and has no effect on flicker.

Let's look closer at the animated clip.

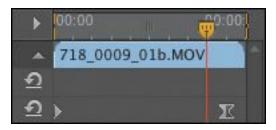


- 1. Continue to use the sequence 01 Floating.
- 2. Click the clip on the Timeline to make sure it is selected.
- 3. Make sure the Effect Controls panel is visible. It should "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

- have appeared when you reset the Effects workspace, but if you can't find it, look for it in the Window menu.
- 4. In the Effect Controls panel, click the Motion disclosure triangle to display its settings.



5. At the upper right of the Effect Controls panel settings, to the right of the sequence name, a small triangle toggles the display of an integrated Timeline. Make sure the Timeline is visible. If it isn't, click the triangle to show it. The Timeline in the Effect Controls panel displays keyframes.



### Note

It's difficult to select a keyframe precisely with the mouse. Using the Previous/Next Keyframe buttons helps you avoid adding unwanted keyframes. **6.** Click the Go to Previous Keyframe or Go to Next Keyframe arrows to jump between existing keyframes. Each control has its own keyframes.



Now that you know how to view an animation, let's reset the clip. You'll animate from scratch later in this lesson.

7. Click the "Toggle animation" stopwatch button for the Position property to turn off its keyframes.



- **8.** Click OK when prompted that all keyframes will be deleted if you apply the action.
- **9.** Repeat steps 7 and 8 for the Scale and Rotation properties.

### Note

When the Toggle animation button is on, clicking the Reset button will not change any existing keyframes. Instead, a new keyframe is added with default settings. It's important to turn off animation before resetting the effect to avoid this.

10. Click the Reset button, to the right of the Motion effect name in the Effect Controls panel.



Now the Motion controls are all set to their default settings.

#### Note

Each control has its own Reset button. If you reset the whole effect, every control is returned to its default state.

## **Examining Motion properties**

The Position, Scale, and Rotation properties are *spatial*. That means the changes you make are easy to see, because the object will change in size and position. You can adjust these properties by entering numerical values, using the scrubbable text, or dragging the Transform controls.

To examine some Motion settings, try this:

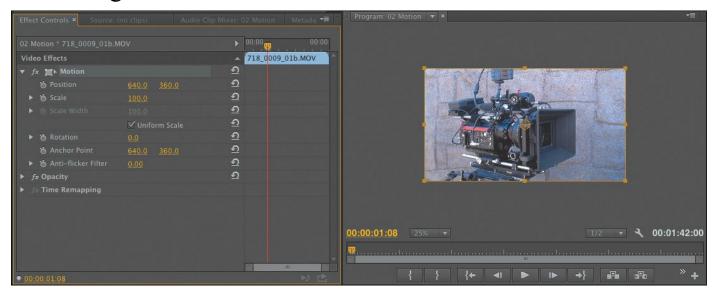
- **1.** Double-click the sequence 02 Motion in the Project panel to load it.
- 2. Open the Select Zoom Level menu in the Program Monitor, and make sure the zoom level is set to 25% or 50% (or a zoom amount that allows you to see space around the active frame).
  - Setting the zoom very small makes it easy to position items outside the frame.
- 3. Drag the playhead anywhere in the clip so you can see the video in the Program Monitor.
- 4. Click the clip in the Timeline so it's selected, with its settings displayed in the Effect Controls panel.

  If necessary, click the disclosure triangle to show the
  - Motion properties.
- 5. Click the Motion effect heading in the Effect Controls

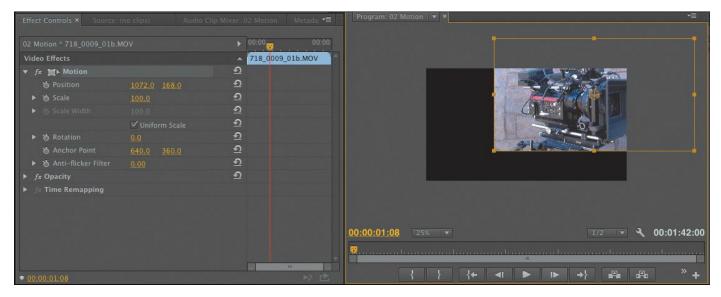
#### Note

Several effects, like the Motion effect, have a Transform icon ( ) to indicate that you can use direct manipulation in the Program Monitor when you select the effect heading. Be sure to explore Corner Pin, Crop, Garbage Matte, Mirror, Transform, and Twirl.

When you select the motion effect, a bounding box with a crosshair and handles appears around the clip in the Program Monitor.

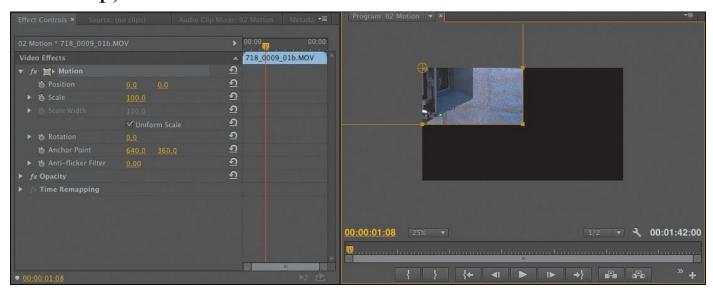


**6.** Click anywhere in the clip bounding box in the Program Monitor and drag the clip around.



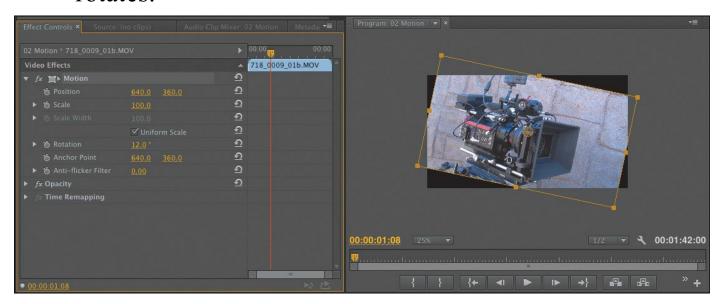
Position values in the Effect Controls panel update as you move the clip around.

7. Position the clip so that it's centered on the upper-left corner of the screen. Use the circle and crosshair in the center to line up the clip with the edge of the picture. That crosshair is the anchor point, which is used for position and rotation controls. You'll see that the Position settings in the Effect Controls panel are 0, 0 (or close to that, depending on where you placed the center of the clip).



This is a 720p sequence, so the lower-right corner of the "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

- screen is 1280, 720.
- **8.** Click the Reset button to restore the clip to its default position.
- **9.** Drag the orange number for the Rotation setting in the Effect Controls panel. As you drag left or right, the clip rotates.



10. Click the Motion Reset button in the Effect Controls panel to restore the clip to its default position.

## Note

Premiere Pro uses a coordinate system that has the upper-left corner of the screen as 0, 0. All x and y values, respectively, to the left of and above that point are negative. All x and y values to the right of and below that point are positive.

## Changing clip position, size, and rotation

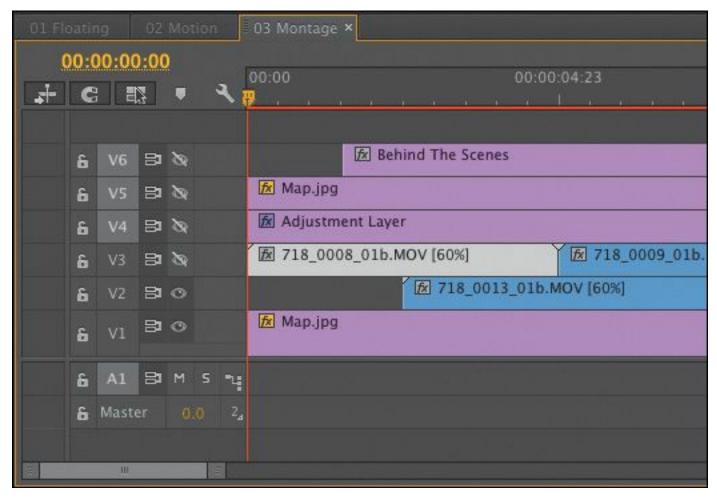
Sliding a clip around only begins to exploit the possibilities of the Motion effect. What makes the Motion effect so useful is "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

the ability to change the scale of the clip as well as rotate it. In this example, we're going to build a simple bumper segment for the behind-the-scenes features of a DVD.

## **Changing position**

Let's begin by using keyframes to animate the position of a layer. For this exercise, the first thing we'll do is change the clip position. The picture will start offscreen, and then move across the screen from right to left.

- 1. Double-click the sequence 03 Montage in the Project panel to load it.
  - The sequence has several tracks, some of which are currently disabled. We'll use them later.
- 2. Move the playhead to the start of the sequence.
- 3. Set the Program Monitor zoom level to Fit.
- 4. Click once to select the first video clip on Video track 3. You might want to make the track taller to see it better. The clip's controls load into the Effect Controls panel.

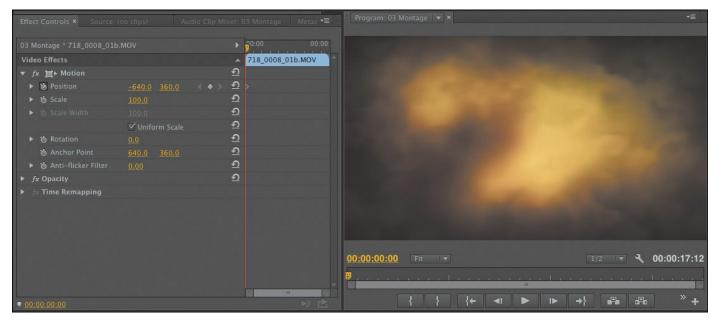


5. In the Effect Controls panel, make sure the Motion settings are visible (click the Motion settings disclosure triangle if necessary). Then click the "Toggle animation" button for Position. This turns on keyframing for that setting and automatically adds a keyframe at the playhead position.

From now on, when you change the setting, Premiere Pro will add (or update) a keyframe automatically.

**6.** Enter a Position setting of **–640** into the x-axis (the first number) as a starting position.

The clip moves offscreen to the left.



- 7. Drag the playhead to the last frame of the clip (00:00:4:23). You can do this in the Timeline panel or the Effect Controls panel.
- 8. Enter a new setting for the position x-axis. If you enter 1920 the clip will move off the right edge of the screen.
- **9.** Play the sequence and you'll see the clip move from offscreen left to offscreen right.

A clip on Video 2 pops up suddenly. You'll animate this clip and others next.



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## **Reusing Motion settings**

Because you've applied keyframes and effects to a clip, you can save time by reusing them on other shots. It's as easy as copying and pasting to reuse effects from one clip to one or more other clips. In this example, you'll apply the same left-to-right floating animation to other clips in the project.

There are several methods for reusing effects. Let's try one now.

- 1. On the Timeline, select the clip you just animated. It's the first clip on Video 3.
- **2.** Choose Edit > Copy.

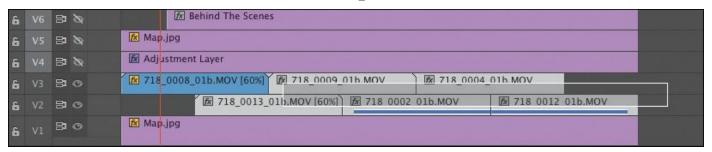
The clip *and* its effects and settings are now on your computer's clipboard.

#### Note

As an alternative to selecting a clip in the Timeline, you can always select one or more effects in the Effect Controls panel. Just select the first effect you want to copy, and then hold down the Shift key and click to select multiple contiguous effects. Ctrl-click (Windows) or Command-click (Mac OS) to select multiple non-contiguous effects. You can then select another clip (or clips) and choose Edit > Paste to paste the effects onto other clips.

3. With the Selection tool (V), drag from right to left to

select the five other clips on the Video 2 and Video 3 tracks (you may need to zoom out a little to see all the clips). You could also hold the Shift key and select the first and last of the five clips.



**4.** Choose Edit > Paste Attributes.



- 5. The dialog that pops up lets you selectively apply effects and keyframes copied from another clip. Select only the Motion and Scale Attribute Times check boxes and click OK.
- **6.** Play the sequence to see your work so far.



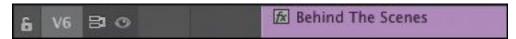
## Adding rotation and changing the anchor point

Moving clips around the screen can be very effective, but you can really bring things to life using two more properties. Let's start with Rotation.

The Rotation property revolves a clip around its anchor point on the z-axis. By default, the anchor point is in the center of the image. However, you can change the relationship between the anchor point and the image for more interesting animation.

Let's add some rotation to the clip.

1. Turn on the visibility for Video 6 (click on the eye icon). This layer is titled Behind The Scenes.



- 2. Move the playhead to the start of the title (00:00:01:13). Try holding the Shift key while you drag the playhead to do this.
- 3. Select the title in the Timeline.

  The title's controls should appear in the Effect Controls

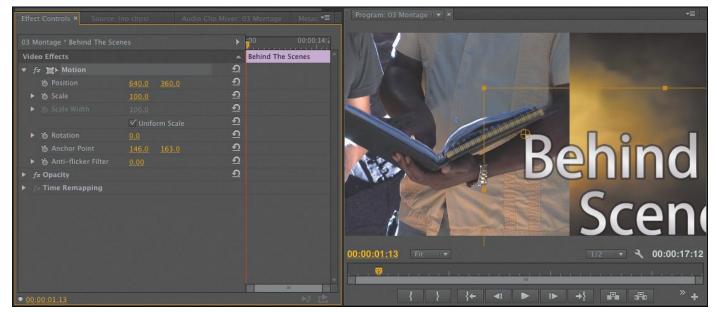
panel.

4. Click the triangle next to the Motion property if its controls aren't visible. Then select the Motion effect name to see the anchor point and bounding box controls in the Program Monitor.

Let's adjust the Rotation property and see the effect it has.

- 5. Enter a value of 90.0° into the Rotation field. The title rotates in the center of the screen.
- **6.** Choose Edit > Undo.
- 7. Drag the Anchor Point orange numbers to adjust the anchor point until the crosshair sits on the upper-left corner of the letter B in the first word.

You'll notice that changing the Anchor Point setting doesn't move the anchor point; instead, it moves the image! Remember that the Position settings control the anchor point. What you're changing now is the relationship between the anchor point and the clip frame.

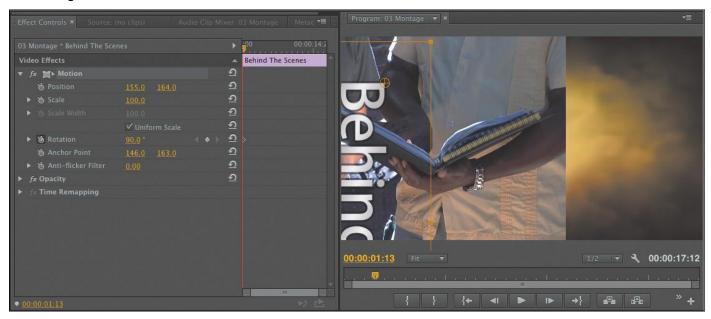


8. Now, in the Program Monitor, click the title and drag it

back to the center. You can use the bounding box as a guide to help you position the item. Position settings around 155.0 and 170.0 should work.

The image looks the same as it did at the start. The difference is that the new anchor point will change the way rotation works.

- 9. Your playhead should still be on the first frame of the clip. Click the stopwatch button for the Rotation setting to toggle on animation. This adds a keyframe automatically.
- **10.** Set the rotation to **90.0°**. This updates the keyframe you just added.



11. Move the playhead forward to 6:00 and set the rotation to 0.0°. This adds another keyframe automatically.



12. Play the sequence to see your animation.

## **Changing size**

You'll find a few different methods for changing the size of items in a sequence. By default, items added to a sequence come in at 100% of their original size. However, you can choose to manually adjust the size or let Premiere Pro do it for you automatically.

Here are the four methods to choose from:

- Use the Scale property of the Motion effect in the Effect Controls panel.
- Right-click a sequence clip and choose Set To Frame Size. This automatically adjusts the Scale property of the Motion effect to match the frame size of the clip with the size of the sequence.
- Right-click a sequence clip and choose Scale To Frame Size (if the clip is a different frame size than your sequence). This has a similar result, but Premiere Pro resamples the image at the new (usually lower) resolution.

If you scale back up now using the Motion > Scale setting, the image might look soft, even if the original clip was very high resolution.

Choose Scale To Frame Size by default with the user preference. Choose Edit > Preferences > General (Windows) or Premiere Pro > Preferences > General (Mac OS), then select the Default Scale To Frame Size option and click OK. The setting is applied to assets as you import them.

For maximum flexibility, use only the first or second methods so you can scale as needed without discarding quality. Let's give it a try.

- 1. Select the Behind The Scenes clip in the Timeline, and move the playhead to the start of the clip.
- 2. Click the stopwatch button for the Scale property to toggle on animation.
- 3. Enter a value of 0%.



4. We're going to line up the next Scale keyframe with the existing Rotation keyframe. Click the Go to Next "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

Keyframe button for the Rotation property.



5. Enter a value of 100% for the Scale property.

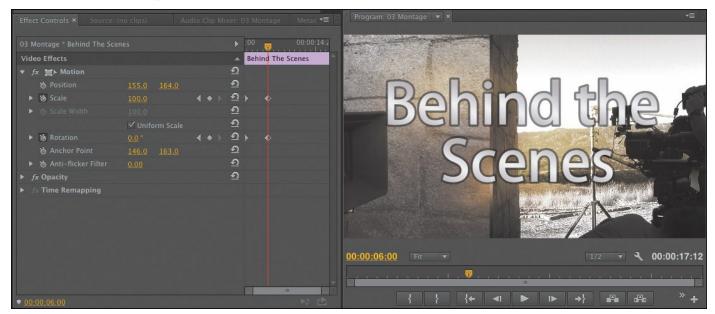
Premiere Pro automatically adds a new keyframe because the "Toggle animation" property is enabled.

**6.** Turn on the Video 4 track.

This is an adjustment layer that applies a global effect to all the footage on lower video tracks. In this case, the Black and White effect is applied to remove the saturation from each shot. You'll learn more about adjustment layers in Lesson 13, "Adding Video Effects."

7. Turn on the Video 5 track.

This is a colored texture layer that is set to the Overlay blending mode. Blending modes let you mix the content of multiple layers together. You'll learn more about blending modes in <u>Lesson 15</u>, "<u>Exploring Compositing Techniques</u>."



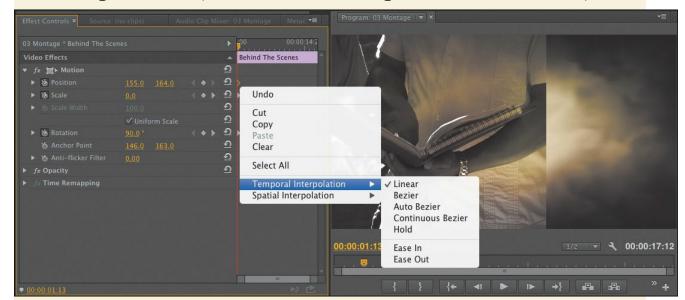
**8.** Play the sequence to see your animation.

## Working with keyframe interpolation

Throughout this lesson you've been using keyframes to define your animation. The term *keyframe* originates from traditional animation, where the lead artist would draw the key frames (or major poses) and then assistant animators would animate the frames in-between, a process sometimes called tweening, from in-between(ing). When animating in Premiere Pro, you're the master animator, and the computer does the rest of the work as it interpolates values in between the keyframes you set.

#### Temporal vs. spatial interpolation

Some properties and effects offer a choice of temporal and spatial interpolation methods for transitioning between keyframes. You'll find that all properties have temporal controls (which relate to time). Some properties also offer spatial interpolation (which refers to space or movement).



Here's what you need to know about each method:

• Temporal interpolation: Temporal interpolation

deals with changes in time. It's an effective way to determine the speed at which an object moves. For example, you can add acceleration and deceleration with special kinds of keyframes called Ease or Bezier.

• Spatial interpolation: The spatial method deals with changes in an object's position. It's an effective way to control the shape of the path an object takes across the screen. That path is called a motion path. For example, does an object create hard angular ricochets as it moves from one keyframe to the next, or does it have a more sloping movement with round corners?

## **Keyframe interpolation methods**

While you've already used keyframes to animate, you've only touched on their power. One of the most useful yet least utilized features of keyframes is their interpolation method. This is a fancy way of saying how to get from point A to point B. Think of it as describing the sharp ramp-up as a runner takes off from the starting line and the gradual slowdown after they cross the finish line.

Premiere Pro has five interpolation methods. Changing the method can create a very different animation. You can access the available interpolation methods by right-clicking a keyframe to see the options (some effects have both spatial and temporal options).

• Linear: This is the default method of keyframe

interpolation. This method gives a uniform rate of change between keyframes. Changes begin instantly at the first keyframe and continue to the next keyframe at a constant speed. At the second keyframe, the rate of change switches instantly to the rate between it and the third keyframe, and so on. This can be effective, but it can also look a little mechanical.

- **Bezier:** This gives the most control over keyframe interpolation. Bezier keyframes (named after the French engineer Pierre Bézier) provide manual handles you can adjust to change the shape of the value graph or motion path on either side of the keyframe. By dragging the Bezier handles, you can create smooth curved adjustments or sharp angles. For example, you could have an object move smoothly to a position onscreen, then sharply take off in another direction.
- Auto Bezier: Auto Bezier keyframes create a smooth rate of change through the keyframe. They automatically update as you change settings. This is a good quick-fix version of Bezier keyframes.
- Continuous Bezier: This option is similar to the Auto Bezier option, but it provides some manual control. The motion or value path will always have smooth transitions, but you can adjust the shape of the Bezier curve on both sides of the keyframe with a control handle.
- Hold: This is available only for temporal (time-based) properties. Hold-style keyframes hold their value across time, without a gradual transition. This is useful if you want to create staccato-type movements or make an object

suddenly disappear. When the Hold style is used, the value of the first keyframe will hold until the next hold keyframe is encountered, and then the value will change instantly.



## **Adding Ease to Motion**

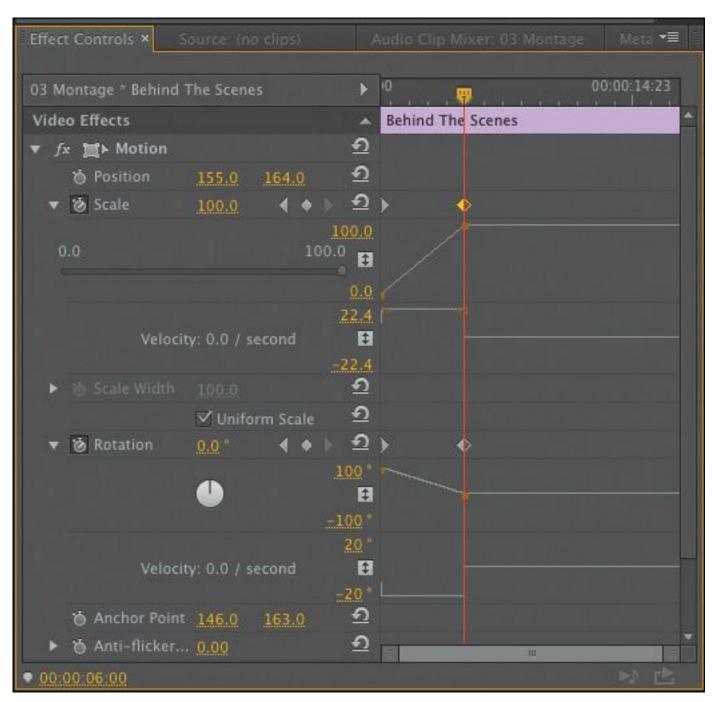
A quick way to add a feeling of inertia to clip motion is to use a keyframe preset. For example, you can create a ramp-up effect for speed by right-clicking a keyframe and choosing Ease In or Ease Out. Ease In is used for approaching a keyframe, and Ease Out is used when leaving a keyframe.

- 1. Continue working with the previous sequence, or double-click to load 04 Montage Complete in the Project panel.
- 2. Select the Behind The Scenes clip on the Video 6 track.
- **3.** In the Effect Controls panel, locate the Rotation and Scale properties.
- 4. Click the disclosure triangles next to the individual Scale and Rotation properties to reveal the control handles and velocity graphs.

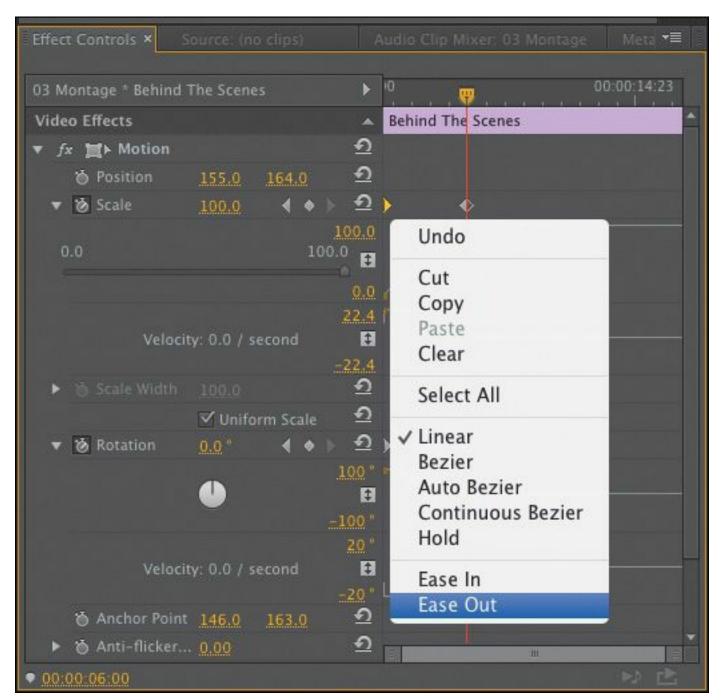
You might want to increase the height of the Effect Controls panel to make room for all the extra controls.

Don't be overwhelmed by the next numbers and graphs. Once you understand one of these, you'll understand them all, as they all use common controls.

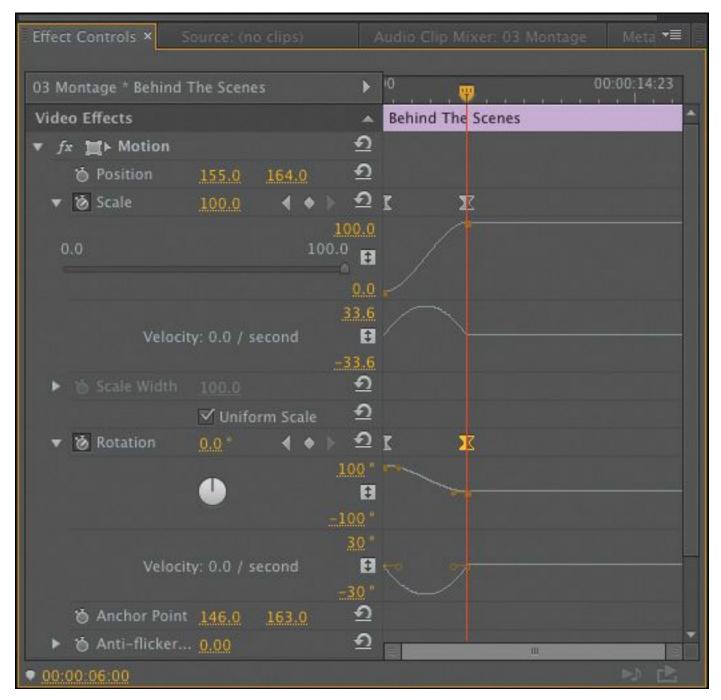
The graph makes it easier to view the effects of keyframe interpolation. A straight line means essentially no change in speed or acceleration.



**5.** Right-click the first Scale keyframe, displayed in the Effect Controls panel mini timeline, and choose Ease Out.



- 6. Repeat this for the Rotation property's first keyframe.
- 7. Look closely at the velocity graphs to see the changes in ramping.
- **8.** For the next two keyframes, right-click and choose the Ease In method for both Scale and Rotation.



- **9.** Play the sequence to see your animation.
- 10. Experiment by dragging the Bezier handles in the Effect Controls panel to see their effects on speed and ramping. The steeper the curve you create, the more sharply the animation's movement or speed increases. After experimenting, you can choose Edit > Undo if you don't like the changes.

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### Tip 👅

If you want to create inertia (such as a rocket lifting off), try using Ease. Right-click a keyframe, and choose Ease In or Ease Out (for approaching and leaving a keyframe, respectively).

# Using other motion-related effects

Premiere Pro offers a number of other effects to control motion. While the Motion effect is the most intuitive, you may find yourself wanting more. In this case, a beveled edge or a drop shadow may come in handy.

The Transform and Basic 3D effects are also useful and give more control over an object (including 3D rotation).

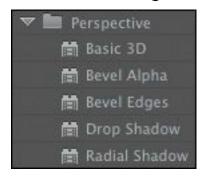
### Adding a drop shadow

A drop shadow creates perspective by adding a small shadow behind an object. This is often used to help create a sense of separation between foreground and background elements.

To add a drop shadow, follow these steps:

- 1. Continue working with the previous sequence, or double-click to load 05 Enhance in the Project panel.
- 2. Make sure the Program Monitor zoom level is set to Fit.
- **3.** Click once to select the Behind The Scenes clip on track Video 6.
- 4. In the Effects panel (which should be sharing a frame with the Project panel in this workspace), browse into

Video Effects > Perspective. Drag the Drop Shadow effect onto the Behind The Scenes clip.



- 5. Click the disclosure triangle next to the Motion effect in the Effect Controls panel to close the settings and make it easier to see the Drop Shadow options.
- **6.** Experiment with the Drop Shadow parameters in the Effect Controls panel as follows:
  - Increase Distance to **15** so the shadow is further offset from the clip.
  - Drag the Direction value to about 320° to see the shadow's angle change.
  - Darken the shadow by changing Opacity to 85%.
  - Set Softness to **25** to soften the edges of the shadow. Generally, the greater the Distance setting, the more softness you should apply.



7. Play the sequence to watch your animation.

### Note

To make shadows fall away from a light source, add or subtract 180° from the light source direction to get the correct direction for the shadow to fall.

#### Adding a bevel

Another way to enhance the edges of a clip is to add a bevel. This type of effect is useful on a picture-in-picture effect or on text. There are two bevels to choose from. The Bevel Edges effect is useful when the object is simply a standard video clip. The Bevel Alpha effect works better for text or logos, because it detects the complex transparent areas in the image before applying the beveled edge.

Let's enhance the title a little.

1. Continue working with the previous sequence or use the 05 Enhance sequence.

- 2. Select the Behind The Scenes clip on track Video 6.
- 3. In the Effects panel, choose Video Effects > Perspective, and drag the Bevel Alpha effect onto the clip.

  The edges of the text should appear slightly beveled.
- **4.** In the Effect Controls panel, increase Bevel Alpha Edge Thickness to **10** to make the edge more pronounced. You might need to scroll down in the Effect Controls panel to see all the settings.
- 5. Increase Light Intensity to **0.80** to see a brighter edge effect.

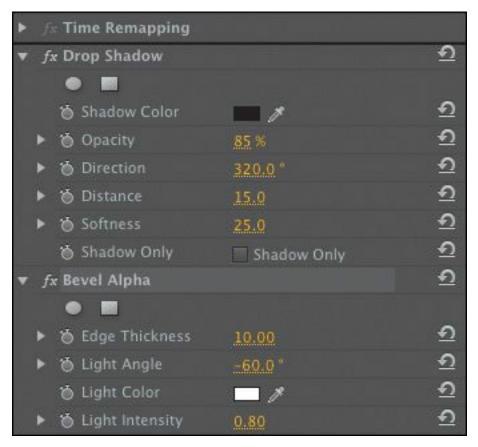
The effect is looking pretty good, but it's currently applied to both the text and the drop shadow. This is because the effect is below the drop shadow in the Effect Controls panel (the stacking order matters).



6. In the Effect Controls panel, drag the Bevel Alpha effect name up until it's just above the Drop Shadow effect. You'll see a black line where the effect will be placed. This changes the rendering order.

#### Note

The Bevel Edges effect produces slightly harder edges than the Bevel Alpha effect. Both effects work well on rectangular clips, but the Bevel Alpha effect is better suited to text or logos.



- 7. Reduce the Edge Thickness amount to 8.
- 8. Examine the subtle differences in the bevel.



9. Play the sequence to see your animation.



If you're not getting the look you want when applying multiple effects to a clip, drag the order around and see whether that produces a better result.

#### **Transform**

An alternative to the Motion effect operation is the Transform effect. These two effects offer similar controls, but there are three key differences. The Transform effect processes changes to a clip's Anchor Point, Position, Scale, or Opacity settings before other effects are applied. This means things like drop shadows and bevels will behave differently.

The Transform effect also adds Skew and Skew Axis settings to allow a visual angular transformation to clips. Lastly, the Transform effect is not a Mercury Engine GPU-accelerated effect, so it may take longer to process and doesn't offer as much real-time performance.

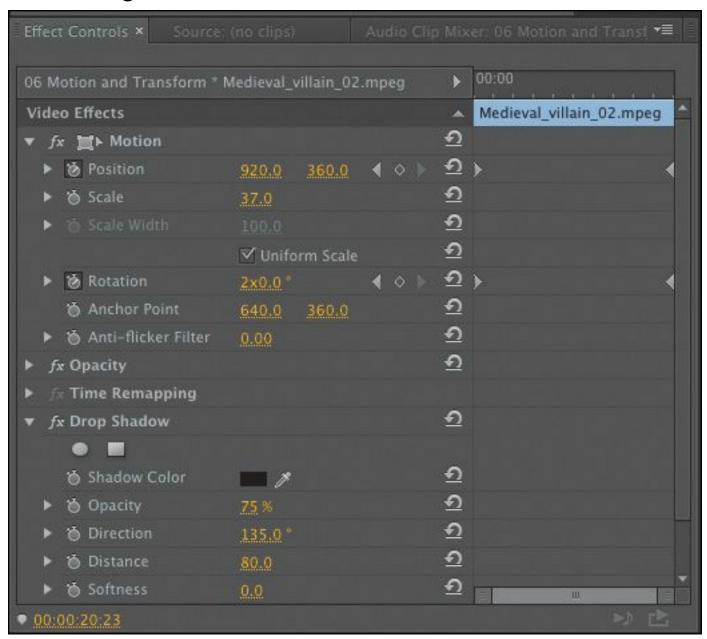
Let's compare the two effects using a prebuilt sequence.

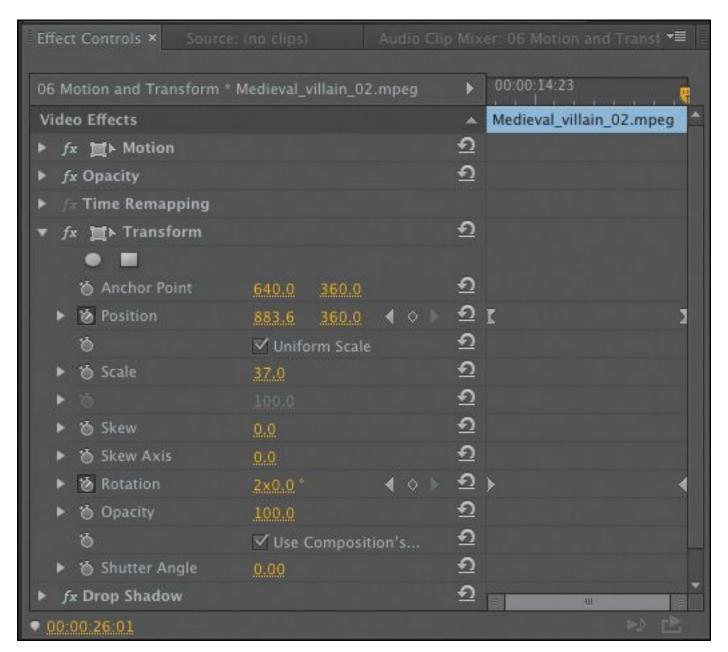
- 1. Open the sequence 06 Motion and Transform.
- 2. Play the sequence to familiarize yourself with it.

  There are two clips. Each is a picture-in-picture (PIP), rotating twice over the background clip while moving from left to right. Look carefully at the relationship of the shadow to each pair of clips.
  - In the first example, the shadow follows the bottom edge of the PIP and appears on all four sides of the clip as it rotates, which obviously isn't realistic because the light source producing the shadow wouldn't be

moving.

• In the second example, the shadow stays on the lower right of the PIP, which is more realistic.





- 3. Click the first clip on the Video 2 track, and view the effects applied in the Effect Controls panel: the Motion fixed effect and the Drop Shadow effect.
- 4. Now click the second clip on the Video 2 track. The Transform effect is producing the motion this time, with the Drop Shadow effect again producing the shadow. The Transform effect has many of the same options as the Motion effect, with the addition of Skew, Skew Axis, and Shutter Angle. As you can see, the Transform effect also

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- works more realistically with the Drop Shadow effect than the Motion effect.
- 5. If you have a Mercury Engine—compatible graphics card in your system, you'll note that the render bar at the top of the Timeline is yellow for the first clip and red for the second.

This tells you that the Motion effect is GPU-accelerated, which makes previewing and rendering more efficient, whereas the Transform effect isn't.

#### Basic 3D

Another option for creating movement is the Basic 3D effect, which can manipulate a clip in 3D space. It allows you to rotate the image around horizontal and vertical axes as well as move it toward or away from you. You'll also find an option to enable a specular highlight, which creates the appearance of light reflecting off the rotating surface.

Let's explore the effect using a prebuilt sequence.

- **1.** Open the sequence 07 Basic 3D.
- 2. Drag the playhead over the sequence Timeline (scrub) to quickly view the contents.

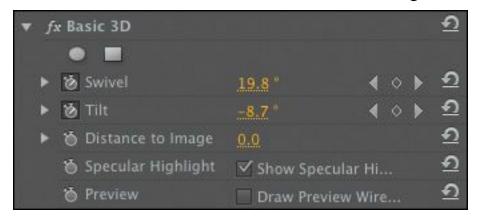


The light that follows the motion comes from above, behind, and to the left of the viewer. Since the light comes from above, you won't see the effect until the image is tilted backward to catch the reflection. Specular highlights of this kind can be used to enhance the realism of a 3D effect.

The four major properties of the Basic 3D effect are as follows:

• **Swivel:** This controls the rotation around the vertical y-axis. If you rotate past 90°, you'll see the back of the image, which is a mirror of the front.

- **Tilt:** This controls the rotation around a horizontal x-axis. If you rotate beyond 90°, the back will also be visible.
- **Distance to Image:** This moves the image along the z-axis to simulate depth. As the distance value gets larger, the image moves farther away.
- **Specular Highlight:** This adds a glint of light that reflects off the surface of the rotated image, as though an overhead light were shining on the surface. This option is either on or off.
- 3. Experiment with the available Basic 3D options.



### **Review questions**

- 1. Which fixed effect will move a clip in the frame?
- 2. You want a clip to appear full-screen for a few seconds and then spin away. How do you make the Motion effect's Rotation feature start within a clip rather than at the beginning?
- 3. How can you start an object rotating gradually and have it stop rotating slowly?
- 4. If you want to add a drop shadow to a clip, why do you need to use some other motion-related effect besides the

#### Motion fixed effect?

#### **Review answers**

- 1. The Motion effect lets you set a new position for a clip. If keyframes are used, the effect can be animated.
- 2. Position the playhead where you want the rotation to begin, and click the Add/Remove Keyframe button. Then move to where you want the spinning to end, and change the Rotation parameter; another keyframe will appear.
- 3. Use the Ease Out and Ease In parameters to change the keyframe interpolation to be gradual rather than sudden.
- 4. The Motion effect is the last effect applied to a clip. Motion takes whatever effects you apply before it (including Drop Shadow) and spins the entire assemblage as a single unit. To create a realistic drop shadow on a spinning object, use Transform or Basic 3D and then place a Drop Shadow below that in the Effect Controls panel.

# 10. Multi-Camera Editing

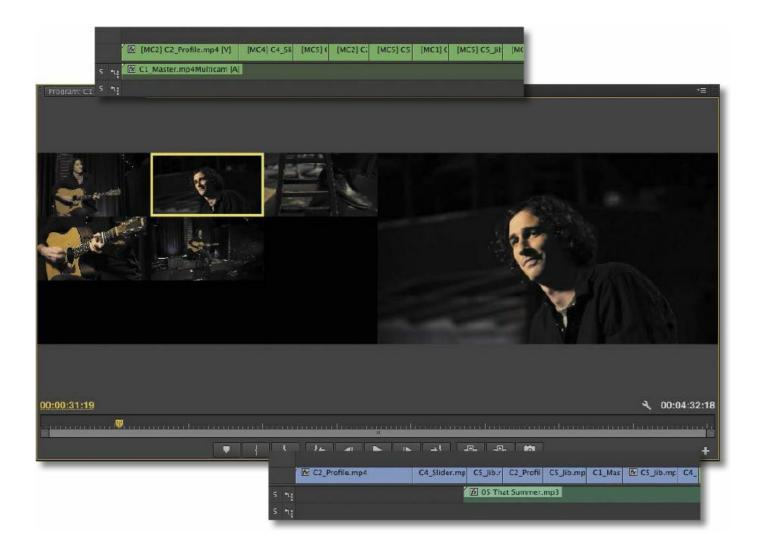
#### **Lesson overview**

In this lesson, you'll learn about the following:

- Synchronizing clips based on audio
- Adding clips to a sequence
- Creating a multi-camera target sequence
- Switching between multiple cameras
- Recording a multi-camera edit
- Finalizing a multi-camera editing project



This lesson will take approximately 45 minutes.



The process of multi-camera editing begins with synchronizing multiple camera angles. You can do this using timecode or a common sync point (such as the closing of a clapboard, or a common audio track). Once your clips are synced, you can seamlessly cut between multiple angles in Adobe Premiere Pro CC.

# **Getting started**

In this lesson, you'll learn how to quickly edit multiple angles of footage that were shot simultaneously. Because the clips were shot at the same time, Adobe Premiere Pro CC makes it possible to cut seamlessly from one angle to another.

The Premiere Pro multi-camera editing feature is a tremendous time-saver when you're editing footage from a shoot or event captured with multiple cameras.

#### Let's try it:

- 1. Open the project Lesson 10.prproj.

  This project has five camera angles of a musical performance and a synchronized audio track.
- 2. Choose Window > Workspace > Editing.
- 3. Choose Window > Workspace > Reset Current Workspace to make sure the user interface is configured to the default settings. Click Yes to apply the change.

#### Who uses multi-camera editing?

The use of multi-camera editing has grown immensely in popularity as prices for high-quality cameras have fallen. There are many potential uses for a multi-camera shoot and edit.

- Visual and special effects: Because of the expense associated with many special-effects shots, it's common practice to cover the shot with multiple angles. This means less cost associated with the staging of the shot and allows for greater flexibility during editing.
- Action scenes: For scenes that involve a lot of action, producers often use multiple cameras.
   Doing so can reduce the number of times that stunts or dangerous action needs to be performed.

- Once-in-a-lifetime events: Events such as weddings and sporting competitions rely heavily on multiple angles of coverage to ensure that the shooters capture all the critical elements of the event.
- Musical and theatrical performances: If you've watched a concert film, you're used to multiple camera angles being used to show the performance. Multi-camera editing can improve the pacing of theatrical performances as well.
- Talk-show formats: Interview-driven segments will often cut between the interviewer and subject, as well as to a wide shot to show both subjects at the same time. Not only does this maintain visual interest, but it makes it easier to edit an interview to a shorter run time.

# The multi-camera process

The multi-camera editing process has a very standardized workflow. Once you know how to do it, it's straightforward. There are six stages.

- 1. Import your footage: To edit your footage, you need to import it into Premiere Pro. Ideally, the cameras will be closely matched in frame rate and frame size, but you can mix and match if needed.
- 2. Determine your sync points: The goal is to keep the multiple angles running in sync with each other so you can seamlessly switch between them. You will need to

identify a point in time that exists in all angles to synchronize or use matching timecode. Alternatively, you can automatically sync if all of the tracks have the same audio present.

- 3. Create a multi-camera source sequence: The angles must be added to a specialized sequence type called a multi-camera source sequence. This is essentially a nested sequence clip that contains multiple video angles.
- **4.** Add the multi-camera sequence to a new sequence: The multi-camera source sequence is added to a new sequence for editing. This new sequence is the multi-camera target master sequence.
- 5. Record the multi-camera edits: A special view in the Program Monitor (the Multi-Camera view) lets you switch between camera angles during playback.
- **6.** Adjust and refine edits: Once the edit is roughed out, you can refine the sequence with standard editing and trimming commands.

# Creating a multi-camera sequence

You can use multiple angles; the only limiting factor is the computing power required to play back your clips. If your computer and hard drives are fast enough, you should be able to play back several streams in real time.

### **Determining the sync points**

To synchronize multiple angles of footage, you'll need to determine how you want to create the multi-camera sequence. You can select from five methods to use for the sync

references. The method you choose will be partly a matter of personal choice and partly how the footage was shot.

- In points: If you have a common starting point, you can set an In point on all clips you want to use. This method is effective as long as all cameras are rolling before the critical action starts.
- Out points: This method is similar to syncing with an In point but instead uses a common Out point. Out-point syncing is ideal when all cameras capture the ending of critical action (such as crossing the finish line) but were started at different times.
- **Timecode:** Many professional cameras allow the timecode to be synchronized across multiple cameras. You can sync multiple cameras by connecting them to a common sync source or by carefully configuring the cameras and syncing the recording process. In many cases, the Hours number is offset to identify the camera number. For example, camera 1 would start at 1:00:00:00, and camera 2 would start at 2:00:00:00. You can choose to ignore the Hours number when syncing with timecode.
- Clip marker: In and Out points can be accidentally removed from a clip. If you'd like to mark a clip in a more robust fashion, you can use a marker to identify a common sync point. Markers are more difficult to accidentally remove from a clip. They can also be based on any part of the action—perhaps an event partway through the recording that all cameras captured.
- Audio: If every camera recorded audio (even if it's just poor-quality reference audio from a shotgun microphone),

Premiere Pro can synchronize the clips automatically. The results with this method depend upon your audio being reasonably clean.

#### Tip 👅

If you don't have a good visual clue in the video to sync multiple clips to, look for a clap or loud noise in the audio track. It's often easier to sync video by looking for a common spike in the audio waveform. Add a marker at each point, and then use the markers to sync.

#### Syncing with markers

Say you have four clips that recorded the same bike race from four different camera angles, but the four cameras started recording at different times. Your first task is to find the same point in time for all four clips so they will be in sync.

This could be accomplished by using a common event (such as the firing of a starter's pistol or a camera flash). Simply load each clip into the Source Monitor and add a marker (M) for each instance of the event. You can then use these markers to synchronize the clips.

### Add clips to a multi-camera source sequence

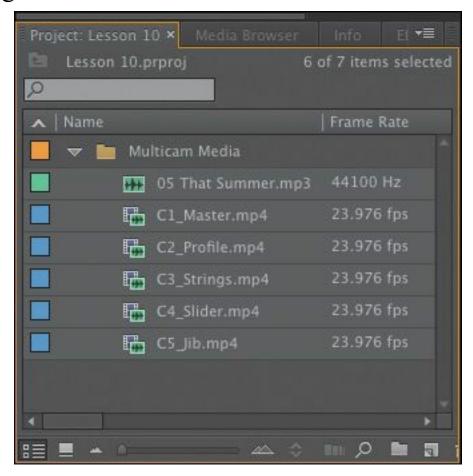
Once you've identified the clips you want to use (as well as a

common sync point), you can create a multi-camera source sequence. This is a specialized type of sequence that is designed for multi-camera editing.

1. Select all the clips in the Multicam Media bin.

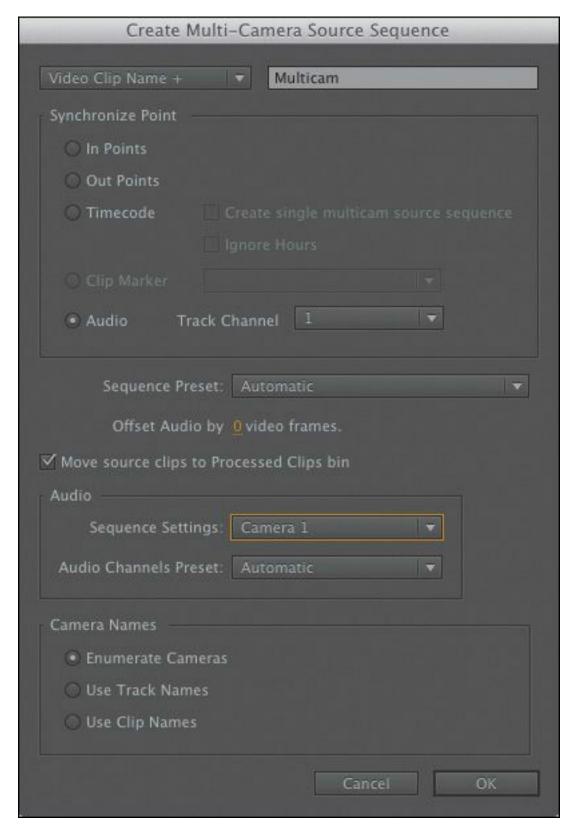
The order in which you select the clips is the order in which they will be added to the sequence. By holding Control (Windows) or Command (Mac OS), you can select one clip after another to define them as specific camera angles. For example, if you click to select clips 1, then 2, then 3, they'll become Camera Angle 1, then 2, then 3.

If you select clips 1, then 3, then 2, they'll become Camera Angle 1, then 3, then 2. This can easily be changed later.



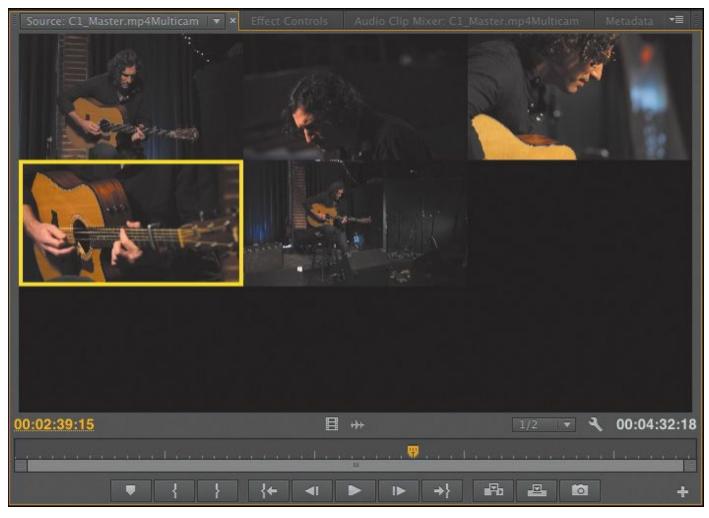
2. Right-click one of the clips, and choose Create Multi-Camera Source Sequence. You can also choose Clip > Create Multi-Camera Source Sequence.

A new dialog opens, asking how you want to create the multi-camera source sequence.



- 3. Under Synchronize Point, choose the Audio method.
- **4.** In the Audio Sequence Settings menu, choose Camera 1. In fact, because one of our clips is audio-only, it will

- automatically be used as the audio for the newly created multi-camera sequence. If we didn't have that audio-only clip, Premiere Pro would use the first selected shot.
- 5. Our clips have useful names we can use as Camera Angle names. Under Camera Names, choose Use Clip Names, and click OK.
  - Premiere Pro analyzes the clips and adds a new multicamera source sequence to the bin.
- **6.** Double-click the multi-camera source sequence to load it into the Source Monitor panel.





The clip you click first in the bin when selecting angles will become the audio track that is used for the multi-camera source sequence (even when changing angles), unless you include an audio-only clip (which Premiere Pro will presume you want to use).

Another approach is to place a dedicated audio recording on another track and sync it. A third option, Audio Follows Video, can be chosen from the Multi-Camera Monitor view (upper-right corner of the panel) to sync the audio changes to the video.

7. Drag the playhead through the clip to view the multiple angles.

The clips are displayed in a grid to show you all of the angles at once. Some angles start in black because the cameras began recording at different times.

In this case you're using the automated Project panel workflow to create a multi-camera sequence. You can also manually create a sequence, position the clips in sync on different tracks, nest it in a target sequence, and then manually enable multi-camera editing by right clicking the nest sequence and choosing Multi-camera > Enable.

Manually creating a multi-camera sequence takes longer but gives you more flexibility.

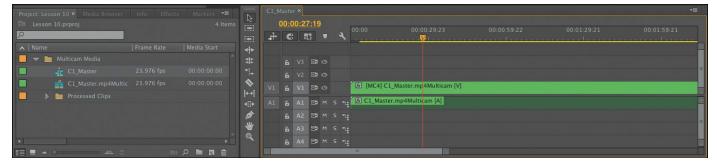


Premiere Pro automatically adjusts the multicamera grid to accommodate the number of angles in use. For example, if you have up to four clips, you would see a 2x2 grid. If you used between five and nine clips, you'd see a 3x3 grid; if you used 16 angles, the grid would be 4x4; and so on.

### Create the multi-camera target sequence

Once you've made the multi-camera source sequence, you'll need to place it into another sequence. Essentially, it will behave like a clip in your sequence. However, this clip has multiple angles of footage to choose from as you edit.

- 1. Locate the multi-camera source sequence named C1 Master.mp4Multicam.
- 2. Right-click the multi-camera source sequence and choose New Sequence From Clip, or drag the clip onto the New Item button menu at the bottom of the Project panel. You now have a ready-to-use multi-camera target sequence.

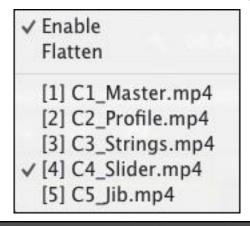


**3.** Right-click the nested Multi-Camera sequence and choose Multi-Camera.

Multi-Camera mode is already enabled for this nested "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

sequence. It's enabled automatically because of the way you created the sequence. You can turn this option off or on at any time.

4. One of the camera angles is already selected. Try choosing another angle and see the Program Monitor update, along with the name of the clip.





### Tip 🏲

To see the contents of a multi-camera sequence, hold Control (Windows) or Command (Mac OS) and double-click it. You can edit the contents of the sequence as you would any other. Changes you make will update in the target sequence.

## Switching multiple cameras

Once you've built the multi-camera source sequence and added it to a multi-camera target sequence, you're ready to edit.

You'll do this in real time using the Multi-Camera view in the Program Monitor. You can switch between the different angles by clicking in the Program Monitor or using a keyboard shortcut.

### **Enable recording**

Multi-camera editing works by selecting a camera angle for the current clip on the Timeline.

If playback is stopped, you can click an angle on the left of the Program Monitor and the current clip in the sequence will update to match.

If your sequence is playing, when you click an angle in the Program Monitor the sequence clip will update accordingly. However, this time an edit is also applied to the clip, separating the angle selected just before you clicked from the new angle. You won't see edits until after you stop playback.

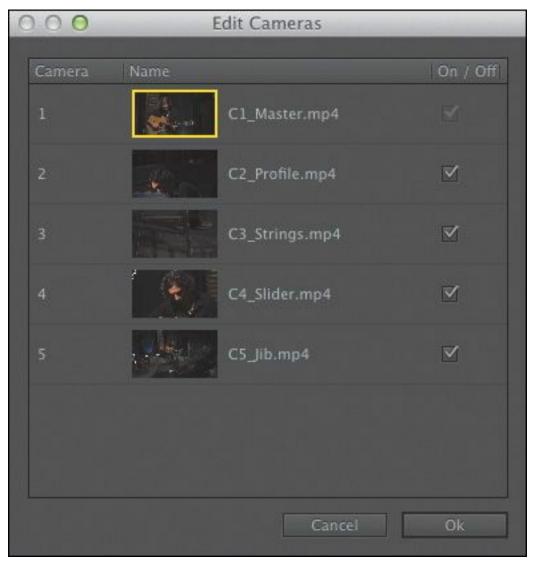
Let's perform a multi-camera edit:

1. Click the Settings button menu on the Program Monitor and choose Multi-Camera. The Settings button menu gives access to a number of display modes. The default view, showing regular video, is called Composite Video.



2. Play the sequence to get familiar with it.

3. If you would prefer the camera angles be displayed in a different order, it's easy to change. Click the Program Monitor Settings button menu and choose Edit Cameras. You can drag the camera angles into any order you prefer. For now, click Cancel.



- **4.** Hover your mouse over the Program Monitor and press the `(grave) key to maximize the panel.
- 5. Set the playhead at the start of the sequence and press the spacebar to start playback.
  - The first few seconds are silent until the click track begins. You will hear a series of short beeps followed by

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#### Note

The first nine camera angles are assigned to keys 1–9 along the top of your keyboard (not the numerical keypad) by default. For example, use the 1 key to select Camera 1, press the 2 key to select Camera 2, and so on.

6. Switch between the multiple camera angles based on your personal preference. You can also use the keyboard shortcuts, 1–5, that correspond to the camera angle you want to switch to while recording.

When the sequence finishes playback, it will have multiple edits. Each separated clip's label starts with [MC#]. The number represents the camera angle used for that clip.



Featured track, used with permission: "That Summer," by Jason Masi (www.jasonmasi.com)

#### Note

If you have effects applied to your clips, these are displayed as usual in the Program Monitor. This

is helpful if you have applied color adjustments to match different angles.

- 7. Press the `(grave) key to minimize the Program Monitor panel to normal size.
- **8.** Play the sequence and review your edit. The audio is a bit loud.
- 9. Right-click the audio track and choose Audio Gain. A new dialog opens.
- **10.** In the Adjust Gain By field, enter **–8dB** and click OK to lower the audio.

#### Re-record multi-camera edits

The first time you record a multi-camera edit, it's possible you will miss a few edits. Perhaps you cut too late (or too early) to an angle. You also may decide that you like one angle better than another. This is easy to correct:

- 1. Move the playhead to the start of the Timeline panel.
- 2. Press the Play button in the Multi-Camera view to start playback.

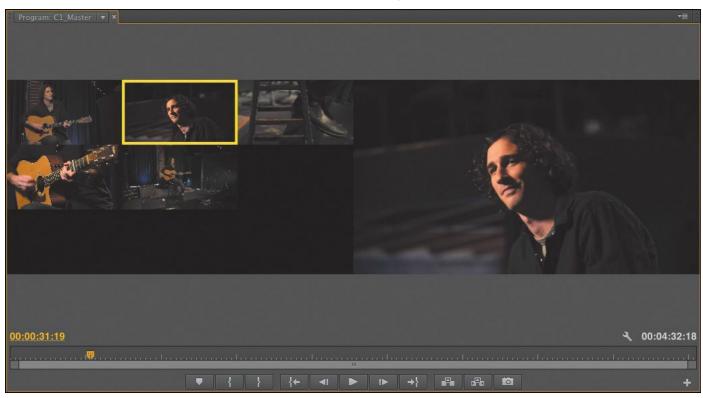
The angles in the Multi-Camera view switch to match the existing edits in your Timeline.

#### Note

After making your edits, you can always change them in the Multi-Camera view of the Program Monitor or on the Timeline. You can even trim parts of the multi-camera sequence as you would any other clip.

3. When the playhead reaches the spot you want to change, switch the active camera.

You can press one of the keyboard shortcut keys (in this case, 1–5), or you can click your preferred angle in the Multi-Camera view of the Program Monitor.





"That Summer," by Jason Masi (<u>www.jasonmasi.com</u>)

- **4.** When you finish editing, stop playback by pressing the spacebar.
- **5.** Click the Program Monitor Settings button menu and choose Composite Video to return to a regular viewing mode.

# Finalizing multi-camera editing

Once you've performed a multi-camera edit in the Multi-Camera view, you can refine and then finalize it. The resulting sequence is like any other sequence you've built, so you can use any of the editing or trimming techniques you've learned so far. There are a few other specialized options available, however.

### Switching an angle

If you're happy with the timing of an edit but not the angle you chose, you can always swap the angle for another. There are a few ways to do this.

- Right-click a clip, choose Multi-Camera, and specify an angle.
- Use the Multi-Camera view of the Program Monitor (as you did earlier in the lesson).
- If the correct track is enabled, or a nested multi-camera sequence clip is selected, use the keyboard shortcuts 1–9.

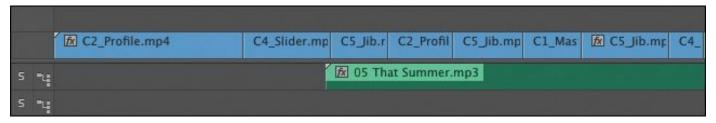
### Flattening a multi-camera edit

You can flatten a multi-camera edit to reduce the amount of processing power needed for playback and simplify the sequence. When you flatten the edit, the nested multi-camera sequence clips are replaced with the original selected camera angle clips.

The process is easy:



- 1. Select all the multi-camera clips you'd like to flatten.
- 2. Right-click any clip and choose Multi-Camera > Flatten.



Once the clips are flattened, the process cannot be reversed (other than by choosing Edit > Undo).

### **Review questions**

- 1. Describe five kinds of sync point for multi-camera clips.
- 2. Identify two ways to have the multi-camera source and multi-camera target sequences match settings.
- 3. Name two ways to switch between angles in the Multi-Camera view.
- 4. How can you modify an angle after closing the Multi-Camera view?

#### **Review answers**

- 1. The five ways are In points, Out points, timecode, audio, and markers.
- 2. You can either right-click the multi-camera source sequence and choose New Sequence from Clip, or drag the multi-camera source sequence into an empty sequence and let it auto-conform the settings.
- 3. To switch angles, you can either click the preview angle in the monitor or use the corresponding shortcut key (1–9) for each angle.
- 4. You can use any of the standard trimming tools in the Timeline to adjust the edit points for an angle. If you want to swap the angle, right-click it in the Timeline, choose Multi-Camera from the context menu, and choose the camera angle you want to use.

# 11. Editing and Mixing Audio

#### Lesson overview

In this lesson, you'll learn about the following:

- Working in the Audio workspace
- Understanding audio characteristics
- Adjusting clip audio volume
- Adjusting audio levels in a sequence
- Using the Audio Clip Mixer and the Audio Track Mixer



This lesson will take approximately 60 minutes.

In this lesson, you'll learn some audio-mixing fundamentals, using the powerful tools provided by Adobe Premiere Pro CC. Believe it or not, good sound will often make the pictures look better.



Until now, our focus has been primarily on working with visuals. No doubt about it, the pictures count, but professional editors generally agree that sound is at least as important as the images on the screen—sometimes more important!

# **Getting started**

It's rare to have audio recorded on-camera that is perfect for your final output. There are several things you might want to do with sound in Premiere Pro:

• Tell Premiere Pro how to interpret recorded audio channels differently from the way they were recorded in-

camera. For example, audio recorded as stereo can be interpreted as separate mono tracks.

- Clean up background sound. Whether it's system hum or the sound of an air-conditioning unit, Premiere Pro has tools for adjusting and tuning your audio.
- Adjust the volume of different frequencies in your clips (different tones) using EQ effects.
- Adjust the volume level on clips in the bin and on clip segments in your sequence. The adjustments you make on the Timeline can vary over time, creating a complete sound mix.
- Add music.
- Add audio spot effects, such as explosions, door slams, or atmospheric environmental sound.

Consider the difference it makes if you turn the sound off when watching a horror movie. Without an ominous soundtrack, scenes that were scary a moment ago can look like comedy.

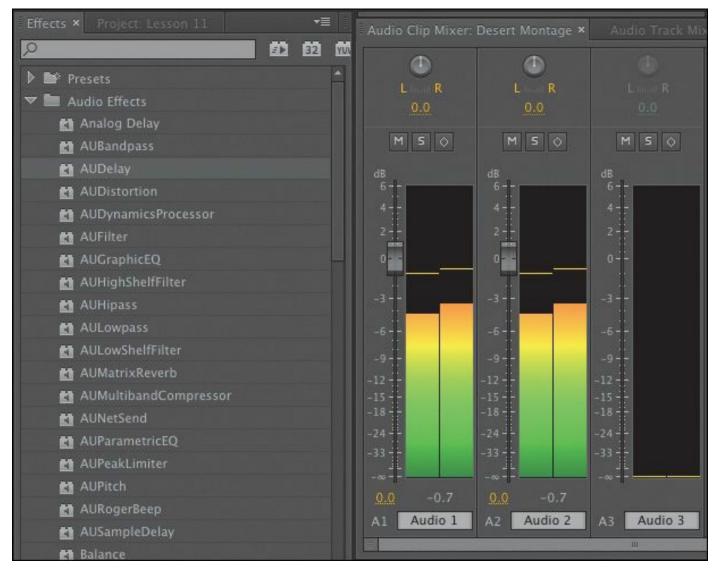
Music works around many of our intellectual critical faculties and directly influences our emotions. In fact, your body reacts to sound whether you want it to or not. For example, it's normal for your heart rate to be influenced by the beat of the music you're listening to. Fast music tends to raise your heart rate, and slow music tends to lower your heart rate. Powerful stuff!

In this lesson, you'll begin by learning how to use the audio tools in Premiere Pro and then make adjustments to clips and a sequence. You'll also use the Audio Mixer to make changes to your volume "on the fly" while your sequence plays.

# Setting up the interface to work with audio

Premiere Pro gives access to most aspects of the interface via the Window menu. You could open each of the tools used for working with audio one by one by going to the menu and selecting them, but it's quicker to use a workspace.

- 1. Open Lesson 11.prproj.
- 2. Choose Window > Workspace > Audio.
- **3.** Choose Window > Workspace > Reset Current Workspace.
- 4. Click Yes in the Reset Workspace dialog.



### The Audio workspace

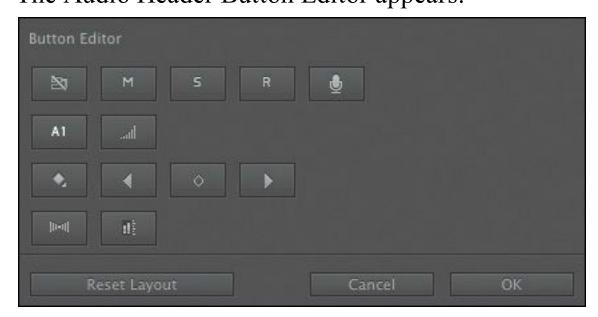
You'll recognize most of the components of the Audio workspace from the video editing workspaces you've used. One obvious difference is that the Audio Clip Mixer is displayed in place of the Source Monitor. The Source Monitor is still in the frame; it's just hidden, grouped with the Audio Clip Mixer and Audio Track Mixer.

You'll notice that the audio meters have disappeared too. This is because the Audio Mixers have their own audio meters.

You can modify the appearance of the Timeline track headers to include an audio meter for each track, along with track-based level and pan controls.

To add audio meters to your tracks:

Click the Timeline Settings button menu ( ) and choose Customize Audio Header.
 The Audio Header Button Editor appears.



2. Drag the Track Meter button ( ) onto an audio header and click OK.



You may need to resize audio headers vertically and horizontally to see the new meter.

It's important to understand the differences between the Audio Clip Mixer and the Audio Track Mixer.



They look very similar but apply different adjustments:

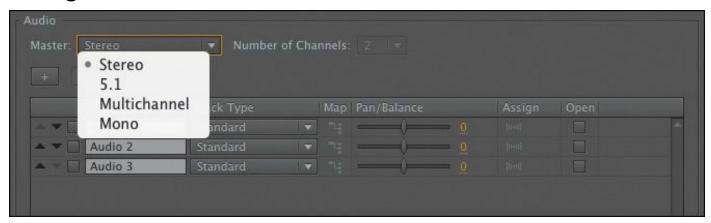
- The Audio Clip Mixer provides controls to adjust the audio level and pan of clips. As you play your sequence, you can make adjustments, and Premiere Pro will add keyframes to clips.
- The Audio Track Mixer works in a very similar way, but it adjusts audio level and pan on tracks. Clip adjustments and track adjustments are combined for final output. So, if you reduce the clip audio level by –3dB and then also reduce the track audio level by –3dB, you'll have a total drop of –6dB. The Audio Track Mixer also offers trackbased audio effects and submixes, which allow you to combine the outputs from multiple tracks.

You can apply clip-based audio effects and modify their settings in the Effect Controls panel. Audio adjustments applied using clip-based effects and Audio Track Mixer effects are "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

combined, but clip-based effects are applied first.

### Master track output

When you create a sequence, you define the number of audio channels it produces by choosing an audio master setting. It's easiest to think of your sequence as a media file. It will have a frame rate, frame size, audio sample rate, and channel configuration.



The audio master setting is the number of audio channels the sequence would have as a file:

- Stereo: Two audio channels—Left and Right.
- **5.1:** Six audio channels—Middle, Front-Left, Front-Right, Rear-Left, Rear-Right, and Low Frequency Effects (LFE).
- **Multichannel:** One to thirty-two audio channels—you can choose.
- Mono: One audio channel.

You can change most sequence settings later, but not the audio master setting. This means that, with the exception of multichannel sequences, you cannot change the number of channels that your sequence will output.

You can add or remove audio tracks at any time, but the audio master setting is fixed. If you need to change your audio master setting, you can easily copy and paste clips from a sequence with one setting to a new sequence with a different setting.

#### What is an audio channel?

You could be forgiven for thinking that Left and Right audio channels were in some way identifiably different. In fact, they are both simply mono audio channels designated as Left or Right. When recording sound, it's the standard configuration to have Audio Channel 1 as Left and Audio Channel 2 as Right.

What makes Audio Channel 1 Left is:

- It's recorded from a microphone pointing left.
- It's interpreted as Left in Premiere Pro.
- It's output to a speaker positioned on the left.

None of these factors changes the fact that it is still a single mono channel. They are nothing more than conventions.

If you do the same for audio recorded from a microphone pointing right (but with Audio Channel 2), then you have stereo audio. They are really two mono audio channels.

#### The audio meters

The primary function of the audio meters is to give you an

overall mix output volume for your sequence. As your sequence plays, you'll see the level meter dynamically change to reflect the volume.

To see the audio meters:

- **1.** Choose Window > Audio Meters.
  - In the default Audio workspace, the audio meters are quite small. You'll need to make them bigger so you can work with them.
- 2. Drag the left edge of the panel a little to make them wider so you can see the buttons at the bottom of the panel. Keep them onscreen while going through this lesson.

If you right-click the audio meters, you can choose a different display scale. The default is a range from 0 dB to -60 dB.

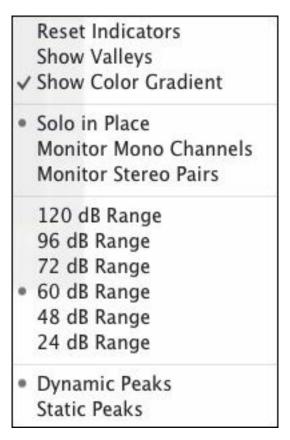


You can also choose between static and dynamic peaks: When you get a loud "spike" in audio levels that makes you glance at the meters, the sound is gone by the time you look. With static peaks, the highest peak is marked and maintained in the meters "\*\*\*\*\*ebook converter DEMO - www.ebook-

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so you can see what the loudest level was during playback up to that point.

You can click the audio meters to reset the peak. With dynamic peaks, the peak level will continually update; keep watching to check the levels.



#### About audio level

The scale on the audio meters is decibels, denoted by dB. The decibel scale is a little unusual in that the highest volume is designated as 0. Lower volumes become larger and larger negative numbers until they reach negative infinity.

If a recorded sound is too quiet, it might get lost in the background noise. Background noise might be environmental, such as an air-conditioning system

making a hum. It also might be system noise; the quiet hiss you hear from your speakers when no sound is playing.

When you increase the overall volume of your audio, background noise gets louder too. When you decrease the overall volume, background noise gets quieter. This means it's often better to record audio at a higher level than you need (while avoiding over-driving) and then reduce the volume later to remove (or almost remove) the background noise.

Depending on your audio hardware, you may have a bigger or smaller signal-to-noise ratio; that's the difference between the sound you want to hear (the signal) and the sound you don't want to hear (the background noise). Signal-to-noise ratio is often shown as SNR, also measured in dB.

### Viewing samples

Let's look at an audio sample.

- 1. Browse to the Music bin, and double-click the clip 11 Rue The Whirl.aif to open it in the Source Monitor.
  - Because this clip has no video, Premiere Pro displays the waveforms for the two audio channels.
  - At the bottom of the Source Monitor and Program Monitor, a time ruler represents the total duration of the clip.
- 2. Click the Source Monitor Settings button menu, and choose Time Ruler Numbers to enable them.

The time ruler now shows timecode indicators on the time ruler. Try zooming in to the time ruler using the navigator. The maximum zoom shows you an individual frame.



- 3. Click the Source Monitor Settings button menu again, and choose Show Audio Time Units.
  - This time, you'll see individual audio samples counted on the time ruler. Try zooming in a little more—now you can zoom in to an individual audio sample; in this case, one 44,100th of a second.
- 4. The Timeline panel has the same option to view audio samples in the panel menu. For now, switch off the Time Ruler Numbers option and the Show Audio Time Units option in the Source Monitor using the Settings button menu.

#### Note

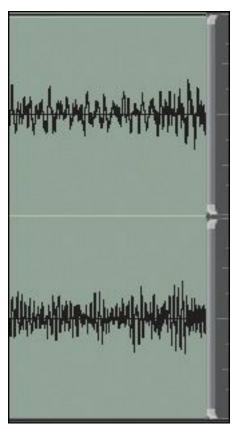
The audio sample rate is the number of times per second the recorded sound source is sampled. It's common for professional camera audio to take a sample 48,000 times per second.

### Showing audio waveforms

When you open a clip in the Source Monitor that has only audio

(no video), Premiere Pro automatically switches the display to show audio waveforms.

When you use the waveform display option in the Source Monitor or Program Monitor, you'll see an extra navigator zoom control for each channel. These controls work in a way that's very similar to the navigator zoom control at the bottom of the panel. You can resize the vertical navigator to see the waveforms larger or smaller, which is useful if your audio is quiet.



You can choose to display audio waveforms for any clip that has audio by using the panel's Settings button menu. The same option exists for the Source Monitor and the Program Monitor.

- 1. Open the clip HS John from the Theft Unexpected bin in the Source panel.
- 2. Click the Settings button menu, and choose Audio

#### o Note

This option is great if you are trying to locate some specific dialogue and you are not so concerned about the visuals.

3. Switch back to viewing the visuals by clicking the Settings button menu again and choosing Composite Video.

You can also turn off and on the display of waveforms for clip segments on the Timeline.

#### Tip 🕟

In the Source Monitor, you can switch between audio waveforms and video by clicking the Drag Only Audio or Drag Only Video ( buttons at the bottom of the viewer.

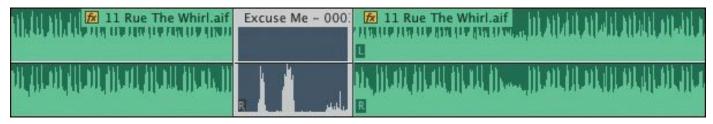
- **4.** Open the Theft Unexpected sequence in the Master Sequences bin.
- 5. Click the Timeline Settings button menu and make sure Show Audio Waveform is selected.
- **6.** Resize the Audio 1 track until the waveform is visible. Notice that two audio channels are displayed on one audio track in this sequence—the clips have stereo audio.



#### Standard audio tracks

The standard audio track type can accommodate both mono audio clips and stereo audio clips. The controls in the Effect Controls panel, the Audio Clip Mixer, and the Audio Track Mixer work with both kinds of media.

If you're working with a combination of mono and stereo clips, you'll find it more convenient to use the standard track type than the traditional separate mono or stereo tracks.



This standard audio track displays a stereo waveform for a music clip and a mono waveform for some dialogue.

### Monitoring audio

You can choose which audio channels you hear when monitoring.

Let's try this with a sequence.

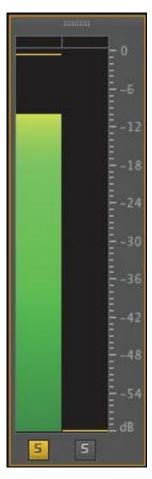
- 1. Open the Desert Montage sequence.
- 2. Play the sequence, and while you do, try clicking each of the Solo buttons at the bottom of the audio meters.

Each Solo button allows you to hear only the channel you

select. This is particularly useful if you are working with audio where the sound from different microphones is recorded onto different tracks. This is common with professionally recorded location sound.

The number of channels and associated Solo buttons you'll see depends on your current sequence audio master setting.

You can also use the track header Mute button ( or Solo button ( for an individual audio track.



#### What are audio characteristics?

Imagine the surface of a speaker moving as it beats the air. As it moves, it creates a high- and lowpressure wave that moves through the air until it arrives at your ear in much the way that surface

ripples move across a pond.

As the pressure wave hits your ear, it makes a tiny part of it move, and that movement is converted into electrical energy that is passed to your brain and interpreted as sound. This happens with extraordinary precision, and since you have two ears, your brain does an impressive job of balancing the two sets of sound information to produce an overall sense of what you can hear.

Much of the way we hear is active, not passive. That is, your brain is constantly filtering out sounds it decides are irrelevant so you can focus your attention on things that matter. For example, you have probably had the experience of being at a party where the general hubbub of conversation sounds like a wall of noise until someone across the room mentions your name. You perhaps didn't realize your brain was listening to the conversation the whole time, because you were concentrating on listening to the person standing next to you.

There's a body of research on this subject that broadly falls under the title psychoacoustics. For these exercises, we'll be focusing on the mechanics of sound more than on the psychology, though it's a fascinating subject worthy of further study.

Electronic recording equipment makes no such subtle discrimination, which is part of the reason why it's so important to listen to location sound with headphones and to take care to get the best

possible recorded sound. It's usual practice to try to record location sound with no background noise at all. The background noise is added in post-production at precisely the right level to add atmosphere to the scene but not drown out the dialogue.

# **Examining audio characteristics**

When you open a clip in the Source Monitor and view the waveform, you're seeing each channel displayed. The taller the waveform, the louder the audio for that channel.

There are just three factors that change the way audio sounds to your ears. Let's consider them in terms of a television speaker.

- Frequency: How fast the speaker moves. The number of times the surface of a speaker beats the air per second is measured as Hertz (Hz). Human hearing ranges from approximately 20 Hz to 20,000 Hz. Many factors, including age, affect the frequency range you can hear.
- **Amplitude:** How far the speaker moves. The bigger the movement, the louder the sound, because this produces a higher-pressure wave, which carries more energy to your ears.
- **Phase:** The precise timing with which the surface of the speaker moves outward and inward. If two speakers move outward and inward in sync, they are considered "in phase." If they move out of sync, they become "out of phase," and this can produce problems with sound reproduction. One speaker can reduce the air pressure at

exactly the moment the other speaker is attempting to increase it. The result is that you may not hear parts of the sound.

We're using the surface of a speaker as a simple example of the way sound is generated, but, of course, the same rules apply to all sound sources.

# Voice-over "scratch track"

If you have a microphone set up, you can record audio directly to the Timeline using the Audio Track Mixer or a special Voice-over Record button on an audio track header. To record audio in this way, check that your Audio Hardware preferences are set up to allow input.

Let's try the Voice-over Record button:

- 1. Open the Voice Over sequence in the Master Sequences bin.
- 2. Click the Timeline Settings button menu and choose Customize Audio Header.
- 3. Drag the Voice-over Record button ( ) onto the Audio 1 track header. You may need to resize the header to make enough space for the button.
- 4. Mute your speakers or wear headphones while recording voice-over to avoid getting microphone feedback.
- 5. Position the playhead at the beginning of the sequence and click the Voice-over Record button. The Program Monitor gives a short countdown and you can begin.



As you record, the Program Monitor shows you're recording and the Audio Meter shows the input level.

**6.** When you are finished recording, press the spacebar or click the Voice-over Record button to stop.

The new audio appears on the Timeline and an associated clip appears in the Project panel. A new audio file will be created in the same location as your project file.

The quality of recording may not be fantastic unless you use a professional microphone, but this is useful for recording rough guide-track audio to give you something to edit to while waiting for a professional voice-over.

### Adjusting audio volume

There are several ways to adjust the volume of clips with Premiere Pro, and they are all nondestructive—that is, any changes you make will not affect your original media file.

### Adjusting audio in the Effect Controls panel

You have used the Effect Controls panel to make adjustments to the scale and position of clips in a sequence. You can also use the Effect Controls panel to adjust volume.

1. Open the Excuse Me sequence from the Master Sequences bin.

This is a very simple sequence with just one clip in it. However, the clip has been added to the sequence twice. One version has been set (in the bin) as stereo, and the other has been set as mono.

- 2. Click the first clip to select it, and go to the Effect Controls panel.
- **3.** Expand the Volume, Channel Volume, and Panner controls in the Effect Controls panel.



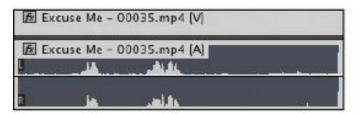
Each control gives the right options for the type of audio you have selected:

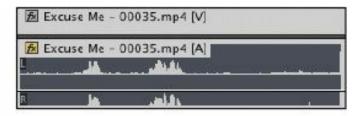
- Volume adjusts the combined volume of all the audio channels in the selected clip.
- Channel Volume allows you to adjust the audio level for individual channels in the selected clip.
- Panner gives you overall stereo left/right balance control for the selected clip.

Notice that the keyframe toggle stopwatch icon is automatically enabled for all the controls. This means every change you make will add a keyframe.

However, if you add only one keyframe and use it to set

- the audio level, it adjusts the overall level for the clip.
- **4.** Position the Timeline playhead over the clip where you would like to add a keyframe (it doesn't make too much difference if you intend to make only one adjustment).
- 5. Click the Timeline Settings menu and make sure Show Audio Keyframes is selected.
- **6.** Increase the height of the Audio 1 track so you can see the waveform and keyframe rubber band.
- 7. In the Effect Controls panel, drag left on the orange numbers that set the volume level.
  - Premiere Pro adds a keyframe, and the rubber band moves down to show the reduced volume.





Before

After

**8.** Now select the second version of the Double Identity clip in the sequence.

You'll notice you have similar controls available in the Effect Controls panel, but now there is no Channel Volume option. This is because each channel is its own clip segment, so the Volume control for each channel is already an individual one.



**9.** Experiment with adjusting the volume for these two independent clips.

#### Note

The volume adjustments for individual channels are cumulative with the overall volume level adjustment. This means you can add a boost or cause unintentional audio distortion by combining them.

### Adjusting audio gain

Most music is created with the loudest possible signal to maximize the difference between the signal and the background noise. This is too loud to use in most video sequences. To address this issue, you need to adjust the clip's audio gain.

- 1. Open the clip 11 Rue The Whirl.aif from the Music bin in the Source Monitor. Notice the size of the waveform.
- 2. Right-click the clip in the bin, and choose Audio Gain.

Audio Gain		
Set Gain to:		ОК
Adjust Gain by:	-20 dB	Cancel
O Normalize Max Peak to:		U
O Normalize All Peaks to:		
Peak Amplitude: 0.0 dB		

There are two options in the Audio Gain panel that we're interested in for now:

- Set Gain to: Use this option to specify a particular adjustment for your clip.
- Adjust Gain by: Use this option to specify an incremental adjustment for your clip. For example, if you apply -3 dB, this will adjust the "Set Gain to" amount to -3 dB. If you go into this menu a second time and apply another -3 dB adjustment, the "Set Gain to" amount will change to -6 dB, and so on.
- 3. Set the gain to -20 dB, and click OK.

Right away, you'll see the waveform change in the Source Monitor.

Changes like this, where you are adjusting the audio gain in the bin, will not update clips already edited into a sequence. However, you can right-click one or more clips in a sequence and make the same kind of adjustment there.

### Note

None of the changes you make to the volume of "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

your clips will change the original media files. You can make a change to the overall gain here, in the bin, or on the Timeline, in addition to any changes you make using the Effect Controls panel, and your original media files will remain unmodified.

### Normalizing audio

Normalizing audio is very similar to adjusting gain. In fact, normalization results in an adjustment to the clip gain. The difference is that normalization is based on automated analysis rather than on your subjective judgment.

When you normalize a clip, Premiere Pro analyzes the audio to identify the single highest peak—the loudest part of the audio. The gain for the clip is then adjusted automatically so that the highest peak matches a level you specify.

You can have Premiere Pro adjust the volume for multiple clips so that they match any perceived volume you like.

Imagine working with multiple clips of a voice-over, recorded over several days. Perhaps because of different recording setups or working with different microphones, several clips might have different volumes. You can select all of the clips and, in a single step, have Premiere Pro automatically set their volumes to match. This saves significant time you would have spent manually going through each clip, one by one, to make adjustments.

Try normalizing:

1. Open the Theft Unexpected sequence.

2. Play the sequence, and watch the level on the audio meters.

The voice level is pretty good, but the director wants the sound of John sitting down and his clothes rustling to be just as loud.

- 3. Select all of the clips in the sequence—you can lasso or press Control+A (Windows) or Command+A (Mac OS).
- **4.** Right-click any of the selected clips and choose Audio Gain, or press the G key.
- 5. Set Normalize All Peaks To to -8 dB, click OK, and have another listen.

Premiere Pro adjusts every clip so that the loudest peaks are at -8 dB.

If you choose Normalize Max Peak To, rather than Normalize All Peaks To, Premiere Pro will make an adjustment based on the loudest moment of all the clips combined, as if they were one clip.

#### 属 Tip

You can apply normalization in the bin too. Just select all the clips you would like to automatically adjust, go to the Clip menu, and choose Audio Options > Audio Gain.



#### Before



#### After

#### Sending audio to Adobe Audition CC

While Premiere Pro has advanced tools to help you achieve most audio-editing tasks, it can't compete with Adobe Audition, which is a dedicated audio post-production application.

Audition is a component of Adobe Creative Cloud. It integrates neatly into your workflow when editing with Premiere Pro.

You can send your current sequence to Adobe Audition automatically, bringing all of your clips and a video file based on your sequence to produce

an audio mix that follows along with the pictures. To send your sequence to Adobe Audition, follow these steps:

- 1. Open the sequence you would like to send to Adobe Audition.
- 2. Go to the Edit menu, and choose Edit > Edit in Adobe Audition > Sequence.
- 3. You'll be creating new files to work with inside Adobe Audition to keep your original media unchanged, so choose a name and browse for a location, then choose the remaining options as you prefer, and finally click OK.

Adobe Audition has fantastic tools for working with sound. It has a special spectral display that helps you identify and remove unwanted noises, a high-performance multitrack editor, and advanced audio effects and controls. For more information about Adobe Audition, go to

www.adobe.com/products/audition.html.

# Creating a split edit

A split edit is a simple, classic editing technique that offsets the cut point for audio and video. The audio from one clip is played with the visuals from another, carrying the feeling of one scene into another.

Let's try this with the Theft Unexpected sequence.

#### Adding a J-cut

The J-cut gets its name from the shape of the edit. Picture the letter J over an edit. The lower part (the audio cut) is to the left of the upper part (the video cut).

1. Play the last cut in the sequence. The join in the audio between the last two clips is rather abrupt. We'll improve things by adjusting the timing of the audio cut.



- 2. Select the Rolling Edit tool ( ).
- 3. While holding the Alt (Windows) or Option (Mac OS) key, click the audio segment edit (not the video) and drag a little to the left. Congratulations! You've created a J-cut!



4. Play through the edit.

You might want to experiment with the timing to make

the cut seem more natural, but for practical purposes the J-cut works. You can smooth it over and improve it further with an audio crossfade later.

Remember to switch back to the Selection tool (V).



You can apply a rolling edit using the Selection tool if you hold the Control (Windows) or Command (Mac OS) key.

### Adding an L-cut

An L-cut works in the same way as a J-cut but in reverse. Repeat the steps in the previous exercise, but try holding the Alt (Windows) or Option (Mac OS) key as you drag the audio segment edit a little to the right. Play through the edit and see what you think.

### Adjusting audio levels for a clip

As well as adjusting clip gain, you can use the rubber-band controls to change the volume of clips in a sequence. You can also change the volume for tracks, and the two volume adjustments will combine to produce an overall output level.

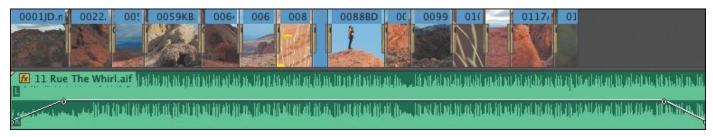
If anything, using rubber bands to adjust volume is more convenient than adjusting gain, because you can make incremental adjustments at any time, with immediate visual feedback.

The result of adjusting the rubber bands on a clip is the same as adjusting the volume using the Effect Controls panel.

### Adjusting overall clip levels

To adjust overall clip levels, do the following:

1. Open the Desert Montage sequence in the Master Sequences bin.



A fade-up and a fade-down have already been applied to the music volume, at the beginning and end. Let's adjust the volume between those fades.

2. Use the Selection tool to drag down at the bottom of the Audio 1 track header to make the track taller. This will make it easier to apply fine adjustments to the volume.

### Tip 👅

You can also hover the mouse cursor over a track header and scroll to change the height.

3. The music is a little too loud. Click the middle part of the rubber band on the music clip in the sequence, and drag down a little.

As you drag, a tool tip appears, displaying the amount of adjustment you are making.

Because you're dragging a segment of the rubber band rather than a keyframe, you're adjusting the overall level for the segment between the two existing keyframes. If the clip did not

have existing keyframes, you'd be adjusting the overall level for the entire length of the clip.

### **Keyframing volume changes**

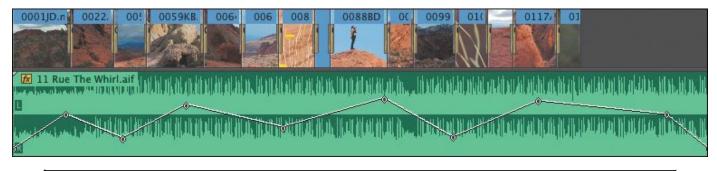
If you use the Selection tool to drag an existing keyframe, you'll adjust it. This is the same as making adjustments to visual effects using keyframes.

The Pen tool ( ) adds keyframes to rubber bands. You can also use it to adjust existing keyframes or to lasso lots of keyframes to adjust them together.

You don't need to use the Pen tool, though. If you want to add a keyframe where there is none, you can hold the Control (Windows) or Command (Mac OS) key when you click the rubber band.

The result of adding and adjusting the position of keyframes up or down on audio clip segments is that the rubber band is reshaped. Just as before, the higher the rubber band, the louder the sound.

Add a few keyframes to the music now and listen to the results.



#### Tip 👅

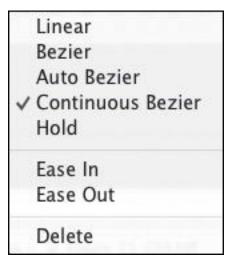
If you adjust the clip audio gain, the effect is combined with the keyframe adjustments

### Smoothing volume between keyframes

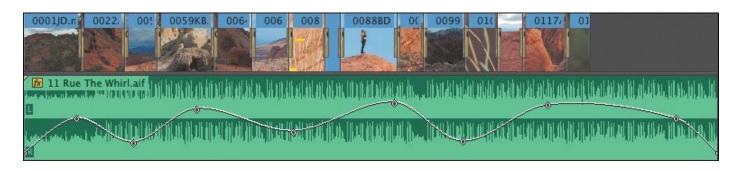
The adjustments you made in the last exercise are pretty dramatic. You might want to smooth the adjustments over time, and this is easy to do.

Right-click any of your keyframes.

You'll see a range of standard options, including Ease In, Ease Out, and Delete. If you use the Pen tool, you can lasso multiple keyframes and then right-click any one of them to apply a change to them all.



The best way to learn about the different kinds of keyframes is to select each kind, make some adjustments, and see the results. In the following example, all of the keyframes have been set to Continuous Bezier, which maintains the same curved line into the keyframe and out.



### Track vs. clip keyframes

Until now, you've made all of your keyframe adjustments to sequence clip segments. Premiere Pro has similar controls available for the audio tracks those clips are placed onto. Trackbased keyframes work in the same way as the clip-based ones. The difference is that they don't move with the clips.

This means you can set up keyframes for your audio level using track controls and then try different music clips. Each time you put new music into your sequence, you'll hear it via the adjustments you have made to your track.



#### Note

Adjustments you make to your clips are applied before adjustments you make to your tracks.

Try working with track keyframes using the Desert Montage sequence.

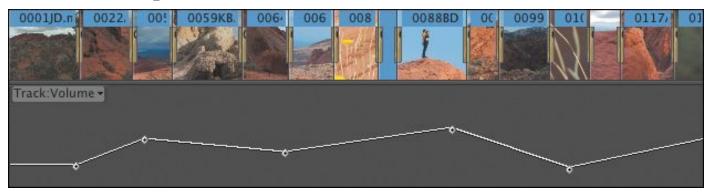
- 1. Select the Desert Montage sequence in the Sequences bin, right-click it, and choose Duplicate. It's a good idea to try new things on a copy of your sequence, rather than risk making unwanted changes to the original.
- 2. Rename the copy **Music Experiment**, and double-click it to open it.

- 3. Check that Show Audio Keyframes is selected in the Timeline Settings menu.
- **4.** Using the Selection tool, select the music clip, and delete it.
- 5. Use the Audio 1 Show Keyframes button ( ) menu to choose Track Keyframes.



By default, a rubber band for track volume is displayed. A menu on the track allows you to choose panner keyframes. If you have applied track-based effects, they appear on this menu too.

6. Lower the overall volume for the track by dragging the track rubber band down, and then add a series of dramatically varied keyframes so you can hear the results clearly when you add music. In practice, you would set keyframes so that music dips under voice-over or liveaction speech.



7. Drag the 11 Rue The Whirl.aif clip straight from the Music bin to the Audio 1 track. Position the clip at the start of the sequence. Play your sequence. You'll hear the

- results of the music, combined with the track keyframes. Undo to remove the music clip from the sequence.
- **8.** Import a new music file, Departure From Cairo.aif, from the Lessons/Assets/Music and Audio Files/Music folder. Place it in the Music bin.
- **9.** Add the new music to the sequence on the Audio 1 track. Play the sequence, and once again, you can hear the results of your keyframes.

This powerful approach to using keyframes on the Timeline might take a little planning to make the most of it, but it's worth the effort! It allows you to try lots of different music tracks before you settle on the one you want.

Note that you can't make adjustments to clips on a track that is set to display track keyframes. You'll need to switch back to clip keyframes if you want to change the position of the new music clip. Do so now.

## Tip 🗾

Be sure to switch back to clip keyframes to continue working on your sequence, using the Show Keyframes button menu for the track you are working on. While viewing track keyframes, you can't select your clips.

## Working with the Audio Clip Mixer

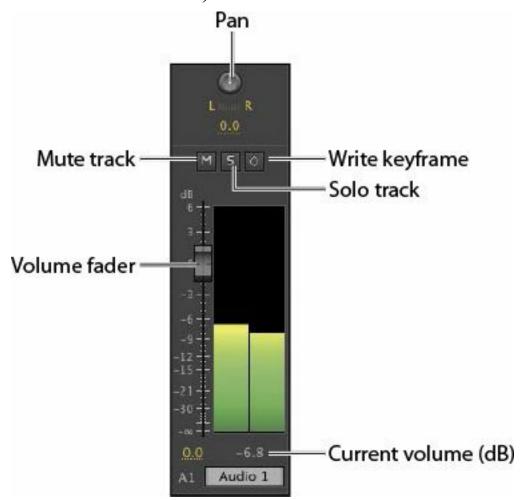
The Audio Clip Mixer provides intuitive controls to adjust clip volume and pan keyframes over time.

Each sequence audio track is represented by a set of controls. "\*\*\*\*\*ebook converter DEMO - www.ebook-

converter.com\*\*\*\*\*\*

You can mute or solo a track, and you can enable the option to write keyframes to clips during playback by dragging a fader.

Faders are industry-standard controls based on real-world audio mixing desks. You move the fader up to increase the volume and move it down to decrease the volume. You can also use the volume faders to add keyframes to your clip audio rubber band while you play the sequence (see "<u>Understanding automation modes</u>" later in this lesson).



Try this for yourself:

converter.com\*\*\*\*\*\*

- 1. Use the Music Experiment sequence you created earlier. Make sure the Audio 1 track is set to display clip keyframes.
- 2. Position the Timeline playhead at the beginning of the "\*\*\*\*\*ebook converter DEMO www.ebook-

sequence.

- 3. In the Audio Clip Mixer, enable the Write Keyframes button ( ) for Audio 1.
- **4.** Play the sequence, and while it plays, make some adjustments to the Audio 1 fader. When you stop playback, you'll see the new keyframes that you added.

#### Note

You won't see new keyframes until you stop playback.

5. If you repeat the process, you'll notice that the fader follows existing keyframes until you make a manual adjustment.

You can adjust keyframes you have created this way just as you would adjust keyframes that were created using the Selection tool or the Pen tool.

You have now discovered several ways to add and adjust keyframes in Premiere Pro. There's no right or wrong way to work with keyframes; it's entirely a matter of personal preference.

### Tip 🕟

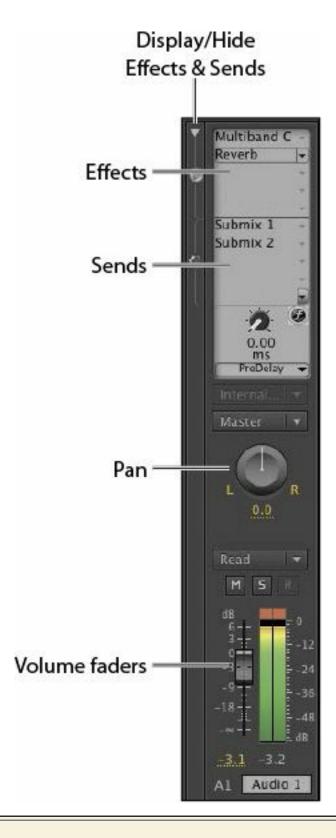
You can adjust pan in the same way as you would adjust volume using the Audio Mixer. Simply play your sequence, and make adjustments using the Audio Mixer's Pan control.

#### **Overview of the Audio Track Mixer**

While the Effect Controls panel and the Audio Clip Mixer give you control over clip segments in sequences, the Audio Track Mixer provides control over tracks. The keyframes you added manually earlier to your Audio 1 track are the kind that the Audio Track Mixer adds and can respond to.

The Audio Track Mixer is broadly divided into three parts.

- Effects and Sends: You can use drop-down menus here to add special effects to a whole track or to send the audio from the track to a submix (see below).
- **Panner:** This is just like the Panner control in the Effect Controls panel and the Audio Clip Mixer.
- **Volume faders:** These are the same as the Audio Clip Mixer faders.



#### What is a submix?

Submixes act as conduits for audio tracks. Audio tracks usually send their audio directly to the

master output.

You can, instead, configure multiple audio tracks to send their audio to a submix. This allows you to use one set of controls (the submix) to adjust things like volume and pan, or to apply one special effect, for multiple tracks.

The submix sends its audio to the master output, just as a regular track does. The main difference is that you can't put any audio clips into a submix track; they exist only to combine the outputs from multiple tracks.

For example, imagine you have recorded audio of five people in a darkened room, and you want it to sound like a cavern, with a strong reverb. You place each original audio source on its own track in the sequence.

One option would be to put the reverb special effect on each track. This would work, but it would be a lot of work for your system to play back, and it would require a lot of mouse clicks if you wanted to change the effect—you'd have to make each adjustment five times.

If, instead, you send the output from each of the five tracks to a single submix, you can apply the reverb effect to that submix. You'll hear the five tracks via the submix (which will output to the master output), so you only need to make adjustments once, and your system only needs to calculate the effect once.

## Understanding automation modes

Using the Audio Mixers, you can add new keyframes to your audio clips or tracks while your sequence plays. This way, you can create an audio mix "live." Simply play your sequence, and use a fade control to adjust the volume.

If you already have some keyframes, Premiere Pro needs to know how you would like the fader controls to respond to them. You just need to choose an automation mode before you begin (see below).

In the Audio Clip Mixer, you choose the mode using the panel menu ( ). The Audio Clip Mixer offers only Latch mode and Touch mode.

In the Audio Track Mixer, there's a menu for each track.



Here's what each mode means:

- Off: In this mode, the fader will ignore any keyframes and remain exactly where it is. You can make any changes you like to the fader, and it will affect the playback volume for the whole track.
- **Read:** In this mode, the fader follows existing keyframes, dynamically changing the playback volume for the track. You cannot add keyframes using the fader in this mode.
- Latch: In this mode, the fader will follow existing keyframes, but if you grab the fader and make adjustments, new keyframes will be applied, replacing existing ones. When you release the fader, it stays where

you put it, so if the sequence keeps playing, a new "flat" level adjustment is made, continuing to replace existing keyframes until you stop playback. This is the default mode the Audio Clip Mixer uses when adding keyframes.

- **Touch:** In this mode, the fader will follow existing keyframes, but if you grab the fader and make adjustments, new keyframes will be applied, replacing existing ones. When you release the fader, it returns to following existing keyframes.
- Write: In this mode, the fader does not follow existing keyframes at all. As you play the sequence, new keyframes are created based on the position of the fader, replacing existing ones. When you release the fader, as in Latch mode, it will stay where you leave it, adding a flat level adjustment until you stop playback.

### Producing a 5.1 mix with Adobe Audition

The advanced audio features in Premiere Pro include support for 5.1 audio. You can even work with 5.1 audio clips and master to 5.1 audio. However, Adobe Audition has a dedicated surround-sound mixer that makes 5.1 mixes amazingly fast and easy.

If you plan to use surround sound in your sequence, consider completing your video edit in Premiere Pro and then switching to Adobe Audition for your mix.

## **Review questions**

- 1. How can you solo an individual audio channel to hear only that channel?
- 2. What is the difference between mono and stereo audio?
- 3. How can you view the waveforms for any clip that has audio in the Source Monitor?
- **4.** What is the difference between normalization and gain?
- 5. What is the difference between a J-cut and an L-cut?
- **6.** Where does the Audio Track Mixer add keyframes?

#### Review answers

- 1. Use the Solo buttons at the bottom of the audio meters to selectively hear an audio channel.
- 2. Stereo audio has two audio channels, and mono audio has one. It is the universal standard to record audio from a Left microphone as Channel 1 and audio from a Right microphone as Channel 2 when recording stereo sound.
- 3. Use the Settings button menu on the Source Monitor to choose Audio Waveform. You can do the same with the Program Monitor, but you probably won't need to; clips can display waveforms on the Timeline. You can also click the Drag Audio Only button at the bottom of the Source Monitor.
- 4. Normalization automatically adjusts the Gain setting for a clip based on the original peak amplitude. You use the Gain setting to make manual adjustments.
- 5. The sound for the next clip begins before the visuals

- when using a J-cut (sometimes described as "audio leads video"). With L-cuts, the sound from the previous clip remains until after the visuals begin (sometimes described as "video leads audio").
- 6. The Audio Track Mixer works exclusively with sequence tracks, never clips. When you add keyframes using the Audio Track Mixer, you will not be able to see them (though they will still have an effect) unless you set your audio track to display track keyframes. Use the Audio Clip Mixer to work with keyframes on your clips.

# 12. Sweetening Sound

#### **Lesson overview**

In this lesson, you'll learn about the following:

- Sweetening sound with audio effects
- Adjusting equalization (EQ)
- Applying effects in the Audio Track Mixer
- Cleaning up noisy audio



This lesson will take approximately 60 minutes.



Audio effects in Adobe Premiere Pro CC can dramatically change the feel of your project. To take your sound to a higher level, leverage the integration and power of Adobe Audition CC.

## **Getting started**

You'll find many audio effects in Adobe Premiere Pro CC. These effects can be used to change pitch, create an echo, add reverb, and remove tape hiss. You can set keyframes for all of the effects and adjust their parameters over time.

Additionally, you can use the Audio Track Mixer to blend and

adjust the clips on all the audio tracks in your project. You can also combine multiple audio tracks into a single submix and apply effects, panning, or volume changes to those groups as well as to individual tracks.

For this lesson, you'll use a new project file.

- 1. Start Premiere Pro, and open the project Lesson 12.prproj.
- 2. Choose Window > Workspace > Audio.
- 3. Choose Window > Workspace > Reset Current Workspace, and click Yes in the dialog that opens.



## Sweetening sound with audio effects

Ideally, your audio will come in perfectly. Unfortunately, video production is rarely an ideal process. At some point, you'll need to turn to audio effects to fix problems. In this lesson, you'll try a few of the most useful effects in Premiere Pro.

Not all audio hardware plays all audio frequencies evenly. For example, listening to deep bass notes on a laptop is never the same as listening on larger speakers.

It's important to listen to your audio using high-quality headphones or studio monitor speakers to avoid accidentally compensating for a flaw in your playback hardware as you adjust the sound. Professional audio monitoring hardware is carefully calibrated to ensure that all frequencies play evenly, giving you confidence you'll produce a consistent sound for your listeners.

Premiere Pro offers a variety of helpful effects, including the following:

- **DeNoiser:** This audio effect can automatically detect and remove hiss or noise.
- **Reverb:** This can increase the "presence" in the recording with reverb. Use it to simulate the sound of a larger room.
- **Delay:** This effect can add a slight (or pronounced) echo to your audio track.
- **Bass:** This effect can amplify the low-end frequencies of a clip. It works well on narration clips, particularly for male voices.
- **Treble:** This effect adjusts the higher-range frequencies in an audio clip.

#### Note

Expand your knowledge about audio effects in Premiere Pro by experimenting. These effects are nondestructive, which means they do not change the original audio file. You can add any number of effects to a single clip, change settings, and then delete them and start again.

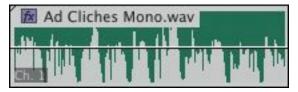
## Adjusting bass

Adjusting the amplitude of the lower frequencies can improve the overall sound of a male voice. In this example, let's try this with an announcer's voice.

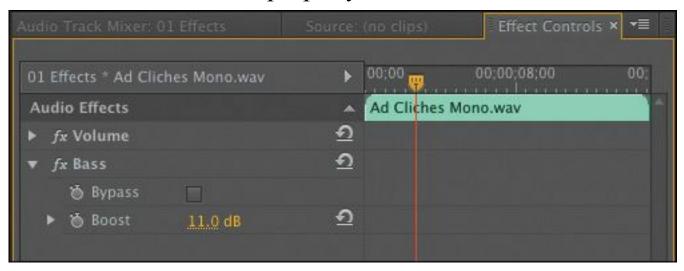
**1.** Open the 01 Effects sequence.

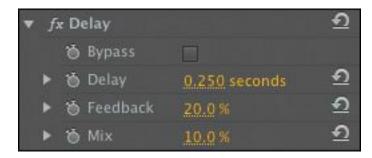
- 2. Play the first clip in the sequence, Ad Cliches Mono.wav, to get familiar with the sound. It sounds OK but would benefit from a little more low-frequency power.

  If clip names aren't visible, click the Timeline Settings button ( ) and make sure that Show Audio Names is selected.
- **3.** Browse the Audio Effects folder in the Effects panel and look for the Bass effect.
- **4.** Drag the Bass effect onto the Ad Cliches Mono.wav clip on the Timeline. Note that the Fx icon on the clip changes color to indicate that an effect has been applied.



- 5. Open the Effect Controls panel.
- **6.** Increase the Boost property to add more bass.





Experiment using different values to increase or decrease the presence of bass until you hear a sound you like. Be sure to pay attention to your overall audio levels because adjustments of this kind can change the volume of the clip. You may need to use the Audio Clip Mixer panel to maintain proper levels.

## Adding a delay

A delay is a stylized effect. It can be used on an announcer's voice to add drama, or it can be used to create a feeling of space using stylized echoes.

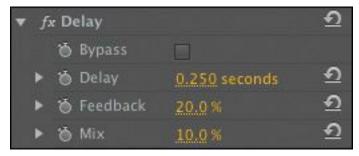
- 1. In the Audio Effects folder in the Effects panel, locate the Delay effect.
- 2. Drag it onto the Ad Cliches Mono.wav clip.
- 3. At the bottom right of the Effect Controls panel, there's a button to play the audio for the clip and a Loop Play button ( ). Turn on the Loop Play option and click the Effect Controls panel play button to hear the Delay effect. By default, there's an echo that's offset by a second. You can leave the clip playing this way while you experiment.
- 4. Try adjusting these parameters:
  - **Delay:** The time before the echo plays.
  - Feedback: The percentage of echo added back to the original audio to create echoes of echoes.

- Mix: The relative loudness of the echoes.
- 5. Press the spacebar to stop the playback.
- **6.** Enter the following values to get a classic stadium announcer effect:

• Delay: .250 seconds

• Feedback: 20%

• Mix: 10%



7. Play the clip, and move the sliders to experiment further. Lower values are a bit more palatable, even with this over-the-top audio clip. A subtle effect is usually more pleasant for listeners—remember, your audience is likely to be much less tolerant of bad audio than of bad images.

## Adjusting pitch

Another adjustment you can make is pitch. This is a useful way to change the overall tone of a sound. By altering the pitch, you can change the energy level, apparent age, or even species of a speaker.

- 1. In the Effects panel, locate the PitchShifter effect.
- 2. Drag the PitchShifter effect onto the Ad Cliches Mono.wav clip.
- 3. In the Effect Controls panel, click the Edit button next to the Custom Setup properties to show the parameters for

the effect.

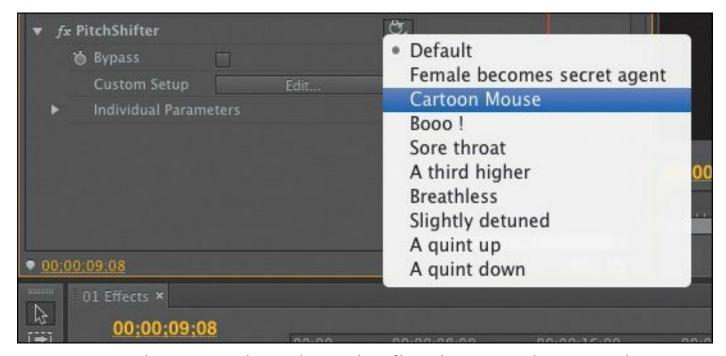
A floating panel opens.



## Tip 🕟

Quite a few audio effects have these kinds of additional interface elements.

- 4. Adjust the knobs to try out different values. Try wildly different pitch settings, from -12 to +12 semitone steps, and try switching Formant Preserve on and off. The Formant Preserve option maintains the timbre of the original sound, which you may or may not prefer for a particular clip.
- 5. Back in the Effect Controls panel, there's a button to the right of the effect name that looks a little like the regular Reset button. It's actually a menu with a list of presets for this effect. Click the button to see the options.



6. You don't need to close the floating panel to use the presets. Try some now, and notice the changes they make to the floating panel settings. When you're finished, close the floating panel.

## Adjusting treble

Earlier you applied and adjusted the Bass effect to modify the lower frequencies of an audio clip. To modify the high frequencies, use the Treble effect.

Treble is not simply the Bass effect in reverse. Treble increases or decreases higher frequencies (4000 Hz and greater), whereas the Bass effect changes low frequencies (200 Hz and less).

- 1. Drag the sequence playhead so it's over the second clip in the Timeline panel (Music Mono).
- 2. Play the second clip to get familiar with its sound.
- 3. In the Audio Effects folder in the Effects panel, find the Treble effect.
- 4. Drag the Treble effect onto the Music Mono clip.

5. Increase the Boost property to add more treble.



Increasing the treble can give your audio more clarity. Experiment using different values until you get a sound you like.

## **Adding reverb**

Reverb is similar to the Delay effect but is better suited to musical tracks. It can simulate the way a sound would be perceived in different types of rooms. It works particularly well for pieces that feature a strong guitar but can be used on just about any clip. It's a powerful effect that can give life to audio recorded in an acoustically flat room—a room such as a recording studio with minimal reflective surfaces.

- 1. In the Effects panel, locate the Reverb effect.
- 2. Drag the Reverb effect onto the Music Mono clip.



**3.** In the Effect Controls panel, click the Edit button for the Reverb effect.



**4.** There's a Presets menu at the top of the pop-up interface. Try a few of the presets and notice the effect they have on the values below the control knobs.



- 5. Experiment with the seven control knobs, which allow you to make the following adjustments:
  - **Pre Delay:** The apparent distance the sound travels to the reflecting walls and back.
  - **Absorption:** How much of the sound is absorbed (not reflected).
  - Size: The apparent relative size of the room.
  - **Density:** The density of the reverb "tail." The greater the Size value, the greater the Density range (from 0% to 100%).
- Lo Damp: Dampens low frequencies to prevent the "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*"

reverb from rumbling or sounding muddy.

- **Hi Damp:** Dampens high frequencies. A smaller Hi Damp setting makes the reverb sound softer.
- Mix: The amount of reverb.

## Tip 👅

The Reverb effect is a Virtual Studio Technology (VST) plug-in. These are custom-designed audio effects that adhere to a standard set by Steinberg audio. The creators of VST audio effect plug-ins want them to have a unique look and offer some specialized audio effects. There are many VST plug-ins available on the Internet.

## **Adjusting EQ**

If you have a good amplifier or car stereo, it probably features a graphic equalizer. The EQ controls go beyond simple Bass and Treble knobs and add multiple sliders (often called *bands*) for greater control over the sound. There are two kinds of equalization effects in Premiere Pro: the EQ effect, which has five bands, and the Parametric EQ effect, which offers a single band (but can be combined multiple times).

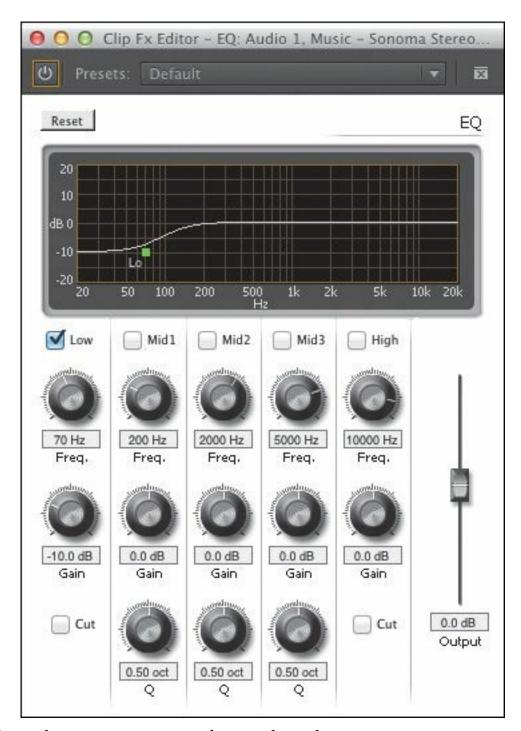
#### o Note

In the next exercise, use the suggested numbers for guidance but feel free to experiment with different settings. Your taste and speakers may vary.

## EQ

The EQ effect in Premiere Pro is similar to a traditional three-way EQ (low, mid, and high). This effect has three mid-frequency controls for even greater accuracy. This is a useful effect to smooth out a sound and emphasize (or deemphasize) part of a track.

- 1. Open the sequence 02 EQ. This sequence has one musical clip.
- 2. Locate the EQ effect in the Effects panel (try using the search field at the top of the window), and drag it onto the clip.
- 3. In the Effect Controls panel, click the Edit button for the EQ effect to view the pop-up interface.
- 4. Play the clip to get familiar with its sound.
- 5. Select the check box to activate the Low frequency filter.
- 6. Set the Low frequency to 70 Hz to change the affected area, and lower the gain to −10.0 dB. This decreases the intensity of the Bass.



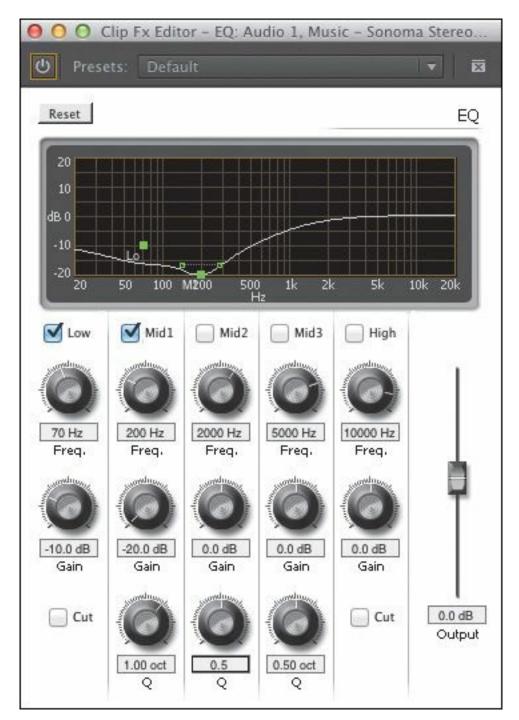
### 7. Play the sequence to hear the changes.

Take a look at the graph at the top of the EQ effect interface. The left edge represents amplitude adjustments in decibels. The bottom edge represents frequencies. Notice the shape of the line. It represents all of the adjustments you're making to the audio. You're not just adjusting the 70 Hz frequencies. The curve of the line

means adjustments are made to other frequencies, often producing a more natural sound.

Let's refine the vocals.

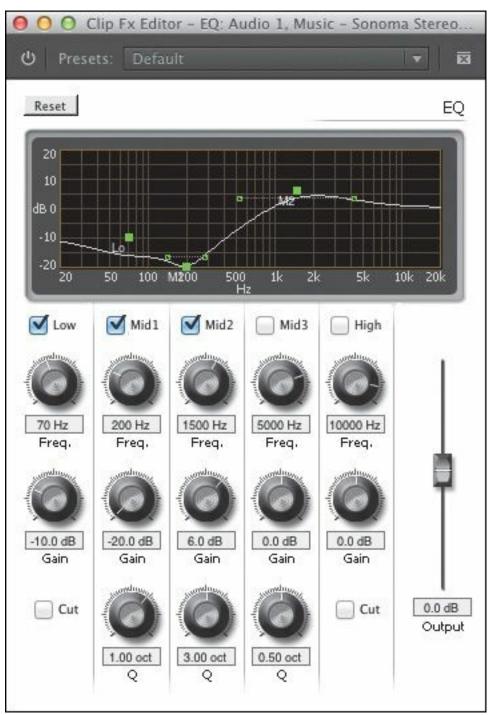
- **8.** Select the check box to activate the Mid1 frequency filter.
- 9. Set its gain to -20.0 dB, and adjust the Q factor to 1.0 for more transition on the EQ adjustment.



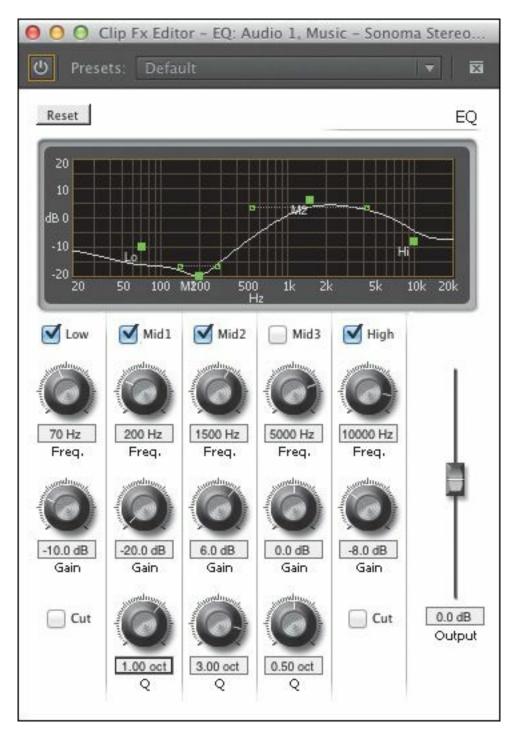
The Q adjusts the sharpness of the line curve. The higher the Q, the wider the curve.

- 10. Play the sequence to hear the changes.
- 11. Select the check box to activate the Mid2 frequency filter.
- 12. Set its frequency to 1500 Hz and its gain to 6.0 dB.

Adjust the Q factor to 3.0 for more transition on the EQ adjustment.

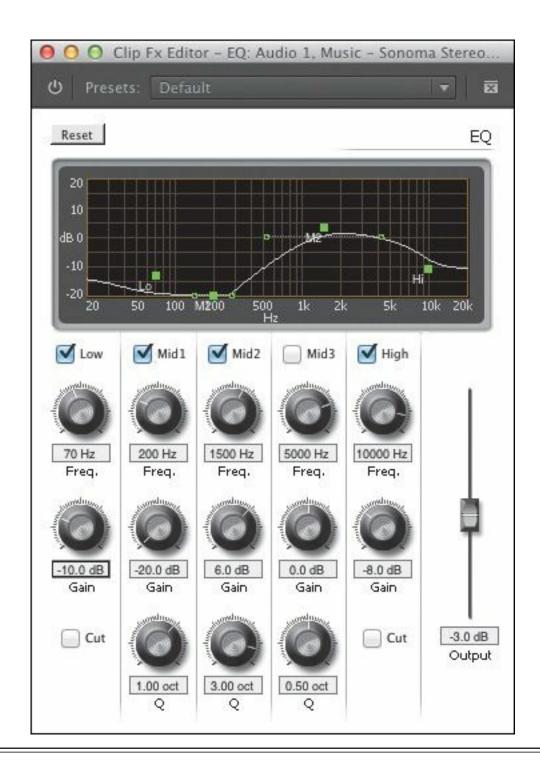


- 13. Play the sequence to hear the changes.
- **14.** Select the check box to activate the High frequency filter, and set its gain to −8.0 dB to lower the highest frequencies.



The overall volume is too high, and the audio meters show that the level for your file is too loud.

**15.** Lower the Output slider for the effect to approximately −3.0 dB. This adjusts the overall output level.



### Note

Avoid setting the volume too high (the VU meter line will turn red and the peak monitors will light up). That can lead to distortion.

**16.** Play the sequence to hear the changes. "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

#### Parametric EQ

If you want to go beyond five frequency range adjustments, the Parametric EQ effect may meet your needs. You can select only one frequency range with the Parametric EQ, but you can use it multiple times and select a different frequency each time. This lets you build as complex an equalizer as you need in the Effect Controls panel.

1. In the Project panel, locate the sequence 03 Parametric EQ and open it.

This sequence contains one musical track and already has the Parametric EQ effect applied seven times. Each effect is currently disabled through the use of the Bypass check box.

## Tip 🕟

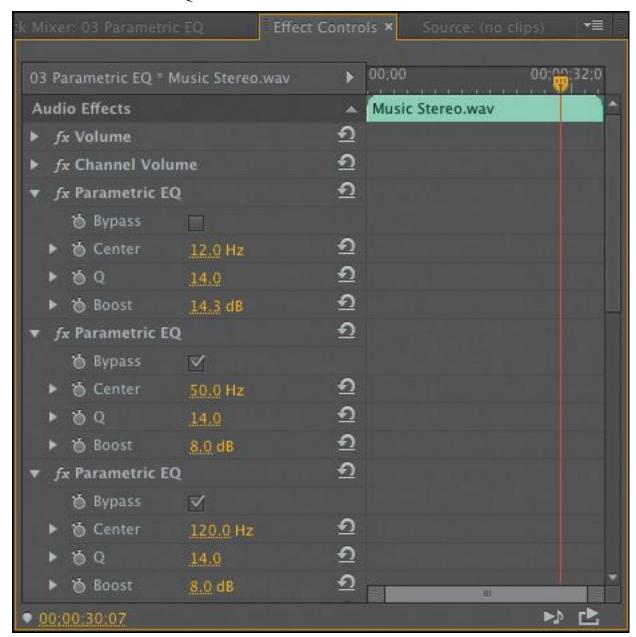
Another way to use the Parametric EQ effect is to target a specific frequency and either boost it or cut it. You can use this effect to cut a particular frequency, like a high-frequency noise or a low hum.

2. Play the clip to get familiar with its sound. Then select the clip in the sequence and look in the Effect Controls panel.

There are seven parametric EQ effects applied to the clip, but they all have the Bypass option enabled, meaning they have no effect right now. The effects are arranged from low frequencies (at the top of the list) to high frequencies

(at the bottom of the list).

3. Deselect the first Bypass check box for the first Parametric EQ effect.



- 4. Play the sequence to listen to the change.
- **5.** Continue deselecting the Parametric EQ Bypass check boxes one at a time, and listen to the changes in the audio track after each one.



Listing all the attributes of all the audio effects in Premiere Pro is beyond the scope of this book. To learn more about audio effects, search Premiere Pro Help.

## Applying effects in the Audio Track Mixer

It's easy to become overwhelmed when working with audio tracks on a complex mix. Every clip on every track will play together at the same time. In the previous exercise, you learned how to use the Audio Clip Mixer panel to adjust the volume of your clips, and the Audio Track Mixer to adjust the volume of a track, so that audio played in a unified and intelligible manner.

You also may recall learning about submixes. In this exercise, we'll build an audio mix using submixes.

## Creating an initial mix

A submix lets you control the volume and other characteristics of multiple audio tracks at once. Note that this feature is for whole tracks rather than individual clips.

Although you can adjust volume levels by using each clip's volume graph in the Timeline or by using the Volume effect in the Effect Controls panel, it's much easier to use the Audio Track Mixer to adjust volume levels and other characteristics of your initial mix.

Using a panel that looks a lot like a production studio's mixing hardware, you move track faders to change volume, turn knobs to set left/right panning, add effects to entire tracks, and create submixes. Submixes let you direct the audio from multiple

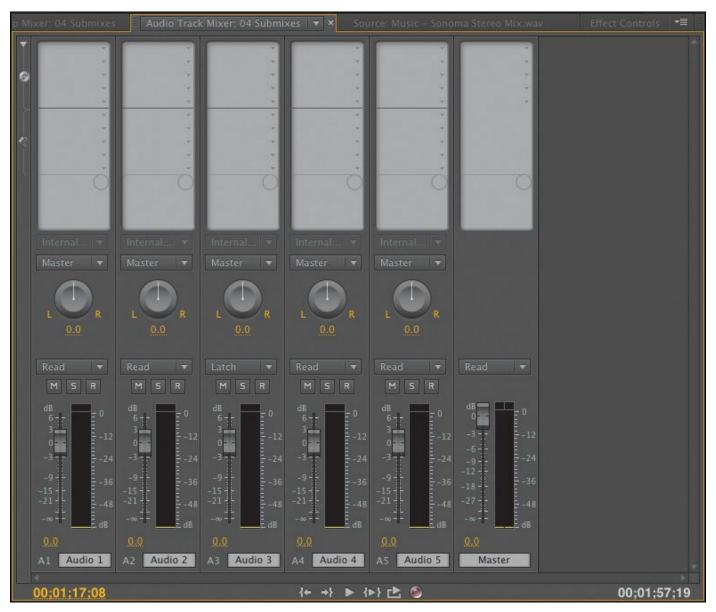
tracks to a single track, so you can apply the same effects, volume, and panning to a group of tracks without having to change each one individually.

### Note

Audio track mixes work best if you keep one audio source to each track.

In this exercise, you'll mix a song that was recorded by a choir in a studio.

- 1. In the Media bin, double-click the Music Sonoma Stereo Mix.wav file to open it in the Source Monitor. Listen to the clip. This is how your final mix should sound.
- 2. Open the sequence 04 Submixes.
- **3.** Play the 04 Submixes sequence. The instruments are much too loud relative to the choir.
- 4. Open the Audio Track Mixer panel and adjust its size so you can see all five tracks, plus the master track. You'll want to leave extra room for two more tracks.



5. Change the track names along the bottom row of the Audio Track Mixer by selecting each one in turn and typing a new name: Left, Right, Clarinet, Flute, and Bass (as shown here).



Those name changes update in the audio track headers of the sequence.

**6.** Play the sequence, and adjust the sliders in the Audio Track Mixer to create a mix that you think works well.



A good place to start is by setting Left to +4, setting Right to +2, and dropping the Clarinet, Flute, and Bass to -12, -10, and -12, respectively.

7. Watch the master track VU (volume unit) meter as you make your adjustments.



Little peak marks float above the volume meters to indicate the loudest levels. When you've set the audio meters to Dynamic Peaks (the default setting), they remain for a couple of seconds and then move as the music volume changes. These marks provide a good way to see how balanced your left and right channels are. You want them to approximately line up most of the time. If you want to change to Static Peaks, right-click the audio

- meters and choose this option. Now peaks will hold for the entire duration of playback.
- **8.** Adjust each channel's left/right pan by using the knobs at the top of each track. Your parameters should match the following:



• Left: All the way left (-100)

• **Right:** All the way right (+100)

• Clarinet: Left-center (-20)

• Flute: Right-center (+20)

• Bass: Centered (0)

## Creating a submix

You can apply effects and set volume levels on a clip-by-clip basis using the Effect Controls panel or the Audio Clip Mixer. As you did earlier, you can also use the Audio Track Mixer to apply volume, panning, and effects to entire tracks. In either case, by default Premiere Pro sends audio from those clips to the tracks and on to the master track.

Sometimes you might want to route tracks to submix tracks before sending them to the master track. Submix tracks save you steps and keep effects, volume, and panning consistent.

In the case of this Sonoma recording, you use a submix to apply a Reverb effect to the two choir tracks, and use a second submix to apply another Reverb effect, with different settings, to the three instrument tracks. The submixes could then send their processed output to the master track, or to a third submix.

Let's try this to see how it works:

- **1.** Continue working with the sequence 04 Submixes from the previous exercise.
- **2.** Choose Sequence > Add Tracks.
- 3. Set the Add values for Video Tracks and Audio Tracks to 0, set the Add value for Audio Submix Tracks to 2, and make sure the Track Type for Audio Submix Tracks is set to Stereo; then click OK.



Two submix tracks are added to the Timeline. They also appear in the Audio Track Mixer (they appear slightly darker).

- **4.** Adjust the size of the Audio Track Mixer panel to see all of its controls, including the new submixes and the Master track.
- 5. Click the Left track's Track Output Assignment pop-up menu (just above the pan control), and select Submix 1.



**6.** Do the same for the Right track.

Now both the Left and Right tracks have been sent to Submix 1. Their individual characteristics—panning and volume—will not change.

7. Send the three instrument tracks to Submix 2.



From now on, the audio on the tracks will no longer output to the Master track. Instead, it will output to Submix 1 or Submix 2 (depending on the setting you chose). Submix 1 and Submix 2 are still configured to output to the Master track, so the audio from all the tracks in the sequence still eventually arrives at the Master output.

The difference is that now, because multiple tracks are passing through submixes, you can make adjustments to the combined audio, with fewer clicks and more uniformity.

## Applying effects to a submix

Let's use the Reverb effect you explored earlier in this lesson.

1. If necessary, click the Show/Hide Effects and Sends

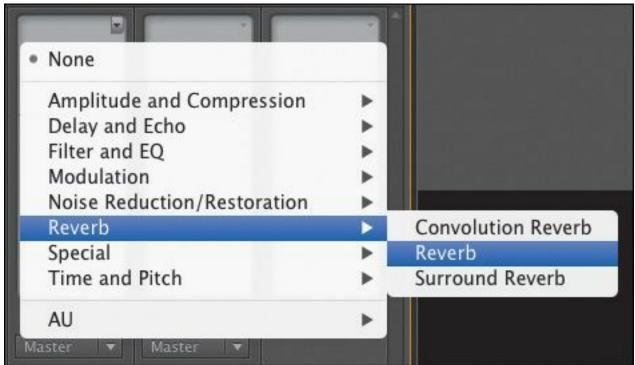
disclosure triangle ( ) at the top of the Audio Track Mixer panel to display the upper part of the Audio Track Mixer. This is a little like expanding the settings in the Effect Controls panel.

- 2. Click the Solo button for the Submix 1 Track.
- 3. Click the Effect Selection button for the Submix 1 track (the little drop-down list at the top of the controls).



**4.** Choose Reverb > Reverb from the pop-up menu.





5. Double-click the Reverb effect name to view the effect editor. Choose the Large Hall preset, then close the editor.



#### Note

Effects displayed in the Audio Track Mixer give access to their controls at the bottom of the effects and submixes lists. However, you can access only one setting at a time. You can often double-click an effect to access all the controls.

**6.** Click the Solo button for Submix 2, and disable the Solo switch for Submix 1.



- 7. Apply a Reverb effect to Submix 2, and adjust to your personal taste. Try to set its parameters to create a sound a bit less dramatic than the voices.
- 8. Click the Solo button on Submix 2 to disable it.
- **9.** Play the track, and listen to these two submixes as a single mix to hear how they sound.
- 10. Experiment with the Volume and Reverb settings.
- 11. Play your sequence to review your overall mix.

## **Audio Plug-in Manager**

It's easy to install third party plug-ins: Choose Edit

- > Preferences > Audio (Windows) or Premiere Pro
- > Preferences > Audio (Mac OS). Then click the button for the Audio Plug-in Manager.
  - 1. Click the Add button to add any additional directories that contain AU or VST plug-ins. AU plug-ins are Mac only.

- 2. If needed, click the Scan for Plug-ins button to find all available plug-ins.
- 3. Use the Enable All button or the individual enable check boxes to activate a plug-in.
- 4. Click OK to commit your changes.

# Cleaning up noisy audio

While it's always best to record perfect audio at the source, sometimes you can't control the origin of the audio and it might be impossible to re-record it. You may find you need to repair a bad audio clip. Premiere Pro has versatile tools for fixing common audio problems.

# **Highpass and Lowpass effects**

The Highpass and Lowpass effects often work to improve a clip, used together or independently. The Highpass effect is used to remove all frequencies that fall below a certain frequency (think of it as letting all things higher than the threshold pass through). The Lowpass filter is the direct opposite. It eliminates all frequencies above the specified Cutoff frequency.

- 1. Open the sequence 05 Noisy Reduction.
- 2. Play the sequence to get familiar with the sound quality. If you listen carefully, you can hear the background hum of electrical lighting and appliances.
- 3. In the Effects panel, locate the Highpass effect and drag it onto the clip.

- 4. Play the sequence.
  - It probably sounds overly processed, because the Highpass threshold is set too high.
- **5.** Make sure the clip is selected and, in the Effect Controls panel, adjust the Cutoff slider to a lower value.
  - You can make adjustments while the clip plays to hear the result in real time. Play with the value to minimize some of the lower-frequency noise in the background. A value around 250.0 Hz works well.
- **6.** In the Effects panel, locate the Lowpass effect and drag it onto the clip.
- 7. Play with the Cutoff slider for the Lowpass effect.



Experiment with different values to familiarize yourself with

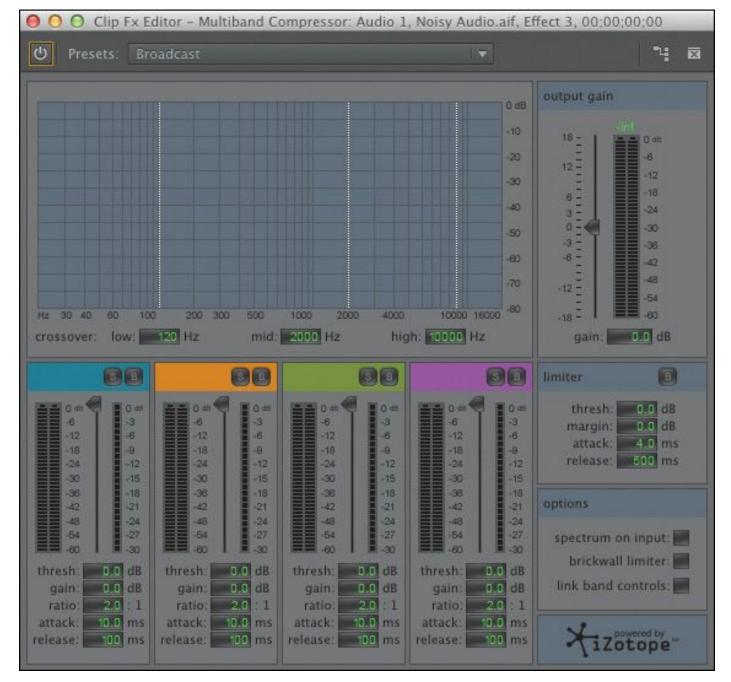
<sup>&</sup>quot;\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

the way these two effects interact. It's possible to remove the audio completely by setting the two effects to overlap frequencies. Pull down some of the higher frequencies that are making the recording sound "tinny."

## **Multiband Compressor**

The Multiband Compressor effect offers independent control over four different frequency bands. Each band typically contains unique audio content, making this a useful tool for audio mastering. Additionally, you can refine crossover frequencies between bands. These will let you adjust each band independently.

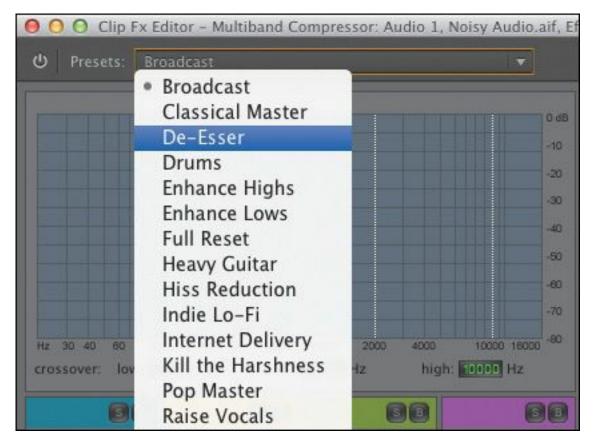
- 1. Continue working with the sequence 05 Noisy Reduction. Let's clear the effects so we can try a new one.
- 2. Right-click the audio clip on the Timeline and choose Remove Effects. A new dialog opens. The default values are fine, so click OK.
- 3. In the Effects panel, locate the Multiband Compressor effect and drag it onto the clip.
- 4. In the Effect Controls panel, click the Multiband Compressor Edit button to view the detailed controls. A new window opens.



The Multiband Compressor effect has a number of presets.

- 5. Click the Presets list at the top of the Multiband Compressor window, and try out some of the presets to get an idea of how the window works.
- **6.** From the Presets list, choose De-Esser. This automatically pulls down some of the higher frequencies.

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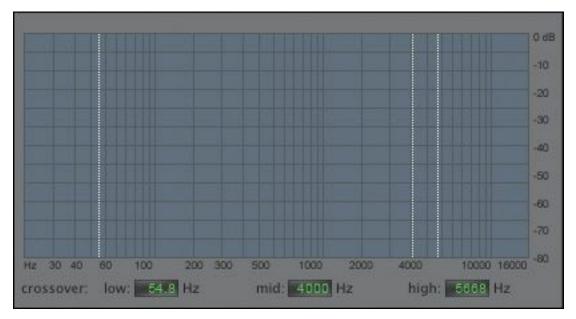


- 7. Listen to the audio to hear the results.

  It's better, but it could be improved with a little refinement.
- **8.** Click the Solo button for Band 4 (the magenta one).



- 9. Start audio playback so you can hear results.
- 10. While the audio plays, drag the white vertical audio Crossover markers to refine the higher-frequency band—that is, the range of frequencies controlled by the fourth band.

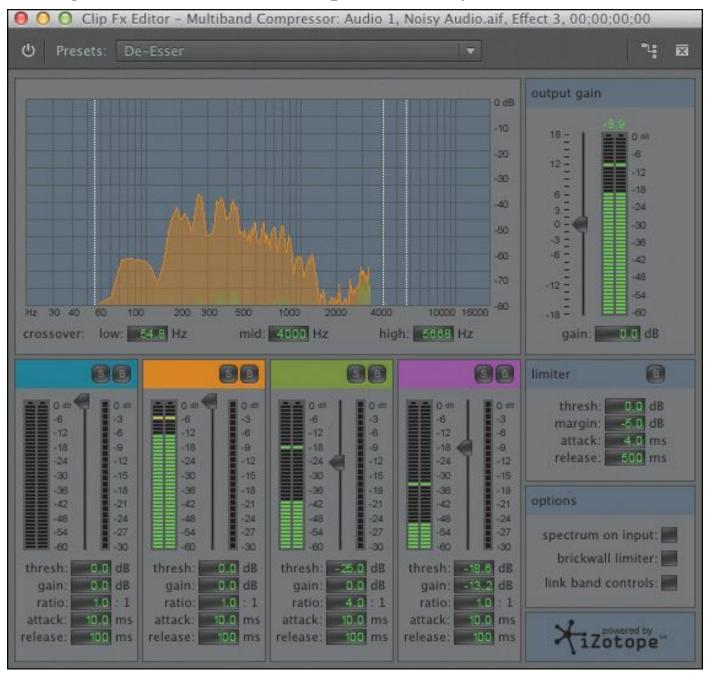


11. At the bottom of Band 4 there are a series of numerical controls. You can click and drag these, just as you would click and drag the orange numbers you see in the rest of the Premiere Pro interface. Experiment by reducing the threshold and gain settings to reduce the higher-frequency noise.



- 12. Disable the Solo switch on Band 4.
- 13. Experiment with the crossover markers, threshold, and

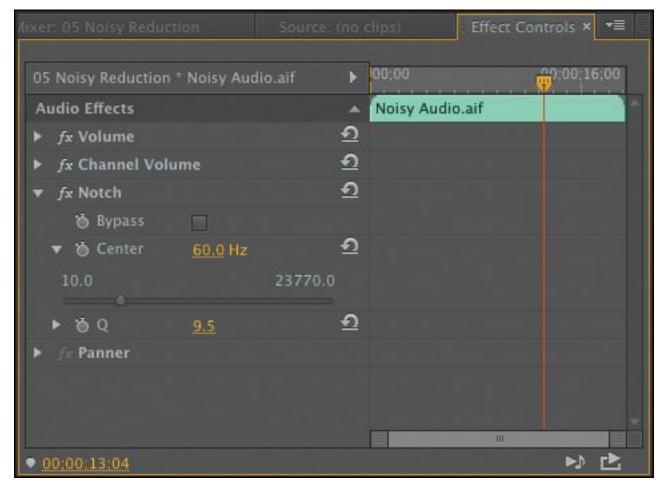
gain controls. Close the panel when you're finished.



### **Notch effect**

The Notch effect removes all frequencies near a specified value. The effect targets a frequency range and eliminates those sounds. The effect works well for removing power-line hum and other electrical interference. In this clip, you can hear the sounds of fluorescent light bulbs buzzing overhead.

- 1. Continue working with the sequence 05 Noisy Reduction. Let's clear the effects so we can try a new one.
- 2. Right-click the audio clip on the Timeline and choose Remove Effects. A new dialog opens. The default values work, so click OK.
- **3.** Play the sequence and listen for the electrical hum. You may need to turn up your speakers.
- 4. In the Effects panel, locate the Notch effect and apply it to your clip.
- 5. Adjust the Center setting to target the frequency to be removed. If you expand the Center controls by clicking the disclosure triangle, you can use a slider.
  - Power-line hum tends to be at either 50 Hz or 60 Hz.
- **6.** Adjust the Q slider to affect the range being processed by the effect.



A low setting selects a narrow frequency band; a high setting selects a wide frequency band.

This is helping a bit, but let's take a more aggressive approach to the repair.

## Note

A 60 Hz or 50 Hz hum can be caused by many electrical problems, cable problems, or equipment noise. The frequency varies because of the different electrical systems used around the world.

# **Dynamics**

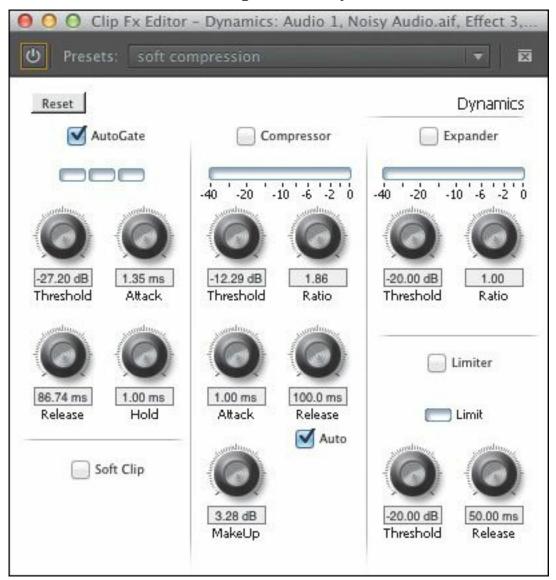
Another easy-to-use audio effect, Dynamics provides a robust set of controls for multiple properties that you can combine or use independently to adjust audio. You will likely find that the graphical controls in the Custom Setup view are easiest to use, but you can also adjust values in the Individual Parameters view.

You can use the following properties to adjust audio with the Dynamics effect:

- AutoGate: This cuts off a signal when its level falls below the specified threshold. This is a useful way to remove unwanted sounds (such as background noise behind an interview or narrator).
- **Compressor:** This option helps to create a consistent audio level throughout the duration of the clip.
- Expander: This option is used to reduce all signals below the specified threshold. It's similar to the AutoGate controls but can be more subtle in its adjustments. Be sure to adjust both the threshold and the ratio while playing back the clip to find settings that sound natural while still removing unwanted noise.
- Limiter: Use the Limiter option to reduce clipping in audio clips that peak too high. You can set a threshold from -60 dB to 0 dB. Premiere Pro reduces all signals that exceed the threshold to the same level as the threshold.
- 1. Continue working with the sequence 05 Noisy Reduction.
- 2. Remove all other effects from the Effect Controls panel for the selected clip.
- 3. In the Effects panel, locate the Dynamics effect and apply

it to the clip.

- **4.** In the Effect Controls panel, click the Edit button for the Dynamics effect.
- 5. Enable the AutoGate option only, and listen to the clip.



The background noise should be dramatically reduced. Try adjusting the Threshold control to get a better result.

- **6.** Turn on the Compressor option, and adjust its settings to make the sound a little fuller. Play back the clip, and adjust as needed.
- 7. Disable the AutoGate option, and enable the Expander

- option to try to remove the background noise.
- **8.** Play the clip, and adjust the Threshold and Ratio settings for the Expander option to improve the sound.
- 9. Enable the Limiter option, and set it to −12.00 dB, which is a level commonly used in audio mastering.



10. Play the clip, and have a look at the audio meters (if they're not visible, you can enable them in the Window menu).

## Removing background noise with Adobe Audition

Adobe Audition offers advanced mixing and effects

to improve your overall sound. If you have Audition installed, you can try the following:

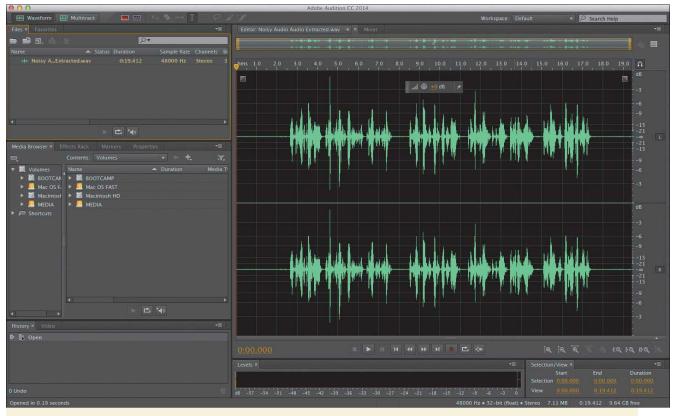
- 1. In Premiere Pro, open the sequence 06 Send to Audition from the Project panel.
- 2. Right-click the Noisy Audio.aif clip in the Timeline and choose Edit Clip in Adobe Audition. A new copy of the audio clip is created and added to your project.

	Make Offline
	Rename
Noisy Audio.aif     Noisy Audio.aif	Reveal in Project
	Reveal in Finder
	Edit Original
	Edit Clip In Adobe Audition
	Replace With After Effects Composition
	Properties

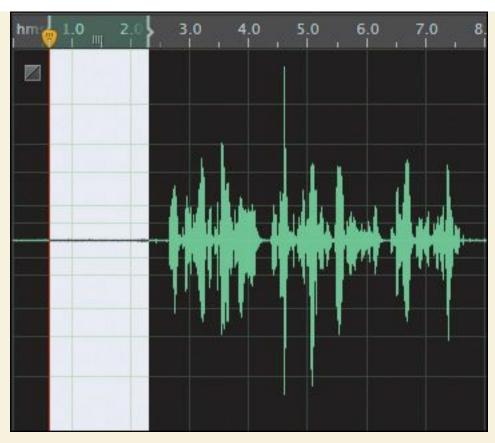
Audition opens, along with the new clip.

- 3. Switch to Audition.
- **4.** The stereo clip should be visible in the Editor panel.

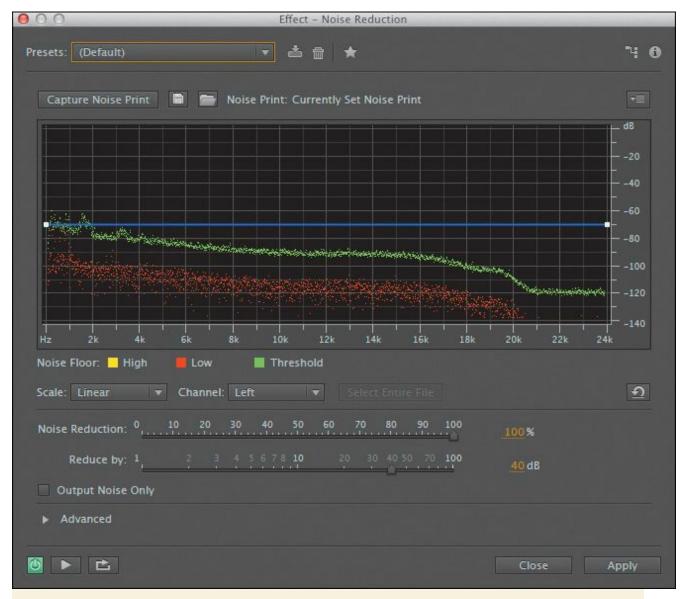
Audition shows a large waveform for the clip. To use Audition's advanced noise reduction tools, you need to identify a part of the clip that's just the noise so Audition knows what to remove.



- 5. Play the clip. The beginning contains several seconds of just noise—perfect for making a selection.
- 6. Using the Time Selection tool (the I-bar tool in the toolbar), drag to highlight the section of noise you just identified.

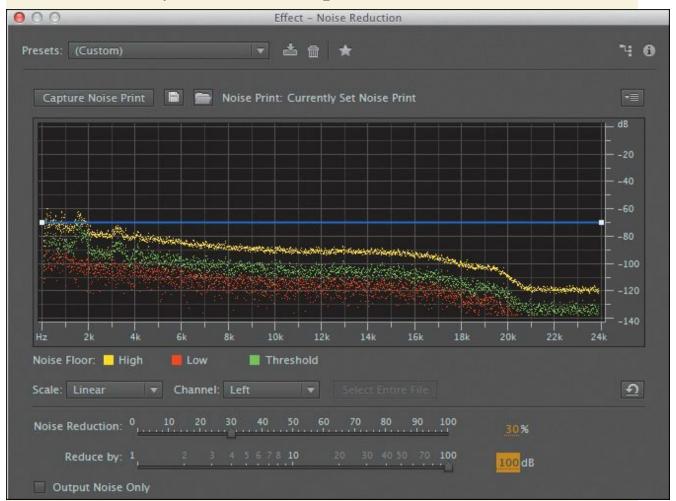


- 7. With the selection active, choose Effects > Noise Reduction/Restoration > Capture Noise Print. You can also press Shift+P.
  - If a dialog appears informing you that the noise print will be captured, click OK to confirm.
- **8.** Choose Edit > Select > Select All to select the entire clip.
- 9. Choose Effects > Noise Reduction/Restoration > Noise Reduction (process). You can also press Shift+Control+P (Windows) or Shift+Command+P (Mac OS). A new dialog opens so you can process the noise.



- 10. Select the Output Noise Only check box. This option allows you to hear only the noise you're removing, which helps you make an accurate selection so you don't accidentally remove too much of the audio you want to keep.
- 11. Click the Play button at the bottom of the window, and adjust the Noise Reduction and Reduce By sliders to remove noise from the clip. Try not to pull down much or any of the voice.
- 12. Deselect the Output Noise Only check box, and

## listen to your cleaned-up audio.



13. In the Advanced section, there are a number of controls for refining the noise reduction. Try the Spectral Decay Rate option if your audio sounds too much like you're listening to a phone call from under the ocean.

Advanced	
Spectral Decay Rate: 30 %	Smoothing: 🔀
Precision Factor: 7	Transition Width: 🤵 dB
Noise Print Capture Settings	
FFT Size: 4096 ▼ Noise Print	Snapshots: 4000

14. When you're happy with the results, click the

<sup>&</sup>quot;\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

Apply button to apply the cleanup.

- **15.** Choose File > Close, and save your changes.
- **16.** Switch back to Premiere Pro, where you can listen to the cleaned-up audio clip.

## **Review questions**

- 1. To change the tone of an audio clip without changing its duration, which effect would you use?
- 2. What's the difference between the Delay and Reverb effects?
- 3. How do you apply the same audio effect with the same parameters to three audio tracks?
- **4.** Name three ways to remove background noise from a clip.

### **Review answers**

- 1. The PitchShifter effect can modify the apparent pitch or energy level for a clip while still maintaining sync with a video clip.
- 2. Delay creates a distinct, single echo that can repeat and gradually fade. Reverb is a more complex effect that creates a mix of echoes to simulate a room. It has multiple parameters that take the hard edge off the echo you hear in the Delay effect.
- 3. The easiest way is to create a submix track and assign the output from those three tracks to the submix. You can apply the effect to the submix.

4. You can use a Highpass, Lowpass, Multiband Compressor, Notch, or Dynamics effect within Premiere Pro, or you can send the clip to Adobe Audition to use its advanced noise reduction controls.

# 13. Adding Video Effects

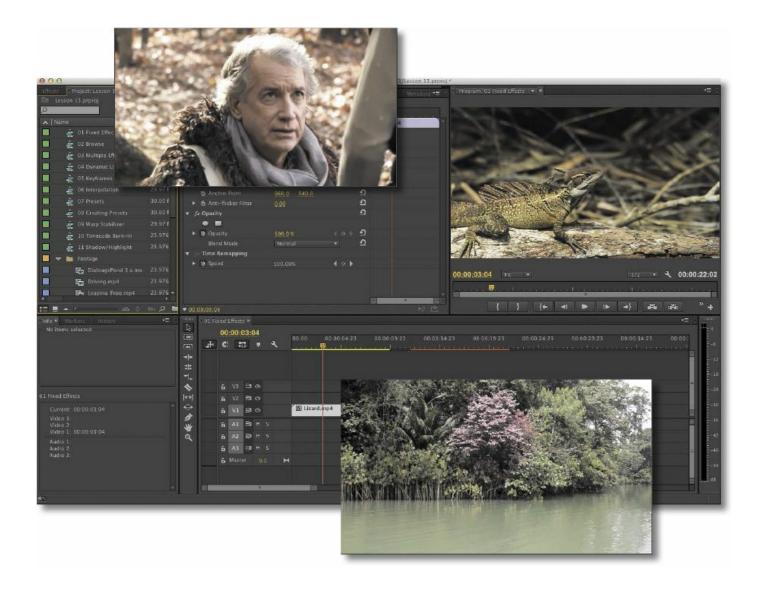
#### **Lesson overview**

In this lesson, you'll learn about the following:

- Working with fixed effects
- Browsing effects with the Effects panel
- Applying and removing effects
- Using effect presets
- Using keyframing effects
- Exploring frequently used effects



This lesson will take approximately 90 minutes.



Adobe Premiere Pro CC features more than 100 video effects. Most effects come with an array of parameters, all of which you can animate—have them change over time—by using precise keyframe controls.

## **Getting started**

Video effects can be used for many reasons. They can solve problems with image quality, such as exposure or color balance. They can create complex visual effects through compositing with techniques such as chromakey. They can also help solve a number of production problems, such as camera shake and

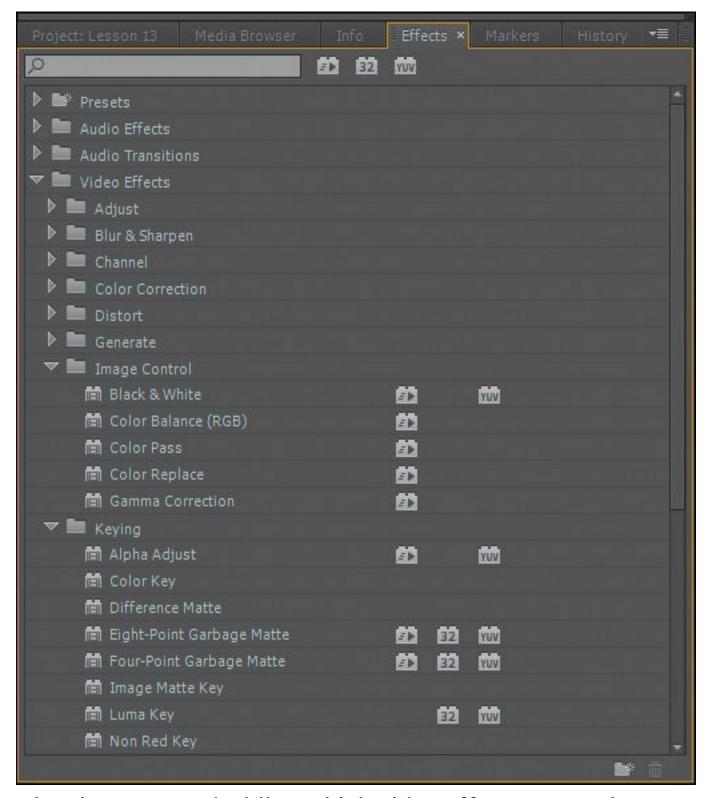
rolling shutter.

Effects can also serve stylistic purposes. You can alter the color or distort footage, and you can animate the size and position of a clip within the frame. The challenge is to know when to use effects and when to show restraint.

Standard effects can be constrained to elliptical or polygon masks, and these masks can automatically track your footage. For example, you might blur someone's face to hide their identity and have the blur follow them as they move through the shot.

# Working with effects

Adobe Premiere Pro makes working with effects easy. You can drag an effect onto a clip, or you can select the clip and double-click the effect in the Effects panel. You can combine as many effects as you want on a single clip, which can produce surprising results. Moreover, you can use an adjustment layer to add the same effects to a collection of clips.



When it comes to deciding which video effects to use, the number of choices in Premiere Pro can be a bit overwhelming. There are more than 100 built-in effects. Many additional effects are also available from third-party manufacturers for

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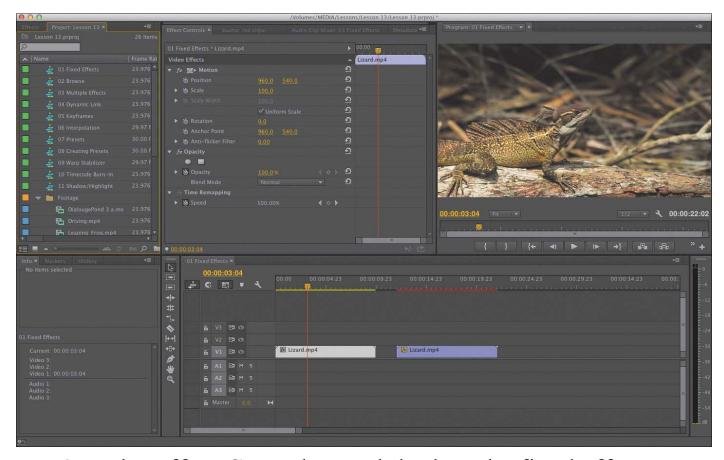
sale or free download.

While the range of effects and their controls can be complex, applying, adjusting, and removing effects is always straightforward.

#### **Fixed effects**

Once you add a clip to a sequence, it will automatically have a few effects applied. These effects are called *fixed* effects, and you can think of them as controls for the usual geometric, opacity, and audio properties that every clip should have. You can modify all fixed effects using the Effect Controls panel.

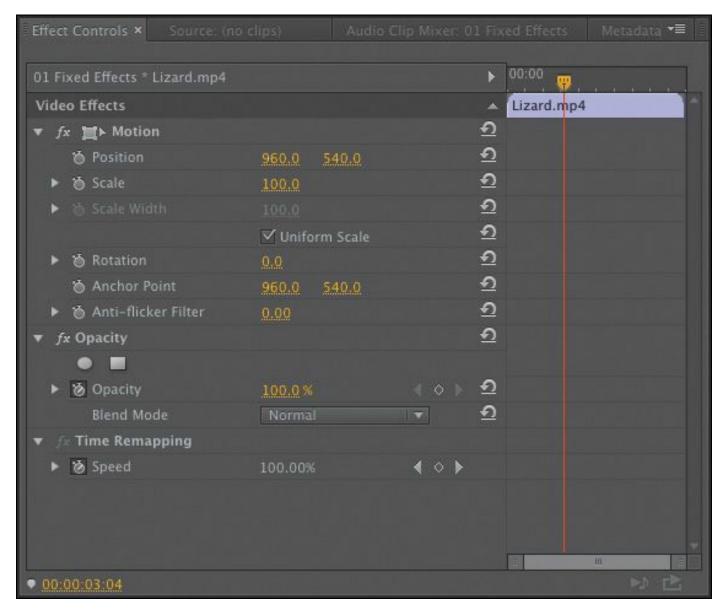
- 1. Open Lesson 13.prproj.
- **2.** Open the sequence 01 Fixed Effects.
- 3. Click to select the first clip in the Timeline.
- **4.** Switch to the Effects workspace by choosing Window > Workspace > Effects.
- **5.** Choose Window > Workspace > Reset Current Workspace.



**6.** In the Effect Controls panel, look at the fixed effects applied to this clip.

Fixed effects are automatically applied to every clip in a sequence, but they don't change anything until you modify the settings.

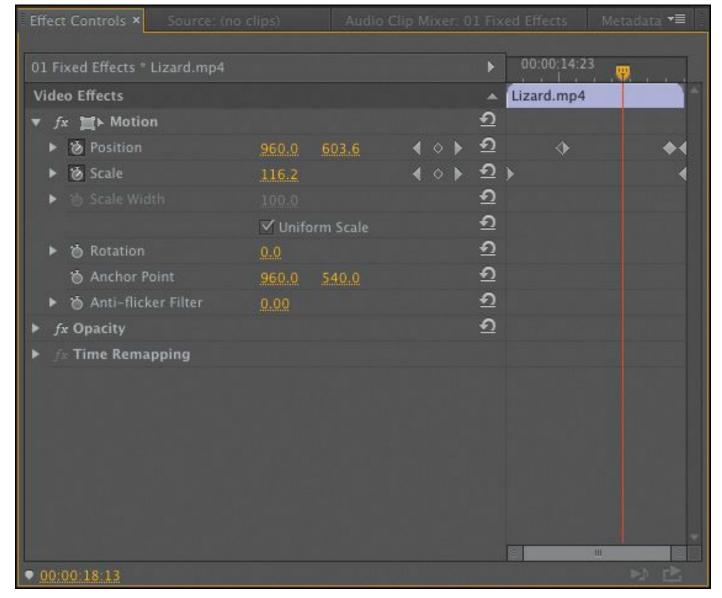
7. Click the disclosure triangle next to each control to show its properties.



- Motion: The Motion effect allows you to animate, rotate, and scale a clip. You can also use the Antiflicker Filter control to decrease shimmering edges for an animated object. This comes in handy when you scale a high-resolution source and Premiere Pro must resample the digital image.
- Opacity: The Opacity effect lets you control how opaque or transparent a clip is. You can also access special blend modes to create visual effects from multiple layers of video. You'll explore this more in

## Lesson 15, "Exploring Compositing Techniques."

- **Time Remapping:** This effect lets you slow down, speed up, or reverse playback, or even freeze a frame. You learned about time remapping in <u>Lesson 8</u>, "<u>Advanced Editing Techniques</u>."
- Audio Effects: If a clip has audio, Premiere Pro displays its Volume, Channel Volume, and Panner controls. You learned about these in <a href="Lesson 11">Lesson 11</a>, "Editing and Mixing Audio."
- **8.** Click to select the second clip in the Timeline and look at the Effect Controls panel.



These effects have keyframes, meaning that their settings change over time. In this case, a small scale and pan were applied to the clip to create a digital zoom that didn't exist before and to recompose the shot.

We'll explore keyframes later in this lesson.

**9.** Press Play to watch the current sequence and compare the two shots.

# The Effects panel

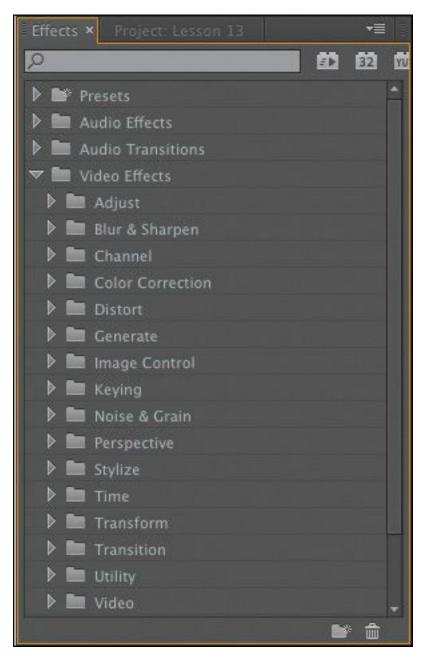
In addition to the fixed video effects, Premiere Pro has standard

effects, which change a clip's appearance. Because there are so many to choose from, effects are organized into 16 categories. If you install third-party effects, you may have more choices.

Effects are grouped into functions, including Distort, Keying, and Time, to make it easier to navigate them.

Each category has its own bin in the Effects panel.

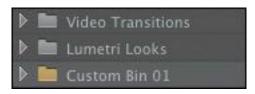
- 1. Open the sequence 02 Browse.
- 2. Click to select the clip on the Timeline.
- **3.** Open the Effects panel. You can use the keyboard shortcut Shift+7 to select it.
- 4. In the Effects panel, open the Video Effects bin.



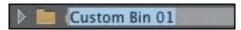
5. Click the New Custom Bin button ( ) at the bottom of the panel.

The new custom bin appears in the Effects panel below Lumetri Looks (you may need to scroll down to see it). Let's rename it.

6. Click once to select the bin.



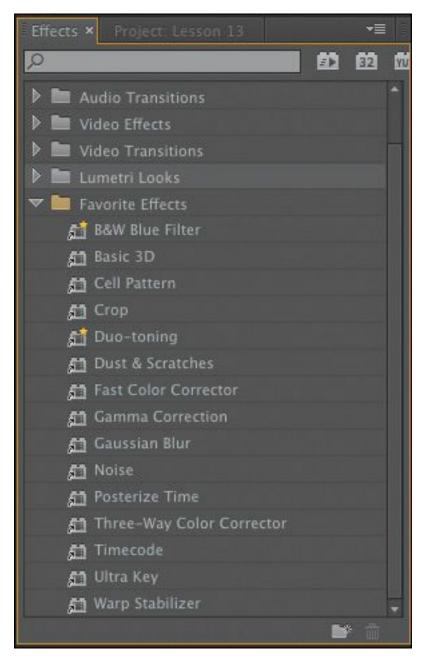
7. Click once more directly on the bin's name (Custom Bin 01) to highlight it and change it.



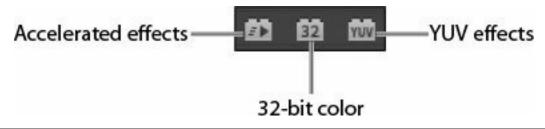
8. Change its name to something like Favorite Effects.



9. Open any Video Effects folder, and drag a few effects into your custom bin. Choose any effects that sound interesting to you. You can add or remove effects from a custom bin whenever you like.



As you browse the video effects, you'll notice icons next to many of the effect names. Understanding these icons might influence your choices when working with effects.





When you add effects to a custom bin in the Effects panel, you're making a copy. Effects also remain in their original folder. You can use custom bins to create effect categories to suit your work style.

#### **Accelerated effects**

The Accelerated effect icon ( ) indicates that the effect can be accelerated by your graphics processing unit (GPU). The GPU (often called the *video card* or *graphics card*) can greatly enhance the performance of Premiere Pro. The range of cards supported by the Mercury Playback Engine is broad, and with the right card installed, these effects often offer accelerated or even real-time performance and need rendering only on final export. You'll find a list of supported cards on the Premiere Pro product page.

#### Note

With so many Video Effect subfolders, it's sometimes tricky to locate the effect you want. If you know part or all of an effect's name, start typing it in the search box at the top of the Effects panel. Premiere Pro will display all effects and transitions that contain that letter combination, narrowing the search as you type.

#### 32-bit color (high-bit-depth) effects

Effects with the 32-bit color support icon ( ) can process in a "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

32-bits-per-channel mode, which is also called *high-bit-depth* or *float* processing.

You should use high-bit-depth effects in the following situations:

- When you're working with video shot with 10- or 12-bits-per-channel codecs, such as RED, ARRIRAW, AVC-Intra 100, or 10-bit DNxHD or ProRes.
- When you want to maintain greater image fidelity after applying multiple effects to any footage.

#### Note

When using any 32-bit effects on a clip, try to use only combinations of 32-bit effects for maximum quality. If you mix and match effects, the non-32-bit effects switch processing back to 8-bit space to process.

Also, 16-bit photos or Adobe After Effects files rendered in 16or 32-bits-per-channel color space can take advantage of highbit-depth effects.

To take advantage of high-bit-depth effects, make sure your sequence has the Maximum Bit Depth video rendering option selected. You'll find this choice in the Video tab of the Export Settings dialog.

Maximum Bit Depth	Maximum Render Quality
✓ Composite in Linear	Color (requires GPU acceleration or max render quality)

#### YUV effects

Effects with the YUV icon ( ) process color in YUV. This is important if you're adjusting clip color. Effects without the YUV icon process in the computer's native RGB space, which can make adjusting exposure and color less accurate.

#### Note

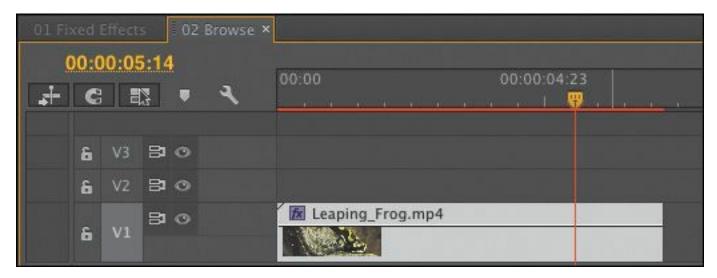
To learn more about YUV effects, be sure to read the article at <a href="http://bit.ly/yuvexplained">http://bit.ly/yuvexplained</a>.

YUV effects break down the video into a Y (or luminance) channel and two channels for color info, which is how most video footage is structured natively. These filters make it easy to adjust contrast and exposure without shifting color.

### **Applying effects**

Virtually all the video effect settings are accessible in the Effect Controls panel. You can add keyframes to nearly every setting, making it easy to apply changes over time (just look for settings with a stopwatch). In addition, you can use Bezier curves to adjust the velocity and acceleration of those changes.

- 1. Continue working with the sequence 02 Browse.
- 2. If necessary, click the Effects tab next to the Project panel to make it visible.
- 3. Type black into the Effects panel search field to narrow the results. Locate the Black & White video effect.
- 4. Drag the Black & White video effect onto the Leaping Frog clip in the Timeline.



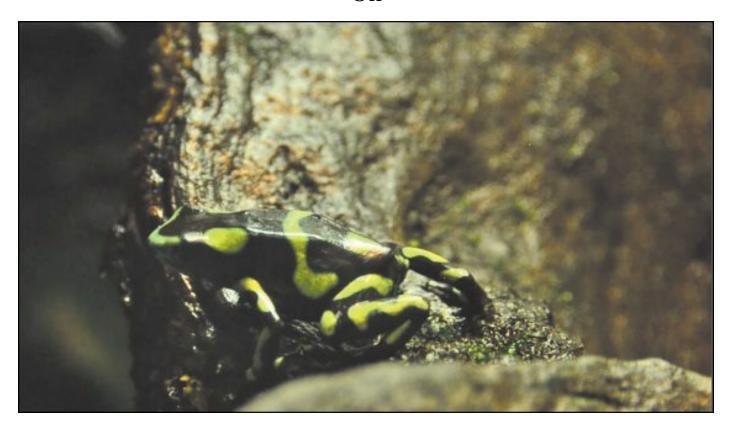
This effect immediately converts your full-color footage to black and white—or, more accurately, *grayscale*.

- 5. Make sure the Leaping\_Frog clip is selected in the Timeline panel.
- 6. Open the Effect Controls panel.
- 7. Toggle the Black & White effect off and on by clicking the "fx" button ( ) next to the effect name in the Effect Controls panel. Be sure the playhead is on this footage clip to view the effect.

Toggling an effect on and off is a good way to see how it works with other effects. This toggle switch is the only option available for the Black & White effect.



On



Off

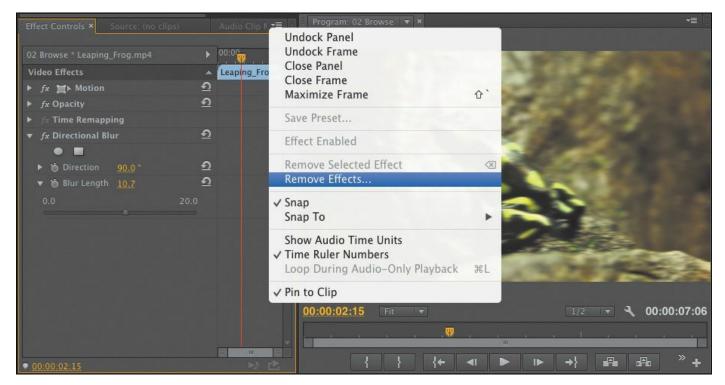
- 8. Make sure the clip is selected so its parameters are displayed in the Effect Controls panel. Click Black & White to select it, and press the Delete key.

  This removes the effect.
- **9.** Type the word **direction** into the Effects panel search box to locate the Directional Blur video effect.
- 10. In the Effects panel, double-click the Directional Blur effect to apply it.
- 11. In the Effect Controls panel, expand the Directional Blur effect's controls. There are options the Black & White effect did not have: Direction, Blur Length, and a stopwatch next to each option (the stopwatch icon activates keyframing, which we will cover later in this lesson).
- 12. Set Direction to 90.0 degrees and Blur Length to 4 to simulate the scene being filmed with a slow shutter speed.
- 13. Click the disclosure triangle to expand the Blur Length control, and move the slider.
  - As you change the setting, the result is displayed in the Program Monitor.

#### Note

You won't always use visual effects to create dramatic results. Sometimes effects are intended to look like in-camera results.

14. Click the panel menu ( ) for the Effect Controls panel, and choose Remove Effects.



15. Click OK in the dialog that pops up asking which effects you want to remove. You want to remove them all.

This is an easy way to start fresh.

#### Tip

Fixed effects in Premiere Pro are processed in a particular order, which can lead to unwanted scaling or resizing. You can't reorder fixed effects, but you can bypass them and use other, similar effects. For example, you can use the Transform effect instead of the Motion fixed effect, or the Alpha Adjust effect instead of the Opacity fixed effect. These effects are not identical, but they're a close match and behave similarly, and can be placed in any order you choose.

#### Other ways to apply effects

To make working with effects more flexible, there are three ways to reuse an effect you have already configured.

- You can select an effect from the Effect Controls panel, choose Edit > Copy, select a destination clip, and choose Edit > Paste.
- You can copy all the effects from one clip so you can paste them onto another clip, select the clip in the Timeline and choose Edit > Copy, select the destination clip, and choose Edit > Paste Attributes.
- You can create an effect preset to store a particular effect (or multiple effects) with settings for reuse later. We'll cover this technique later in this lesson.

#### Note

You can reorder standard effects by dragging the effect name up or down in the list in the Effect Controls panel, but you can't reorder fixed effects. This can cause problems because effects might be scaled after another effect is applied.

### Using adjustment layers

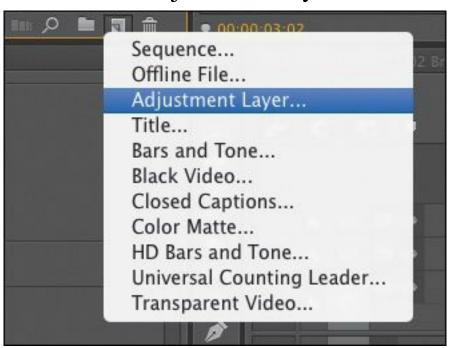
Sometimes you'll want to apply an effect to multiple clips. One

easy way to do this is to use an *adjustment layer*. The concept is simple: Create an adjustment layer clip that can hold effects, and position it above other clips on the Timeline. Everything beneath the adjustment layer clip is viewed through it, receiving any effects it has.

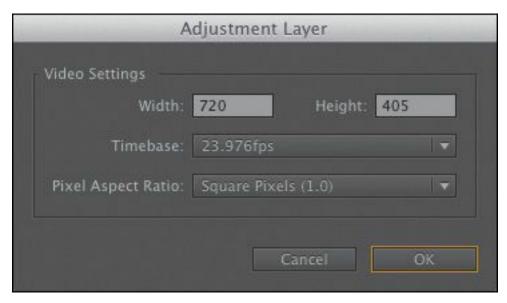
You can easily adjust the duration and opacity of an adjustment layer clip, as you would adjust any graphics clip, making it easy to control which other clips are seen through it. Adjustment layers make it faster to work with effects, because you can change the settings on it (a single item) to influence the appearance of several other clips.

Let's add an adjustment layer to a sequence that's already been edited.

- 1. Open the sequence 03 Multiple Effects.
- 2. At the bottom of the Project panel, click the New Item button and choose Adjustment Layer.

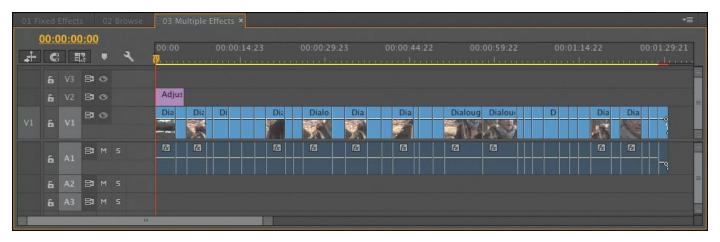


3. Click OK to create an adjustment layer that matches the dimensions of the current sequence.



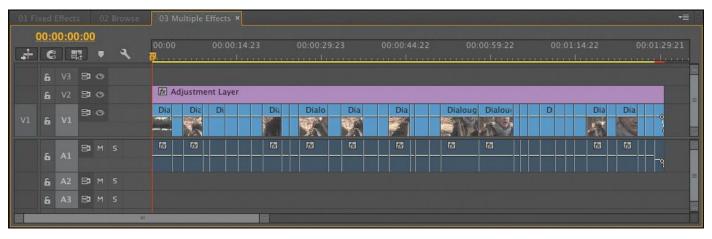
Premiere Pro adds a new adjustment layer to the Project panel.

**4.** Drag the adjustment layer to the beginning of the Video 2 track in the current Timeline.



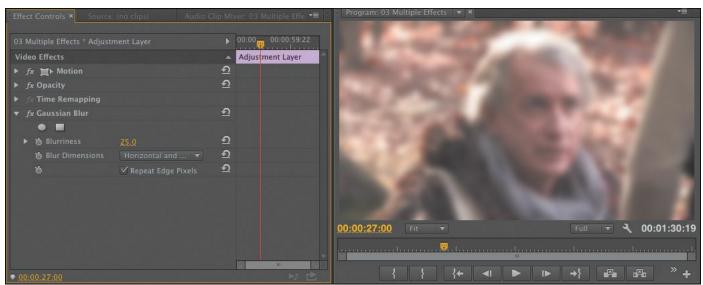
5. Drag to trim the right edge of the adjustment layer so it extends to the end of the sequence.

The adjustment layer should look like this.



Let's create a film look by using effects and then modifying the opacity of the adjustment layer.

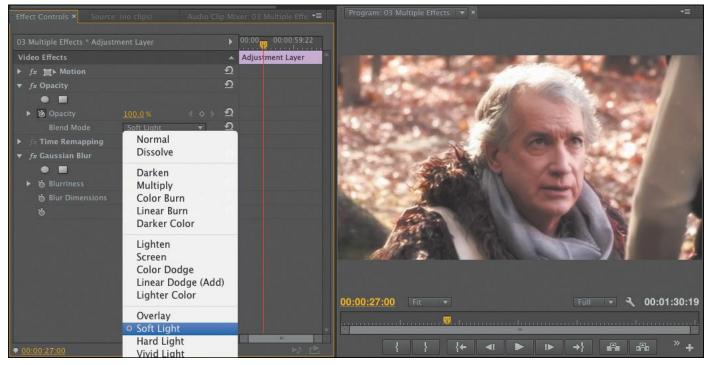
- **6.** In the Effects panel, search for and locate the Gaussian Blur effect.
- 7. Drag the effect onto the adjustment layer.
- **8.** Move the playhead position to 27:00 to have a good close-up shot to use when designing the effect.
- **9.** In the Effect Controls panel, set Blurriness to a heavy value, like **25.0** pixels. Be sure to select the Repeat Edge Pixels check box to apply the effect evenly.



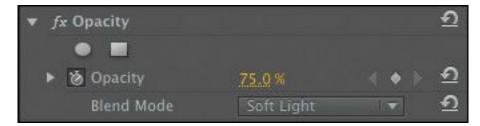
Let's blend the adjustment layer with the clips beneath it using a blend mode to create the film look. *Blend modes* 

let you mix two layers together based on their brightness and color values. You'll learn more about them in <u>Lesson 15</u>.

- 10. Click the disclosure triangle next to the Opacity control in the Effect Controls panel.
- 11. Change the blend mode to Soft Light to create a gentle blend with the footage.



12. Set Opacity to 75% to reduce the effect.



You can click the visibility icon of the adjustment layer (the eyeball for Video 2) in the Timeline panel to see the before and after states of the effect.



Before the adjustment layer is applied



With the adjustment layer and blending modes

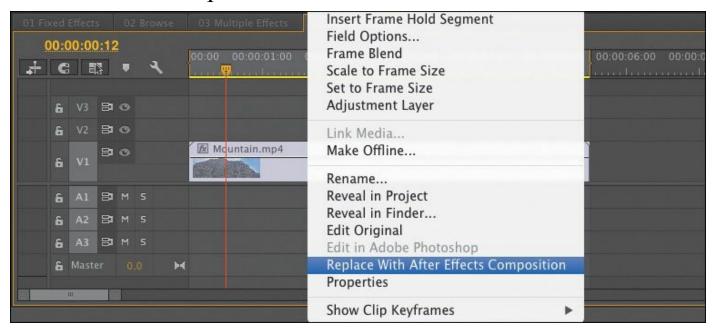
### Sending a clip to Adobe After Effects

If you're working with a computer that also has Adobe After Effects installed, you can easily send clips back and forth between Premiere Pro and After Effects. Thanks to the close relationship between Premiere Pro and After Effects, you can seamlessly integrate the two applications more easily than on any other editing platform. This is a useful way to significantly extend the effects capabilities of your editing workflow.

The process you'll use to share clips is called Dynamic Link. With Dynamic Link you can seamlessly exchange clips with no unnecessary rendering.

### Try this:

- 1. Open the sequence 04 Dynamic Link.
- 2. Right-click the clip and choose Replace With After Effects Composition.



3. If it's not running already, After Effects launches. If the After Effects Save As dialog appears, enter a name and location for the After Effects project. Name the project

**Lesson 13-01.aep** and save it to the Lessons folder.

After Effects creates a new composition, which inherits the sequence settings from Premiere Pro. The new composition is named based on the Premiere Pro project name, followed by "Linked Comp."

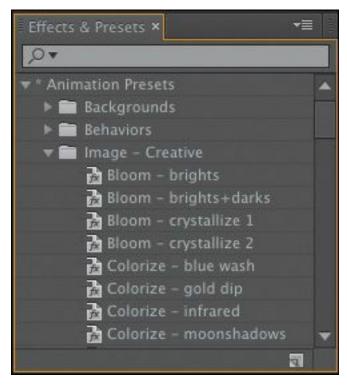
After Effects compositions are analogous to Premiere Prosequences.

4. If the composition isn't already open, look for it in the After Effects project panel, and double-click to load it. It should be called Lesson 13 Linked Comp 01.

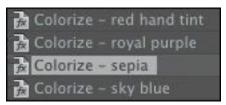
Clips become layers in After Effects compositions, to make it easier to work with advanced controls on the Timeline.

There are lots of ways to apply effects with After Effects. To keep things simple, let's work with animation presets. For more on effects workflows, see *Adobe After Effects CC Classroom in a Book*.

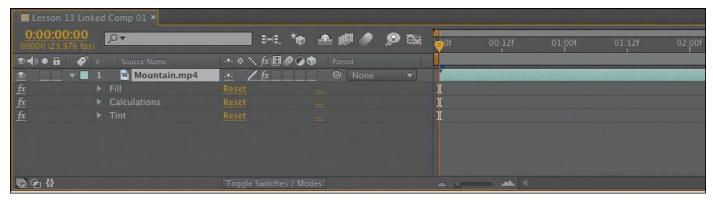
- 5. Locate the Effects & Presets panel. Click the disclosure triangle to expand the Animation Presets.
  The animation presets in After Effects use standard builtin effects to achieve impressive results. They are an excellent shortcut to producing a professional finish for your work.
- **6.** Expand the Image Creative folder. You may need to resize the panel a little to read the full preset names.



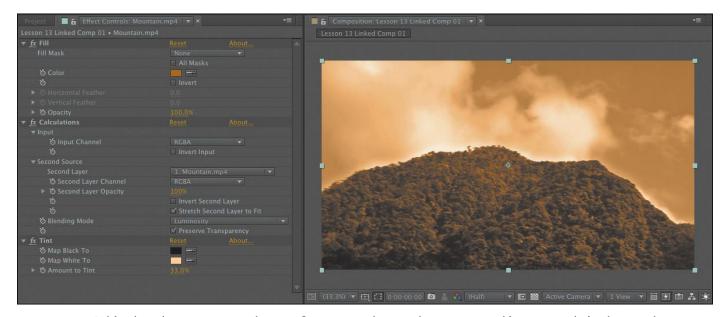
7. Double-click the Colorize – sepia preset to apply it to the selected layer.



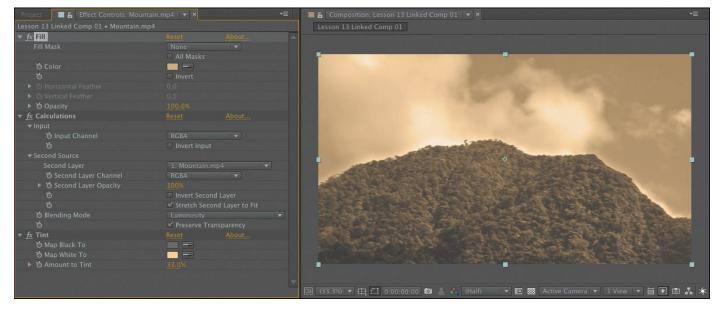
**8.** Select the clip on the Timeline, and press the E key to see the applied effects. You can click the disclosure triangles for each effect to see the controls.



**9.** Now look at the Effect Controls panel. The same effects are displayed here.



10. Click the swatches for each color to adjust which colors are used for the Tint and Fill effects. Move the sepia tone into slightly cooler tones.



- 11. In the Preview panel, click the RAM Preview button (
  ) to preview the effect. After the frames are cached, the file will play back in real time.
- **12.** Choose File > Save to capture your changes.
- 13. Switch back to Premiere Pro and play the sequence to view the results.

#### Tip 🕟

Just like Premiere Pro, After Effects lists all panels in the Window menu. If you can't find a panel, look for it there.

The original clip on the Timeline in Premiere Pro has been replaced with the dynamically linked After Effects composition.

The frames are processed in the background and handed off from After Effects to Premiere Pro. You can also select the clip in the Timeline and choose Sequence > Render Effects In To Out.

You can browse and download several After Effects presets from the Adobe website by visiting <a href="www.adobe.com/go/learn\_ae\_cs3additionalanimationpresets">www.adobe.com/go/learn\_ae\_cs3additionalanimationpresets</a>. Most of the posted presets are free. This is also an excellent way to explore the larger After Effects community.

### Master clip effects

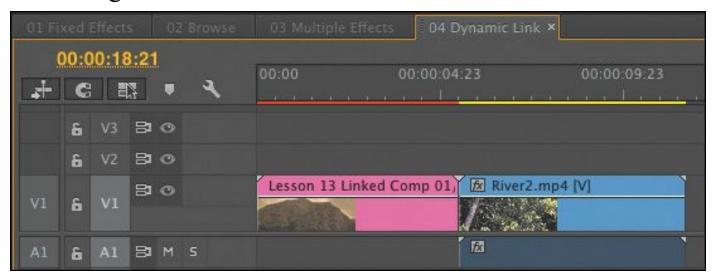
While all of the effects work you have performed so far has been applied to clips on the Timeline, Premiere Pro also allows you to apply effects to master clips in the Project panel. You use the same visual effects and work with them in the same way, but with master clips, any instance of a clip you add to a sequence will inherit the effects you have applied.

For example, you could add a color adjustment to a clip in the Project panel so that it matches other camera angles in a scene. Each time you use that clip, or part of that clip in a sequence,

the effect will already be applied.

To add, adjust, and remove a master clip effect, do the following:

- 1. Continue working with the 04 Dynamic Link sequence.
- 2. Locate the clip River2.mp4 in the Project panel. Edit this clip into the sequence, after the existing clip. Position the Timeline playhead over the clip, so you can see it in the Program Monitor.

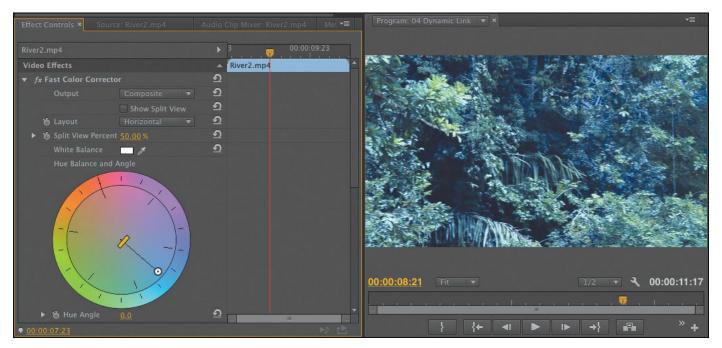


**3.** Double click the River2.mp4 clip in the Project panel to open it in the Source Monitor.

You now have the same clip open in the Source Monitor and displayed in the Program Monitor, so you can see the changes as you apply them in both monitors.



- **4.** In the Effects panel, locate the Fast Color Corrector effect.
- 5. Drag the Fast Color Corrector effect into the Source Monitor, adding it to the master clip. Click on the Source Monitor to make sure it's the active panel.
- **6.** Go to the Effect Controls panel to see the Fast Color Corrector controls.
- 7. Drag the color wheel puck from the center toward the blue edge.



You made the adjustment to the clip in the Source Monitor. That means it was applied to the Project panel master clip, not to the copy of the clip on the Timeline. Still, the results of the effect can be seen in the Project panel.

From now on, anytime you use this clip, or part of it, in a sequence, Premiere Pro will apply the same effect.

It's important to be clear about the distinction between clips on the Timeline and clips in the Project panel.

**8.** Click the clip on the Timeline, and look in the Effect Controls panel, which shows no Fast Color Corrector effect.

The Effect Controls panel shows the name of the sequence, followed by the name of the clip.

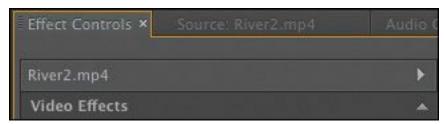


That's because you haven't applied the effect to the

Timeline instance of the clip.

**9.** Click back into the Source Monitor, and then look in the Effect Controls panel.

You'll see the effect again. Notice the Effect Controls panel now shows just the name of the clip.



10. Select the name of the Fast Color Corrector effect in the Effect Controls panel and press Delete. The effect is removed, and the Program Monitor updates to reflect this change.

Working with master clips is a powerful way to manage effects in Premiere Pro. You may need to experiment a little to make the most of them. You use the same visual effects as you would use on the Timeline, so the techniques you're learning in this book will work the same way, but the planning is a little different.

#### Note

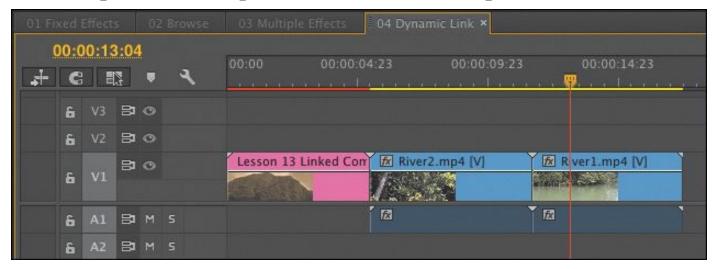
If you want to open the Project panel instance of a clip you are viewing on the Timeline, position the playhead over the clip, select it, and press the F key. This is the keyboard shortcut for Match Frame, which opens the original master clip in the Source Monitor.

### Masking and tracking visual effects

All standard visual effects can be constrained to elliptical or polygon masks, which you can manually animate using keyframes. Premiere Pro can also optically motion-track your shots to animate the position of the masks you create, following the action with the constrained special effect.

Masking and tracking effects is a great way to hide a detail like a face or logo behind a blur. You can also use the technique to apply subtle creative effects or modify the lighting in a shot.

- 1. Continue working with the 04 Dynamic Link sequence.
- 2. In the Project panel, locate the clip River1.mp4. Edit this clip into the sequence after the last clip.

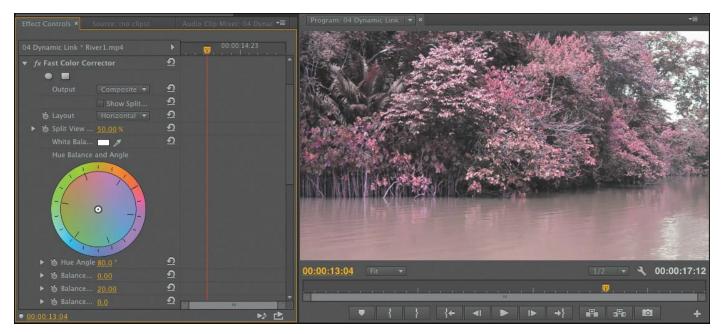


This clip looks good, but it would benefit from a little more color.

- 3. Search the Effects panel for the Fast Color Corrector effect. Apply this effect to the River1.mp4 clip on the Timeline. Make sure the clip is selected.
- 4. In the Effect Controls panel, change the Fast Color Corrector Hue Angle to about 80 degrees. You can change the Hue Angle by dragging the edge of the color wheel, or "\*\*\*\*\*ebook converter DEMO www.ebook-

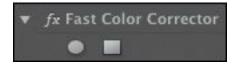
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by typing in a number in the Hue Angle setting just below it.

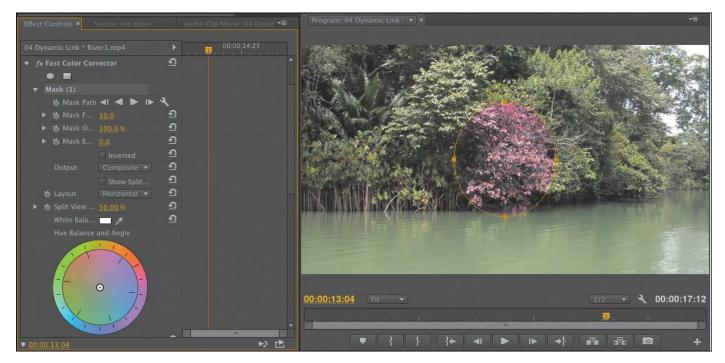


This effect changes the entire picture to a warm hue, but we're going to constrain the effect to just one area of the plant life.

5. Just under the name of the Fast Color Corrector effect in the Effect Controls panel, you'll see two buttons that allow you to add a mask to the effect. Click the first button to add an elliptical mask.



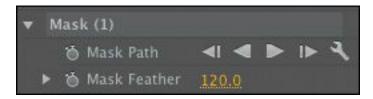
Immediately, the effect is constrained to the mask you just created. You can add multiple masks to an effect. If you select a mask in the Effect Controls panel, you can click and modify the shape in the Program Monitor.



6. Position the playhead at the start of the clip, and use the mask handles to reposition the mask over an area of bushes near the middle of the picture.



7. Feathering softens the edge of the mask. Set the Mask Feather to about 120.



If you deselect the mask in the Effect Controls panel, you'll see that changing the hue, rather than adding a color cast, produces a reasonably natural result. Now you just need to track the picture.



- 8. Click the Track Selected Mask Forward button ( ) in the Effect Controls panel, just under the mask name, Mask (1).
- **9.** Play the sequence to view the result.

Premiere Pro can also track backwards, so you can select an item partway through a clip and then track in both directions to create a natural path for the mask to follow.

# **Keyframing effects**

The concept of keyframes dates back to traditional animation. The lead animator would draw the keyframes (or major poses), and then assistant animators would animate the frames in between (a process often called *tweening*). These days, you're the master who sets the major keyframes, and the computer does the rest of the work as it interpolates values in between the keyframes you set.

# Adding keyframes

You can change almost all parameters for all video effects over time using keyframes. For example, you can have a clip gradually change out of focus, change color, or lengthen its shadow.

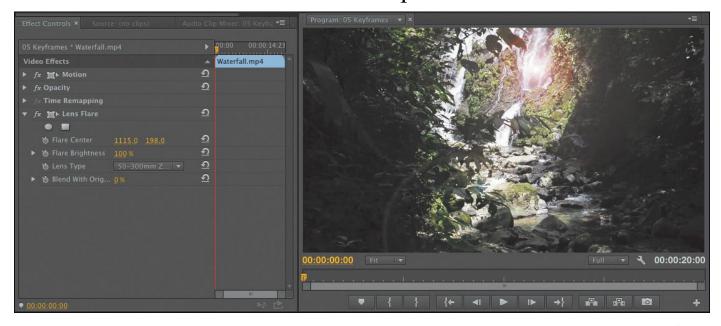
- 1. Open the sequence 05 Keyframes.
- 2. View the sequence to get familiar with the footage.
- 3. In the Effects panel, locate the Lens Flare effect and apply it to the video layer in the sequence.
- **4.** Position the playhead at the start of the clip.

#### Note

Be sure to move the playhead over the clip you're working with when applying effects so you can view your changes as you work. Selecting the clip alone will not make it visible in the Program Monitor.

5. In the Effect Controls panel, select the Lens Flare effect. With the effect selected, Premiere Pro displays a small

control handle in the Program Monitor. Use the handle to reposition the lens flare as in the following figure, so the center of the effect is at the top of the waterfall.



# Tip 🕟

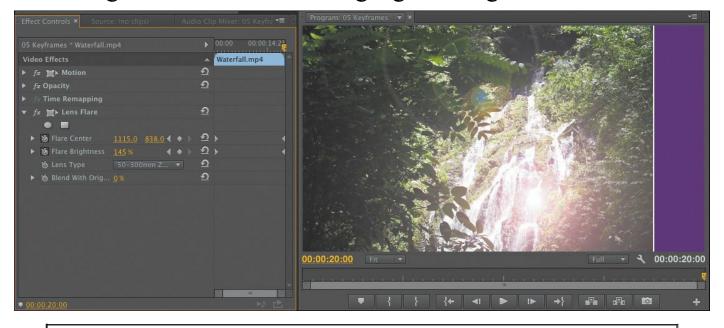
You might need to toggle the Lens Flare effect off and on to see the control handle, as it's quite small.

- 6. Make sure the Effect Controls panel Timeline is visible. If it isn't, click the Show/Hide Timeline View button (at the top right of the panel to toggle the display.
- 7. Click the stopwatch icons to toggle animation for the Flare Center and Flare Brightness properties.



8. Move the playhead to the end of the clip.
You can drag the playhead directly in the Effect Controls

- panel. Make sure you see the last frame of video and not black.
- **9.** Adjust Flare Center and Flare Brightness so the flare drifts across the screen with the camera pan and gets brighter. Use the following figure for guidance.



### Tip

Be sure to use the Next Keyframe and Previous Keyframe buttons to move between keyframes efficiently. This will keep you from adding unwanted keyframes.

**10.** Play the sequence to watch the effect animate over time.

# Note

The colored stripe to the right of the clip indicates the last frame of the sequence.

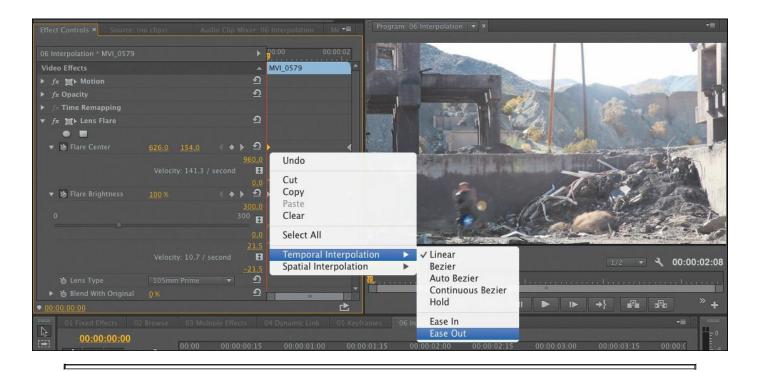
### Adding keyframe interpolation and velocity

Keyframe interpolation changes the behavior of an effect setting as it moves between keyframes with different settings. The default behavior you've seen so far is linear; in other words, you have a constant change between keyframes. What generally works better is something that mirrors your experience or exaggerates it, such as a gradual acceleration or deceleration.

Premiere Pro offers a way to control those changes: keyframe interpolation and the Velocity graph. Keyframe interpolation is easy (two clicks), whereas tweaking the Velocity graph can be challenging. Getting a handle on this feature will take some time and practice.

- 1. Open the sequence 06 Interpolation.
- 2. Position the playhead at the beginning of the clip.

  A Lens Flare effect has already been applied to this clip and is currently animated. However, the movement begins before the camera, which isn't very natural-looking.
- 3. Toggle the Lens Flare effect off and on by clicking the "fx" button ( ) next to the effect name in the Effect Controls panel, so you can see the subtle result.
- **4.** In the Timeline view of the Effect Controls panel, right-click the first keyframe for the Flare Center property.
- **5.** Choose the Temporal Interpolation > Ease Out method to create a gentle transition into the move from the keyframe.



#### Note

When working with position-related parameters, the context menu for a keyframe will offer two types of interpolation: spatial (related to location) and temporal (related to time). You can make spatial adjustments in the Program Monitor as well as in the Effect Controls panel if you select the effect. You can make temporal adjustments on the clip in the Timeline and in the Effect Controls panel. These motion-related topics are covered in Lesson 9.

6. Right-click the second keyframe for the Flare Center property and choose Temporal Interpolation > Ease In. This creates a gentle transition from the stationary position of the last keyframe.

Let's modify the Flare Brightness property.

7. Click the first keyframe for Flare Brightness and then hold down the Shift key and click the second keyframe so both are active.



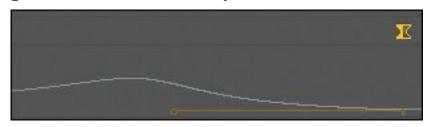
- **8.** Right-click either Flare Brightness keyframe, and choose Auto Bezier to create a gentle animation between the two properties.
- **9.** Play back the animation to watch the changes you've made.
  - Let's further refine the keyframes with the Velocity graph.
- 10. Hover the mouse cursor over the Effect Controls panel and then press the `(grave) key to maximize the panel full-screen. This will give you a clearer view of the keyframe controls.
- 11. If necessary, click the disclosure triangles next to the Flare Center and Flare Brightness properties to show the adjustable properties.



The Velocity graph shows the velocity between keyframes. The sudden drops or jumps represent sudden

changes in acceleration—*jerks*, in physics parlance. The farther the point or line is from the center, the greater the velocity.

12. Select a keyframe and then adjust its handle to change the steepness of the velocity curve.



- 13. Press the `(grave) key to restore the Effect Controls panel.
- **14.** Play back your sequence to see the impact of your changes. Experiment some more until you've got the hang of keyframes and interpolation.

## **Understanding interpolation methods**

Here's a rundown of the keyframe interpolation methods available in Premiere Pro.

- Linear: This is the default behavior and creates a uniform rate of change between keyframes.
- Bezier: This lets you manually adjust the shape of the graph on either side of a keyframe. Beziers allow for sudden or smooth acceleration into or out of a keyframe.
- Continuous Bezier: This method creates a smooth rate of change through a keyframe.
   Unlike Bezier keyframes, if you adjust one handle of a Continuous Bezier keyframe, the

handle on the other side moves equally, to maintain a smooth transition through the keyframe.

- Auto Bezier: This method creates a smooth rate of change through a keyframe even if you change the keyframe value. If you choose to manually adjust the keyframe's handles, it changes to a Continuous Bezier point, retaining the smooth transition through the keyframe. The Auto Bezier option can occasionally produce unwanted motion, so try one of the other options first.
- Hold: This method changes a property value without a gradual transition (a sudden effect change). The graph following a keyframe with the Hold interpolation applied appears as a horizontal straight line.
- Ease In: This method slows down the value changes entering a keyframe.
- Ease Out: This method gradually accelerates the value changes leaving a keyframe.

## **Effect presets**

To save time on repeated tasks, Premiere Pro supports effect presets. You'll find that there are several presets included for specific tasks already, but their true power lies in creating your own presets to solve repetitive tasks. When you create an effect preset, it can store more than one effect and can even include keyframes for animation.

## Using built-in presets

You can use one of the effect presets included with Premiere Pro. These are useful for tasks such as beveling, picture-inpicture effects, and stylized transitions.

- 1. Open the sequence 07 Presets.

  This sequence has two clips: a video shot and a logo superimposed. Let's animate a reveal of the logo using an animation preset.
- 2. In the Effects panel, browse inside the Presets bin and expand the Mosaics bin to find the Mosaic In preset.
- **3.** Drag the Mosaic In preset onto the paladin-logo.psd clip on Video 2.
- **4.** Play back the sequence to watch the logo animate onto the screen.
- 5. Click the paladin-logo.psd clip on Video 2, and view its controls in the Effect Controls panel.



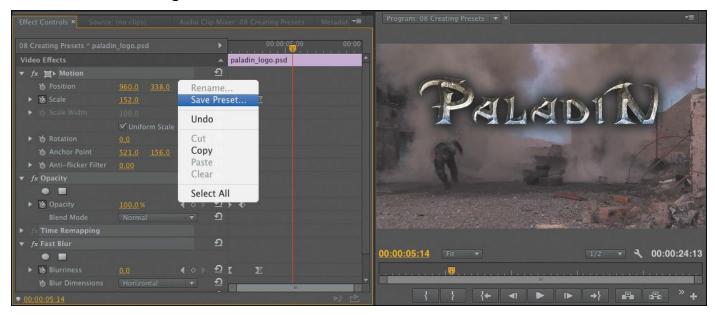
**6.** Experiment with adjusting the position of the keyframes in the Effect Controls panel to customize the effect.

## Saving effect presets

Although there are several built-in effect presets to choose from, creating your own is also easy. You can also import and export presets to share them between editing systems.

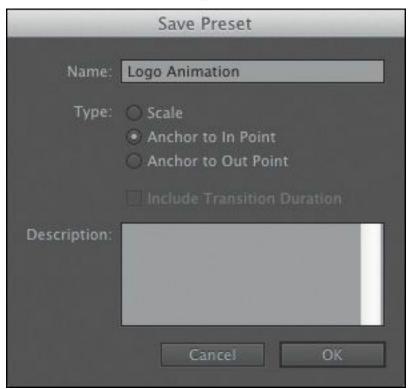
- 1. Open the sequence 08 Creating Presets.

  This Timeline has two clips, and two instances of a show logo.
- 2. Play the sequence to watch the initial animation.
- 3. Select the first instance of paladin\_logo.psd.
- **4.** Click in the Effect Controls panel to make it active, and choose Edit > Select All to choose all of the effects applied to the clip.
  - You can also select individual effects if you only want to include some of them in the preset.
- 5. Right-click any of the selected effects in the Effect Controls panel and choose Save Preset.



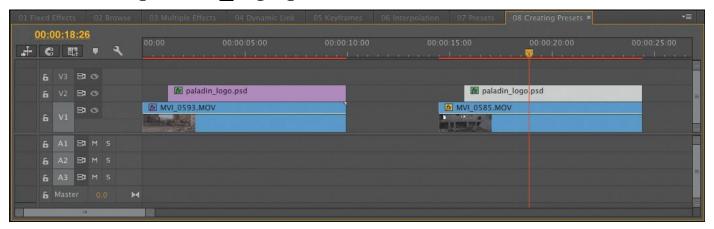
**6.** In the Save Preset dialog, name the effect **Logo Animation**.

- 7. Choose one of the following preset types to specify how Premiere Pro should handle keyframes in a preset:
  - Scale: Proportionally scales the source keyframes to the length of the target clip. Any existing keyframes on the original clip are deleted.
  - Anchor to In Point: Preserves the position of the first keyframe as well as the relationship of other keyframes in a clip. Other keyframes are added to the clip relative to its In point. Use this option for this exercise.
  - Anchor to Out Point: Preserves the position of the last keyframe as well as the relationship of other keyframes in a clip. Other keyframes are added to the clip relative to its Out point.



**8.** Click OK to store the effects and keyframes as a new preset.

- 9. In the Effects panel, locate the Presets folder.
- 10. Locate the newly created Logo Animation preset.
- 11. Drag the Logo Animation preset onto the second instance of the paladin\_logo.psd file in the Timeline.



12. Watch the sequence play back to see the newly applied title animation.

## **Using multiple GPUs**

If you'd like to speed up the rendering of effects or export of clips, consider adding an additional GPU card. If you're using a tower or workstation, you may have an additional slot that can support a second graphics card. Premiere Pro takes full advantage of computers with multiple GPU cards to significantly accelerate export times. You can find additional details about supported cards on the Adobe website.

## Frequently used effects

Throughout this lesson you've explored several effects. Although it's beyond the scope of this book to explore all the

options, we'll cover a few additional effects that are useful in many editing situations. By looking at the possibilities, you'll have a better appreciation for the options that lie ahead.

## Image stabilization and rolling shutter reduction

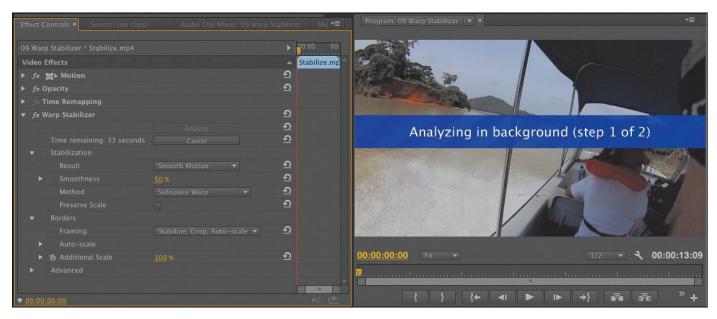
The Warp Stabilizer effect can remove jitter caused by camera movement (which is more and more common with today's lightweight cameras). The effect is useful because it can remove unstable parallax-type movements (where images appear to shift on planes). The effect can also repair a common visual artifact caused by CMOS-type sensors (such as those on DSLR cameras) and has the ability to compensate for rolling shutter.

When a camera with a CMOS sensor pans, or when objects move horizontally, vertical lines can appear distorted. This is because the camera records the image in horizontal lines and it takes time to get from the beginning of a frame to the end. If an object is moving in that time, you'll see distortion.

Let's explore the effect.

- 1. Open the sequence 09 Warp Stabilizer.
- 2. Play the sequence to see the wobbly shot.
- 3. Select the clip on the Timeline.
- 4. In the Effects panel, locate the Warp Stabilizer effect and apply it to the shot.

The clip is immediately analyzed.



The analysis is in two stages. A banner across the footage lets you know you'll need to wait before working with the effect. There's also a detailed progress indicator in the Effect Controls panel. The analysis takes place in the background, so you can carry on working on your sequence while waiting for it to complete.

- 5. Once the analysis has completed, you can adjust settings in the Effect Controls panel to improve results by choosing options that better suit the shot:
  - **Result:** You can choose Smooth Motion to retain the general camera movement (albeit stabilized), or you can choose No Motion to attempt to remove all camera movement. For this exercise, choose Smooth Motion.
  - **Method:** You can use the four methods available. The two most powerful, because they warp and process the image more heavily, are Perspective and Subspace Warp. If either method creates too much distortion, you can try switching to Position, Scale, Rotation or just to Position.

• Smoothness: This option specifies how much of the original camera movement should be retained for Smooth Motion. Use a higher value to smooth out the shot the most. Experiment with this shot until you're happy with its stability.

## Tip

If you notice that some of the details in the shot appear to wobble, you may be able to improve the overall effect. In the Advanced section, choose Detailed Analysis. This makes the Analysis phase do extra work to find elements to track. You can also use the Enhanced Reduction option from the Rolling Shutter Ripple option under the Advanced category. These options are slower to calculate but produce superior results.

6. Play back the sequence.

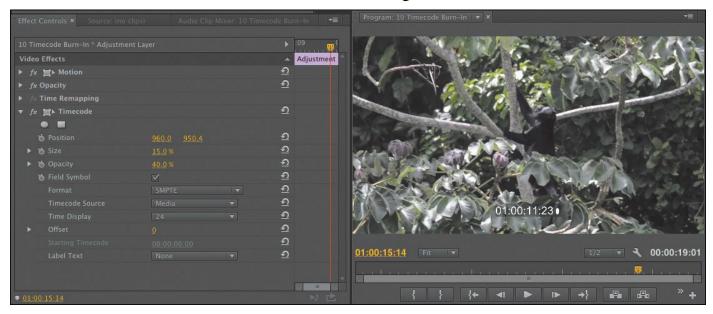
# Timecode and Clip Name

If you need to send a review copy of a sequence to a client or colleague, the Timecode and Clip Name effects are very useful. You can apply the Timecode effect to an adjustment layer and have it generate a visible timecode for the entire sequence. You can enable a similar Timecode overlay when exporting media, but the effect has more options.

This is helpful because it allows others to make specific feedback based on a unique point in time. You can control the display of position, size, opacity, the timecode itself, and its

format and source. The Clip Name effect needs to be applied to each clip.

- **1.** Open the sequence 10 Timecode Burn-In.
- 2. In the Project panel, click the New Item menu, and choose Adjustment Layer. Click OK.
  - A new adjustment layer is added to the Project panel, with settings that match your current sequence.
- 3. Drag the adjustment layer to the beginning of track Video 2 in the current sequence.
- **4.** Drag the right edge of the new adjustment layer to the right to trim it to the end of the sequence. The adjustment layer should cover all three clips.
- 5. In the Effects panel, locate the Timecode effect. Drag it onto the adjustment layer to apply it.
- **6.** In the Effect Controls panel, set Time Display to 24, to match the frame rate of the sequence.



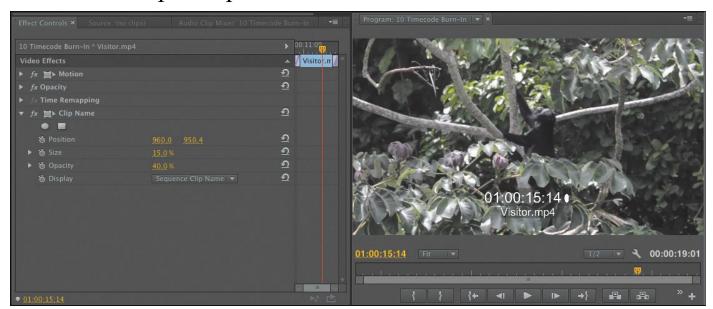
7. Choose a timecode source. In this case, use the Generate option and set the Starting Timecode option to

- 01:00:00:00 to match the sequence.
- **8.** Adjust the Position and Size options for the effect.

It's a good idea to move the timecode window so it's not blocking critical action in the scene or obscuring any graphics. If you plan to post the video to the web for review, be sure to size the timecode burn-in so it's easy to read.

Now let's apply an effect that will display the name of each clip in the exported movie. This will make it easier to get specific feedback from a client or collaborator.

- **9.** The first two clips in the sequence already have the Clip Name effect applied. Select the last clip in the sequence on track V1.
- 10. In the Effects panel, search for the Clip Name effect.
- 11. Double-click the Clip Name effect to apply it to the selected clip. You can use this workflow to apply an effect to multiple clips.



12. Adjust the effect properties to taste to ensure that both

the Timecode and Clip Name effects are readable.

13. Clear the Effects panel search box.

## Note

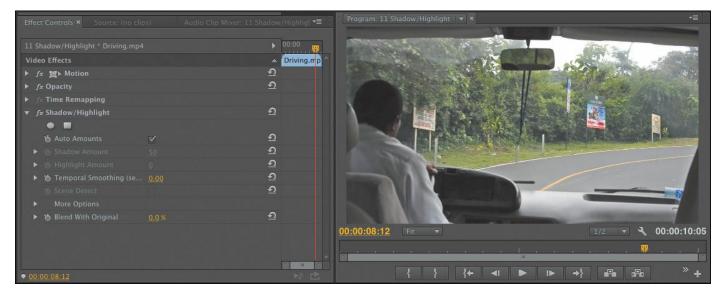
If you want to show the timecode for the original clip, you'll need to apply the timecode effect directly to every clip in the sequence.

## Shadow/Highlight

The Shadow/Highlight effect is useful for quickly adjusting the contrast issues in a clip. It can brighten a subject in dark shadows. It can also darken areas that are slightly overexposed. The effect makes relatively isolated adjustments based on surrounding pixels. The default settings are for fixing images with backlighting problems, but you can modify the settings as needed.

Let's try out the effect.

- 1. Open the sequence 11 Shadow/Highlight.
- 2. Play the sequence to evaluate the shot. It's a little dark.
- 3. Select the clip in the Timeline panel.
- **4.** In the Effects panel, locate the Shadow/Highlight effect. Apply it to the shot.
- **5.** Play the sequence to see the results of the effect.



By default, the effect uses Auto Amounts mode. This option deactivates most of the controls but often gives usable results.

- **6.** Deselect the Auto Amounts check box in the Effect Controls panel.
- 7. Use the disclosure triangle to expand the controls for More Options to refine the effect.
  - Let's adjust the definition of what's a shadow and what's a highlight, and then refine the exposure of each.
- **8.** Adjust the following properties to taste (or use the figure for guidance).



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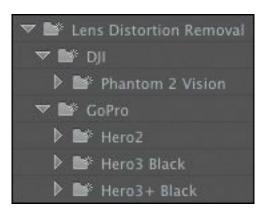
- **Shadow Amount:** Use this adjustment to control how much shadows are lightened.
- **Highlight Amount**: Use this control to darken the highlights in the image.
- Shadow Tonal Width and Highlight Tonal Width:
  Use the range to define what is considered a highlight or shadow. Use a higher value to expand the range and a narrower value to limit it. These controls are useful for isolating regions that you need to adjust.
- Shadow Radius and Highlight Radius: Adjust the radius controls to blend the selected and unselected pixels. This can create a smoother blend of the effect. Avoid values that are too high or an unwanted glow may appear.
- Color Correction: As you adjust exposure, the color in an image may become washed out. Use this slider to restore a natural look to the adjusted areas of the footage.
- **Midtone Contrast:** Use this control to add more contrast to the midtone areas. This can be useful if you need the middle of the image to better match the adjusted shadow and highlight regions.

### Lens distortion removal

Action and POV cameras such as the GoPro are increasingly popular, especially with the advent of affordable aerial camera mounts. While the results can be amazing, the popular wideangle lenses can introduce a lot of unwanted distortion.

The Lens Distortion effect can be used to introduce the "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

appearance of lens distortion as a creative look. It can also be used to correct lens distortion. In fact, Premiere Pro has a number of built-in presets intended to correct distortion from popular cameras. You'll find the presets in the Effects panel, under Lens Distortion Removal.



Remember, you can make a preset from any effect, so if you are working with a camera that has no existing preset, you can easily create your own.

## Render all sequences

If you have several sequences with effects you would like to render, you can render them all as a batch, without opening each sequence to render it individually.

Simply select the sequences you would like to render in the Project panel and go to Sequence > Render Effects In to Out.

All effects that need to render in the selected sequences will be rendered.

# **Review questions**

- **1.** What are two ways to apply an effect to a clip?
- **2.** List three ways to add a keyframe.
- 3. Dragging an effect to a clip turns on its parameters in the

Effect Controls panel, but you don't see the effect in the Program Monitor. Why not?

- 4. Describe how you can apply one effect to a range of clips.
- 5. Describe how to save multiple effects to a custom preset.

### **Review answers**

- 1. Drag the effect to the clip, or select the clip and double-click the effect in the Effects panel.
- 2. Move the playhead in the Effect Controls panel to where you want a keyframe, and activate keyframing by clicking the "Toggle animation" button; move the playhead, and click the Add/Remove Keyframe button; and with keyframing activated, move the playhead to a position and change a parameter.
- 3. You need to move the Timeline playhead to the selected clip to see it in the Program Monitor. Simply selecting a clip does not move the playhead to that clip.
- 4. Select the clips you would like to apply the effect to, then drag the effect onto the group. You can also add an adjustment layer above the clips you want to affect. You can then apply an effect that will modify all the clips below the layer.
- 5. You can click the Effect Controls panel and choose Edit > Select All. You can also Control-click (Windows) or Command-click (Mac OS) multiple effects in the Effect Controls panel. Once selected, choose the Save Preset command from the Effect Controls panel menu.

# 14. Color Correction and Grading

### **Lesson overview**

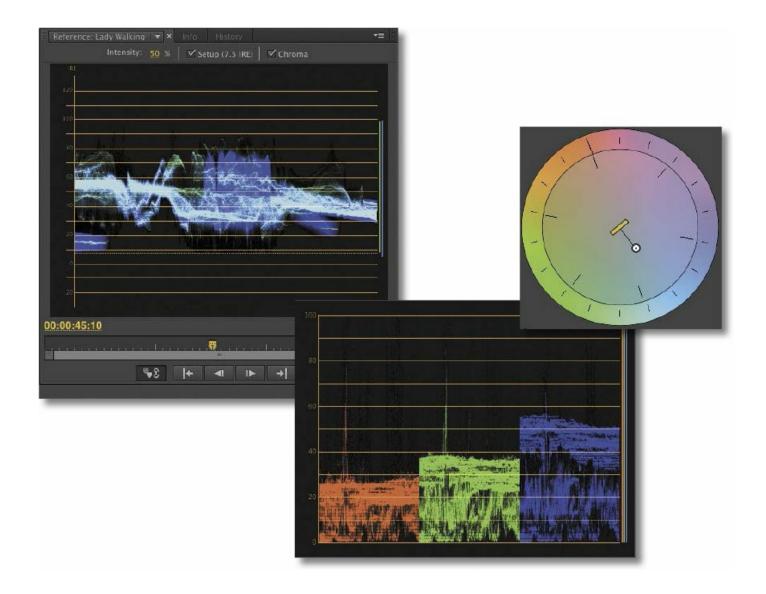
In this lesson, you'll learn about the following:

- Working in the Color Correction workspace
- Using vectorscopes and waveforms
- Using color correction effects
- Fixing exposure and color balance problems
- Working with special effects
- Creating a look
- Sharing work with Adobe SpeedGrade



This lesson will take approximately 60 minutes.

In this lesson, you'll learn some key techniques for improving the look of your clips. Industry professionals use these techniques every day to give television programs and films the "pop" and atmosphere that set them apart.



Editing your clips together is just the first part of the creative process. Now it's time to work with color.

## **Getting started**

It's time to switch gears again. Until now you've been organizing your clips, building sequences, and applying special effects. All of these skills come together when working with color correction.

To get the most from Adobe Premiere Pro CC's color correction tools, you'll need to think in terms of color composition: Consider the way your eyes register color and

light, the way cameras record it, and the way your computer screen, a television screen, a video projector, or a cinema screen displays it.

Premiere Pro has multiple color correction tools and makes it easy to create your own presets. In this lesson, you'll begin by learning some fundamental color correction skills and then meet some of the most popular color correction special effects, before using them to deal with some common color correction challenges.

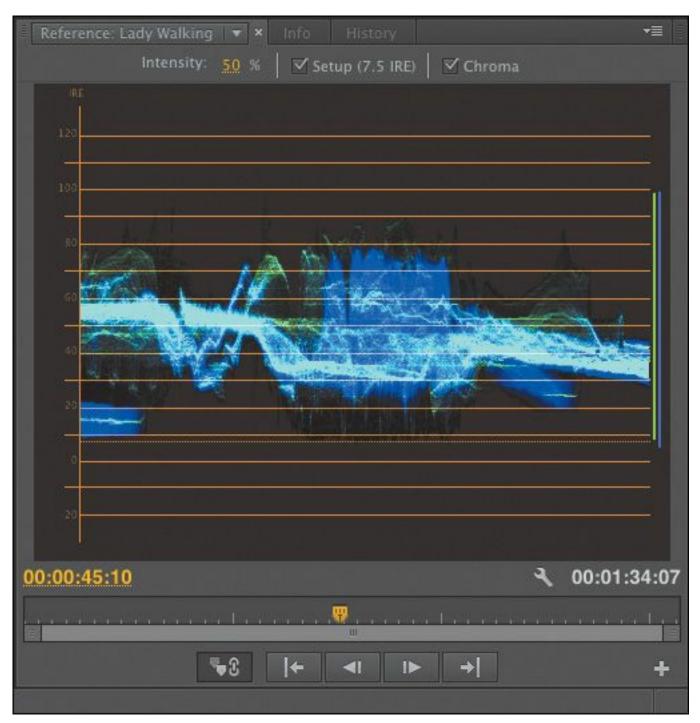
- 1. Open Lesson 14.prproj in the Lesson 14 folder.
- 2. Choose Window > Workspace > Color Correction to switch to the Color Correction workspace.
- **3.** Choose Window > Workspace > Reset Current Workspace.
- 4. Click Yes in the Reset Workspace dialog.

## **Color-oriented workflow**

Now that you've switched to a new workspace, it's a good time to switch to a different kind of thinking. With your clips in place, it's time to look at them less in terms of the action and more in terms of whether they fit together—whether they look like they were shot at the same time, in the same place, and with the same camera.

There are two main phases to working with color:

- 1. Make sure your clips have matching colors, brightness, and contrast.
- 2. Give everything a "look"—a particular tonality or color tint.



You'll use the same tools to achieve both of these goals, but it's common to approach them in this order, separately. If two clips from the same scene don't have matching colors, it creates a jarring continuity problem.

# The Color Correction workspace

Like the other specialized workspaces, the Color Correction
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workspace repositions and resizes multiple panels to make a convenient layout for the task at hand.

The workspace includes a couple of noteworthy changes:

- There's a new Reference Monitor (explained below).
- The Effect Controls panel takes up a large part of the screen.

You'll notice that the Timeline panel shrinks to accommodate the new Reference Monitor and the larger Effect Controls panel. This is fine, because by the time you get to working on color correction, you won't be editing your clips and should not need to see lots of clips at once.



# Video scope essentials

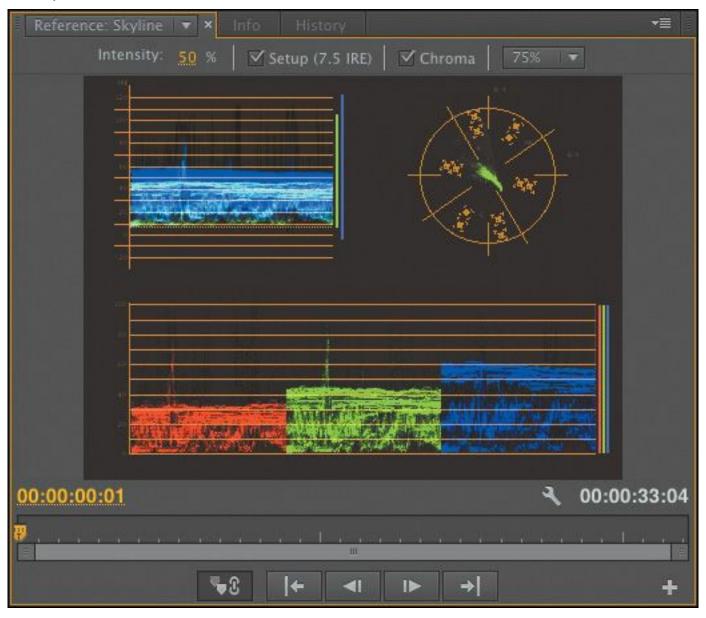
You might have wondered why the Premiere Pro interface is so gray. There's a very good reason: Vision is highly subjective. In fact, it's also highly relative.

If you see two colors next to each other, the way you see one is changed by the presence of the other. To prevent the Premiere Pro interface from influencing the way you perceive colors in your sequence, Adobe has made the interface almost entirely gray. If you've ever seen a professional color grading suite—where artists provide the finishing touches to films and television programs—you've probably noticed that most of the room is gray. Colorists sometimes have a large gray piece of card, or a section of a wall, that they can look at for a few moments to "reset" their vision before checking a shot.

The combination of your subjective vision and the variation

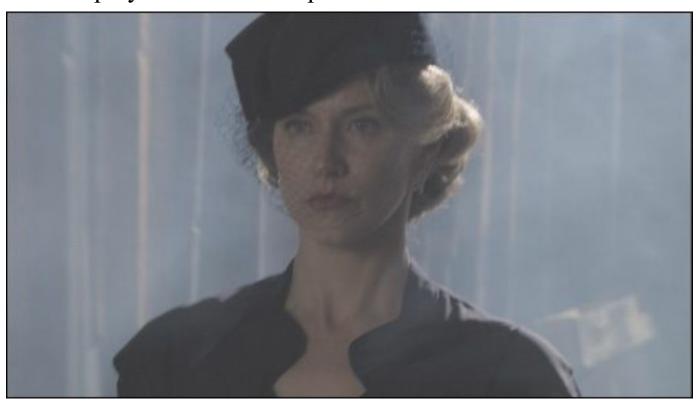
that can occur in the way computer monitors and television monitors display color and brightness creates a need for an objective measurement.

Video scopes provide just that. And they're used throughout the media industry; learn them once, and you'll be able to use them everywhere.



- 1. Open the sequence Lady Walking.
- 2. Position the Timeline playhead so that it's over the clip in the sequence.

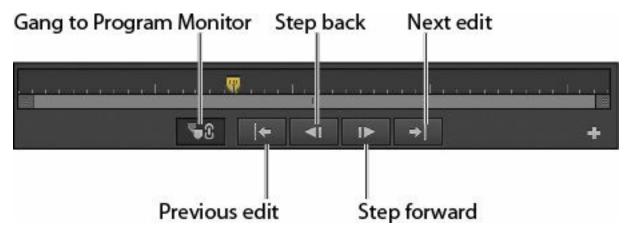
You should see the lady walking in the street in your Program Monitor, along with a second, synchronized display of the same clip in the Reference Monitor.



## The Reference Monitor

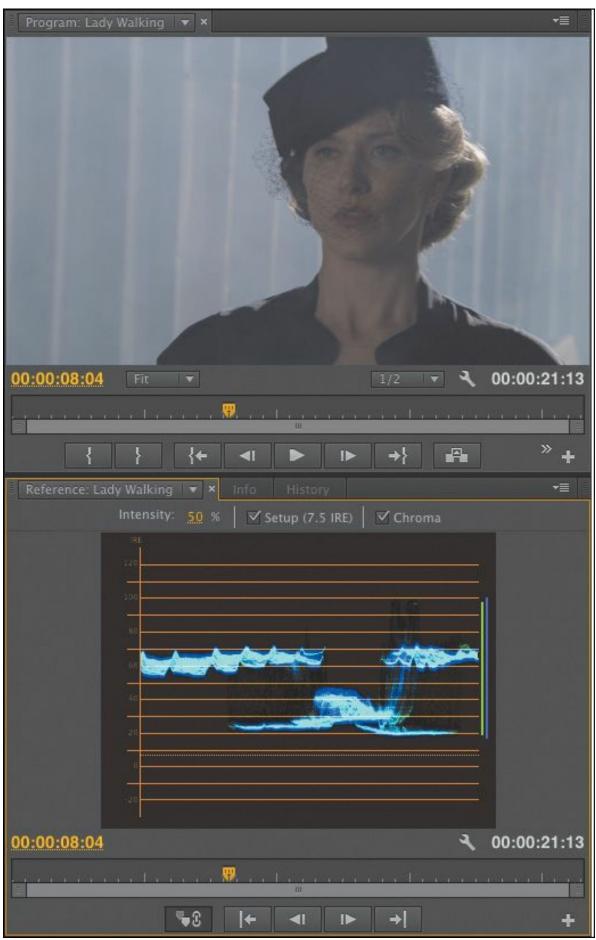
The Reference Monitor looks and behaves very much like the Source Monitor and Program Monitor. It displays the contents of the current sequence in much the same way that the Program Monitor does. The main difference is that there are no editing controls.

You can't add an In point or an Out point, for example. Instead, there are Timeline navigation controls and a Gang to Program Monitor button.



When the Gang to Program Monitor button is selected, the Reference Monitor moves in sync with the Timeline and Program Monitor. When the button is off, you can move the Reference Monitor playhead independently.

The Gang to Program Monitor option is useful, because the Reference Monitor can display the vectorscope or various waveforms in the same way that the Source Monitor and Program Monitor can. When you gang the Reference Monitor and use one of the scopes, you get dynamically updated objective information about the clips in your sequence.



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Because you can turn off ganging, you can also use the Reference Monitor to compare shots in a sequence, and you can always use the Source Monitor to compare with shots in the bin, of course.

## Note

When the Reference Monitor is ganged to the Program Monitor, it does not play back at the same time. When you stop playback or scrub, it updates to show the same frame.

#### YC waveform

To work with color in Premiere Pro, you'll also need to get familiar with the YC waveform. Click the Settings menu button in the Reference Monitor ( ) and set it to YC Waveform.

As you play your sequence or scrub the time ruler by dragging with the mouse, the YC waveform updates to show analysis of the current frame.

If you're new to waveforms, they can look a little strange, but they're actually very simple. They show you the brightness and color saturation of your images.

Every pixel in the current frame is displayed in the waveform. The brighter the pixel, the higher it appears. The pixels have their correct horizontal position—that is, a pixel halfway across the screen will be displayed halfway across the waveform—but the vertical position is not based on the image.

Instead, the vertical position indicates brightness or color intensity; the brightness and color intensity waveforms are "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

displayed together, using different colors.

- 0, at the bottom of the scale, represents no luminance at all and/or no color intensity.
- 100, at the top of the scale, represents a pixel that is fully bright. On the RGB (red, green, and blue) scale, this value would be 255.
- If you're working on an NTSC sequence, the waveform will automatically use the IRE scale. If you're working on a PAL sequence, the waveform will automatically use the Millivolts scale, where 0 on the waveform is truly 0.3 volts.

This all might sound rather technical, but in practice it's straightforward. There's a visible baseline that represents "no brightness" and a top level that represents "fully bright." The numbers on the edge of the graph might change, but the use is essentially the same.

YC stands for luminance (brightness) and chrominance (color).

The letter *C*, for chrominance, makes simple sense, but the letter *Y*, for luminance, takes a little explaining. It comes from a way of measuring color information that uses x, y, and z axes, where *y* represents the luminance. The idea was originally to create a simple system for recording color, and the use of *y* to represent brightness, or luminance, stuck.

The controls along the top of the YC waveform display give you some easy choices:

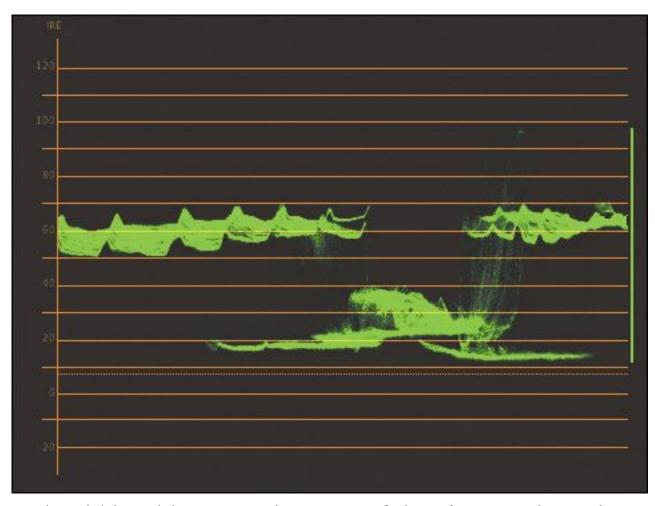


• **Intensity:** This changes the brightness of the display in the waveform.

- Setup (7.5 IRE): This applies only to some cases of NTSC analog, standard-definition (SD) video, where the 0 point on the graph actually represents 7.5. Selecting this check box has no significant effect on the way the waveform display works and doesn't change the video. It simply moves the 0 point up to 7.5. If you're working with a PAL video sequence, you won't see this check box.
- **Chroma:** This control turns off and on the display of color information in the waveform display.

We're not working with analog SD video, so deselect the Setup (7.5 IRE) option. We're also just going to work with the luminance for now, so deselect the Chroma option too.

Now you should see a simpler display that looks like the one shown here.



You should be able to see the parts of the picture where the smoky background of the image is displayed, toward the left and right (with some ridges where there is a pattern in the background). You should also be able to see a darker section, in the middle, where the lady is. If you scrub through the sequence, you'll see the waveform display update.

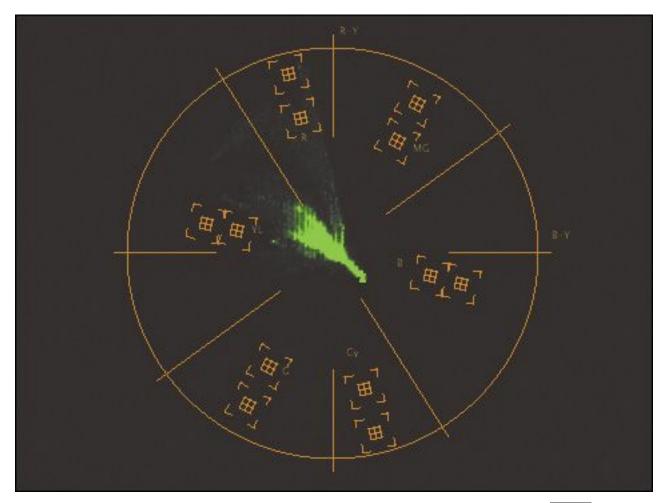
## Tip 🕟

It can sometimes seem as if the waveform display is showing an image. Remember, the vertical position of the pixels in your images is not used in a waveform display. The waveform display is useful for showing how much contrast you have in your images and for checking whether you are working on video that has "legal" levels—that is, the minimum and maximum brightness or color saturation permitted by a broadcaster. Broadcasters adopt their own standards for legal levels, so you will need to find out for each case where your work will be broadcast.

You can see right away that we do not have great contrast in this shot. There are some strong shadows but very few *highlights*—pixels in the upper part of the waveform display.

## Vectorscope

Whereas the YC waveform display shows luminance in terms of the vertical position of pixels displayed, with brighter pixels displayed at the top and darker pixels displayed at the bottom, the vectorscope shows only color.



Click the Reference Monitor Settings menu button ( ), and choose Vectorscope.

Open the Skyline sequence in the Sequences bin. There's just one clip in this sequence.

Pixels in the image are displayed in the vectorscope. If a pixel appears in the center of the circle, it has no color saturation. The closer to the edge of the circle, the more color a pixel has.

If you look closely at the vectorscope, you'll see a series of targets indicating primary colors:

- $\cdot$  R = Red
- G = Green
- B = Blue

...and secondary colors:

- YL = Yellow
- CY = Cyan
- MG = Magenta

The closer a pixel is to one of these targets, the more of that color it has. While the waveform display gives an indication of where a pixel is in the picture, thanks to the horizontal position, there is no position information in the vectorscope.

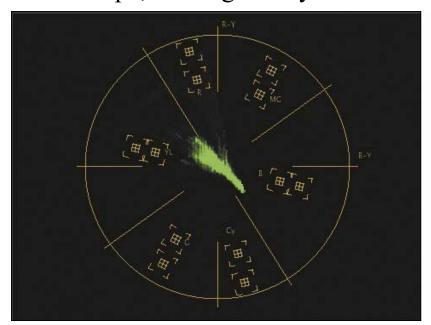
It's clear enough to see what's happening in this shot of Seattle. There's a lot of darker blue, and there are a few spots of red and yellow. The small amount of red is indicated by the streak of peaks reaching out toward the R marking in the vectorscope.

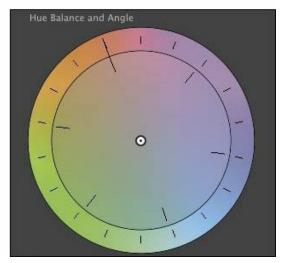


The vectorscope is helpful because it gives you objective information about the colors in your sequence. If there's a color cast, perhaps because the camera was not calibrated properly, it's often obvious in the vectorscope display. You can simply

use one of the Premiere Pro color correction effects to reduce the amount of the unwanted color or add more of the opposite color.

Some of the controls for color correction effects, such as Fast Color Corrector, have the same color wheel design as the vectorscope, making it easy to see what you need to do.





### About primary and secondary colors

Red, green, and blue are primary colors. It's common for display systems, including television screens and your computer monitor, to combine these three colors in varying relative amounts to produce all of the colors you see.

There's a beautiful symmetry to the way a standard color wheel works, and a color wheel is essentially what the vectorscope displays.

Any two primary colors will combine to produce a secondary color. Secondary colors are the opposite of the remaining primary color.

For example, red and green combine to produce yellow, which is the opposite of blue.

### Additive and subtractive color

Computer screens and televisions use additive color, which means the colors are created by generating light in different colors and combining them to produce a precise mix. You produce white by combining equal amounts of red, green, and blue.

When you draw with color on paper, it is usually white paper, reflecting a full spectrum of colors. You subtract from the white of the paper by adding pigment. The pigment prevents parts of the light from reflecting. This is called subtractive color.

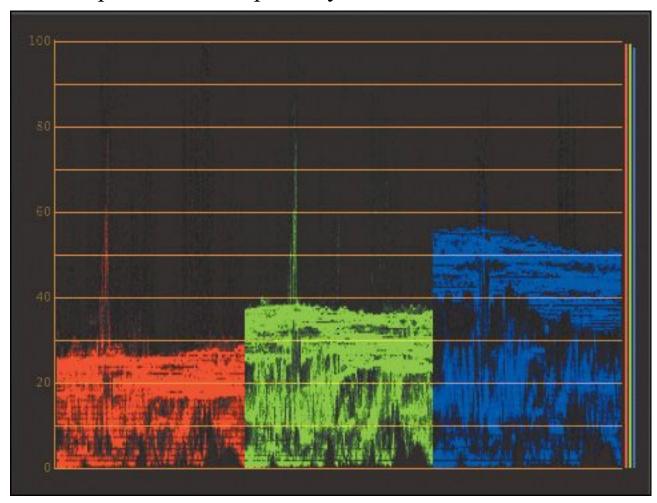
Additive color uses primary colors; subtractive color uses secondary colors. In a sense, they're flip sides of the same color theory.

## RGB parade

Use the Reference Monitor Settings menu button to switch to the RGB parade.

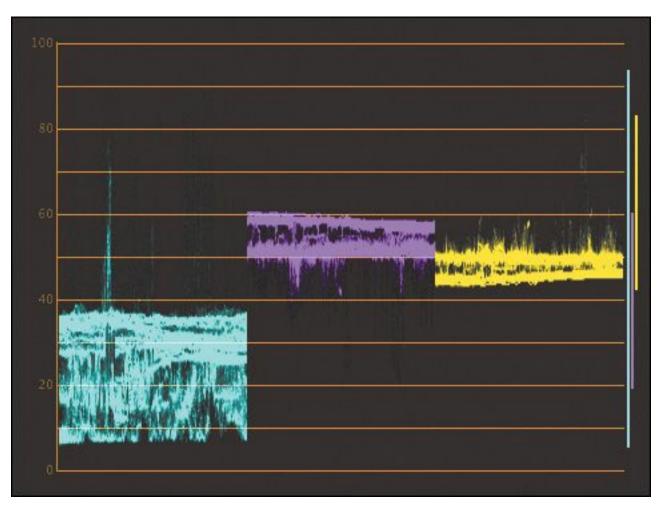
The RGB parade provides a waveform-style display, the same as the YC waveform. The difference is that the red, green, and blue levels are displayed separately. To fit all three colors in, each image is squeezed horizontally to one third of the width of the display.

You'll notice that the three parts of the RGB parade have similar patterns in them, particularly where there are white or gray pixels, because these parts will have equal amounts of red, green, and blue. The RGB parade is one of the most frequently used tools in color correction because it clearly shows the relationship between the primary color channels.



### YCbCr parade

Use the Reference Monitor Settings menu button to switch to the YCbCr parade.



Though computer monitors use a "color additive" system, using RGB to indicate color levels, most cameras actually record using a "color difference" system, often expressed as YCbCr (for digital signals):

• Y: Luminance

• Cb: Chroma-blue

• Cr: Chroma-red

The Y information forms a standalone black-and-white image, with Cb and Cr setting the hue and saturation color information for each pixel. The hue and saturation are defined as values along two lines—referred to as *vectors*—across the standard color wheel, which you'll find marked on your vectorscope. These are marked as vertical and horizontal lines across the

vectorscope display in Premiere Pro.

The vertical vector is labeled as "R-Y" (the analog version of the digital Cr), and the horizontal vector is labeled "B-Y" (the analog equivalent to Cb).

Every color available can be expressed by using these two vectors. You can see how coordinates can be generated through this sort of "longitude and latitude."

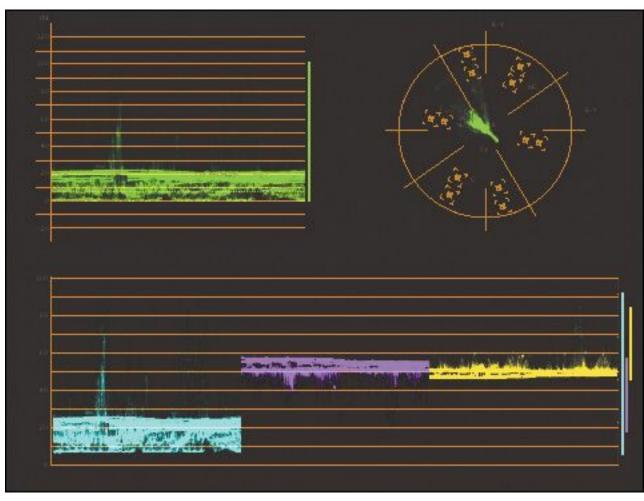
Though the challenges associated with transmitting video have changed with the advent of digital video, the color difference system persists, partly because it's an efficient way to compress, store, and transmit video signals.

The YCbCr parade displays three types of information, in much the way that the RGB parade does, by compressing three images horizontally to show them all at once. The first waveform shows the luminance (the same as the regular waveform display). The second and third waveforms represent color information a little differently: The second waveform shows the vectorscope's B-Y axis, and the third waveform shows the vectorscope's R-Y axis.

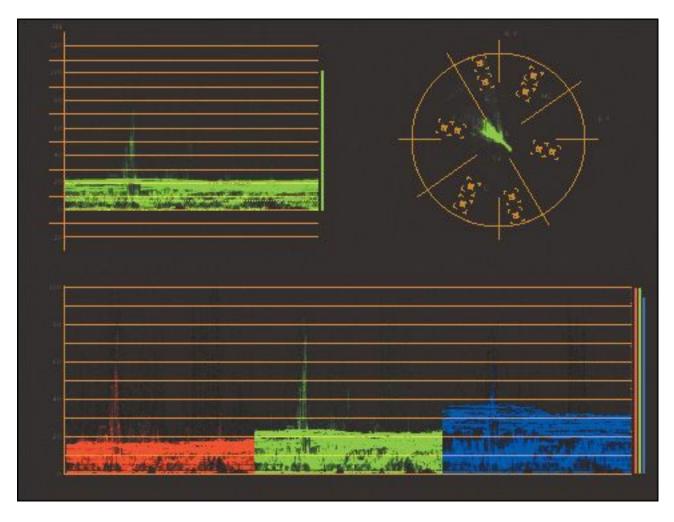
#### **Combination views**

There are also two combination views that give you several of the display modes at once. These are particularly useful if you have plenty of space on your computer screen to enlarge the Reference Monitor:

• Vect/YC Wave/YCbCr Parade: Shows a combination view of the vectorscope, YC waveform, and YCbCr parade.



• Vect/YC Wave/RGB Parade: Shows a combination view of the vectorscope, YC waveform, and RGB parade.



### An overview of color-oriented effects

You add, modify, and remove color correction effects in the same way that you manage the other effects in Premiere Pro. Just as with the other effects, you can use keyframes to modify color correction effect settings over time.

There are many ways to work with color and light in Premiere Pro. Here are a few effects you may want to try first.

## Tip 👅

You can always find an effect using the search box at the top of the Effects panel. Often, the best way to learn how to use an effect is to apply it to

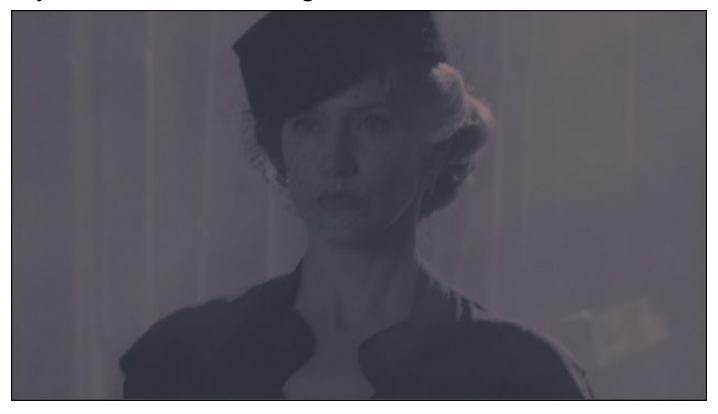
a clip with a good range of colors, highlights, and shadows and then adjust all the settings to see the result.

# **Coloring effects**

Premiere Pro features several effects for adjusting existing colors. The following two are for creating a black-and-white image and applying a tint and for simply turning a color clip into a black-and-white one.

#### **Tint**

Use the eyedroppers or color pickers to reduce any image to just two colors. Whatever you map to black-and-white replaces any other colors in the image.



### **Black-and-White**

Convert any image to simple black-and-white. This is useful when combined with other effects that can add color.



# Color removal or replacement

These effects allow you to make changes to colors selectively, rather than modifying the entire image. You'll be working with some of these effects later.

#### **Leave Color**

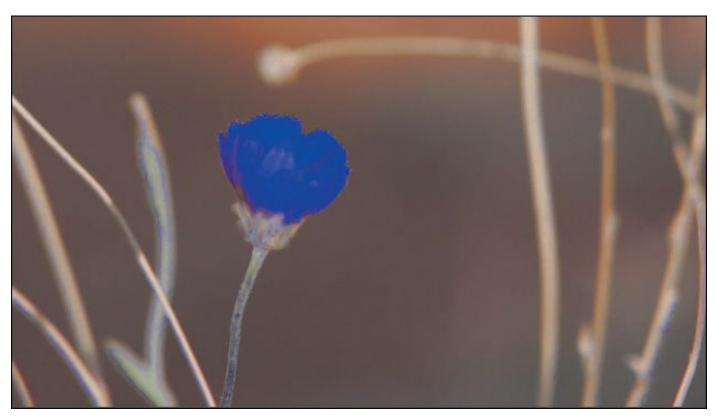
Use the eyedropper or color pickers to select a color you would like to keep. Adjust the Amount to Decolor setting to turn the saturation down on every other color.



Use the Tolerance and Edge Software controls to produce a more subtle effect.

# **Change to Color**

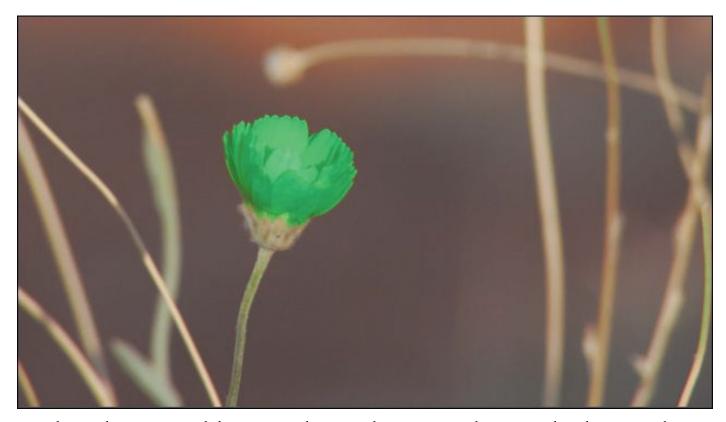
Use the eyedroppers or color pickers to select a color you want to change and the color you'd like it to become.



Use the Change menu to select the method you'd like the effect to use to apply the adjustment.

### **Change Color**

Similar to the Change to Color effect, this effect gives subtle controls to adjust one color to another.



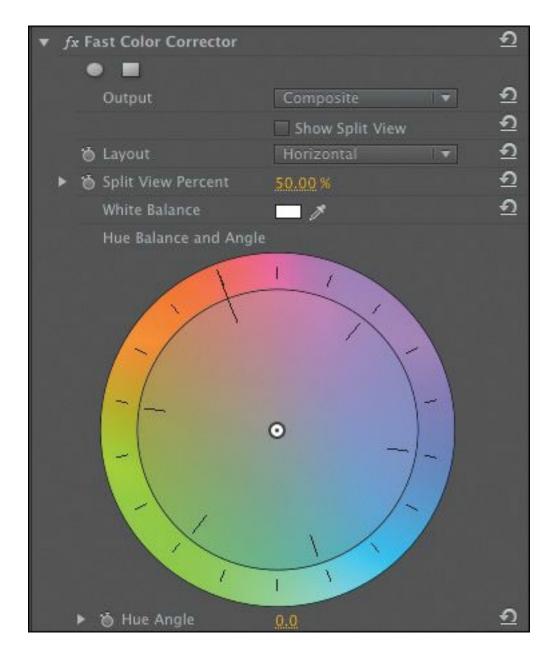
Rather than matching another color, you change the hue and finesse the selection using the Matching Tolerance and Matching Softness controls.

## **Color Correction**

These effects include a range of controls to adjust the overall look of your video or to make precise selections to adjust individual colors or color ranges.

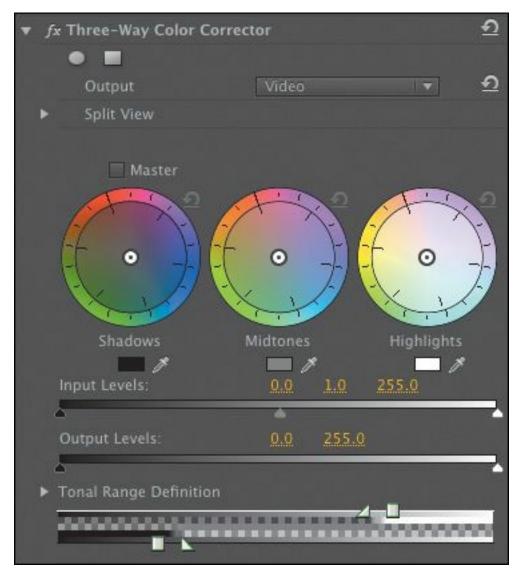
#### **Fast Color Corrector**

As the name suggests, Fast Color Corrector is a quick and easy-to-use effect for adjusting the overall color and luminance levels in your clips. You'll be using this effect to adjust the white balance for a shot later in this lesson.



### **Three-Way Color Corrector**

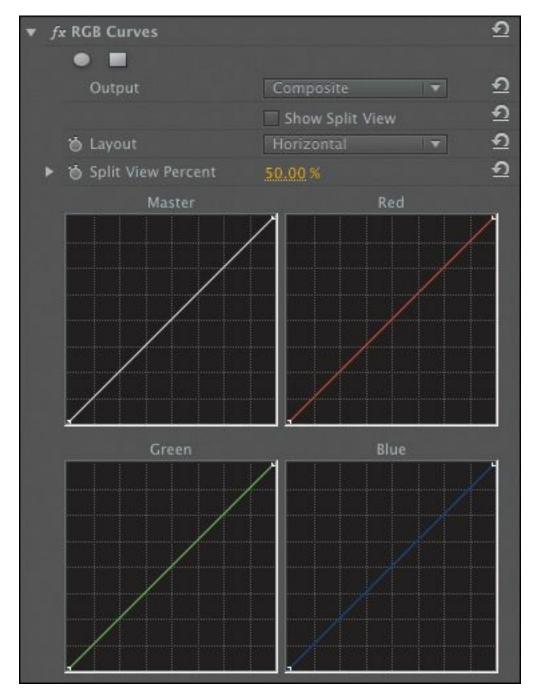
Very similar to Fast Color Corrector, this effect has separate controls for adjusting color for the shadows, midtones, and highlights of your clips. This effect also has powerful secondary color correction controls that allow you to selectively color-correct pixels that have a specific color, brightness, or amount of color saturation.



You'll use this effect to work on a clip later in this lesson.

#### **RGB Curves**

The RGB Curves effect is a graph control that gives natural-looking, subtle results. The horizontal axis of each graph represents the original clip, with shadows on the left and highlights on the right. The vertical axis represents the output from the effect, with shadows at the bottom and highlights at the top.



A straight line from the lower-left corner to the upper-right corner means no change. Drag the line to reshape it, changing the relationship between the original clip levels and the resulting output levels.

We'll be using another form of curve effect to work on exposure problems with clips later.

## Using Lumetri effects and SpeedGrade

Premiere Pro includes a number of Lumetri looks created in Adobe SpeedGrade. When you select any of the items in the Lumetri Looks effects category, a special preview panel appears to help you choose.

You apply looks in the same way as any other effect.

Lumetri Looks are effect presets, based on the Lumetri effect, which you can find in the Color Correction category.

If you apply the Lumetri effect, you are invited to browse for a .look or .lut file. These files include subtle information about color adjustments, and can be created in a number of applications—including Adobe SpeedGrade.

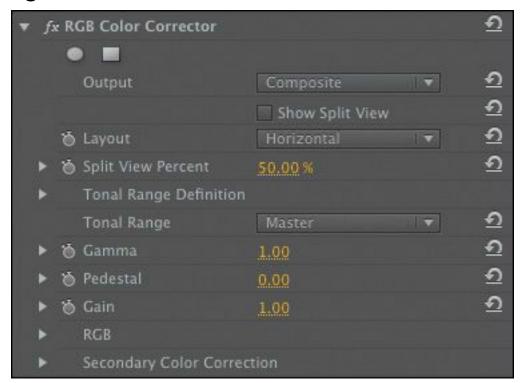
The ability to work with .look and .lut files in this way allows you to create exactly the adjustments you want using Adobe SpeedGrade and then share your vision with Premiere Pro.

Once you have applied the Lumetri effect, you can choose another .look or .lut file by clicking the Lumetri Setup button in the Effect Controls panel. You'll be working with SpeedGrade later in this lesson.

#### **RGB** Color Corrector

This color correction effect provides precise controls for adjusting an image. You can make changes to the overall image or make selective adjustments to the red, green, and blue parts

of the image.



- Gamma: Adjusts the midtones.
- **Pedestal:** Adjusts the black point. Raising the pedestal makes the shadows appear brighter, making the image seem a bit "foggy" and lacking in definition; lowering the pedestal makes the shadows darker and can be adjusted to the point of the loss of detail in the shadows altogether.
- Gain: Adjusts the highlights.

You can achieve interesting results by lowering the pedestal and increasing the gain, giving you strong shadows and bright highlights and increasing the contrast.

### **Technical color effects**

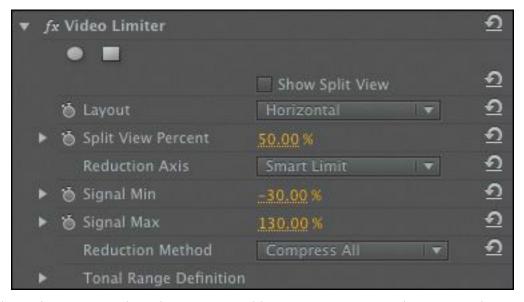
In addition to creative effects, Premiere Pro's color correction repertoire includes effects used for professional video production.

#### Video Limiter

When video is broadcast, there are specific limits that are permitted for maximum luminance, minimum luminance, and color saturation. Although it's possible to confine your video levels to the limits permitted using manual controls, it's easy to mix parts of your sequence that need adjustment.

The Video Limiter effect automatically limits the levels of clips to ensure they meet the standards you set.

You'll need to check the limits applied by your broadcaster before setting the Signal Min and Signal Max controls with this effect. Then it's simply a question of choosing the Reduction Axis option—do you want to just limit the luminance, the chrominance, or both, or set an overall "smart" limit?



The Reduction Method menu allows you to choose the parts of your video signal you would like to adjust. You'll usually choose Compress All.



While it's common to apply the Video Limiter "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

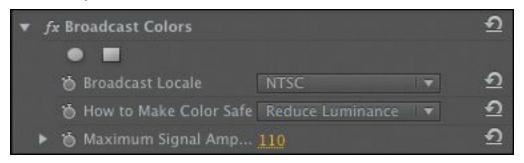
effect to individual clips, you might also choose to apply it to the whole sequence by nesting it in another sequence. For more information about nesting sequences, see <u>Lesson 8</u>, "<u>Advanced Editing Techniques</u>."

#### **Broadcast Colors**

The Broadcast Colors effect gives you a simpler interface for ensuring that your levels are legal. Once you know your accepted maximum signal, do the following:

- 1. Choose between NTSC and PAL video.
- 2. Choose whether you'd like the effect to reduce luminance or reduce saturation for pixels that go beyond the limit you set.
- **3.** Specify a maximum signal amplitude, using the IRE scale.

The Broadcast Colors effect adjusts all pixels that fall outside the maximum you set. Using the How to Make Color Safe menu, you can choose the Key Out Safe and Key Out Unsafe options to display which pixels will be affected by the effect.



# Fixing exposure problems

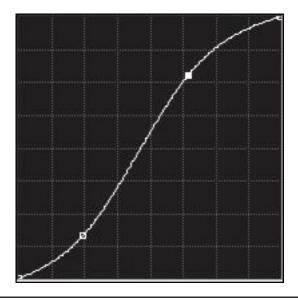
Let's look at some clips that have exposure issues and use some of the Color Correction effects to address them.

- 1. Open the sequence Lady Walking.
- 2. Set the Reference Monitor to show the YC waveform. Make sure that both the Chroma and Setup (7.5 IRE) options are deselected.

This sequence has just one clip. Position the Timeline playhead over the clip, and look at the waveform. You can see there's not much contrast in the shot.

The environment is smoky. 100 IRE means fully exposed, and 0 IRE means not exposed at all. No part of the image comes close to these levels. Your eye quickly adjusts to the image, and it'll soon appear fine. Let's see whether we can bring it to life a little.

- 3. Add the Luma Curve effect to the clip.
- 4. Click the Luma Waveform control in the Effect Controls panel to create a control point, and reshape the line to make a subtle *S* shape. Use the following example as a guide. You'll get the best perceived results if you have a frame from a later part of the clip onscreen. Around 00:00:06:20 there's a section of sharp focus.



### Tip 👅

If you increase the size of the Effect Controls panel, the Luma Waveform control will get bigger, making it easier to apply subtle adjustments.

5. Your eye is likely to adjust very quickly to the new image. Try toggling the Luma Curve effect off and on to compare the image before and after.

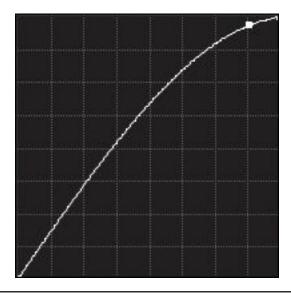
The subtle adjustment you made adds more depth to the image, giving it stronger highlights and shadows. As you toggle the effect off and on, you'll see the Waveform Monitor changing. We still don't have bright highlights in the image, but that's fine because its natural colors are mainly midtones.

## **Underexposed images**

Now you'll work with an underexposed image.

- **1.** Open the sequence Color Work.
- 2. Move the Timeline playhead to the third clip in the "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*

- sequence, 00021.mp4. When you first look at this clip, it might look OK. The highlights don't look very strong, but there's a reasonable amount of detail throughout the image, and the face, especially, is sharp and detailed.
- 3. Now take a look at the waveform. At the bottom of the waveform there are quite a few pixels close to 0.3 (this is a PAL sequence, so Luminance levels go from 0.3v to 1v). Pixels below 0.3v are effectively lost.
  - In this instance, it looks like the missing detail is in the right shoulder of the suit. The problem with such dark pixels is that increasing the brightness will simply change the strong shadows into gray, and no detail will emerge.
- 4. Add the Brightness & Contrast effect to the clip.
- 5. Use the Brightness control in the Effect Controls panel to increase the brightness. Rather than clicking the number and typing a new number, drag to the right so you can see the change happening incrementally.
  - As you drag, notice that the whole waveform moves up. This is fine for bringing out the highlights in the image, but the shadows remain a flat line. You're simply changing the black shadows to gray. If you drag the Brightness control all the way to 100, you'll see just how flat the image still is.
- **6.** Remove the Brightness & Contrast effect.
- 7. Try to make an adjustment using the Luma Curve effect or the RGB Curves effect. Here's an example of a Luma Curve effect that would improve the image.



### Tip 👅

You can remove a control point from the curve control by dragging it completely out of the graph.

Experiment with the first clip in the sequence, 00023.mp4. This clip demonstrates that there are limits to what can be fixed in post.

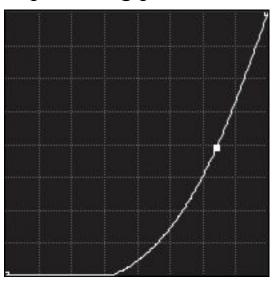
## Overexposed images

The next clip you'll work with is overexposed.

- 1. Move the Timeline playhead to the last clip in the sequence, 00019.mp4. Notice that a lot of the pixels are burned out. Just as with the flat shadows in the first clip in the sequence, there's no detail in burned-out highlights. This means that lowering the brightness will simply make the character's skin and hair gray—no detail will emerge.
- 2. Notice that the shadows in this shot don't reach 0.3v on the Waveform Monitor. The lack of properly dark

shadows has a flattening effect on the image.

3. Try using the Luma Curve effect to improve the contrast range. This approach might work, although the clip definitely ends up looking processed.



### When is color correction right?

Making adjustments to images is highly subjective. Though there are precise limits for image formats and broadcast technologies, whether an image should be light, dark, blue-tinted, or green is ultimately a subjective choice. The reference tools that Premiere Pro provides, such as the waveform display, are a helpful guide, but only you can decide when the picture looks right.

If you're producing video for display on televisions, it's vital that you have a television screen connected to your Premiere Pro editing system to view your content. Television screens display color differently than computer monitors do.

The difference is comparable to the difference between looking at colors in photos on your computer monitor and then seeing the colors as they are produced by your printer.

The same rule applies if you are producing content for digital cinema projection. The only way to know exactly how the picture will look is to view it using the destination medium.

# Fixing color balance

Your eyes adjust to compensate for changes in the color of light around you automatically. It's an extraordinary ability that allows you to see white as white, even if objectively it's orange, for example, because it's lit by tungsten light.

Cameras can automatically adjust their white balance to compensate for different lighting in the way that your eyes do. With the right calibration, white objects look white, whether you are recording indoors (under more orange tungsten light) or outdoors (in more blue daylight).

Sometimes, automatic settings are hit or miss, so professional shooters often prefer to adjust white balance manually. If the white balance is set wrong, you can end up with some interesting results. The most common reason for a color balance problem in a clip is that the camera was not calibrated properly.

# **Basic white balance (Fast Color Corrector)**

Let's look at a clip in this sequence where the color calibration

is pretty awful.

- 1. Move the Timeline playhead to the second clip in the sequence, 00020.mp4.
  - The obvious indication of the color calibration problem is the newspaper: Anything other than white or gray indicates a problem.
- 2. Apply the Fast Color Corrector effect to the clip. This effect shares many controls with another effect, Three-Way Color Corrector.
  - We'll explore the controls for this effect later in this lesson. In the meantime, let's find out why this effect is described as Fast.
- **3.** Select the White Balance eyedropper in the Effect Controls panel.



**4.** In the Program Monitor, click a part of the newspaper that should be white. Be careful to avoid the text areas.



## **Tip**

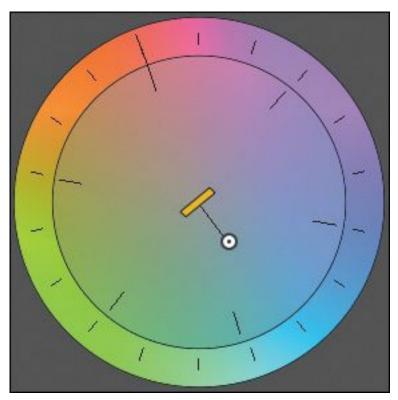
You may need to try a few times to find the perfect spot to click with the eyedropper. Try holding the Control key (Windows) or Command key (Mac OS) to get a 5x5 pixel average selection.

The White Balance control tells the Fast Color Corrector

effect what should be white. By default, the color swatch is pure white. When you select a different color with the eyedropper, the Fast Color Corrector effect adjusts all colors in the image by the difference between pure white and the color you selected.

In this example, you selected a creamy orange color—the result of the lighting on the scene. The Fast Color Corrector adjusts all colors in the scene toward blue.

You can see exactly what the effect is doing by looking at the color wheel, located just below the White Balance control. Like the vectorscope, the color wheel represents colors with increasing intensity toward the edge of the circle. Rather than measuring color, the color wheel in the Fast Color Corrector applies an adjustment. The more the small circle at the center of the wheel is moved toward the edge, the more adjustment is applied.



You can see in this example that Premiere Pro has applied an "\*\*\*\*\*ebook converter DEMO - www.ebook-

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adjustment toward cyan blue. In this way, using the White Balance eyedropper and the color wheel can help you to learn about color correction and the adjustments needed to balance whites.

## Tip 👅

The difference made with color correction can be quite subtle. Toggle the effect off and on in the Effect Controls panel to see a before-and-after comparison.

## **Primary color correction**

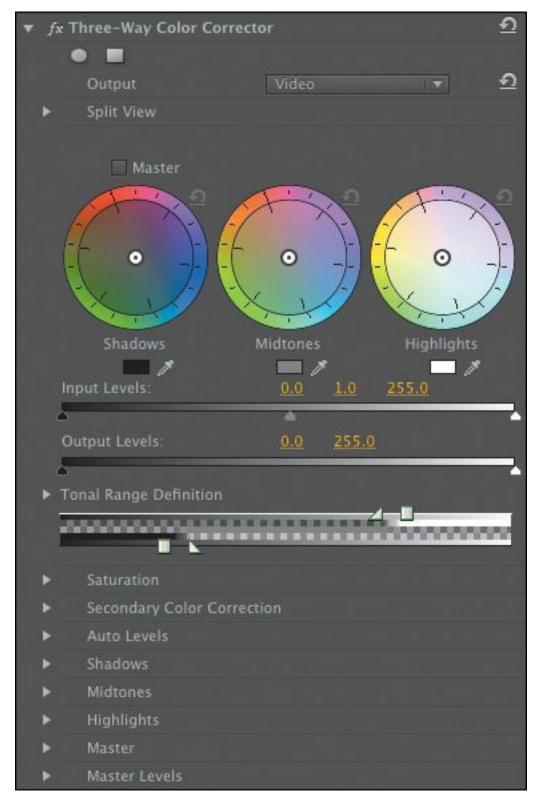
The words *primary* and *secondary* have multiple meanings. Historically, the place where "color timing" was applied was during the film transfer process at the telecine. A *primary correction* involved adjusting the relationship between the primary colors (red, green, and blue) in the printer lights. A *secondary correction* involved focusing on certain color ranges within an image, often through adding adjustments of secondary colors. So, while *primary* and *secondary* define types of colors on a color wheel, you can also use these terms to describe stages in the color correction workflow.

Broadly speaking, primary color correction still involves overall color correction adjustments to the whole image. These days, you can also employ adjustments through secondary colors and still consider it "primary," because the entire image is affected *and* it's typically most effective to make these adjustments first.

Because secondary color correction (so called because it's typically performed second) usually involves more subtle finetuning, the name has come to mean applying adjustments to selected ranges of pixels within an image.

Let's look at primary color correction first. The Three-Way Color Corrector effect works in a very similar way to the Fast Color Corrector effect, but with more advanced controls. It's a powerful color correction tool that, combined with the Reference Monitor, adjustment layers, master clip effects, and effect masks, helps you achieve professional color correction results.

Before we start working on a clip, let's run through the main controls:



- Output: Use this menu to view your clip in color or black-and-white. Viewing in black-and-white is useful for identifying contrast.
- Show Split View: Turn on Show Split View to see a

- "before and after" version of your clip, with one half changed by the effect and the other half unaffected. You can choose a horizontal or vertical layout and change the percentage of the split.
- Shadows Balance, Midtones Balance, Highlights Balance: Each color wheel allows you to make subtle adjustments to the colors in your clip. If you select the Master check box, Premiere Pro will apply the adjustments you make to all three controls at once. Note that the adjustments you make with the Master mode on are independent of adjustments you make to the individual parts of the clip: You can apply both.
- Input Levels: Use the slider controls to change the Shadows, Midtones, and Highlights levels for this clip.
- Output Levels: Use the slider controls to adjust the minimum brightness and maximum brightness for the clip. The Input Levels settings relate directly to this control, so, for example, if you set your Input Shadow level to 20 and your Output Shadow level to 0, anything in your clip that has a pixel brightness of 20 or less will be lowered to 0.

#### **About levels**

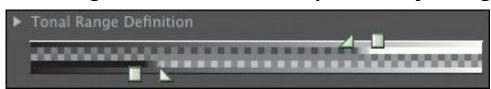
8-bit video—which describes all digital standard-definition broadcast video—is measured on a brightness scale from 0 to 255. When you adjust Input Levels or Output Levels settings, you change the relationship between the displayed levels and the original clip levels.



For example, if you set the Output white level to 255, Premiere Pro will use the maximum brightness range for the video. If you set the Input white to 200, Premiere Pro will stretch the original clip brightness so that 200 becomes 255. The result is that your highlights will get brighter and pixel values originally greater than 200 will clip, or become flat white, losing any detail.

The Input Levels have three controls: Shadows, Midtones, and Highlights. By changing these levels, you change the relationship between the original clip levels and the way those levels are displayed during playback.

• Tonal Range Definition: Use the sliders to define the range of pixels affected by the Shadows, Midtones, and Highlights color wheel controls. For example, if you drag the highlight slider left, you'll increase the number of pixels adjusted when using Highlights controls. The triangle-shaped slider allows you to define the extent of the softening between the levels you're adjusting.



Click the Tonal Range Definition disclosure triangle to get access to individual controls and to the Show Tonal "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

Range check box. If you select the check box, Premiere Pro displays your image in just three gray tones, so you can identify which parts of your picture will be affected when you make adjustments. Black pixels are shadows, gray pixels are midtones, and white pixels are highlights.

- Saturation: Use this to adjust the amount of color in the clip. You have a Master control that will adjust the overall clip, and separate controls for Shadows, Midtones, and Highlights.
- Secondary Color Correction: This advanced color correction feature allows you to define specific pixels you would like to adjust, based on their hue, saturation, or luminance range. The Show Mask option shows you which pixels you have selected to apply the color correction adjustment to. Using this feature, you could, for example, selectively adjust pixels with a particular shade of green.
- Auto Levels: Use this feature to automatically adjust the Input Levels controls. You can click the Auto buttons or use the eyedroppers. To use the eyedroppers, select one (Black, Gray, or White) and then click a correlating part of the picture. For example, select the White Level eyedropper, and then click the brightest part of the picture. Premiere Pro updates the Levels controls based on the selections you make.
- Shadows, Midtones, Highlights, Master: These controls allow you to make the same adjustments as the Shadows, Midtones, Highlights, and Master color balance controls, but with more precision. When you change one, the other

- updates automatically.
- Master Levels: These controls allow you to make the same adjustments as the Input Levels and Output Levels graphic controls, but with more precision. When you change one, the other updates automatically.

# **Balancing with the Three-Way Color Corrector**

The second clip in the Color Work sequence, 00020.mp4, has improved after applying the Fast Color Corrector, but perhaps we can do better. Taking a look in the vectorscope confirms it: There's still a red/orange tint. We could probably work with the Fast Color Corrector controls to improve the shot, but the Three-Way Color Corrector gives more options.

- 1. Remove the Fast Color Corrector effect, and apply the Three-Way Color Corrector effect instead.
- 2. In the Effect Controls panel, expand the Auto Levels controls and click the Auto Black Level, Auto Contrast, and Auto White Level buttons in turn. Notice that the Input Levels controls change to reflect the new levels.



Premiere Pro has identified the darkest pixels for the Black level and the brightest pixels for the White level and has balanced them for the Gray level.

The adjustment is tiny! Clearly, the problem is not with

the range of contrast in the shot.

3. Use the eyedropper controls for the Shadows, Midtones, and Highlights Color Balance controls to select black, gray, and white items in the shot. This will correct the color cast.



## Tip 🕟

When using the eyedropper, you might find it helpful to change the zoom setting for the Program Monitor to 100%, making it easier to click the pixels you want.

4. Take a look at the vectorscope. If it looks like the shot still has an overall color cast, switch on the Master mode for the Color Balance controls, and drag any of the wheels away from the color cast shown in the vectorscope.

Once you have applied Color Balance adjustments, you may want to experiment with the Input Levels controls to fine-tune the result.

The Three-Way Color Corrector effect gives you very precise control over your clips. If you prefer to make broader "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

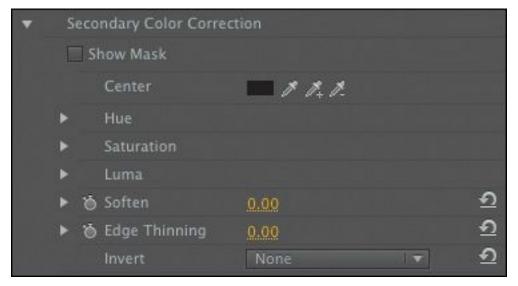
adjustments, you can always use the Fast Color Corrector.

## Secondary color correction

Secondary color correction involves applying color correction adjustments to selected pixels rather than to the whole image. The adjustments you make are the same as those you might make with the Fast Color Corrector effect or the Three-Way Color Corrector effect; the only difference is the limited selection.

### Let's try this:

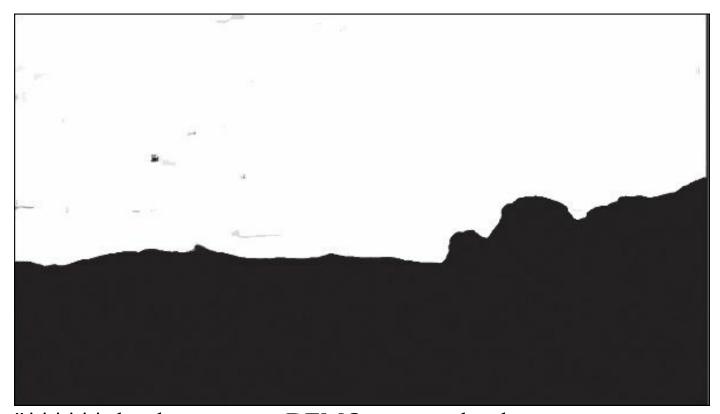
- 1. Open the sequence Yellow Flower.
- 2. Look at the second clip in the sequence, Desert 001. It's a dramatic landscape with a blue sky over red/orange rocky ground. Let's bring up the blue in the sky.
- **3.** Apply the Three-Way Color Corrector effect to the Desert 001 clip.
- 4. In the Effect Controls panel, click the disclosure triangle to display the Secondary Color Correction controls for the Three-Way Color Corrector effect.



5. Click the first of the three Center eyedroppers to select it.

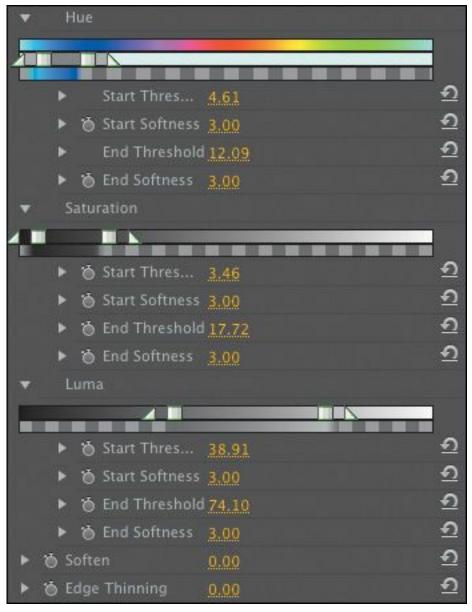


- 6. Use the eyedropper to select the blue in the sky.
- 7. Select the check box for the Show Mask option. In this view, Premiere Pro shows the pixels selected with the eyedropper in white and the unselected pixels in black. Clearly, we need a broader selection.
- **8.** Use the second Center eyedropper to select another part of the sky. This eyedropper adds to the selection; the third eyedropper removes from the selection. As soon as you select an eyedropper, the image returns to its original state for you to make your selection.
- 9. Continue using the eyedroppers to make selections until the Mask view gives a fairly clean white area, where the sky is in the picture. Don't worry if there are some gray areas.



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10. While clicking with the eyedroppers, you've been applying Hue, Saturation, and Luma selections. Expand these controls now. You can see manual controls to set these levels, including Start Softness and End Softness triangles, which blend between the selected and unselected pixels. Try adjusting these a little to smooth the edges of the mark.



- 11. When you're happy with the result, turn off the Show Mask option.
- **12.** You have now selected only the sky to be adjusted. At the "\*\*\*\*\*ebook converter DEMO www.ebook-converter.com\*\*\*\*\*\*

top of the Three-Way Color Corrector controls, turn on the Master option.

✓ Master

13. Adjust any color wheel to add more blue.



14. Play the sequence to view the result. Try turning the Three-Way Color Corrector effect off and on to compare your work to the original clip.

# Tip 👅

It's possible you will have selected some of the horizon line because some of the blue in the sky is reflected there. This is something that you can avoid by using a second copy of the clip and a Garbage Matte effect. For more information about garbage mattes, see <u>Lesson 15</u>, "<u>Exploring Compositing Techniques</u>."

# Special color effects

Several special effects give you great creative control over the colors in your clips.

Here are a few effects of note.

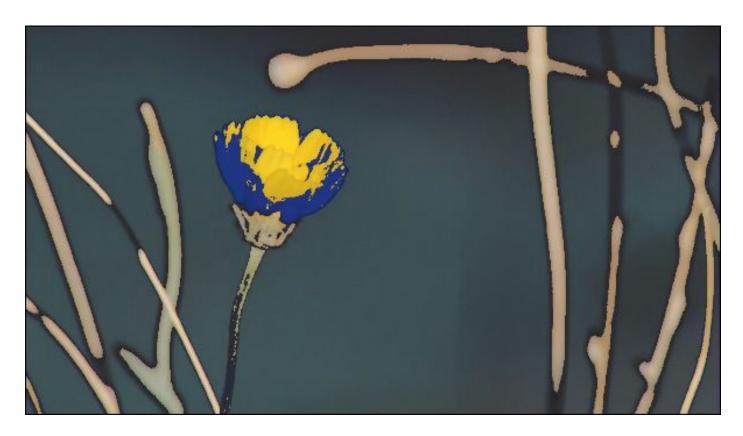
#### Gaussian Blur

While not technically a color adjustment effect, adding a tiny amount of blurring can soften the results of your adjustments, making an image look more natural. Premiere Pro has a number of blur effects. The most popular is Gaussian Blur, which has a natural-looking, smoothing effect on an image.

#### **Solarize**

The Stylize category of effects includes some dramatic options, some of which, like the Mosaic effect, you'll use for more functional applications, such as hiding someone's face.

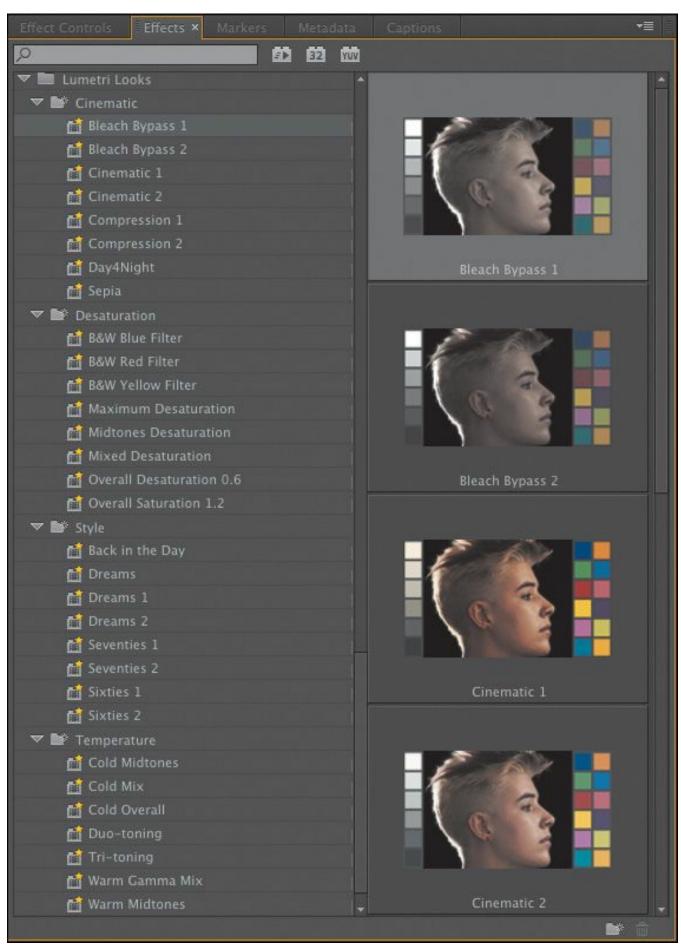
The Solarize effect gives vivid color adjustments that can be used to create stylized back plates for graphics or intro sequences.



#### **Lumetri Looks**

The Lumetri effect allows you to browse to an existing .look or .lut file to apply nuanced, subtle color adjustments to your footage. If you're just starting out with color adjustments, you may want a quicker fix.

The Lumetri Looks are a set of Lumetri effects that already have .look files associated with them. When you select a look, a Looks browser appears in the Effects panel, making it easy to select the look you want.



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When you send your Premiere Pro sequence to SpeedGrade (discussed later in this lesson), the Looks you choose are editable. Lumetri Looks are an excellent way of achieving a more filmic look with almost no work, as they already have more nuanced color adjustments than you're likely to achieve using regular color correction.

# Creating a look

Once you've spent a little time with the color correction effects available in Premiere Pro, you should have a feel for the kinds of changes you can make and the impact those changes have on the overall look and feel of your footage.

You can use effect presets to create a look for your clips. You can also apply an effect to an adjustment layer to give your sequence, or part of a sequence, an overall look.

In the most common color correction scenario, you would do the following:

- Adjust each shot so that it matches the other shots in the same scene. That way, there is color continuity.
- Next, apply an overall look to your production.

Try using an adjustment layer:

- 1. Open the Theft Unexpected sequence.
- 2. In the Project panel, click the New Item menu and choose Adjustment Layer. The settings automatically match the sequence, so click OK.
- **3.** Drag and drop the new adjustment layer onto the V2 track in the sequence.

The default duration for adjustment layers is the same as "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

the duration of still images. It's too short for this sequence.

- 4. Trim the adjustment layer until it stretches from the beginning to the end of the sequence.
- 5. Apply a Lumetri Look effect to the adjustment layer. The look will apply to every clip in the sequence.



You can apply any standard visual effect this way, and use multiple adjustment layers to apply different looks to different scenes.

#### Note

If you use adjustment layers in this way on a sequence that has graphics and titles, you may want to ensure that the adjustment layer is on a track between the graphics/titles and the video. Otherwise, you will adjust the appearance of your titles too.

# **Direct Link to Adobe SpeedGrade**

Adobe SpeedGrade is a powerful color correction application included with Adobe Creative Cloud.

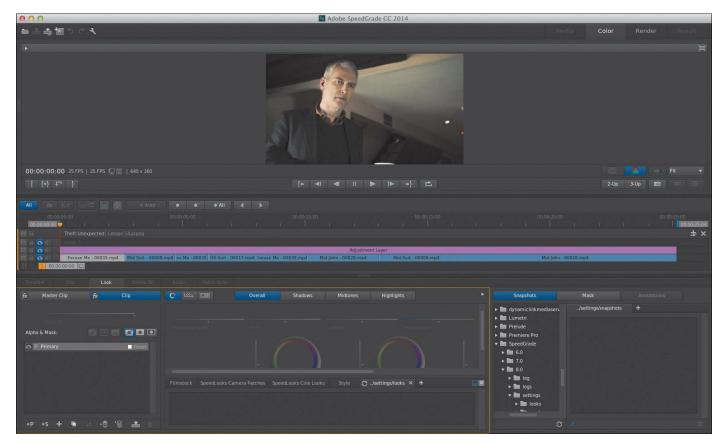
Premiere Pro has comprehensive color correction tools but is primarily an editing system. Adobe SpeedGrade is completely dedicated to the task of color correction, and it provides superior tools for the purpose.

You can easily share your Premiere Pro sequence with SpeedGrade, switching back and forth between the two applications in a moment.

Let's send the Theft Unexpected sequence to SpeedGrade.

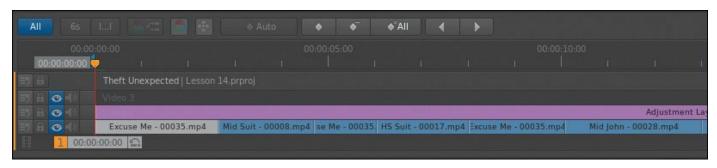
- 1. Make sure the Theft Unexpected sequence is open.
- 2. Choose File > Direct Link to Adobe SpeedGrade, and click Yes in the confirmation dialog.

Premiere Pro saves and closes the project, and hands it to SpeedGrade.



SpeedGrade is a powerful application. For more information on how to work with SpeedGrade, check out *Adobe SpeedGrade CC Classroom in a Book*. For now, we'll use pre-built looks, as we have already in Premiere Pro.

The middle of the screen shows the Timeline. This is the Theft Unexpected sequence. Notice that the first clip is highlighted, with the playhead at the beginning of the Timeline.



When you're working in SpeedGrade, the highlighted clip

is the one you are making adjustments to. As you drag the playhead through the sequence, each clip in turn will highlight.

At the bottom of the SpeedGrade interface, you'll find a series of tabs with pre-built SpeedLooks. These are similar to the Lumetri Looks in Premiere Pro.

3. Click a look to preview it, and then press the Enter (Windows) or Return (Mac OS) key to confirm it.

#### Note

Be sure to press the Enter (Windows) or Return (Mac OS) key to confirm the effect or you'll only see a preview.

- **4.** Drag the playhead through the sequence, adding different looks for each clip.
- 5. When you have finished, click the Direct Link to Adobe Premiere Pro button at the very top of the SpeedGrade interface. Click Yes in the confirmation dialog. SpeedGrade saves and closes the project, and hands it to Premiere Pro.
- 6. Click one or two clips and look in the Effect Controls panel. The changes you've made in SpeedGrade all appear as Lumetri Looks in Premiere Pro. This means you can turn them off and on, change the .look or .lut file they link to, or make an effect preset from them.

There's much more you can do with SpeedGrade, but this is all you need to know to share your work between your editing and

grading applications.

#### **Review questions**

- 1. Why is the Reference Monitor ganged to the Program Monitor?
- 2. How do you change a monitor display to show the YC waveform?
- 3. How do you turn off the display of chroma information in the YC waveform?
- **4.** Why should you use the vectorscope rather than depending on your eyes?
- 5. How can you apply a look to a sequence?
- **6.** Why might you need to limit your luminance or color levels?

#### Review answers

- 1. The Reference Monitor shows the contents of the current sequence, just as the Program Monitor does. By ganging them together, you can be sure the Reference Monitor is displaying the same content, even when you're looking at the vectorscope or waveform display.
- 2. Click the Settings menu button and choose the display type you would like.
- 3. Deselect the Chroma check box at the top of the YC waveform display.
- 4. The way we perceive color is highly subjective and relative. Depending on the colors you have just seen, you will see new colors differently. The vectorscope display

- gives you an objective reference.
- 5. You can use effect presets to apply the same color correction adjustments to multiple clips, or you can add an adjustment layer and apply the effects to that. Any clips on lower tracks covered by the adjustment layer will be affected.
- **6.** If your sequence is intended for broadcast television, you'll need to ensure you meet the stringent requirements for maximum and minimum levels. The broadcaster you're working with will be able to tell you their required levels.

# 15. Exploring Compositing Techniques

#### Lesson overview

In this lesson, you'll learn about the following:

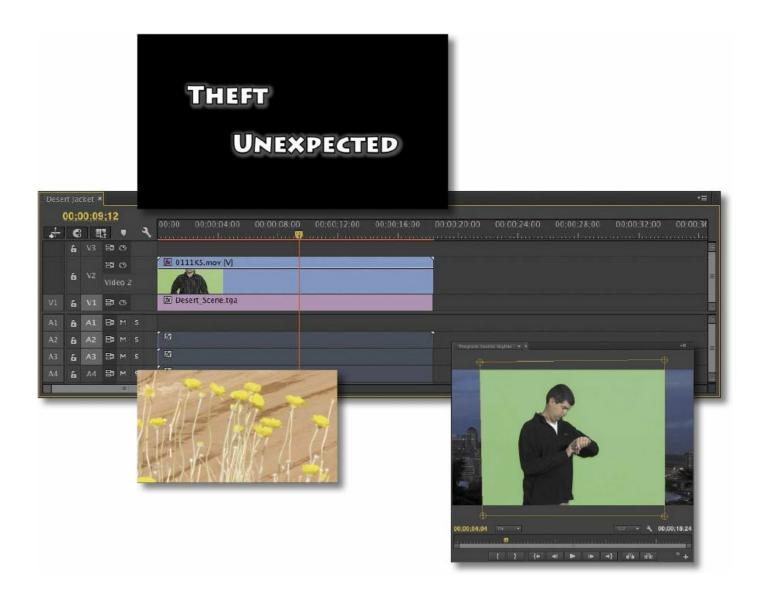
- Using the alpha channel
- Using compositing techniques
- Working with opacity
- Working with a greenscreen
- Using mattes



This lesson will take approximately 50 minutes.

Adobe Premiere Pro CC has powerful tools that enable you to combine layers of video in your sequences.

In this lesson, you'll learn about the key technologies that make compositing work and about approaches to preparing for compositing, adjusting the opacity of clips, and keying greenscreen shots with chromakey and mattes.



Compositing comprises blending, combining, layering, keying, masking, and cropping, in any number of combinations.

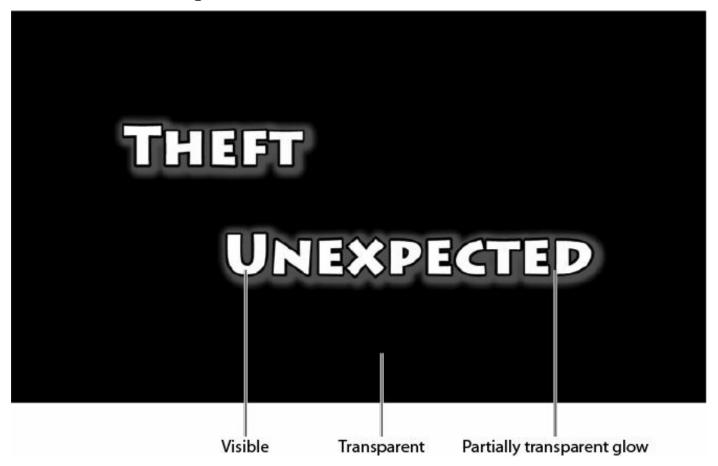
Anything that combines two images is compositing.

#### **Getting started**

Until now, you have been mainly working with single, whole-frame images. You have created edits where you have transitioned between one image and another or edited clips onto upper video tracks to have them appear in front of clips on lower video tracks.

In this lesson, you'll learn about ways to combine those layers

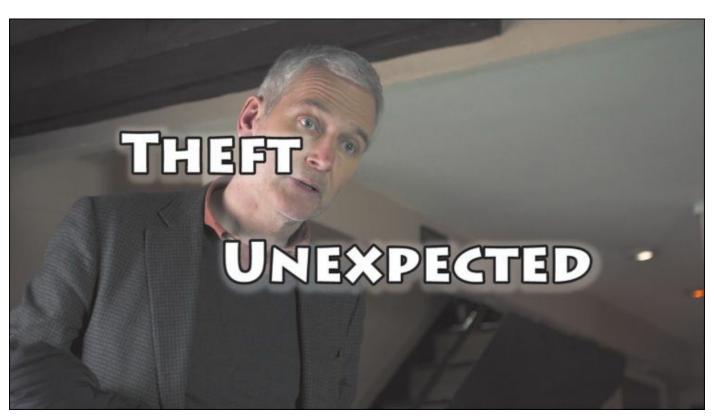
of video. You'll still use clips on upper and lower tracks, but now they will become foreground and background elements in one blended composition.



This title...



...combines with this video...



...to produce this composite image.

The blend might come from cropping part of the foreground image or from *keying*—selecting a specific color to become transparent—but whatever the method, the way you edit clips onto a sequence is the same as ever.

You'll begin by learning about the important concept of *alpha*, which explains the way pixels are displayed, and then try several techniques.

- 1. Open Lesson 15.prproj in the Lesson 15 folder.
- 2. Choose Window > Workspace > Effects.
- **3.** Choose Window > Workspace > Reset Current Workspace to open the Reset Workspace dialog.
- 4. Click Yes.

#### What is an alpha channel?

Everything begins with cameras selectively recording the red, green, and blue parts of the light spectrum as separate color channels. Because each channel is monochrome (just one of the three colors), they are commonly described as *grayscale*.

Premiere Pro uses these three grayscale channels to produce the corresponding primary color channels. They are combined using what's called Primary Additive Color to create a complete RGB image. You see the three channels combined as full-color video.

Finally, there is a fourth grayscale channel: alpha.

The fourth channel defines no colors at all. Instead, it defines *opacity*—how visible the pixel is. Several different words are used in the world of post-production to describe this fourth channel, including visibility, transparency, mixer, and opacity.

The name is not particularly important. What matters is that you can adjust the opacity of each pixel independently of its color.

Just as you might use color correction to adjust the amount of red in a clip, you can use Opacity controls to adjust the amount of alpha.

By default, the alpha channel, or opacity, of a typical camera footage clip is at 100%, or fully visible. On the 8-bit video scale of 0 to 255, this means it will be at 255. Clips that are animations or text or logo graphics will often have alpha channels that control which parts of an image are opaque or transparent.

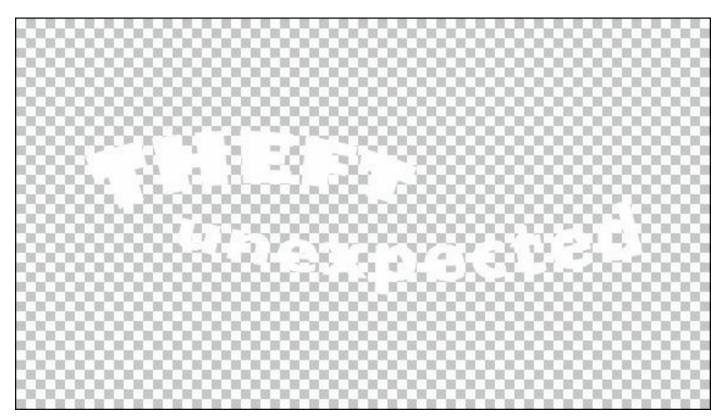
You can set the Source Monitor and Program Monitor to display transparent pixels as a checkerboard, just as in Adobe Photoshop:

**1.** Open the file Theft\_Unexpected.psd in the Source Monitor.

It looks as if the graphic has a black background, but those black pixels are displayed in place of transparency. Think of them as the background of the Source Monitor.

2. Click the Source Monitor Settings menu button and choose Transparency Grid.

Now you can clearly see which pixels are transparent. However, for some kinds of media, the transparency grid is an imperfect solution. In this case, for example, it can be it a little difficult to see the edges of the text.



3. Click the Source Monitor Settings menu button and select Transparency Grid again to deselect it.

# Making compositing part of your projects

The use of compositing effects and controls can take your post-production work to a whole new level. Compositing means creating new image compositions from existing ones. Once you begin working with the compositing effects available in Premiere Pro, you'll find yourself discovering new ways of filming and new ways of structuring your edit to make it easier to blend images together.

It's the combination of filming techniques and dedicated effects that produces the most powerful results when compositing. You can combine simple images of environments with complex, interesting patterns to produce extraordinary textured moods. Or, you can cut out parts of an image that don't fit and replace them with something else.

Compositing is one of the most creative parts of nonlinear editing with Premiere Pro.

#### Shooting videos with compositing in mind

Much of the most effective compositing work begins when you are planning your production. Right at the start, you can think about how you can help Premiere Pro identify the parts of the image you'd like to be transparent. Premiere Pro has a limited number of ways of identifying which pixels you'd like to make transparent. Consider chromakey, for example, the standard special effect used to allow weather reporters to appear in front of a map.

The weather reporter is actually standing in front of a green screen. Special-effects technology uses the green color to identify which pixels should be transparent. The video image of the weather reporter is used as the foreground of a composition, with some visible pixels (the reporter) and some transparent pixels (the green background).

Next, it's just a question of putting the foreground video image in front of another background image. In a weather report, it's a map, but it could just as easily be any other image.

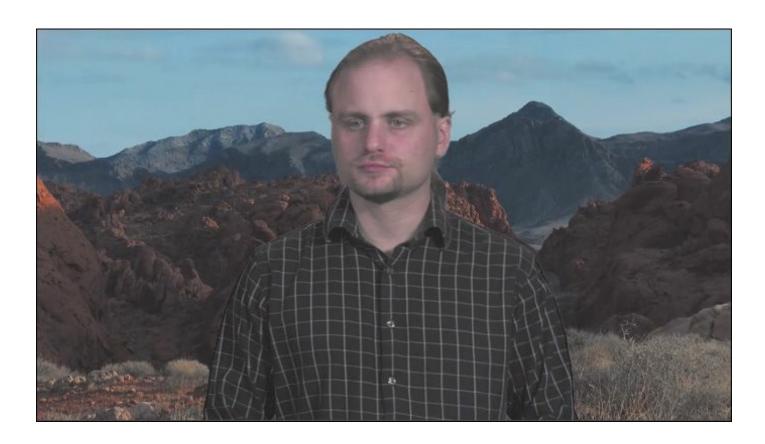
Planning ahead can make a big difference to the quality of your compositing. For that greenscreen to work well, it needs to be a consistent color. It also needs to be a color that does not appear anywhere on your subject. Green-colored jewelry, for example, might turn transparent when the key effect is applied.



This...



...combined with this...



...becomes this.

If you're shooting greenscreen footage, the way you film can make a big difference to the finished result. Be sure to capture the background with soft light and try to avoid *spill*, where light reflected from the greenscreen bounces onto your subject. If this happens, you'll be in danger of *keying out*, or making transparent, parts of your subject.

#### **Essential terminology**

In this lesson you'll encounter some terms that might be new to you. Let's run through the important ones:

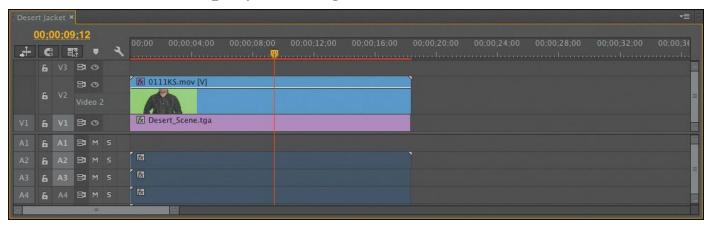
• Alpha/alpha channel: The fourth channel of information for each pixel. An alpha channel defines transparency for a pixel. It's a separate grayscale channel, and it can be created entirely independently of the content of the image.

- **Key/keying:** The process of selectively making pixels transparent based on their color or brightness. The Chromakey effect uses color to generate transparency (that is, to change the alpha channel), and the LumaKey effect uses brightness.
- Opacity: The word used to describe the overall alpha channel value for clips in a sequence in Premiere Pro. You can adjust the opacity for a clip over time using keyframes.
- Blend mode: A technology originally seen in Adobe Photoshop. Rather than simply placing foreground images in front of background images, you can select one of several different blend modes that cause the foreground to interact with the background. You might, for example, choose to view only pixels that are brighter than the background or to apply only the color information from the foreground clip to the background. Experimentation is often the best way to learn about blend modes.
- **Greenscreen:** The common term that describes the overall process of filming a subject in front of a green screen and then using a special effect to selectively turn green pixels transparent by creating an alpha matte based on the color background. The clip is then composited over a background image. A weather report is a good example of greenscreen.
- Matte: An image, shape, or video clip used to identify a region of your image that should be transparent or semitransparent. Premiere Pro allows multiple types of mattes, and you'll work with them in this lesson.

#### Working with the Opacity effect

You can adjust the overall opacity of a clip using keyframes on the Timeline or in the Effect Controls panel.

- 1. Open the sequence Desert Jacket. This sequence has a foreground image of a man in a jacket, with a background image of a desert.
- 2. Increase the height of the Video 2 track a little, and enable the display of video keyframes by clicking the Timeline Display Settings menu.



3. You can use the clip rubber band to adjust the settings and keyframe any effect you apply to a clip. Since the fixed effects include Opacity, this option is automatically available. In fact, it's the default option, which means that the rubber band already represents clip opacity. Try dragging the rubber band up and down using the Selection tool on the clip on Video 2.

When you use the Selection tool in this way, the rubber band is moved without additional keyframes being added.



In this example, the foreground is set to 50% opacity.



When adjusting the rubber band, you can hold Control (Windows) or Command (Mac OS) for fine control.

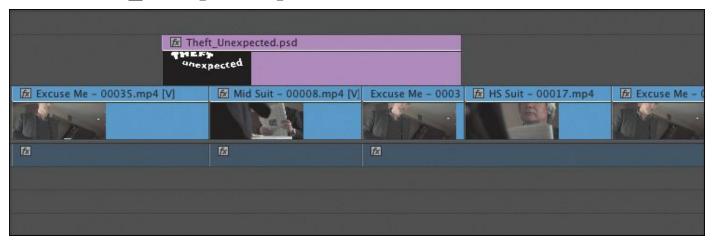
# **Keyframing opacity**

Keyframing opacity on the Timeline is almost exactly the same as keyframing volume. You use the same tools and keyboard shortcuts, and the results are likely to be exactly what you expect: The higher the rubber band, the more visible a clip will be.

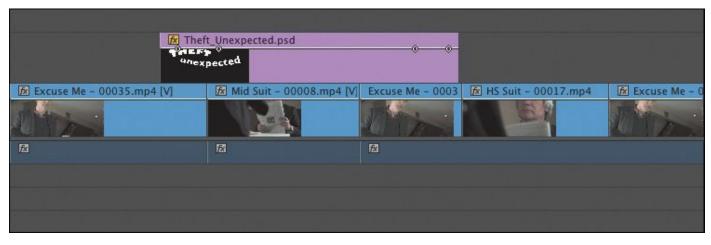
1. Open the Theft Unexpected sequence.

This sequence has a title in the foreground, on track Video 2. It's common to fade titles up and down at different times and with different durations. You can do so using a transition effect, just as you would add a transition to a video clip; or, for more control, you can use keyframes to adjust the opacity.

2. Make sure track Video 2 is expanded so you can see the rubber band for the foreground title, Theft\_Unexpected.psd.



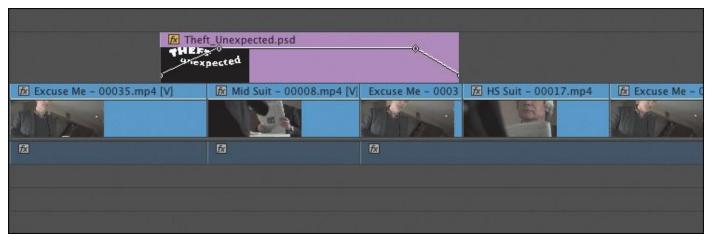
3. Control-click (Windows) or Command-click (Mac OS) the rubber band for the title graphic to add four keyframes —two near the beginning and two near the end.





It's often easier to add the keyframe markers to the rubber band first and then drag them to adjust them.

4. Adjust the keyframes so they represent a fade-up and a fade-down in the same way that you would adjust audio keyframes to adjust volume. Play the sequence, and watch the results of your keyframing.



#### Tip

Once you've added a keyframe with the Control (Windows) or Command (Mac OS) key, you can release the key and start dragging with the mouse to set the keyframe position.

You can also use the Effect Controls panel to add keyframes to the opacity for a clip. Like the audio volume keyframes controls, the Opacity setting has keyframing turned on by default in the Effect Controls panel. For this reason, if you would like to make a flat level adjustment to the overall opacity of a clip, it's sometimes quicker to do it on the Timeline rather

than in the Effect Controls panel.

#### Combine layers based on a blend mode

Blend modes are special ways for foreground pixels to combine with background pixels. Each blend mode applies a different calculation to combine the foreground *RGBA* values (red, green, blue, and alpha) with those of the background. Each pixel is calculated in combination with the pixel directly behind it.

The default blend mode is called Normal. In this mode, the foreground image has a uniform alpha channel value across the entire image. The more opacity the foreground image has, the more strongly you will see those pixels in front of the pixels in the background.

The best way to find out how blend modes work is to try them.

1. Replace the current title in the Theft Unexpected sequence with the more complex title Theft\_Unexpected\_Layered.psd, in the Graphics bin.



You can replace the existing title by dragging and dropping the new item onto it while holding the Alt (Windows) or Option (Mac OS) key. Replacing a clip this way retains the Timeline clip's keyframes.

- 2. Select the new title on the Timeline, and take a look at the Effect Controls panel.
- 3. In the Effect Controls panel, expand the Opacity controls and browse through the Blend Mode option.



4. Right now, the blend mode is set to Normal. Try a few different ones to see the results. Each blend mode calculates the relationship between the foreground layer pixels and the background pixels differently. See

Premiere Pro Help for a description of the blend modes.



In this example, the graphic has the Lighten blend mode. Only the pixels in the foreground that are lighter than the pixels in the background are visible.

Premiere Pro gives you the option to create composite images using linear color, which may give more natural-looking results. Compare for yourself by selecting Sequence > Sequence settings and selecting Composite in Linear Color.

# Working with alpha-channel transparencies

Many types of media will already have varying alpha channel levels for pixels. A title is an obvious example: Where text exists, pixels have 100% opacity, and where there is no text, pixels usually have 0% opacity. Elements such as drop shadows behind text typically have a value somewhere in between.

Keeping some transparency in a drop shadow helps it look a bit more realistic.

Premiere Pro sees pixels with higher values in the alpha channel as being more visible. This is the most common way to interpret alpha channels, but occasionally you might come across media that is configured in the opposite way. You will immediately recognize the problem because you'll see a cut-out in an otherwise black image. This is easy to address because, just as Premiere Pro can interpret the audio channels on a clip, it's also possible to choose a different interpretation of an alpha channel.

You can see the results using a title in the Theft Unexpected sequence.

- 1. Import the file Theft\_Unexpected\_Layered\_No\_BG.psd from the Lessons/Assets/Graphics folder. In the Import Layered File dialog, choose Merge All Layers in the Import As menu.
- 2. This is the same title with the background removed. Replace the current title in the Theft Unexpected sequence with Theft Unexpected Layered No BG.psd.
- 3. Locate Theft\_Unexpected\_Layered\_No\_BG.psd in your project. Right-click the clip, and choose Modify > Interpret Footage. At the bottom of the Modify Clip dialog, you'll find the Alpha Channel interpretation options.

Alpha Channel		
Ignore Alpha Channel Invert Alpha Channel		

**4.** Try each of the options, and observe the results in the Program Monitor. You will need to click OK before the display will update.

The options are as follows:

- **Ignore Alpha Channel:** Treats all pixels as having 100% alpha. This can be useful if you don't intend to use a background layer in your sequence.
- Invert Alpha Channel: Reverses the alpha channel for every pixel in the clip. This means that pixels that were fully opaque will become fully transparent, and pixels that were transparent will become opaque.



It's easy to spot when there's an issue with the alpha channel.

# Color keying a greenscreen shot

When you change the opacity level of a clip using the rubber

band or the Effect Controls panel, you adjust the alpha for every pixel in the image by the same amount. There are also ways to selectively adjust the alpha for pixels, based on their position on the screen, their brightness, or their color.

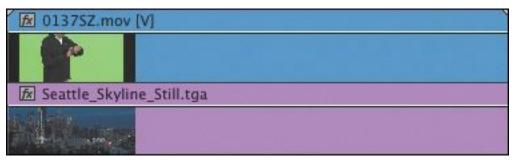
Chromakey effects adjust the opacity for a range of pixels based on their specific luminance, hue, and saturation values. The principle is quite simple: You select a color or range of colors, and the more similar a pixel is to the selection, the more transparent it becomes. The more closely a pixel matches the selection, the more its alpha channel value is lowered, until it becomes fully transparent.

Let's make a chromakey composition.

- 1. Drag the clip 0137SZ.mov, in the Greenscreen bin, onto the New Item button menu in the Project panel. This creates a sequence that matches the media perfectly, with the clip on Video 1.
- 2. In the sequence, drag the 0137SZ.mov clip up to Video 2—this will be our foreground.



- 3. Drag the clip Seattle\_Skyline\_Still.tga directly from the Shots bin to track Video 1, under the 0137SZ.mov clip. Because this is a single-frame graphic, its default duration is too short.
- **4.** Trim the Seattle\_Skyline\_Still.tga clip so that it's long enough to be a background for the full duration of the foreground clip on Video 2.
- 5. In the Project panel, your sequence is still called after 0137SZ.mov and is stored in the same Greenscreen bin. Rename the sequence **Seattle Skyline**, and move it into the Sequences bin.



You now have foreground and background clips. All that remains is to make the green pixels transparent.

#### **Preprocessing the footage**

In a perfect world, every greenscreen clip you work with would have a flawless green background and nice, clean edges on your foreground elements. In reality, there are lots of reasons why you might be faced with less-than-perfect material.

Of course, there are always potential problems caused by poor lighting when the video is created. However, there's a further problem caused by the way many video cameras store image information.

Because your eyes do not register color as accurately as they do brightness information, it's common for cameras to reduce the amount of color information stored.

Camera systems achieve reductions in file size using this system of reduced color capture, and the approach varies from system to system. Sometimes color information is stored for every other pixel; other times it might be recorded for every other pixel on every second line. Whatever the system, it's going to make keying more difficult because there simply isn't as much color detail as you'd like.

If you find that your footage is not keying well, try the following:

• Consider applying a light blur effect before keying. This blends pixel detail, softening the edges and often giving a smoother-looking result. If the amount of blur is very light, it should not dramatically reduce the quality of your image. You can simply apply a blur effect to the clip,

- adjust the settings, and then apply a chromakey effect on top. The chromakey effect will work on the clip as it appears after being blurred.
- Consider color correcting your shot before you key it. If your shot lacks good contrast between your foreground and background, you can sometimes help the key by adjusting the picture first with an effect like the Three-Way Color Corrector or the Fast Color Corrector.

# Using the Ultra Key effect

Premiere Pro has a powerful, fast, and intuitive chromakey effect called Ultra Key. The workflow is simple: Choose a color you would like to become transparent, and then adjust settings to suit. The Ultra Key effect, like every greenscreen keyer, dynamically generates a matte (defining which pixels should be transparent), based on the color selection. The matte is adjustable using the detailed settings of the Ultra Key effect.

1. Apply the Ultra Key effect to the 0137SZ.mov clip in the new Seattle Skyline sequence. You can find the effect easily by typing Ultra in the Effects panel search box.



2. In the Effect Controls panel, select the Key Color "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

eyedropper. Use the eyedropper to click a green area in the Program Monitor. This clip has a consistent green background, so it is not too important where you click. With other footage, you may need to experiment to find the right spot.



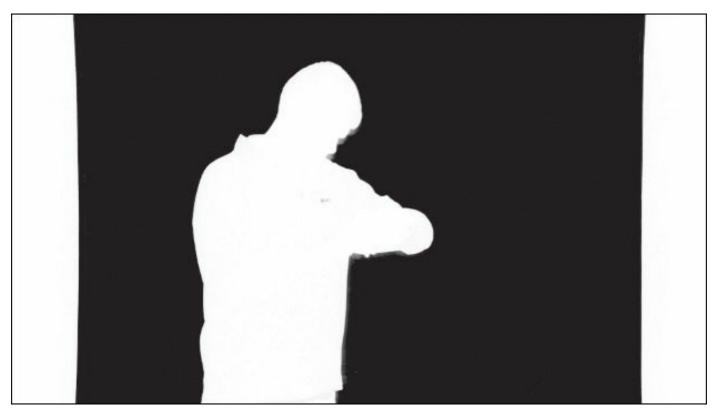
#### Tip 👅

If you hold the Control key (Windows) or Command key (Mac OS) when you click with the eyedropper, Premiere Pro takes a 5x5 pixel sample average, rather than a single-pixel selection. This often captures a better color for keying.

The Ultra Key effect identifies all pixels that have the green you selected and sets their alpha to 0%.



3. In the Effect Controls panel, change the Output setting for the Ultra Key effect to Alpha Channel. In this mode, the Ultra Key effect displays the alpha channel as a grayscale image, where dark pixels will be transparent and light pixels will be opaque.



It's a pretty good key, but there are a few areas of gray, where the pixels will be partially transparent—which we don't want. The right and left sides don't have any green, so none of those pixels can be keyed. We'll fix that later.

- 4. In the Effect Controls panel, change the Setting menu for the Ultra Key effect to Aggressive. This cleans up the selection a little. Scrub through the shot to see whether it has clean black areas and white areas. If you see gray pixels in this view where there should not be, the result will be partially transparent parts in the picture.
- **5.** Switch the Output setting back to Composite to see the result.



The Aggressive mode works better for this clip. The Default, Relaxed, and Aggressive modes modify the Matte Generation, Matte Cleanup, and Spill Suppression settings. You can also modify manually to get a better key with more challenging footage.

Here's an overview of the settings:

- Matte Generation: Once you've chosen your key color, the Matte Generation controls adjust the way it's interpreted. You'll often get positive results with more challenging footage just by adjusting these settings.
- Matte Cleanup: Once your matte is defined, you can use these controls to adjust it. Choke shrinks the matte, which is helpful if your key selection misses some edges. Be careful not to choke the matte too much because you'll begin to lose edge detail in the foreground image, often supplying a "digital haircut" in the vernacular of the

visual-effects industry. The Soften setting applies a blur to the matte, which often improves the apparent "blending" of the foreground and background image for a more convincing composite. Contrast increases the contrast of the alpha channel, making that black-and-white image a stronger black and white and more clearly defining the key. You will often get cleaner keys by increasing the contrast.

• Spill Suppression: Spill suppression compensates for color that bounces from the green background onto the subject. When this happens, the combination of the green background and the subject's own colors are usually different enough that it does not cause parts of the subject to be keyed transparent. However, it does not look good when the edges of your subject are green. Spill suppression automatically compensates by adding color to the foreground element edges that are positioned opposite, on a color wheel, to the key color. For example, magenta is added when greenscreen keying, or yellow is added when bluescreen keying. This neutralizes the color "spill" in the same way that you'd fix a color cast.

For more information about each of these controls, see Premiere Pro Help.

The built-in Color Correction controls give you a quick and easy way to adjust the appearance of your foreground video, to help it blend in with your background.



Often, these three controls are enough to make a more natural match. Note that these adjustments are applied after the key, so you won't cause problems for your key by adjusting the colors with these controls.

## Note

In this example, we're using footage with a green background. It is also possible you'll have footage with a blue background for keying. The workflow is exactly the same.

# Using mattes

The Ultra Key effect generates a matte dynamically, based on the colors in your shot. You can also create your own custom matte or use another clip as the basis for a matte.

When you create your own matte, you're defining a shape that will act as a cut-out for your video. Create a matte to remove the edges from the 0137SZ.mov clip:

- 1. Return to the Seattle Skyline sequence.

  The foreground clip has an actor standing in front of a greenscreen, but the screen does not reach the edge of the picture.
- 2. Disable the Ultra Key effect, without removing it, by clicking the Toggle Effect button (Faultra Key) in the Effect

Controls panel. This allows us to clearly see the green areas of the picture again.



Apply the Four-Point Garbage Matte effect to the 0137SZ.mov clip. A *garbage matte* is a completely user-definable area that you want to define as visible or transparent.



3. Select the Four-Point Garbage Matte effect in the Effect Controls panel. You need to click the name of the effect on the list of effects to select it. Notice the transform icon ( ) next to the effect name, which indicates that you can

work on the effect in the Program Monitor.

When you select the effect, Premiere Pro displays special handles in the Program Monitor. You may need to set the zoom level smaller in the Program Monitor to easily adjust the corner handles.

4. Drag the garbage matte handles so the selection excludes the black curtain. You may need to change the display size in the Program Monitor to easily manipulate the handles.



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Immediately, you can see the background layer of this sequence. The Four-Point Garbage Matte effect is already defining some pixels that should be transparent.

5. Toggle the Ultra Key effect back on in the Effect Controls panel, and deselect the clip to remove the visible garbage matte handles.



#### Note

The matte in the example extends beyond the edge of the image. This is fine—the main goal is to choose what you will exclude. In this case, the curtain is successfully excluded.

The result is a clean key. The Four-Point Garbage Matte effect works because this is a relatively simple image to fix. There are also eight-point and sixteen-point versions of the Garbage

Matte effect for more complex shots; plus, the positions of all the points can be keyframed to follow the action.

## Using mattes that use graphics or other clips

The Garbage Matte effect creates user-defined regions that should be visible or transparent. Premiere Pro can also use another clip as a reference for a matte.

Using the Track Matte Key effect, Premiere Pro uses the luminance information or alpha channel information from one clip to define a transparency matte for another clip. With a little planning and preparation, this simple effect can produce powerful results.

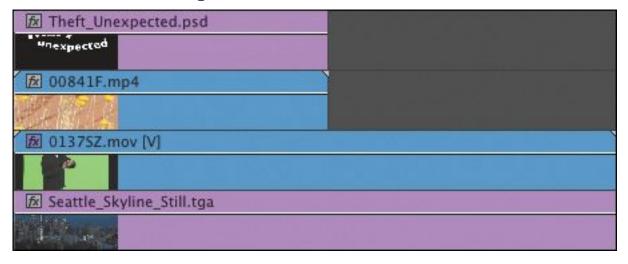
## **Using the Track Matte Key effect**

Let's use the Track Matte Key effect to add a layered title to the Seattle Skyline sequence.

1. Edit just the video (not the audio) of the clip 00841F.mov, from the Shots bin, onto the Video 3 track. It's a shot of some flowers in a desert, which we'll use as the texture for our title. Position the clip at the beginning of the sequence.



2. Drag the clip Theft\_Unexpected.psd from the Graphics bin onto the Timeline Video 4 track, directly above the 00841F.mov clip.



#### Note

There's no Video 4 track at the moment, but that doesn't matter. You can drag the clip from the Project panel onto the black space in the Timeline

above the Video 3 track and Premiere Pro will automatically create a new Video track for the clip.

**3.** Trim the Theft\_Unexpected.psd graphic clip to match the duration of the 00841F.mov flowers clip.



- **4.** Apply the Track Matte Key effect to the 00841F.mov flowers clip on the Video 3 track.
- **5.** In the Effect Controls panel, set the Track Matte Key Matte menu to Video 4.
- 6. Set the Composite Using menu to Matte Luma.



Scrub through the sequence to see the result. The top clip is no longer visible. It's being used as a guide to define the visible and transparent regions of the clip on Video 3.

The Track Matte Key effect is an unusual effect because most other effects exclusively change the clip they are applied to. The Track Matte Key effect changes both the clip it's applied to and the clip used as a reference.

# Using a video clip as a track matte key

The Track Matte Key effect can use any other clip to define which pixels should be visible or transparent. In fact, if you have made changes to a clip using effects, including the Ultra Key effect, the Track Matte Key effect can use the results as a key.

1. Open the Desert Jacket sequence.

This sequence has a foreground clip with greenscreen that

- has been keyed using the Ultra Key effect. The background is a still image of a desert.
- **2.** Move the 0111KS.mov greenscreen clip up to the Video 3 track.
- **3.** Edit the Seattle\_Skyline\_Still.tga clip, in the Shots bin, onto the Video 2 track.
  - Because the Seattle\_Skyline\_Still.tga clip is above the Desert\_Scene.tga background clip, it appears as the new background, with the greenscreen clip in the foreground.
- **4.** Apply the Track Matte Key effect to the Seattle\_Skyline\_Still.tga clip.
- 5. In the Effect Controls panel, set the matte to Video 3.

## Tip 👅

You'll notice that the matte can only be on a video track above, never below, the clip you apply the Track Matte Key effect to.

Because the greenscreen clip has alpha, defined by the Ultra Key effect, the default Track Matte Key effect option to composite using matte alpha works perfectly.



Though your foreground and background images are both still frames, the greenscreen matte clip creates movement in an otherwise static composition.

## **Using the After Effects Roto Brush tool**

Premiere Pro has up to 16-point garbage mattes to manually mask image regions in clips. This is useful but not as powerful as Adobe After Effects, which can apply precisely positioned, keyframed, Bezier-curved, multipoint mattes. The process of very precisely selecting a foreground asset with a mask is called rotoscoping.

Adobe After Effects has a special Roto Brush tool that dramatically reduces the amount of work required to rotoscope a foreground image.

To send a clip to After Effects and use the Roto

## Brush tool, follow these steps:

- 1. Right-click the clip you would like to send to After Effects, and choose Replace With After Effects Composition. Premiere Pro passes the clip to After Effects, where an After Effects composition is automatically created.
- 2. You will need to give the new After Effects project a name and location. Consider saving the project in a subfolder with your Premiere Pro project, to make relocating it easier in the future. If you already have an After Effects project open, this will be used instead.
- 3. The clip is automatically added to a new composition in After Effects. Double-click the clip inside the Timeline to open it, ready for editing.
- 4. Like Premiere Pro, After Effects has a series of tools for different tasks. In the case of After Effects, they are positioned at the top of the screen by default. Select the Roto Brush tool.
- 5. Using the Roto Brush tool, draw over the foreground subject. There's no need to carefully draw close to the edges. The Roto Brush tool will automatically seek and snap to the edges of your subject.
- 6. Click repeatedly with the Roto Brush tool to add to your selection. Alt-click (Windows) or Option-click (Mac OS) to remove image areas from your selection.

- 7. Just below the time ruler in the layer panel, there's a range selection for the Roto Brush tool, shown as lighter gray. Drag the end of the range as if you were trimming to select the total duration you would like the Roto Brush tool to work on.
- 8. Press the spacebar. The Roto Brush tool will track the edges you selected, creating a mask that sets the pixels outside of the selection as transparent and the pixels inside the selection as visible.
  - If the Roto Brush tool loses the edge of the selection, press the spacebar to stop the analysis, use the Roto Brush tool to adjust the selection, and press the spacebar again to continue.
- 9. When the Roto Brush tool has finished analyzing the clip, you can save the After Effects project and return to Premiere Pro. The clip will now have transparent pixels outside of the selected area, and you can use it as a foreground element in a composition.

The Roto Brush tool has effect controls, and you can access them in the Adobe After Effects Effect Controls panel that appears automatically when you use it.

Be sure to save the After Effects project when you have finished, because Premiere Pro will need it to

display the results of your mask.

After Effects includes an addition to the Roto Brush tool: the Refine Edge tool. Having created a mask with the Roto Brush tool, draw over the edge of the mask on difficult areas of the image for a particularly finely calculated result.

# **Review questions**

- 1. What is the difference between the RGB channels and the alpha channel?
- 2. How do you apply a blend mode to a clip?
- 3. How do you keyframe clip opacity?
- 4. How do you change the way a media file's alpha channel is interpreted?
- 5. What does it mean to "key" a clip?
- **6.** Are there any limits to the kinds of clips you can use as a reference for the Track Matte Key effect?

#### **Review answers**

- 1. All of the channels use the same scale. The difference is that the RGB channels describe color information, whereas the alpha channel describes opacity.
- 2. Blend modes are under the Opacity category in the Effect Controls panel.
- 3. You adjust clip opacity in the same way that you would adjust clip volume, on the Timeline or in the Effect Controls panel. To make an adjustment on the Timeline,

- make sure you're viewing the rubber band for the clip you want to adjust, and then drag with the Selection tool. You can also use the Pen tool to make subtle adjustments.
- 4. Right-click the file, and choose Modify > Interpret Footage. The Alpha Channel options are at the bottom of the panel.
- 5. A key is usually a special effect where the color or brightness of pixels is used to define which part of the image should be transparent and which part should be visible.
- **6.** No, you can use just about anything to create your key with the Track Matte Key effect. In fact, you can even apply special effects to the reference clip, and the results of those effects will be reflected in the matte.

# 16. Creating Titles

#### Lesson overview

In this lesson, you'll learn about the following:

- Using the Titler
- Working with video typography
- Creating titles
- Stylizing text
- Working with shapes and logos
- Making text roll and crawl
- Working with templates



This lesson will take approximately 90 minutes.

While you will rely upon audio and video sources as the primary ingredients for building a sequence, you will often need to incorporate text into your project. The Adobe Premiere Pro CC Titler is a powerful toolset for text and shape creation.



You can use the Titler in Adobe Premiere Pro to create text and shapes. These objects can be placed above video or used as stand-alone clips to convey information to an audience.

## **Getting started**

Text is very effective when you need to convey information quickly to your audience. For example, you can identify a speaker in your video by superimposing their name and title during the interview (often called a *lower-third*). You may also use text to identify sections of a longer video (often called *bumpers*) or to acknowledge the cast and crew (with credits).

Text, properly used, is clearer than a narrator and allows for information to be presented in the middle of dialogue. Text can be used to reinforce key information.

Premiere Pro has a versatile Titler tool. It offers you a range of text editing and shape creation tools that you can use to design effective titles. You can use the fonts loaded on your computer (and those available via Adobe Typekit as part of your Creative Cloud membership).

You can also control opacity and color and insert graphic elements or logos created using other Adobe applications, such as Adobe Photoshop or Adobe Illustrator. The Titler is a customizable and powerful tool.

- **1.** Go to Window > Workspace > Effects.
- 2. Choose Window > Workspace > Reset Current Workspace and click Yes to confirm.

#### An overview of the Titler window

Let's start with some preformatted text and modify it. This is a good way to get an overview of the powerful features of the Premiere Pro Titler. Later in this lesson, you'll build titles from scratch.

- 1. Open the project Lesson 16.prproj.

  The sequence 01 Seattle should already be open. If not, open it now.
- 2. Double-click the clip Title Start, in the Project panel.

  This is a Premiere Pro title, so it opens in the Titler, with the title displayed over the current frame in the Program Monitor. The text object should be selected by default; if

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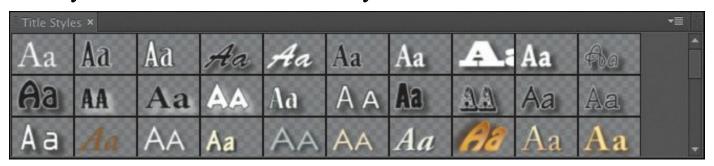
not, click once to choose it.

Here's a quick rundown of the Titler's panels:

- **Title Tools panel:** These tools select objects, set text position, define text boundaries, set text paths, and select geometric shapes.
- **Title Designer panel:** This is where you build and view text and graphics.
- **Title Properties panel:** Here you'll find text and graphic options, including font characteristics and effects.
- Title Actions panel: You'll use these to align, center, or distribute text and groups of objects.
- Title Styles panel: Here you'll find preset text styles.



3. Click a few thumbnails in the Styles panel to acquaint yourself with the default styles available.

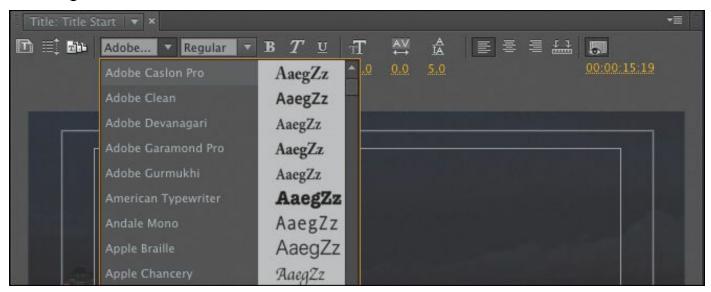


Each time you click a style, Premiere Pro changes the selected text object to that style. Some of the styles are so large that some of the text disappears off-screen; we'll adjust these settings shortly. When you're finished looking at styles, choose the style Adobe Garamond White 90, the seventh from the left (shown here).



This style works with the background.

**4.** Click the Font Browser menu at the top of the Titler. This is a duplicate of the Font Browser menu in the Properties panel.



5. Scroll through the fonts. Each time you choose a new font, the text updates. If you click into the menu without using the dropdown option, you can use the Up Arrow and Down Arrow keys on your keyboard to choose different fonts.

The specific fonts loaded on each system will vary, and your Adobe Creative Cloud membership includes access to many more fonts than you will have available to begin with.

6. Click the Font Family menu in the Title Properties panel, on the right side of the Titler. This is another way to change fonts in the Titler. Experiment with changing the font through this panel. You can also experiment with the Font Style menu.

#### Note

You may have to expand the window to see all the Title Properties options.

- 7. When you've finished experimenting, choose Adobe Caslon Pro (or a similar-looking font) from the Font Family menu. Choose Bold from the Font Style menu to make the text easier to read.
- 8. Change the font size to 140 by typing 140 into the Font Size field or by dragging the Size number until it reaches 140. When you do this, it's likely the text will be hidden. This is because it no longer fits inside the text box. Resize the text box by dragging the top handle of the bounding box with the Selection tool.



**9.** In the Title Designer panel, click the Center button to center the text.

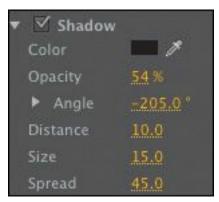


## Note

With all the clicking and testing, it's easy to accidentally deselect the text. If there's no bounding box with handles around the text, select it using the Selection tool (in the upper-left

corner of the Titler) by clicking anywhere in the text.

- 10. In the Title Properties panel, change Tracking to 3.0. Tracking changes the spacing between the characters. Let's make the drop shadow more pronounced and easier to read.
- 11. In the Title Properties panel, enable the Shadow option. Change Shadow Distance to 10, Shadow Size to 15, and Shadow Spread to 45. You can enter numbers into each field or drag the numbers to scrub their values.



12. In the Title Actions panel, click the Horizontal Center and Vertical Center buttons to align the text object to the absolute center of the screen.

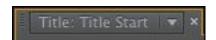


Your screen should look like this.



- 13. Drag the Titler floating window to the right—far enough to be able to see the Project panel.
- **14.** In the Project panel, double-click Title Finished to load it in the Titler.
- 15. Toggle between the two titles by using the drop-down menu in the upper-left of the Titler main panel.

Your text should look similar to the Title Finished text.

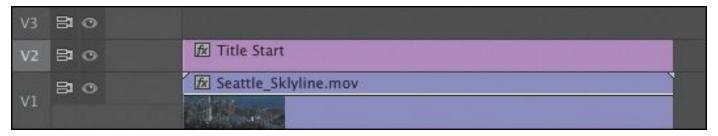


**16.** Close the Titler by clicking the *x* in the upper-right corner (Windows) or the Close button in the upper-left corner (Mac OS).

#### Note

Premiere Pro automatically saves your updated title in the project file. It does not show up as a

17. Drag the Title Start clip from the Project panel to the Video 2 track on the Timeline, trim it so it fits above the video clip, and drag the playhead through it to see how it looks over that video clip.



## Using titles in other projects

You're likely to create common titles for locations and speaker names that you will want to use in multiple projects. Premiere Pro does not automatically save titles as separate files, but you can do so manually.

To make a title available for use in another project, select the title in the Project panel, choose File > Export > Title, give your title a name, choose a location, and click Save. You can import that title file the same way you would import any other asset.

## Video typography essentials

When you design text for video, it's essential that you follow typography conventions. If text is composited over a moving video background with multiple colors, it can take some work

to create a clear design.

Find a balance between legibility and style, making sure enough information is on the screen without crowding it. If there's too much text, it will quickly become hard to read, frustrating the viewer.



## 属 Tip

If you'd like to learn more about typography, consider the book Stop Stealing Sheep & Find Out How Type Works (Adobe Press, 2002), by Erik Spiekermann and E. M. Ginger.

#### Font choice

Your computer probably has many fonts, which can make choosing a good font for video work difficult. To simplify the selection process, try using a triage mentality and consider a few factors:

- Readability: Is the font easy to read at the size you're using? Are all the characters readable? If you look at it quickly and then close your eyes, what do you remember about the text block?
- Style: Using adjectives only, how would you describe the font you've chosen? Does the font convey the right emotion? Type is like a wardrobe or a haircut; picking the right font is essential to the overall success of the design.
- Flexibility: Does the font mix well with others? Does it come in various weights (such as bold, italic, and semibold) that make it easier to convey significance? Can

you create a hierarchy of information that conveys different kinds of information, such as a name and title for a speaker's lower-third name graphic?

The answers to these guiding principles should help steer you toward better-designed titles. You may need to experiment to find the best font. Fortunately, you can easily modify an existing title or duplicate it and change the copy for a side-by-side comparison.

#### Color choice

Although you can create a nearly infinite number of possible color combinations, choosing the right colors to use in a design can be surprisingly tricky. This is because only a few colors work well for text while remaining clear for the viewer. This task becomes even more difficult if you're editing your video for broadcast or if your design must match the style and branding of a series or product. The text may also need to work when placed over a busy moving background.



White text has good readability over a dark background.



This blue text is more difficult to read because it's a similar "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*"

#### color and tone to the sky.

While it may feel a little conservative, the most common color for text in video is white. Not surprisingly, the second most popular color is black. If colors are used, they tend to be very light or very dark shades. Lighter colors that work well include light yellow, light blue, gray, and tan. Darker colors that can work include navy and forest green. The color you choose must provide suitable contrast from the background that the text is being placed over. This is why it's so helpful to have the current video frame displayed in the background of the Title Designer.

## o N

#### Note

When creating text for use in a video, you will often find yourself placing it over a background that has many colors present. This will make it difficult to achieve proper contrast (which is essential to preserving legibility). To help in this case, you may need to add a stroke or shadow to get a contrasting edge.

# **Kerning**

It's common to adjust the spacing between the letters in a title to improve the appearance of text and help match it to the design of the background. This process is called *kerning*. Taking the time to manually adjust text becomes more important the larger the font gets (because it makes improper kerning that much more visible). The goal is to improve the

appearance and readability of your text while creating optical flow.

You can learn a lot about kerning by studying professionally designed materials like posters and magazines.



The original kerning is a bit loose in spots.

## Tip 👅

A common place to start kerning is to adjust between an initial capital letter and the succeeding lowercase letters, particularly in the case of a letter with very little "base," such as T, which creates the illusion of excessive space along the baseline.



After adjusting kerning manually, overall readability improves. Kerning is easy to adjust:

- 1. Double-click on a text box in the Title Designer to edit the contents, or click on the text box with the Type tool. Once inside the text box, you can move the blinking I-bar using the arrow keys.
- 2. When the I-bar is between the two letters you want to kern, hold down the Alt (Windows) or Option (Mac OS) key.
- 3. Press the Left Arrow key to pull the letters closer or the Right Arrow key to push them farther apart. You can also use the Kerning control in the Properties panel.
- 4. Move to the next letter pair and adjust as needed.

# **Tracking**

Another important text property is *tracking* (which is similar to kerning). This is the overall control of spacing between all the letters in a line of text. Tracking can be used to globally condense or expand a line of text.

It's often employed in the following scenarios:

- **Tighter tracking:** If a line of text is too long (such as a lengthy title for a speaker's lower-third), you may tighten it slightly to fit. This will keep the font size the same but fit more text into the available space.
- Looser tracking: A looser track can be useful when using all uppercase letters or if you need to apply an outside stroke to the text. It's used often for large titles or when text is used as a design or motion graphics element.



Tracking is combined with the use of the Small Caps option to create a stylized title that is still easy to read.

You can adjust tracking in the Title Properties panel of the Premiere Pro Titler.

# Leading

Kerning and tracking control the horizontal space between characters. *Leading* (pronounced *led*-ing) controls the vertical space between lines of text. The name comes from the time when strips of lead were used on a printing press to create space between lines of text.

You adjust the leading in the Title Properties panel. "\*\*\*\*\*ebook converter DEMO - www.ebook-

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The original leading causes the two lines of text to become difficult to read. Notice the way the comma in the first line is almost touching the text on the second line.



Increasing the leading adds space between lines and improves readability.

In most cases, you'll find the default setting of Auto works well for leading. Adjusting leading can have a big impact on your title. Don't set the leading too tight; otherwise, descenders from the top line (like the downward lines on j, p, q, and z) will cross ascenders from the lower line (like the upward lines on b, d, k, and l). This collision will likely make the text more difficult to read.

## Alignment

While you may be used to seeing text left-justified for things like a newspaper, there are no hard-and-fast rules for aligning video text. Generally, text used for a lower-third title is left- or right-justified.



On the other hand, you'll often center text used in a title sequence or segment bumper. In the Titler, you'll find buttons to align your text left, right, or centered.

#### Note

When setting text, you can click and type (called point text), or you can drag using the Type tool to define a text box first. This is called Area Type and offers greater control over alignment and layout, though you need to remember to resize the box if your text gets too big.

## Safe title margin

When you're designing in the Titler, you'll see a series of two nested boxes. The first box shows you 90 percent of the viewable area, which is considered the *action-safe margin*. Things that fall outside this box may get cut off when the video signal is viewed on a CRT television monitor. Be sure to place all critical elements that are meant to be seen (like a logo) in this region.

#### Note

You can turn off the title-safe margins or actionsafe margins by opening the Titler panel menu (or choosing Title > View) and then choosing Safe Title Margin or Safe Action Margin.

The second box, which is 80 percent of the viewable area, is called the *title-safe zone*. Just as this book you're reading has margins to keep the text from getting too close to the edge, it's a good idea to keep text inside the innermost, or title-safe, zone. This will make it easier for your audience to read the information.



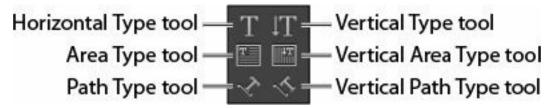
This image is too close to the edge (and outside the title-safe margin).



This image shows the text properly positioned inside the titlesafe margin, which makes it more readable and visible even on a badly calibrated screen.

## **Creating titles**

When you create a title, you'll need to make some choices about how the text is displayed. The Titler panel offers three approaches to creating text, each offering both horizontal and vertical text-direction options:



- **Point text:** This approach builds a text bounding box as you type. The text runs on one line until you press Enter (Windows) or Return (Mac OS) or until you choose Title > Word Wrap. Changing the shape and size of the box changes the shape and size of the text.
- Paragraph (area) text: You set the size and shape of the text box before entering text. Changing the box size later displays more or less text but does not change the shape or size of the text.
- **Text on a path:** You build a path for the text to follow by clicking points in the text screen to create curves and then adjusting the shape and direction of those curves using the handles.

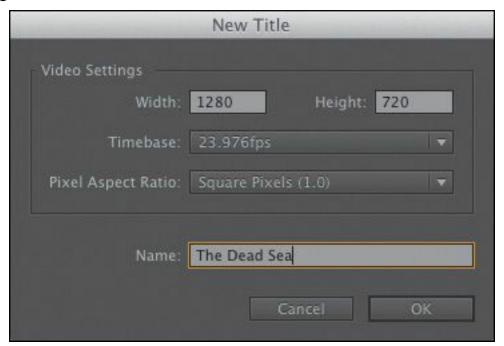
In the Title Tools panel, you can select a tool from the left or right column. This determines whether the text will appear horizontally or vertically.

## Adding point text

Now that you have a basic understanding of how to modify and design a title, let's build one from scratch, working with a new sequence.

You'll create a new title to help promote a tourist destination.

- 1. If the Title panel is open, close it and then open the sequence 02 Cliff.
- 2. Open the New Title dialog by choosing File > New > Title or by pressing Control+T (Windows) or Command+T (Mac OS).
- 3. Type **The Dead Sea** in the Name box, and click OK.



4. Try changing the background video frame by dragging the timecode next to the Show Background Video button. You can also move the Timeline playhead to change the background image in the Titler, but it may be hidden by the Titler frame.

#### Tip 🕟

Dragging the timecode with the text screen displayed is a useful way to position text relative to the video contents. You can also use it to evaluate how the text looks over your video and make adjustments to improve readability. The video frame displayed behind the title is not saved with the title. It's there only as a reference for positioning and styling your title.

5. Click the Show Background Video button to hide the video clip.

The background now shows a grayscale checkerboard, which represents transparency. If you reduce the opacity of text or graphics, you'll see some of the background show through.

**6.** Click the Myriad Pro White 25 style, highlighted here.



7. Click the Type tool ( ) (shortcut T), and click anywhere in the Title Designer.

#### Tip 🕟

If you hover your cursor over a style, its name will appear in a tool tip.

The Type tool creates point text.

8. Type THE DEAD SEA to match the text in the figure.



#### Note

If you type a very long title, you'll notice that point text does not wrap automatically, so your text will run off the screen. To make text wrap when it reaches the title-safe margin, choose Title > Word Wrap. If you want to force a new line to start, press Enter (Windows) or Return (Mac OS).

9. Click the Selection tool ( ), in the upper-left corner of the Title Tools panel. Handles appear on the text bounding box.

You won't be able to use a keyboard shortcut for the Selection tool, because you're typing into a text bounding box.

10. Drag the corners and edges of the text bounding box. Notice that the settings for Font Size, Width, and Height change as you do. Hold the Shift key to constrain the text so it scales uniformly.



11. Hover the pointer just outside a corner of the text box until a curved pointer appears. This allows you to rotate the text box. Drag to rotate the bounding box off its horizontal orientation.



12. With the Selection tool still active, click anywhere in the bounding box and drag the text and its bounding box somewhere else in the Title Designer.

Try to approximately match this look. Adjust the size, rotation, and position of the text using the techniques you've learned so far.



## **Tip**

Instead of dragging bounding box handles, you can change the Transform settings in the Title Properties panel. Your changes will show up immediately in the bounding box (as long as it is selected).

## Adding paragraph text

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While point text is flexible, you can take better control over layout with paragraph text. This option will automatically wrap the text as it reaches the edge of the paragraph text box.

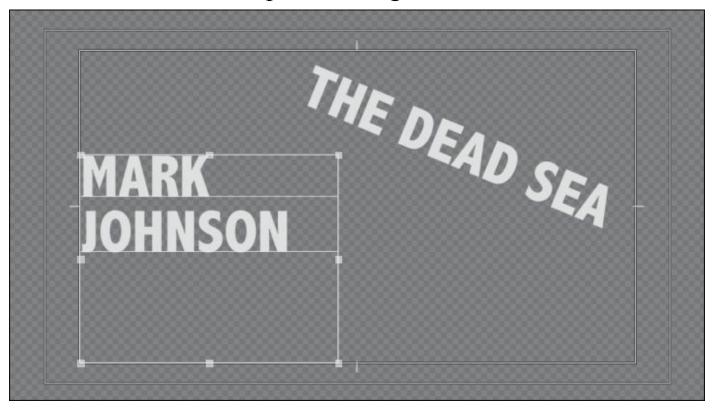
Continue working with the same title.

- 1. Click the Area Type tool ( ) in the Title Tools panel.
- 2. Drag in the Title Designer to create a text box that fills "\*\*\*\*\*ebook converter DEMO www.ebook-

the lower-left corner of the title-safe area.

**3.** Start typing. Start entering names of participants who will be attending the tour. Use the names here or add your own.

Type enough characters to go beyond the end of the text box. You'll need to reduce the font size so you can see a few lines of text at once. Unlike point text, area text remains within the confines of the bounding box you defined and it wraps at the edges of the box.

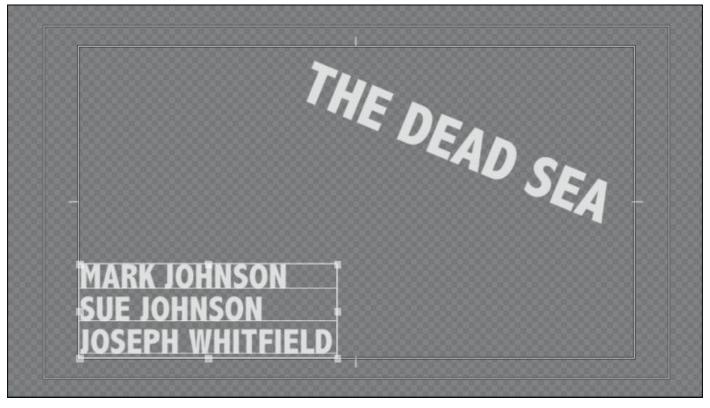


The text in this screen is too large to fit on one line, so it wraps to the next.

- **4.** Press Enter (Windows) or Return (Mac OS) to go down a line.
- 5. Select all the text, and adjust the Font Size setting to 60.



6. Click the Selection tool, and change the size and shape of the bounding box to fit around the text a little better.



As you resize the text box, the text stays the same size, adjusting its position in the text box. If you make the box "\*\*\*\*\*ebook converter DEMO - www.ebook-

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too small to fit all your text, the extra text scrolls below the bottom edge of the text box, and a small plus sign (+) appears near the lower-right corner outside the box.

#### 7. Close the title.

Because Premiere Pro automatically saves text to the project file, you can switch to a new or different title and without losing your work.

## Tip 👅

A good way to avoid spelling mistakes is to copy and paste text from an approved script or email that has already been reviewed by your client or producer.

## Stylizing text

Earlier, you experimented with title styles. Title styles are fast and easy, but they're just the beginning. You can use the Title Properties panel to take very precise control over the appearance of your text.

## Changing a title's appearance

In the Title Properties panel, you'll find lots of options for modifying the appearance of text. You can improve the readability of your type and its overall appearance. It's easy to overdo it and add too many effects, which might produce amateurish results and affect readability. Now is the perfect time to turn everything on and make the most garish text you can (professionally, you might not get it signed off).





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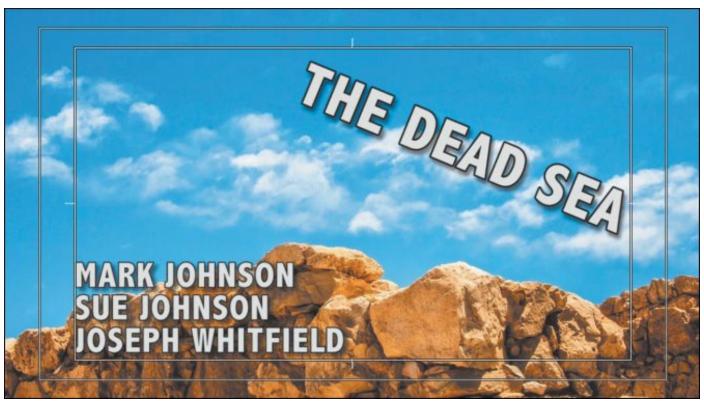
- Fill Type: There are several choices of fill type. The most popular ones are Solid and Linear Gradient, but you will also find gradient, bevel, and ghosting options.
- Color: Set the color for your text. You can click the swatch or enter numerical values in the Color Picker, or you can use the Eyedropper tool to sample from your video clip. If you start with a sample from your video and then adjust the color using the Color Picker, you can create titles that are clear to read and match the mood of the background.

## Tip 👅

Instead of using the Color Picker to change the Color Stop color, you can use the Eyedropper tool (located next to the color swatch) to select a color from your video. Click the Show Video button at the top of the Titler panel, move to a frame you want to use by scrubbing the timecode numbers left or right, and use the Eyedropper tool to select a color that suits your needs.

- Sheen: A gentle highlight can add depth to your title. Be sure to adjust the size and opacity so the effect is subtle.
- Stroke: You can click to add inner and outer strokes. Strokes can be solid or gradient and add a thin edge to the outside of the text. Adjust the opacity of a gradient to create a gentle glow or soft edge. A stroke is commonly used to help keep text legible over moving video or a complex background.

- **Shadow:** A drop shadow is a common addition to video text because it makes the text easier to read. Be sure to adjust the softness of the shadow. Also, be sure to keep the angle of shadows identical for all titles in a project for consistency.
- 1. In the Project panel, double-click the title The Dead Sea to open it in the Titler.
- 2. Click the Show Background Video button to see the title over the video source.
  - The text is hard to read against the bright areas of cloud and rock in the picture.
- **3.** Experiment with the options in the Title Properties panel to make the text more readable.
- 4. Continue designing until you have a look that is visually pleasing to you.



#### Note

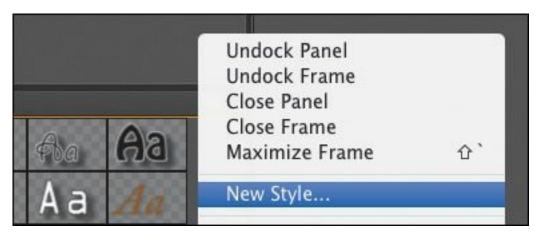
If you see an exclamation point next to the color you've chosen, Premiere Pro is warning you that a color is not broadcast-safe. This means it can cause problems when the video signal is put into a broadcast environment (and can be problematic when burned to a DVD or Blu-ray Disc). Click the exclamation point to automatically choose the closest color that is still broadcast-safe.

# Saving custom styles

If you create a look you like, you can save time by storing it as a style. A style describes the color and font characteristics for text. You can use a style to change the appearance of text with a single click; all the properties of the text update to match the preset.

Let's create a style from the text you modified in the previous exercise.

- 1. Continuing to work on the same title, use the Selection tool to select a text object that has the properties you want to save.
- 2. In the Title Styles panel menu ( ), choose New Style.



- **3.** Enter a name, and click OK. The style is added to the Title Styles panel.
- 4. To view styles more easily, you can click the Title Styles panel menu and choose to view the presets as Text Only, Small Thumbnails, or Large Thumbnails.
- 5. To manage a style, right-click its thumbnail. You can choose to duplicate a style to modify a copy, rename a style so it's easier to find, or delete a style if you want to remove it.
- **6.** Close the title to store its changes.

## Creating an Adobe Photoshop graphic or title

You can create titles or graphics for Premiere Pro in Adobe Photoshop. While Photoshop is known as the premier tool for modifying photos, it also has many capabilities for creating elegant titles or logo treatments. Photoshop offers several advanced options, including anti-aliasing (for smoother text), advanced formatting (such as scientific notation), flexible layer styles, and even a spell checker.

Try creating a new Photoshop document from inside Premiere Pro:

1. Go to File > New > Photoshop File.
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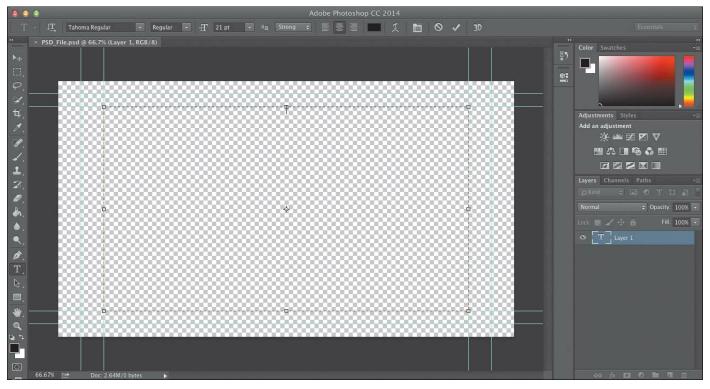
converter.com\*\*\*\*\*\*

2. The New Photoshop File dialog appears, with settings based on your current sequence.



- 3. Click OK.
- **4.** Choose a location to store your new PSD file, name it, and click Save.
- 5. Photoshop opens, ready for you to edit the file.

  Photoshop automatically displays safe action and safe title action zones in the form of guides. These guides won't appear in the finished image.
- **6.** Select the Text tool by pressing T.
- 7. Draw a text block, and by dragging, draw from the upper-left corner of the title-safe area to the lower-right corner. This creates a paragraph text box to hold the text. As in Premiere Pro, the use of a paragraph text box in Photoshop allows you to precisely control the layout of text.



- **8.** Enter some text you'd like to use.
- 9. Adjust the font, color, and point size to taste using the controls in the Options bar across the top of the screen.
- 10. Click the Commit button ( ) in the Options bar to
  - commit the text layer.

Adobe Caslon Pro Bold

**11.** Add a drop shadow by choosing Layer > Layer Style > Drop Shadow. Adjust to taste.

When you're finished in Photoshop, you can save and close the file. It will already be in your Project panel in the Premiere Proproject.

If you'd like to edit the title in Photoshop, select it in the Project panel or Timeline and choose Edit > Edit in Adobe Photoshop. When you save changes in Photoshop, the title updates automatically in Premiere Pro.

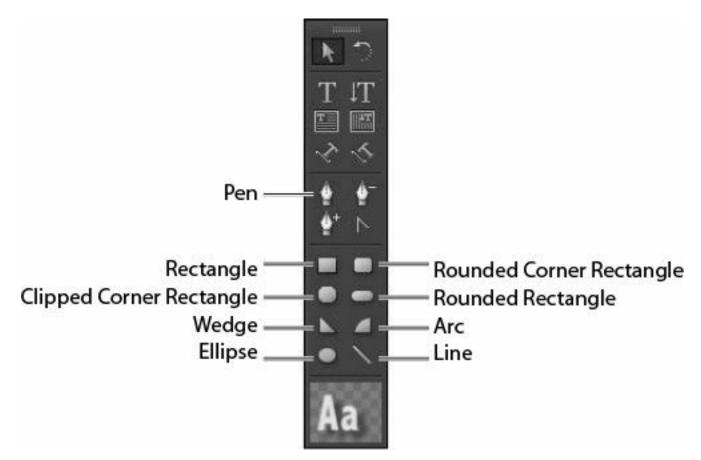
## Working with shapes and logos

When building titles for your program, you'll likely need more than just words to build a complete graphic. Fortunately, Premiere Pro also offers the ability to create vector shapes that can be filled and stylized to create graphic elements. Many of the title properties you worked with for text also apply to shapes. You can also import completed graphics (like a logo) to enhance your Premiere Pro title.

## **Creating shapes**

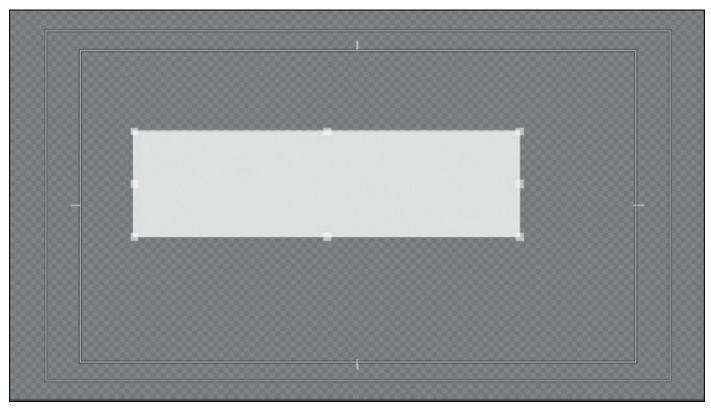
If you've created shapes in graphics-editing software like Photoshop or Adobe Illustrator, you'll find creating geometric objects in Premiere Pro similar.

Select from the various shapes in the Title Tools panel, drag and draw the outline, and release the mouse button.

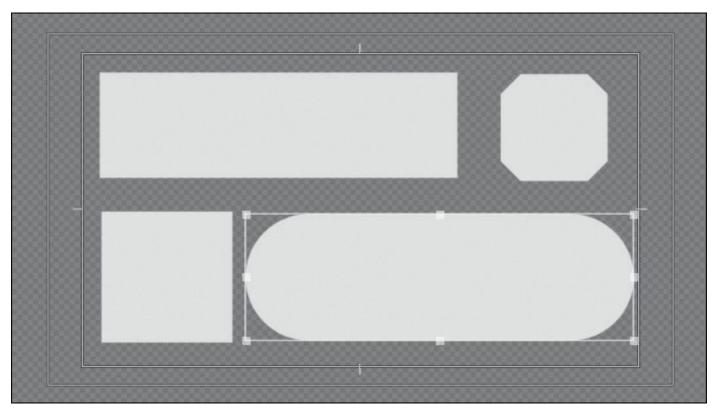


Follow these steps to draw shapes in Premiere Pro. (This exercise is just for practice.)

- **1.** Press Control+T (Windows) or Command+T (Mac OS) to open a new title.
- 2. Type **Shapes Practice** in the Name box in the New Title dialog, and click OK.
- **3.** Click the Show Background Video button to hide the video preview.
- **4.** Select the Rectangle tool (R), and drag in the Titler panel to create a rectangle.



- **5.** Try a few title styles while the rectangle is still selected. Title styles affect shapes as well as text.
- **6.** Hold the Shift key as you drag in another location to create a square. The Shift key locks the aspect ratio of shapes.
- 7. Select the Rounded Corner Rectangle tool, and Alt-drag (Windows) or Option-drag (Mac OS) to draw from the center of the shape.
  - The center remains in the spot where you first clicked, and the figure changes shape and size around that point as you drag.
- 8. Select the Clipped Corner Rectangle tool, and Shift-Altdrag (Windows) or Shift-Option-drag (Mac OS) to constrain the aspect ratio and draw from the center.



- **9.** Press Control+A (Windows) or Command+A (Mac OS) and then press Delete to make another clean slate.
- 10. Select the Line tool (L), and drag to create a single line.
- 11. Select the Pen tool, and click in a blank area of the Title Designer to create an anchor point (don't drag to create handles).
- 12. Click somewhere else in the Title Designer to create a path. This creates another anchor point.

## Tip 🕟

Shift-click to constrain the segment's angle to a multiple of 45 degrees.

13. Keep clicking with the Pen tool to create additional straight segments. The last anchor point you add appears as a large square, to show it's selected.

- **14.** Complete the path by doing one of the following:
  - Close the path by moving the Pen tool to the first anchor point. When you hover the cursor over the first anchor point, a little circle appears underneath the Pen pointer. Click to close the path.
  - To leave the path open, Control-click (Windows) or Command-click (Mac OS) anywhere away from all objects. Alternatively, select a different tool in the Title Tools panel.
- 15. Experiment with the different shape options. Try overlapping them and using different styles. The possibilities are endless.
- 16. Close the current title.

## Adding a graphic

You can add image files to your title designs using common file formats, including vectors (.ai, .eps) and still images (.psd, .png, .jpeg).

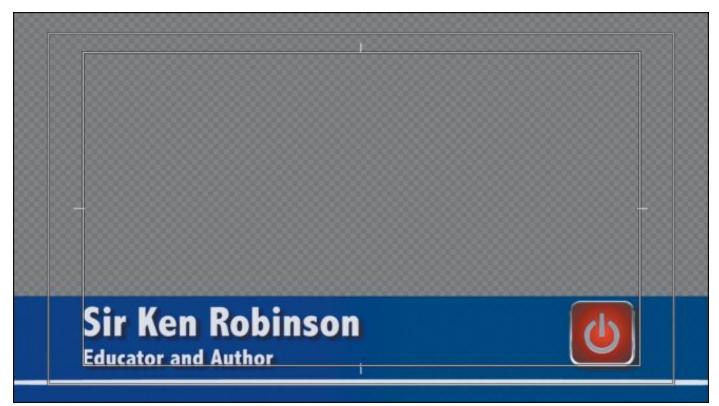
- 1. In the Project panel, double-click the file Lower-Third Start clip to open the title in the Titler Designer.
- 2. Go to Title > Graphic > Insert Graphic.
- **3.** Select the file logo.ai from the Lessons/Assets/Graphics folder, and click Open.

#### Note

If you place a vector graphic into a title, Premiere Pro converts it into a bitmap graphic at its original size. You can scale the graphic smaller,

but if you make it larger the image may become pixelated.

4. With the Selection tool, drag the logo to position it where you want it in the title. Then adjust the size, opacity, rotation, or scale of the logo. Hold down the Shift key to constrain proportions when you scale to prevent unwanted distortion.



5. When finished, close the title.

### Note

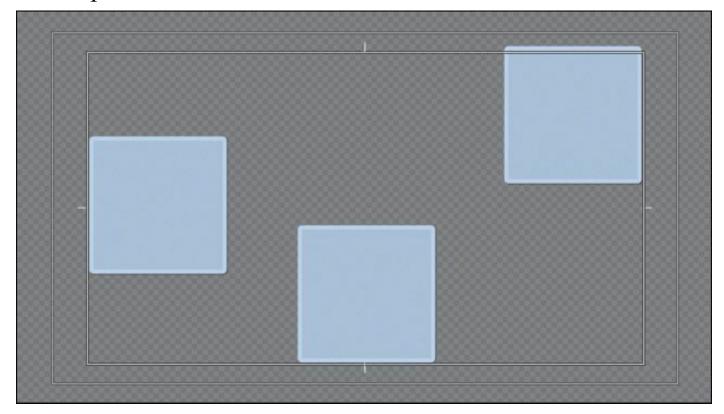
To restore a graphic to its original size, select it and choose Title > Graphic > Restore Graphic Size. If you accidentally distorted the logo, select the logo and choose Title > Graphic > Restore Graphic Aspect Ratio.

## Aligning shapes and logos

As you design titles, you'll often want to keep the design uniform and neat. The Premiere Pro Titler can align and distribute elements in a title. The options in the Align panel set the position for multiple objects to match, such as the bottom edges or centers of two or more items. You can also take three or more objects and space them evenly in relation to one another.



1. In the Project panel, double-click the file Align Start to open the title in the Titler.



This title contains three shapes that are randomly "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

positioned on the screen.

2. Use the Selection tool to lasso across all three squares, selecting them all.

When more than one object is selected, the Align tools become available.

3. Click the Align Vertical Bottom button ( ) to align the bottom edges of the three objects.

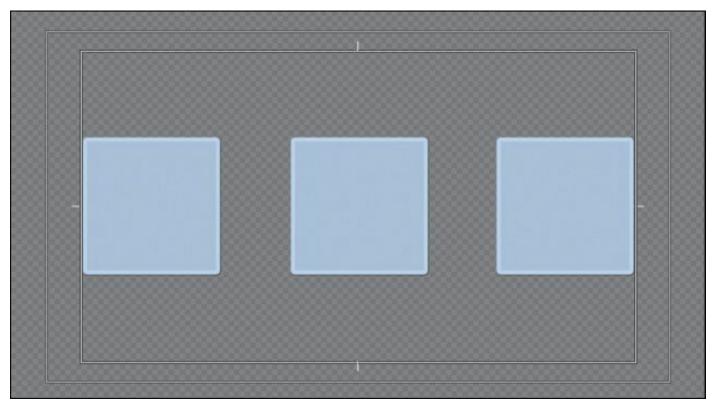
The three objects are now aligned, based on the lowest edge of the lowest object in the composition.

- 4. Click the Horizontal Center Distribute button ( ) to space the three objects equally from one another.

  The objects are now evenly spaced and aligned with one another. Now, let's space them in relation to the canvas.
- **5.** Click both the Horizontal Center and Vertical Center buttons.



You should have three perfectly aligned squares centered in the title area.



**6.** When finished, close the title.

# Making text roll and crawl

You can easily make rolling text for opening and closing credits and crawling text for items such as headline bulletins.

- 1. Go to Title > New Title > Default Roll.
- 2. Name your title Rolling Credits, and click OK.
- 3. Select the Type tool, and then type some text with the Caslon Pro 68 style (remember, you can view the Title Styles as a list by choosing the option in the panel menu).

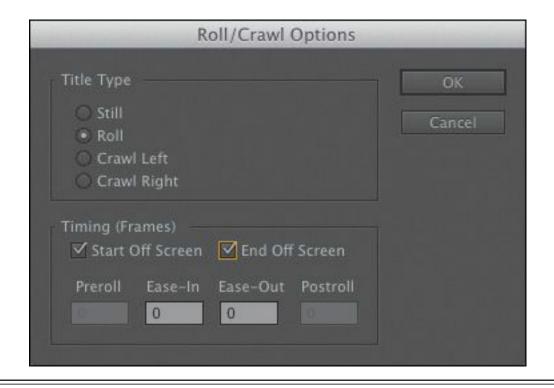
## Tip 🕟

It's often easier to write your credits in a wordprocessing application or text document. You can then copy and paste rather than type them into a title.

Create placeholder credits as shown here, pressing Enter (Windows) or Return (Mac OS) after each line. Type enough text to more than fill the screen vertically. Use the Title Properties panel to format your text as desired.



**4.** Click the Roll/Crawl Options button ( ).



#### Note

With rolling text enabled, the Titler automatically adds a scrollbar along the right side of the Title Designer, so you can view text that runs off the bottom of the screen. If you select a crawl option, the scrollbar appears at the bottom of the screen.

You have the following options:

- Still: This sets the title as a still.
- Roll (scroll text vertically): This sets the title to scroll vertically.
- Crawl Left, Crawl Right: These set the title to scroll horizontally left or right.
- Start Off Screen: This sets whether the credit begins off-screen and rolls on or whether it begins where you placed it in the Title Designer.

- End Off Screen: This indicates whether the credits roll completely off the screen or end onscreen.
- **Preroll:** This sets the number of frames to delay before the first words appear onscreen.
- Ease-In: This specifies the number of frames at the beginning to gradually increase the speed of the roll or crawl from zero to full speed.
- Ease-Out: This specifies the number of frames to slow down the speed of the roll or crawl at the end.
- **Postroll:** This specifies the number of frames that play after the roll or crawl ends.
- **5.** Select Start Off Screen and End Off Screen, and type **5** for Ease-In and **5** for Ease-Out. Click OK.
- **6.** Close the Titler.
- 7. Drag your newly created Rolling Credits title onto the Video 2 track of the Timeline above the video clip (if you have another title there, drag this one on top of it to perform an overlay edit).
- **8.** Trim the duration of the new Rolling Credits title clip to the same length as the clip on the Video 1 track.

#### Note

The length of a rolling or crawling title on the Timeline defines the playback speed. A shorter title will roll or crawl faster than a long one.

9. With the sequence selected, press the spacebar to view

#### **Animated text with Adobe After Effects**

If you'd like to create animated titles to use in Premiere Pro, you'll find excellent options available in Adobe After Effects. You'll find a very deep animation engine with a wide range of animation properties, ranging from Scale and Position to Blur and Skew.

- 1. To create a new After Effects composition from within Premiere Pro, choose File > Adobe Dynamic Link > New After Effects Composition.
- 2. The New After Effects Comp dialog appears, with settings that match your current sequence. Click OK and a new After Effects composition is added to your Project panel.
- 3. After Effects loads, and you'll need to name a new project and click Save. If you already have an After Effects project open, the new composition is added to it.
  - You will probably want to store the new After Effects project with your Premiere Pro project file so that the media path is easy to preserve.
- 4. In After Effects, select the Type tool, and click in the Composition panel to enter some text. You can click the buttons beneath the composition window to turn on a title-safe

- overlay. If you're unsure of what a button does, just hover your cursor over it to see a tool tip.
- 5. When you select a Type tool, the Character panel appears automatically, with options similar to those in the Premiere Pro Titler. Adjust the text properties with the Character panel to improve style and legibility.



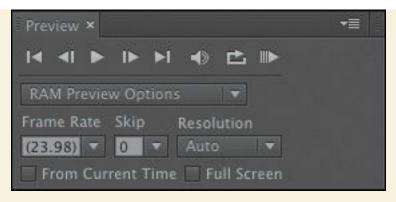
6. An easy way to animate the layer is with presets. The Timeline looks a little different from the one you're familiar with in Premiere Pro, but you should be able to see your text layer—it's the only one. Select the layer in the Timeline panel and position the playhead at the start of the Timeline.



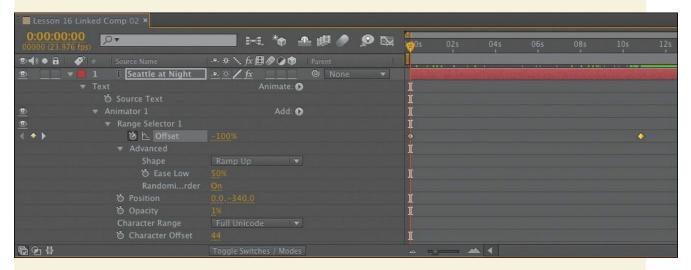
7. Look in the Effects & Presets panel (if it's not visible, you can choose it in the Window menu). Click the disclosure triangle to expand the Animation Presets.



- 8. Expand the Text category, and then Animate In. Select a preset effect and double-click to apply it to your selected text layer. For this exercise, choose Raining Characters In.
- 9. In the Preview panel, click the RAM Preview button ( ) to preview the text animation. In this animation, the timing might be different than you'd like, but you can easily fix it.



10. Make sure the text layer is selected on the Timeline, and press U to see the keyframes applied to the layer. These were added automatically when you applied the preset. Drag the keyframes to new positions to adjust the start and end time of the animation.



- 11. Click the disclosure triangle next to the Range Selector. This closes the properties. Click the disclosure triangle again to open it, along with all the animation properties.
- 12. Click the disclosure triangle next to Advanced to see those properties as well. Experiment with the different Advanced properties to see the results. In particular, experiment with the following properties, and click the RAM Preview

button occasionally to view the changes:

- Randomize Order: Randomizes the order in which the property is applied to the characters affected by the Range Selector.
- Random Seed: Affects the method used to calculate randomness. Try inputting a different value to produce a varied animation.
- Shape: Affects the shape used to select characters between the start and end of the range. Choosing different options will result in subtle but significant changes. You can choose Square, Ramp Up, Ramp Down, Triangle, Round, or Smooth.



13. If you're happy with the animation as is, save your After Effects project and return to Premiere Pro. You can now edit the new After Effects composition into your Timeline just as you would any other clip.

## **Review questions**

- 1. What are the differences between point text and paragraph (or area) text?
- 2. Why display the title-safe zone?
- 3. Why might the Align tools be dimmed?
- 4. How do you use the Rectangle tool to make a perfect square?
- 5. How do you apply a stroke or drop shadow?

#### **Review answers**

- 1. You create point text with the Type tool. Its text box expands as you type. Changing the text box shape changes the text size and shape accordingly. When you use the Area Type tool, you define a bounding box, and the characters remain within its confines. Changing the box's shape displays more or fewer characters.
- 2. Some TV sets cut off the edges of the picture. The amount lost varies from set to set. Keeping your text within the title-safe margin ensures that viewers will see all your title. This is less of a problem with newer digital TVs, but it's still a good idea to use the title-safe zone to frame your titles.
- 3. The Align tools are only active if more than one object is selected in the Titler. The Distribute tools also become active when more than two objects are selected.
- 4. To create a perfect square, hold down the Shift key as you draw using the Rectangle tool.
- 5. To apply a stroke or drop shadow, select the text or object to edit, and use the Stroke (Outer or Inner) or Shadow

properties to add a stroke or a drop shadow.

# 17. Managing Your Projects

#### **Lesson overview**

In this lesson, you'll learn about the following:

- Working in the Project Manager
- Importing and exporting projects
- Managing collaboration
- Managing your hard drives



This lesson will take approximately 25 minutes.

In this lesson, you'll learn how to stay organized when working with multiple Adobe Premiere Pro CC projects. The best kind of organizational system is one you already have when you find that you need it. This lesson will help you be more creative with a little bit of planning.



Stay on top of your media and projects with a few simple steps.

## **Getting started**

When you start creating projects with Premiere Pro, you may not feel the need to invest time in staying organized. Perhaps you're working on your first project now, and if that's the case, it's going to be nice and easy to find it on your storage drive.

Once you start working on multiple projects, staying organized gets a little more complicated. You might use multiple media assets taken from multiple storage locations. You'll have multiple sequences, each with its own particular structure, and you'll be generating multiple titles. You may also have multiple effect presets and title templates. All in all, you'll need quite a filing system to keep all these project elements organized.

The solution is to create an organizational system for your projects and to have a plan in place for archiving those projects that you might want to work on again.

The thing about systems for organization is that they're usually easier to use if they exist before you need them. Look at this idea from the other direction: If you don't have an organizational system in the moment you need it—when you have a new video clip to put somewhere, for example—you might be too busy to think about things like names and file locations. Consequently, it's common for projects to end up with similar names, stored in similar locations, with a mix of files that don't go together.

The solution is simple: Make your organizational system in advance. Map it out with pen and paper if it helps, and work out the journey you'll take, starting with acquiring your source media files, moving through your edit, and finishing with output, archiving, and beyond.

In this lesson, you'll begin by learning about features that help you stay in control, without losing focus on what matters most —your creative work.

Then you'll learn about some positive approaches to collaboration.

- 1. To begin, open Lesson 17.prproj in the Lesson 17 folder.
- 2. Choose Window > Workspace > Editing to switch to the Editing workspace.
- **3.** Choose Window > Workspace > Reset Current Workspace.

The Reset Workspace dialog opens.

4. Click Yes in the Reset Workspace dialog.

#### The File menu

Though you can perform most of your creative work using buttons in the interface or using keyboard shortcuts, some important options are available only in the menus. The File menu gives you access to your project settings and to the Project Manager, a tool that automates the process of streamlining your project.



#### File menu commands

Important File menu options for project management include:

**Batch capture:** Allows you to capture multiple clips from tape; see <u>Lesson 3</u>, "<u>Importing Media</u>." This option is available only if you select one or more clips with no associated media in the Project panel.

**Link Media:** If you have clips that have become unlinked, use this option to open the Link Media dialog and relink the media (see next section).

**Make Offline:** You can break the connection between clips you select in the Project panel and their media files (see next section).

**Project Settings:** These are the settings you chose when you created your project; see <u>Lesson 2</u>, "<u>Setting Up a Project</u>."

**Project Manager:** Automates the process of backing up your project and discarding unused media files (described later in this lesson).

#### Tip 🔪

The options to Link Media or Make Offline are also available in the Project panel, when you right-click selected clips.

## Making a clip offline

The words *offline* and *online* have different meanings in different post-production workflows, depending on the context. In the language of Premiere Pro, they refer to the relationship between clips and the media files they link to.

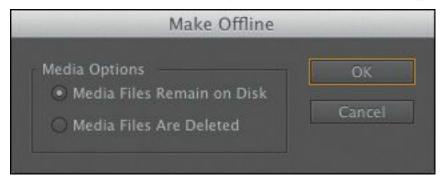
- Online: The clip is linked to a media file.
- Offline: The clip is not linked to a media file.

When a clip is offline, you can still edit it into a sequence, and even apply effects to it, but you won't be able to see any video. Instead, you'll see the Media Offline warning.

Media offline メディアオフライン Média hors ligne Offline-Medien 脱机媒体文件 Medios sin conexión Oggetto multimediale non in linea 미디어 오프라인 Медиаданные в автономном режиме Mídia offline

In almost all operations, Premiere Pro is non-destructive. This means that no matter what you do with the clips in your project, nothing will happen to the original media files. Making a clip offline gives you a rare exception to this rule.

If you right-click a clip in the Project panel or go to the File menu and choose Make Offline, you'll have two options:



- Media Files Remain on Disk: This unlinks the clip from the media file and leaves the media file untouched.
- Media Files Are Deleted: This deletes the media file. The effect of deleting the media file is that the clip goes offline, because there is no media file to link to anymore.

The benefit of making clips offline is that they can be reconnected with new media. If you've been working with low-resolution media, this means you can recapture tape-based media, or reimport file-based media, at a higher quality.

Working with low-resolution media is sometimes desirable if you have limited disk storage or a large number of clips. When your editing work is complete and you're ready for fine-finishing, you can replace your low-resolution, small file-size media with selected high-resolution, large file-size media.

### Tip 🕟

You can make multiple clips offline in a single step. Just select any clips you would like to make offline before you choose the menu option.

Do be careful with the Make Offline option, though! Once your media file is deleted, it's gone. Be cautious when using the option that deletes the actual media file.

## Using the Project Manager

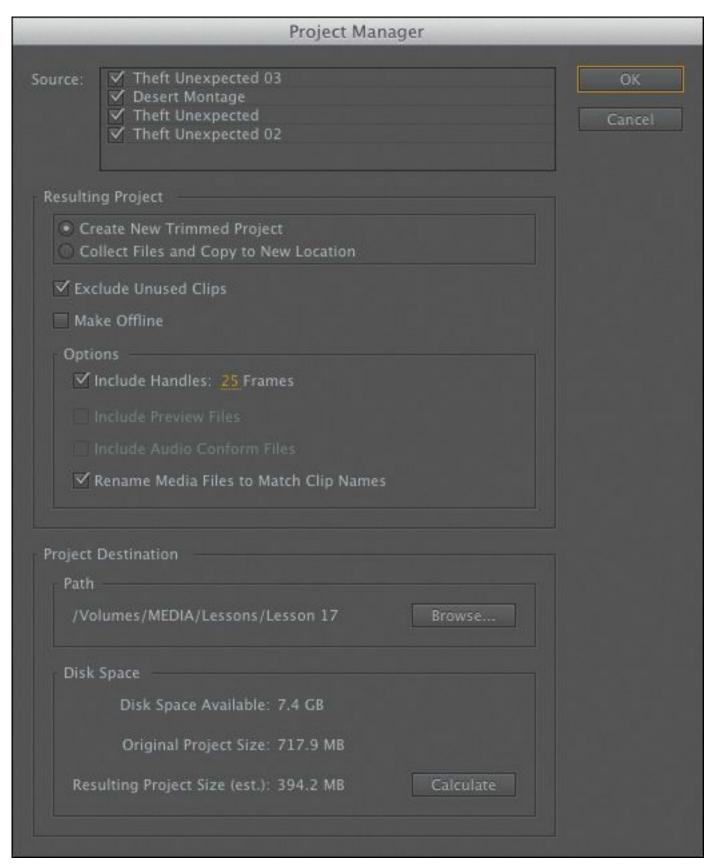
Let's take a look at the Project Manager. You can access it by choosing File > Project Manager.

The Project Manager provides several options that automate the process of *consolidating* your project, or gathering together any media files you've used in your project.

It's useful if you intend to archive your project or if you want to share your work. By using the Project Manager to gather all of your media files, you can be confident nothing will be missing

—or offline—when you hand the project over to colleagues.

The result of using the Project Manager is a new, separate project file. Because the new project file is independent of your current project, you should use the Project Manager and then double-check the new project is as you want it before you delete anything.



Here's an overview of the options:

• Source: Select one or all of the sequences in your project.

The Project Manager will choose clips and media files based on the sequences you select.

- **Resulting Project:** Create a new project with new media files based on only the trimmed parts of clips you have included in your sequence(s), or create a new project that has full copies of the clips you have included in your sequence(s).
- Exclude Unused Clips: With this option selected, the new project will include only clips you have used in your selected sequence(s).
- Make Offline: When you choose this option, Premiere Pro will automatically unlink clips captured from tape, so they are ready to be recaptured using Batch Capture. This is useful if you originally captured your media at low resolution and now want to recapture at high quality only the parts you used in your project. This option has no effect on media imported from files.
- Include Handles: If you're creating a trimmed project, this adds the number of frames you specify to the newly trimmed versions of the clips in your sequence(s). The extra content gives you the flexibility to trim and adjust the timing of your edits later.

#### Note

Not all media formats can be trimmed. If you create a trimmed project that has media of this kind, the Project Manager creates copies of the full original clips.

- Include Preview Files: If you've already rendered your effects, you can include the preview files with your new project so you won't need to render them again.
- Include Audio Conform Files: This includes the audio conform files with your project, so Premiere Pro won't need to conduct analysis of your audio again.
- Rename Media Files to Match Clip Names: As the name implies, this option renames your media files to match the clip names in your project. Consider carefully if you would like to use this option, because it can make it difficult to identify the original source media for your clips.
- **Project Destination:** Choose a location for your new project.
- **Disk Space:** Click Calculate to see an estimate of the total space needed for your new project.

#### Working with a trimmed project

To create a new trimmed project file that includes only the parts of the clips you have used in your selected sequence(s), do the following:

- 1. Go to the File menu and choose Project Manager.
- 2. Select the sequence(s) you want to be included in your new project.
- 3. Select Create New Trimmed Project.
- **4.** Choose Exclude Unused Clips, unless you want to be able to recapture or reimport files that will now be offline.
- 5. Select Make Offline if you intend to recapture all tape-

- based clips. In most cases, you will not want to choose this option.
- 6. Add some handles. The default is one second on each end of the clips used in your sequences. Consider adding more if you'd like to have more flexibility to trim and adjust your edits in the new project.

## Tip 👅

Choosing to add 5 or 10 seconds of media at each end of the clip will do no harm; it will just mean your media files are a little larger.

- 7. Decide whether you want to rename your media files. Generally, it's better to leave your media files with the original names. However, if you're producing a trimmed project to share with another editor, it might be helpful for them to identify the media files if they are renamed.
- **8.** Click Browse and choose a location for your new project file.
- **9.** Click Calculate to have Premiere Pro estimate the new total size of your project, based on your selections. Then click OK.

The benefit of creating a trimmed project is that you no longer have unwanted media files cluttering up your hard drive. It's a convenient way of transferring your project to a new location using the absolute minimum amount of storage space, and it's great for archiving.

The danger with this option is that once your unused media files

are deleted, they're gone! Be sure that you have a backup of your unused media or that you definitely do not want to use the media before you create a trimmed project.

When you create your trimmed project, Premiere Pro will not delete your original files. Just in case you selected the wrong items, you can always go back and check before manually deleting the files on your hard drive.

## Collecting files and copying them to a new location

To collect all of the files used in your selected sequences to a new, single location, follow these steps:

- 1. Go to the File menu and choose Project Manager.
- 2. Select the sequences you want to be included in your new project.
- 3. Select Collect Files and Copy to New Location.
- 4. Choose Exclude Unused Clips.
  - If you want to include every clip in your bins, regardless of whether they are used in a sequence, deselect this option. Deselect this option if you are creating a new project to organize your media files a little better—perhaps because you have imported them from lots of different locations. When the new project is created, every media file linked to the project will be copied to the new project location.
- 5. Decide whether you would like to include existing preview files to save you from having to re-render your effects in the new project.
- 6. Decide whether you would like to include Audio Conform

Files to save Premiere Pro from having to analyze the audio files again.

- 7. Decide whether you want to rename your media files. Generally, it's better to leave your media files with their original names. However, if you're producing a project to share with another editor, it might be helpful for them to identify the media files if they are renamed.
- **8.** Click Browse and choose a location for your new project file.
- **9.** Click Calculate to have Premiere Pro estimate the total new size of your project, based on your selections. Then click OK.

Collecting all of your media files this way is helpful if your media files are located in lots of different places and it's hard to find them. Premiere Pro will make copies of the original files in a single location.

If you intend to create an archive of your entire original project, this is the way to do it.

## Tip 🏲

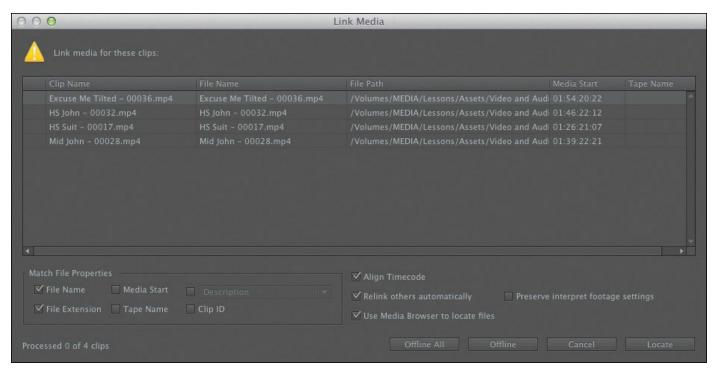
Including Preview and Audio Conform files makes it quicker to access your content, but it also takes up more storage space. Premiere Pro creates these files automatically, so you can exclude them safely, at the cost of a little extra time when you first open the project.

## Using the Link Media panel and the Locate

#### command

The Link Media panel gives you simple options to reconnect the clips in your bin with the media files on your storage drive.

The panel appears automatically if you open a project with clips that are not linked to media files.



The default options work well, but if you're relinking to different file types or using a more complex system to organize your media files, you may want to enable or disable some of the options for file matching.

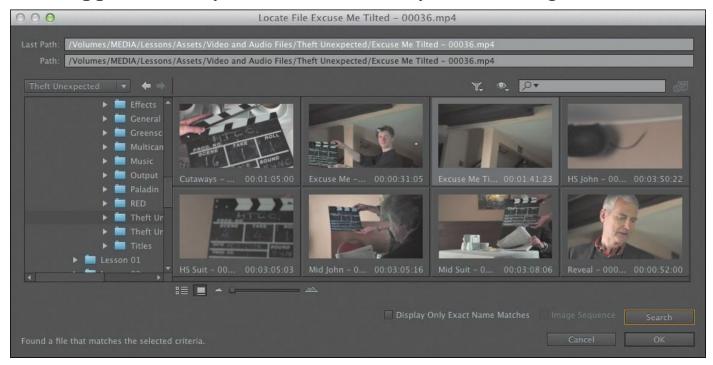
#### Note

Link Media is different from Replace Footage. Use Replace Footage to link a single clip to an alternative media file. The result is the same, but the automated search options are bypassed, allowing you to link a clip to a totally different file.

At the bottom of the panel, you'll find a series of buttons:



- Offline All: Premiere Pro will keep the clips in the project but won't automatically prompt you to relink them.
- Offline: Premiere Pro will keep the selected clip (highlighted in the list) in the project but won't automatically prompt you to relink it. The next clip on the list will be highlighted, for you to make a selection.
- Cancel: Closes this dialog.
- Locate: If you would like to relink clips, choose options to define the search settings, including File Name and/or File Extension, and click Locate. The Locate panel appears, and you can search for your missing media.



Preserve interpret footage settings

#### Note

Premiere Pro also has an option for preserving your interpret footage settings. If you've modified the way Premiere Pro interprets media, select the "Preserve interpret footage settings" check box to apply the same settings to the newly linked media files.

The Locate File panel gives you a quick, easy way to locate your missing media. The simplest way to find a file is as follows:

- 1. Review the Last Path information, as a guide to locating the file. Very often the storage drive will have changed but the path within the drive will be the same. You can use this information to manually search for a containing folder.
- 2. In the folder browser on the left, select a folder that you think contains the media, perhaps as a subfolder. Don't worry about choosing the particular subfolder that contains the media.
- 3. Click Search. Premiere Pro will locate a file that matches the selected missing clip. The file is highlighted.
- 4. Select the option Display Only Exact Name Matches. Premiere Pro will hide media files that do not match, making it easy to identify which file to select.
- 5. Double-click the correct file, or select it and click OK. When you click OK, Premiere Pro will automatically search for

other missing media files in the same location. This automation can dramatically speed up the process of relinking missing media files.

#### Final project management steps

If your goal is to give yourself maximum flexibility to re-edit your sequences based on the new project, consider going to the Edit menu and choosing the Remove Unused option before you use the Project Manager.

Remove Unused will leave you with only those clips currently used in sequences. Any clips that are not used will be removed (this can result in empty bins, as these are not affected).

You can now use the Project Manager to collect your files to a new location, with copies of the entire original media. This is perhaps the best of both worlds, balancing hard drive space with creative flexibility when working on the newly created project.

#### Importing projects or sequences

As well as importing many kinds of media files, Premiere Pro can import sequences from existing projects, along with all of the clips used to create them.

- 1. Use any method you prefer to import a new media file. If you double-click a blank area in the Project panel, the Import dialog will appear.
- 2. Select the file Desert Sequence.prproj in the Lesson 17 folder, and click Import.

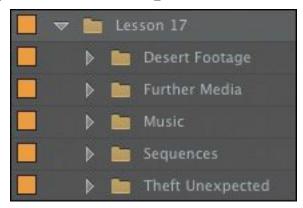
The Import Project dialog appears:



- Import Entire Project: This imports every sequence in the project you're importing and every clip already imported into a bin.
- Import Selected Sequences: This allows you to select the specific sequence you'd like to import. Only clips used in that sequence will be imported.
- Create folder for imported items: This creates a bin in the Project panel for the items you import rather than adding them to the main Project panel, potentially mixing them up with existing items.
- Allow importing duplicate media: If you import clips that link to media files you have already imported, by default Premiere Pro will consolidate the two clips into one. If you would prefer to have two copies of the clip, select this option.
- **3.** Leave Import Entire Project selected, select both check boxes, and click OK.

Premiere Pro adds a new bin to your project, containing

multiple sequences and clips in further bins.



This is a nice way to work because Premiere Pro has maintained the organization of the project you imported.

You can also import whole projects or individual clips and sequences using the Media Browser. Simply browse to a project and then import it, as described above, or double-click to view the contents and import selected items.

#### Note

If you import a Premiere Pro project file and choose to import selected sequences, the Import Premiere Pro Sequence dialog appears. Using this dialog, you can selectively import specific sequences, bringing associated clips into your project automatically.

## Managing collaboration

The option to import other projects presents novel workflows and opportunities for collaboration. You could, for example, share work on different parts of a program between different editors, all using the same media assets. Then, one editor could "\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

import all of the other projects to combine them into a completed sequence.

Project files are small—often small enough to email. This allows editors to email each other updated project files, open them and compare, or import them to do a side-by-side comparison in the project, provided that each editor has a copy of the same media files. You can use local-folder file sharing services to update a shared project file that links to duplicated copies of local media files. You can also share files using Creative Cloud.

You can add markers with comments to a Timeline. When updating a sequence, consider adding a marker to highlight changes for your collaborators.

Be warned: Premiere Pro does not lock project files when they are in use. This means two people can access the same project file at the same time. This could be creatively dangerous! As one person saves the project file, it updates. As the next person saves the file, it updates again. Whoever saves last defines the file, replacing changes made by the last editor. If you intend to collaborate, work on separate project files and import sequences for comparison, or manage access to the project file carefully.

There are several dedicated media servers made by third parties that help you to collaborate using shared media files. These allow you to store and manage your media in a way that is accessible by multiple editors at the same time.

Keep these questions in mind:

• Who has the latest version of the edited sequence?

Where are the media files stored?

As long as you have simple answers to these questions, you should be able to collaborate and share creative work using Premiere Pro.

Premiere Pro allows you to export a selection of clips and sequences as a new Premiere Pro project. This streamlined project file makes collaboration easier because it allows you to focus on precisely the content that matters.

To export a selection as a Premiere Pro project, select items in the Project panel and go to File > Export > Selection as Premiere Project. Choose a name and location for the new project file, and click Save.

The project file will link to your existing media files.

## Managing your hard drives

Once you've used the Project Manager to create a new copy of your project or you have completed your project and finished with its media, you'll want to clean up your drives. Video files are big. Even with very large storage drives, you'll quickly need to think about which files you want to keep and which ones you want to discard. You might also want to move your project media to slower, larger archive storage to keep as much fast media storage available as possible for current projects.

To make it easier to remove unwanted media when you've finished a project, consider importing all media files via your project folder or via a specific location on your media drive for your project. This means putting copies of your media into a single location before importing, because when you import media, Premiere Pro creates a link to it wherever it is on your "\*\*\*\*\*ebook converter DEMO - www.ebook-

converter.com\*\*\*\*\*\*

computer.

By organizing media files before you import them, you'll find it much easier to remove unwanted content at the end of the creative workflow, because everything is conveniently located in one place.

Remember that deleting clips in a project, or even deleting the project file itself, will not delete any media files.

#### Additional files

The media cache uses storage space as you import new media files to your projects. Also, each time you render effects, Premiere Pro creates preview files.

To remove these files and reclaim extra space on your hard drive, do the following:

- Choose Edit > Preferences > Media (Windows) or Premiere Pro > Preferences > Media (Mac OS), and click Clean in the Media Cache Database section.
- Delete render files associated with your current project by choosing Sequence > Delete Render Files. Alternatively, locate your Preview Files folder by checking under File > Project Settings > Scratch Disks. Then delete the folder and its contents using Windows Explorer (Windows) or Finder (Mac OS).

Consider carefully when choosing the location of the media cache and your project preview files. The total size of these files can be significant, and the speed of the drive will impact playback performance in Premiere Pro.

#### Media management with Dynamic Link

Dynamic Link allows Premiere Pro to use After Effects compositions as imported media while they are still editable in After Effects. To do this, Premiere Pro must have access to the After Effects project file that contains the composition, and After Effects must have access to the media files.

While working on a single computer with both applications installed and your media assets located on internal storage, this is achieved automatically.

If you use the Project Manager to collect files for a new Premiere Pro project, it will not bring copies of Dynamic Link files or duplicated audio files created when sending clips to Adobe Audition. Instead, you will need to make copies of the files yourself, in Windows or Mac OS. This is very easy to do: just copy the folder and include it with the assets already collected.

## **Review questions**

- 1. Why would you choose to make a clip offline?
- 2. Why would you choose to include handles when creating a trimmed project with the Project Manager?
- 3. Why would you choose the Project Manager option called Collect Files and Copy to a New Location?
- **4.** What does the Remove Unused option in the Edit menu achieve?

- 5. How can you import a sequence from another Premiere Pro project?
- **6.** Will the Project Manager collect Dynamic Link assets, such as After Effects compositions, when creating a new project?

#### **Review answers**

- 1. If you're working with low-resolution copies of your media files, you'll want to make your clips offline so you can recapture them or reimport them at full resolution.
- 2. Trimmed projects include only the parts of your clips used in sequences. To give yourself the flexibility to adjust your edit points later, you'd add handles; 24 frame handles would actually add 48 frames to the total duration of each clip, because one handle is added at the beginning and end of each clip.
- 3. If you have imported media files from lots of different locations on your computer, it can be difficult to find everything and stay organized. By using the Project Manager to collect all of the media files into one location, you'll make it easier to manage your project media files.
- 4. When you choose Remove Unused, Premiere Pro removes any clips from your project that are not used in a sequence. Remember, no media files are deleted.
- 5. To import a sequence from another Premiere Pro project, import the project file as you would import any media file. Premiere Pro will invite you to import the entire project or selected sequences. You can also browse inside project files with the Media Browser.

6. The Project Manager does not collect Dynamic Link assets when creating a new project. For this reason, it's a good idea to create any new Dynamic Link projects in the same location as your project folder or in a dedicated folder for your project. That way, it's easier to locate and copy the assets for the new project.

# 18. Exporting Frames, Clips, and Sequences

#### Lesson overview

In this lesson, you'll learn about the following:

- Choosing the right export options
- Exporting single frames
- Creating movie, image sequence, and audio files
- Using Adobe Media Encoder
- Exporting to Final Cut Pro
- Exporting to Avid Media Composer
- Working with edit decision lists
- Recording to tape



This lesson will take approximately 60 minutes.

One of the best things about editing video is the feeling you have when you can finally share it with your audience. Adobe Premiere Pro CC offers a wide range of export options to record your projects to tape or convert them to additional digital files.



Exporting your project is the final step in the video production process. Adobe Media Encoder offers multiple high-level output formats. Within those formats you have dozens of options and can also export in batches.

## **Getting started**

Nowadays, the primary form of media distribution is digital files. To create these files, you can use Adobe Media Encoder. Adobe Media Encoder is a stand-alone application that handles file exports in batches, so you can export in several formats simultaneously and process in the background while you work

in other applications, including Premiere Pro and Adobe After Effects.

#### Note

Premiere Pro can export clips selected in the Project panel, as well as sequences or ranges within sequences or the Source panel. The content that's selected when you choose File > Export is what Premiere Pro will export.

#### Overview of export options

Whether you've completed a project or you just want to share an in-progress review, you have a number of export options:

- You can select a whole sequence as a single file to post to the Internet or burn to a disc.
- You can export a single frame or a series of frames to post to the Internet or attach to an email.
- You can choose audio-only, video-only, or full audio/video output.
- Exported clips or stills can be reimported back into the project automatically for easy reuse.
- You can play out directly to videotape.

Beyond choosing an export format, you can set several other parameters as well:

• You can choose to create files in a similar format, and at the same visual quality and data rate as your original media, or you can compress them to a smaller size for

distribution on disc or the internet.

- You can transcode your media from one format to another to make it easier to exchange with other people involved in the post-production process.
- You can customize the frame size, frame rate, data rate, or audio and video compression techniques if a particular preset doesn't fit your needs.

You can use exported files for further editing, in presentations, as streaming media, or as sequences of images to create animations.

## **Exporting single frames**

While an edit is in progress, you may want to export a still frame to send to a team member or client for review. You might also want to export an image to use as the thumbnail of your video file when you post it to the Internet.

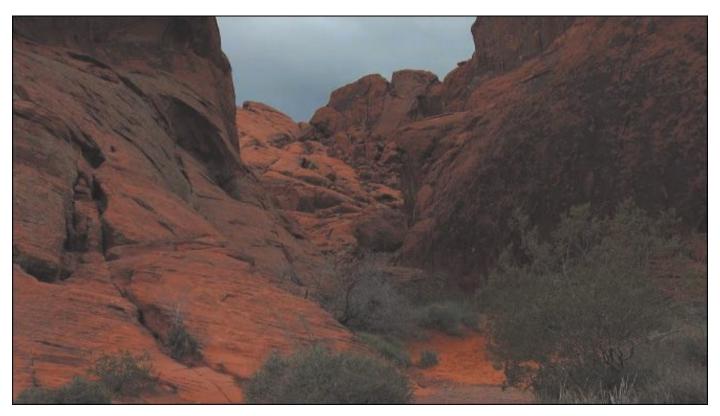
Premiere Pro makes exporting a still frame fast and easy.

When you export a frame from the Source Monitor, Premiere Pro creates a still image that matches the resolution of the source video file.

When you export a frame from the Program Monitor, Premiere Pro creates a still image that matches the resolution of the sequence.

Let's give it a try.

- **1.** Open Lesson 18\_01.prproj, from the Lessons/Lesson 18 folder.
- 2. Open the sequence Review Copy. Position the Timeline playhead on a frame you would like to export.



3. In the Program Monitor, click the Export Frame button ( ), on the lower right.

If you don't see the button, it may be because you've customized the Program Monitor buttons. You might also need to resize the panel. You can also select the Program Monitor and press Shift+E to export a frame.

Export Frame	
Name: Review Copy.Still001	
Format: TIFF	
Path: /Users/Maxim/Desktop	
Import into project	Browse
	Cancel OK

4. In the Export Frame dialog, enter a filename.

- 5. Use the Format menu to choose a still-image format.
  - JPEG, PNG, GIF, and BMP work well for compressed graphic workflows (like Internet delivery).

#### Note

In Windows, you can export to the BMP, DPX, GIF, JPEG, PNG, TGA, and TIFF formats. On the Mac, you can export to the DPX, JPEG, PNG, TGA, and TIFF formats.

- TIFF and Targa are suitable for print and animation workflows.
- DPX is often used for digital cinema or color-grading workflows.
- **6.** Click the Browse button to choose a location to save the new still image. Create a folder named **Exports** on the desktop, and select it.
- 7. Select the Import into Project option to add the new still image into your current project, and click OK.

#### Note

The music in this project is entitled "Tell Somebody," by Alex featuring AdmiralBob. Licensed under Creative Commons Attribution 3.0.

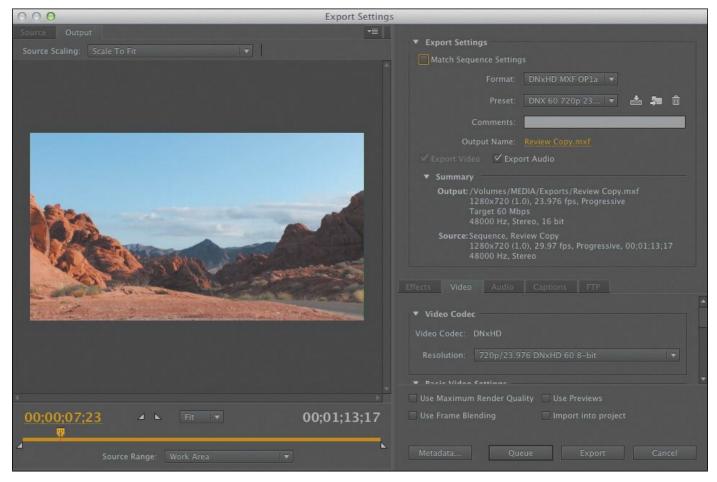
## **Exporting a master copy**

Creating a master copy allows you to make a pristine digital copy of your edited project that can be archived for future use. A master copy is a self-contained, fully rendered digital file output of your sequence at the highest resolution and best quality possible. Once it's created, you can use a file of this kind as a separate source, to produce other compressed output formats without opening the original project in Premiere Pro.

## Matching sequence settings

Ideally, the frame size, frame rate, and codec of a master file will closely match the sequence it's based on. Premiere Promakes this easy by offering a Match Sequence Settings option when you export.

- 1. Continue working with the Review Copy sequence in Lesson 18\_01.prproj.
- 2. With the sequence selected (in either the Project panel or Timeline panel), choose File > Export > Media.



The Export Settings dialog opens.

3. You'll learn more about this dialog later. For now, select the Match Sequence Settings check box.

Match Sequence Settings

4. The orange text showing the output name is actually a button that opens the Save As dialog. You'll find the same type of text-as-a-button in Adobe Media Encoder. Click the output name now.

Output Name: Review Copy.mxf

**5.** Choose a target (such as the Exports folder you created earlier), name the sequence **Review Copy 01.mxf**, and click Save.

### Note

In some cases, the Match Sequence Settings option cannot write an exact match of the original camera media. For example, XDCAM EX will write to a high-quality MPEG2 file. In most cases, the file written will have an identical format and closely match the data rate of the original sources.

6. Review the Summary information to check that the output format matches the sequence settings. In this case, you should be using DNxHD media (as MXF files) at 29.97fps. The Summary information is a quick, easy reference that helps you avoid minor errors that can have big consequences. If the Source and Output Summary settings match, it minimizes conversion, which helps maintain the quality of the final output.

```
▼ Summary
Output: /Volumes/MEDIA/Exports/Review Copy.mxf
1280x720 (1.0), 29.97 fps, Progressive
Target 75 Mbps
48000 Hz, Stereo, 16 bit
Source: Sequence, Review Copy
1280x720 (1.0), 29.97 fps, Progressive, 00;01;13;17
48000 Hz, Stereo
```

7. Click the Export button to create a media file based on the sequence.

## **Choosing another codec**

When you export to a media file, you can choose the codec that's used. Some camera formats (such as DSLR and HDV) are

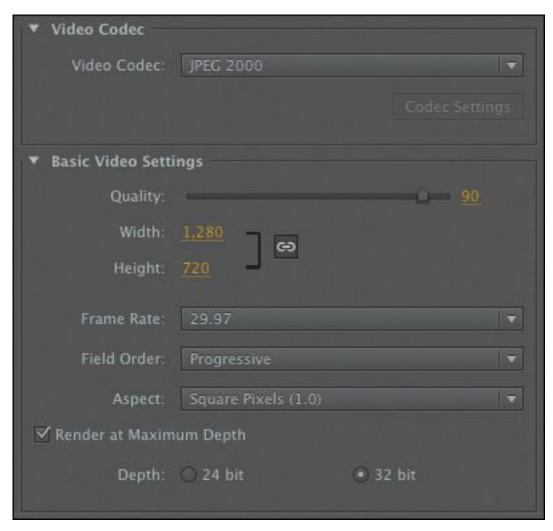
already heavily compressed. Using a higher-quality mastering codec can help to preserve quality.

- 1. Choose File > Export > Media or press Control+M (Windows) or Command+M (Mac OS).
- 2. In the Export Settings dialog, click the Format pop-up menu and choose QuickTime.

## Tip 🕟

If your sequence has a lot of items that are scaled (such as photos or mixed-resolution video, or if your output file will be lower resolution than your sequence), you can select the Maximum Render Quality option. This is much slower but produces excellent results when images are scaled smaller.

- 3. Click the output name (the orange text), and give the file a new name, **Review Copy 02.mov**. Save it to the same destination you used in the previous exercise.
- 4. Click the Video tab near the bottom of the window.
- 5. Choose a mastering codec that you have installed. One option that should be installed on your system is the JPEG2000 codec. This file produces a high-quality (but reasonably sized) file. Make sure the frame size and frame rate match your source settings. You might need to scroll down or resize the panel to see all the settings. Use the settings shown here.



6. Click the Audio tab and choose Uncompressed for the audio codec. In the Basic Audio Settings section, choose 48000 Hz as the sample rate, Stereo for Channels, and 16 bit for Sample Size. Set the Audio Track Layout to 1 Stereo Pairs.



7. Click the Export button at the bottom of the dialog to export the sequence and transcode it to a new media file.

# Working with Adobe Media Encoder

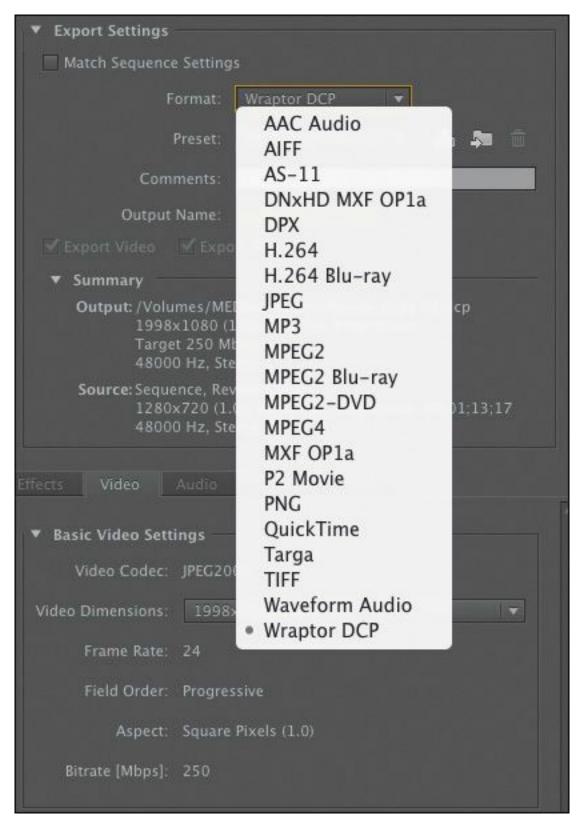
Adobe Media Encoder is a stand-alone application that can be run independently or launched from inside Premiere Pro. One advantage of using Adobe Media Encoder is that you can send an encoding job directly from Premiere Pro and then continue working on your edit as the encoding is processed. If your client asks to see your work before you finish editing, Adobe Media Encoder can produce the file without interrupting your flow.

# Choosing a file format for export

It can be a challenge to know how to deliver your finished work. Ultimately, choosing delivery formats is a process of planning backwards; find out how the file will be presented and

it's usually straightforward to identify the best file type for the purpose.

Very often, clients will have a delivery specification you must follow, making it easy to select the right options for encoding. Premiere Pro and Adobe Media Encoder can export to many formats; let's run through them quickly to identify when you should use them.



• AAC Audio: The Advanced Audio Coding format is the audio-only format that is most often used with H.264 encoding.

<sup>&</sup>quot;\*\*\*\*\*ebook converter DEMO - www.ebook-converter.com\*\*\*\*\*\*

- **AIFF:** The Audio Interchange File Format is an audioonly file format popular on the Mac.
- **AS-11:** This format is based on MXF (see below), with precise configuration for broadcast television delivery. If you're producing content for TV, you might be asked to deliver in this format.
- **DNxHD MXF OP1a:** This format is included primarily for providing compatibility with Avid editing systems. It is, however, a high-quality, cross-platform file format for professional editing.
- **DPX:** DPX (Digital Picture Exchange) is a high-end image sequence format for digital intermediate and special effects work.
- **H.264:** This is the most flexible and widely used format today, with many presets for devices such as the iPod and Apple TV and TiVo Series3 SD and HD, and for services such as YouTube and Vimeo. H.264 files can be played on smartphones or used as high-quality, high-bit-rate intermediate files for work in other video editors.
- **H.264 Blu-ray:** This option produces H.264 files configured specifically for Blu-ray Discs.
- **JPEG:** This setting creates a sequential series of still images.
- MP3: This compressed audio format is popular because it produces a relatively small file that still sounds good to the ear.
- MPEG2: This older file format is primarily used for DVDs and Blu-ray Discs. Presets in this group allow you

to produce files that can be distributed for playback on your own or other computers. Many broadcasters use MPEG2 as a format for digital delivery.

- **MPEG2 Blu-ray:** This creates a Blu-ray—compliant MPEG2 video and audio file for HD discs.
- **MPEG2-DVD:** This creates a DVD-compliant MPEG2 video and audio file for standard-definition discs.
- **MPEG4:** This produces lower-quality H.263 3GP files for playback on older cellphones.
- **MXF OP1a:** These MXF presets let you create files compatible with several systems, including AVC-INTRA, DV, IMX, and XDCAM.
- P2 Movie: This produces standard Panasonic P2 media.
- **PNG:** This is a lossless but efficient still-image format for Internet use or for image sequences that contain transparency. Unlike many still image formats, PNG files can include an Alpha channel.
- QuickTime: This container format can store media using one of several codecs. QuickTime files use the .mov extension, regardless of the codec. It is the preferred format for use on Macintosh computers.
- **Targa:** This is a rarely used uncompressed still-image file format. Like PNG files, Targa files can include an Alpha channel.
- **TIFF:** This popular high-quality still-image format offers both lossy and lossless compression options.
- Waveform Audio: This uncompressed audio file format is popular on Windows computers using the .wav formats.

• Wraptor DCP: If you're supplying content for digital cinema projection, the settings can be complex. This option produces a standard DCP file you can be confident will be accepted, with very few settings to choose between.

The following formats are available only on Windows:

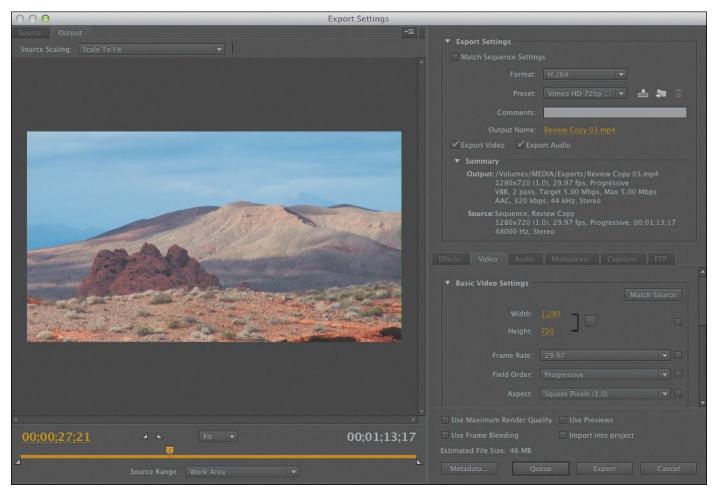
- **AVI:** Like QuickTime files, this "container format" can store files using one of several *codecs*. While not officially supported by Microsoft for a number of years, AVI files are still in widespread use.
- Windows BMP: This is an uncompressed, rarely used still-image format.
- Animated GIF and GIF: These compressed still-image and animated formats are used primarily on the Internet. They're available only on the Windows version of Premiere Pro.
- Uncompressed Microsoft AVI: This is a very high-bitrate intermediate format that is not widely used and is available only on the Windows version of Premiere Pro.
- Windows Media: This produces WMV files for playback using the Windows Media Player, and is ideal for Microsoft Silverlight applications (Windows only).

## Configuring the export

To export from Premiere Pro with Adobe Media Encoder, you'll need to queue the project. The first step is to use the Export Settings dialog to make choices about the file you're going to export.

- 1. If necessary, open Lesson 18\_01.prproj.
- 2. Make sure the Review Copy sequence is open, and go to File > Export > Media.
  - It's best to work through the Export Settings dialog from the top down. Choose your format and presets first, then pick the output, and finally decide whether you'd like to export audio, video, or both.
- 3. Choose H.264 from the Format menu. This is a popular choice for files you'll upload to online video websites.
- 4. In the Preset menu, choose Vimeo HD 720p 29.97.

  These settings match the frame size and frame rate of the sequence. The codec and data rate match the requirements for the <a href="Vimeo.com">Vimeo.com</a> website.



- 5. Click the output name (the orange text), and give the file a new name, **Review Copy 03.mp4**. Save it to the same destination you selected in the previous exercise.
- **6.** Examine the Summary information text to check your choices.

#### Note

The settings tabs displayed in the Export Settings dialog change depending on the format you choose. Most of the critical options are contained on the Format, Video, and Audio tabs.

Here's an overview of the various tabs displayed under

#### Summary:

- Effects: You can add a number of useful effects and overlays as you output your media (see a list of these options in the next section).
- **Video:** The Video tab allows you to adjust the frame size, frame rate, field order, and profile. The default settings are based on the preset you chose, but you can change them to anything you like.
- Audio: The Audio tab allows you to adjust the bit rate of the audio and, for some formats, the codec. The default settings are based on the preset you chose, but you can change them to anything you like.
- **Multiplexer:** These controls let you determine whether the encoding method is optimized for compatibility with a specific device (like an iPod or PlayStation Portable). This can also control if the video and audio are combined or delivered as separate files.
- FTP: This tab lets you to enter the details of an FTP server to which to automatically upload the new video file when it has finished encoding. If you create your own preset, this FTP information included. FTP (File Transfer Protocol) is a standard way to transmit files to a server.

### **Export effects**

As you export your media file, you can apply a Lumetri Look and add useful information overlays:

• Lumetri Look/LUT: Choose from a list of built-in Lumetri Looks, or browse to your own, allowing you to quickly apply a nuanced adjustment to the appearance of

your output file.

- **Image Overlay:** Add a graphic, like a company logo or network "bug," and position it onscreen. The graphic will be incorporated into the image.
- Name Overlay: Adds a text overlay to the image. This is particularly useful as a simple watermark to protect your content or as a way of marking different versions.
- **Timecode Overlay:** Display timecode for your finished video file, making it easy for viewers without specialized editing software to note reference times for commenting purposes.

All the effects you apply here are incorporated into the image.

## Source and Output panels

Moving to the left side of the Export Settings dialog, there's a Source Range drop-down menu. Use this menu to choose to export the entire sequence, a range you set by placing an In point and an Out point, a range set by the Timeline Work Area bar, or a custom region selected now using the small triangular handles and navigator directly above the menu.



In the upper-left corner of the Export Settings dialog are the Output and Source tabs. The Output tab shows a preview of the

video to be encoded. It's useful to view the video on the Output tab to spot errors such as unwanted letterboxing or distortion caused by the irregularly shaped pixels used in some video formats.

The Source tab gives access to basic cropping controls. Be sure to check the Output tab after making changes under the Source tab.

### Using the formats

Adobe Media Encoder supports many formats. Knowing which setting to use can seem a little overwhelming. Let's take a look at some common scenarios and review which formats are typically used. There are few absolutes, but these should get you close to the correct output. It's a good idea to test your output on a short section of your video before producing a full-length finished file.

- Encoding for DVD/Blu-ray: Generally, you'll use MPEG2 for shorter video projects—namely, the MPEG2-DVD preset for DVD and MPEG2 Blu-ray preset for Blu-ray Discs. The visual quality of MPEG2 is indistinguishable from H.264 in these high-bit-rate applications and encodes faster. However, the H.264 codec is more efficient, letting you fit more content into a smaller storage space.
- Encoding for devices: Use the H.264 format for current devices (Apple iPod/iPhone, Apple TV, Kindle, Nook, Android, and TiVo), as well as for

some generic 3GPP presets; use MPEG4 for older MPEG4-based devices. Be sure to check the manufacturer's specifications on their website.

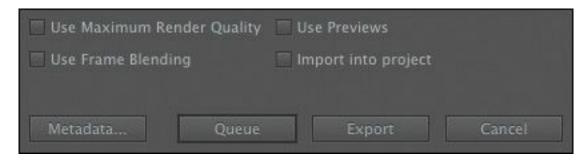
- Encoding for uploading to user-generated video sites: The H.264 format includes presets for YouTube and Vimeo in widescreen, SD, and HD. Use these presets as a starting point for your service, being careful to observe resolution, file size, and duration limits.
- Windows Media or Silverlight deployment: The Windows Media format is your safest option, though more recent versions of Silverlight can also play H.264 files.

In general, the Premiere Pro presets are proven and will work for your intended purpose. Avoid adjusting settings when using presets designed for devices or optical discs, because changes that seem subtle might make the files unplayable; hardware players have stringent media requirements.

Most Premiere Pro presets are conservative and will deliver good results with the default settings, so you probably won't improve the quality by tinkering.

## Queuing the export

When you're ready to create your media file, there are a few more options to consider.

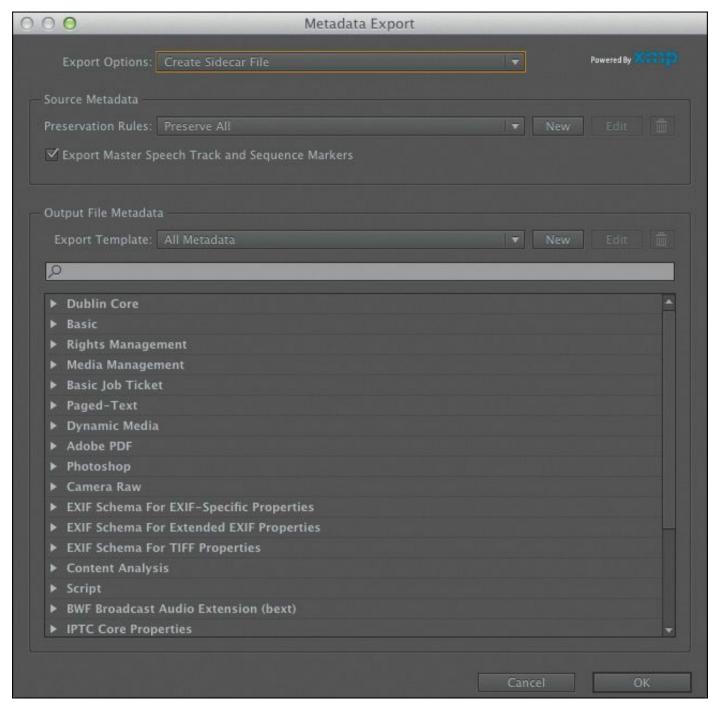


- Use Maximum Render Quality: Consider enabling this setting when scaling from larger image sizes to smaller image sizes. This option requires more RAM, which can dramatically slow down the output. This option is usually not needed except when scaling the image and seeking the highest possible quality.
- Use Previews: When you render special effects, preview files are produced that look like your original footage combined with the effects. If you enable this option, the preview files will be used as the source for the new export. This can save a significant amount of time that would otherwise be spent rendering the effects again. The result might be lower quality, depending on the sequence preview files format (see <a href="Chapter 2">Chapter 2</a>, Setting Up a Project).
- Use Frame Blending: Enable this option to smooth motion whenever you output to a different frame rate than your sequence settings.

#### Note

On the Video tab, you'll also find the option Render at Maximum Depth. This can improve the visual quality of your output by using greater precision to generate colors. However, this option can add significantly to the render time.

- Import into project: This option automatically imports the newly created media file into your current project. This is particularly useful when exporting freeze frames.
- Metadata: Click this button to open the Metadata Export panel. You can specify a wide range of settings, including information about copyright, creator, and rights management. You can even embed useful information such as markers, script, and speech transcription for advanced delivery options. In some cases, you may prefer to set the Metadata Export Options setting to None, removing all metadata from the newly created file.



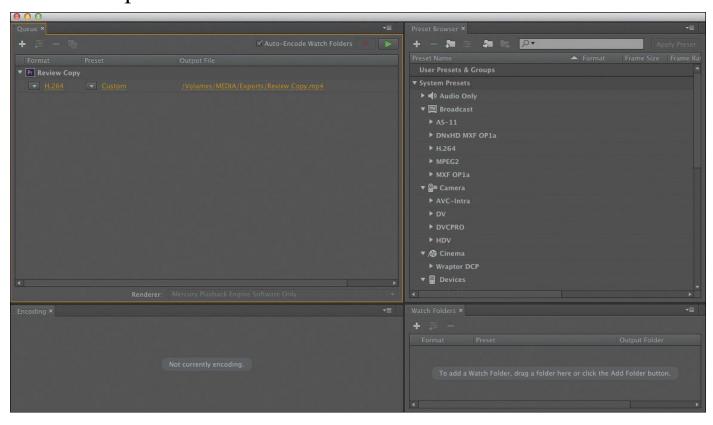
- Queue: Click the Queue button to send the file to Adobe Media Encoder, which will open automatically, allowing you to continue working in Premiere Pro while the export takes place.
- Export: Select this option to export directly from the Export Settings dialog rather than sending the file to the Adobe Media Encoder queue. This is a simpler workflow

and usually a faster export, but you won't be able to edit in Premiere Pro until the export is complete.

Click the Queue button to send the file to Adobe Media Encoder, which starts up automatically.

### Additional options in Adobe Media Encoder

Using Adobe Media Encoder brings a number of benefits. Although it involves a few extra steps beyond simply clicking the Export button in the Export Settings panel of Premiere Pro, the extra options are worth it.



### Note

Adobe Media Encoder does not have to be used from Premiere Pro. You can launch Adobe Media Encoder on its own.

Here are some of the most useful features you'll find in Adobe Media Encoder:

- Add additional stand-alone files: You can add standalone files to Adobe Media Encoder by choosing File > Add Source. You can even drag and drop files into it from Windows Explorer (Windows) or Finder (Mac OS).
- Import Premiere Pro sequences directly: You can choose File > Add Premiere Pro Sequence to select a Premiere Pro project file and choose sequences to encode (without ever launching Premiere Pro).
- Render After Effects compositions directly: You can import and encode compositions from Adobe After Effects by choosing File > Add After Effects Composition. Once again, you don't need to open Adobe After Effects.
- Use a Watch Folder: If you'd like to automate some encoding tasks, you can create watch folders by choosing File > Add Watch Folder and then assigning a preset to that watch folder. Media files placed into the folder are automatically encoded to the format specified in the preset.
- Modify a queue: You can add, duplicate, or remove any tasks by using the like-named buttons and dragging any tasks that haven't yet started encoding to any place in the queue. If you haven't set the queue to start automatically, click the Start Queue button ( ) to start encoding.

  Adobe Media Encoder encodes files in the queue one after another. You can add files to the queue after encoding has begun. You can even add files to the queue directly from

Premiere Pro while encoding is taking place.

• Modify settings: Once the encoding tasks are loaded into the queue, changing settings is easy; click the item's Format or Preset, and the Export Settings dialog appears.

### Note

If working with a professional mastering format (such as MXF OP1a, DNxHD MXF OP1a, or QuickTime), you can export up to 32 channels of audio where the format allows. The original sequence must use a multichannel master track with the corresponding number of tracks.

# Exchanging with other editing applications

Collaboration is often essential in video post-production. Premiere Pro can both read and write project files that are compatible with many of the top editing and color-grading tools on the market. This makes it straightforward to share creative work, even if you and your collaborators are using different editing systems.

# **Exporting a Final Cut Pro XML file**

The use of Final Cut Pro XML allows you to exchange a Premiere Pro project with many applications. You can bring your project directly into Final Cut Pro 7 or convert it to Final Cut Pro X using 7toX for Final Cut Pro from Assisted Editing. You can also export your project to applications such as DaVinci Resolve and Grass Valley EDIUS.

Some of your special effects and keyframes will not be supported by the Final Cut Pro 7 XML standard, so you should test this workflow to find out how much of your creative work can be shared using this system.

Exporting from Premiere Pro to Final Cut Pro—and importing the XML file into Final Cut Pro—is simple.

- 1. In Premiere Pro, choose File > Export > Final Cut Pro XML.
- 2. In the Save Converted Project As Final Cut Pro XML dialog, name the file, choose a location, and click Save. Premiere Pro will let you know if there were any issues exporting the XML file.

This file can now be imported into another application. You may need to batch import or batch capture the media into the other application and relink it.

## **Exporting to OMF**

Open Media Framework (OMF) has become a standard way of exchanging audio information between systems (typically for audio mixing). When you export an OMF file, the typical method is to create a single file with all your audio tracks inside. When the OMF file is opened by a compatible application, it will show all of the tracks.

Here's how to create an OMF file:

**1.** With a sequence selected, choose File > Export > OMF.



- 2. In the OMF Export Settings dialog, enter a name for the file in the OMF Title field.
- 3. Check that the Sample Rate and Bits per Sample settings match your footage; 48000 Hz and 16 bits are the most common settings.
- 4. From the Files menu, choose one of the following:
  - Encapsulate: This option exports an OMF file that contains the project metadata and all the audio files for the selected sequence.
  - **Separate Audio:** This option exports separate mono audio files into an omfiMediaFiles folder.
- 5. If you're using the Separate Audio option, choose between the AIFF and Broadcast Wave formats. Both are high quality, but check with the system you need to exchange with. AIFF files tend to be the most compatible.
- 6. Using the Render menu, choose either Copy Complete

Audio Files or Trim Audio Files (to reduce the file size). You can specify that handles (extra frames) be added to give you some flexibility when modifying the clips.

- 7. Click OK to generate the OMF file.
- **8.** Choose a destination, and click Save. You can target your lesson folder for now.

## **Exporting to AAF**

Another way to exchange files is by using the Advanced Authoring Format (AAF). This method is typically used to exchange both project information and source media with other NLE software, including Avid Media Composer.

Some of your special effects and keyframes will not be supported by the AAF standard, so you should test this workflow to find out how much of your creative work can be shared using this system.

- **1.** Choose File > Export > AAF.
- 2. In the Save Converted Project As AAF dialog, choose a location and click Save.
- 3. The AAF Export Settings dialog appears, giving you two new choices:
  - Save as legacy AAF: This makes a file more broadly compatible but doesn't support as many features.
  - **Embed audio:** This option attempts to embed audio into the file, a little like the similar OMF option, to reduce the need for relinking.
- 4. Click OK to save the sequence to an AAF file at the specified location. The AAF Export Log dialog opens to

## Working with edit decision lists

An edit decision list (EDL) is a simple text document with a list of instructions for automating editing tasks. The formatting follows standards that allow the EDL to be read by a number of different systems.

EDLs hark back to the days when small hard drives limited the size of your video files and slower processors meant you could not play full-resolution video. To remedy this, editors used low-resolution files in a nonlinear editor like Premiere Pro, edited their project, exported that to an EDL, and then took that text file and their original tapes down to a production studio. There they would use expensive switching hardware to create the finished, full-resolution product, usually from the original videotapes.

These days, there isn't much call for that kind of offline work, but filmmakers still occasionally use EDLs.

If you plan to use an EDL, you need to keep your project within some narrow guidelines:

• EDLs work best with projects that contain no more than one video track, no more than two stereo (or four mono) audio tracks, and no nested sequences.

- Most standard transitions, freeze frames, and clip-speed changes are supported.
- Premiere Pro supports a key track for titles or other content. That track has to be immediately above the video track selected for export as an EDL.
- You must capture and log all the source material with accurate and unique timecode information.
- The capture card used to batch capture the media must have a device control that uses a timecode.
- To ensure that there are no breaks in the timecode, videotapes must each have a unique reel number and be formatted with timecode (sometimes referred to as "striped") before you shoot the video.

To see the EDL options of Premiere Pro, choose File > Export > EDL, which opens the EDL Export Settings dialog.

EDL Export Settings	
EDL Title: Review Copy	ОК
Start Timecode: 00:00:00:00 🗹 Drop Frame	Cancel
☑ Include Video Levels ☐ Include Key Track	
✓ Include Audio Levels ✓ Include Transitions	
Use Source File Name Use Sound Roll/Sound Timecode	
Audio Processing: Audio Follows Video ▼	
Tracks To Export	
Video: Video 1 ▼	
Audio 1: Audio 1 ▼	
Audio 2: Audio 2 ▼	
Audio 3: Audio 3: ▼	
Audio 4: Audio 4 ▼	

Choose the tracks you would like to export, and select from the types of editing information you would like to be included, using the series of check boxes.

The EDL Title is not the file name. Rather, it's a title that appears in the first line of the EDL file. The title can be different from the filename. After clicking OK in the EDL Export Settings dialog, you'll have the opportunity to enter a filename.

When you're happy with the options, click OK. There are a few noteworthy settings:

• Start Timecode: The timecode value for the first

edit in the sequence.

- Include Video Levels: This includes video opacity levels in the EDL.
- Include Audio Levels: This includes audio levels in the EDL.
- Tracks To Export: Choose which tracks to export. The video track directly above the video track selected for export is designated as the key track.

### Using closed captioning

Video content can be enjoyed by more people when it is accessible. An increasingly used practice is to add closed captioning information that can be decoded by television sets. Visible captions are inserted into a video file and travel through supported formats to specific playback devices.

Adding closed captioning information is relatively easy as long as you have captions that have been properly prepared. Caption files are often generated with software tools such as MacCaption, CaptionMaker, and MovieCaptioner.

Here's how to add captions to an existing sequence.

- 1. Close the current project (do not save), and open Lesson 18\_02.prproj.
- **2.** Open the sequence NFCC\_PSA.
- **3.** Choose File > Import, and navigate to a

caption file (.scc and .mcc formats are supported). You'll find a sample file in the Lessons/Assets/Closed Captions folder.

The caption file is added to the bin as if it were a video clip, with a framerate and duration.

- **4.** Edit the closed captions clip to a track above all the clips in your sequence.
- 5. Click the Settings menu button in the Program Monitor ( ), and choose Closed Captioning Display > Enable.
- 6. Play the sequence to see the captions. If your captions don't display properly, click the Settings menu button in the Program Monitor and choose Closed Captioning Display > Settings. Make sure the settings match the file type you're using. In this case, use the CEA-608 option.



#### Note

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### Credit Counseling.

7. You can adjust the captions using the Captions panel (Window > Captions). You can adjust the timing and formatting of captions using the panel's controls.

#### Note

Using the Button Editor, you can customize the Program Monitor by adding a Closed Captioning Display button for easy access to toggling viewable captions.

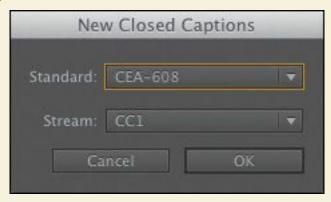
You can also create your own closed captions right within Premiere Pro.

1. Choose File > New > Closed Captions. The New Closed Captions dialog opens.



2. The default settings are based on your current sequence. These are fine, so click OK.

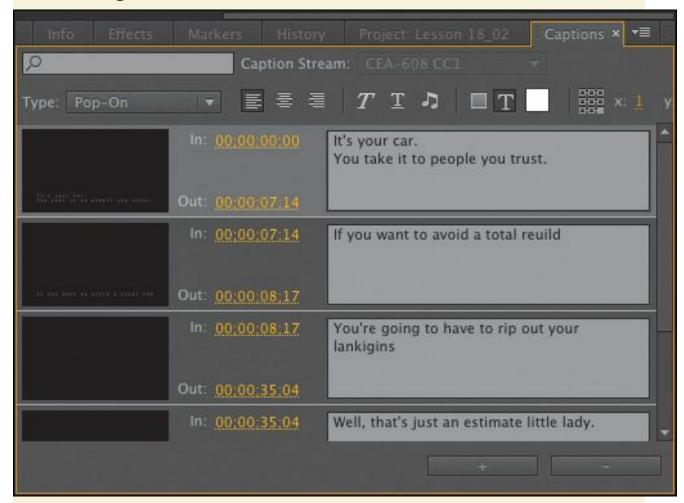
**3.** Another dialog opens, asking for advanced settings for broadcast workflows.



CEA-608 (also known as Line 21) is the most commonly used standard in countries that use the NTSC broadcast standard. The TeleText option (Line 16) is used in PAL countries. This clip is NTSC, so for this clip choose CEA-608.

- 4. Choose CC1 from the Stream menu to set this as the first stream of closed captions (up to four streams can be added). Click OK. The Closed Captions clip is added to the Project panel.
- 5. Edit the new closed caption clip onto the Video 2 track. It will be too short for the sequence (by default it is 3 seconds long).
- 6. Select the closed caption clip on the Timeline, and go to the Captions panel (Window > Captions).
- 7. Enter text that matches the dialogue and/or narration being spoken, then click the + button at the bottom of the panel to add another caption.

- 8. Adjust the In and Out durations for the caption to adjust its length for each caption block.
- **9.** Use the formatting controls at the top of the Captions panel to adjust the appearance of each caption.



As the total length of captions gets longer, the clip contents will get longer. You'll need to trim the clip in the sequence longer to see the new contents.

## Recording to tape

Although tape is becoming less and less common, there are industries and parts of the world where it remains the preferred

output method. For example, many broadcasters require master tapes on formats like HDCAM SR or DVCPRO HD. If you shot on a format like DV or HDV, tape is a popular choice for backing up a project.

If you own a tape deck or camera, you can use the project Lesson 18\_03.prproj. This contains both a DV sequence and an HDV sequence that can be output.

## Preparing a project for tape output

To play a sequence out to tape, you need to be able to play it back perfectly. This means no dropped frames or unrendered effects. You'll need to ensure that you have fast enough hard drives and a well-tuned machine. Here are a few things to check:

- **Device Control settings:** Make sure Premiere Pro can see your recording deck. Open Premiere Pro Preferences and choose Device Control. In the Devices menu, choose the appropriate type of device control for your deck. Click the Options button and attempt to match your device as closely as possible. If you're using a professional deck or third-party capture card, you may need to install additional drivers.
- Audio channel assignments: You should check that the audio channels in the sequence are assigned to the correct output. Some decks, like DV, allow for only two channels of audio, whereas other formats can support 4, 8, or even 16 channels. Using the Audio Mixer, you can assign each audio track in your sequence to a specific output.

## Preparing a tape for output

Tapes need to be prepared. Typically, this is called *striping* or *blacking* a tape. This process sets the control track and timecode on the tape and ensures that it's ready to record to.

The process varies greatly from deck to deck, so be sure to check the owner's manual of your hardware. It's common to start a tape at 00:58:00:00 to accommodate bars, tone, slate information, and a countdown, with the primary video starting at exactly 1:00:00:00.

## Recording to a DV or HDV deck

Out of the box, Premiere Pro has the ability to connect to a DV or HDV deck, provided your editing system has a FireWire port. If you captured your original video from DV or HDV tape, you may want to write the finished project back to tape for safekeeping. If so, follow the steps listed here:

- 1. Connect your DV or HDV camcorder to your computer, just as you did when you captured the video.
- 2. Turn it on, and set it to VCR or VTR (not to Camera mode).
- 3. Cue the tape to where you want to start recording.
- 4. Open the sequence you want to record.
- 5. Choose File > Export > Tape (DV/HDV) for Firewire connected devices or File > Export > Tape (Serial Device) for Serial interface connected devices.

If you're working with a DV camcorder, you'll see the Export to Tape dialog.

Here's a rundown of the options:

- Activate Recording Device: When you select this option, Premiere Pro will control your DV device. Deselect it if you want to record to a device that you'll control manually.
- Assemble at timecode: Select this option to pick an In point on the tape where you want recording to begin. When this option is not selected, recording will begin at the current tape location.
- **Delay movie start by** x **frames:** This is for the few DV recording devices that need a brief period of time between receiving the video signal and recording it. Check your device's manual to see what the manufacturer recommends.
- **Preroll** x **frames:** Most decks need little or no time to get to the proper tape-recording speed. To be on the safe side, select 150 frames (5 seconds), or add black video to the start of your project.

The remaining options are self-explanatory.

**6.** Click Record (or Cancel if you don't want to make a recording).

If you haven't rendered your project (by pressing Enter [Windows] or Return [Mac OS] instead of the spacebar for playback), Premiere Pro does so now. When rendering is complete, Premiere Pro starts your camcorder and records your project to it.

If you're working with a professional video deck with RS-422 device control, you can use the Edit To Tape window, with more detailed options, by choosing Window > Edit To Tape.

## Using third-party hardware

Video I/O (Input/Output) devices are available from companies such as AJA, Blackmagic Design, Bluefish444, and Matrox. These cards give you the connections you need to connect professional-quality video decks to your computer.

The following features are useful when working with professional decks:

- **SD/HD-SDI:** Serial Digital Interface (SDI) carries standard-definition or high-definition video and up to 16 channels of digital audio. Over a single cable, you can output your video to a deck, as well as all of the audio that you might need.
- Component video: Some decks still rely on other connection types. You can use component video for both analog (Y'PrPb) and digital (Y'CbCr) connections. Component connections can carry only a video signal, not audio.
- AES and XLR audio: If you're not relying on an embedded SDI audio signal, then many decks also offer dedicated audio connections. The two most common are AES (either XLR or BNC types) and analog XLR audio.
- **RS-422 deck control:** Professional decks employ a type of device control known as RS-422. This serial connection is used for frame-accurate control of the deck.
- **HDMI:** Although it is not used that widely for professional video production, HDMI connections are increasingly popular for monitoring.

### Tip 👅

To learn more about supported hardware cards, visit

www.adobe.com/products/premiere/extend.html.

## **Review questions**

- 1. What's an easy way to export digital video if you want to create a self-contained file that closely matches the original quality of your sequence?
- 2. What Internet-ready export options are available in Adobe Media Encoder?
- 3. What encoding format should you use when exporting to most mobile devices?
- 4. Must you wait for Adobe Media Encoder to finish processing its queue before working on a new Premiere Pro project?

#### **Review answers**

- 1. Use the Match Sequence Settings option in the Export dialog.
- 2. This varies by platform. Both operating systems include H.264 and QuickTime, and the Windows version includes Windows Media as well.
- 3. H.264 is the encoding format used when exporting to most mobile devices.
- 4. No. Adobe Media Encoder is a stand-alone application. You can work in other applications or even start a new



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- 3. The downloadable files will be listed under Lesson &

Update Files tab on your Account page (see image below).



**4.** Click each file link to download it to your computer. You should end up with eight files (the filename suffix "ZIP" may not be visible on your system, depending on your preference settings):

Project\_Files.zip

Assets.zip

Video\_Audio\_1.zip

Video\_Audio\_2.zip

Video\_Audio\_3.zip

Video\_Audio\_4.zip Video\_Audio\_5.zip Video Audio 6.zip

5. Double-click each file to de-compress it (modern Mac and Windows systems will open ZIP files without any extra software). Each ZIP file opens to create a folder of the same name. Once you have finished this step, you can delete the ZIP files or move them to another storage location to free up space on your main drive.

Important: The files need to be arranged into a specific folder hierarchy in order for Premiere Pro to connect the footage files we have provided (the actual video and audio clips, graphics, etc.) with the project files that you will edit in each lesson. Follow these steps carefully:

- **6.** Create a new folder named Lessons in a convenient spot on your hard drive.
- 7. Drag the folder Assets (created when you decompressed Assets.zip) into the new Lessons folder. Open the Assets folder to reveal its contents.
- **8.** Locate the folder Video and Audio Files in the Assets folder and open it.
- 9. Return to the files you downloaded and unzipped and find the folder named Video\_Audio\_1. Open it and drag its contents into the Assets folder.
- 10. Repeat step 9 for each of the other five folders whose name begins with "Video\_Audio". When you're done, your Assets folder should look like this:



11. Return once more to your downloaded files and find the folder Project\_Files. Open this folder and drag its contents into the Lessons folder so the folders Lesson 01, Lesson 02, etc. reside at the same level as Assets. Here's how your Lessons folder should look:

▶	Ass	ets
▶	Les:	son 01
▶	Less	son 02
$\triangleright$	Les:	son 03
▶	Les:	son 04
▶	Les:	son 05
⊳	Les:	son 06
•	Les:	son 07
▶	Les:	son 08
⊳	Les:	son 09
▶	Les:	son 10
▶	Les:	son 11
▶	Les:	son 12
▶	Les:	son 13
▶	Les:	son 14
⊳	Les:	son 15
⊳	Les:	son 16
▶	E Les	son 17
⊳	Les:	son 18

For more information on working with these files, go to the <u>Getting Started</u> section at the front of the book. Ebook customers can disregard the section Copying the lesson files.

The Premiere Pro projects included in the folders Lesson 01, Lesson 02, etc., have links to specific media files in the Assets folder. Because you are copying the files to a new location, those links may need to be updated when you open projects for the first time.

If you open a project and the Link Media dialog may open, please see the section <u>Relinking the lesson files</u> in <u>Getting Started</u> for instructions.

If you are unable to locate the files for this title by following the steps above, please email <a href="mailto:ask@peachpit.com">ask@peachpit.com</a> and supply the code from step one. Our customer service representatives will assist you as soon as possible.