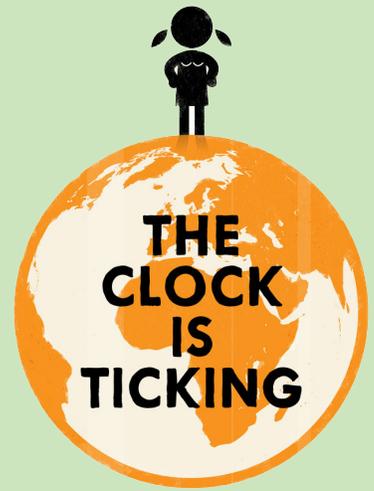




presents



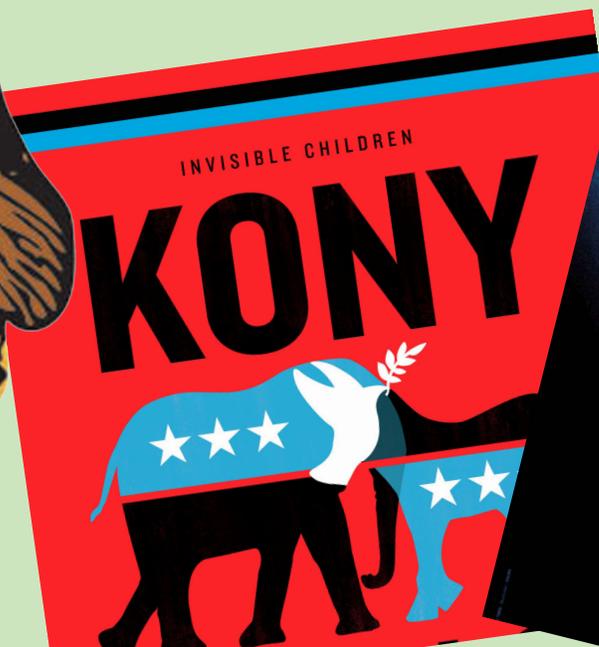
Upstream 2012

Video Production Workshop

Creating Powerful Social Media Content for Nonprofits

September 12 - October 3, 2012

Sponsored by



About



We are a Seattle-based nonprofit organization that uses art, technology and digital storytelling to spread important ideas and support innovative grassroots organizations in disadvantaged communities around the world.



Reaching under-served populations with transformative digital content

ChangeStream Media reaches out to populations that are suffering from poverty, marginalization, or exclusion from the free flow of knowledge. Working with local organizations, we identify, document, and share ideas that make a substantial impact. Our multimedia productions transcend literacy barriers and couple important messages with memorable images, music, or stories. This content reaches disadvantaged populations through direct interventions, such as film screenings and photography installations. These evocative platforms spark dialogues, helping messages ripple through communities.

Helping charitable organizations spread ideas and reach a global audience

Many organizations on the frontlines of the war on poverty, illness and environmental degradation have brilliant ideas for solving local problems, but lack the resources to broadcast their solutions. ChangeStream Media partners with these types of groups to amplify their messages in their local communities. In addition, groups can use multimedia content in outreach to potential supporters. We also build the capacity of our partner organizations' staff to use digital

storytelling. Effective storytelling helps partner organizations attract the technical advice, volunteers and funding they need.

Empowering volunteers to provide media services and share content

To expand operations and reach communities across the globe, ChangeStream Media trains new media volunteers from Seattle and beyond, helping them to plan and execute their own media-centered service projects. We also offer independent volunteer packages that allow travelers to connect with other cultures and share ChangeStream Media content.

ChangeStream Media is an Associated Program of Shunpike, a 501(c)(3) nonprofit art service organization.



Meet the Trainers



ChangeStream Media's Executive Director Denise Miller is thrilled to direct an organization dedicated to creating positive social change through storytelling and volunteer efforts. With a degree in broadcast journalism and experience as an award-winning reporter for the Snoqualmie Valley Record in Washington, she has worked with nonprofits for many years, from coordinating a mentoring program for at-risk youth in LA to work with Junior Achievement in Seattle, before co-founding ChangeStream Media in 2010.



ChangeStream Media's Chief Operating Officer Sean Koenig has a long history of working at the intersection of media and charitable projects. As the canvass director of the Miami office of the Fund for Public Interest Research nonprofit, Sean trained hundreds of employees, organized rallies, held press conferences, and lobbied members of congress. By co-founding ChangeStream Media, Sean puts his diverse skill set to work for communities and grassroots organizations creating a better tomorrow.



Aubrie Campbell Canfield is the founder and production manager of Actuality Media, a philanthropic production company that organizes study abroad experiences in developing countries, where students create short documentaries about changemakers. Working in and out of Hollywood for 10 years, she has become familiar with every stage of filmmaking and overall project management. Co-founding Actuality Media with her husband, Aubrie set out to create a 'for impact' organization that tells stories that matter.



TJ Williams Sr. has over 30 years of professional production experience as an editor, operator, cinematographer and a shooter/director. He has worked as a DP on feature films and as a camera operator on shows like Good Morning America, Dateline and Northern Exposure. His production company, Camera-Person.com, specializes in highly technical shots involving cranes, aerial mounts, and Steadicam systems. Tom has a passion for teaching, and is an active member of DocuTalk at the 911 Seattle Media Arts Center.



Jay Windland is a freelance videographer and editor with his own production company, Jay Windland Creative Services. He has experience working as a part of a crew on commercial productions and as a one-man-band working with small businesses, artists, and nonprofits. His recent projects include music videos, short films and web content. Jay is currently volunteering with ChangeStream Media to produce a video telling the story of a woman living with HIV in Honduras.



Hannah Whitmore sits on ChangeStream Media's board of directors and has been active in media productions and training volunteers. She has over a decade of experience working in media, with documentary film projects taking her to Central America, Africa and Asia. Hannah also served as the Media Integration Coordinator for Tincan, a Washington nonprofit that uses information technology and interactive media for education and community development.

Commonalities



Attendees' names and organizations are arranged in a circle. Try to find connections with four or more other people here - same college, same hobbies, number of pets, or favorite restaurant? We'll go around the room and see what we have in common...

Abby Stepaniak
World Affairs Council of Seattle

Stephanie Toby
Street Yoga

Angie Hinh
Northwest Kidney Centers

Stephanie Moore
Artist Trust

Anne Pedersen
Provail

Scott Taylor
Zero Waste Washington

Colina Barlow
Bike Works

Rachel Paris-Lambert
World Affairs Council of Seattle

David Walega
Art for Animals' Sake

Mitch Hunter
Out In Front; Seattle Unity: in toto

Lissa Eng
Seattle Chinatown International District
Preservation and Development Authority

Loren Drummond
Washington Trails Association

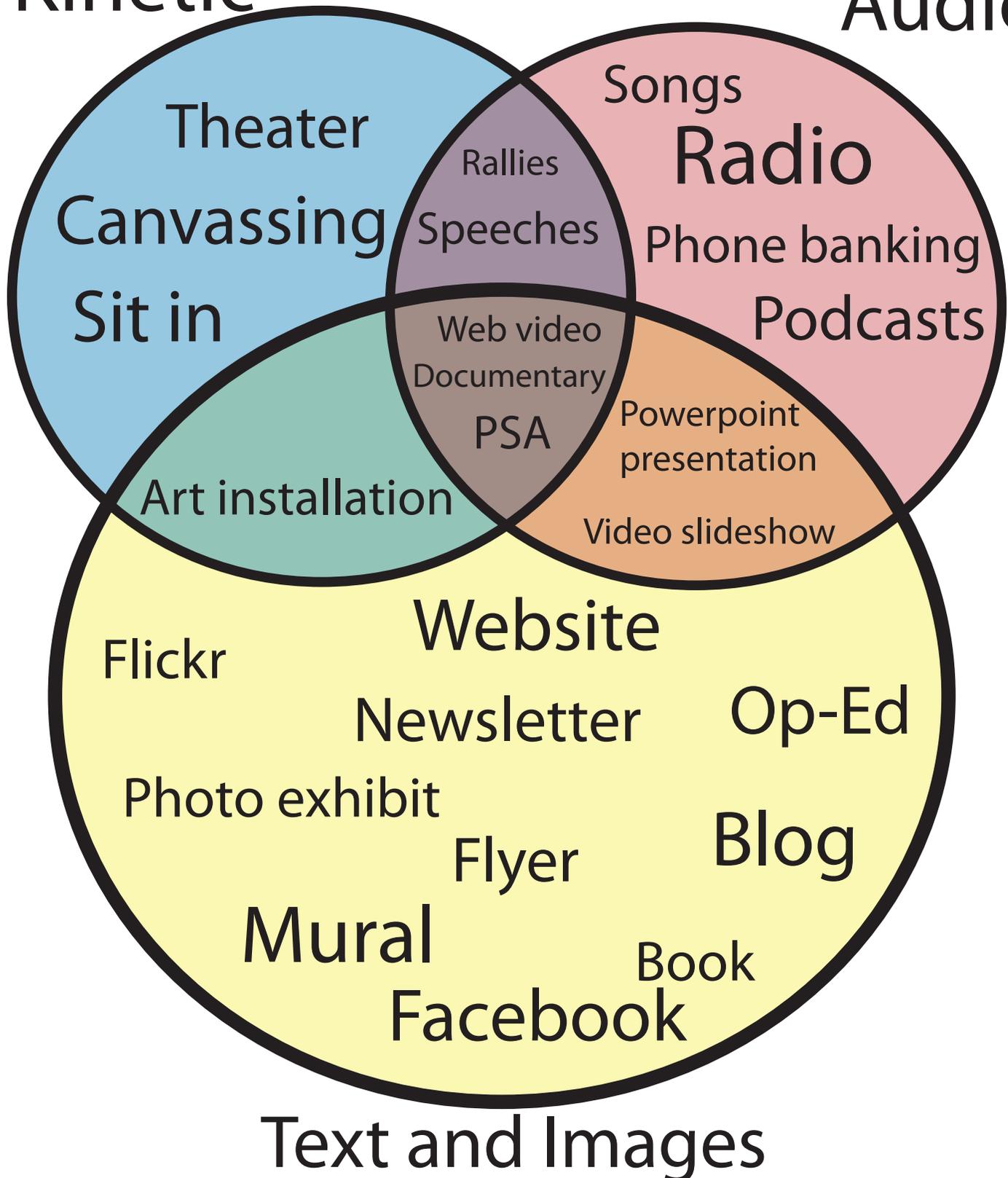
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Modes of Nonprofit Engagement

Kinetic

Audio



Advantages of Video

Emotional Impact

- People are hardwired to read emotions in facial expressions and vocal intonation
- Music, colors and visual aesthetics strongly influence how content is perceived
- Has a level of authenticity due to the difficulty of video manipulation



Diverse Audiences

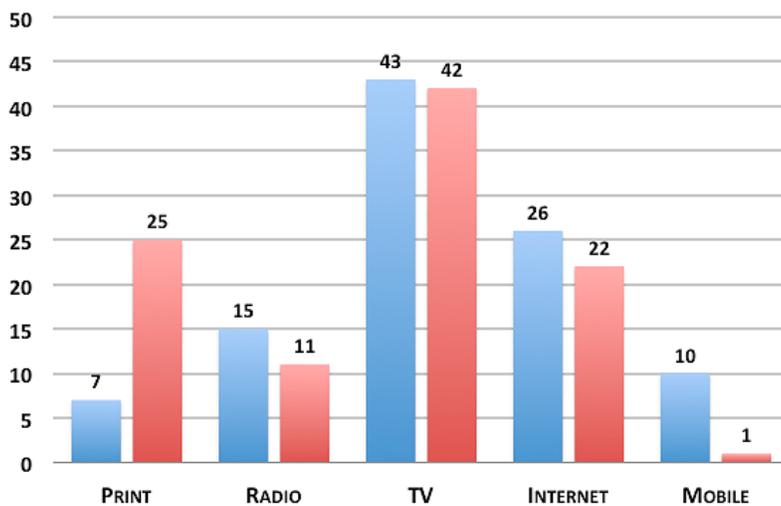
- Can overcome literacy and fluency barriers
- Playable alone on your own schedule or at an event creating a shared experience
- Fairly long shelf life

Creative Possibilities

- Can be very factual with text, graphs, and maps
- Can be authoritative with interviews and archival material
- Can be light, humorous or silly using music or animation
- Can run from a 30-second PSA to a 90-minute documentary



THIS IS WHERE YOU SPEND YOUR ATTENTION.
THIS IS WHERE THEY SPEND THEIR ADVERTISING.



2012 data by Mary Meeker

Effective

- Most commercial ad dollars are spent on TV
- Look at how political campaigns are waged
- Legitimizes your organization

Disadvantages of Video

Challenging to Create

- Must be careful to get permissions
- Time intensive
- Can be intrusive at events



Our Nonprofit is Changing the World!



Challenging to Distribute

- Hard to target audience, location
- Quickly irrelevant for rapidly changing information
- Must publicize, especially the first 500 clicks

Challenging to Watch

- Requires total attention - you can't watch while driving a car or cooking
- Can't easily skip to the part that interests you
- If information comes out too fast or too slow, viewers will move on



Goal and Audience

Goal

- Fundraising
- Sway public opinion
- Recruit volunteers
- Educate
- Build group morale
- Build web presence

Questionnaire

How does your organization pay the bills: Grants, contracts, earned income, small donors, large donors, membership dues? How can video energize your funding base?

What changes to public opinion or policy would your group like to spur? Are they attitudinal, behavioral, legislative?



How does your group use volunteers? What kinds of skills do you need and how many people are you trying to mobilize?



What questions or misconceptions does the general public have about your cause? What expertise do you have to share?

Who are you trying to reach? Donors, volunteers, general public, decision makers, at-risk communities, members?

Audience

- Who will see this video?
- What assumptions are you making about them?
- How will they find out about this video?

What is your audience's level of engagement? Are they already interested in your issue? Do they already know about the problem? Have they heard about your organization?



What is your distribution plan for getting your organization's video content seen? Email, embedding in the website, showing at a meeting, playing on public access TV, QR codes on print media?

How hard is your group to find on the web? If you type your group's name into YouTube, are you the top hit? What if you type in "Seattle" and your cause?

Selecting an Aesthetic

Trope

- Documentary
- Music video
- Advertisement/PSA



Tone

- Serious
- Humorous
- Quirky
- Artistic



Cinematography

- Jumpy or static
- Soft or crisp
- Bright or grungy
- Modern or traditional



Original or referential?

Questionnaire:

What movies, advertisements, or web videos really impacted you? What about them made you rethink a belief or change a habit?

List the first three viral videos or internet memes that come to mind, then why you think they are so memorable or shareable.

Thinking about the goal of the video and the audience you are trying to reach, what style of video do you think would be most effective?

Dramatic Elements

Characters

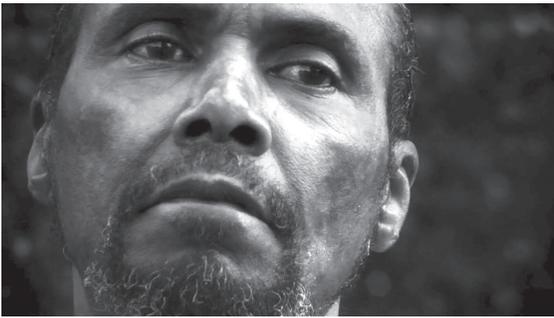
- Charismatic speaker?
- Earnest beneficiary?
- Respected authority?

Conflict

- Opposition?
- Deadline?

Stakes

- Consequences of inaction
- Potential benefits to the community



Plot

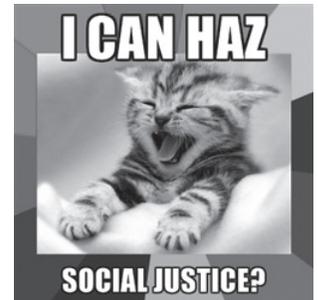
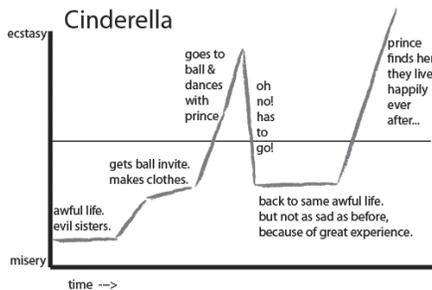
- What changes in the video?
- Resolution or no resolution?

Factual content

- Statistics
- Graphs
- Teaching a skill
- Explaining a mystery

Entertainment

- Graphics or animations
- Catchy soundtrack/ lyrics
- Humor



Activity

Brainstorm who or what you would use for each of the dramatic elements (feel free to skip any that don't make sense for your organization)

Your Organization's Assets

Brainstorm where your organization stands right now

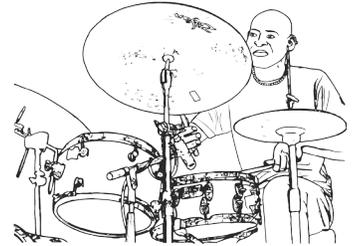
People

Actors



Musicians

Tim plays guitar



Writers

Photographers



Graphic designers

Web/IT folks



Resources

Equipment for video, still and audio capture

Filming locations

Video/photos you already have

Content on your website or in your annual report

Budget



Ideas for growing your creative capacity

- Tap the talents of your members and volunteers
- Solicit in-kind donations from stores (especially rental stores!)
- Rent gear from a local or online studio for events
- Hire local videographers who specialize in nonprofits

Scripting and Interviewing

To script or not to script...

Some questions to ask:

- Are your speakers confident and polished?
- Is the speaker part of your organization?
- Will the speaker be on camera for long periods of time?



"Why? You cross the road because it's in the script—that's why!"

Advantages

- On message
- Dense with information
- Easier to edit

Drawbacks

- Can sound robotic and inauthentic
- Obvious reading on camera looks bad
- Looks contrived

Alternatives

- Use text or narration instead
- Write a script, but then have interviewee speak from the heart
- Run it like an interview, but have them rephrase parts that need condensing

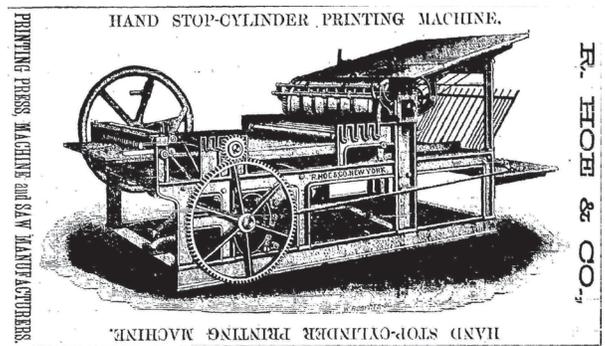
Interviewing Techniques

- Plan out questions in advance
- Open-ended questions are usually best
- Have subject speak in complete sentences and paragraphs
- Use simple prods: Really? Uh-huh? Tell me more!
- Location, dress, and what they're doing are as important as what they say



Storytelling Templates

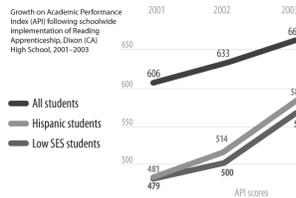
The ways in which you can tell your story are only limited by your imagination. Here are a few basic templates to use as a warm up. You can feel free to use them, or come up with your own artistic vision!



Now you try!

Sample content template

- Problem _____ Teenage illiteracy _____
- Good idea _____ Peer tutoring _____
- How it works _____ Top students help failing students learn _____
- Why _____ Tutors earn scholarship money for results _____
- The action _____ Join us as a tutor today _____

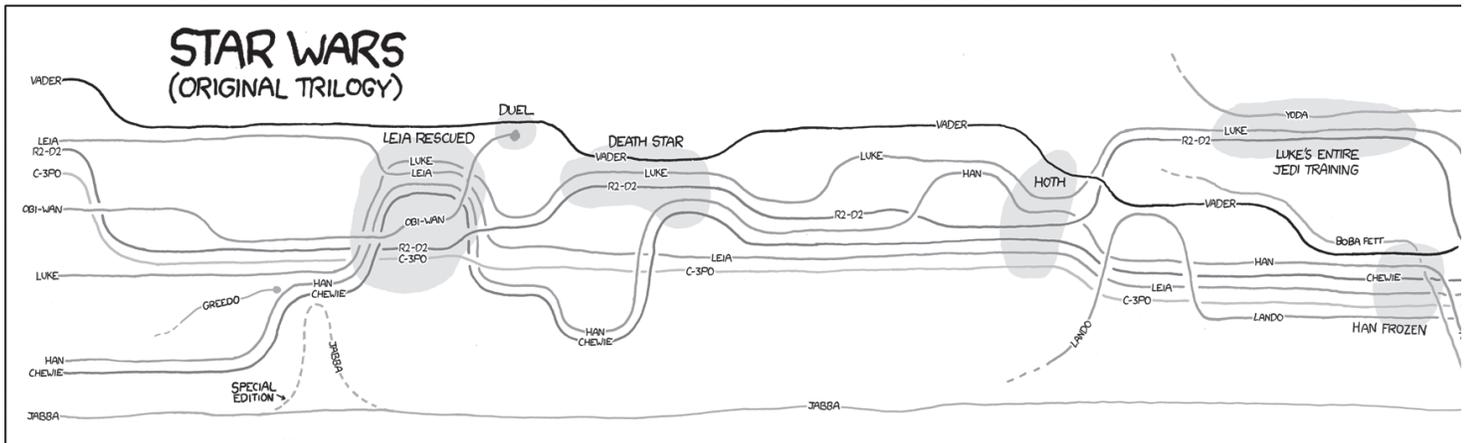


Now you try!

Sample visual template

- Hook _____ 30% of Seattle teens don't read at grade level _____
- Title slide (the org) _____ Seattle Tutors are working to change that _____
- Speaker _____ Mandy has dyslexia and fell behind in reading. Her tutor helped, and now she mentors others _____
- Montage _____
- Closing slide (action) _____ Become a tutor today! _____

Story Line



Choosing a story line is the most crucial decision you will make as a video creator. Put simply, what happens in your video? One Hollywood pitch guideline says you must condense your idea to 25 words or less as a way of getting to the core of your narrative.

Here are some summaries of recent ChangeStream Media productions:

- A smartphone uses social media talents to confront societal problems by amplifying innovative ideas.
- A teacher out of the US for the first time has life-changing adventures in Honduras, and is put in charge of a volunteer program.
- An indigenous woman in Guatemala visits isolated villages, inspiring women to improve their lives through healthy diets and civic participation.

Activity

Think of story lines within your organization. Try writing them out as a short sentence or two.



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"Well, it's official: all the original novel plots have been used up. The World Writers' Guild has initiated an emergency recycling plan..."

Planning Your Video Production

Here is our video planning document. See if you can sketch out an idea for your video based on the resources you've identified in this session.

Project name: [descriptive working title]

Project manager: [you]

Goal: [what are you trying to accomplish?]

Audience: [who are you trying to reach?]

Genre: [what aesthetic style will you use?]

Story line: [what happens in your video?]

Shot list: [who, when, where, and what are you going to film?]

-**Interviews:** [often the main source of your audio content]

-**Events:** [activities your organization does]

-**B-roll:** [set up shots, historical footage, usually with minimal audio]

Audio: [includes music, voiceover, sound effects, etc.]

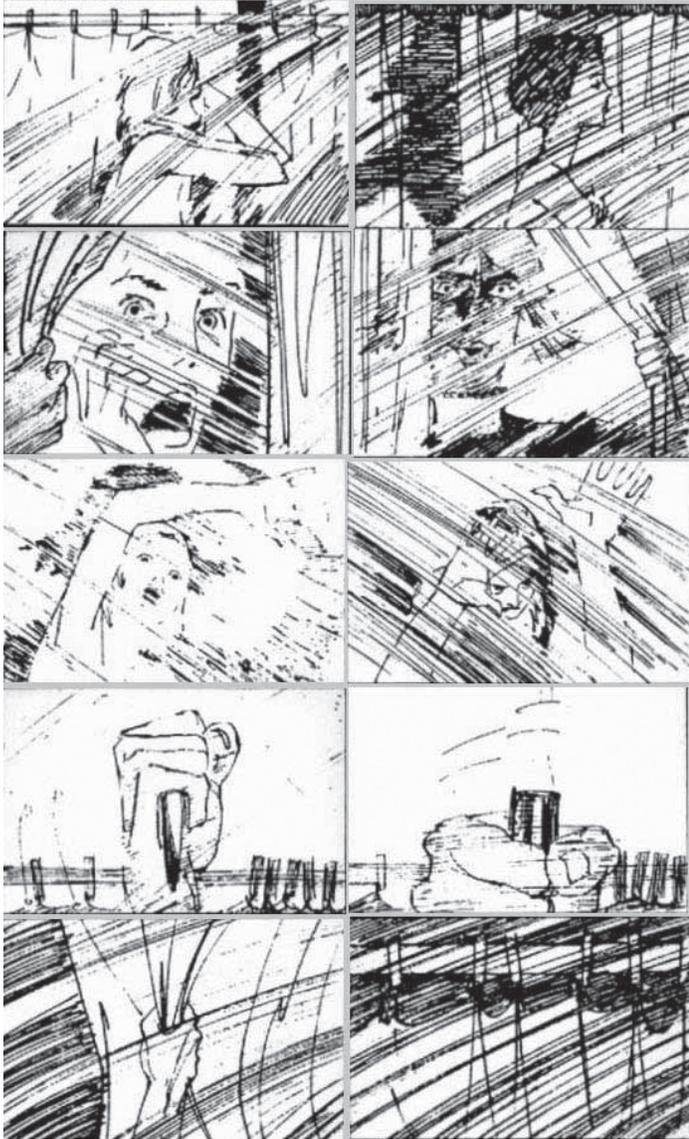
Images: [your logo, photos, drawings, maps]

Facts/graphs/stats: [verifiable information with sourcing]

Distribution plan: [how will people see what you create?]

Advanced: Storyboarding

The clearer your vision for the video production the easier it will be to film and edit. Sometimes having a clear vision will be impossible or unwise. Live events can't have second takes and good interviewees often come up with expressions superior to any script. But if you are doing a scripted production like a skit or puppet show, it can pay to go one step further. Storyboarding consists of visualizing and sketching out what each scene is going to look like. That way your artistic vision is very clear to the actors and anyone who helps you edit the piece.



Exercise

Watch a short YouTube video and convert it to a storyboard.

Tips

- Run your vision past other stakeholders
- Realize that a lot will change even with a clear vision
- Search the web for similar content to inspire you
- Be open to a fantastic storyline emerging during filming
- Think through where the cameras, mics and lights will go, too

Actors and Releases

Best practices

Anyone who speaks on camera or is identifiable in the video should sign a release form. Parents should sign release forms for minors. While this can be awkward at first, it establishes you as a professional and gives you maximal legal protection.



Legal minimum

According to the Citizen Media Law Project, citimedialaw.org,

In Washington, you can satisfy the consent requirement by “announc[ing] to all other parties engaged in the communication or conversation, in any reasonably effective manner, that such communication or conversation is about to be recorded or transmitted,” so long as this announcement is also recorded. Wash. Rev. Code § 9.73.030(3).

CROWD NOTICE / RELEASE

Please be aware that by entering this area, you consent to your voice and likeness being used without compensation in films and tapes for exploitation in any and all media, whether now known or hereafter devised, and you release 20th Century Fox, its successors, assigns and licensees from any liability, on account of such usage. If you do not wish to be subject to the foregoing, do not enter this area. Thank you for your attention.

For example, put up a sign saying you are filming if in public. And get in the habit of recording people’s names and permissions at the beginning of interviews.

Reality checks

It is unlikely that a staff member or volunteer who is knowingly participating in your video project will take legal action against a sympathetic portrayal of their work. These are also the easiest people to get release forms from, though, and it would be lazy not to.

Many nonprofits, by their nature, help disadvantaged groups, and being identified as part of that group can have real consequences. Before filming any beneficiaries, make sure they are informed and capable of consenting. There are many artistic choices you can make to hide identities and reduce potential problems.



When doing advocacy work and video activism, you may need to film subjects without consent. In these cases you must go out of your way to fall under the protections offered to news outlets and others to record information for the public good.

Locations and Permissions

Where to film

- Private spaces you own or rent
- Public places like parks, sidewalks, roads
- Private/commercial places with permission

Scouting

- Decide where the lighting and background are best
- Consider blank or textured backgrounds vs. content backgrounds
- Consider static backgrounds (wall, landscape) vs. active ones (factory floor)



You Will Need a Permit To Film on Public City of Seattle Property If...

- Traffic will be interrupted on city streets.
- Pedestrian traffic on sidewalks will be interrupted.
- A tripod or dolly is used on sidewalks or streets.
- Wires or cables run across or over sidewalks.
- A generator is used on a sidewalk or street.
- Public parking will be impacted.

-Seattle.gov

If you do need a permit, the Seattle.gov website has details on “Support for small, low-impact feature and short independent films (Permit fee of \$25 per project up to 14 days)”



Fair Use of Copyrighted Content

The Center for Social Media, centerforsocialmedia.org, has a great document, [Code of Best Practices in Fair Use for Online Video](#). They point out that part of the social contract giving content creators copyrights is the public right to comment, modify and expand upon that material. This doesn't mean you can just slap a Beatles soundtrack onto your video and call it art. The following is an excerpt.



Questions at the heart of “fair use”

- Does the unlicensed use “transform” the material taken from the copyrighted work by using it for a different purpose than that of the original?
- Was the material taken appropriate in kind and amount?

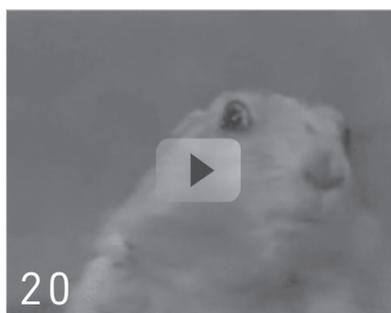
Your use of protected materials should either transform the content (for example, changing song lyrics to create a parody), or sample just enough to make the cultural reference. For instance, you could show a news anchor saying “the murder rate has doubled,” but not rebroadcast the entire exposé.

Common permissible uses of content under fair use

- Commenting on or critiquing copyrighted material
- Using copyrighted material for illustration or example
- Capturing copyrighted material incidentally or accidentally
- Recombining existing materials to create a new work

Other tips

- Lack of commercial intent does tip the scales toward nonprofits in deciding cases of fair use. On the other hand, realize that anything that reaches a large audience or is posted on a commercial site like YouTube can be considered to have an economic impact.
- Attempting to get permission to use the work and clearly crediting sources show “good faith” and can protect you legally.
- Even if your attempt to license material is rejected, you may still invoke fair use to include it in your work.



Free and Open License Content

The most common sources for freely reusable content are Creative Commons licensed works, material for which copyright has expired, and public domain works such as government-created content. Be very careful when incorporating Creative Commons licensed works, as there are many different versions, only some of which will work for web video. Just because it's free to download doesn't mean it's free to use!

Creative Commons licenses in order of decreasing utility:



Zero / Public domain - No restrictions or attribution needed.



Attribution - You must credit the original creation.



Attribution-ShareAlike - You must credit the original creation and you must license the resulting work in the same way.



Attribution-NonCommercial - You must credit the original creation and your resulting work may not be used for commercial purposes. This would preclude posting the video on YouTube or any other online space with advertising.

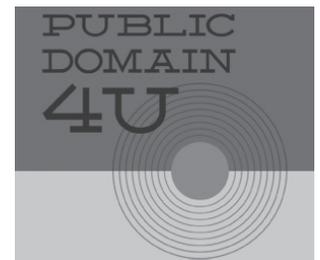


Attribution-NonCommercial-ShareAlike - Requires attribution, identical licensing and precludes commercial usage.

Online resources and archives for open source content

Music

- freemusicarchive.org
- ccmixter.org
- publicdomain4u.com
- musopen.com
- jamendo.com
- opsound.org
- ibeat.org



Images

- Flickr.com
- Wikipedia.org



WIKIPEDIA
The Free Encyclopedia



Sound Effects

- Freesound.org



Video

- Youtube.com
- Vimeo.com



Low-end Cameras

Inexpensive (<\$300) options for shooting video include using the video function of point and shoot digital cameras or phones.

Point and shoot cameras are great for spontaneous shots and can sometimes create great, clear images. However, they do not offer much creative control and rarely shoot in HD (High Definition, usually 1280 x 720 pixels or 1920 x 1080 pixels). Hence 720p and 1080p). Camera phones are even more convenient for creating videos on the fly, and some apps allow users to “artify” and share videos instantly.

Another budget option is limited-function pocket video cameras. These cameras are easy to use, convenient, unobtrusive and inexpensive. Some can shoot HD video. However, many shoot low-quality, shaky video with poor audio. The image quality is usually not as good as higher-end video cameras, and the videographer has little control.



Samsung HMX-W200 (\$150)

HD pocket camera is waterproof, shock resistant and dust proof. Has LCD screen, anti-fog lens and white balance controls. Shaky video and poor audio quality. [Left]

GoPro HD HERO 2 (\$299)

Wearable camera shoots HD video, stills and time lapses. Waterproof and rugged, with impressive image stabilization. Poor audio and no view screen. [Right]



Low-end (\$300-\$600) camcorders offer superior audio, image stability and light sensitivity. They are easy to use, and shoot HD video. One key feature to look for is a microphone jack.



Panasonic HC-V500M (\$369)

Small, lightweight camcorder with a wide range of manual controls and full HD capability. Comes with 16GB of internal memory. [Left]

Sony HDR-CX260V (\$450)

30X Optical zoom, focus tracking, microphone jack and 1080p 60 fps recording. [Below]



Mid-range Cameras

Mid-range (\$600-\$1000) shooting options include DSLR cameras. Let's look at the pros and cons of shooting with DSLR:

DSLR pros	DSLR cons
High resolution and "film quality" look	Slow to set up
Precise focus and control over depth of field	Poor innate audio and audio digitizers
Quality glass and a variety of lenses	Hard to zoom or pull focus smoothly
Easy files for computer to handle	Hard to hold steady or move around with
Can be used for high-quality stills	More expensive



Canon EOS Rebel T3i

\$600

Entry-level DSLR with manual controls and automatic options. Full HD shooting, 18 megapixels. Features vari-angle 3-inch monitor.

Nikon D3200

\$700

Entry-level DSLR with full HD shooting and 24.2 megapixels. Guide Mode helps novices learn how to control camera. [Left]

Mid-range camcorders are also an option. They offer one-button recording, good motion stability, easy zoom and high-quality audio.

Canon Vixia HF M52

\$750

Shoots 32GB (up to 12 hours) of HD footage. Good low-light shooting. Touch-panel LCD screen. Microphone and headphone jacks.

Sony HDR-P J580V

\$900

Shoots 32GB (up to 11 hours) of HD footage. 20.4 megapixel still image capture and built-in projector. Shake-canceling technology. Microphone and headphone jacks. [Right]



High-end (\$1,000+) cameras offer outstanding image quality and control for the videographer, but aren't affordable for most nonprofits. If your organization's video gear budget exceeds \$1,000, we'd recommend purchasing a mid-range camera and investing in other gear like lenses and audio recording equipment.

Camera Lenses

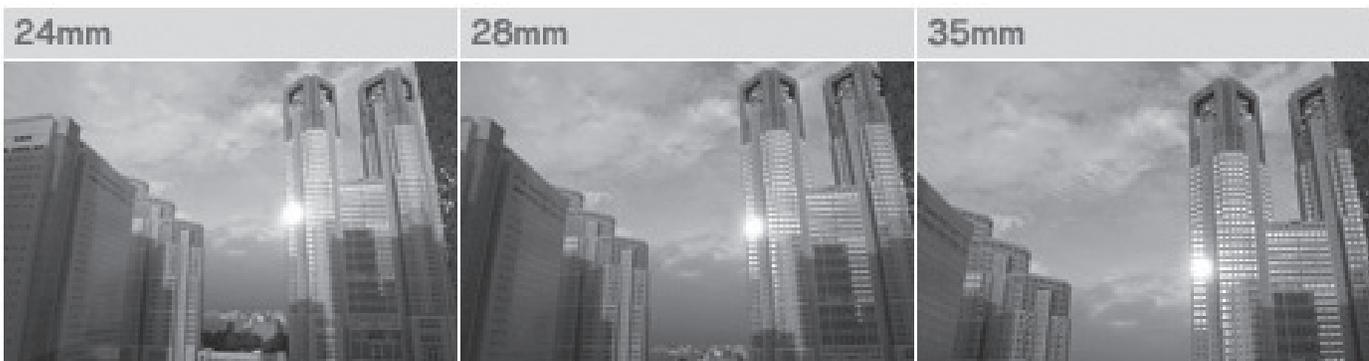
DSLR shooters must think about what lenses will suit their needs.

Prime lenses (usually 35mm or 50mm) have a fixed focal length, so it is not possible to zoom with them. They can create high-quality images with a dramatic depth of field, and are often great for filming interviews if the subject is not in motion. They are durable and tend to be less expensive than zoom lenses. However, they are not ideal when your shoot requires flexibility since you must move your whole rig to frame a new subject.



Notice the pleasingly blurred background, called bokeh (“bouquet”), due to the narrow depth of field in this 50mm lens interview shot.

Wide angle lenses (<35mm) allow you to catch a broad scope, and are good for giving a sense of setting. Because they are pulling in more light they work well in low light situations like indoors. They also allow you to shoot a wider space without backing up the camera. As the value gets smaller -- for example, 35 mm to 28 mm and further down to 24mm -- the angle grows wider:



Below 24mm, you start to get a distorted, **fisheye effect** like this GoPro image (right). The fixed GoPro lens has a 170 degree field of view that is equivalent to a 1.2 mm DSLR lens.

Zoom lenses (>50mm) allow you to focus on a subject from a distance. They’re indispensable for shooting sports and nature. They’re also good for capturing facial expressions without getting right in front of someone’s face. They also tend to be expensive, bulky and prone to camera shake so be sure to use them with a tripod.



Microphones

Audio quality is hugely important to the watchability of videos. If viewers can't clearly hear your speakers, they will likely move on. Capturing great audio content requires microphones. Some options:

Shotgun mics can focus on one sound source from a distance. They are an easy way to upgrade the audio quality of a camera that has inline audio, and start at around \$35.

Audio-Technica ATR6550 Video Camera Shotgun Microphone (\$60)
Designed for use with video cameras. Picks up nearby or distant sounds.

Rode VideoMic (\$149)
Lightweight microphone can be mounted to a standard camera shoe. Captures studio-quality sound. [Right]



Lavalier, or lapel, mics are small, convenient, and great for interviews. They capture minimal surround sound. Wireless varieties are more convenient, but capture lower quality sound than similarly priced wired mics. Budget wired models start at around \$20; professional wireless systems can cost over \$500.



Audio-Technica ATR-3350 Lavalier Omnidirectional Condenser Microphone (\$23)
Low profile good for video use when interview subject is still. Comes with 6-meter cable, and 3.5mm jack plugs into most cameras. [Left]

Audio-Technica PRO88W-R35 Wireless Lavalier System (\$133)
Operating range up to 100 feet (25 feet in most situations) provides freedom of movement for interviews. Real-time monitoring capability.

Stereo microphones use two orthogonal mics to capture a soundscape. They are good for capturing atmospheric sounds, like trains passing and crowd noise, but are a low priority for nonfiction storytellers on a budget.

Audio-Technica ATR2500-USB Condenser USB Microphone (\$65)
Easy-to-use mic plugs directly into Mac or Windows OS computers through USB. Built-in headphone jack allows for real-time monitoring. [Right]



Digital audio recorders are useful when your camera's digital converter isn't great. Many DSLR cameras distort sound, even from good microphones. They also pick up sounds that the cameras themselves make. Digital audio recorders capture clean sound close to the source, and allow you to monitor audio. However, they are an extra expense and device to carry. Users must sync the sound to the video using software, or manually using claps.



Tascam DR-08 Portable Digital Audio Recorder (\$79)
Compact device has positionable built-in stereo mic as well as 3.5 mm port for external mic. [Left]

H4n Handy Mobile 4-Track Recorder (\$243)
High-quality recorder with built-in stereo mic capable of recording four inputs at once.

Smartphones and iPod Touch devices can also be used with some external microphones.

Tripods and Rigs

Reducing shake and making smooth camera movements are very important for producing watchable video. Fixed head photography tripods can be used for interviews and static shots, but preclude dynamic shots. If you already have a fixed head tripod and can't afford a fluid head model, you can make the fixed head tripod work. However, if you have a budget for purchasing a fluid head tripod, we urge you to do it.

Fluid head tripods allow users to smoothly pan and tilt to follow a subject. They're also good for setting a scene; for example, you can pan a crowd, and make fixed objects like buildings look interesting. They are also bulkier and more costly than other tripods. Systems start at \$13 and run well over \$500. More expensive systems are sturdier and more durable, and track more smoothly.



Davis & Sanford SwitchKit 7-In-1 Tripod Accessory Kit (\$13)

2-pound tripod supports 4 pounds. Extends 24 inches to 53 inches, and quick-release plate allows user to go handheld easily. Comes with tabletop tripod. [Left]

Vanguard Alta+ 204AP Aluminum Alloy Tripod (\$110)

3-pound tripod supports 4.4 pounds. Extends 20 inches to 51 inches. Has quick release, and 3-way panhead with two handles for more control.

Small, flexible tripods are inexpensive, and are useful for point and shoot cameras and pocket video recorders. However, you must be creative with their placement.

Joby GorillaPod Video (\$19)

Flexible-leg table-top tripod with quick release supports 11.5 ounces. Micro-ball video head allows user to pan 360° and tilt up to 135° in one direction. [Right]



Body-mounted camera support rigs are another option if you're shooting with a small camcorder or DSLR. They allow a wide range of shots and quick repositioning. Many directors like some motion in their footage. Sophisticated systems allow for precision focus gears and have many points of contact with the system so there is little shake.



Cowboy Studio Shoulder Support Pad (\$28)

Lightweight, easy-to-use rig frees hands and cuts down shake. Supports camcorders and DSLR cameras up to 13 pounds. [Left]

Opteka SteadyVid PRO Video Stabilizer System (\$180)

Handheld system drastically reduces shake. Supports camcorders and DSLR cameras up to 5 pounds. [Right]



If you're handy and want to try making your own camera stabilizer, tutorial videos abound online.

Memory and Power

Memory

SDHC cards are used for most devices these days. They are fairly inexpensive and small, so get plenty. Check the specs to be sure that whatever you buy is compatible with your equipment. Three factors to consider when buying a card are storage capacity, seeking speed, and decoding class.

Storage capacity is measured in gigabytes. For shooting video, it's best to have cards that are at least 8GB.

Seeking speed is the maximum speed that still pictures can be written to the card or read from it. If you're shooting with a DSLR, you want a card that writes at least 30MB per second.

Decoding class is the minimum speed (in MB/s) at which the card can record video and range from 2 to 10. Ensure that the card you purchase meets the minimum class requirement for your camera. Most HD cameras require at least class 6, so check the manual to know which type of SD card to buy. Cards labeled class 10 can range from 10 MB/s up to 45 MB/s so be sure to read the fine print on them as well.

We've had good experiences with SanDisk and Transcend brands. Transcend's 32GB SDHC Memory Card with class 10 speed (\$20) includes a lifetime warranty.

Memory cards can provide backup file storage until you can get files backed up on your computer, hard drives or the cloud. Make sure to keep cards labeled and organized, and start each shoot with clear cards. Try to keep each card with one device to avoid file order problems.



Power

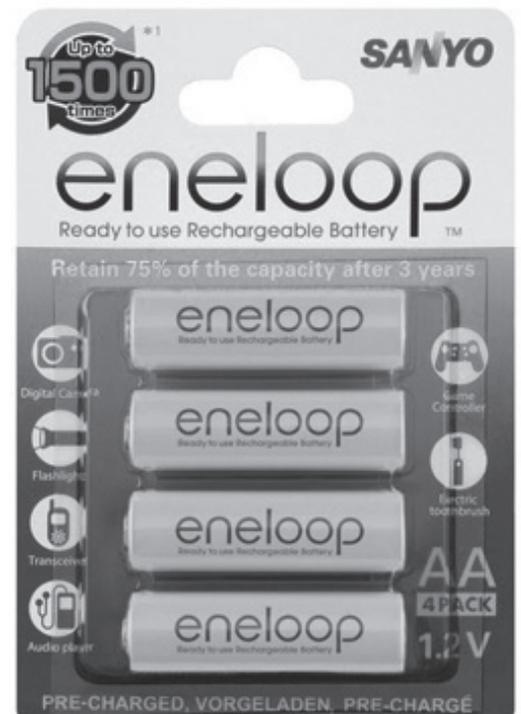


Running out of power in the middle of a shoot is a terrible feeling, so have plenty of batteries charged and ready to go for every device before a shoot.

For devices that take AA and AAA batteries, we use rechargeable **Sanyo Eneloop batteries** because they hold a charge for a long time. Packs of four AA batteries start at \$5 online, chargers can be found for \$10.

Many cameras have custom batteries. Buying an extra one is a great investment. DSLR cameras often have optional battery packs that use AA batteries. While good for continuous, tripod-mounted shoots, we found ours bulky and overpriced for most uses.

Be sure to bring extension cords with you to power devices during the shoot, especially for lighting.



Lighting Equipment

Lighting techniques greatly affect the quality of your final image. Light can control the mood of your video and how your subjects are perceived. It can also direct viewers' eyes to certain parts of the frame. We'll dig deeper into lighting techniques later, but here we'll touch on budget lighting options.

Reflectors can greatly improve the lighting on faces in interviews, especially when shooting outdoors. They bounce some light into the shadow areas, reducing the overall contrast of the shot. By changing your distance from the subject, you can fine tune the amount of contrast. In much the same way, a dark surface, or "gobo", shades the subject from reflected light.

In places where there is already some light, using reflectors can be preferable to using lights because the added light is the same frequency as the ambient light.

The **Neewer 110CM 43" 5-in-1 Collapsible Multi-Disc Light Reflector** (\$17) includes reflectors in five colors: translucent for softening; silver for contrast; gold for creating a healthy, warm tone; white to fill shadows; and a black gobo to block stray light. [Right]



If you're in a pinch, you can use any flat object, such as paper or cardboard, as a substitute.



When daylight isn't an option, dedicated video light packages can be used. Professional lighting kits are bulky and expensive. One compact option is an LED light that can be mounted on your camera's hot shoe. Note that it's better to have this type of light off-camera for interviews, as it's uncomfortable to look into the light.

The **Bescor LED-70** (\$60) is an on-camera, dimmable, daylight balanced LED light with bright output suitable for lighting at night and indoors, and also for canceling shadows in bright light. [Left]

Looking for a budget option to add light to your shot? Hanging car repair lights, lanterns and small lamps can all be used. (We've done it.)

The **Designers Edge 8.5-Inch. Incandescent Clamp Light** (\$8, bulb not included) clamps to almost anything and uses up to a 150-watt bulb. [Right]

If faced with a situation in which you are working with household lights a few tips might help. First, turn on all the lights you can; underexposure is the biggest problem indoors. Moving lights closer, taking off lamp shades, and building white paper or tin foil reflectors can greatly increase the amount of light on your subject. If a light is too harsh, bounce it off the ceiling or a wall. Fluorescent lights will flicker with the AC frequency; shooting at a very long exposure (1/30 - 1/50) can avoid this problem.



Accessories

Make a checklist for your gear and double-check your kit before you head out to shoot. Here are some essentials we always keep handy:

Tape and twine - to hide wires, and to rig all sorts of things like backdrops, reflectors and extra cameras. We try to carry a variety of duct, packing, masking and electrical tape.

Scissors - for cutting tape and twine.



Lens brush and cleaner - to clean before every session.

Bubble wrap and zippered plastic bags - to keep everything padded and dry.

Lens filters - for rare use, usually a darkening filter for slow shutter effects in bright light. Keeping a UV filter always on the camera is a great way to protect the lens and get rich sky tones.

Chargers - for staying powered on a long shoot.

Notepad and pens - to make notes of subjects' names and shooting locations. Be sure to bring copies of **release forms** for people to sign and a sign alerting people when you are filming in public.

We keep our kit in a padded bag with a waterproof cover. We are using a **Case Logic SLRC-206 SLR Camera and 15.4-Inch Laptop Backpack** (\$75) with a **Mountainsmith Rain Cover** (\$21).

Velcro cable ties cost a few dollars and will make your life much easier.



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"Kleinzweck has a theory that the strong nuclear force is actually tiny rolls of duct tape."

search ID: 1man2808



Recording Audio

As the virality of countless low-quality YouTube videos indicates, pixels are not destiny. Content is what ultimately matters. Though viewers will forgive grainy images, we have a harder time with garbles and static-hissing sounds.

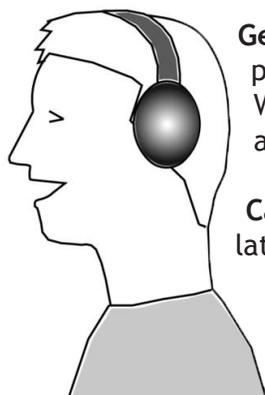
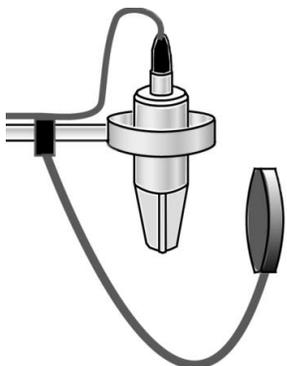


Tips for capturing good audio

Choose your recording location carefully. In general, avoid background noise. Relevant sounds, like bird calls at an aviary, are fine. “White noise” like water is better than random sounds like crowds and traffic. Keep in mind that small rooms with bare walls will create room echo.

Have speakers repeat themselves if they make mistakes or a phone goes off. Trying to replace mispronounced words or rephrase a sentence later is a real challenge, and the speaker ends up sounding like a GPS navigation voice.

Monitor your audio. Realizing too late that the lavalier mic was scraping on your interview subject’s lapel is devastating. You can monitor your audio in real time by plugging headphones into your digital audio recorder, or some camera models.



Get the microphone as close to the source as possible. But don’t put it in line with a speaker’s breath unless you have a pop filter. When recording music, you might get a richer sound by recording at a distance to take advantage of the acoustics of the room.

Capture some background sound; you might want to layer it in later when you’re editing.

If you can’t capture good audio, consider adding a voiceover.

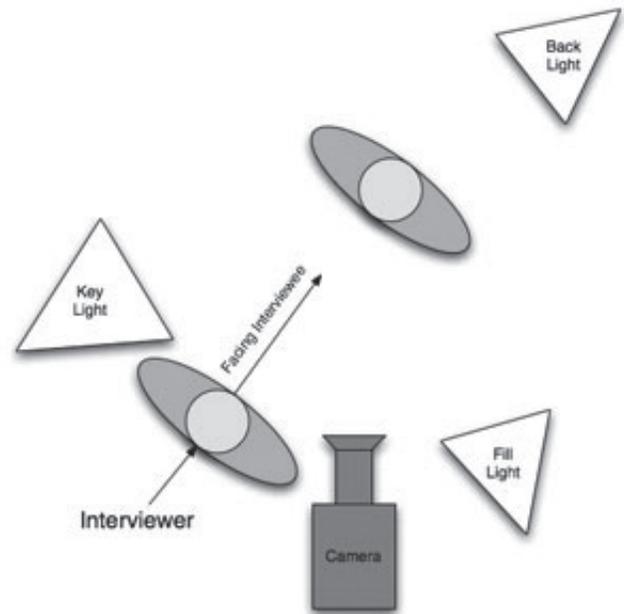
Positioning Your Lights



Directors of photography will tell you that light is the single most important element that affects the final video image.

Three point lighting is the standard lighting technique for video. It involves setting up lights in a triangle pattern to light your subject.

A “key light,” or main light is placed at 45 degrees to either side of the camera, and 45 degrees up from the subject. Put the key light on the side of the camera that the subject is facing. The typical position for a “fill light” is 45 degrees to the opposite side of the camera from the key light to soften shadows. And an optional back light is positioned behind the subject, pointing down at a 45-degree angle. [Right]



When shooting indoors, you will want to use your brightest light or a window as your key light. You can use a reflector or small table lamp as a fill light. Finally, a ceiling light can act as a “back light.” The back light isn’t absolutely necessary, but it creates a nice glow around your subject’s shoulders and head, and helps to separate your subject from the background.

When you are placing your lights, consider how **the position of the lights affects how the subject looks.**

- Lighting from behind reveals form. Think of silhouettes.
- Lighting from the side reveals texture, and is not usually flattering for faces.
- Lighting faces from sharp angles above and below creates unsettling shadows.

When you’re **shooting a subject outdoors** at the right time of day, you can achieve three-point lighting using just the sun and a reflector. This works best in the late afternoon or early evening, when the sun is about 45 degrees up in the sky.



- Place your subject with his back to the sun, and you put your camera in front of him. The sun behind him will act as a back light.
- Next, place a white reflector off to the side, out of the frame. Reflect some of the sunlight onto your subject’s face. This reflected light will act as a key light.
- Ambient light reflected off the sky, clouds, grass and road will act as a fill light.

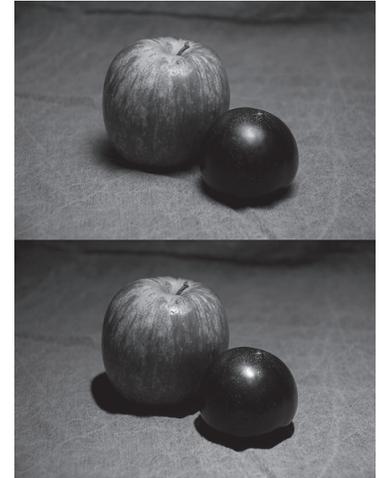
Another easy and common lighting technique is **front lighting**, or using a single light source in front of the subject. It is generally pretty flattering for the subject, but is also flat and boring.

Adjusting Light Quality

In addition to position, you should also consider the quality of light - whether it is hard or soft. Soft light creates softer shadows and makes people look better. To determine whether a light is hard or soft, look at the shadow under your subject's chin. A clear, distinct line along the shadow's edge means you've got a hard light. To soften the shadows, you need to increase the size of the light relative to the subject.

Here are some ways to soften light:

- Move the light closer to the subject.
- Bounce the light off of a reflector, or ceilings and walls.
- Wait for clouds to cover the sun if you're outside.
- If you have a pro lighting set-up, use diffusion paper, diffusion fabric, or a soft box.



Another consideration is light intensity. Intensity drops off dramatically as you move a light away from the subject. You can also control light intensity with a dimmer if your light has one. Pros also use neutral density gels that reduce the intensity of the light without changing the color, or scrims, which are metal screens that drop in front of bulbs to reduce light output.



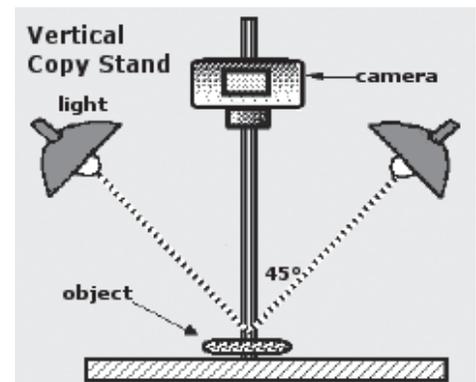
A **light meter** is an instrument inside your camera that tells you if the amount of light reaching the film will be enough or too much to properly expose your image. You usually want to keep your light meter in the center, but a window or sunny background can trick your light meter and make your image too dark. In this case, you will need to overexpose your image. You can point your camera away from the window or use spot metering (only looking at the light level at the center of the frame, not the entire frame) to achieve this. If your camera has no manual exposure options you will need to reframe the shot.

The **time of day** matters when you are shooting outdoors. Colors are the richest in the hour after dawn and before sunset.

If you're **photographing or filming a document**, place your light at 45 degrees to avoid glare.

Lighting can affect the way your subject is perceived, and also change the mood of the shot. **High key**, or bright, lighting feels optimistic and happy. On the other hand, **low key** lighting's deep shadows create a dramatic feel.

Name one situation when you would want to use high key lighting:



Name one situation when you would want to use low key lighting:

Shot Stabilizing and Positioning

Unless you have a good reason to Blair Witch Project-style shaky camera effect (you probably don't), you should stabilize your shot. Use tripods as often as possible. If you're using a small tripod, tape it down. In situations when you have to handhold your camera, "place and brace." Sit down, rest against a wall, wedge yourself into corner or place your camera on a surface. The more points of contact with the camera, and the closer the camera is to your body, the better.

The vertical position of your camera sends a message about your subject.



High angle shots: Shooting down at a subject 15 degrees can be flattering, but shooting down more than 15 degrees makes the subject look vulnerable or childish.

Low angle shots: Shooting up at subjects 10 degrees can be make them look powerful, but shooting up more than 10 degrees is awkward. Nobody wants to look up their nostrils!



It's a good idea to make a list of the shots you want, and capture a diversity of shots:

- Close and wide
- Action and still
- Different angles, pulling focus
- Number of people in the shot
- Serious and lighthearted
- Bright shots and dark ones



Extreme Wide Shot



Wide Shot



Medium Shot



Medium Close up



Close up



Extreme Close up

Camera Settings

There is tremendous variety in how different models and brands of digital video cameras operate. If you are not proficient in still photography, a book on the basics of camera operation is a must. And though painful, a day spent with your camera's manual will save you countless hours in the field.

Fully automatic recording

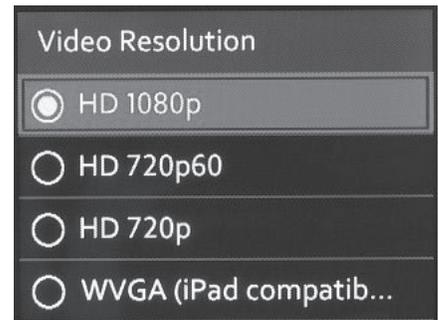
For better or worse, many low-end cameras are true point and shoots. With wide, often fixed lenses, there is little ability to change the focus or reframe the shot. With the GoPro, there isn't even a screen to see what you are recording!

Tip 1. Never shoot horizontally or askew unless you are planning a very artsy film with lots of post production.

Tip 2. Choose evenly lit locations. A bright window or a black background can fool the camera into over or under exposing your subject.

Tip 3. Use a tripod or set it on a flat surface. These cameras tend to be small and hard to hold steady.

Tip 4. Make sure you are recording at the highest quality setting. The more pixels you collect, the more options you'll have down the line.



Basic camcorder settings

These camera are still one button recording territory, but you'll have a little more control over things like the zoom.

Tip 5. Plug in a microphone if you have one. Almost anything will be better than the camera microphone, and if the resulting quality is high enough, you can avoid syncing the audio in post production.

Tip 6. Use auto focus**. It will almost always be better than your eye. The exception is in an interview or tripod setting where the subject takes up only a small part of the frame. In that case the camera may focus on the background instead. Zoom into the eyes to adjust the focus, then zoom out to compose the shot.

Tip 7. Never use the digital zoom! You are not actually zooming, you are just cropping the number of pixels being recorded. It is far better to do that in the video editing software later if you have to.

Tip 8. Get close and zoom out. It can be tempting to stay at the back of the room and use your 30X optical zoom to capture interactions from a distance rather than getting in people's faces. The problem is that long shots tend to be shaky, grainy and flat compared to the same shot taken up close.

Tip 9. Use manual exposure when the background is bright. Unless your subject is in full sunlight, any sunlit background will fool the camera into under exposing the subject.

Tip 10. Change the white balance when shooting indoors. Lamps have a very different spectrum of light than sunlight, resulting in a blue or yellow tone to every shot.

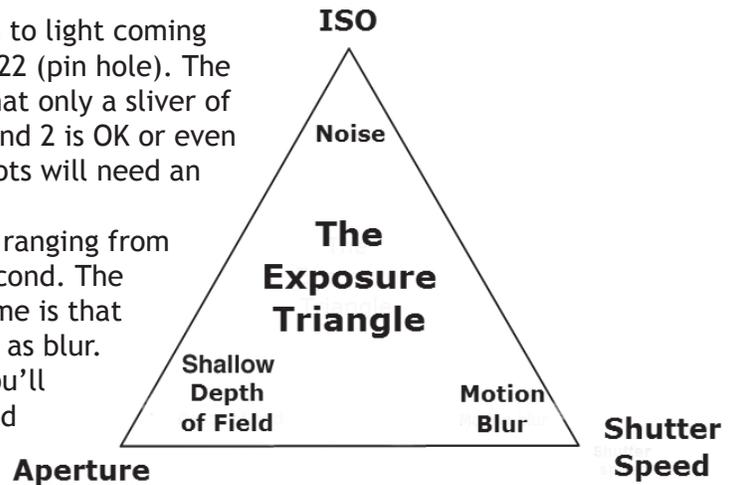


Camera settings for DSLRs and high-end video cameras

DSLRs and high end video cameras have a full buffet of manual settings available. If you have used an SLR camera before, all the same concepts apply. Also, don't be afraid to use the automatic settings, especially in rapidly changing situations.

Almost all the manual settings can be reduced to a three way tug of war over how to get enough light into the camera. Each method causes problems as it brings in more light.

- **ISO** is the sensitivity of the light detector and typically ranges from 100 (low) to 1600 (very sensitive). The problem with high sensitivity is that it causes noise. ISO 200 or lower is ideal, at 400 to 800 the noise is noticeable but acceptable, and higher ISOs are almost unwatchable but there for a "break glass" emergency.
- **Aperture, or f-stop**, measures how open the lens is to light coming in and generally ranges from f 1.2 (wide open) to f 22 (pin hole). The problem with a wide aperture (small number) is that only a sliver of the depth of field will be in focus. An f-stop of around 2 is OK or even recommended for interviews, but more dynamic shots will need an f-stop of 5.6 or higher.
- **Shutter speed** is how long the camera lets in light, ranging from 1/30 of a second (very long time) to 1/2000 of a second. The problem with leaving the shutter open for a long time is that any changes in that scene during that time show up as blur. For static shots on a tripod 1/50 will be fine, but you'll want 1/200 or faster for any panning, zooming, hand held, or action shots.



If you are in a challenging light situation, start at the minimal quality settings (ISO 200, f-stop 5.6, shutter 1/200) and follow this sequence:

- If it's not a stampede, then bleed the speed
- If the background is cr@p, drop the f-stop
- If both those are low, then jack the ISO

Focus

The most challenging and rewarding feature of DSLR shooting is the manual focusing. Learning exactly how far to twist your wrist to go from 2 yards away to 20 yards away takes years of practice. A magnifying viewfinder can help, as does magnifying the important part of the image - like the eyes in an interview. Having a large f-stop to keep the entire scene in focus is a good practice to get into.



Tip 11: Avoid auto white balance. It will be very hard to get the skin tones to all look "right" if the camera is constantly adjusting the tone of the light.

Tip 12: Always shoot a minimum of 15 seconds. Give yourself time coming into the shot and hold it for a few seconds after. This should not include time changing the focus or zoom!

Tip 13: Use spot metering with manual exposure, evaluative for auto exposure. Evaluative metering takes light from the entire frame to guess the correct exposure. Spot metering will tell you how exposed that particular part of the frame is.

Tip 14: Don't end on tip 13.

Framing Your Shots

Once you have positioned your shot and set your lighting, you must decide how to place your subject in the frame, how to move the camera, and what should be in focus.

The **rule of thirds** is the canonical way for photographers and videographers to frame their shot. Imagine a tic-tac-toe board on your screen, and put objects of interest where lines cross.

Pans and tilts: Panning is the sweeping movement of a camera across a scene horizontally. Tilting is rotating the camera in a vertical plane. Both techniques make shots more dynamic.

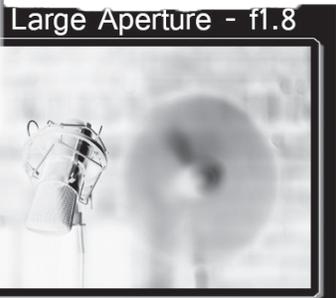
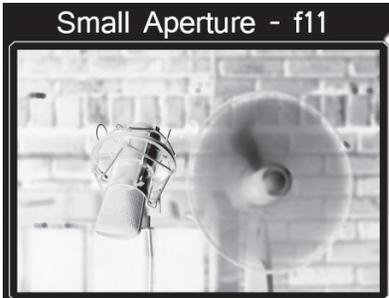
Track your subject: Professionals use expensive dollies to do this, but you can get creative. We once rigged a FlipVid to a bicycle to track a jogger, and the shot looked great.

Zoom in and out: But not too often. It's usually better to cut from a wide to a close shot, or vice versa.

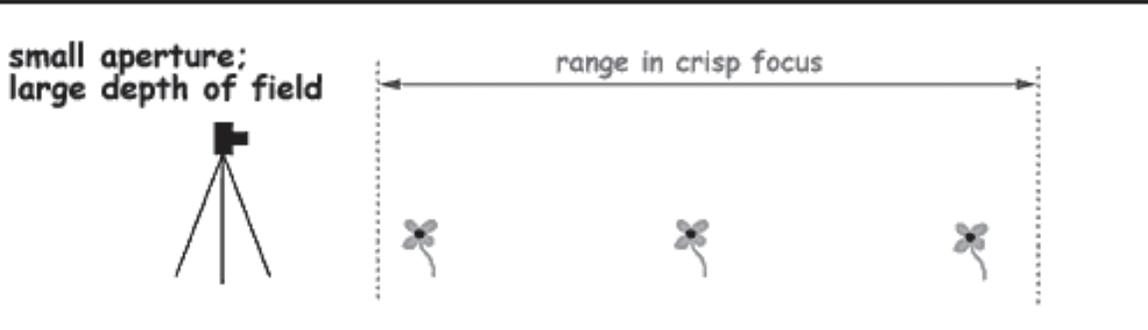
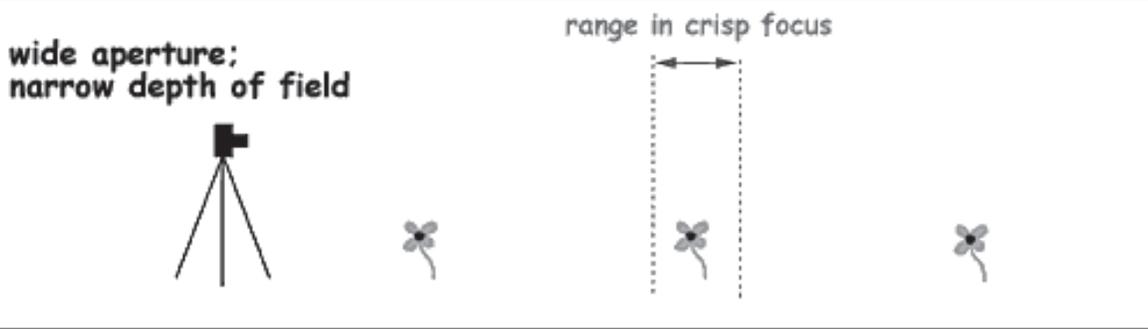


Rule of thirds

Change focus while filming: Also called “pulling focus,” the technique of bringing your subject into crisp focus draws attention to it. You can also switch the focus between subjects, as from a teacher to a student, in order to establish a connection between them.



Adjust the depth of field: Depth of field is the range of distance that appears acceptably sharp. DSLR cameras allow you to modify your depth of field by adjusting aperture, which is measured in f-stops. A smaller f-stop gives you a narrower depth of field; a larger f-stop gives you a wider depth of field.



Conducting Interviews

While your message can be conveyed with narration, text or self-evident imagery, most nonprofits use interviews because of the powerful resonance of speech intonation and facial expressions.

When interviewing, **consider your setting carefully.** Ideally, the background should relate to the person's role in your story. It can be interesting to have the subject do something active while talking. For example, you could interview a chef while he dices vegetables.



Try to **shoot someplace that isn't too noisy;** natural sound should be minimal or complement the message. A good lavalier mic will allow you to shoot under a wider range of locations.

A traditional camera set-up has the interviewer sitting or standing next to the camera. If you are to the left of the camera, place empty space to the left in the shot. Leave a cushion of space around their face and hands. You can always crop in closer during editing, but you'll never recover things that happen out of the frame. Extra cameras can be used for close and wide shots, or for cutaways to hands.

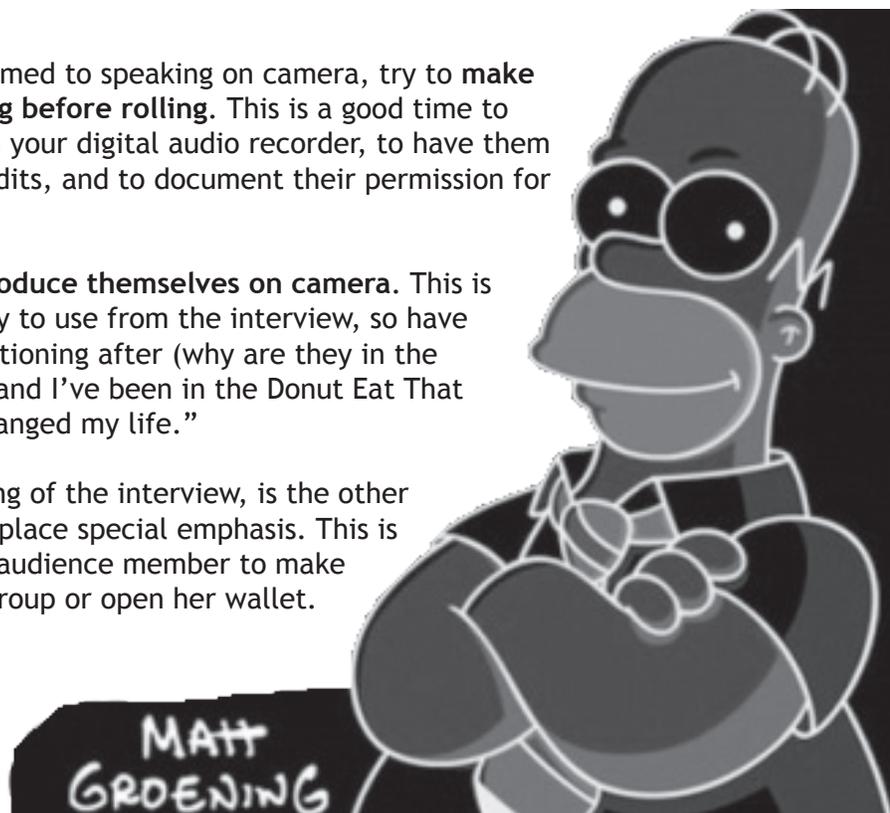


When adjusting your lighting, try to **place a square of light in the speaker's iris.** When adjusting your camera, be sure to leave space - but not too much - above the subject's head.

If your subjects are unaccustomed to speaking on camera, try to **make them comfortable by chatting before rolling.** This is a good time to adjust the audio sensitivity on your digital audio recorder, to have them spell their names for your credits, and to document their permission for you to record them.

Make sure your subjects introduce themselves on camera. This is the moment you're most likely to use from the interview, so have them do it a few times, transitioning after (why are they in the video). "I'm Homer Simpson, and I've been in the Donut Eat That program for five years. It's changed my life."

The "call to action," or ending of the interview, is the other section on which you want to place special emphasis. This is your closing pitch to get that audience member to make a lifestyle change, join your group or open her wallet. Make sure it is flawless.



Shooting Events and B-roll

When shooting an event, have a vision for what content you want from it. Be bold to get the shots you seek; get on stage if you need to. Shoot more than enough footage, because you won't get second chances. You might consider having one wide shot camera always rolling.

If you want to capture clean audio of a speaker or performer, you can give the speaker a lavalier mic connected to a small digital recorder or phone that will easily fit in her pocket.



B-roll is auxiliary footage that can be shown while someone speaks to illustrate what they are saying visually.

- In general, you want to closely match the images to the idea in the audio. The relation should be obvious and simple for the viewer to process. Don't show a lot of text; the language center of our brain can't multitask!
- The B-roll should match the speaker's mood as well as content. How might B-roll for a littering PSA differ from B-roll for a recycling PSA?
- B-roll you might capture at an event includes signage, decorations, award close-ups, crowd reactions and people entering the building.
- B-roll you might capture during an interview includes the room or space you are in, the speaker's hands, or aspects of the speaker's dress, like rings or broaches.

Here are some examples from a video we shot at a preschool in Cambodia. While the interviewee talks about the educational, social and medical benefits of the program, the viewer sees children learning, playing, and getting medication from a doctor.



Recording Music

Music changes the emotion of any video production. Think carefully about what mood you want to set with your music selection.

You can use free, licensed music from the sites listed in the pre-production section. Or you can find musicians in your group, student groups, buskers and open mic performers. See if they have an original studio track you can use. If it's not an original song, remember that the composition must be out of copyright; the performer giving you the rights to his performance of that Beatles song isn't good enough.

Any song or musical work published in 1922 or earlier is in the public domain in the USA. No sound recordings are public domain in the USA due to a tangled complexity of Federal and State Law.

-pdinfo.com



If you need to record music, try to do it in a studio-like setting. A large room with soft walls and furniture is ideal. Try to get multiple microphones on the singer and different instruments so you can mix it all together later. Turn off air conditioning and appliances, and quiet the audience.

While you're shooting out in the field, be opportunistic. Record chants and cheers, children singing and wind chimes.



Staying Organized While Shooting

Before you start your shoot, decide who will do what role in the shoot. Make check lists for gear you'll take, set-up procedures, and shots you want to get.

Keep your memory cards in a safe place, and **have a Plan B** if batteries fail, your memory card is full, or the camera breaks.

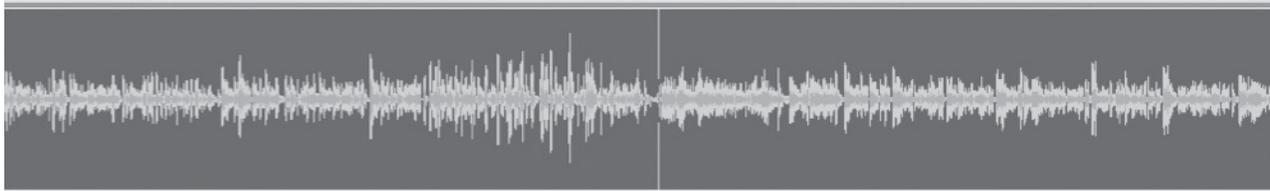


Sync the clocks on all your devices! Double check the clock after changing batteries.



Tag your audio and video. You can use a white board or slate for the start of scenes, or write down file names and times in notebook. At the beginning or end of an audio recording, say what the audio is: “This is babies in the nursery.”

Rule of thumb: **Start and stop your A camera often** so you can easily discard bad takes, but **leave audio and a wide shot B camera rolling** so you never miss anything.



Video files take up lots of memory. “Walking around and focusing” footage is almost always unusable, and it’s easier to delete bad clips than trim them.

Audio is very hard to screen quickly for quality and content. Files are small, and software can match a 20-second video clip to an hour of audio fairly easily. If you don’t have syncing software, unique patterns of claps can help you locate sections of an audio file.

Review what you’ve got while you’re still on site, if possible. Bring a laptop to check through content, or play it back on your device. Check your content against your shot list.



Importing Media Files

Every file needs to live in 2 or more places
Every file needs to live in 2 or more places

Importing files workflow

1. Designate a “master” drive - ideally a large, fast external hard drive
2. Create a logical file structure on that drive (below)
3. Copy from memory cards and devices to the master drive
4. Ingest (name and edit) files on master drive (next page)
5. Copy files to mirror drive or DVD archive or upload to the cloud
6. Delete files from cards and devices



Creating a consistent, robust, and logical file architecture

- We’ve been using: campaign > location > filetype > device/source
- Also consider date, content creator, etc.
- The goal is to feel confident every time you transfer files from card to drive you are not missing files
- Keep a text document describing how you organize files to help coworkers, partners, future alien anthropologists

Long term video file storage options

Storage Medium	Cost (1TB for 5 yrs)	Ease of storing	Ease of updating	Ease of retrieving	Data safety	Notes
External HDD	\$50-80	10	10	10	8	Tradeoff between ease of retrieval/ updating and data safety (fire/theft)
DVDs	\$50	3	1	5	6	It takes more time than you think to organize, burn and label DVDs. Storage space and scratches are problems.
BackBlaze/ CrashPlan/ Carbonite**	\$250-\$300	8	10	7	9	**Not storage, only backup. So files must be continuously on your drive attached to the internet. First upload/retrieval can take weeks.
LTO tapes	\$15-\$30**	9**	3	9**	9	**Requires a \$2000 drive to read/write them. Industry standard archiving, but still a fire/theft danger.
Amazon Glacier	\$480+	3	3	3	10	True cloud backup of large amounts of data, but very cumbersome to access

Ingesting Media Files

Ingesting is the process of turning all of the pictures, videos and sound recordings into an annotated library of the best material. The order for doing this can matter, because the changes you make can lose information like the date and time a video was recorded.

First Step: sync content using the time stamp

- Label audio and 2nd camera files with the matching A camera file name
- Always add to a name, never replace a name
- Renaming or trimming files can lose date information, so do this first



Quiz

You film an interview with two cameras and an audio recorder. You end up with files for the A) primary camera, B) secondary camera, and C) audio device. Using the time stamps and the knowledge that the time stamps are usually added at the end of a video or audio capture, how should you rename these files?

A1789.mov	12:20	_____
A1790.mov	12:40	_____
B382.mov	12:10	_____
B383.mov	12:21	_____
B384.mov	12:39	_____
C8765.wav	12:43	_____

Content	Camera work
OPE - 0 PEople	UP - UPshots
1PE - 1 PErson	DOWN - DOWN shots
2PE - 2 PEople	TRAC - TRACking shot
+PE - many PEople	PAN - PANning shots
INT - INTerview	TIME - TIME lapse
ACT - ACTion	PULL - PULLing focus
BRO - B-ROLL	CLOSE - CLOse up
OK - workable quality	WIDE - Wide shot
GOOD - excellent quality	1ST - First camera
BEST - must include	2ND - Second camera

Labeling individual files

- Decide on tags to use consistently
- Sample tags: date, project, shot type, quality, people's names, description.
- Use a free batch processor like NameChanger (Mac) or File Renamer Basic (PC)

Ingesting video

- Leave a second or two of "handles" for transitions when trimming
- You won't need 5 takes of the same shot, but keep the second best just in case
- You may need to change the videos' codecs to work in video editors
- MPEG Streamclip (Mac, PC) is a great free program for trimming and converting video clips



'Yes well, legibility and correct punctuation might not be "street"... but that's how I roll, Mr "BAMO"'

Decoding codecs

Think of your video file like a book, and the codec is the font it is printed in. Really big fonts, like in children's books, are easy to read but take up a lot of space. Pocket dictionaries have really small fonts that fit a lot in. And some codecs are so condensed, like bad Twitter messages, that they lead to small losses of clarity or quality.

Your camera records in a "dictionary" style codec (often H.264), high quality but dense. Video editors like work with "children's" codecs (like Apple ProRes for Mac or DNxHD for PC) so they can make changes very quickly. And when you distribute your video you may need to use a "Twitter" style codec to make it small enough to stream online (like Divx).

One Track vs. Multitrack Editors

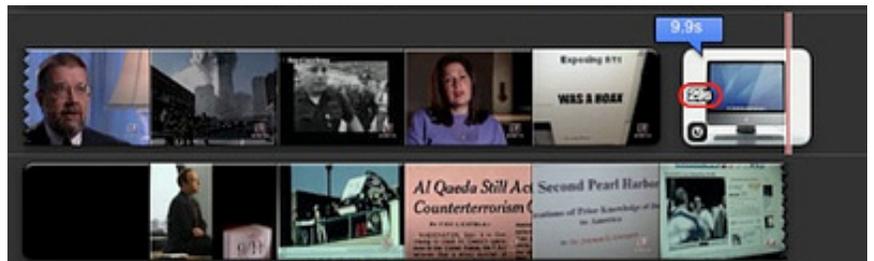
Your timeline is the sequence of video clips, photos, and sound files that combine to create the video experience. Some video editors have a single track timeline, while others have more tracks available.

One track editors

Windows Movie Maker and pre-2009 iMovie have very simple timelines. The images that you see are a linear string of video clips and pictures, and you have one audio track for narration or background music.

You can quickly assemble simple productions like video slideshows, but it will take a lot of work to do advanced tasks like syncing audio, adding b-roll, or compositing multiple visual elements together. Basically, you will have to treat each clip like a separate project, manually adding sound to images, exporting and reimporting the result.

iMovie '08 timeline



iMovie '09 timeline



Final Cut X timeline



Multitrack editors

iMovies '09 through '11 have a feature called Cutaways, which allows you to add b-roll images on top of your main timeline. You can only add one layer of imagery, but this is enough for most purposes. In addition, you can have an unlimited number of audio tracks for things like music, sound effects, and narration.



True multitrack editors like Final Cut and Adobe Premiere allow you unlimited numbers of audio and visual layers with more controls over how the layers interact. For example, you can give video layers angles and motion, like the opening sequence on TED talks videos.

Assembling Your Timeline

Just like when you write a story, you want both the text, dialogue and imagery to unfold in a logical way in your video unless you are intentionally creating a jarring effect. The more thorough your story line or storyboard, the easier this will be. If you have lots of unrehearsed audio, you may want to first convert it into text.

Turning unscripted content into a script

- It can be much easier to visualize content in text than in audio
- For long interviews, start with a rough transcript
- Every 30 seconds note the topic
- Take the most relevant sections and make an exact transcript
- Cut and paste all your audio in a word processor until it reads like an essay
- Be sure to keep the time codes with each line as you rearrange the text
- This file can then be used for subtitles and translations



Import your content into the video editing program

Most video editors have a “bullpen” of files ready to place into the video. In iMovie and Final Cut, these are called the library. Windows Movie Maker (WMM) only has a timeline, so every file imported into the program will be part of the final video.

You may find certain video files won't play in your video editor or require constant rendering. Transcoding them into a different codec may help. Final Cut X and iMovie automatically transcode video, but Premiere, WMM, and earlier Final Cut versions may need to convert the codec. MPEG Streamclip is a great free program for this. Be sure to keep the resolution of the video the same. Common editing codecs are Apple ProRes for Mac or DNxHD for PC.

Assembling the timeline

- Place your interviews, narration audio or headline music in first
- Mark beats in a music video style production
- Mark phrase, sentence or paragraph breaks in an interview

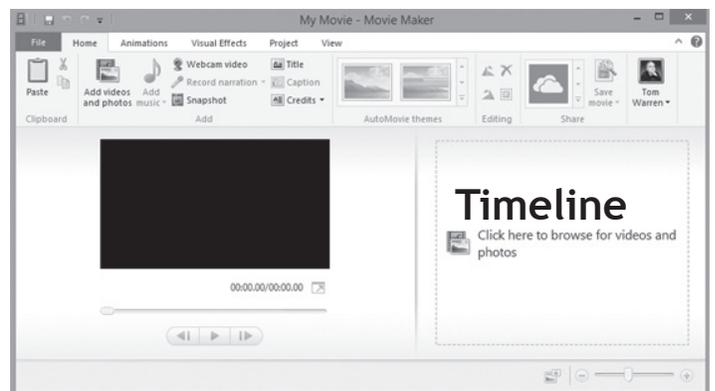


Final Cut X



44

iMovie



Movie Maker

Covering the Timeline with B-roll

Once the narrative core of your video is in the timeline, your goal is to fill the spaces between speakers, cover jump cuts between different parts of the same interview, and illustrate what your speaker is describing. This visual filler is called b-roll. In multitrack editors you can simply drag the b-roll clip onto another track in your timeline; for b-roll in Movie Maker see Appendix 1.

B-roll clip length

- Generally, clips last 3 to 10 seconds
- Faster cuts create a frantic, kinetic mood
- Slow cuts for scenes that change or a mellow mood
- The more happening in the clip, the longer you should hold it
- If there is text in the image, make sure people have time to read it
- Usually the b-roll is muted, but a little natural sound can be nice



"Sorry, sir -- they heard there was a new YouTube video out with a singing squirrel riding a tricycle while dancing with a chimpanzee."

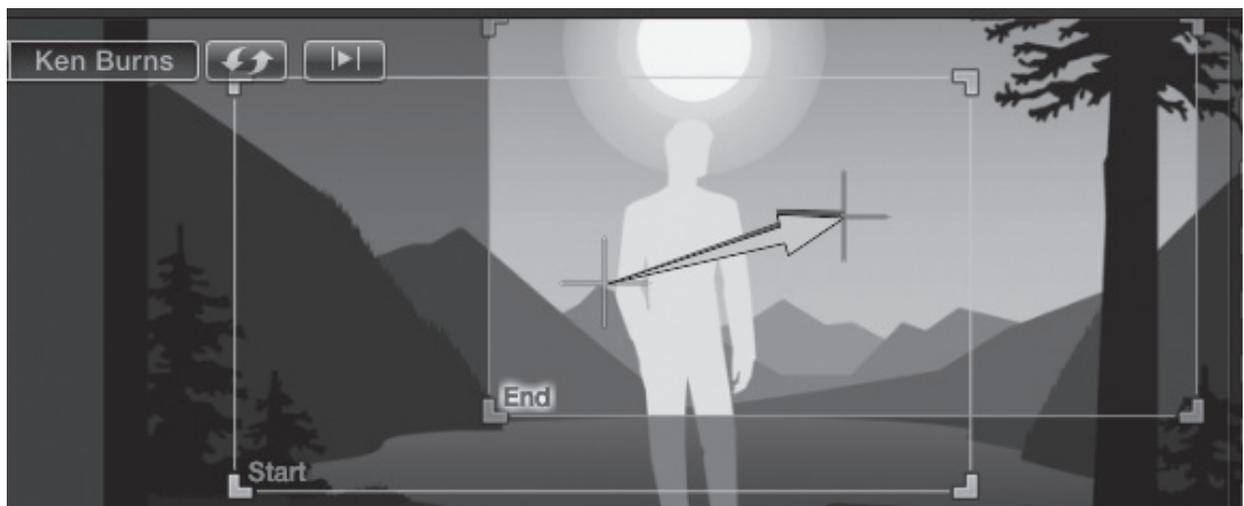


Which clips to use?

- Start with the best, fill with the rest
- Build around your most dramatic footage
- Match b-roll content/mood to narration using tags
- Organize clips chronologically or around themes for continuity
- Facial expressions and closeups provide emotional impact
- Wide and panning shots help set the scene and orient the viewer

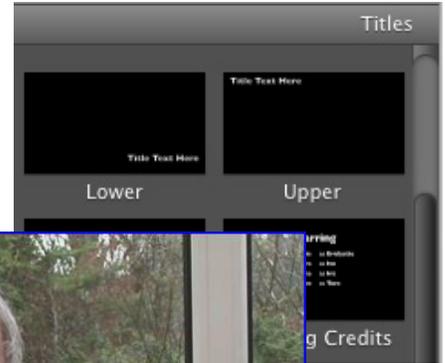
Bringing still images to life

- The Ken Burns effect - use zooming and panning to bring motion to the image
- Create versions of the image in a photo editor and fade between them
- Assemble a series of similar photos into a time-lapse
- Film people holding or pointing to printed images or documents
- Load the images into an animated template if you have one



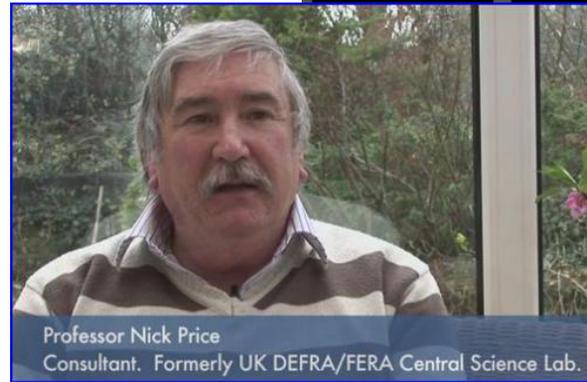
Compositing Images

Compositing is the art of showing multiple images on the screen at the same time. This is one area in which the power of your editing software really determines the tools you have to work with. The good news is that even the most basic editors have rudimentary functions to quickly add features like transitions and titles.



Titles

- Most video editors have preset ones that look pretty slick
- A title slide creates a film/documentary feel
- Lower thirds are standard for interviews
- You may choose to use text slides instead of narration
- Don't make people read and listen simultaneously!
- Credits for longer format and documentary style work



Picture in picture and green screen

- Can be used to show speaker's expressions and b-roll simultaneously
- Have a very "local newscast" feel unless used very creatively



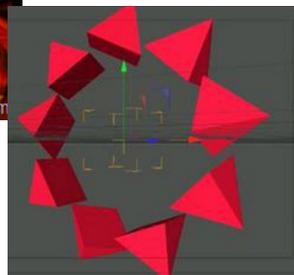
Opacity overlays

- Can be a powerful way of juxtaposing imagery symbolically
- Especially good when one image is very simple or textural



Split screen

- Creates a dynamic mood, similar to a montage
- Make sure to give clues as to where viewers' eyes should go



Animation

- Manipulating shapes to create visual effects or virtual characters
- Not something you need to worry about at this level!

Improving Video, Audio, & Photos



“We’ll fix it in post [production]” has to be the most clichéd punchline in the film industry. While it’s amazing what modern software can recover from a poorly lit shot or a muffled audio recording, this step can be the biggest time hole in the entire process. Before sinking a lot of effort into retouching a photo or cleaning up an audio track, make sure it’s indispensable to the piece. Auto correction features are faster than manual tweaks and filters in the video editing software are usually faster to apply than editing in another software program.

Improving video clips

- Panning can turn a static shot into a dynamic one
- Cropping creates the illusion of multiple camera angles
- Speeding up tripod shots results in a pseudo time lapse
- Slow motion adds drama - best with footage shot at a high frame rate
- Play with exposure and saturation for a natural and consistent tone, or use a special effect for variety

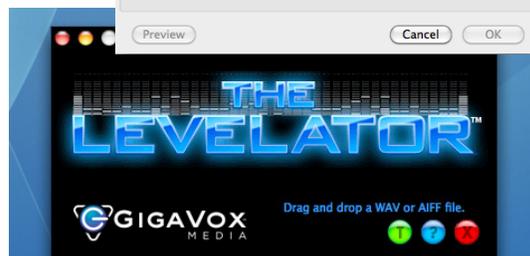
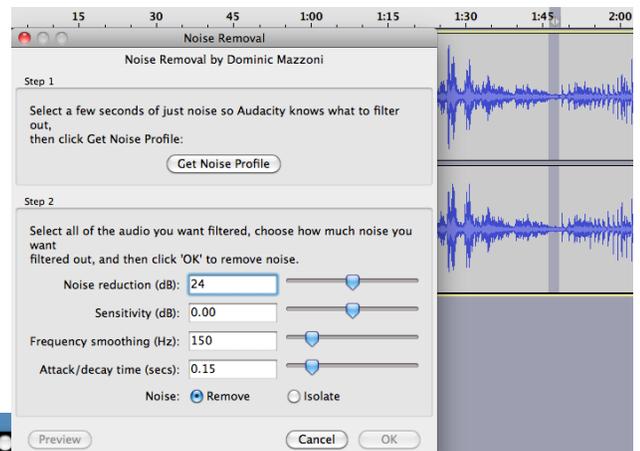


Improving digital photographs

- Changing the exposure and gamma brighten shadows
- Adjusting the color tone to produce natural skin tones
- The Ken Burns effect is particularly useful for bringing photos to life
- Adding static graphics like circles can help make a point
- Low resolution images can look better in black and white

Improving audio

- Very difficult! It might be easier to re-record
- The Levelator is free software that can auto adjust volume levels
- Audacity can remove consistent noises like hisses if you record “silence”
- Audacity can also cut out or mute “ums” and long pauses
- You can splice sentences together, but adding/ deleting words is challenging
- Adding background music or natural sound can mask audio problems

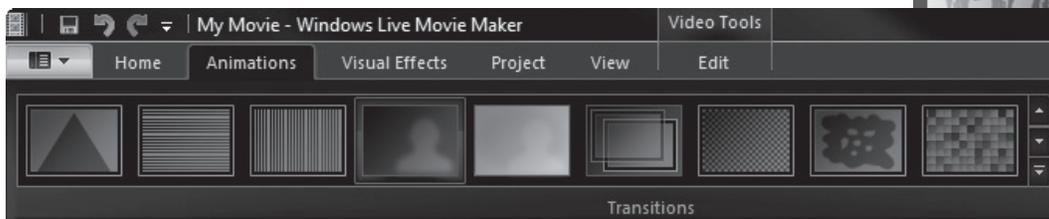
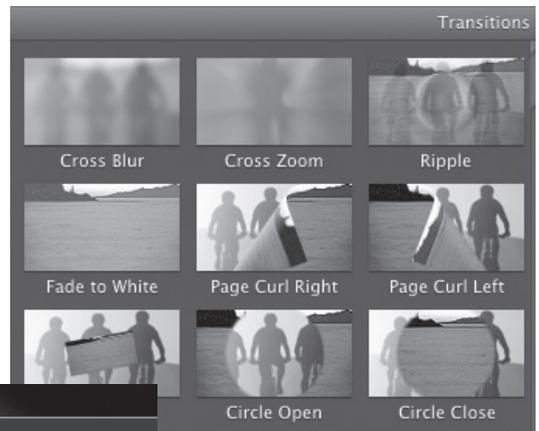


Final Touches

Once you have placed your narrative clips, covered them with B-roll, added titles or other compositing effects, and fixed any glaring problems with the audio or video quality, there are a few final flourishes that will greatly enhance your final video.

Transitions

- An artistic or gentle way of going from one clip to another
- Cross fades and dips to white or black are considered conventional
- Wipes and other transitions are less “serious” but can spice up slideshows
- Transitions are not mandatory! They make the piece less like a documentary and more like a movie



Audio soundscape

- Consider adding layers of sound underneath the main audio
- Natural sound from the b-roll adds realism
- Room sound covers the audio vacuum between speakers
- Background music sets a mood, covers audio problems. Try to avoid music with lyrics if there is narration or large blocks of text on screen at the same time
- Sound effects bring graphics and muted b-roll to life

Audio levels

- Most video editors measure sound levels from -infinity to zero decibels
- You can adjust the level by ear or in Audacity if your editor lacks a sound monitor
- Reserve 0 to -6 dB for loud events: crashes, explosions, shouting
- Keep dialogue generally between -6 and -12 dB
- Background music and natural sound good at -15 to -25 dB
- Listen on your best speakers or headphones to find the right balance



Credits

Crediting is extremely important and useful in web video. Being generous with your credits will inspire more people to help on future projects, improve Search Engine Optimization (SEO), and protect your fair use and creative commons usage legally. There are two nonexclusive ways to do this.

Credits in the video

- Provides a cinematic feel - better for longer and scripted pieces
- Ensures people get credit if the video is embedded on other websites
- Disadvantages: Lengthens the video, and not search engine friendly



Credits in the YouTube blurb

- Keeps the video short and punchy
- People will be more likely to watch until the end so you can roll over to another video
- Easier to make changes or add credits later
- Web searchable
- Can link to artists' and groups' websites

Tracking your credits

A good practice is to create a text file in the same folder as your media with names, descriptions, and links for all the online works you use in the creation of your video. Be sure to update the file every time you download something. Nothing is worse than trying to search the net for a cowbell sound you don't know how to attribute...



Crediting creative commons works

Adding the appropriate credit information to your videos could be as simple as a list of the works used at the end with their associated license. Eg:

This video features the following songs:

“Desaprendere (Treatment)” by fourstones, available under a Creative Commons Attribution-Noncommercial license.

“Some Other Song” by fourstones, available under a Creative Commons Attribution license.

If possible, it is desirable to make the title, author, and license links the viewer can follow.

Screening and Cutting

Condensing your video down to your target time is the most challenging task for any editor. Think about all those 3+ hour director's cut versions of popular films. Here are some tips to help you decide "should it stay or should it go!?"



Making the cut

- Don't go crazy about timing each clip down to the frame as you assemble the video. It might not make the final cut.
- Shorter is almost always better- high emotional and content density really matters on the web.
- Try not to let "sunk costs" sway you - if you paid to license that music, drove across town for that picture, or spent days building that graphic sequence and it doesn't work, axe it.
- Things that look fine to you can be painfully awkward when showing the video to others.
- Take feedback but retain creative control. You can't make a video by committee!



Sharing your rough draft privately

Video files are enormous to send over email, and the quality would be atrocious. Uploading the rough draft to YouTube as a private or unlisted video is a great option. You can email out the link to as many people as you like without presenting it as a final work to the general public. Private settings are more secure, but require that the person has a YouTube account. Creating a separate YouTube account for your rough drafts will ensure none accidentally get posted to your main channel.

Getting feedback

Often, people who watch a rough cut of your video will be overly nice or critical. Saying everything is wonderful or garbage does you no good. Here are some good questions to ask to get less-biased opinions:

- What was the most memorable part?
- Could you hear everyone clearly?
- Was the music too loud or too soft?
- Was the pace too fast or too slow?
- Did you have time to read all the text?
- How would you describe it to a friend?



Exporting and Posting Your Video

You've planned, filmed, and edited your video. Now for the hard part: getting people to watch it. The first step is getting a high quality version up online.

Exporting your final video

- Generally, export at the same resolution as your main camera
- Shooting 1080p and exporting 720p gives you lots of pixels for cropping, panning and stabilization
- Web video generally uses the h.264 codec
- For some editing programs, it is better to export in the current codec and compress with another program like MPEG Streamclip

Where to post your video?

YouTube is the obvious starting point for most nonprofits. It has the largest audience, fastest loading times, the ability to embed videos on other websites, it's free, and it's easy for search engines to find. In addition, they have great statistics on who is watching your video and for how long. A special bonus is their nonprofit program, which allows 501(c)(3) organization to put links to their websites or donation pages directly in their videos. You can also earn money by allowing advertising, but nonprofits should think carefully about consequences for their image before going down that road. The disadvantages are the limited control you have over how your video is presented, and the fact that it is a commercial site, so Creative Commons Noncommercial content is not allowed.

Vimeo has a certain cachet for being artistic and dignified. If your video has great cinematography or your cause appeals to artists, you will find strong support here. There will also be less competition from the other content sites like YouTube push at viewers.

Themed web video archives are a great way to target your video to a specific audience. For example, EngageMedia.org is a site for sharing environmental and social justice videos from the the Asia-Pacific region. Be very careful that your content matches the goals and restrictions of each site.

Your website should have all your videos embedded in it somewhere, with your most recent or highest production value works featured prominently. Unless you are already paying top dollar for web hosting, streaming videos from your website is both slow and costly. It does allow you total control over what content to include and how the video is presented.

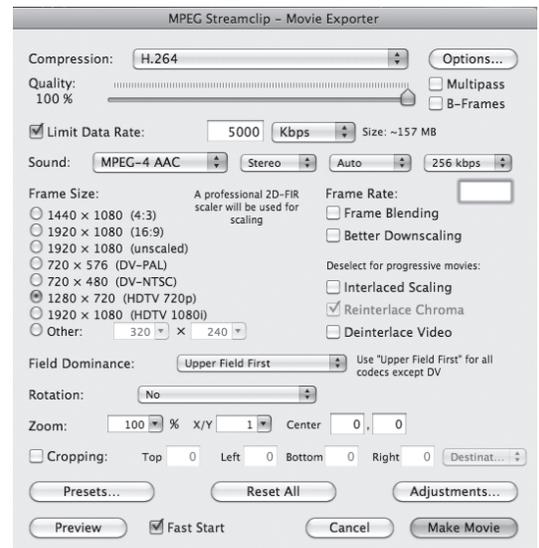
NOISE TO SIGNAL
Rob Cottingham · socialsignal.com/n2s



Okay, so there's no way this video's going viral.
Do you think the client would settle for going fungal?

Sharing your video on **Facebook** is a great way to target your supporters and build your web presence. Unfortunately, Facebook has poor analytics, videos aren't searchable or well organized, and most people play them inside tiny frames. This is fine for 30-second photo montages from a volunteer event, but not for a 10-minute documentary about your organization's 30th anniversary.

"All of the above" is a great strategy for reaching as many people as possible with the fruits of your labor. Just realize that the more platforms you use, the more content you need to curate. If someone posts a nasty comment on YouTube or the video on your website never changes, it reflects poorly on your organization.



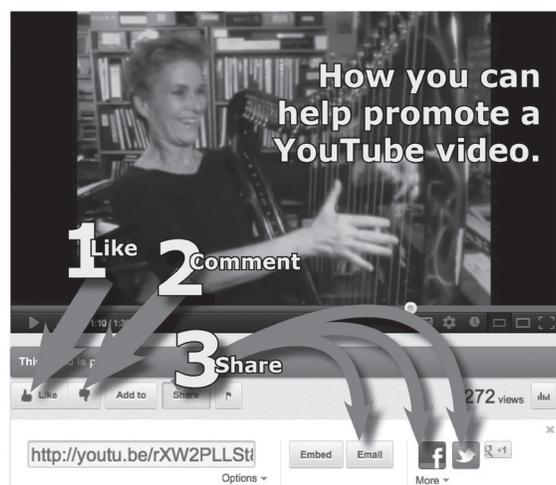
Promoting Your Video

So your video has been online for a week and only has 13 views. And you know your mom accounts for at least 10 of those. Don't despair! There are steps you can take to get more eyeballs on your reel.

- Give it a short, punchy and unique title
- Write a full description and add lots of tags so browsers can find it
- Email friends, volunteers, staffers, and members the link
- Put the link in your email signature
- Send the link to your sponsors, donors, and granting agencies
- Share the video on the organization's Facebook page
- Ask members to share it on their personal Facebook pages
- Tweet the link to partner organizations
- Post the link on forums for your issue
- Host screening parties, show it at fundraisers



- Enter it into online contests
- Get it played on public access TV
- Get media contacts to write or blog about it
- Place it on your website's landing page
- Have your most popular video "roll over" into your latest video
- Put a QR code linked to the video in your print media
- Ask viewers to like and favorite your video
- Like and favorite other nonprofit videos
- Invite response videos, respond to any comments
- Run through traffic in your underwear



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"Mason, it appears that you're the only one in middle management who hasn't 'Liked' the 'Cute Puppy' video I posted on Facebook."

search ID: mbcn2518

Expectations

How many people view your video will largely be based on the size of your organization, the number of followers/likers on your social media platforms, and how many subscribers there are to your newsletter distribution list. A couple hundred hits for a volunteer event slideshow or client testimonial is typical, and don't expect more than a few thousand for a flagship microdocumentary about your group. Short educational videos like fixing a bike or planting a local garden can score tens of thousands of hits, but won't necessarily drive traffic to your website or volunteers to your doors. A "balanced diet" of educational, advocacy, and promotional videos will maximize your organization's visibility.

Appendix 1: B-roll in Movie Maker

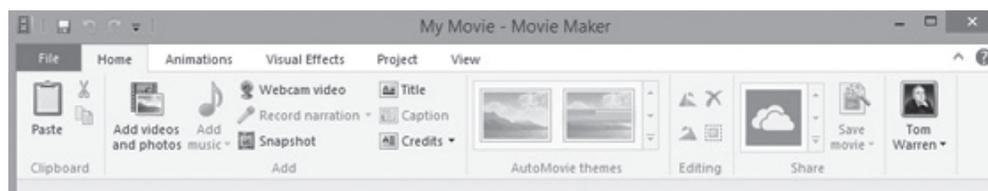
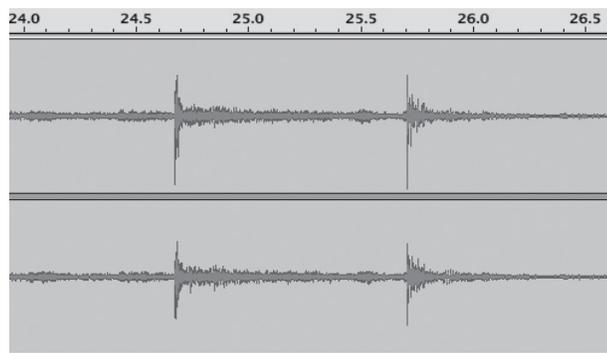
A synced audio interview with background music and b-roll can be done (painfully) using Movie Maker (WMM) and Audacity.



1. Record an interview, using a microphone plugged into a laptop, iPod or smart phone to capture the audio and an HD video recorded like a Flip Video, camcorder or DSLR.
2. First, sync the audio from the interview with the video using the waveform of the clap in either WMM'12 or iMovie. For WMM'11 and previous versions, use the Audacity directions below.
3. Use the trim tools to select which parts of the interview you want in the final video and in which order. For long interviews, a transcript can help with this process.
4. Decide which portions of the video you want the speaker to be on camera for. Ideally, the breaks between on and off camera come at the end of “sentences and paragraphs” in the interview.
5. Copy each of the sections that you want to cover with b-roll into a separate timeline, and save them logically (BROLL_SECTION_1.mov) or export only the audio if that is an option and skip to step 7.
6. Open each of the b-roll section movie files in Audacity to separate the audio. Save them logically (i.e. BROLL_SECTION_1.wav).
7. In your master interview file, add back the audio files for each section of b-roll, delete the interview video for that section, then cover that section with alternative images, making sure the length exactly matched the audio length.
8. Export the complete interview with both on-camera and b-roll sections as a movie.
9. Reimport the interview as a video clip, then use “add music” to add a background music track.

Syncing audio using Windows Movie Maker 2011 and previous

1. Use the time stamps to pair each of the audio and video recordings, then open each pair of files in Audacity.
2. **VERY IMPORTANT:** select the Audio Recorder audio file from the clap onward and copy and paste it into a new track in the Video file audio. Vice versa will not work.
3. Zoom in on the clap and slide the Audio Recorder audio to align with the Video audio file.
4. Select the Video audio track from the clap onward and delete it.
5. Export the resulting file with the name of the video file + “sync audio.”
6. Open Microsoft Moviemaker Live (WMML) and place the video clip in a new timeline.
7. Click “Add Music” and add the audio file you just exported which will show up as a green bar above the clip.
8. Export the resulting movie at the same resolution as the raw video file, adding the tag “synced audio” to the name.
9. Repeat for all the video clips requiring audio syncing, then drag the resulting clips into your project timeline.





ChangeStream
Media

Upstream 2012

We would like to thank our participating organizations for sending representatives **ART!** for **ANIMALS'** Sake

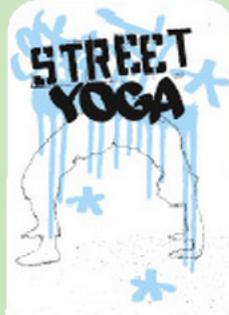


BIKEWORKS



zero
waste

washington



NORTHWEST

Kidney Centers

Live. Learn. Hope.



SCIDpda



LIFE OPPORTUNITIES FOR PEOPLE WITH DISABILITIES



Thanks also to our guest speakers Hannah Whitmore, Aubrie Campbell Canfield, TJ Williams Sr., and Jay Windland. Finally, thanks to our snack sponsor, Serafina and Cicchetti, our workshop host Environmental Works, and the sponsor of Upstream 2012, West Monroe Partners.

Serafina
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BUSINESS IN THE RIGHT DIRECTION.
GO WEST.



Technology know how
People who care:
Making a Difference



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