Wirecast 14 Release Notes

System Requirements

	Minimum	Recommended
Operating System	Windows 10 1809 or higher, macOS Mojave 10.14 or higher	Windows 10 2004, macOS Big Sur 11
Processor	Intel i5 dual-core @ 2.3GHz[1] 6th generation[2] or higher, Apple M1	Intel i7 quad-core @ 2.8GHz+, 6th generation[2] or higher, Apple M1
Memory	4GB RAM	16GB+ RAM
Hard Drive	2GB[3], 7200 RPM for record to disk	500GB+, Solid State OS Drive
Graphics Card	Intel HD[4], DirectX 11 capable	Nvidia GeForce or AMD Radeon, 1GB+ video memory
Internet Connectivity	You may want to check that the following ports are open for traffic on your network: 80 (HTTP/HTTPS), 443 (SSL), 1935 (RTMP), 2935 (RTMPS), 3478 (STUN/Rendezvous), 5349 (STUN/Rendezvous), 5353 (mDNS for NDI sources), 5960-59xx (NDI port range, 1 port per each NDI source in use), 7272 (Remote Desktop Presenter), 49152-65535 (WebRTC Media/Rendezvous – selected at random). If you are behind a firewall, check with your streaming destination for any sites you may need to whitelist.	

[1]May be insufficient for 1080p+ or 60 fps workflows.
[2]_How to check the generation of your Intel processor_
[3]Additional hard disk space required for record to disk.
[4]Insufficient for advanced Multi-Viewer workflows.

Languages Supported:

- English
- German
- Italian
- Brazilian Portuguese
- Chinese (Simplified)
- Japanese
- Korean
- Czech
- Dutch
- French
- Spanish
- Swedish

Upgrade Information:

- An internet connection is recommended for Wirecast 14 license activation.
- As long as your Wirecast (version 8 or higher) license is entered into the software and your Basic, Standard or Premium support subscription is active, you will be allowed to upgrade to the latest unlocked version of Wirecast for free.
- View full upgrade information

Add-ons:

- **Remote Desktop Presenter** - Please use the Remote Desktop Presenter version 2.0.8, available as a separate download from Telestream: www.telestream.net/dtp
- **PLEASE NOTE: Wirecast 9 and later versions have dropped support of HDV licenses/cameras.** Please click here for additional information.

Best Practices

Minimum Required Upload Speed:

- It is recommended that an upload speed rate of at least double the selected video bitrate be available, especially for a total target bitrate of 10Mbps (Megabits per second) or less, or when there are multiple outgoing streams.
- Upload speed can be tested at a website such as TestMy.net/upload.
- Additional tasks that can consume upload bandwidth on the network should also be considered when determining how much of the available upload bandwidth can be allocated towards streaming.

Rendezvous

Wirecast Rendezvous uses WebRTC technology that can be very resource intensive. For the best experience, we suggest considering the following table when choosing hardware:

	Studio *(2 guests + 1 host)*	Pro *(7 guests + 1 host)*
Bandwidth[5]	Add 4 Mbps	Add 5+ Mbps[6]
Processor[5]	i5 quad-core[7]	i7 quad-core[7]

[5] Based on a single simultaneous stream of 720p30 x264 @ 4.0Mbps.
[6] Bandwidth per guest will scale downwards as more are added to maintain reliability.
[7] Minimum recommended processor with example stream[4]. More demanding workflows may require a more capable CPU.

See our Rendezvous Best Practices Guide for more information.

ISO Recording:

- Solid State Drive or fast RAID array recommended for ISO Recording and Replay functionality.
- Actual data rates will vary depending on quality level selected for ProRes or x264, as well as the resolution and frame rate selected.
  - For ProRes recording please refer to Apple's ProRes data rate specifications.
- Total expected data rate should be compared to available disk write speed to ensure adequate disk throughput.

Failure to ensure the available disk write speed is greater than the highest expected total data rate may result in frames being dropped from recordings (ISO, Replay, and Record-to-Disk).
See our ISO Recording Guide for more information.

Best Practices (cont.)

Hardware accelerated encoding requirements:

- Intel Quick Sync Video encoding requires an Intel CPU with an Intel® QuickSync Video core.
  List of Intel CPUs supporting QuickSync
- NVIDIA NVENC encoding requires an NVidia GPU with Kepler architecture or newer.
  NVIDIA only maintains a general list of supported GPUs
- Apple Hardware Accelerated H.264 encoding requires a Mac with an integrated Intel GPU*.
  - *This may change in the future, as the Apple API decides what hardware acceleration method is to be used. At the time of this writing, only Quick Sync via an Intel GPU is supported.*

High frame-rate streaming (60fps):

- High frame-rate streaming will result in increased CPU usage and require a higher bit rate (4Mbps or higher) for a quality encode.
- Simply switching to a higher frame-rate without ensuring the CPU and bitrate are sufficient may result in a lower quality encode.

CPU Usage:

- Consider lowering your canvas frame rate and/or streaming resolution to lower CPU usage.
- Maintained system CPU usage greater than 60% will increase the likelihood of dropped frames.

(End of Page)

Wirecast 14.3

- **New! Title Engine:** New library of animated titles! Choose from over 25 (with more on the way!) high quality, customizable animated titles. Add your logo, change colors and fonts, and adjust timing of animations.
- **New! Secondary Display Live Output Audio mapping:** We now allow you to map Audio Tracks to Secondary Display Live Output
- **New! Media Playback in Live window:** Control playback of media clips while they are Live.
- **New! In/Out point selection:** Editable text fields showing the current in & out point times of media.
- **Improved! Trace Logs** for better information when diagnosing issues.
- **Improved! Integration** with AverMedia Live Gamer BOLT GC555 capture cards.
- **Improved! AVFoundation Source capture:** Made some fundamental changes to the way we bring in AVFoundation sources to improve sync drift between USB devices.
- **Improved! Countdown Clock:** Added 60+minute display in Countdown Clock.
- **Improved! Media File finder:** Access the original file location of a media file from the context menu on the Shot Layers tab.
- **Improved! Virtual microphone monitoring on Windows:** We now really do allow monitoring of Wirecast Virtual Microphone audio on Windows 10.
- **Improved! Updated technology, including:** Facebook API to v10.0, WebRTC to 4430 (m90), and NDI SDK to v5

Fixes:
- WIRE-19090: A replay shot now scales properly with the replay template
- WIRE-19044: Added '+' and '–' zoom buttons to work with PTZ NDI cameras that don't have absolute positioning implemented.
- WIRE-19039: Beta users may have noticed that titles were not retaining text/image changes when loading saved document or shot template. Now they do.
- WIRE-19020: Twitch Ingest Server can now be changed, and selections are retained.
- WIRE-19016: Fixed a crash that could occur when authenticating to Twitter/Periscope.
- WIRE-18976: Renamed old Title sources to Title (Legacy).
- WIRE-18970: Multiviewer Configuration will now scale properly regardless of your monitor DPI, so that all layouts can be seen
- WIRE-18960: Improved Performance of YUV converter needed for x264 encoder. Performance is improved by roughly 5x.
- WIRE-18945: Audio Mixer Audio Track selection is now saved.
- WIRE-18940: Wirecast no longer moves to a different monitor when Maximized->Minimized->Maximized on Windows OS.
- WIRE-18934: Shortcuts assigned to number now work on numpad again.
- WIRE-18900: Fixed a crash when using Twitter widget with certain UTF-16 characters.
- WIRE-18890: Blackmagic SDI Input configuration will no longer get locked after switching from Automatic to Manual.
- WIRE-18878: Made iOS video capture on Apple Silicon and Mac work better.
- WIRE-18850: PTZ Preset Recall will now work more reliably when using a Playlist.
- WIRE-18845: Now you can change the Audio Sample Rate of the Telestream System Audio Capture driver while Wirecast is capturing without dire consequences.

- WIRE-18813: Audio capture on Mac can now support various sample rates from the audio driver.
- WIRE-18811: The ticker collecting bandwidth statistics now stops after a Rendezvous session is disconnected.
- WIRE-18793: Fixed an issue that caused the playlist tab to not display correctly in certain circumstances.
- WIRE-18789: Now you can use PTZ controls with more than one Sony PTZ camera in your document.
- WIRE-18766: Fixed an issue that could cause an error message when outputting to YouTube, and in general improved error alert messages and logging for YouTube.
- WIRE-18758: We added a proxy image to let you know that you have overly HUGE files, and we are automatically downsizing them to a more appropriate size. This will only happen the first time you open an existing document.
- WIRE-18751: Fixed Window Screen Capture on Mac where in some instances it was unable to follow window changes.
- WIRE-18721: Fixed an issue where you couldn't activate a license if you had no internet connection.
- WIRE-18717: Transitioning between a shot with an audio source and a playlist with media no longer removes any of the Audio FX settings.
- WIRE-18692: MOV and MP4 recordings no longer have incorrect file creation date.
- WIRE-18679: Encoder preset dimensions now continue to update even after invalid dimensions are provided.
- WIRE-18659/WIRE-18575: Updated to work better in situations where we detect an audio sample rate that is different than what the source is telling us they are delivering. (This was particularly true for AVIPAS PTZ cameras)
- WIRE-18657: When you drag a shot onto another shot, now a warning message will appear giving you the option to 'cancel' or 'create' a playlist.
- WIRE-18634: Now, when you add media, you will be shown the location of your last imported media file.
- WIRE-18625: Wirecast no longer crashes when opening text files encoded with specific formats.
- WIRE-18613: Fixed a crash that could occur after deleting an output destination.
- WIRE-18596: Fixed an issue where a Rendezvous session webpage would not display all the guests depending on browser.
- WIRE-18555: added more information that could be helpful to us and the user, in the case of a websocket error when using Rendezvous
- WIRE-18547: Fixed a crash when opening certain MPEG-4 Version 3 files.
- WIRE-18407: Improved ability to capture video from Sony Imaging Edge Webcam software.
- WIRE-18369: We reimplemented the ability to stream to Facebook using the Device Pairing workflow (which lets you stream to Facebook using a one-time stream key, rather than having to sign into a Facebook account)
- WIRE-18359: Updated the Quicksync SDK to fix an issue where the Quicksync encoder was not working with new drivers.
- WIRE-17978: We now let you save your document when you have so many unused sources that need to be deleted, it takes up all the available window real estate.

- WIRE-17843: When switching back and forth to a playlist tab all your layers will retain their sizes.
- WIRE-17779: Fixed an issue where Virtual Mic output on Windows would not include sources that were removed from the Monitor's mix.
- WIRE-17172: Preferences for Camera no longer reset after rebooting computer.
- WIRE-16880: Fixed an issue in Rendezvous where if browser didn't send any video, we would not send audio.
- WIRE-16256: Now you can happily mute Replay Template shots.
- WIRE-10914: We now do a better job of collecting crash dump files on Windows.

KNOWN ISSUES
- WIRE-19145: AVFoundation audio sources do not appear in the list of Rendezvous Microphone sources until they are added to the document.
- PTZOptics Cameras will not work with the PTZ Controller using NDI Protocol until the firmware is updated on the camera. VISCA Protocol will still work with older versions of the firmware.

Wirecast 14.2.1

Fixes:

- WIRE-18841/WIRE-18685: Put some bits in to help us diagnose installer issues in the future.
- WIRE-18833: Squashed a memory leak when using Image Carousel.
- WIRE-18798: We now make two attempts to uninstall previous versions of Wirecast during an update or reinstall on Windows. First we'll try silently. If that fails, we will nag you to once and for all quit all other apps using Virtual Mic/Camera, for Pete's sake.
- WIRE-18794/WIRE-18784: Fixed a crash when starting an RTMP output when the CPU doesn't support AVX instructions.
- WIRE-18780: Fixed an issue where locked Thumbnail images would occasionally not load from a document.
- WIRE-18765: Placeholders are now available to all license levels of Wirecast, not just the privileged Pro users.
- WIRE-18715: Fixed an issue where Wirecast was not installing correctly (or at all) on certain Windows machines.
- WIRE-18760: Fixed a crash when importing QuickTime Animation files on machines that don't support AVX instructions.
- WIRE-18517: Fixed crash when starting an x264 encoder when running Wirecast in the Rosetta emulator.

Wirecast 14.2

- **New! Apple Universal Support -** Now Wirecast can be run natively on M1 Macs
- **New! Placeholders and Shot Templates:** New and improved Shot Templates let you easily add a pre-configured shot layout to your document or save any shot as a Template. And assign cameras or sources to Placeholders to quickly add a source across a number of shots in your document. Especially useful for pre-configuring shots for Rendezvous guests!
- **New! Secondary Display Output (Pro-only):** Adds a new type of output that sends the live program feed to a secondary display without the need for specific hardware. Great alternative for hardware-based program out but can also be used as an alternative to Virtual Camera/Microphone when paired with a capture device.
- **New! Lock Shot Icon:** Now you can take a snapshot of your live shot and save it as the icon thumbnail image.
- **New! Shot ISO indicator:** You'll see a tally indicator on shots that are currently being ISO recorded.
- **New! PTZ Control of X-Series Sony cameras:** Added Sony X-Series VISCA/UDP protocol profile in the PTZ controller.
- **New! LinkedIn Live Auto-Captions support:** Make your LinkedIn Live broadcasts more accessible by adding auto-generated captions to any LinkedIn Live video.
- **New! Updated the app icon to Big Sur style on macOS:** It's minor, but thought we'd mention it.
- **New! Input connection selector for Blackmagic devices:** This new option lets you select the type of video/audio input connection (HDMI/SDI) used for incoming

Blackmagic Designs sources. This helps ensure you have the right connection chosen, to reduce errors in your incoming sources.

- **New! Audio in Web Page source:** Added the ability to adjust audio from a Web Page source as well as stream it out as part of your broadcast.
- **Improved! Several Clock enhancements including:**
    - **Auto-start countdown**: An option to automatically start the countdown clock when it gets pushed live, saving time and clicks.
    - **60+ min:** Added the ability to set times in minutes greater than 60 minutes, useful in sports and other applications.
    - **Countdown to specific date:** Countdown to a specific date and time, for longer broadcasts and countdowns.
    - **New display options:** Including US-centric date formats, and a day-of-the-week-only option.
- **Improved! Text Scrolling improvement:** There is now a checkbox option in the scrolling section of the text source properties (defaults to enabled) titled "Restart when pushed live". If enabled, scrolling will restart from the beginning when the shot containing the text source is sent live.
- **Improved! Virtual Microphone monitoring on Windows:** Now in Windows you can monitor of the audio output of Wirecast while outputting the Wirecast virtual microphone.
- **Improved! Windows Installer Improvements:** Just making it a better experience for all.
- **Improved! Rendezvous guests in Favorites tab:** Rendezvous guests will now appear in the Favorites tab if Rendezvous Shot is favorited.
- **Improved! M4V files** can now be selected.
- **Improved! Image Carousel:** Improved rendering for Image Carousels
- **Improved! Automatic image downscaling**: Images larger than the current document's canvas will now be automatically downsized before being loaded into Wirecast for better performance.
- **Updated technologies:**
    - **VLC library:** Updated libVLC to version 3.0.12
    - **CEF:** Updated Chromium Embedded Framework to version 88.0.4324.182.
    - **NDI:** We've updated to versions 4.6.2 (Windows) and the (M1 supported beta) 4.6.1 on Mac.
    - **WebView2:** Now using WebView2 for embedded browsers on Windows.

Fixes:
- WIRE-18740: Memory Leaks in Shot Template and Stock Media Dialogs.
- WIRE-18688: Windows installer now installs correctly on Windows 10 N editions.
- WIRE-18672: Fixed a rare crash on macOS.
- WIRE-18607: Fixed an issue with Virtual Microphone on M1 systems.
- WIRE-18686: Now you can happily hear sound when using Secondary Display Live Output with audio devices that have more than 2 channels.
- WIRE-18637: Made the Wirecast Support Assistant app on Windows legit by code signing it.
- WIRE-18616: Fixed a memory leak that would slowly grow over time when capturing Remote Desktop Presenter sources on macOS.
- WIRE-18608: Disabled LinkedIn Live Draft Mode until it's officially supported by LinkedIn.

- WIRE-18593: Fixed some issues with NDI sources.
- WIRE-18588: Removed Telestream Cloud Settings from Wirecast Output Settings as we are sunsetting this service. See more info here.
- WIRE-18581/WIRE-18531/WIRE-18366: Fixed a rare crash that could occur when running Wirecast with other programs on Windows.
- WIRE-18548: Made some improvements to media playback on macOS.
- WIRE-18544: Added Title and Description requirement for Facebook streams.
- WIRE-18533: MIDI and XKeys controllers are now working on macOS.
- WIRE-18526: Custom Mattes now again display in the Shot Layer Properties menu.
- WIRE-18472: Fixed a crash that could happen if "Keep Reading File" was checked in a Text File Mode shot.
- WIRE-18467: Localized dates correctly in Clock Widget.
- WIRE-18463: Fixed a crash when opening certain older documents with a countdown Clock source on Windows.
- WIRE-18461: Fixed a crash that could happen when playing certain MP4 files on Windows.
- WIRE-18442: If you switch Timestamps mode while outputting, this should no longer introduce an A/V sync issue.
- WIRE-18416: Fixed an issue prohibiting some MP4 files to be imported.
- WIRE-18414: Fixed a rare crash when a program is making OLE scripting calls at shutdown.
- WIRE-18400: Fixed an issue with the Wirecast installer on Windows silently failing if Wirecast is running in the background.
- WIRE-18395: Fixed Clock Widget crashing if reset button is clicked in countdown mode when an invalid time format is specified.
- WIRE-18389: Now the Clock Widget won't annoyingly show you an alert message twice when an invalid time format is specified. You'll be alerted once. So pay attention.
- WIRE-18349: We no longer will allow installation of Wirecast on Windows 10 versions less than 1809. Please update Windows.
- WIRE-18324: We made it easier to save a Shot ISO Filename value by clicking OK.
- WIRE-18303: Fixed a Rendezvous conundrum where guests wouldn't actually leave a session if they disconnected while the host was ending the session. (There's probably a joke here about guests overstaying their welcome...)
- WIRE-18295: We now disable ONVIF devices by default. This can be enabled in the Preferences->Advanced section.
- WIRE-18289: Fixed an issue where some saved documents (specifically with long audio asset names) couldn't be reopened.
- WIRE-18287/WIRE-18286: Removed CEF and activated WebView2 for embedded OAuth browsers in Output Settings.
- WIRE-18260: Now your Output Settings will not be overwritten when you delete another Output destination.
- WIRE-18211: Fixed a minor issue where long shot/source names would cause the Add Source dialog box to expand.
- WIRE-18203: Fixed a Typo in the install Telestream Audio Capture alert dialog. Nothing to see here.

- WIRE-18197: Fixed privileges for LinkedIn Live – Now it only retrieves company pages for which you are an admin.
- WIRE-18126: Fixed some strange behavior with Image Carousels when you set a long transition time.
- WIRE-17917: Automatically downscale images larger than the maximum canvas size to avoid crashing when the image is larger than the maximum Metal Texture dimensions on macOS.
- WIRE-17607: Fixed an issue where certain images wouldn't display in the Image Carousel.
- WIRE-16688: Fixed an issue where Live Audio would not play after loading documents set to show Preview only.
- WIRE-13900/WIRE-13613: Fixed an issue where Multiviewer would not discretely output to certain HDTV displays when they were the exact same model.

KNOWN ISSUES
- WIRE-18573: Mainconcept H.264 encoder is not supported on M1 systems.
- WIRE-18572: Unicast and Multicast Outputs are not supported on M1 systems.
- WIRE-18517: Starting an x264 encoder crashes Wirecast when running in Rosetta. We've decided not to support Rosetta mode.
- WIRE-18496: Legacy Text source has been removed. This means that certain Legacy Text properties that are not compatible with the new Text Widget won't be available.

Wirecast 14.1.2 (Mac only)

Fixes:
- WIRE-18339: Fixed a rare crash on macOS that could appear more frequently when there were many Screen Captures and/or System Devices in the document.
- WIRE-17996: XKeys Controller now works with macOS Big Sur.

Wirecast 14.1.1

Fixes:
- WIRE-18445 / WIRE-18444 /18397: Fixed several issues with YouTube encoder presets not behaving. (Please Note: if you encounter any issues with the YouTube output destination, please report that to our support team, and if needed, a workaround is to use the RTMP destination to your YouTube account.)
- WIRE-18420: Fixed an issue where some people couldn't create Facebook Events on their accounts.
- WIRE-18404: Chroma Key now works again on macOS Mojave.

Wirecast 14.1

Wirecast 14.1 incorporates new features that will enable new workflows and improve your existing ones. Here's a quick rundown of some of the new features and important improvements and fixes in version 14.1.

- **New! Rendezvous back-channel chat**: Enables behind-the-scenes messaging between hosts/guests.
- **New! Shot ISO (Pro-only)**: You can now independently record any shot in your document, including Rendezvous shots, audio-only shots or any user-generated shots. Great for NLE workflows.
- **New! SRT output**: Support for Secure Reliable Transport (SRT) output via Caller method. Supports x264 and Apple H.264 encoding methods. SRT is an open-source video transport protocol that enables the delivery of high-quality and secure, low-latency video across the public Internet. http://www.srtalliance.org
- **Improved! Mac Audio capture plugin**: Restored the ability to bring into Wirecast any audio any running apps are producing on your Mac
- **New! ProRes encoding on Windows**: Great for NLE workflows, now available for Windows, for both ISO recording and record to disk.
- **New! Canvas preference page**: Time-saving default for document canvas size, video frame rate, and snapping settings.
- **Improved! Media playback improvements**: Performance and efficiency improvements for playback of PNG animations.
- **Improved! Rendezvous connection improvements**: Better reconnection if your Rendezvous guests somehow get disconnected.
- **Updated! Blackmagic SDK**: Adds new resolution options and also fixes some issues when capturing certain resolutions.
- **Fixed! Audio distortion with Blackmagic output**: Fixed an issue where some audio could become distorted on output with Blackmagic devices.
- Plus, lots of other bug fixes and improvements!

Full Release Notes

New & Improved:
- WIRE-18344: Added US-centric date formats to Clock Widget.
- WIRE-18168: Removed Facebook Live with User Code Destination. Facebook has deprecated this functionality.
- WIRE-18064: Added a new dynamic destination for Castr.
- WIRE-18021: New and improved System Audio Capture on Mac - works on T2 chip Macs and on macOS Big Sur. Better performance, more reliable, delicious on toast.
- WIRE-18004: Treat yourself, once again, to cropping by percentage. (And for those of you who liked cropping by pixels, we got you covered).
- WIRE-18000: You can now happily hide your cursor when screen capturing on Windows.
- WIRE-17998: ISO recording doesn't have to be hard, but we tried to make it easier by adding better error messaging for common ISO recording problems.
- WIRE-17966: Major improvement to ISO recording. Now you can ISO Record SHOTS! (Think Rendezvous shots, Wirecast Go shots, audio only shots…). To nerd out on this, read our little companion novel here.
- WIRE-17952/WIRE-17898: In some cases, devices don't provide accurate time stamps. This can cause A/V sync issues. We now expose an option in System Device Properties to use timestamps "Provided by source" or "Generated by Wirecast". More info here.
- WIRE-17901: Updated the look of the Rendezvous Session window to make it match the Rendezvous Dashboard.
- WIRE-17875/ WIRE-17220: Made improvements to auto-reconnect Rendezvous. Previously, if the connection to Rendezvous was cut-off for any reason (e.g. unplugging ethernet cable, switching WiFi connections, network failure, etc.), the video displays for your Rendezvous guests would freeze and not restore themselves even after whatever caused the network failure was fixed. Now we will try to reconnect 8 times. When the reconnection process begins, a progress wheel widget is displayed in the bottom right next to the 'Disconnect' button. If reconnection fails, you are automatically disconnected from the session and given an error message.
- WIRE-17810/WIRE-17404/WIRE-13505: New! Added the ability to output via Secure Reliable Transport (SRT). Read more about SRT: http://www.srtalliance.org.
- WIRE-17636: We jazzed up and improved our Clock Widget, because 2020 seems like a really good time for some self-improvement and decluttering.
- WIRE-17745/ WIRE-14963: If you check out Preferences, you may just notice a new option called "Canvas". Yep, now you can set a whole bunch of default settings for your broadcast canvas.
- WIRE-17660: Ooh, shiny new update for our Blackmagic SDK to version 11.6.0, adding support for capture and output of more video formats. Note, this will require an update to the Blackmagic drivers- but don't worry, we'll display a warning in the user log if you need to update your drivers.
- WIRE-17573: Now, you can schedule your LinkedIn Live video on your Page or profile in advance.
- WIRE-17442: We now show ISO recording errors in the app Notifications window instead of rudely interrupting your workflow with a modal dialog box.
- WIRE-17082: Improved the performance of 4K webcams.

- WIRE-16861/WIRE-16704: We now enable ProRes recording on Windows (for regular recording and ISO recording).
- WIRE-14425: Added a field to specify how frequently you want to update your RSS feed in the Text Widget. Minimum value is 5 seconds.
- WIRE-14052: A default Replay speed can now be set at 0.25x, 0.5x, 1x, or 2x.
- WIRE-13977: With our updated Shot ISO recording feature, you can now map a single audio source to multiple video tracks (shots).
- WIRE-13636: Increased the maximum video delay value to 10 seconds.
- WIRE-13575: New Rendezvous Chat feature. Now you can message instantly with your Rendezvous guests, right within the app. Confirm they're ready, tell all the guests you're going off script, or let someone know they have spinach in their teeth.

Fixes:
- WIRE-18364: In a continued effort to banish 2020 from our memories, we updated our About box to display 2005-2021.
- WIRE-18343: Fixed an issue where the Clock Widget's time display could go out of sync with real time when the computer went to sleep.
- WIRE-18342: Our Live Icon thumbnails were not updating when showing a Clock. They do now.
- WIRE-18330: Fixed an issue where StreamDeck Multi Shot by Name wasn't working on Windows. This update will be distributed via the Stream Deck Plugin.
- WIRE-18311: Added a note to in-app Cloud Settings page that the service will end March 15th, 2021. On that note, please be aware: Wirecast Restream and Wirecast Live Captioning features are being phased out. The last date to renew a subscription will be March 15, 2021. Learn more
- WIRE-18302: Now it's no longer possible to input 0 for size in the Shot Layer Properties size box when Locked Aspect Ratio is enabled.
- WIRE-18296: We wrangled the Cross Dissolve transition to once again fade audio instead of cutting it.
- WIRE-18291: Squashed a crash that could occur when attempting to stream to SRT after deleting another configured output.
- WIRE-18283: Fixed Shot Layer Drop Shadows on the Clock Widget.
- WIRE-18272: Multiviewer was only displaying on the primary monitor when running Wirecast through the Rosetta emulator on macOS M1 machines. It now happily will display on other monitors.
- WIRE-18262: Fixed a doozy where Blackmagic Output could stop sending audio if seeking or switching shots on certain media files (especially if they are long GOP format. Note: don't use those when you can avoid it!).
- WIRE-18208: Removed "Record Additional Audio channels" checkbox from Shot ISO recording UI.
- WIRE-18207/WIRE-17960: Wirecast now will not obstinately ignore your mouse clicks on Windows, which you could have experienced if you removed a layer via the Shot Layers right-click context menu.
- WIRE-18153: Fixed an issue where the Main Shot Display on Windows briefly stretched or squished when you zoomed layer height.

- WIRE-18149/WIRE-18048: Increased size of the Vimeo authentication window on Windows, which is helpful when you actually want to see it.
- WIRE-18146: Users will now see a warning message if they open Wirecast when GPU Tweak II is active in the On-Screen Display (OSD). Best to not use that with Wirecast. Trust us.
- WIRE-18133: Audio increases in volume momentarily when using certain transitions.
- WIRE-18115: Removed an erroneous warning message when you opened a Wirecast document from Windows Explorer if you already had another document open.
- WIRE-18104: Crash on exit with certain Thunderbolt 3 PCI-e adapters with certain Blackmagic capture cards on macOS.
- WIRE-18093: Order of operations change for streaming to LinkedIn Live: we'll check if live video is available, then create a post (instead of creating a post and then checking for the live video).
- WIRE-18077: Reverted a previous performance improvement with H.264 files on Windows due to the change causing playback problems with other certain media files.
- WIRE-18075: Did you know there was something wrong with opacity setting for Solid color on macOS? No? Oh. Then there wasn't. See, everything is fine.
- WIRE-18070: Fixed a crash that could occur on macOS when changing shot templates.
- WIRE-18065: Fixed an issue where opening context menus would cause the Multiviewer to drop frames on Windows.
- WIRE-18052/ WIRE-18051/ WIRE-18050: Simplified the Output Settings for Facebook, Twitch and Vimeo by removing a Sign-Up link that was so small you could barely see it anyway.
- WIRE-18044: When a YouTube Event is selected, we now try to select a preset matching the event's stream frame rate and resolution.
- WIRE-18022: If you change your canvas size and try to quit, we will now stop you and ask if you want to save that change. Just trying to make things easier for you.
- WIRE-18015/ WIRE-17776: You may have heard, we updated our Clock widget – and happily, all the typeface settings now work. Unless it's Chalkboard. No one should be using Chalkboard font.
- WIRE-18013: Now when you transition a shot with the De-Ess filter enabled, you won't hear a popping noise – causing you to run to the microwave to check your popcorn before it burns.
- WIRE-18010: If you try to record an ISO recording to a folder that doesn't exist, we will now warn you politely, instead of giving you the finger and silently refusing to record.
- WIRE-17997/WIRE-16967: Fixed an assertion failure when playing specific media files.
- WIRE-17981: Fixed a bug that caused a deleted document to hang around defiantly in your Welcome Window.
- WIRE-17968: Creating a new Rendezvous session after trying to reconnect to an expired one now works.
- WIRE-17962: We now add a helpful, nicely worded error message to the Notification window if you try to do a Screen Capture on macOS if Wirecast hasn't been given Screen Recording permissions.
- WIRE-17959: We removed 'Show Facebook Post' link from our Facebook Destination Scheduled Events since Facebook has removed this functionality.

- WIRE-17948/WIRE-17760/WIRE-17620/WIRE-17481: Fixed a crash that could happen when adding a Blackmagic source that is capturing certain resolutions.
- WIRE-17928: Fixed an issue with certain RSS feeds not displaying correctly.
- WIRE-17912: If you uncheck Twitter in Output Settings, we will no longer illogically require you to log into your Twitter account before you can stream.
- WIRE-17906: The zoom on your Main Shot Display layers will now be saved when you close and reopen your document.
- WIRE-17897: We updated to the latest version of NDI HX2 which fixed a bug in HX2 decoding causing some HX2 video to not appear on older Macs.
- WIRE-17896: Removed the end date fields from YouTube Event dialog.
- WIRE-17847/WIRE-18109: Now your settings are maintained when you copy and paste a source from one shot to another
- WIRE-17813: We thank you for your patience. Wirecast sometimes took a long time to open if you had recent documents with Titler Live sources. Once you open and save your document, you'll see that's fixed. (You'll need to open any recent Wirecast Documents that appear in your Welcome Window, and save them to stop experiencing slow loading.)
- WIRE-17737: Fixed an annoying issue where audio would become distorted when outputting via in Blackmagic output.
- WIRE-17682: If your RTMP output fails, we now perform a little check to see if perhaps your firewall or antivirus is blocking your ability to stream, and we'll quietly let you know.
- WIRE-17589: Fixed a link in an ISO-related error message that led you into a dark alley and left you there to figure out what happened and to fend for yourself.
- WIRE-17575: Fixed a rare crash on macOS that could occur at quit, when the Teradek Streamreader plugin was installed.
- WIRE-17470: We squashed a bug where playing certain media files could cause an indefinite hang on older Macs.
- WIRE-17259: Improved error messaging when attempting to connect to a source with dimensions greater than 8000 pixels. 8k is our limit.
- WIRE-17052: Fixed some of our output statistics, which weren't reflecting accurate statistics. Awkward!
- WIRE-17008: Improved performance of animated PNG media files, which could cause high CPU usage on playback.
- WIRE-16226: Fixed issues where YouTube outputs would get confused if you had several users or outputs.
- WIRE-15370: Fixed playback issues with specific media files with AAC audio. Basically, the software equivalent of when your mechanic puts in a new air filter and you have to take their word for it
- WIRE-15161: Updated our Dynamic Destination Documentation to include hardware encoders.

Wirecast 14.0.4

Fixes:
- WIRE-18071: One more YouTube fix: We enabled Wirecast to use a previous YouTube stream key when creating events.

Wirecast 14.0.3

Fixes:
- WIRE-18045: Updated the Lumens PTZ Profile, which may have the happy consequence that some Sony cameras will now work with this profile.
- WIRE-18030: We now limit the Multiviewer render frame rate to the canvas frame rate, which should reduce the amount of background processing going on. Previously this would always render at 60Hz.
- WIRE-18028: We removed the Stream Now event for YouTube Destination, since YouTube has removed this option.
- WIRE-18027: Fixed a Backenderror when creating a YouTube Event. No one wants a backenderror.
- WIRE-17990: Fixed a crash that could occur if you edited a YouTube Scheduled Event and that Event mysteriously returned a start date of 1/1/1970.
- WIRE-17955/WIRE-17941: Text Scrolling now works when OS is set to any language other than English.
- WIRE-17934: We re-enable Global Keyboard Shortcuts on macOS Big Sur. If you were following closely, we disabled them on Catalina because they caused a crash. Big Sur doesn't have that issue.
- WIRE-17913: RTMP output stream field can now be empty, and you can write your own stream name into the field.

Known Issues
- NOTE: XKeys Controller does not currently work on macOS Big Sur. If you plan to use XKeys with Wirecast, we advise you to stay on macOS Catalina or Mojave.
- NOTE: As part of the fix for WIRE-17286, on BlackMagic devices, we now identify them via hardware ID instead of enumeration order. The fallout is that if you have a document that once referred to one piece of hardware it may fail to initially reference a different piece of hardware. The workaround is to use the asset manager to replace the references to the new hardware. Once done, that document should save your new sources as expected.

Wirecast 14.0.2
This was a non-public release specific to Wirecast Gear.

Wirecast 14.0.1 (Mac only)

Fixes:
- WIRE-17908: Fixed rare crash when stopping an RTMP output on macOS

Wirecast 14.0

New & Improved:
- WIRE-17882: Added an option on Wirecast Gear licenses to disable audio capture from the capture cards.
- WIRE-17852/ WIRE-17835: Added a lock button to link the new width and height size fields in the Video Properties tab.
- WIRE-17730: Updated Wirecast Gear 300 and 400 series capture cards drivers and SDK to version 190.1.
- WIRE-17825: Brightened the display of Stream/Record/ISO Times.
- WIRE-17705: Removed a superfluous error message.
- WIRE-17704: Implemented a new way to scale your sources using a handy Jog Wheel widget.
- WIRE-17674: Add a visual example to the documentation of the Countdown Clock Display Gear icon menu.
- WIRE-17666: Removed Auto-Canvas option as it was confusing and no longer serving a useful purpose. New documents will default to 720p. Older documents will be set at their actual canvas size, and you'll get a warning if your output resolutions don't match your canvas size.
- WIRE-17628: We updated some code to make our capture card inputs more efficient for Wirecast Gear 300 and 400 series.
- WIRE-17617: Updated the highlight color for Windows buttons to be less obnoxious than the bright green.
- WIRE-17610: Clarified a bit of wording on Chromakey Properties.
- WIRE-17594: Added support for Snap Camera.
- WIRE-17586: Improved the design of the NDI GPU encoding toggle button to make it clearer which was off, and which was on.
- WIRE-17585: Added a checkbox option in Advanced Preferences to allow you to reconnect live shots automatically if they get disconnected. Defaults to checked.
- WIRE-17577: Implemented a system of fixed latency for selecting the video & audio frames to render for each source. As part of this, we added a new text field to the Advanced section of the Preferences that will let you specify the Global Input Latency Wirecast should use. Lower latency means more possibility of audio blips; longer latency means more delay before video & audio are shown.
- WIRE-17556: We added an option to disconnect all peers when ending a Rendezvous session
- WIRE-17533: Added the ability to set a LinkedIn Live event to "Public" or "Private".
- WIRE-17467: Added a font face pop up to more accurately select font variations.
- WIRE-17451: Updated the term "Audio Interface" to the more descriptive "Audio Playback" for clarity.
- WIRE-17432: Now we allow you to create a custom encoder when outputting to Facebook Live.
- WIRE-17325: Added a tooltip to help explain the Facebook Optimize Connection button.

- WIRE-17318: We no longer notify you when a new update comes out if your OS is not supported.
- WIRE-17317/WIRE-17238: Updated the button placement in the Rendezvous dashboard to prevent you from unintentionally starting a new session when you meant to connect to a previous session.
- WIRE-17313: Made a minor update to the Vimeo Output API.
- WIRE-17277: Enabled GPU decoding for NDI sources.
- WIRE-17260/WIRE-16693: Updated our Solid Color overlay functionality with a fancy new GPU-accelerated one.
- WIRE-17229: Gave a minor makeover to our "Add Source" Window layout.
- WIRE-17197: Implemented a number of changes to improve the reconnection behavior of Wirecast Go when used as a source.
- WIRE-17190: Smoothed out audio from sources when connecting and disconnecting.
- WIRE-17077: Updated to NDI SDK 4.5.
- WIRE-17019: Wirecast now opens at the size of the screen instead of at a certain size in the top left corner of the screen
- WIRE-16972: Made some under-the-hood improvements to the Audio Mixer, which should result in an improved efficiency and reduced CPU load.
- WIRE-16933: Upgraded our Webstream plugin (libVLC) to version 3.0.8.
- WIRE-16930/ WIRE-16734/ WIRE-6613 /WIRE-14: Introducing Chroma Key v2: Added new features to our Chroma Key to enable more accurate keying, including spill suppression, edge coloring, clipping ranges and more.
- WIRE-16929: Introducing Color Key: Added a new Color Key feature which keys using colors in the RGB space. Useful for images (logos) that have non-black and non-white backgrounds.
- WIRE-16928: Introducing Luma Key: Added a new Luma Key feature which sets the image alpha based on the intensity (y) value, ignoring the color (U and V) values. This is useful if you have a logo with a white or black background you wish to remove.
- WIRE-16925/WIRE-12741/WIRE-16650: Rebuilt our Mulitviewer, and in the process, added some cool new audio meters.
- WIRE-16847: Implemented a menu & menu items under the 'Switch' menu that restores the toggle functionality of Layers in the Main Shot Display area.
- WIRE-16783: Rebuilt the Shot Layers User Interface- you'll notice some snappier animations and a subtle new look.
- WIRE-16749: Added support for new "made for Kids" guidelines in YouTube destination.
- WIRE-16739: Improve the Output Statistics for RTMP Destinations.
- WIRE-16732: Changed the way we store/show your document thumbnail, to reduce file size.
- WIRE-16699: Rewrote our text widget to, among other things, improve performance and smoothness of scrolling text.
- WIRE-16663: There is now a 'Delete all' button in the Asset Manager window to remove all missing assets at once.
- WIRE-16648: Switched from the Apple-deprecated OpenGL render engine to Metal on macOS.
- WIRE-16129: Major improvements in the way Wirecast sizes incoming video sources. This, along with the new ways you can resize your videos and bounding boxes, should make it much easier to get your media precisely the size you want it to be.

- WIRE-15995/WIRE-17442: We moved the status bar to the bottom of the main document UI to free up space at the top. It will show System CPU, bitrate, dropped frames, viewer count, Facebook reactions and Telestream Cloud status.
- WIRE-15915: Added the ability to bring in an NDI audio only source.
- WIRE-15584: Added an "Add All" button in Rendezvous to more efficiently add all guests at once.
- WIRE-14979: We now allow you to set In and Out points on your Custom (Stinger) transitions.
- WIRE-14072: We added an improvement so that all sources appear and disappear from the source list while the Add Source dialog is showing, so you no longer need to close and reopen the dialog to see updates.
- WIRE-12911: Improved experience when a shot gets disconnected. You now have the option for disconnected shots to be replaced with the red question mark, a transparency, or an image of your choice.

Fixes:
- WIRE-17879: Fixed an issue with drop shadows on Windows.
- WIRE-17869: Fixed a word wrapping issue that could occur when specifying Width/Height on macOS.
- WIRE-17864: Fixed a transition issue on macOS when transitioning media with a drop shadow.
- WIRE-17863: Fixed a very rare crash that could occur when dragging the Edge Color slider in the Chroma Key properties tab.
- WIRE-17862: Dragging shots on the Main Shot display should no longer cause Wirecast to become unresponsive on Windows.
- WIRE-17861: Fixed an issue where clicking "Apply Default" could cause the Chroma Key to stop updating.
- WIRE-17855: Squashed a crash that could occur when adding a Text shot then adding a Title shot.
- WIRE-17854: Fixed a crash on that could happen when you quit Wirecast.
- WIRE-17853: The lock icon on the Shot Layer Properties was inconsistent between macOS and Windows. Not they match.
- WIRE-17881/WIRE-17849: Fixed some missing translations.
- WIRE-17845: We updated our trace log to be more useful to us in diagnosing errors.
- WIRE-17838: The Chroma Key dropper samples were not always aligned with the mouse cursor – now they are.
- WIRE-17833: Fixed a crash on macOS when saving a document if there were unused assets that were created from the Rendezvous Dashboard.
- WIRE-17826: Removed some embarrassing text use for testing only.
- WIRE-17808/ WIRE-17807: Fixed a crash that could happen when dragging JPEG directly onto Shot Layers Tab.
- WIRE-17806: Fixed another crash that could happen when switching between Playlist tab and Main Shot tab with certain legacy documents.
- WIRE-17805: Playlists were missing their thumbnail images – we found them and put them back.
- WIRE-17802: Scale-to-Fit button was not doing what it was supposed to do when assets had a crop applied. Now it's behaving.

- WIRE-17796: Removed references in our User Guide to an old feature involving the ability to move between Keynote slides in Wirecast.
- WIRE-17793: We brightened display of timecode for media playback in Live – you're welcome Barrie.
- WIRE-17791: Fixed an error where YouTube accounts with no upcoming events would show "Error retrieving streams from server".
- WIRE-17790: Fixed an issue with our new Chroma/Luma/Color Key where in one Beta version it was making the subject partially transparent.
- WIRE-17783: Loading Wheel no longer appears when transitioning from Clear Layer to any shot on macOS.
- WIRE-17782: Stinger Transitions are now scaled properly in the "Manage Stinger Transitions" menu.
- WIRE-17771: Improved the error message that you'd get if you previewed an event on YouTube, and then went back to Wirecast and tried to enable Auto-Start for that event.
- WIRE-17767: Cut transitions no longer have a one-frame overlap
- WIRE-17749: Fixed an issue that could cause Titler Live sources to disappear if set to auto-live
- WIRE-17746: Fixed a crash on Windows that could happen when importing images
- WIRE-17744: Now you can decorate text with a shadow AND a background
- WIRE-17742: Fixed an issue with text that could potentially corrupt memory.
- WIRE-17739: Fixed a damn memory leak on exit after selecting a layer in Preview
- WIRE-17738: Fixed a crash when switching from Playlists back to the Main Shot Layers
- WIRE-17735: Fixed a flicker in the lower left side of the UI
- WIRE-17734: Another leak fixed - also related to clicking on empty preview
- WIRE-17732: Cleaned up our Duplicate Shot Options menu
- WIRE-17721: It was reported that Scale to Fit and Stretch to Fit were not working properly- we revamped that whole area anyway. Be sure to check that out.
- WIRE-17719: The Facetime camera is no longer defaulting to the lowest option
- WIRE-17717: Fixed an indefinite hang that happened when devices were missing
- WIRE-17716: Fixed an issue that could cause the UI to stop responding on Windows after several hours of operation
- WIRE-17715: Translated some text
- WIRE-17713: Text Justify is no longer broken
- WIRE-17111: Scaling-related fix: Rendezvous shots should no longer resize after saving and reopening
- WIRE-17710: We dropped support for macOS 10.13 and added a warning notification that you can't install if you're not on 10.14 or later.
- WIRE-17709: "Smooth" and "Cut" transitions are no longer choppy
- WIRE-17699: We increased the time we attempt to synchronize incoming audio and video sources for ISO recording - in order to handle sync better.
- WIRE-17696: Fixed an issue on Mac where certain transitions would cause all layers to transition instead of just the changed layer
- WIRE-17688: When you add a new output destination, we now don't retain the old data in the new output configuration
- WIRE-17687: Fixed an issue during long streams that cause latency to accumulate for certain Sources

- WIRE-17677: Fixed several small memory leaks on macOS.
- WIRE-17663: Fixed crash that could occur when opening the LinkedIn Login page on certain machines
- WIRE-17663: Fixed an issue that caused a crash with the LinkedIn OAuth Login page
- WIRE-17662: Output Settings sidebar was not updating when the destination was changed. Now it does.
- WIRE-17658/WIRE-17641: Fixed an issue where deleting a Playlist could cause Wirecast to enter a state where Shots could not be selected.
- WIRE-17646: If you set a delay on your Video Shot it will no longer reset itself intermittently.
- WIRE-17643: Fixed a bug where if you selected Configure Monitor and then System Audio Capture your Config Monitor selection would get reverted to your previous selection.
- WIRE-17642: Fixed a crash on Mac that could occur when you had a screen capture source
- WIRE-17640: Removed Syphon Inject from User Guide.
- WIRE-17639: Fixed a bunch of cropping issues - including the Control key not working
- WIRE-17633: We've removed Syphon Frame as a Source Option. Syphon depends on the OpenGL framework, (which Apple is in the process of deprecating), and as of version 14.0, we've moved Wirecast to the Metal framework, which is not compatible with Syphon.
- WIRE-17630: Added a warning when you disconnect Rendezvous sources - so you don't accidentally disconnect people.
- WIRE-17629: Removed use of the word "Master" in Wirecast and documentation in favor of Main Shot Bin and Main Audio Mixer.
- WIRE-17627: Fixed drop shadows being upside down on macOS.
- WIRE-17623: Fixed a YouTube authentication issue.
- WIRE-17622: The "Remove when finished" option for media playback works again.
- WIRE-17619: Minor change of text color on the clock to make it visible
- WIRE-17614: If you open your document on a screen that was smaller than the one it was created on it was opening too large to fit in window. That's been fixed.
- WIRE-17609: Fixed a minor issue that would result in Chromakey being selected when you meant to select Lumakey.
- WIRE-17608: Stinger Transitions now maintain their alpha channels
- WIRE-17605: Fixed a rare crash that could happen when a Rendezvous Guest joined a session.
- WIRE-17603/WIRE-17286/WIRE-16571: Fixed an issue that would cause capture cards to switch sources each time you rebooted your computer. See NOTE below.
- WIRE-17599: Fixed a crash that would occur when starting a Rendezvous Session when a disconnected audio source was in the Live Program Out Mix.
- WIRE-17598: Fixed a crash when changing the Solid Color sources' width or height to zero.
- WIRE-17593: Removed forced bold, italic and bold italic from fonts that don't support them.
- WIRE-17592: Fixed another rare crash on Windows.
- WIRE-17590: Teradek Sources no longer autofill Host, Port and Stream Name.

- WIRE-17588: Fixed an issue on Wirecast Gear 300 and 400 series where the capture cards could drop bits of incoming audio.
- WIRE-17587: Typefaces and typeface shadows were being cut off by bounding box - we've made some fixes to that.
- WIRE-17584: Fixed an issue on Windows where text was disappearing seemingly by evil magic
- WIRE-17580/WIRE-17578: Mattes now work again.
- WIRE-17282: Manual focus on NDI PTZ control now works.
- WIRE-17576: Fixed a crash when switching shots with certain transitions if the Rendezvous Live Output camera was set to the Document's output.
- WIRE-17574: Fixed rare crash on Windows.
- WIRE-17564: Fix rare crash when switching shots to a Rendezvous Guest that has disconnected.
- WIRE-17562: The app UI is no longer obscured on Windows when you've scaled to >100%
- WIRE-17553: Fixed rare crash that could occur when a Dynamic Destination sends Wirecast an invalid XML file.
- WIRE-17546: Fixed an issue causing a shot to flicker and video to freeze
- WIRE-17537 and WIRE-16355: Fixed some audio issues when using Elgato Game Capture HD60 Pro
- WIRE-17536: More translations of text
- WIRE-17527/ WIRE-16883: Fixed rare crash at quit on macOS.
- WIRE-17525: Fixed a bug where you could inexplicably no longer manipulate shots using your mouse
- WIRE-17522: Fixed another rare lockup
- WIRE-17512: In the Audio Properties panel, it turns out changes made to the gain channel sliders were not being sent live.
- WIRE-17490: The Select Screen Region feature of Screen Capture now works again on macOS.
- WIRE-17489: Fixed a few issues with text scrolling that were known issues in Beta 1.
- WIRE-17465: Fixed an issue where output destination names would rebel, if left unnamed, and take over a name from an existing destination.
- WIRE-17463/ WIRE-17420/ WIRE-16591/ WIRE-15317: Satisfyingly, fixed a number of rare crashes that could occur when switching shots.
- WIRE-17460: Now we impose a limit (75) on the number of layers within a shot (for your own good).
- WIRE-17448: Removed Studio badges from Wirecast UI.
- WIRE-17441: Fixed a possible audio sync issue stemming from the capture cards in Wirecast Gear 300 and 400 series.
- WIRE-17440: Updated the Facebook Live API to make it possible to schedule a live event on Facebook from Wirecast again.
- WIRE-17427/WIRE-13538: Resolved a crash that could occur if you added more than 49 layers to a shot.
- WIRE-17412: Fixed a very rare hang when deleting a replay layer.
- WIRE-17408/ WIRE-17334: Fixed an issue that would let you close a document without saving some source properties settings - thus causing you to lose those settings.

- WIRE-17378/WIRE-17213: Fixed issue where your text and clock shots would suddenly go missing.
- WIRE-17373: Auto-Canvas was sometimes reporting the wrong resolution.
- WIRE-17343: Added a font face pop up to more accurately select font variations.
- WIRE-17323: Fixed a confusing error that would show a Wirecast crash error upon opening.
- WIRE-17315: The websocket connection to the server was closing unexpectedly when using a VPN service with Rendezvous. So now we add a periodic ping to keep the websocket connection alive.
- WIRE-17304: Restricted Virtual Camera to only output from one document at a time.
- WIRE-17303: Fixed a scaling issue where icons could be erroneously horizontally stretched
- WIRE-17302: Input fields in Output Settings are no longer unresponsive following a single factor authentication failure.
- WIRE-17291: Fixed a Fatal Application error that could occur when streaming
- WIRE-17279: Fixed a crash that could occur if your document freaked out and got into a state where it wasn't ready for the next action. This could occur when attempting a screen capture when an audio driver is not installed, or you have shots programmed to an Elgato StreamDeck.
- WIRE-17261/ WIRE-17174: NDI audio can now be sent joyously and distortion-free to Rendezvous participants
- WIRE-17259: Wirecast no longer fails silently when attempting to connect to a scan converter source that's larger than 8K.
- WIRE-17256: Now we don't prompt you twice to overwrite saved documents on macOS Catalina.
- WIRE-17243: Cleaned up our YouTube output settings adding better error messaging and streamlining the way you start/stop events
- WIRE-17236: Icons were incorrectly displaying mute in a browser connection when entering a Rendezvous session.
- WIRE-17226: Updated the Media File icons are the same in the Add Source dialog.
- WIRE-17216: Documentation now correctly notes that Monitor screen capture will provide a higher frame rate source than a Window screen capture.
- WIRE-17210: Fixed a minor memory leak in the YouTube Destination.
- WIRE-17201: YouTube is deprecating the StreamNow functionality. All YouTube live streams must now be done through events. So we changed some stuff related to that.
- WIRE-17196: Worked around an issue where the NDI HX app provides invalid audio timestamps when sending to Windows.
- WIRE-17192: We disabled the Facebook Speed test when streaming via Wirecast Restream since the location wasn't local and optimizations were invalid
- WIRE-17189: Emojis, and other characters are showing correctly again in Rendezvous.
- WIRE-17169: Added a notification when attempting to install on Windows 8.x. (Psst: It requires Windows 10 or higher).
- WIRE-17164: Canvas Size limitations are now enforced when using custom presets.
- WIRE-17150: If your document was saved with a layer off in a previous version of Wirecast, and opened in Wirecast 13, the layer would not appear. We found your missing layer and brought it home.

- WIRE-17148/WIRE-17075: Fixed a rare crash when running the app in the background on macOS.
- WIRE-17142: When sending live captions through our WebServices platform, certain platforms are not handling b-frames correctly resulting in garbled captions. To account for that, we added new "Cloud Captioning" encoding presets that turn b-frames off and increase bit rate (to account for inherent quality loss of turning off b-frames).
- WIRE-17278: Now your encoding preset won't spontaneously change after you create an event.
- WIRE-17133: Add documentation for sources that can be used with ISO Recording.
- WIRE-17126: Selected transition was not used when using Keyboard Shortcuts when AutoLive was enabled.
- WIRE-17124: Add ability to Screen Capture hardware accelerated applications on Windows 10 1903 and higher. Examples are Chrome, Firefox and Zoom.
- WIRE-17095: Improve the peak bitrate behavior of the Apple H.264 encoder. This fix only applies to macOS 10.15+.
- WIRE-17087: Fixed an error in the YouTube API caused by the reported user's region being unsupported
- WIRE-17084: Facebook recently made changes to Groups that restricts any app from accessing certain features, such as the Live API, until an admin grants access to the app. We updated our error message for this so you might actually know what it means and what to do about it.
- WIRE-17080: Increased the efficiency of data calls for Facebook scheduled events
- WIRE-17065: Fixed an issue using audio interfaces with Rendezvous on macOS.
- WIRE-17063: Improved resiliency when dealing with apps that feed us video timestamps that are off from the audio timestamps (e.g. JustWifiCam on iOS).
- WIRE-17055: Fixed a crash that could occur while setting up a YouTube event
- WIRE-16994: There were some unnecessary horizontal scroll bars on Windows that we removed. Now you won't be tempted to scroll when you can't.
- WIRE-16973: Made some under-the-hood fixes to reduce CPU on Mac
- WIRE-16963/WIRE-16904: Fixed an issue where sources on your Live and Preview would scale to 1/4 when dragging your document from one monitor to another on macOS.
- WIRE-16924: Added trace logs to improve our ability to track errors to YouTube streaming.
- WIRE-16917: Fixed issue where icons in the Main Shot Display were not handled consistently across audio sources and in some cases were not respecting the addition/removal of layers containing audio
- WIRE-16912: Fixed a horizontal misalignment of Bitrate in the Output Statistics
- WIRE-16911: Fixed horizontal alignment of Channel in the Rendezvous Audio Mixer in certain languages.
- WIRE-16910/WIRE-16905/WIRE-16903 /WIRE-16707/WIRE-16784: Fixed a variety of missing translations.
- WIRE-16908: Made our error message more understandable if you were to select Live Captions without having Telestream Cloud Settings selected.
- WIRE-16907/WIRE-16826: Fixed a couple of error messages that were displaying incorrectly, especially when in dark mode.

- WIRE-16906: Fixed text overflow in the Keyboard Shortcuts Preferences Pane in certain languages.
- WIRE-16869: Made some changes to the YouTube destination to more elegantly handle accounts that don't have pre-existing events
- WIRE-16835: Fixed the layout of our Support Assistant in several languages.
- WIRE-16825: Fixed a rare hang when exiting to Multiviewer while ingesting a BlackMagic source.
- WIRE-16820: Added CPU data to the trace log on exit.
- WIRE-16811: Added a manual configuration option for audio sample rate that will let you pick the value that matches your incoming source. (Note: you can only configure the audio sample rate when automatic format detection is disabled. We do this to prevent people (we won't name names) who don't know what they're doing, to set it to 196kHz - because they may think bigger is better - and then call support or get stuck because they don't understand what's happening. So, yeah. We're restricting this for your own good. When format detection is enabled, we assume the audio is 48 kHz.)
- WIRE-16799: Crash when declining a macOS prompt to install Osaka font.
- WIRE-16779: Fixed a crash that would occur when stopping two live streams to Twitter/Periscope.
- WIRE-16778: Fixed an issue playing audio from WASAPI devices.
- WIRE-16776: We've taken some extraordinary measures to ensure that web stream sources stay connected and don't freeze in Wirecast - even if they restart, end, enter an error state or we stop receiving data for any number of reasons. We now try our darnedest to reconnect.
- WIRE-16768: Output Settings UI has some minor alignment issues on macOS.
- WIRE-16763: Fixed a crash that could occur if you had a hotkey with no name, and you right-clicked a shot.
- WIRE-16762: Fixed an issue that could occur when using a source that produces JPEG frames, on a computer that is not fast enough to decode them in real-time. The result was a backlog of frames that would cause the source's video to be delayed and out of sync with any live audio. (This could've also happened when deinterlacing video from a task source (though less likely since deinterlacing is relatively quick).
- WIRE-16760: Wirecast was trying to use deselected/unused output destinations when Live Captions was selected. It won't do that anymore.
- WIRE-16747: Fixed our copyright date in the About window.
- WIRE-16745: Flash is dead. We're not going to warn you that it's not installed anymore.
- WIRE-16713: Reconfigured NDI Output to avoid "clocking" the output which was intended to help file-based outputs but effectively slowed down real-time sources, resulting in for example, dropped frames at 1080p60.
- WIRE-16694: Reconfigured NDI Output, which effectively improved several issues- one of which was an observed A/V sync issue on NDI Out.
- WIRE-16684: Fixed an issue that cause no video from the Logitech B910 when using Motion JPEG.
- WIRE-16643: The option to move a shot from a Playlist back to the Main Shot list… is back.
- WIRE-16627: Fixed an issue where Scheduled Events in YouTube were going live immediately.

- WIRE-16613: Restored the ability for keyboard navigation in dialog boxes on macOS.
- WIRE-16611: The Source Properties Panel is now labeled with the type of source
- WIRE-16588: Fixed some artifacts that could appear when interacting with your document.
- WIRE-16457/ WIRE-15874: Implemented auto-reconnect for webstream sources if they unexpectedly disconnect
- WIRE-16424: Wirecast no longer crashes when Windows Defender's Controlled Folder Access is enabled
- WIRE-16306: Fixed an issue where you could drop frames after enabling Chroma Key.
- WIRE-16237: Fixed an issue that would cause NVENC encoding to fail on certain laptops with dual GPUs.
- WIRE-16124: Another scaling-related fix: Certain templates are no longer skewed
- WIRE-16020: Fixed it so that frames are no longer being dropped on certain transitions.
- WIRE-15781: Now, modifying the canvas size does not cause the Multiviewer to stop updating.
- WIRE-15729: Now, when an ISO/replay recording's source becomes unavailable, the recording stops and must be manually restarted. User is informed of the stoppage via the status bar.
- WIRE-15632: Beta: Enabled multi-bitrate adjustments in webstream sources for better quality.
- WIRE-15586: Fixed an issue that could cause latency to accumulate for certain Sources if they were in a playlist in the live canvas.
- WIRE-15483: Fixed an audio popping issue when using Blackmagic source.
- WIRE-15296: Fixed a doozie that caused Skype NDI sources to randomly resize.
- WIRE-15217: Fixed an issue on Mac where Chroma key was not being applied correctly to media files.
- WIRE-15213: Fixed an issue on Windows where you'd see flickering the first time you added Chroma Key to media file.
- WIRE-15091: Adding a video clip to a Playlist causes the Scrubber Bar to remain indefinitely.
- WIRE-14983: Fix very rare crash that could occur when activating a license on Windows.
- WIRE-14633: Users are now prompted to install the Telestream Audio driver when adding a System Audio Capture shot on macOS.
- WIRE-14511: We now require a subject to be entered in order to submit zip support file. Our Support department thanks you for that.
- WIRE-14453: A longstanding issue fixed with all our scaling fixes - Sources should no longer need to be rescaled when added to a document.
- WIRE-14277: Duplicate sources no longer show when adding an iOS camera source.
- WIRE-13376: Now we update the Rendezvous Dashboard device list when a device is removed or reconnected
- WIRE-12047: Updated the names of some of the properties for text shadow for more clarity.
- WIRE-11406: Completely rewrote our text widget, which has greatly improved the quality of text scrolling.
- WIRE-6042: Now we provide a warning in output settings if folder you're trying to save to doesn't exist.

Known Issues

- NOTE: As part of the fix for WIRE-17286, on BlackMagic devices, we now identify them via hardware ID instead of enumeration order. The fallout is that if you have a document that once referred to one piece of hardware it may fail to initially reference a different piece of hardware. The workaround is to use the asset manager to replace the references to the new hardware. Once done, that document should save your new sources as expected.
- WIRE-18573: Mainconcept H.264 encoder is not supported on M1 systems.
- WIRE-18572: Unicast and Multicast Outputs are not supported on M1 systems.
- WIRE-18517: Starting an x264 encoder crashes Wirecast when running in Rosetta. We've decided not to support Rosetta mode.
- WIRE-18496: Legacy Text source has been removed. This means that certain Legacy Text properties that are not compatible with the new Text Widget won't be available.