August 6, 2012

Firmware Release Notes
MiniTT1®/ FlexTT5® for Nikon

MiniTT1 Firmware Upgrade to version 3.150
FlexTT5 Firmware Upgrade to version 3.150
340.00 - 354.00 MHz, FCC/IC
433.42 - 434.42 MHz, CE

MiniTT1/FlexTT5 for Nikon ControlTL® Firmware 3.150 Overview

Intro: MiniTT1/FlexTT5 for Nikon ControlTL firmware version 3.150 addresses some improvements we have made since the launch of Nikon ControlTL firmware version 3.003.

IMPORTANT:

This new firmware requires that you use PocketWizard Utility version 1.35 or later. It is available for download here. Upgrade to the latest Utility first, then upgrade your radios' firmware.

When updating firmware, be sure to update all of your Nikon radios to the latest version, 3.150. Your radios will only operate as expected when all units are using the latest firmware.

Note: Previously used settings or saved profiles cannot be automatically reloaded after installing the new 3.150 firmware. Make sure to copy down any important settings before loading the firmware because the PocketWizard Utility will perform a factory reset once the installation is complete.

PocketWizard Utility and Factory Reset Note: Always perform a factory reset after updating your firmware. The PocketWizard Utility performs a factory reset automatically when you upgrade the firmware. It also has a Factory Reset button on the Update tab which additionally simplifies factory reset. You can also perform a Factory Reset with the radio: See RESET B here, or simply hold TEST before you power on your radio and continue to hold TEST for 10 seconds until you see 4 blinks (green).

Learn More: Visit the PocketWizard Wiki for more information on using your radios.

Overview of New Key Features:

- Compatibility with new Nikon equipment
- Added Support for the Sekonic RT-32CTL
- Added Optimized Rear Curtain Sync Utility Control

New Key Features:

Compatibility with new Nikon equipment:

The following new Nikon gear is supported in this firmware release:

- D4 Camera
- D800 Camera
- D800E Camera
- SB-910 Speedlight

This equipment will work in the ControlTL® system similarly to previous Nikon equipment.

Please review the general Nikon Compatibility section of the PocketWizard Wiki.

Special note: When using the D800 and D800E with the ControlTL system, these cameras may experience some flash clipping when using wide aperture lenses like the 50mm/1.4 at the fastest shutter speeds when stopped down to f:18 or narrower.

Added support for the Sekonic RT-32CTL module:

Sekonic has started shipping the RT-32CTL module for use in compatible light meters. Learn more here:

http://www.sekonic.com/Products/All/Accessories/RT-32CTL-Radio-Transmitter-Module-for-L-358-and-L-758-series.aspx

Using this module in your Sekonic light meter allows you to trigger ControlTL® radios receiving on ControlTL channels. This allows you to use an AC3 ZoneController on your transmitting MiniTT1or FlexTT5 to set your remote flash power levels, and then meter those remote flashes using your compatible Sekonic light meter, all wirelessly within the ControlTL system.

The firmware in the MiniTT1 and FlexTT5 has been upgraded to support this operation with the following features:

- Meter remote Speedlights mounted on FlexTT5 radios and controlled by an AC3 ZoneController in Manual Mode (HSS/FP and TTL metering not supported).

- Meter remote AC9 AlienBees Adapter compatible flashes.

- Take your MiniTT1 or FlexTT5 with AC3 ZoneController off your camera and set levels away from camera position. This feature was previously implemented, but the latest release improves that operation substantially. It also makes adjusting levels when using any light meter in non-cord mode simpler, including Sekonic meters without an RT-32CTL module.

- Use your MiniTT1 or FlexTT5 with an AC3 ZoneController on nearly *any* camera with a basic hot shoe. Get Manual Power Control for Mamiya, Leica, Hassleblad, etc. Trigger any ControlTL receiver in sync up to 1/125 on some camera models.

The latest PowerST4 (5.100) and PowerMC2 (2.200) firmware supports triggering from the Sekonic RT-32CTL module.

Operational Notes:

You can always press TEST on your camera's ControlTL transmitter or trigger the camera to set the power level you just dialed in on your AC3 ZoneController. Sometimes you don't need to do that, which can be very convenient. Here are the details:

• **If you only want to remember one thing, then remember this**: you can **always press TEST on your ControlTL transmitter after you set a power level on your AC3**, and wait for flash recycle before metering, to get the best results.

• When the transmitter+AC3 is off camera, you usually do not need to press TEST. AC3 power dial changes are made "real time." When the Sekonic meter triggers the ControlTL receiver, it will be with the power level set on your AC3. This is very convenient when taking your AC3+transmitter on set to make incident readings and adjustments. NOTE: If the MiniTT1 has fallen asleep when you've taken it off camera, you need to press TEST to wake it up again. It stays awake for about 3 minutes when off camera. The FlexTT5 does not sleep.

• When the transmitter+AC3 is ON camera, and your remote flashes are PowerST4, PowerMC2, or AC9 connected, you usually do *not* need to press TEST or trigger the camera before taking a meter reading. AC3 power dial changes are made "real time," however you may need to "dump" your flash if going from a high power level to a lower one rapidly.

• When the transmitter+AC3 is ON camera, and your remote flashes are Speed lights, you *must* press TEST or trigger the camera before taking a meter reading.

• If the meter reading doesn't make sense to you or returns an error, press TEST on the transmitter, wait for your flash to recycle, and meter again.

• Remember, studio flashes need to "dump" or charge their capacitors when the power level is changed. Pressing the TEST button on the transmitting radio will transmit power level changes and then immediately fire the flashes, so make sure to keep track of your flash's "ready" indicator.

Special Considerations:

If you always press TEST on your AC3's transmitter after changing an AC3 power dial, you always change your power levels with your AC3+transmitter off camera, then you can ignore these special considerations.

The ControlTL system handles studio power and Speedlight power separately. Studio power can move around in a more "real time" fashion from the AC3 when the transmitter is on camera and the camera is awake, but there is little time left over for treating remote Speedlights the same way. Speedlights usually get their power levels at the moment of trigger and not before. Therefore, some special considerations need to be considered when attempting real time adjustments of remote Speedlights from the camera.

- MiniTT1+AC3 on camera = TEST *must* be pressed on the MiniTT1 to set remote Speedlight levels.

A MiniTT1+AC3 on camera will not send out AC3 dial change information to Speedlights when the camera is awake unless you press TEST on the MiniTT1. The MiniTT1 sleeps when the camera sleeps and does not send out AC3 dial change information when asleep, but when TEST is pressed it will wake up and send the information.

- FlexTT5+AC3 on camera = TEST may need to be pressed on the FlexTT5 to set remote Speedlight levels.

If you are using a FlexTT5+AC3 on camera, it will not send out AC3 dial change information to Speedlights when the camera is awake. If the camera is asleep however, changes to an AC3 Power Dial will set the remote Speedlights power level.

Using a MASTER flash or SU-800 instead of an AC3:

All of the special considerations apply when using a MASTER flash or controller like the SU-800 in place of the AC3.

When using these devices to control remote Speedlight power level, the transmitter must be on camera and you must press TEST on the transmitter to set the remote power levels. You cannot use this combination off-camera.

If you only want to remember one thing, always press TEST on your ControlTL transmitter after you set a power level.

Cheat sheet for when you *don't* need to press TEST before metering:

- AC3+Tx off camera? Usually no TEST required!
- Camera asleep and FlexTT5 as Tx? No TEST required!

Cheat sheet for when you *must* press TEST before metering:

- Remote studio light needs to dump? Press TEST before metering.
- On camera and camera's awake? Press TEST before metering.
- MiniTT1 asleep? Press TEST before metering.
- Just powered on? Press TEST before metering.
- Just slid an AC3 or MASTER flash onto your transmitter? Press TEST before metering.
- Using a MASTER or SU-800 on camera? Press TEST before metering.

Sekonic RT-32CTL Channels:

When using the RT-32CTL module in your compatible Sekonic Light Meter, it will trigger both a Standard Channel and a ControlTL Channel with a single press of the meter's measuring button.

Standard Channels are used in Plus II, Plus III and MultiMAX radios, as well as many flash packs with built-in PocketWizard radios.

ControlTL Channels are used with the MiniTT1, FlexTT5 with Speedlights, FlexTT5 with the AC9 AlienBees Adapter, PowerST4, and PowerMC2.

Learn more about PocketWizard Channels here.

Newer L-758 DigitalMaster light meters can select Standard and ControlTL Channels and zones independently. Review the manual for your light meter or your RT-32CTL manual for more information.

The L-358, and previous versions of the L-758 meter, use a channel mapping mode to pair up Standard and ControlTL channels automatically. Refer to your RT-32CTL documentation for a list of the mapped channels.

Added Optimized Rear Curtain Sync Utility Control:

A new feature has been added to the Utility under the Flash tab:

[ ] Optimized Rear Curtain Sync / Manual Shutter Speeds

Check this box in the Utility if you are using manual shutter speeds and would like the benefit of Optimized Rear Curtain Sync as described here:

http://www.pocketwizard.com/inspirations/technology/rear_curtain_sync/

Leave this box unchecked in the Utility (default operation) if you are using Aperture Priority or other automatic modes that adjust the shutter speed. You can use Aperture Priority mode and Rear Curtain Sync together, but not with optimized timings. If you check this box while using Aperture Priority, you may experience missed flash events or dark/clipped frames.

Other Improvements:

- Improved default Aperture Priority combined with Rear Curtain Sync operation. See "Added Optimized Rear Curtain Sync Utility Control" above.

- Corrected a situation where pressing TEST after making a settings change on a MASTER flash would cause remote flashes to not trigger until the camera went through a sleep/wake cycle.

- Fixed a bug where a Speedlight on Zone C would occasionally cause an over-exposure.

- Improved D7000 HyperSync® operation.

- Improved Pre-Flash operation across all zones.

- Fixed a bug where an SB-800 would strobe as the camera wakes.

- Corrected SB-800 EV adjustments when used as a master (bug introduced in 3.022, corrected in 3.150).

- Corrected FlexTT5 Pre-Trigger operation when used as a remote camera trigger with an ACC cable in Basic Trigger Mode with a MultiMAX as transmitter.

- When selecting Basic Trigger Mode, the default Standard Receive channel is now 1 instead of 32.

- Dramatically improved reliability of getting the first shot when waking a Nikon camera from sleep.

- Corrected Nikon D7000, D5000, and D3100 banding when using Rear Curtain Sync at faster rear curtain-capable shutter speeds like 1/100 & 1/125.

- Corrected Rear Curtain Sync banding for some Nikon cameras when operating at faster FPS (Frames Per Second).

- Corrected general banding issues in Nikon Rear Curtain Sync for some cameras.

- Fixed minor HyperSync and HSS timing issue for D3x, D300, and D300s when using 14-bit RAW.

- Improved HyperSync operation for the Nikon SB-400 and SB-700.

- Addressed an issue with the Nikon SB-800 used in remote TTL firing intermittently at full power when not asked for full power.

- Changed AC3 operation so that when a zone is switched off, it no longer allows a remote Speedlight on that zone to trigger at a very low power level.

- Corrected a bug in SpeedCycler Mode where a remote SB-900 or SB-800 would always fire at full power if at an HSS/Auto FP shutter speed.

- Fixed a situation where using an AC3 ZoneController on a MiniTT1 or FlexTT5 off-camera wouldn't trigger a PowerST4 for the first TEST press.

- Dramatically reduced the instances of frame clipping at 1/320 and 1/400 when shooting in Aperture Priority mode with Nikon cameras.

- Corrected over-exposure issues when using an SB-400.

- Small improvements made in "No Change Trigger Only" mode.

- Fixed a situation that could lead to occasional missed triggers.

- Fixed rear curtain sync operation when using an AC9 AlienBees Adapter.