

## History of BLHeliSuite32 Revisions

### Changes in 32.6.0.0:

#### General:

- Added the ability to edit and flash BLHeli\_32 rev. 32.6 (No 32.6 hex files added yet).
- OpenSSL update to v1.0.2o.

### Changes in 32.5.0.2:

#### General:

- Minor visual changes in “ESC Setup” page.
- Fix for LED color assignment at FrESC\_80A.

### Changes in 32.5.0.1:

#### General:

- Disabled rev. 32.5 for flashing due to a compatibility issue.
- Minor visual changes in “ESC Setup” page.
- Minor fix: “Brake On Stop” parameter handling. (Disabled showing of brake force percentage for ESC, which are not capable of nondamped mode).
- Added hint on transformation of “Motor Direction” between different revisions.

### Changes in 32.5.0.0:

#### General:

- Added the ability to edit and flash BLHeli\_32 rev. 32.5 (No 32.5 hex files added yet).
- Minor visual changes for rev. 32.5 in “ESC Setup” page.
- Added BLHeli\_32 rev. 32.4 hex files for:
  - Spedix\_GS40A\_4IN1\_V1\_1

### Changes in 32.4.0.7:

#### General:

- Fix for interface “L” failure on “Flash BLHeli”, when logging was enabled.
- Removed obsolete control in Flash Assistant (check box “Show Favorites only”).
- Fix for flash issues with bootloader rev. “f” and:
  - KS\_BLHeli\_32\_30A
  - Spedix\_GS30A\_V1\_1

### Changes in 32.4.0.6:

#### General:

- Improved automatic reflash handling for ESCs where prior the activation failed.
- Minor fix in the MusicEditor (play back function plays wrong notes, if music is disabled).
- Fix for flash issue with:
  - DALRC\_ENGINE\_40A
- Added BLHeli\_32 rev. 32.4 hex files for:
  - FrESC\_35A\_32
  - HGLRC\_T-REX\_35A\_ST
  - KS\_40A\_4IN1\_4S
  - KS\_BLHeli\_32\_35A\_V1
  - KS\_BLHeli\_32\_50A\_V1
  - Tmotor\_32Bit

### Changes in 32.4.0.5:

#### General:

- Minor fixes for FVT USB link/HID tool detection.
- Fix for EagleTree MicroVector interface connection failure.
- Added capability to handle BLHeli\_32 rev. 32.41 Beta.
  - Programmable “Sine Modulation Mode”.

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- Programmable autonomous Telemetry output every 32ms ("Auto Telemetry").
- Expanded Programmable "Motor Direction" to "Bidirectional Soft" and "Bidirectional Soft Rev."
- Added BLHeli\_32 rev. 32.4 hex files for:
  - FrESC\_80A
  - HGLRC\_DinoShot\_60A\_ST
  - Siskin\_Lite

### Changes in 32.4.0.4:

#### General:

- Fix for flash issue with
  - Hobbywing\_XRotor\_BLHeli32
  - iFlight\_Force32

#### External 4way-Interface (Cleanflight/Betaflight):

- Fixed "Initialization of flight controller denied" issue, when FC is setup for DShot or ProShot and Minimum Command is set lower the 1000 or 3D Mode is enabled.

### Changes in 32.4.0.3:

#### General:

- Added approved 32.4 hex files.
- Added BLHeli\_32 rev. 32.3 hex files for:
  - Exuav\_FishDrone
  - HAKRC\_35A
  - KS\_BLHeli\_32\_40A
  - YGRC\_32
- Added updated Operation manual for BLHeli\_32 ARM Rev32.x

### Changes in 32.4.0.2:

#### General:

- Fixed "ESC Tools... Verify flash memory" issue, where equal parameter areas are falsely signaled as unequal.

### Changes in 32.4.0.1:

#### General:

- Added the ability to edit and flash BLHeli\_32 rev. 32.4. (No 32.4 hex files added yet).
- Added 32.3 hex files for:
  - Aikon\_AK32\_4IN1\_35A\_6S\_V1\_0
  - Airbot\_Wraith32\_Metal\_ST
  - Flycolor\_X\_Cross\_BL\_32\_35A
  - MARS32\_40A
  - RobotDOG\_ST
  - Spedix\_GS25A\_4IN1\_4S\_V1\_1

### Changes in 32.3.0.5 Beta:

#### General:

- Music Editor improved: Simulation, store and load Music script now handles up to 8 channel polyphonic music ("Sync Startup Music to Multiple ESC" needs to be disabled).
- Improved Beta version update checking.

#### External 4way-Interface (Arduino/Cleanflight/Betaflight)

- Added additional 2 sec wait time for CF/BF interface to complete FC reboot after failed connection.
- Improved re-flash assistance for ESCs marked as "u" (unknown) or "i" (invalid).

### Changes in 32.3.0.4d Beta:

#### General:

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- Music Editor improved: Simulation now uses saw-tooth wave form and playback one octave lower (optional).

### Changes in 32.3.0.4c Beta:

#### General:

- Fixed 32.3.0.3 Beta issue: “Failed to read serial number” error showing, when try to remedy a previous flash write failure.

### Changes in 32.3.0.4b Beta:

#### General:

- Fixed 32.3.0.3 Beta issue: Click on “Flash BLHeli” fails if not “Read Setup” was done before.

### Changes in 32.3.0.4a Beta:

#### General:

- Fixed issues in Music Script file manager load script file procedure. “Gen. Length” and “Gen. Interval” were not loaded correct, if prior Music was turned off.

### Changes in 32.3.0.4 Beta:

#### General:

- Added support for user programmable ESC startup Music.
- Adapted column width for “ESC Overview” with regard to shown number of ESCs.
- Fixed issues in reading setup from ini/ixi files.

### Changes in 32.3.0.3 Beta:

#### General:

- Minor improvement of screenshot dialog window visibility.
- Added readout for input good/bad frame statistics.
- Added readout for input protocol detection.
- Added partial capability to handle coming BLHeli\_32 rev. 32.4.
  - Programmable current sensor calibration.
  - Nondamped mode.
  - Showing input signal type and good / bad frames statistics.
  - No support for programmable startup music yet.

#### External Interface

- Added hint for USB/COM (“L”) and Arduino 4way-interface(“K”) on hitting “Disconnect” to restart a recently flashed ESC by disconnecting and reconnecting the power connection before use.

### Changes in 32.3.0.2:

#### General:

- Added 32.3 hex files for:
  - Hobbywing\_Xrotor\_BLHeli32
  - FVT\_CloudPhoenix\_35A
  - HGLRC\_DinoShot\_40A\_ST
  - HGLRC\_T-REX\_60A\_ST
  - MARS32\_35A
- Slightly improved recognition of corrupted layout revisions.
- Checking server connection before opening flash dialog.

### Changes in 32.3.0.1:

#### General:

- Added approved BLHeli\_32 rev. 32.3 hex files.

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### Changes in 32.3.0.0:

#### General:

- Added the ability to edit and flash BLHeli\_32 rev. 32.3. (No 32.3 hex files added yet).
- Added support for GD32F350x6 MCU

#### External 4way-Interface (Arduino/Cleanflight/Betaflight)

- Added hint for CF/BF interface on hitting “Disconnect” to restart a recently flashed ESC by disconnecting and reconnecting the power connection before use.
- Added GD32F350x6 to device id match.
- Increased 4way-if version number to rev20.0.0.2 to indicate changes. Please ensure to use Arduino/CF/BF interface versions which contains 4way-if code of rev20.0.0.2 or higher. (BF 3.20 and CF 2.10 contain 4way-if version 20.0.0.1)

### Changes in 32.2.0.2:

#### General:

- Remove BLHeli rev. 32.2 hex files and disabled rev. 32.2 for flashing due to a compatibility issue if upgrading from rev 32.1.

### Changes in 32.2.0.1:

#### General:

- Renamed parameter “Beep Strength” to “Startup Beep Volume” and “Beacon Strength” to “Beacon/Signal Volume” and added functionality clarification in the hint text.
- Added the first approved BLHeli rev. 32.2 hex files.

### Changes in 32.2.0.0:

#### General:

- Added the ability to edit and flash BLHeli\_32 rev. 32.2. (No 32.2 hex files added yet).
- Added additional BLHeli\_32 rev 32.1 hex files.
- Fixed: not recognizing com port, if registry entry contains non ANSI characters.
- Added save/read Setup parameters to/from (\*.ini or \*.ixi) file.
- Fixed: unable to select an ESC with left mouse button into Multiple ESC arrangement.
- Fixed: falsely showing current sensor presence for Spedix\_GS30A\_V1\_1.
- Added indication of ESC activation state.
- Fixed: ESC name not stored with write Setup.
- Various minor fixed and improvements.

#### External 4way-Interface (Arduino/Cleanflight/Betaflight)

- Fixed: ESC name did not show up in ESC Overview.
- Fixed: lost indication for the last ESC in a Multiple ESC arrangement, after writing setup to a prior ESC failed.

### Changes in 32.1.0.1:

#### General:

- Added BLHeli\_32 rev 32.1 hex files.
- Added support for STM32F031 MCU.
- Enhanced recognition for unknown (future) MCU types and revisions.
- Increased timeout for server connection to 30s.
- Various other improvements of GUI.

#### External 4way-Interface (Arduino/Cleanflight/Betaflight)

- Increased timeouts for flashing and writing setup to GigaDevice MCU's.
- Added STM32F031 to device id match.

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- Increased 4way-if version number to rev20.0.0.1 to indicate changes. Please ensure to use Arduino interfaces/CF/BF versions which contains 4way-if code of rev20.0.0.1 or higher.

### Changes in 32.1.0.0:

#### *General:*

- Added capability to use BLHeli\_32 rev 32.1 hex files.
- Fixed bug in saving screenshots of message dialogues.
- A lot tidying up and optimizing speed of application.

#### *External 4way-Interface (Cleanflight/Betaflight)*

- “Motors” tab: Disabled “Calibrate ESCs” if DSHOT is enabled.

### Changes in 32.0.0.4:

#### *General:*

- Added identification for BLHeli32 rev 31.x test samples
- Added fix for ESC with corrupted settings area, showing up as “u” (Unknown).
- Added support for coming bootloader rev. f.
- MultipleESC sync function now allows optional exclusion of “LED setting”. Check or uncheck sync in menu “Options... Sync....”.

### Changes in 32.0.0.1:

#### *External USB/COM (FVT-Linker) and 4way-Interfaces(Arduino/Cleanflight/Betaflight)*

- Fixed timing bug, which led to flash failures.

### Initial release 32.0.0.0