

Service Bulletin

MODEL(S)	TB14, TB28-12V
PART NUMBER(S)	6430014-()
DESCRIPTION	Advanced Lithium-ion Battery
TOPIC	Software Update Version 1.0.1
PURPOSE	Product and Performance Enhancements
RELEASE DATE	June 26, 2024

APPLICABILITY

This Service Bulletin is applicable to the TB14 and TB28-12V Series of Advanced Lithium-ion Batteries, part numbers 6430014-(), manufactured by Mid-Continent Instrument Co., Inc. (dba True Blue Power and Mid-Continent Instruments and Avionics). These updates are to be performed only by authorized personnel per the instructions as listed in this Service Bulletin. Units with this software upgrade are available for sale from the manufacturer.

PURPOSE

TBX software version 1.0.1 represents improvements to product functionality of the TBX Series Advanced Lithium-ion batteries.

EFFECTIVITY: RECOMMENDED

TB14 and TB28-12V units in the field can be updated to Software Version 1.0.1 but are not required to do so for continued airworthiness.

True Blue Power is recommending that all TB14 and TB28-12V units in the field be updated to Software Version 1.0.1 to take advantage of added features, enhancements and resolutions that improve the function and performance of the product.

Following the release date of the updated software, all general availability of TB14 and TB28-12V units manufactured or serviced by True Blue Power shall be installed with Software Version 1.0.1 or later.

DESCRIPTION

The following list describes the enhancements and resolutions incorporated in Software Version 1.0.1.

ADDED FEATURES

None

ENHANCEMENTS

1. Improve short circuit detection performance.
2. Improve robustness of battery type detection on software initialization.
3. Improve end of discharge detection conditions for high current discharges.
4. Update charge current sensing limit threshold on TB14 (14V battery) to 28A.
5. Improve low voltage detection and system level response.

RESOLUTIONS

1. Resolved recovery from battery low voltage conditions.
2. Under Voltage will not be reported as a fault.

ESTIMATED MANPOWER

Software can be downloaded and updated on fielded units in approximately 10 minutes.

WEIGHT AND BALANCE

No change

ELECTRICAL LOAD DATA

No change

CERTIFICATION

This Service Bulletin represents a minor change to the previously approved Technical Standard Order Authorization for the TB14 and TB28-12V Advanced Lithium-ion Batteries. Any changes to software have been completed in accordance with approved developmental and quality processes per the guidelines of RTCA / DO-178C, Software Considerations in Airborne Systems and Equipment Certification.

OTHER PUBLICATIONS AFFECTED

None

ACCOMPLISHMENT INSTRUCTIONS

The action required by this Service Bulletin can be accomplished by returning the unit to True Blue Power or by performing the instructions as listed in this section.

If returning the TB14 or TB28-12V unit to True Blue Power:

Call True Blue Power sales department for a Return Material Authorization (RMA) at 316-630-0101.

Return address: True Blue Power
 9400 E. 34th Street N.
 Wichita, KS 67226

If performing this update in the field:

1. Download the approved software update file from:
<https://www.truebluepowerusa.com/software-updates/> to a PC/Laptop ensuring the filename is TB14_update.muf. Follow the instructions as listed on the website or Section 5 of the Install Manual.