MaxError becomes 144%

Problem:

After reprogramming the data flash constants and subsequently discharging the pack, MaxError is reported as 143%. It changed back to 1% after a full discharge/relaxation cycle was finished.

Cause:

The reason for max error 143% (or any other wrong value) is always the same: the discrepancy between Cycle Count value in SBS Configuration data-flash and hidden constant (Number of cycles where last Qmax update was done, N_cycle_Qmax).

MaxError = f*(N_cycle_Qmax - Cycle count).

This error happens when a GG file with data-flash constants is imported and written to a pack that has already been cycled and has therefore a non-zero value of N_cycle_Qmax.
This process changes the `Cycle count` but does not change N_cycle_Qmax, as result above formula gives negative number.

Solution:

Before writing a new GG file into a pack that have been cycled, always re-write firmware first (using pro-screen). This will make sure that hidden constant N_cycle_Qmax is zero.

TEXAS INSTRUMENTS

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