

PTW DC System Analysis

DC System Analysis Module

The DC System Analysis includes: Battery Sizing, DC Load Flow, DC Short Circuit (ANSI) and DC Short Circuit (IEC).

Comply with Industry Standards

- Battery Sizing - IEEE std. 485, determines the size of batteries to supply the worse case DC duty cycle loads and AC emergency loads.
- DC Load Flow - Calculate power, current and voltage drop profiles. Represent constant kW, I, and Z, load types and evaluate all loading conditions for duty cycle loads and AC emergency loads.
- DC Short Circuit - ANSI standard 399 and 946
- DC Short Circuit - IEC standard 61660, calculates the peak fault current, time constants, rate of rise, and steady state conditions.

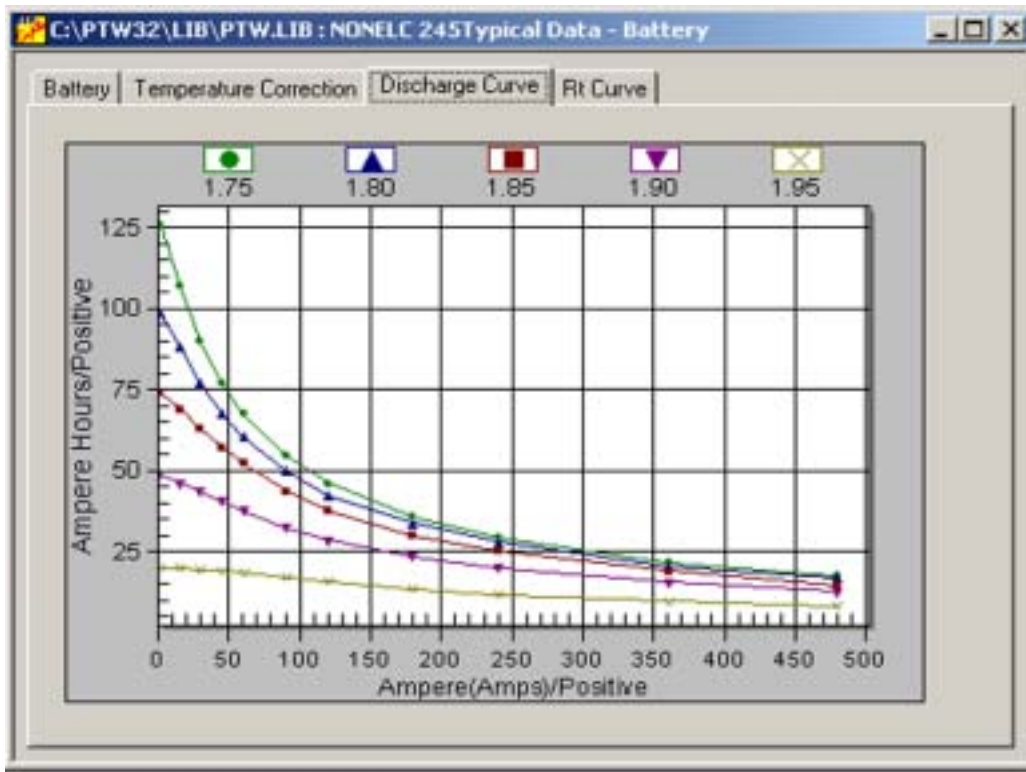
Benefits

- Save time with intuitive scenario manager interface.
- Communicate designs effectively with graphical and text base results.
- Improve decisions by quickly comparing resulting curves from different scenarios.
- Increase productivity by modeling both DC and AC systems in a single project.
- Reduce mistakes by evaluating all loading conditions and duty cycle loads.
- Battery Sizing and Load Flow automatically calculates AC emergency loads and their impact on the DC system to help you design safer and more reliable systems.



DC Equipment Library

- Battery Library - Rt Curve and Discharge Curve
- DC Generator Library - Name Plate data, Transient Resistance and Inductance
- DC Motor Library - Name Plate data, Transient Resistance and Inductance



DC Component Types

- Battery
- Rectifier
- DC Cable, Bus, Node
- DC Load, Motor, Train
- DC Generator
- Inverter/UPS
- DC-DC Converter
- DC Capacitor

