

Software-defined batteries: A data-driven solution to catalyze electrification and decarbonization

Green tech and electrification are held back by technological complexity and the inefficient use of limited resources.

The transition toward electrification is hampered by the need to develop custom battery solutions for high-value equipment – a time-consuming, laborintensive, and hazardous process.

The Tanktwo Battery Operating System (TBOS) makes incorporating a custom battery solution into any application - including high-performance, missioncritical ones that require an extreme level of reliability - cheaper, faster, and safer. Meanwhile, analytics increases operational efficiency and reduces the consumption of limited resources (i.e., lithium and cobalt.)



## **TANKTWO TECHNOLOGY: KEY HIGHLIGHTS**



Software-defined battery solution allows operators to reconfigure a battery with a few clicks on the screen instead of spending hours prying open equipment and changing battery packs.





Our scalable & flexible solution can take any shape and form to power ultra-reliable products with unique features in recordbreaking time with far fewer high-cost engineering resources.



Our technology can make any battery take charges from any voltage and deliver any voltage between 4 and 400V, increasing operational agility while streamlining inventory management.

TBOS makes it cheaper, faster, and safer to build custom battery packs for any application with our highly configurable API-/SDK-like solution. It also optimizes resource usage to reduce the amount of expensive



## **GREEN TECH + SUSTAINABILITY + SOFTWARE + DATA ANALYTICS**

Our technology straddles multiple areas critical to making electrification accessible and sustainable at a global scale.



Future-proof: Software-defined technology allows builders and operators to adapt to shifting demands and requirements on the fly without changing the hardware – giving them a long-term strategic advantage.

Accelerated product development cycles: TBOS shortens the time to market by reducing the complexity of implementing battery technologies, including lengthy compliance testing and certification processes.

Agility and Flexibility: Our software-defined technology provides unprecedented control and flexibility over how a battery behaves from minute to minute, allowing builders and operators to add agility to their solutions and operations.



(AP)

Industry-First: TBOS is the first green energy solution that applies insights and technologies from adjacent industries (e.g., IT networking and telecommunications) to advance how we store and manage electric power through batteries.





Configurability: TBOS enables the creation of battery packs in any shape and form, such as rows or stacks of Tanktwo Smartpaks, a Frisbee-like module, or any number of egg-shaped string cells. Builders and operators can configure the battery system to fit any application instead of designing their equipment around it.



Unprecedented reliability: If one cell is faulty or underperforming, the battery pack will automatically reconfigure to deliver the required power without interrupting the equipment's operations.



Adaptability: TBOS allows operators to configure the output, behaviors, and characteristics of a battery pack by adjusting the parameters (e.g., the voltage) on their computers without accessing the hardware, reducing the costs and risks that come with traditional solutions.



