TRITIUM

PK350/**350kW**

OUR INNOVATION

YOUR FUTURE TO HIGH-POWER CHARGING

Tritium is paving the way towards a more efficient and sustainable energy model to enrich EV drivers by providing unique and innovative automotive e-mobility solutions. Electrification of transportation is steadily growing and the need for more charging facilities and high-power chargers (HPCs) for Electric Vehicles (EVs) is in demand. Domestic and commercial electric vehicle owners want to encounter similar experiences to the traditional Internal Combustion Engine (ICE) vehicles and to pave the way, Tritium's PK350 HPC hardware enables rapid charging whilst enjoying long distance travel without the fear of driving range.

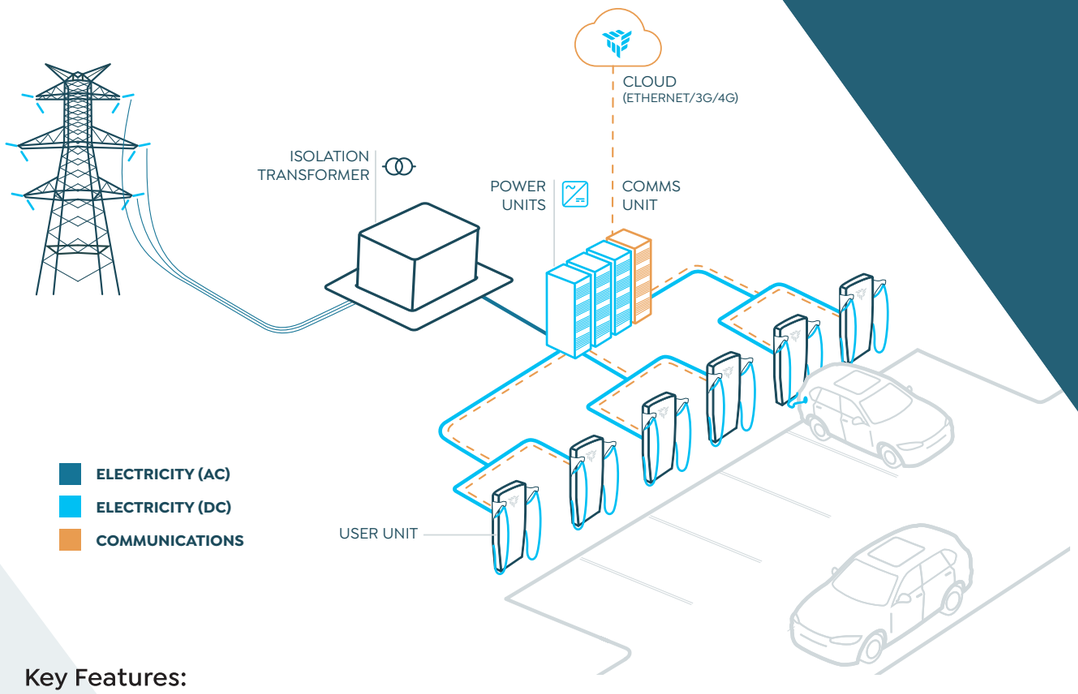
Increasingly government and commercial organisations are choosing EVs for fleet efficiency and to meet the growing necessity towards fast and high-power charging, Tritium's CE-certified PK350/350kW HPC hardware is the right solution in response to market demand. We have utilized our more than 20 years of experience and our unique DNA advantages that includes small footprint, scalability, flexibility, and high efficiency to bring you this flexible and scalable high-power DC charging system that has the ability to withstand the rigors of high usage and multiple charge points onsite. The PK350 is ideally suited to traditional fuel stations, motorways, rest stops, transit hubs and commercial fleets and the architecture is optimized for larger sites and the power can be shared dynamically between outputs which saves on capex costs.

The IP65 design and our patented liquid cooling system within the user unit allow for functioning under a wide range of challenging environmental conditions such as high and low temperatures, dust, humidity, salt, etc. Industry leading engineering professionals at Tritium developed the CCS and CHAdeMO software subsystem and component stacks and subsequently widely validated these technologies in multiple regions across Europe, Asia, North America, and Australia/New Zealand.

The PK350 HPC is widely deployed in the market today and is scalable from 175kW to 350kW with future upgrade to 475kW. This HPC can add up to 350km (217mi) of range to an EV in 10 minutes; operating at 175kW, in 15 minutes it can add up to 175km (109mi) of range and is equipped with Tritium's market-validated ISO 15118 Plug and Charge which is supported through OCPP1.6j with extensions, enabling EVs and charging equipment to communicate, be authenticated, and transact seamlessly via the charging cable. Additional support for credit card and traditional RFID-based payments gives the flexibility of easily integrated alternative payment methods. The credit card system supports both fixed-price charging sessions and pre-authorized/post-settlement options, where unit-based pricing can be applied against either elapsed time or kWh consumed.

The PK350 user unit enclosure offers a unique opportunity for branding the units to match your visual identity with an impressive amount of space for you to display your branding, ensuring high visibility and instant recognition. The user unit also features LED downlights that, in addition to offering a measure of security, clearly illuminate the branded panels. Combined with our decals (tailor-made to your specifications), this provides a competitive edge, enables customer loyalty, and helps to heighten public awareness of your organisation's support for sustainability, and reducing greenhouse gas emissions and pollution.

FEATURES & BENEFITS



Key Features:

Modular layout with flexibility and scalable technology to arrange system components to suite your site's configuration

- Slim design with small footprint and can easily fit into existing sites
- User unit is scalable with option to add more power units as demand grows with increased site utilization or advances in technology
- Each power unit powers one or two user units depending on the desired configuration allowing for scalability
- One control unit per site that oversees entire site

High efficiency – Tritium's architecture reduces energy loss

- System designed to minimize the isolation points – the fewer isolation points, the less the loss
- High voltage DC transition through reduced cabling sizes, therefore very efficient removal of heat from the system reducing energy loss
- Patented liquid-cooled technology inside the user unit ensuring longevity of the power electronics and leading to high efficiency levels
- Highest ingress protection rating (IP65) in user units ensuring longevity of the power electronics and leading to high-efficiency levels in tough environments

Flexibility with a small footprint, ideal for any location, especially where real estate is at a premium

- Fits easily into existing sites and is non-intrusive
- Allows you to maximize revenue opportunity from existing underutilized space
- Tailor-made front and back decals to your design specifications to enhance your brand and enable customer loyalty
- Front and back LED downlights that illuminate the charger for driver safety and amplification to your branding
- Offers both CHAdeMO and CCS

Durable and robust metal framework user unit with IK10 rating covered by lightweight and sturdy vandal resistant plastic shell

- Equipped with ISO 15118 Plug and Charge technology for hassle-free authentication and payment
- Liquid cooled power electronics prevent all pests and vermin from entering the equipment.
- Increased operating temperature range (-35°C/-31°F to -50°C/122°F)
- 3G/4G wireless communication
- Effortless OCPP integration
- Optional credit card reader with several payment model options (including Cloud API)
- Surge protection from lightning strikes with integrated Type 1 SPDs on both AC and DC circuits
- Tilt protection
- Parking sensors both in the front and on the sides

Unique Benefits:

- Easy upgrade from 175kW to 350kW with future upgrade to 475kW
- Plug and Charge technology for hassle-free authentication and payment – first time, every time
- Ready for the EVs of tomorrow with 500A liquid-cooled cable options
- In just 10 minutes, operating at 350kW can add 350km (217mi) of range to an EV or in just 15 minutes, operating at 175kW can add 175km (109mi) of range to an EV
- Site electrical architecture optimized for maximum efficiency
- Equipped with ISO 15118 Plug and Charge technology for hassle-free payment and authentication
- Cutting-edge technology engineered for reliability and a wide range of grid voltages – 400V 50Hz, 480V 60Hz
- Optimal functionality in a wide range of environmental conditions including high and low temperatures (-350C/-310F to -500C/1220F)
- Site power levelling allows more carparks to be serviced from a reduced capacity feed (share the available power when many cars are charging)
- Reduced wear and tear on internal components for maximum hardware lifespan with minimum maintenance
- Instant discharge for added safety
- Parking sensors both in the front and on the sides
- Fibre-optic communications link between user units and power unit enabling greater flexibility in site configuration
- Customise the intuitive Human-Machine Interface (HMI) screen to suit your needs
- Retracting cable management increases the reach of cables without them hanging on the ground.

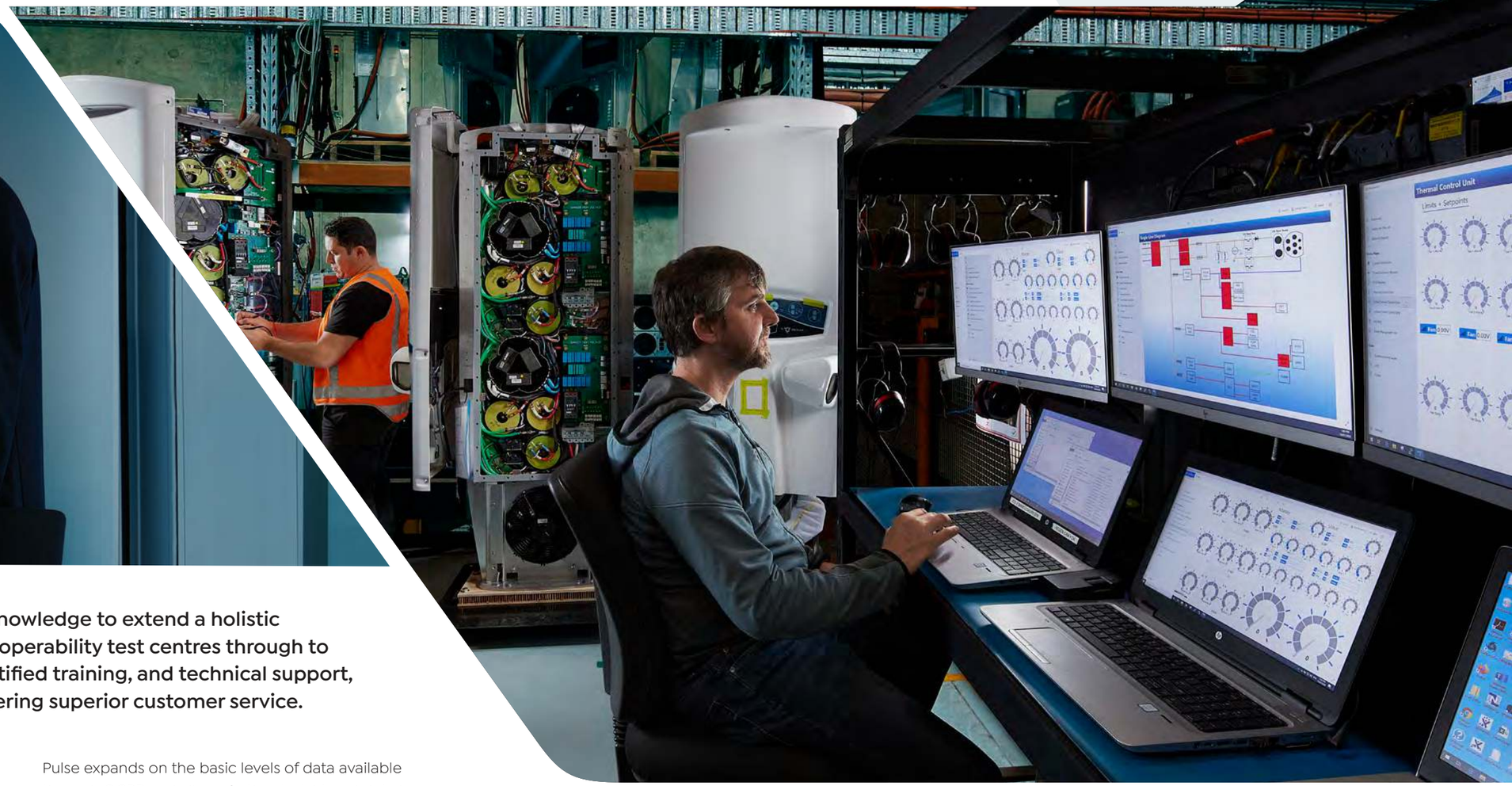
CUSTOMER CARE

Tritium has industry-leading capability and knowledge to extend a holistic experience from world-class innovative interoperability test centres through to dedicated customer onboarding team(s), certified training, and technical support, all underpinned by our commitment to delivering superior customer service.

Whether you are interacting with our dedicated 24/7 customer care, our onboarding engineers and technicians, or our cloud-based management platform, myTritium, we strive to remove the complexity and costs of managing your charging network. myTritium facilitates the management of chargers with ‘live’ chat functionality, allowing direct interaction with Tritium’s highly trained and experienced support teams. Our powerful data interaction tool, Pulse, enables a single ‘pane of glass’, providing real-time insight, data analytics, and reporting on the usage and status of your HPC charging network. Through the combination of these advanced technologies, Tritium sees 95% of service requests diagnosed remotely and 75% resolved without requiring onsite intervention.

Pulse expands on the basic levels of data available through OCPP and allows further insight and detail of your network to achieve greater reliability. Pulse provides real-time data and visibility to monitor charger readiness and offers detailed tracking across your network, as well as flexible analytics. With Pulse’s flexible analytics and intuitive design, you can extract dta from your network using a variety of metrics including name, date, time, status, charging station, energy delivered, utilization, connectivity statistics. Tritium’s HPC hardware is validated, measured, and tested against the latest OCPP specification, for seamless communication.

DATA MANAGEMENT & TRANSPARENCY



The PK350 EV charging experience is hands-free which means that drivers can leave their vehicles while charging and utilize adjacent amenities. This high power charger routinely communicates to backend by OCPP for aggregated demand insight and allow customers to engage in aggregated virtual demand tariff benefits with grid operators and data can be linked to expected volumes of vehicle models coming to market to meet future demands.

Tritium have proprietary data advantages and insights that facilitate studies on charging demand profiles and mapping vehicle types both present and future to expected charging volumes is an extremely valuable planning tool.

Tritium’s HPC hardware is deployed globally in a wide range of different market maturities that provide high-fidelity and rich data insights for network operators. Data analytics and management enable network operators to take advantage of data integration and data monetization to reduce total cost of ownership.

AUSTRALIA • USA • EUROPE

tritium.com.au • enquiries@tritium.com.au
Worldwide +61 7 3147 8500 • 48 Miller Street, Murarrie, QLD 4172 , Australia
USA +1 310 961 5299 • 20000 Vermont Avenue, Torrance, CA 90503, United States
Europe +31 202 250 100 • Luchtvaartstraat 3B, 1059 CA Amsterdam, Netherlands