



220EV

Zero
Emissions
Vehicle

220EV

Peterbilt continues to expand its alternative powertrain offerings with the new Model 220EV – its first electric configuration for medium duty applications. The 220EV provides customers a zero emissions vehicle for clean, efficient operation and lower overall maintenance.

The Model 220EV is equipped with an e-motor, two battery packs and an on-board charger, allowing for a range of up to 200 miles. Using the compatible DC fast-charging system, the state-of-the-art, high-energy density battery packs can recharge in 1-2 hours, making the 220EV ideal for local pickup and delivery, as well as short regional haul operations.

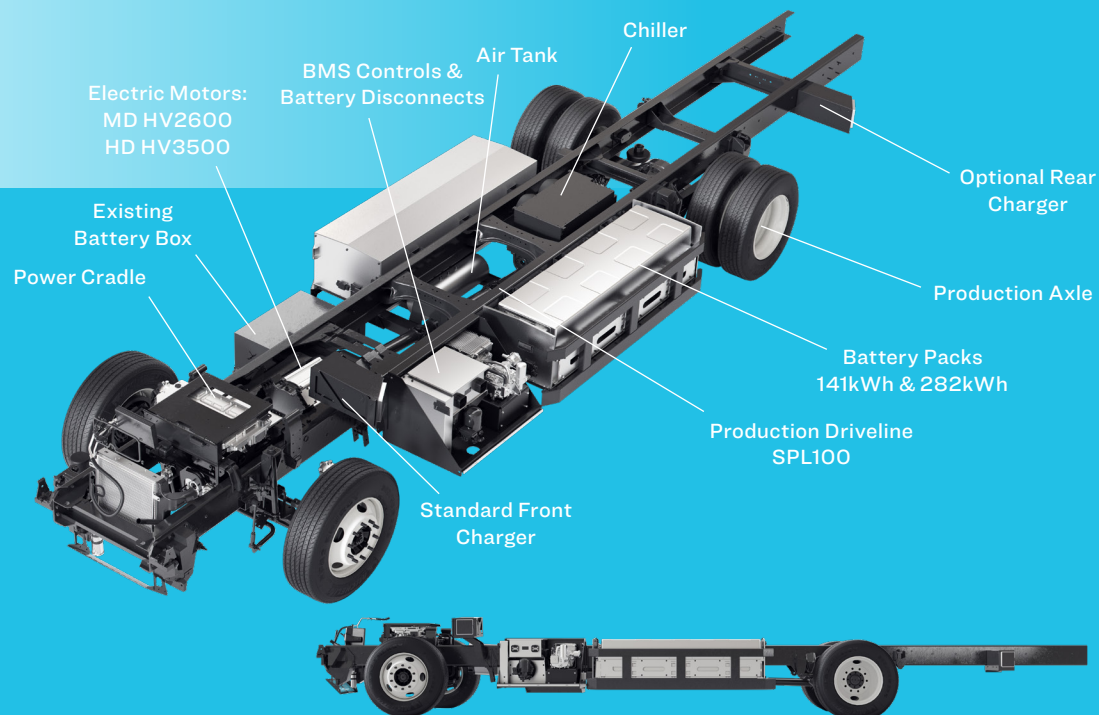
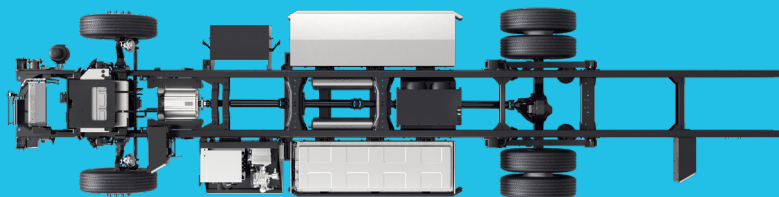
Designed for driver comfort and productivity, the Model 220EV features enhanced visibility, superior maneuverability, a spacious interior and ease of serviceability for maximum uptime.



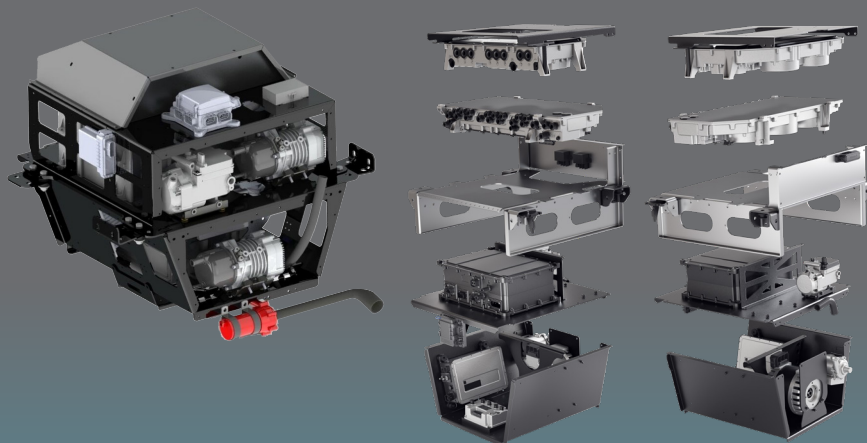
220EV

ALL-ELECTRIC POWERTRAIN

The fully integrated, all-electric powertrain of the Model 220EV is designed for optimal weight distribution and performance. Battery packs are mounted outside of the frame rails, with air tanks mounted inside the frame.



The **power electronics cradle** includes the vehicle's on-board charger, battery disconnect controls, vehicle software, cab heater unit and air compressor. The cradle is located in a single, easily accessible service point, where a traditional diesel engine would be located.

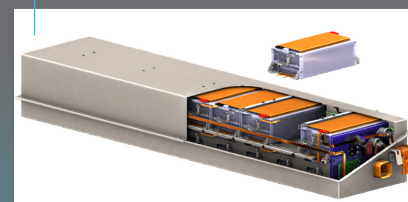
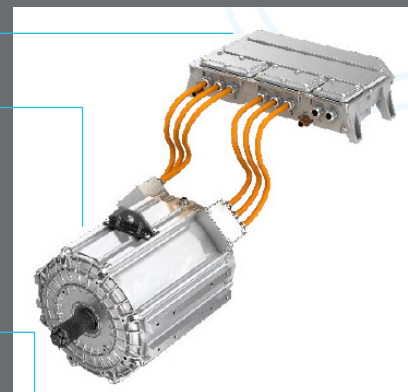


The **inverter** converts the energy from the batteries and provides power to **the electric drive motor**.

The direct-drive motor provides power to the drive shaft, eliminating the need for a transmission.

The Lithium Iron Phosphate (LFP) battery packs are mounted outside the frame rails. The batteries are thermally controlled with the chiller to provide a consistent temperature to optimize battery life.

Regenerative braking captures energy from stop-and-go conditions to recharge the batteries, and help maximize the vehicle's range.





MODEL 220EV SPECIFICATIONS

E-Motor

- Class 6 – HV2600
 - 154 kW (207 hp) Continuous Power
 - 250 kW (355 hp) Peak Power
- Class 7 – HV3500
 - 259 kW (347 hp) Continuous Power
 - 350 kW (469 hp) Peak Power
- Drive Configuration: 4X2

Batteries

- Lithium Iron Phosphate (LFP), Thermally Controlled
- 618 Volts
- Configurations Available
 - 141 kWh Energy Storage, 100 Mile Range
 - 282 kWh Energy Storage, 200 Mile Range

Charging

- AC
 - 19.2 kW Power Rating
 - 7.5-15 Hour Charge Time
- DC Fast – Charging
 - 150 kW Power Rating
 - 1-2 Hour Charge Time
- Charging Locations
 - BOC – Standard
 - EOF – Optional

Dimensions

- GVWR
 - 26,000 lbs. (Class 6)
 - 33,000 lbs. (Class 7)
- Wheel Bases: 206", 218", 274"
- Body Lengths: 24', 26', 30'
- 12,300 lbs. – 14,800 lbs. Curb Weight

Gross Axle Weight Ratings

- Class 6 Front – 10,000 lbs.
- Class 7 Front – 12,000 lbs.
- Class 6 Rear – 16,000 lbs.
- Class 7 Rear – 21,000 lbs.
- Rear Axle Ratio: 5.57 with 22.5 Wheels/ 4.63 with 19.5 Wheels

Suspensions

- Front Suspension – Parabolic Spring
- Rear Suspension
 - Reyco Mechanical
 - Hendrickson HAS210
 - Hendrickson HAS230 Air Ride

Wheels/Tires/Brakes

- Wheels – 22.5" Polished Aluminum
- Wheels – 19.5" Polished Aluminum
- Wheels – 22.5" Steel Painted White
- Wheels – 19.5" Steel Painted White
- Tires – F/R: Bridgestone 11R22.5"
- Tires – F/R: Bridgestone 19.5"
- Brakes – Front Air Disc and Rear Drum Standard

MODEL 220EV SPECIFICATIONS continued

Frame

- 34" Frame Spacing
- Steel Painted Gray Bumper

Cab

- 63.4" BBC
- 95" Cabin Width
- 104" Cabin Height
- Hydraulic 55-Degree Tilting Steel Cab
- 82.5" Cab Width
- Driver Seat – Air Suspension
- Passenger Seat – 2-Person Bench Standard, Single Person Air Ride Optional
- Center Storage Console & Cupholders
- Heater & Air Conditioning
- Cruise Control
- Power Windows
- Power & Heated Mirrors

Paint

- Cab – Ice White
- Frame – Black

Additional Options

- Speakers & Wiring for Customer Installed Radio
- Rear Shock Absorbers – Reyco
- Rear Axle Stabilizer Bar – Reyco
- Rear Differential Lock
- Rear Mud Flap Hanger & Shields
- Backup Alarm
- Wiring Only for Customer Installed Backup Alarm
- Orange Seat Belts
- Red Seat Belts

Target Applications

- Pickup & Delivery
- Regional Haul
- Lease/Rental
- Food & Beverage

* Technical specifications are dependent on configuration and component selected.



For more information on the Model 220EV, visit [peterbilt.com](https://www.peterbilt.com).