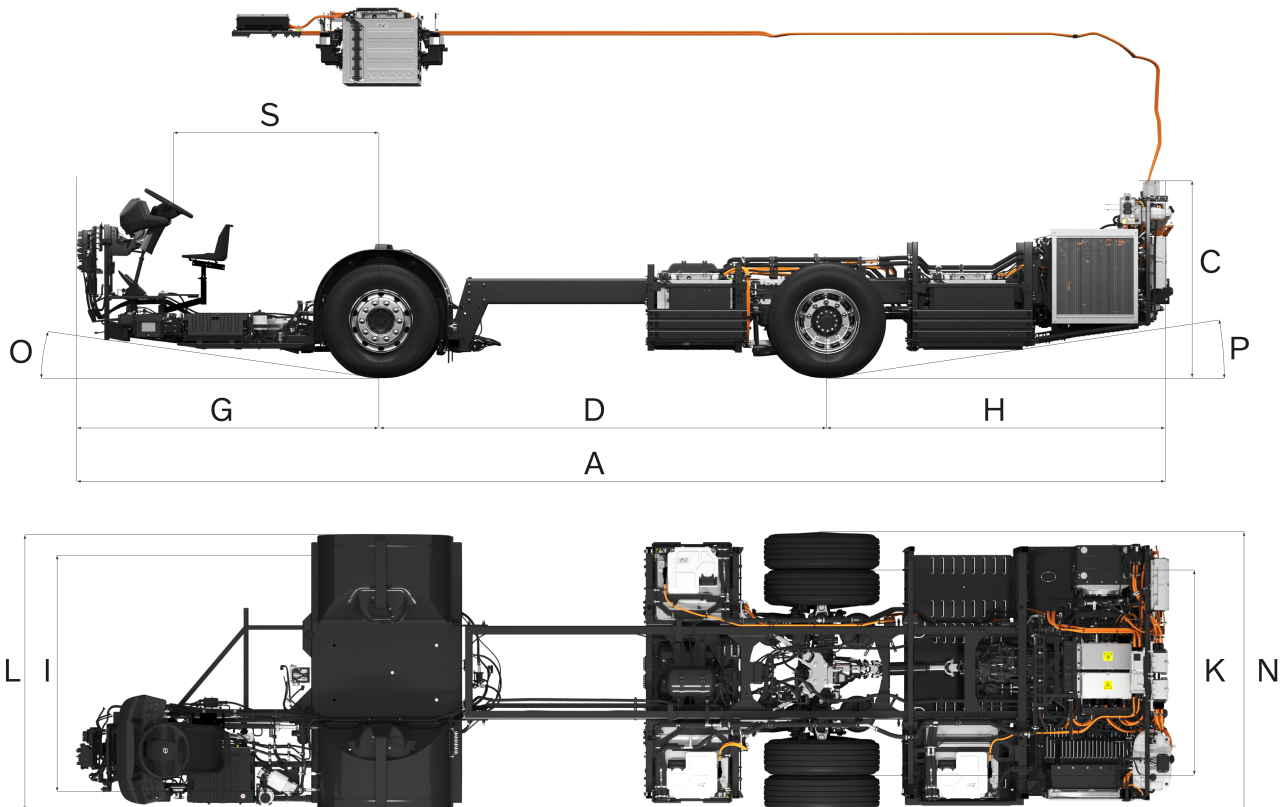


# VOLVO BZR LOW ENTRY ELECTRIC 4X2



Model BZR Low Entry Electric 4x2

## Dimensions

A	Overall chassis length, depending on body, up to (mm)	9,850–13,130
C	Frame height at rear structure (mm)*	1,560
D	Transport wheelbase (mm)	4,000
	Approved wheelbase (mm)	4,450–7,400
G	Front overhang (mm)	SWP1920 2,500
		SWP2020 2,600
H	Rear overhang (mm)	3,130
	Optional rear overhang (mm)	2,900
	Optional rear overhang (mm)	3,220
S	Steering wheel position (mm)	1,920
		2,020
I	Track, front (mm)*	2,068
K	Track, rear (mm)*	1,834
L	Overall width, front wheels or housing (mm)*	2,500
N	Overall width, rear wheels (mm)*	2,480

# VOLVO BZR LOW ENTRY ELECTRIC 4X2

## Model BZR Low Entry Electric 4x2

O	Approach angle (°) (SWP2020)*	8.0
P	Departure angle (°)	8.0
	Departure angle (°) (optional) (Rear overhang 2,900 mm)	9.0
	*) Overall height, approach and departure angles with tyres:	295/80 R22.5, 8.25 x 22.5

## Weights

Permitted front axle load (kg)	8,000
Permitted driving axle load (kg)	13,000
Permitted driving axle load (kg) (optional rear overhang 3,220 mm)	12,600
Permitted GVW (kg)	21,000

## Electric motor

### EPT 402 (1 motor)

Output, max (kW)	R85 max 200
Continuous power (kW)	R85 30 min 167
Max torque (Nm)	425
Max wheel torque up to (Nm)	20,900

### EPT802 (2 motors)

Output, max (kW)	R85 max 400
Continuous power (kW)	R85 30 min 334
Max torque (Nm)	850
Max wheel torque up to (Nm)	33,500

## Energy storage system (ESS)

Available storage energy (battery capacity)	90 kWh
Available storage energy (4–5 batteries)	360–450 kWh
Battery type	Lithium-ion, NCA
Voltage	600 V
Mass per battery (kg)	535 kg

## Electrical system (Automatic shut off of main switch at low voltage level)

Number of batteries	2 x 12 V
Battery capacity	2 x 140 Ah/2 x 170 Ah

## Transmission and axles

Gearbox	Volvo 2-speed automated manual transmission
Front axle	Volvo RFS-L
Rear axle	Volvo RS1228C
Differential lock	Optional

## Suspension and steering

Air bellows, front	2
Air bellows, rear	4
Kneeling	Optional
Max wheel angle	52 with 295/80 R22.5
Power steering	Electric driven hydraulic steering
Steering wheel side	LHD/RHD

## Tyres and rims

Tyres	275/70 R22.5"
	295/80 R22.5"
	305/70 R22.5"
	315/70 R22.5"

# VOLVO BZR LOW ENTRY ELECTRIC 4X2

## Model BZR Low Entry Electric 4x2

Rims	7.50 x 22.5
	8.25 x 22.5
	9.00 x 22.5

### Charging system

#### CCS DC

- Industry standard solution
- Max 250 kW charging power
- Front or rear/left or right charging

#### OppCharge

- Industry standard solution
- Max 450 kW charging power
- Customer decision of position of rails

### Energy storage system (ESS) safety

- Battery monitoring
- Safety on cell and pack level (monitoring)
- Thermal management system
  - Independent from climate system
  - Coolant level warning in instrument cluster
  - Automated control of battery temperature with energy-efficient 600 V active cooling/heating system
  - Electric driveline and auxiliaries cooling circuit
  - Waste heat from the driveline circuit is used to heat the battery circuit through a heat exchanger
- Insulation isolation resistance monitoring
- Charging safety
- Workshop safety
- Mechanical protection
- Water immersion protection
- E-info session
- Rescue sheet

### Volvo Ready to run

- The bus will keep the batteries in working temperature, to ensure that the bus can be started directly when needed without a pre-heating period
- 24 V batteries will be charged from the 600 V battery
- Pre-heating/cooling of the interior can be done when supported by HVAC supplier

### Climate system

Chassis prepared for various roof-mounted HVAC units from different suppliers (heating, ventilation and air conditioning, including heat pump functionality).

### Air and brake system

- Volvo disc brakes
- Electronic Braking System (EBS 5)
- Electronic Stability Control (ESC)
- Anti-lock Braking System (ABS)
- Anti Slip Regulation (ASR)
- Brake blending
- Hill Start Aid
- Brake temperature warning
- Brake Assist
- Wear indicator on brake pads
- Pneumatic system, easily accessible for external fill

### Driver station

Cluster and controls transit mounted. Also available with Volvo dashboard:

- Full dynamic cluster with 12.3" digital display
- Steering wheel buttons for easy access
- Integrated radio with Bluetooth mobile connection
- Tachograph information in cluster
- Automatic headlamp switch
- Rain sensor
- Charging information
- Longer retarder stalk
- Volvo Dynamic Steering

### Active safety systems

- Forward Collision Warning
- Collision Warning with City Brake
- Emergency Stop Signal
- Intelligent Speed Assist
- Front Short Range Assist
- Side Collision Avoidance Support
- Tire Pressure Monitoring System
- Driver Alert Support
- Lane Change Support
- Lane Keeping Support
- Safety Zones