



ES 3000 BATTERY-ELECTRIC SHUNTING VEHICLE

VEHICLE HIGHLIGHTS:

- ✓ Heavy and robust construction;
- ✓ Greatest power on the market;
- ✓ Strong secure braking;
- ✓ Air braking compatible with all trains;
- ✓ Almost maintenance-free vehicle;
- ✓ Concentration on safety;
- ✓ Strong battery for multiple shifts operation;
- ✓ Only 5,5 hours recharge time;
- ✓ Easy to operate by any operator



**SAFE,
RELIABLE,
EASY,
CHEAP
OPERATION**

SPECIFICATION ES3000 SHUNTER

Battery-powered and radio remotely controlled rail locomotive for safe moving and exact positioning of freight wagons.

Gauge - mm	1435
Traction force - kN	>150
Drive system	3 driven axles
Drive AC electric motors - nominal	3x30kW
Nominal work capacity in tons	3000 on straight+level track
Weight - kg	48 000
Dimensions LxWxH - mm	7400x2400x2700
Wheels, dia. in mm	Solid steel, ϕ 660
Operating power - V	24
Main power supply - V	80
Battery capacity - Ah	2x1400
Battery chargers	2xBuilt-in on-board - high frequency, air-mix system integrated
Max. recharge time - hours	5,5
Battery life - full charge cycles	>1800
Work speed - m/h	To be defined
Single travel speed - m/h	To be defined
AC motor controllers	Curtis Instruments - USA
AC motor controllers water cooling	YES
AC motor controllers user-programator	(option - laptop or hand-held)
Brakes locomotive	Regeneration, electromagnetic parking brakes, spring-applied emergency brake
Brakes wagons	Pneumatic brakes – standard railway
Sanding	On front+back 4 wheels, direction-wise automatic
Braking distance - single travel - m	<5
Braking distance - shunting work - m	<3 depends on load and number of wagons
Braking distance - emergency - m	<2
Air compressor type	Screw
Air compressor capacity	3000l/min @ 8bars
Radio remote control range	300m at open space
Radio remote control range - extended	YES – up to 500m
Quality management system	EN ISO 9001:2015
Environment management system	EN ISO 14001:2015
Weldin management system	EN ISO 15085:2