

Robust tow tractor with full suspension axles (front and rear) for indoor and outdoor use

Comfortable operation

Automatic parking brake

Electronic speedCONTROL enables smooth acceleration and customization of travel speed settings

High energy efficiency with maintenance-free AC technology

Weather protection cabins (optional)



## EZS 570NA / 580NA / 590NA

**Tow Tractor (15,400 / 17,600 / 19,800 lbs.)**

The Jungheinrich® EZS series includes versatile, economic tow tractors for towing loads up to 19,800 lbs. The ability to connect several trailers together helps to provide flexibility and increased efficiency in most material handling operations.

The coupler is visible from the operator seat position and is easily accessible. The semi-automatic remote release (optional) allows the connecting and disconnecting of trailers without the operator having to leave the vehicle, helping to save both time and money. The EZS tow tractors are also available with many different hitches to allow it to fit virtually every trailer type.

The 48 volt drive motor, which utilizes advanced AC technology, provides additional power.

### **The key advantages:**

- Powerful acceleration.
- High top speed with significant energy savings.
- Extended operating times.
- Reduced maintenance through omission of carbon brushes.

The EZS series is designed with optimum ergonomic features. The standard full-suspension chassis (both front & rear axles) help to dampen the effects of traveling over uneven surfaces, providing a more comfortable ride for the operator.

The position of the operator seat provides ample leg room while still allowing the operator to be in close proximity to the load. The low step is ideal for effortless entry and exit from the tow tractor.

The short turning radius of the EZS tow tractors helps operators move in tight spaces with minimal effort, while the full-suspension axles offer both comfort and stability during travel. The tow tractor also features an electric parking brake, which automatically engages when the truck is not moving – reducing the chance of rollbacks when operating on sloped surfaces.

**JUNGHEINRICH®**

# EZS 570NA

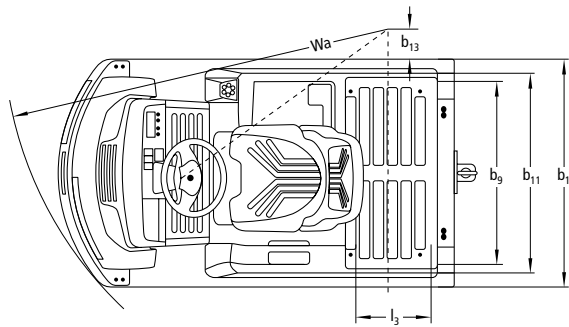
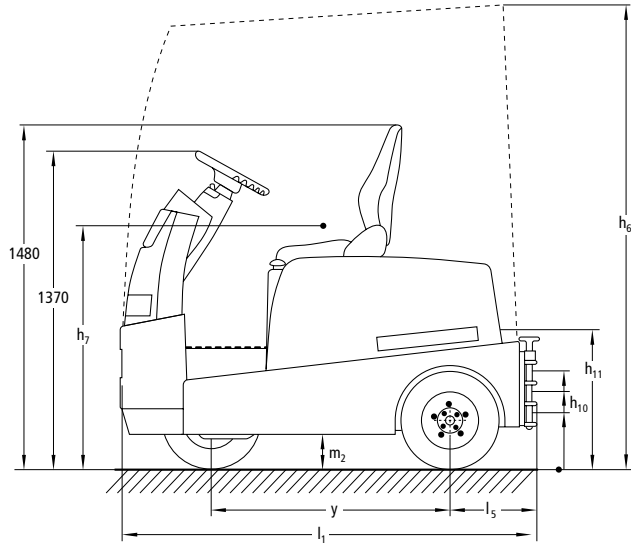
## Technical data

						Jungheinrich		Jungheinrich		
Characteristics	1.1	Manufacturer				EZS 570NA		EZS 580NA		
	1.2	Manufacturer's type designation				electric		electric		
	1.3	Power type				seated		seated		
	1.4	Operator position				15,400		7,000		
	1.5	Load capacity / rated load	Q	lb	kg	17,600		8,000		
Weights	1.7	Rated tractive power	F	lb-force	N	314		1,400		
	1.9	Wheelbase	y	in	mm	40.7 <sup>1)</sup>		1,035 <sup>2)</sup>		
	2.1	Service weight without battery		lb	kg	1,510 <sup>2)</sup>		685 <sup>2)</sup>		
	2.1.1	Service weight including minimum weight battery		lb	kg	2,778 <sup>3)</sup>		1,260 <sup>3)</sup>		
Wheels, Chassis	2.3	Axle loading, unloaded front / rear		lb	kg	1,278 / 1,499 <sup>4)</sup>		580 / 680 <sup>4)</sup>		
	3.1	Tire type / material					solid pneumatic		solid pneumatic	
	3.2	Tire size, drive (rear)		in	mm	16.5 x 4.7 (4.00-8 / 97 A5)		422 x 121 (4.00-8 / 97 A5)		
	3.3	Tire size, rear (front)		in	mm	17 x 6.5 (16x6-8 / 113 A5)		434 x 164 (16x6-8 / 113 A5)		
	3.5	Wheels, number drive / load (x=driven)					1 / 2x		1 / 2x	
	3.7	Tread width, rear	b <sub>11</sub>	in	mm	34.3		870		
	Dimensions	4.7	Height of overhead guard (cabin)	h <sub>6</sub>	in	mm	84.3		2,140	
4.8		Seat height / ground to seat index point	h <sub>7</sub>	in	mm	40.9		1,040		
4.12		Coupling height		in	mm	9.4 <sup>5)</sup>		240 <sup>5)</sup>		
4.19		Overall length	l <sub>1</sub>	in	mm	71.4 <sup>6)</sup>		1,813 <sup>6)</sup>		
4.21		Overall width	b <sub>1</sub>	in	mm	39.2		996		
4.32		Ground clearance, center of wheelbase	m <sub>2</sub>	in	mm	6.3		160		
4.35		Minimum outside turning radius	Wa	in	mm	63.8 <sup>7)</sup>		1,620 <sup>7)</sup>		
Performance	4.36	Internal turning radius	b <sub>13</sub>	in	mm	23.6 <sup>8)</sup>		600 <sup>8)</sup>		
	5.1	Travel speed, loaded / unloaded		mph	km/h	5.3 / 11.2		8.5 / 18		
	5.5	Drawbar pull with / without load		lb-force	N	314		1,400		
	5.6	Maximum drawbar pull with / without load		lb-force	N	1,236		5,500		
	5.7	Gradeability loaded / empty					— <sup>9)</sup>		— <sup>9)</sup>	
Electrical	5.10	Service brake					hydraulic		hydraulic	
	6.1	Drive motor(rating 60 minutes)		HP	kW	6.0		4.5		
	6.4	Battery voltage / nominal capacity	k <sub>s</sub>	V/Ah		48 / 375 <sup>10)</sup>		48 / 375 <sup>10)</sup>		
	6.5	Battery weight (minimum / maximum)		lb	kg	1,204 / 1,332 <sup>11)</sup>		546 / 604 <sup>11)</sup>		
Other	6.5.1	Battery dimensions (length x width x height)		in	mm	16.1 x 32.5 x 24.6 <sup>12)</sup>		411 x 827 x 627 <sup>12)</sup>		
	8.1	Type of drive control					Impulse / Mosfet AC		Impulse / Mosfet AC	
	8.4	Sound level at driver's ear					57		57	
1) with (XL) battery compartment: 49.2 in (1,250 mm) 2) with (XL) battery compartment: +166 lb (+75 kg) 3) with (XL) battery compartment: +793 lb (+360 kg) 4) with (XL) battery compartment: 1,720 / 1,852 lb (780 / 840 kg) 5) other coupling heights available 6) with (XL) battery compartment: 80.1 in (2,035 mm) 7) with (XL) battery compartment: 73.2 in (1,860 mm) 8) with (XL) battery compartment: 26.2 in (665 mm)						9) see diagram 10) with (XL) battery compartment: 48 V (625 Ah) 11) with (XL) battery compartment: 1,204 / 2,050 lb (546 / 930 kg) 12) with (XL) battery compartment: 24.8 x 32.6 x 24.6 in (630 x 830 x 627 mm) 13) with (XL) battery compartment: +154 lb (+70 kg) 14) with (XL) battery compartment: -44 lb (-20 kg) 15) with (XL) battery compartment: 1,841 / 1,852 lb (835 / 840 kg)				

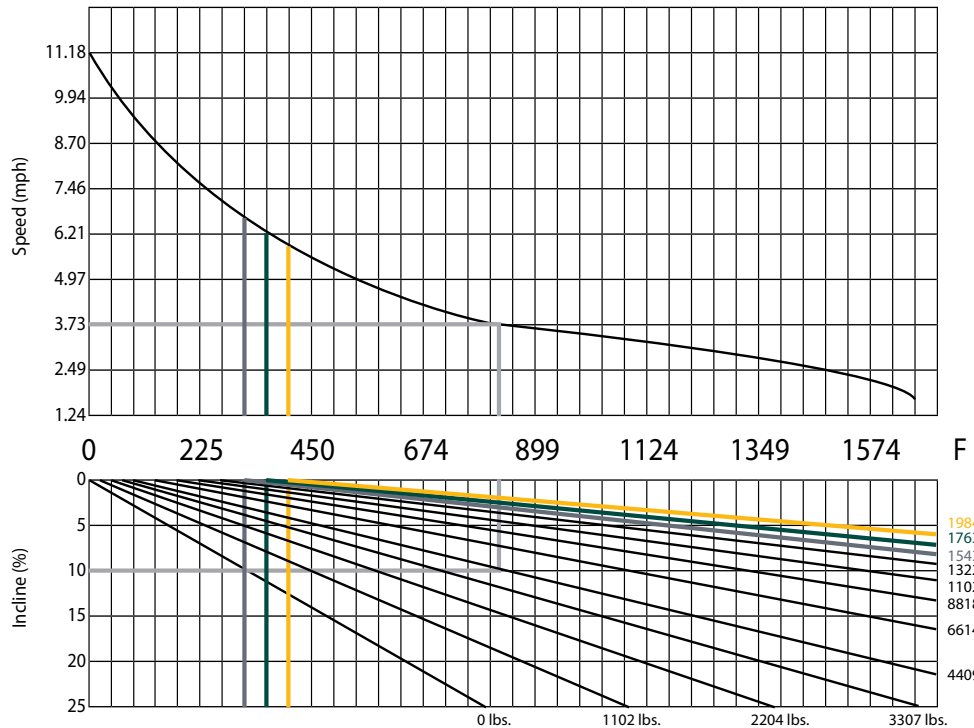
This specification sheet only provides technical values for the standard truck. Non-standard tires, different masts, additional equipment, etc., could produce other values. Rights reserved for technical changes and improvements.

as of: 06/2015

1.1	Jungheinrich	
1.2	<b>EZS 590NA</b>	
1.3	electric	
1.4	seated	
1.5	19,800	9,000
1.7	404	1,800
1.9	40.7 <sup>1)</sup>	1,035 <sup>1)</sup>
2.1	1,841 <sup>2)</sup>	835 <sup>2)</sup>
2.1.1	3,045 <sup>14)</sup>	1,381 <sup>14)</sup>
2.3	1,367 / 1,742 <sup>15)</sup>	620 / 790 <sup>15)</sup>
3.1	solid pneumatic	
3.2	16.5 x 4.7 (4.00-8 / 97 A5)	422 x 121 (4.00-8 / 97 A5)
3.3	17 x 6.5 (16x6-8 / 113 A5)	434 x 164 (16x6-8 / 113 A5)
3.5	1 / 2x	
3.7	34.3	870
4.7	84.3	2,140
4.8	40.9	1,040
4.12	9.4 <sup>5)</sup>	240 <sup>5)</sup>
4.19	71.4 <sup>6)</sup>	1,813 <sup>6)</sup>
4.21	39.2	996
4.32	6.3	160
4.35	63.8 <sup>7)</sup>	1,620 <sup>7)</sup>
4.36	23.6 <sup>8)</sup>	600 <sup>8)</sup>
5.1	5.3 / 11.2	8.5 / 18
5.5	405	1,800
5.6	1,686	7,500
5.7	— <sup>9)</sup>	
5.10	hydraulic	
6.1	6.0	4.5
6.4	48 / 375 <sup>10)</sup>	
6.5	1,204 / 1,332 <sup>11)</sup>	546 / 604 <sup>11)</sup>
6.5.1	16.1 x 32.5 x 24.6 <sup>12)</sup>	411 x 827 x 627 <sup>12)</sup>
8.1	Impulse / Mosfet AC	
8.4	57	



Performance Diagram EZS 570NA



F = drawbar pull [lb-force]

Note: Equipping this model (these models) with a power source (e.g. Lithium-ion, Hydrogen Fuel cell, etc.) that has not been previously approved by the factory is considered a modification. Per OSHA 1910.178 and ANSI/ITSDF B56.1, please consult with your factory representative prior to installing any non-OEM power source that has not been previously approved.

Example:  
When the EZS 570NA pulls a 4,409 lb. load up a 10% grade, it requires 770 lbs. of drawbar pull and achieves a maximum speed of 3.73 mph.

- Notes:
- 1) Continuous operation over below (force) is not permitted.  
EZS 570 NA: 314 lbs. (force)  
EZS 580 NA: 360 lbs. (force)  
EZS 590 NA: 405 lbs. (force)

- 2) The use of braked trailers is strongly recommended for operation on upward / downward grades over 4%.

# The Jungheinrich Advantage

## Efficient AC technology

Jungheinrich motors with AC technology provide increased efficiency and reduced operating costs while also offering:

- Higher efficiency with excellent energy consumption.
- Powerful acceleration.
- High top speed, even when loaded.
- Stepless travel direction changes.
- No carbon brushes – the drive motor is maintenance-free.

## Comfortable, productive operation

The electronic speedCONTROL management system and automatic electric braking system work together to facilitate comfortable and secure operation of the vehicle. Adjustment opportunities are available to suit many applications:

- The travel speed set by the position of the accelerator is automatically maintained regardless of gradient.
- Three programmable performance modes to suit various applications.
- Regenerative braking returns energy to the battery during deceleration.
- Secure starting and stopping, even on slopes, with the electric parking brake, which automatically engages when stationary and automatically releases when starting.
- Crawl speed button for traveling at reduced speed (speed adjustable).



Ergonomic low step for effortless entry and exit to and from the vehicle

## Optimum ergonomics

- Low step for effortless entry and exit from the vehicle.
- Close proximity of operator position to trailer and load.
- Highly visible and accessible coupling.
- Multiple storage areas for the operator.

## Rugged construction for demanding applications

- Chassis made of high-quality 0.31 inch thick plate steel.
- Extra high bumper on the front end.
- 2-level (driving + daytime) LED forward working lights.
- Robust, high-intensity LED rear lights and indicators.

## Long operating times

- Energy efficient AC technology and high battery capacity, together with regenerative braking, provide longer operating times.
- Optional extra large battery compartment to allow for extended run times.

## Well informed at any time

Easy-to-read display and instruments help keep the operator informed of critical information:

- Battery discharge indicator, operation hours, travel speed and fault diagnostics.
- Adjustable travel parameters.



Clear layout of controls provides easy operation of the tow tractor

## Available options

The EZS tow tractors may be customized to fit your individual application:

- Fast, easy connecting/disconnecting of trailers with semi-automatic remote unlocking from the operator position.
- Inching controls for simple coupling connect and disconnect.
- Non-marking, solid pneumatic tires.
- PIN (personal identification number) activation of the vehicle.
- Supplementary chassis protection made from steel.
- Holder for RF data communications components.
- Different couplers.
- The built-in battery allows for convenient charging with no need to open panels.
- Cab with a variety of accessories for traveling outside warehouses.

## Lithium-ion Package Advantages

- Fast charging with no need for battery exchanges
- Maintenance-free with no odors from gases or acidification
- Longer service life and lower maintenance compared with lead-acid batteries
- Charging can be interrupted at anytime
- 5-year battery warranty included

## Parts when you need them

Jungheinrich's Parts Fast or Parts Free Guarantee ensures next-business-day delivery by 5:00 PM of all Jungheinrich parts in the United States, or they're free, including freight. For customers in Canada and Mexico, the guarantee ensures shipping of parts within 24 hours from the time the order was placed by the dealer. See your local Jungheinrich dealer for program details.

- \* Programs may be subject to change without notice and may vary by region. Please ask your local Jungheinrich dealer for complete terms and conditions.

Built in compliance with ANSI/ITSDF B56.9 design specifications for Type E industrial trucks with type EO battery.