

# SRE-2010 Elite Straight Rail Stairlift Technical Specifications

MODEL NUMBER: SRE-2010 and SRE-2010C

ETL-Intertek C-US Listed: Control Number: 4004689

PERFORMANCE STANDARDS:

ANSI/ASME: A18.1-1999 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts ANSI/ASME: A18.1-2003 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts ANSI/ASME: A18.1-2005 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts ANSI/ASME: A18.1-2008 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts ANSI/ASME: A18.1-2011 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts ANSI/ASME: A18.1-2014 (Sec. 4 or 7) Safety Standards for Platform Lifts and Stairway Chairlifts

**CSA B613 Private Residence Lifts** 

ANSI/ASME: CSA B44.1/ASME-A17.5 Elevator and Escalator Electrical Equipment

RATED LOAD: 400 lb (181 kg) maximum

**NUMBER OF PASSENGERS: 1** 

POWER SOURCE: 24VDC comprised of 2 each 7AH 12 volt sealed maintenance-free lead acid batteries;

On/Off power switch to prevent battery drain over lengthy storage periods

CHARGER: 105-230VAC/1.5 A, 24VDC/2 A continuous monitoring, full primary cut off

DRIVE: 24VDC direct drive gear-motor, 2 pole rated .68 hp, 58:1 right angle self-locking worm gear box,

41.5 RPM on the output shaft of the gear box

FINAL DRIVE: integrated 8dp gear rack on rail with a spur gear on the gearbox output shaft

**MOTOR CONTROLLER:** custom 24VDC PWM controller with acceleration ramping

BRAKING: dynamic motor braking through the motor controller, self-locking worm gear box, and electro-mechanical motor brake

CALL/SEND CONTROL: infra-red wireless control; momentary switching requiring a user to continuously hold button to control unit

ARMREST CONTROL: 3-position, momentary rocker switch requiring user to continuously hold rocker switch to control unit; switch mounted under armrest

**SUPPORTS:** clamps anchored to stair tread; normal rail position is 2" (50.8 mm) above step nose; number of clamps dependent on the length of rail; optional height-adjustable clamps available

**ANGLE:** (residential) adjustable from 0° to 45° standard; custom to 50°; (commercial) adjustable from 30° to 45° standard; custom to 50°; Contact Bruno Technical Service for low-angle applications.

SPEED: maximum top speed 25 ft/min (0.13 m/s); actual speed varies depending on rider weight

**LENGTH OF TRACK:** 15 feet 9 inches (4.9 m) and 19 feet 8 inches (6.1 m) standard; dealer to cut to fit the actual length of the stair (see application guide); extended lengths available

TRACK CONSTRUCTION: aluminum extruded rail with covered steel gear rack; bolted joint plate at each rail joint

FOOTREST: folding footrest with safety sensor panel, adjustable height settings and handle actuator (standard only)



**SEAT:** padded, folding and swivel with stops at 45° (bottom), 0° (forward), 60° (top), and 90° (top); multiple-position seat height adjustments.

**ARMRESTS:** fixed to seat frame; armrest may be individually rotated towards seat back for smaller profile when not in use and to facilitate transfers; width adjustment of armrests: 4" (102 mm)

## SAFETY EQUIPMENT:

- 1) seat swivel switch allowing operation only when chair is in center position
- 2) carriage and footrest safety switches
- 3) retractable seat positioning belt
- 4) charging light (green) on carriage; charging light (amber) at each end of rail
- 5) 30A manual reset breaker on motor control circuit
- 6) 5A fuse on control circuits
- 7) final end stop bumper at each end of rail
- 8) final limit switch
- 9) full diagnostic interconnect circuit board
- 10) keyswitch on carriage

# BATTERY CAPACITY/POWER OUTAGE:

cycles: variable depending on angle, length of run, ambient temperature and rider weight batteries: between 28 and 36 hours if power is disconnected

#### WEIGHT OF UNIT:

300 lb (136 kg) without rider in a typical 16 foot (4.9 m) installation

#### **TESTING PERFORMED:**

- 1) life cycle testing with full rated load at 45° on a 16 foot (4.9 m) rail
- 2) battery charger UL tested and listed to UL 1012
- 3) self-locking gear box statically tested with 3200 lb (1451 kg) (8 times rated load) on a 45° rail for 5 minutes with no carriage movement; test performed at manufacturer's location
- 4) repetitive tests performed to determine power outage cycling
- 5) electrical discharge to ground testing

## **OPTIONS:**

- 1) keyed call/send controls
- 2) commercial package with overspeed safety brake
- 3) power swivel seat at top landing (up to 85° of rotation)
- 4) power folding footrest
- 5) manual folding rail
- 6) power folding rail
- 7) larger seat
- 8) larger footrest