

# VPL-3300B Commercial Vertical Platform Lift Technical Specifications

rev: (3) 11-22-2013 ILS-01100

MODEL NUMBERS: Unenclosed VPL-3300B Series: Models VPL-3353B and VPL-3375B (DC-powered units)

3-Gate VPL-3300B Series: Models VPL-3353B (DC-powered unit)

U.S. F.D.A. CLASSIFICATION: Class II, 510(K) exempt

**CLASSIFICATION NUMBER: 890,3930** 

PRODUCT CODE: PCE

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

PERFORMANCE STANDARDS:

ASME A18.1-2011 (Sec. 2) Safety Standards for Platform Lifts and Stairway Chairlifts

CSA B355-09 Lifts for Persons with Physical Disabilities

CSA B44.1-11/ASME A17.5-2011 Elevator and Escalator Electrical Equipment

RATED LOAD: 750 lb (340 kg) maximum

NUMBER OF PASSENGERS: 1 passenger with mobility device

#### DRIVE:

- DC battery-powered units:
  - primary drive: 1/2 hp motor, 1750 rpm, 24VDC permanent magnet, 20 full-load amps, continuous duty
  - o 5A, 24VDC output internal battery charger, 120VAC, 60 Hz, 3A maximum input power required

INTERMEDIATE REDUCTION: dual 4L style poly-V belts and pulleys, 3.94:1 pulley reduction

FINAL DRIVE: 1" (25.4 mm) diameter Acme screw with bronze nut and bronze safety back up nut

# **MOTOR CONTROLLER:**

DC battery-powered units: 24VDC relay control with 35A circuit breaker and disconnect

# **BRAKING:**

• <u>DC battery-powered units</u>: precision landing control

STANDARD CONTROL: separate up and down pushbutton switches or paddle controls, continuous pressure, key switch control

EMERGENCY STOP SWITCH: red, sealed, 1.55" (39 mm) diameter mushroom head, illuminated with audio alarm, push to stop, pull to reset

#### SPEED:

DC battery-powered units: 10 ft/min (0.05 m/s) maximum

LIFTING HEIGHT: <u>model VPL-3353B (Unenclosed and 3-Gate)</u>: 53" (1346 mm) maximum floor-to-floor height and 11" (279 mm) minimum floor-to-floor height; <u>model VPL-3375B (Unenclosed)</u>: 60" (1524 mm) maximum floor-to-floor height and 32" (813 mm) minimum floor-to-floor height

For pit applications, maximum floor-to-floor is measured from the bottom of the pit. [Check local codes for maximum lifting height for unenclosed applications. ASME A18.1 (Sec. 2.7.1) limits maximum floor-to-floor to 60" (1524 mm).]

**NUMBER OF LANDINGS: 2-Stop** 

MAIN FRAME CONSTRUCTION: welded steel tubular guide construction with formed sheet steel guarding

CARRIAGE CONSTRUCTION: welded carriage with 2.25" (57 mm) diameter front and back sealed dual-ball-bearing wheels and adjustable low-friction plastic side stabilizer guide pads

PLATFORM CONSTRUCTION: totally enclosed side walls consisting of 1" (25 mm) tubular framing and sheet metal siding

UNDER CARRIAGE SAFETY: totally enclosed bottom formed steel safety pan

AUTOMATIC LOWER RAMP: 16" (406 mm) long self lowering ramp (standard on unenclosed applications)

FINISH: E-coated platform and landing gate parts; exterior grade powder coat paint (standard color is champagne)

LIMIT SWITCHES: adjustable upper and lower limit switches; upper and lower final limit switches

MANUAL LOWER DEVICE: optional; manual hand crank to lower device available; access to adaptive shaft via safety interlocked top cap

REMOTE CONTROL: optional; station includes a separate landing call and send pushbutton switches or paddle controls and a keyed on/off switch

LOWER LANDING GATE (3-Gate): standard; includes Bruno mechanical interlock which releases door, only when platform is at lower landing; electronic sensors stop platform from operating unless door is closed; also includes call/send pushbutton switches or paddle controls and keyed on/off switch mounted into gate frame

TOP LANDING GATE: optional; includes Bruno mechanical interlock which releases door, only when platform is at upper landing; electronic sensors stop platform from operating unless door is closed; also includes call/send pushbutton switches or paddle controls and keyed on/off switch mounted into gate frame

PLATFORM GATE: standard; includes Bruno mechanical interlock which releases door, only when platform is at lower landing. Electronic sensors stop platform from operating unless door is closed

FLUSH MOUNT DOOR: optional; includes Von Duprin® electronic interlock which releases door only when platform is at door landing; electronic sensors stop platform from operating unless door is closed; offered as an oak door with steel frame (no fire rating) or a steel door with steel frame (90 min. fire rating including a viewing window); delay action hydraulic closer; keyed handle

STATIONARY RAMP (Unenclosed): optional; 24" L x 36" W x 3" H (610 mm L x 914 mm W x 76 mm H) aluminum stationary ramp with anti-skid champagne powder coat.

(3-Gate): standard; 24" L x 41" W x 3" H (610 mm L x 1041 mm W x 76 mm H) aluminum stationary ramp with anti-skid champagne powder coat.

#### **WEIGHT OF UNIT:**

- DC battery-powered units:
  - Model VPL-3353B: 857 lb (388 kg) (without batteries) (with batteries +40 to 80 lb /18 to 36 kg)
  - Model VPL-3375B: 930 lb (422 kg) (without batteries) (with batteries +40 to 80 lb /18 to 36 kg
- All Models:

Top Landing Gate Option: 99 lb (45 kg)
Top Landing Wide Gate Option: 108 lb (49 kg)

3-Gate:

Lower Landing Gate and Walls: 130 lb (59 kg)

# **TESTING PERFORMED:**

- 1) life cycle test performed at manufacturer's location
- 2) ASME A18.1-2011 (Sec. 2) and CSA B355-09 code tests performed at manufacturer's location

#### **OPTIONS:**

- 1) tool for manual lowering device
- 2) platform canopy (not available for 90° platforms or 42" x 60" straight-through platforms)
- 3) telephone kit (ADA compliant with battery backup)
- 4) battery package upgrade 34 AH battery package
- 5) cold-weather package [recommended if operating temperature is below 20°F (-7°C); call Bruno if operating temperature is below 0°F (-18°C)]
- 6) pit switch
- 7) door/gate operator (used for power-assisted top landing door/gate and lower landing gate on 3-Gate)
- 8) platform gate operator (used for power-assisted platform gate on unenclosed models)
- 9) single timer (used with flush-mount door)

# VPL Job Site Preparation

The following is a list of general operations designed to prepare the job site for installation of the VPL. This list is provided as a guide to help the installer. For a complete list of requirements check the installation site's applicable local codes.

# **Electrical Requirements:**

• <u>DC battery-powered units</u>: require a dedicated GFCI 120V, 3A (max.), 60 Hz single-phase circuit to operate the internal battery charger. Check applicable local codes for all electrical and wiring requirements.

# **Platform Pathway Requirements:**

Make sure the pathway that the platform runs in is clear of any electrical conduit and wire ways. Make sure no liquids, steam or gas piping discharge into the pathway, and make sure that there is sufficient headroom clearance (minimum of 80"– 2032 mm) throughout floor-to-floor travel. Make sure the area is sufficiently lit.

#### Floor Recommendations:

4" (102 mm) thick, 3500 PSI minimum compressive strength, reinforced concrete slab. Refer to technical drawings for minimum slab dimensions. If the temperature can fall below freezing, it is recommended that you insert an insulation sheet between the concrete slab and the compacted rock.

#### Floor Attachment:

VPL must be fastened to concrete slab using four (4) 1/2" (3/8" bolt) x minimum 2-1/2" long concrete anchors suitable for the environment. Refer to technical drawings for mounting hole locations. Follow selected concrete anchor manufacturer's guidelines and applicable codes.

# **Housing Attachment:**

Unenclosed: None required. Can use 5/16-18 tapped holes on tower frame work to fasten the tower housing to a vertical wall for additional stability. Note: Housing must remain intact.

3-Gate: Lower landing walls must be secured to the house (fascia) with the brackets provided. Note: Housing must remain intact.

# Lower Landing Gate Attachment (3-Gate):

Refer to 3-Gate technical drawing (see below).

# **Top Landing Gate Attachment:**

Refer to VPL gate technical drawing (see below).

#### Flush Mount Door Attachment:

Refer to VPL flush mount door detail drawing (see below).

# **Space Requirements:**

Refer to technical drawings (see below).

# Platform-to-Top Landing Sill Clearance:

ASME code indicates the platform floor-to-sill clearance at the upper landing shall not be less than 3/8" (9.5 mm) nor exceed 3/4" (19 mm). Follow applicable local codes.

# **Fascia Wall Requirements:**

ASME code indicates that fascia should be smooth and non-perforated that guards the full length and width of the platform. The fascia shall be securely fastened from the upper landing sill down to the lower landing sill. It should also be able to withstand a 125-pound side load over any 4-inch square area. Follow applicable local codes.

# Technical Drawings (available at www.bruno.com):

- ILS-00938 Top Landing Gate Detail
- ILS-01027 Flush Mount Door Detail
- ILS-01102 Unenclosed Straight-Through Platorm With Platform Gate (No Pit)
- ILS-01103 Unenclosed Straight-Through Platform With Platform Gate (Pit Application)
- ILS-01104 Unenclosed 90º/Adjacent-Exit Platform With Platform Gate (No Pit)
- ILS-01105 Unenclosed 90º/Adjacent-Exit Platform With Platform Gate (Pit Application)
- ILS-01154 Enclosed Straight-Through Platform With 3-Gate (Pit Application)
- ILS-01155 Enclosed Straight-Through Platform With 3-Gate (No Pit)

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