

SECTION 14420

WHEELCHAIR LIFTS

PART 1 GENERAL

1.01 SUMMARY

- A. An inclined platform (wheelchair) lifting device, manufactured by ThyssenKrupp Access, designed to provide access within a building for mobility impaired persons. Lift consists of tubular guide rail system and fold-up platform selected and dimensioned to provide building access requirements indoors.

1.02 REFERENCES

- A. Lift shall be designed, manufactured and installed in accordance with the following standards:
1. American National Standards Institute (ANSI).
 2. American Society of Mechanical Engineers (ASME).
 3. ADA Accessibility Guidelines (ADAAG).
 4. Intertek Testing Services (ETL).
 5. International Building Code (IBC).
 6. National Electrical Code (NEC).
 7. American Society for Testing Materials (ASTM).
 8. American Welding Society (AWS).

1.03 SYSTEM DESCRIPTION

- A. Drive System: Twin rack and pinion.
- B. Control System: (specify:)
1. Battery powered SoftStart with 1/2 hp, 24 VDC, instant reversing, 1750 rpm motor with self locking worm gear, two 12V, 33AH, sealed no maintenance batteries with 24V 3.3 amp SmartCharge™ battery charger.
 2. AC powered with 1/2 hp, 115 VAC, instant reversing, 1750 rpm motor with self locking worm gear.
- C. Platform Configuration: (specify:) straight-thru or 90° side exit.
- D. Maximum Travel: (specify:) 55' for battery powered or 39' for AC powered.
- E. Rated Load: 450 lbs. with minimum safety factor of 5X.
- F. Rated Speed: 18 fpm with rated load.
- G. Platform Size: (specify:) 28"x35", 30"x41" or 30"x48" power fold-up platform with (specify:) fold-up controls on each end of chassis or fold-up controls remotely located at each landing.
- H. Main Power Supply Wiring: Electrical contractor shall provide 115 VAC, single phase, 15 amp, 60 Hz power circuit.
- I. Non-slip surface on platform floor and ramps.
- J. Operating Features:
1. Platform Controls: Hand-held directional paddle switch, on/off key switch, emergency stop switch and illuminated alarm button.
 1. Landing Controls: Directional paddle switch, on/off key switch and emergency stop located at each landing.
 2. Passenger Restraining Arms: (specify:) Manual fold-up arms or powered fold-up arms.
 3. Constant pressure operation.
 4. Grounded electrical system with upper, lower and final limit switches and 24 V operating controls.
 5. Overspeed safety device.
 6. Platform underpanel equipped with obstruction sensors.
 7. Automatic powered fold-up access ramps with obstruction sensors at entrances on platform.
 8. Grab rail on chassis.
 9. Fold-up seat with seat belt on chassis (optional).

10. Audio visual alert (optional).
11. Track Infill Fascia Panels: (optional specify:) Steel sheet metal or clear acrylic.
12. Pedestrian handrail on track (optional).
13. Manual lowering device.

1.04 QUALITY ASSURANCE

- A. Manufacturer: Provide wheelchair lift manufactured by a firm with a minimum of 10 years experience in fabrication of inclined platform lifts equivalent to those specified.
- B. All designs, clearances, workmanship and material, unless specifically accepted, shall be in accordance with all codes having legal jurisdiction.
- C. All load ratings and safety factors shall meet or exceed those specified by all governing agencies with jurisdiction and shall be certified by a professional engineer.
- D. Lift shall be subject to applicable state, local and city approval prior to installation and subject to inspection after installation. Determination of and adherence to these regulations is the responsibility of the lift contractor.
- E. Welders certified in accordance with requirements of AWS D1.1 shall perform all welding of all parts.
- F. Substitutions: No substitutions permitted.

1.05 WARRANTY

- A. Warranty: Manufacturer shall warrant the Carrier-Lift® inclined platform lift for a period of one year after installation.

1.06 MAINTENANCE

- A. The Carrier-Lift® inclined platform lift must be maintained in accordance with manufacturer's instructions.

PART 2 PRODUCT

2.01 MANUFACTURER

- A. Provide Carrier-Lift® inclined platform lift (specify:) model IL-2000 (battery powered) or model IL-92 (AC powered) manufactured by ThyssenKrupp Access.
 1. Contact: 4001 E. 138th Street, Grandview, MO; Telephone: 800-925-3100; Fax: 816-763-4467; Email: archassist@accessind.com; Web site: <http://www.accessind.com>

2.02 MATERIAL

- A. Track: 1.875 diameter x .156" steel tubing.
- B. Posts: 2" x 4" x 3/16" steel tubing.
- C. Platform: 16 ga. steel plate on 1-1/4" square x 11 ga. steel tubing.
- D. Chassis Frame: 1" x 2" x 16 ga. steel tubing.
- E. Passenger Restraining Arms: 1-1/4" diameter x 16 ga. steel tubing.
- F. Access Ramp: 11 ga. steel plate.

2.03 FINISHES

- A. Components shall be prepared with 1)alkaline detergent wash, 2)clear water rinse, 3)iron phosphate coating, 4)clear water rinse and finished with electrostatically applied and baked thermostatic powder coat finish. Standard color is ivory.

2.04 ELECTRICAL SYSTEMS

- A. The electrical contractors shall provide a 115V, single phase, 15 amp, 60 Hz electrical power source connection.
- B. Electrical piping and wiring supplied by others.
- C. Final electrical connections performed by lift contractor.

PART 3 EXECUTION

3.01 ACCEPTABLE INSTALLERS

- A. Installers shall be experienced in performing work of this section who have specialized in work comparable to that required for this project.
- B. Installers shall be certified and trained by the manufacturer.

3.02 EXAMINATION

- A. Use field dimensions and approved manufacturer's shop drawings to examine substrates, supports and other conditions under which this work is to be performed. Do not proceed with work until unsatisfactory conditions are corrected.

3.03 INSTALLATION

- A. The Carrier-Lift® inclined platform lift shall be installed in accordance with manufacturer's instructions and as specified and approved by architect.
- B. Electrical piping and wiring by others. Final electrical connections and lift adjustments by lift contractor.

3.04 DEMONSTRATION

- A. The lift contractor shall make a final check of the lift's operation with the Owner or Owner's representative present prior to turning the lift over for use. The lift contractor shall determine that operating and safety devices are functioning properly.

END OF SECTION

Notes: Intent of specification is to broadly outline equipment required but does not cover details of design and construction.

Dimensions and specifications are subject to constant change and continually evolving codes and product applications. For additional technical information, contact ThyssenKrupp Access at (800) 925-3100 or www.accessind.com.