

Architectural Specification

TRUCK-LOCK™ Series – Model ATL-500 **Automatic Vehicle Restraint**

SECTION 11161 VEHICLE RESTRAINTS

PART 1 - GENERAL

1.01 WORK INCLUDED

- A. Factory assembled vehicle restraint
- B. Control panel and communication system.
- C. Installation and Owner's Manual.

1.02 RELATED WORK

- A. Section 11160 – Dock Levelers
- B. Section 11164 - Seals and Shelters.
- D. Section 11165 - Dock Bumpers.

1.03 SYSTEM DESCRIPTION

- A. Vehicle restraint provided to the following requirements:
 - 1. Restraint shall engage and restrain variable height rear impact guards.
 - 2. Standard service range of 9" to 30" from ground.
 - 3. Communication system shall have red and green lights and instruction signs inside and outside.
 - 4. Restraint shall maintain engagement during loading.
 - 5. Activation shall be with push button controls for engage and disengage functions.
 - 6. Restraint shall be stored down for unobstructed positioning of trailer.
 - 7. Restraint shall monitor an abnormal condition and sound an alarm if the rear impact guard is not detected. An override shall silence alarm with red lights inside and outside until disengagement resets the system.

1.05 SUBMITTALS

- A. Submit Manufacturer's installation instructions.
- B. Submit shop drawings showing layout, conduit positions and wiring schematics.

PART 2 PRODUCTS

2.01 ACCEPTABLE MANUFACTURERS

- A. TRUCK-LOCK Series - Model ATL-500 as by PMH Material Handling
877-277-0001

2.02 EQUIPMENT

- A. Cast in Plate (Optional): 3/8" steel plate with concrete anchors poured into dock face for welded installation of restraint.
- B. Vehicle Restraint:
 - 1. Vertical Frame: Mounting plate of 3/8" steel and vertical track of 1/2" steel suitable for welding to cast in plate or bolted to dock face with 5/8 " concrete wedge anchors.
 - 2. Barrier: Large combination steel barrier and housing to enclose and protect all lift components. Barrier to be guided in vertical track through entire travel.
 - 3. Actuator: Hydraulic cylinder to be double acting with spring loaded hydra-float system to secure and maintain contact with rear impact guard during all loading and unloading operations.
 - 4. Inside Communication System: Either a Green light to indicate when vehicle is restrained or a Red light to indicate that vehicle is not restrained or when restraint is stored. Audible alarm indicates a fault condition where a rear impact guard may not be present or a malfunction has occurred. Bypass selection by attendant silences alarm and illuminates both Red and Green lights indicating that the vehicle is not restrained and in manual bypass mode. Include label to instruct dock attendant.
 - 5. Outside Communication System: Red light to indicate when vehicle is restrained or in bypass mode. Green light to indicate restraint is stored in low profile position leaving a clear path for a vehicle to enter or leave the dock. Include sign to instruct Truck Driver.
 - 6. Controls: All controls to be in a NEMA 12 Dust Tight Enclosure. Power source requirement is 115 volt, single phase with a 15 amp service circuit.
 - 7. Finish: All structural steel components to be zinc plated including barrier, housing, vertical frame and lift mechanism.

C. Options:

1. LED light system for improved visual communication
2. Dock leveler stored interlock to disallow restraint storage until leveler is removed from truck bed.

PART 3 EXECUTION

3.01 PREPARATION

- A. Provide cast in plate for setting in front wall. (Optional)

3.02 INSTALLATION

- A. Inspect site conditions and report anything detrimental to the proper installation and performance of vehicle restraint. Do not proceed until unsatisfactory conditions have been corrected.
- B. Manufacturer's representative shall install vehicle restraint in accordance with manufacturer's instructions and recommendations.
- C. Adjust installed unit for operation as specified by manufacturer.
- D. Manufacturer's representative to examine finished installation to ensure proper operation and demonstrate proper use of the restraint to the owner.