

**Overview**

The HPX-AC-HSP Spring Kit for Heavy Loads (FG559-42) is designed to be used in conjunction with the HPX-1600 HydraPort Base Assembly.

The HPX-AC-HSP Spring Kit for Heavy Loads is designed to improve the performance of HydraPort HPX-1600 Lift/Retract Mechanism when the unit is heavily loaded.

Heavy loads may occur when all of the available module spaces of the HPX-1600 are populated or when multiple heavy cables are included in the service loop of the HPX-1600.

The HPX-AC-HSP provides roughly twice the lifting force of the standard springs shipped with the HPX-1600.

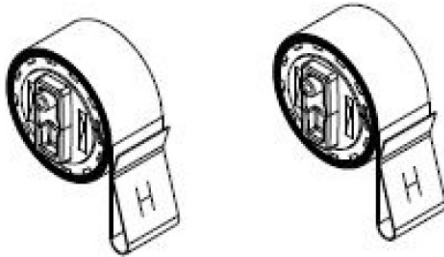


FIG. 1 HPX-AC-HSP SPRING KIT FOR HEAVY LOADS

- See specifications for kit details.
- For more information on the HPX-1600, refer to [www.amx.com](http://www.amx.com).

**Note:** Installation of the HPX-AC-HSP will increase the force required by the user to press the HPX-1600 into its retracted position.

**Product Specifications**

HPX-AC-HSP SPECIFICATIONS	
Dimensions (HWD)	35mm x 52mm x 28mm (1.38" x 2.05" x 1.08")
Weight:	35g (1.21 oz.)
Enclosure:	n/a
Front Connections:	n/a
Rear Connections:	n/a
Compatibility:	HPX-1600 HydraPort Base Assembly
Included Accessories:	Installation Guide

**Installation**

**Attention!** Only a professional, AMX-qualified installer should perform this installation. Installation must conform to all local codes. This product may not be installed by the end-user.

**Tools Required**

- Wire cutting pliers
- Phillips Screw Driver

**CAUTION!** Ensure that the AC Power cord is disconnected from IEC C-14 power inlet connector or from the AC Mains Outlet on the HydraPort Base Assembly prior to disassembly of the HydraPort Base assembly or installation of the HPX-AC-HSP (FIG. 2).

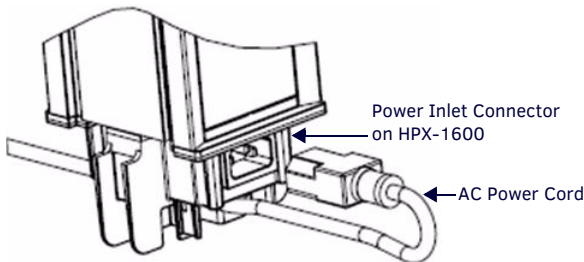


FIG. 2 HPX-1600 - POWER INLET CORD REMOVED

**Step 1 - Determine if the HPX-AC-HSP is Required**

The HPX-AC-HSP is required when a heavy load exists due to the configuration of the HPX-1600 and its associated modules.

This condition may occur for one of two reasons.

- The HPX-1600 is fully or nearly fully populated with modules
- The cables comprising the backside terminations of the modules and service loop of the HPX-1600 are heavier than normal.

**Method A)**

In order to fully predetermine if the HPX-AC-HSP is required, place all of the modules with their backside terminations on a scale.

Allow the portion of cable from the backside termination that will be secured to the HPX-1600 or the underside of the table (the far end of the service loop) to rest on the table (not on the scale).

If the scale reads **1.5 lb. (1.0Kg) or higher**, the HPX-AC-HSP is required.

**Method B)**

If more than 60% of the available spaces for modules are populated in the HPX-1600, or there are more than 6 Cat 5 cables (or equivalent) contained in the service loop of the HPX-1600, then the HPX-AC-HSP will likely improve the performance of the HPX-1600 Lift/Retract Mechanism.

**Method C)**

If the fully assembled and installed HPX-1600 HydraPort Assembly lifts slowly or incompletely using the standard springs included with the HPX-1600, then the HPX-AC-HSP will likely improve the performance of the HPX-1600 Lift/Retract Mechanism.

**Step 2. Replace the Existing Lift Springs**

1. Gain access to the underside of the HPX-1600.
2. Remove the shields if they are installed by loosening the #6 Screws near the top of the shields (FIG. 3):

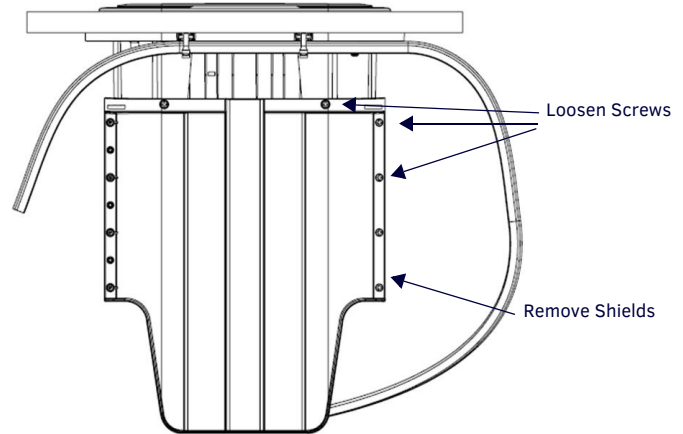


FIG. 3 REMOVE SHIELDS

3. Support the HPX-1600 in its fully deployed position.
4. Insert a Phillips Screwdriver (or equivalent) through the slot in the bottom cover and into the hole in the center of the spring mandrel. Lift the spring assembly and mandrel out of the slot in the bottom cover (FIG. 4).

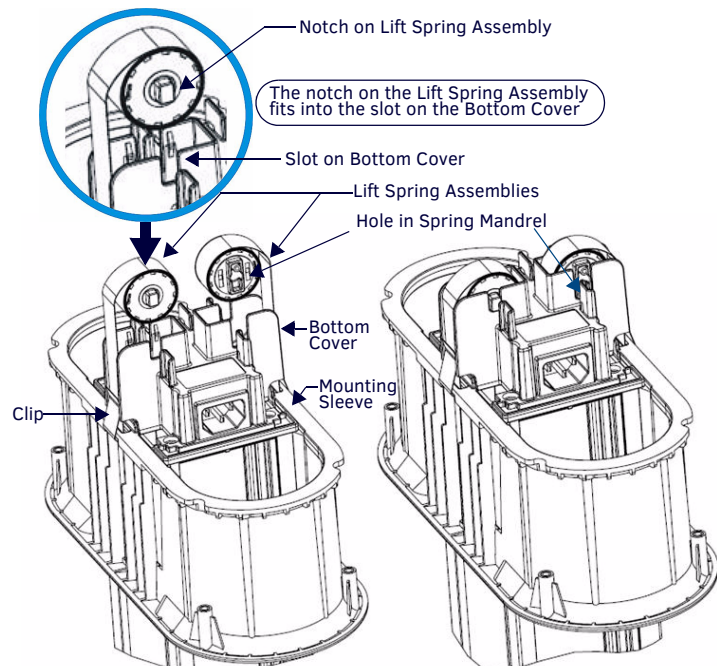
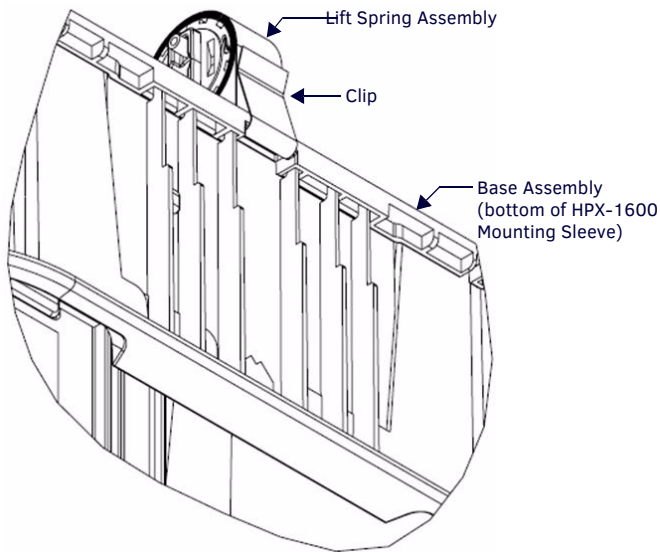


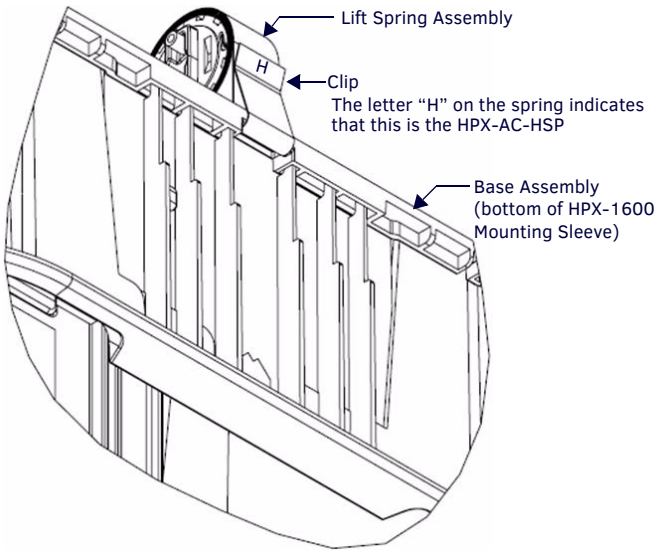
FIG. 4 REMOVING / INSERTING THE LIFT SPRING ASSEMBLY FROM / INTO THE BOTTOM COVER

- Un-clip the lift spring assembly from the HPX-1600 mounting sleeve, as shown in FIG. 5.



**FIG. 5** LIFT SPRING ASSEMBLY CLIPPED TO MAIN SLEEVE

- Clip the new lift spring assembly onto the mounting sleeve.  
**Note:** The spring assembly included in HPX-AC-HSP will be marked with the letter "H" stamped in the end of the spring, as shown in FIG. 6:



**FIG. 6** NEW LIFT SPRING ASSEMBLY CLIPPED TO MAIN SLEEVE

- Ensure the lift spring assembly is oriented properly (refer to FIG. 6).
- Take hold of the body of one lift spring assembly and pull it firmly up so that it can be snapped into the provided slot in the bottom cover (see FIG. 4).
- Repeat for the second lift spring assembly

