

U.S.A. TRAINS ALCO S4 DIESEL LOCOMOTIVE
Large Scale Coupler Conversion
#831 or #787 "G" scale (for closer more secure coupling)
#1831 or #1787 #1 scale

This locomotive has a swing/swivel coupler mount on the pedestal. It still has the common mounting arm with the round boss on the end. Check the hook and loop coupler for the swing arm.

#831 (#1831 #1 scale) Coupler: Assemble the coupler per the instructions. Remove the USA Trains coupler from the swivel arm, place the assembled coupler on to the swivel mounting arm, drill a new screw hole in the arm through the couplers hole for the #4 screw, and secure the coupler.

For a closer coupling shorten the mounting arm by trimming it off just in front of the block step down. Place the assembled coupler on the arm and fasten the coupler to the arm using the screw from the coupler package in the original screw hole of the arm.

This swivel coupler mounting may be slightly loose or flexible. This may cause unwanted uncoupling while pulling a heavy load. You can tighten the swivel mounting by placing a thin washer under the screw that has a large enough hole to fit over the top of the post. This will take up the gap in the mounting but also keep the swivel from moving. This may be alright because you might not need the extra swing because of the swing of the coupler in its' own box.

#787 (#1787 #1 scale) Coupler: Use this coupler for even a closer coupling and certainly a more secure coupler mounting. Enlarge the original screw hole in the shank of the draft gear box to 1/4". Assemble the coupler according to the instructions.

Remove the original coupler completely from the pedestal and retain the screw. Place a .030" thick washer or shim with a 1/4" hole over the post, set the coupler over the post and secure it with the original screw with a small washer added. Make sure that the coupler is level and the box is against the top of the opening. You may need to trim the "teeth" at the top of the opening so the coupler head has the proper clearance to swing freely. If needed, you can use thinner or thicker washers under the coupler to adjust the coupler height and level. Check the coupler height and if it's too low use a thinner shim under the coupler and if too high use a thicker shim. There are variations in the manufacturing process that you may have to compensate for in adjusting the mounting to achieve the correct coupler height. If the coupler is a bit low and is against the top edge of the opening then you may have to file a notch in the edge to raise the coupler enough to meet the correct coupler height. Also, if the coupler starts to pivot during operations you may need to place spacers between the box and the sides of the opening. (see the illustrations)

For "all" coupler conversions, always check the coupler height with our #880 "G" scale or #829 #1 scale coupler height gauges and make any necessary adjustments.

