

**KNOWLEDGE BASE****Model 50-60 Block Machine,  
Column & Bushing Replacement****Description:**

Instructions on “How to” install new columns and bushings on models 50 & 60 Block Machines

Article Type: Instructions

**WARNING**

Never work on, clean or service this unit, control panel or any machine or open or remove any protective cover, guard, grate, door, or maintenance panel until the power or energy sources has been turned off, locked out / tagged out, and all moving parts have come to a complete stop and or blocked to prevent movement. Machinery is dangerous - avoid personal injury and or death by following manufacture, Local, and OSHA safety procedures. Contact Columbia Machine for safety decals, guards, horns and beacons.

SUBJECT: MODEL 50 COLUMN AND BUSHINGS REPLACEMENT INFORMATION

Information to help you with the installation of the new columns and what you should do to help keep material debris from getting in and around the bottom of the column clamps. Please see the information and pictures below.



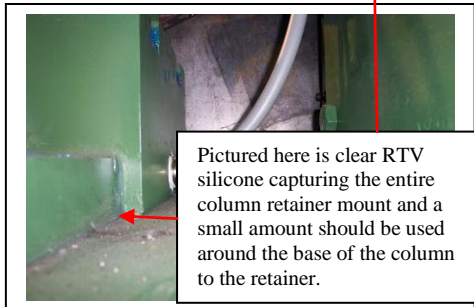
With columns removed it is advised that you clean the base of the machine of all material build up and inspect the column retainers for wear and that all bolts are in good shape. Check to make sure they fit properly with bolts installed.



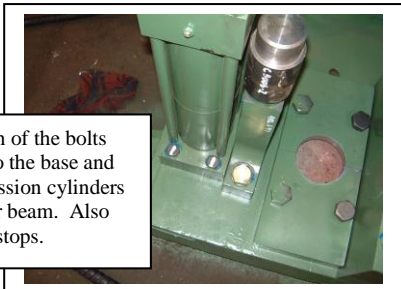
You will notice around each of the bolts on the retainer bracket for the column and the bolts that hold that hold the vibrator to the base of the machine have a bead of blue RTV silicone around them to help eliminate concrete dust or other foreign material from entering these areas. See additional pictures for other areas to seal.



Notice RTV silicone on each lock washer gap. Additionally the white hash marks note these bolts have been torque to proper specks.



Pictured here is clear RTV silicone capturing the entire column retainer mount and a small amount should be used around the base of the column to the retainer.



Use silicone around each of the bolts that hold the cylinders to the base and the same for the compression cylinders on the top of the stripper beam. Also use a around the height stops.

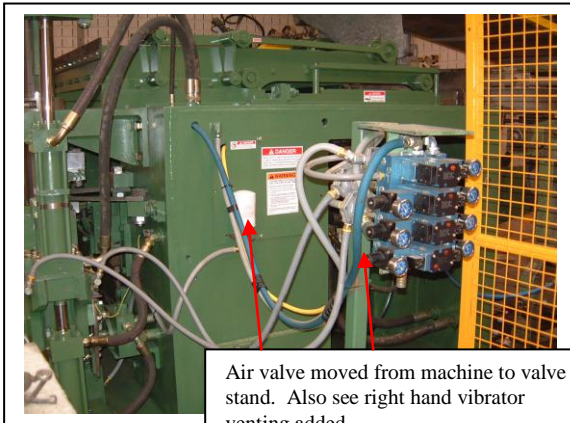


This picture is showing the addition of the vibrator vents that were added on this rebuild.



Notice the parallel support blocks have RTV silicone applied. Also note the areas where the upper column supports mount are cleaned of all paint and primer. All areas where parts mate to the frame or base should be cleaned of all paint. With columns removed you can replace both top and bottom bushings and seal wipers on the stripper beam at this time.

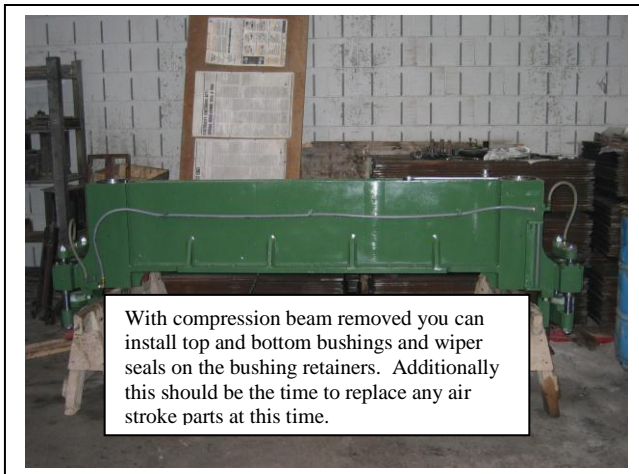
All pictures shown are from a customer in-plant rebuild that Columbia assisted with a complete rebuild of this model 60 block machine. During this rebuild all hoses, hose fittings, manifold & valves were replaced along with new cylinders. As you can see many other new parts were replaced during this rebuild. Other changes included the vibrator venting and removal of the air valve bank of the machine onto a valve stand. If you would like information for the vibrator venting and air valve stand you can email or give me a call to discuss.



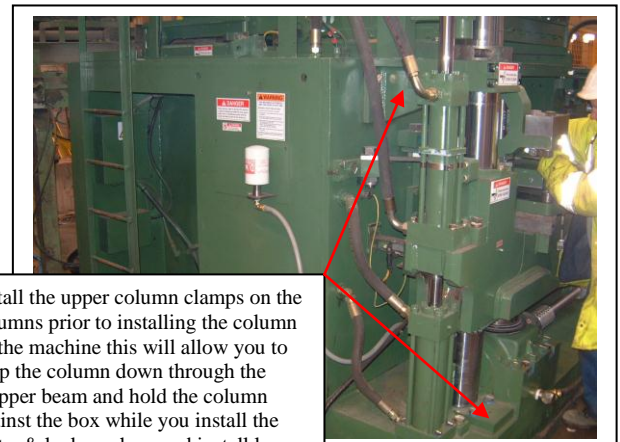
Air valve moved from machine to valve stand. Also see right hand vibrator venting added.



Model 60 block machine rebuild completed and ready for production.



With compression beam removed you can install top and bottom bushings and wiper seals on the bushing retainers. Additionally this should be the time to replace any air stroke parts at this time.



Install the upper column clamps on the columns prior to installing the column on the machine this will allow you to drop the column down through the stripper beam and hold the column against the box while you install the bolts & lock washers and install lower clamp retainer to the base.

Other items to consider during your front end rebuild:



These pictures give you some help with the replacement of your new columns and bushing replacement for both the stripper beam and compression beam, also included are pictures of additions you might want to consider.