

Manually inserting pistons into the dual cartridge packages used with two component materials like epoxies and silicones, is a difficult and time consuming task. Manual insertion of cartridge pistons requires excessive force to drive the pistons into the barrels. Air often becomes trapped under the pistons, leading to drooling and inexact proportioning when the packaged materials are dispensed. Manual inserting can also lead to inconsistent insertion depths and alignment. This causes inexact ratios where the product is dispensed as well as looks terrible from a cosmetic standpoint.

Tridak's piston inserting machine solves the problems encountered by manually inserting pistons. Tridak's bench top system is pneumatically operated and features a mechanical sequencing system which performs each operation in a predetermined order. The system also features adjustable individual piston insertion depth and an automatic guide to accurately align the cartridge and pistons.

Operation of the piston inserters is simple. The operator simply loads a pre-filled syringe into the syringe holder and places pistons into their guides. Actuation begins once the operator depresses the system's footswitch.

The total cycle time of a Tridak piston inserter is 2-3 seconds. Tridak piston inserters can be factory modified to accommodate almost all single or dual syringes and pistons.

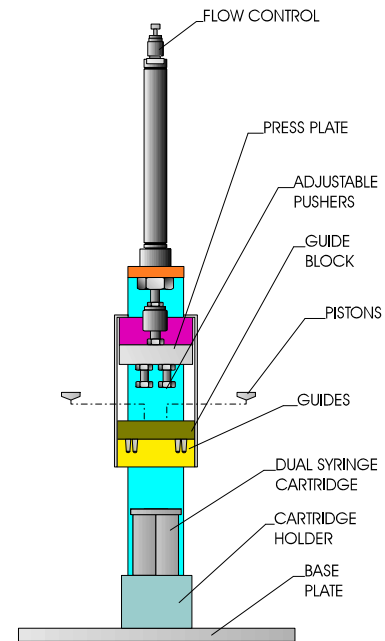


fig. 1

Operator places piston in guide block and loads a filled cartridge into the holder.

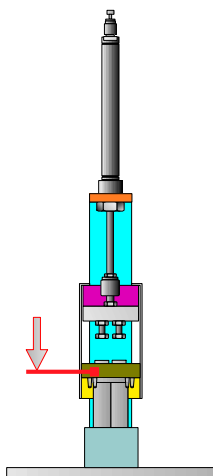


fig. 2

Operator depresses footswitch. The guide block descend and the guides automatically position the cartridge.

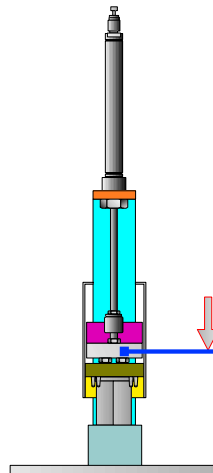


fig. 3

The cycle continues and the piston pushers engage the pistons, and push them through the guide block. While being pushed through the guide block the pistons automatically engage the air bleeder to insure air does not get trapped between the piston and the material in the

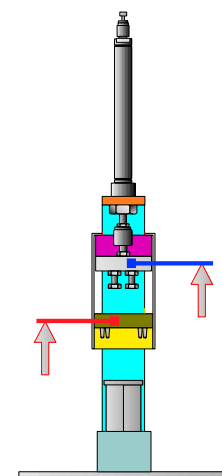


fig. 4

The cycle is complete and the system returns to the start position and the operator removes the cartridge