CHRYSLER CORP. DUAL PISTON MASTER CYLINDERS – CAST IRON

Dodge
Plymouth

NOTE – *Some models use other units. See Bendix/Delco-Moraine Dual Piston Master Cylinder and Chrysler Corp. Dual Piston Master Cylinder (Aluminum) articles in this section.*

DESCRIPTION

This tandem dual piston master cylinder is the venting type with reservoirs in a single casting and one outlet for each reservoir. Rear piston is operated by push rod connected to brake pedal. Front piston is operated by rear piston.

REMOVAL & INSTALLATION

MASTER CYLINDER

Removal – Disconnect front and rear hydraulic brake lines at master cylinder. On vehicles equipped with manual brakes, disconnect brake pedal push rod at brake pedal. Remove master cylinder attaching bolts and remove master cylinder from vehicle.

Installation – Position master cylinder on vehicle and install cylinder attaching bolts. Connect front and rear hydraulic brake lines to cylinder and install brake pedal push rod, if removed. Fill reservoir with clean brake fluid and bleed entire brake system. *See Hydraulic Brake Bleeding in this Section.*

OVERHAUL

MASTER CYLINDER

Disassembly – 1) Clean outside of cylinder and remove cover to drain brake fluid. Use screw extractor to remove tube seats. Remove snap ring from open end of cylinder and slide washer out.

2) Carefully remove primary piston assembly, then slide secondary piston from cylinder. Clean all parts in suitable solvent and blow dry with compressed air.

Inspection – Inspect cylinder bore for scoring or pitting. Light scratches or minor corrosion can usually be removed by using crocus cloth. Deep scratches or scoring may be honed, provided bore diameter is not increased more than .002". If this limit is exceeded, master cylinder must be replaced. Check pistons for scoring, scratches and corrosion. Pistons must be replaced if any of these conditions exist. Replace all rubber parts when overhauling master cylinder.

Reassembly – 1) Dip all component parts in brake fluid before reassembly. Carefully slide secondary piston assembly into cylinder bore. Slide primary piston into bore, hold in position then install snap ring. Install tube seats.

2) Clamp master cylinder in a vise, being careful not to damage housing, and bleed cylinder as follows: Attach suitable bleeding tubes (C-4029) to outlet ports of cylinder, with ends of tubes in master cylinder reservoirs. Fill reservoirs with clean brake fluid and depress push rod slowly. Allow pistons to return to normal position under spring pressure. Repeat procedure until all air bubbles are expelled. Remove bleeding tubes, and install cylinder cover and diaphragm. Remove cylinder from vise.

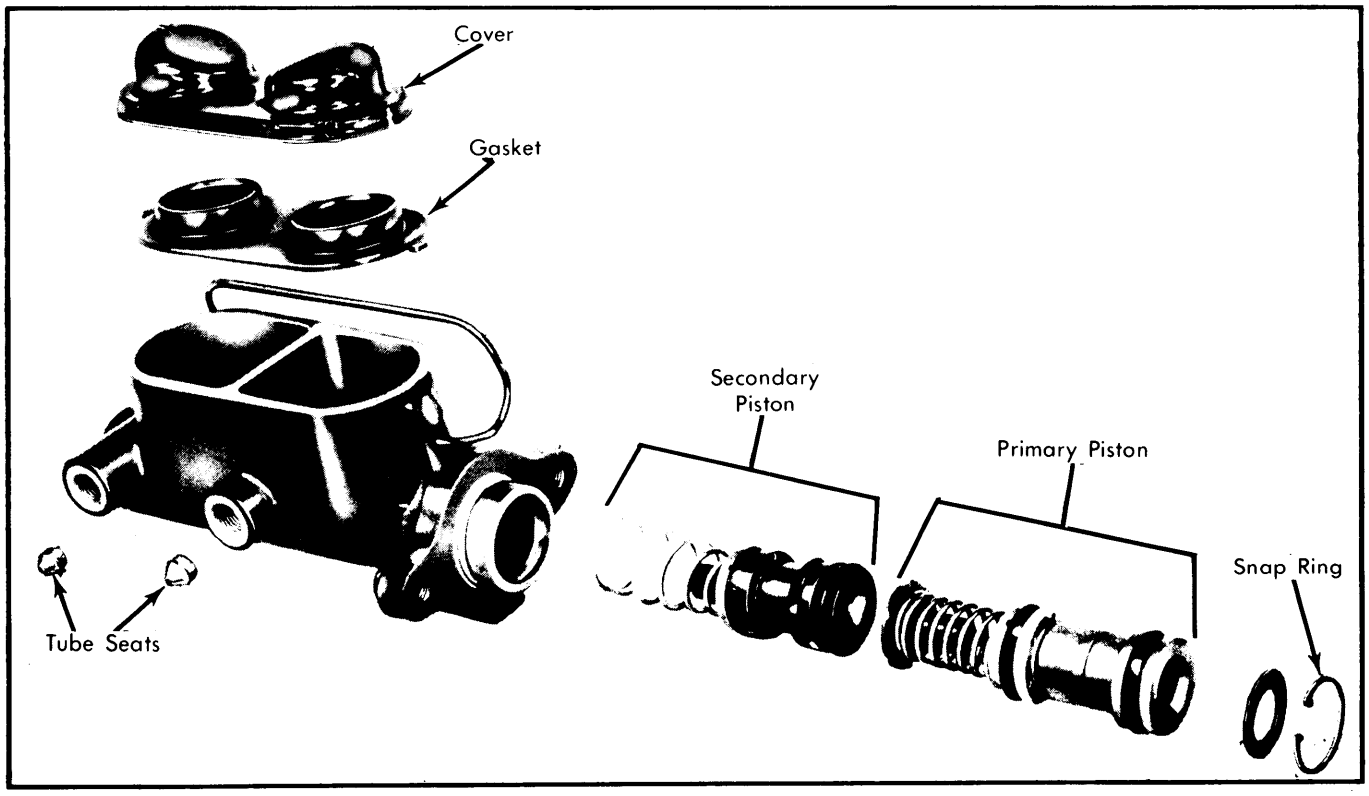

Fig. 1 Exploded View of Cast Iron Master Cylinder