

# WHEEL BRAKE CYLINDER

## General

The wheel brake cylinders on the brake back plates serve to transmit pressure produced by the master cylinder equally to the brake shoes.

While the front wheel brake features two single-action wheel brake cylinders per wheel (Duplex), the brake pressure in the rear wheel brake is transmitted by a double-action wheel brake cylinder per wheel. Inner diameter of the wheel brake cylinder front and rear  $\frac{3}{4}$ " or 19.05 mm.

One end of the front wheel brake cylinder bore is closed. The cylinder body contains a piston, a rubber cup, a return spring and spring seat. In the rear wheel brake cylinder body (which is open on both ends) there are two pistons, two rubber caps and one stop spring with two spring seats. The stop spring (return spring) in conjunction with the spring seat serves to press the piston cups belonging to the respective piston against

the cylinder wall. During braking action, the fluid from the master cylinder is pressed into the wheel brake cylinders, thus forcing the rubber cups and pistons outward, each piston bringing the brake shoe connected with it by a plunger to contact the brake drum.

Rubber caps over the plungers and wheel brake cylinder housings prevent dirt and moisture from entering.

When the brakes are released, the spring seats press the return spring together in the cylinder so that no space remains. Thereby the wheel brake cylinder can be perfectly ventilated.

Each wheel brake cylinder has a bleeder valve bore. The bleeder valve opening is situated so that it cannot be blocked by the cups. The function of the bleeder valve is to release air which may have entered the system. When replacing a wheel brake cylinder note the diameter of the cylinder bore (front and rear  $\frac{3}{4}$ " or 19.05 mm):

Front Wheel Brake Cylinder

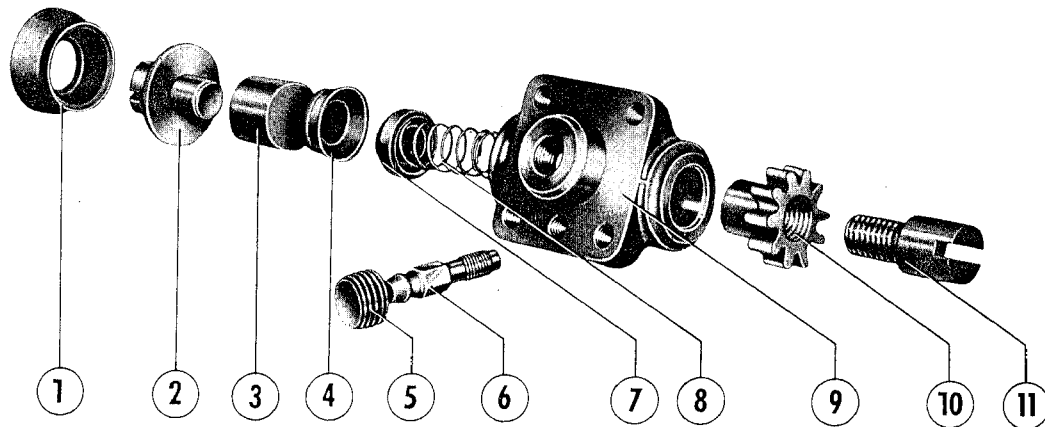


Fig. 10

- |              |                 |                                |
|--------------|-----------------|--------------------------------|
| ① Boot       | ⑤ Dust cap      | ⑨ Wheel brake cylinder housing |
| ② Plunger    | ⑥ Bleeder valve | ⑩ Adjusting nut                |
| ③ Piston     | ⑦ Spring seat   | ⑪ Adjusting screw              |
| ④ Rubber cup | ⑧ Stop spring   |                                |