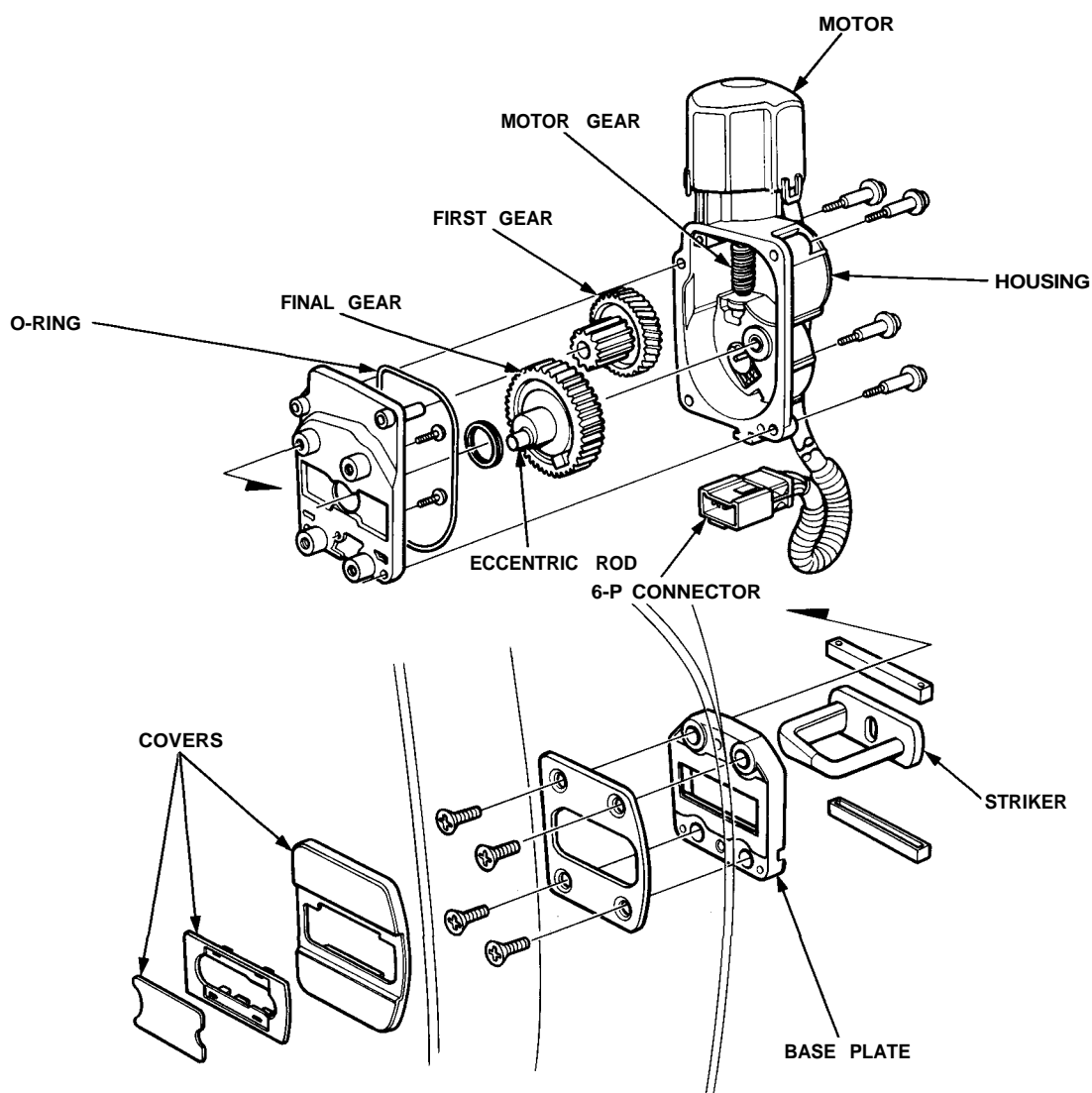


Power Door Closer System

Description

This system closes the door tighter, yet makes opening and closing the door easier. When the door is closed, it latches before its inner weatherstrip is pressed tightly against the body. As the door latches, the door latch switch will move to the "close" position and activate the motor. The motor rotates and pulls the door in approximately 5 mm, pressing the door's inner weatherstrip tightly against the body. When the door handle is pulled to open the door, the latch is released and the door latch switch is switched to the "open" position, activating the motor. The motor then rotates in reverse, pushing the striker and door outward so the door can be opened easily.

This system has a built-in safety circuit for preventing accidents. If any object, such as clothing, is pinched between the door and body, and the limit switch inside the closer assembly remains in the "close" position for four seconds or longer after the door latch switch has switched to "close", the circuit activates and pushes the striker and door open.

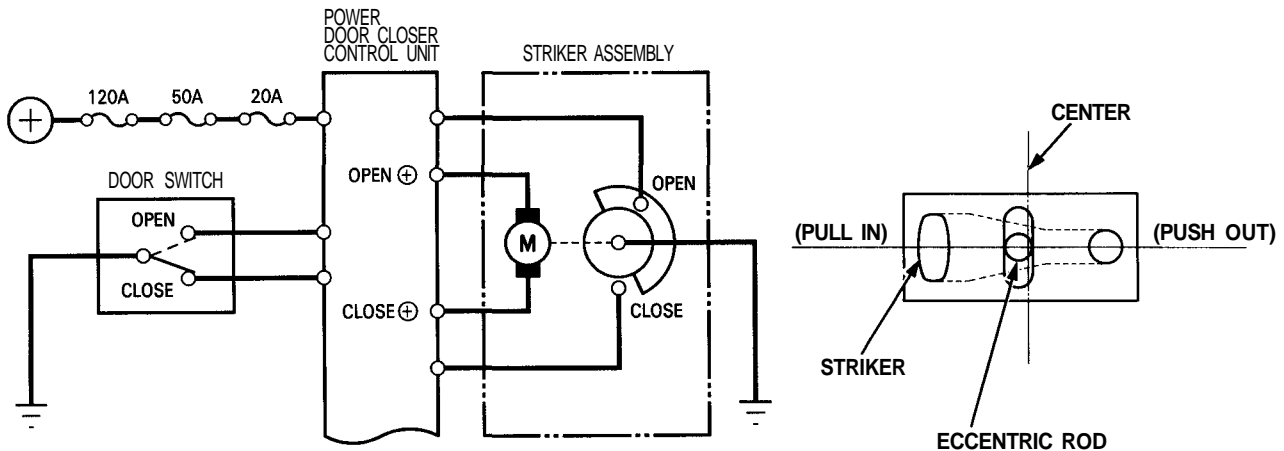




OPERATION

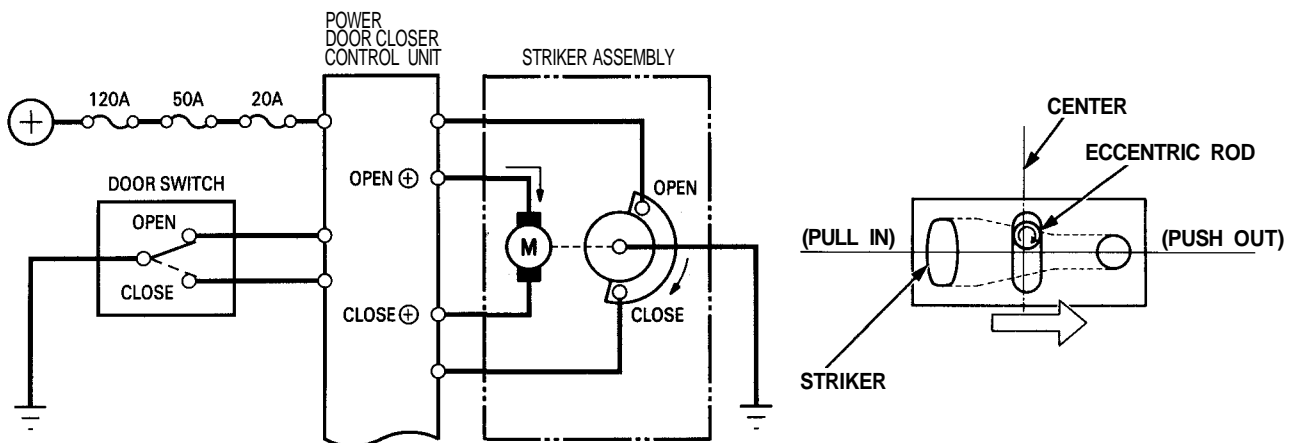
Door Closed

While the door is closed, the "open" terminal in the limit switch inside the closer assembly is grounded and the "close" terminal is ungrounded (the control unit reads that to mean the striker is in the pull-in position).



Door Opening

The operation starts when you open the door. This switches the latch switch "open", and the control unit detects the opening motion and sends current to the motor. The motor turns the first gear, final gear, and eccentric rod to move the striker. This will ground the "open" terminal of the limit switch along with the "close" terminal, and the control unit will read that to mean the striker is moving.



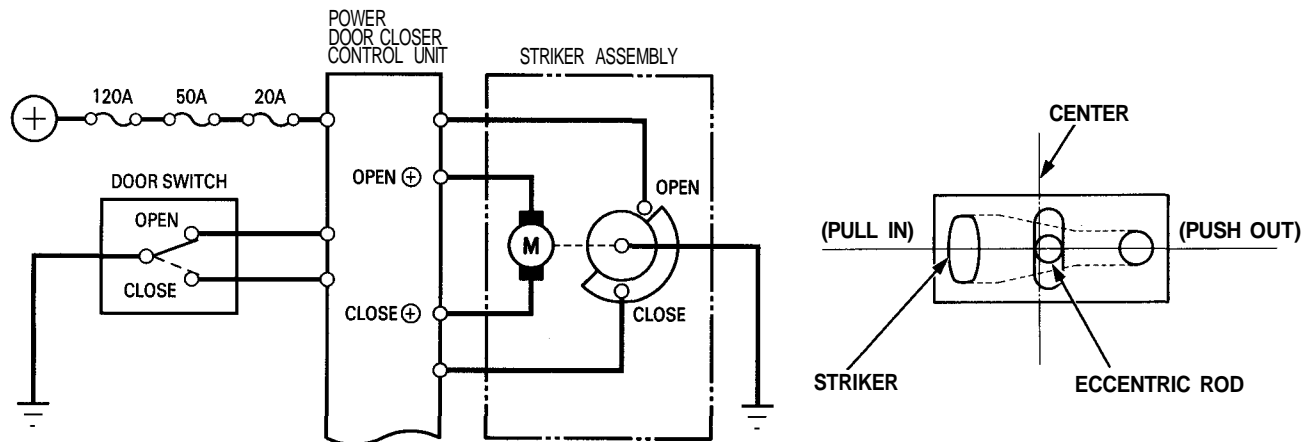
(cont'd)

Power Door Closer System

Description (cont'd)

Door Open

When the motor rotation exceeds a certain amount, the "open" side terminal will be ungrounded and the "close" terminal will be grounded. The control unit reads that to mean the striker is in the push-out position and stops sending current to the motor, which stops striker movement.



Door Closing

When the door has been closed, the operation reverses. The door latch switch is in the "close" position, and the control unit reads that the door has been closed and sends current to the motor. The motor rotates in reverse, reversing the direction of the eccentric rod. The striker moves to the pull-in side until it is stopped by the limit switch.

