# P1491 HONDA
## Exhaust Gas Recirculation Valve Insufficient Lift

### Symptoms

- Engine Light ON (or Service Engine Soon Warning Light)
- Possible engine hesitation

### Possible causes

- Exhaust Gas Recirculation Valve harness is open or shorted
- Exhaust Gas Recirculation Valve circuit poor electrical connection
- Faulty Exhaust Gas Recirculation Valve
- Exhaust Gas Recirculation Valve clogged
- Exhaust gas leaks

### Tech notes

In some 1999â€“2003 Honda Odysseys and 2003 Honda Pilots, the EGR system may become contaminated or clogged. If this happens, the vehicle may hesitate or surge during light acceleration, and the MIL (malfunction indicator lamp)may come on with DTC P0401 (EGR insufficient flow) or P1491 (EGR valve insufficient lift). If DTC P0401 or P1491 is stored, or if the engine hesitate or surges, clean the EGR port, install an EGR pipe kit, and clear the code.

### Description

The exhaust gas recirculation (EGR) system reduces oxides of nitrogen (NOx). NOx is generated by high combustion temperatures.The EGR system lowers peak combustion temperature by recirculating inactive exhaust gas into the air/fuel mixture, thus reducing NOx emissions.The EGR valve position sensor is built into the EGR valve and detects the amount of valve lift. The command value for the target valve lift is previously stored in the powertrain control module (PCM) so that exhaust gas recirculation can be optimized according to driving conditions.Comparing this command value with the EGR valve position sensor output signal value, the PCM controls the EGR valve to make the amount of actual valve lift equal to the command value.If the EGR valve position sensor output signal value differs greatly from the command value in the PCM memory for a set period of time, the EGR valve or the EGR valve position sensor is considered faulty and a DTC is stored.

### When is the code detected?

Low EGR flow control is detected