Symptoms of a MISFIRE DTC may include:

- MIL (Malfunction indicator lamp) illumination
- Engine misfire may be present or intermittent

Potential causes of code include:

- Short to voltage or ground on COP driver circuit
- Open on COP driver circuit
- Loose connection at coil or broken connector locks
- Bad Coil (COP)
- Faulty Powertrain Control Module

Possible Solutions:

Is the engine misfiring presently? If not, the problem is likely intermittent. Try wiggle testing the wiring at the coil and along the wiring harness to the PCM. If manipulating the wiring causes the misfire to surface, repair the wiring problem. Check for poor connection at the coil connector. Verify the harness isn't misrouted or chafing on anything. On 05+ 3V engines, the wires rub on the A/C accumulator coming from the firewall and short out.
Move the wires around and see if the misfire goes away. Tie the harness so the wires will not touch the A/C accumulator. Repair as necessary.

If engine misfire is detected or engine is not starting, please disconnect one ignition coil at a time and attempt to start or listen to engine fluctuation when ignition coil is unplugged. On 4V engine, disconnect fuel injectors. If engine does not respond to unplugging fuel injector or ignition coil, the wiring to the ignition coil on the corresponding cylinder, the spark plug or the ignition coil may be faulty.

If the engine is misfiring presently, stop the engine and disconnect one coil wiring connector. Then start the engine and check for a driver signal to the same coil. Using a scope will give you a visual pattern to observe, but since most people don't have access to one there's an easier way. Use a Voltmeter in AC Hertz scale and see if there's a Hz reading of between 5 and 20 or so that indicates the driver is working. If there is a Hertz signal, then replace the ignition coil or spark plug, as it is likely bad. If you don't detect any frequency signal from the PCM on the ignition coil driver circuit indicating the PCM is grounding/ungrounding the circuit (or there is no visible pattern on the scope if you have one) then leave the coil disconnected and check for DC voltage on the driver circuit at the ignition coil connector. If there is any significant voltage on that wire then there is a short to voltage somewhere. Find the short and repair it.

If there is no voltage on the driver circuit, then turn the ignition off. Disconnect the PCM connector and check the continuity of the driver between the PCM and the coil. If there is no continuity repair the open or short to ground in the circuit. If continuity is present, then check for resistance between ground and the ignition coil connector. There should be infinite resistance. If there isn't, repair the short to ground in the coil driver circuit. Repeat for other cylinders.

NOTE: If the ignition coil driver signal wire is not open or shorted to voltage or ground and there is no trigger signal to the coil then suspect a faulty PCM coil driver. Also keep in mind that if the PCM driver is at fault, there may be a wiring problem that caused the PCM failure. It's a good idea to do the above check after PCM replacement to verify there won't be a repeat failure. If you find that the engine isn't misfiring, the coil is being triggered properly but P0353 is continually being reset, there is the possibility that the PCM coil monitoring system may be faulty.