# 1. List of Diagnostic Trouble Code (DTC)

# A: LIST

DTC	Item	Index
P0011	Intake Camshaft Position - Timing Over-Advanced or System Perfor- mance (Bank 1)	<ref. (bank="" (dtc)="" -="" 1),="" camshaft="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-9,="" intake="" or="" over-advanced="" p0011="" performance="" position="" system="" tim-ing="" to="" trouble=""></ref.>
P0016	Crankshaft Position - Camshaft Position Correlation (Bank1)	<ref. -="" cam-<br="" crankshaft="" dtc="" gd(h6do)-11,="" p0016="" position="" to="">SHAFT POSITION CORRELATION (BANK1), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0018	Crankshaft Position - Camshaft Position Correlation (Bank2)	<ref. -="" cam-<br="" crankshaft="" dtc="" gd(h6do)-12,="" p0018="" position="" to="">SHAFT POSITION CORRELATION (BANK2), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0021	Intake Camshaft Position - Timing Over-Advanced or System Perfor- mance (Bank 2)	<ref. (bank="" (dtc)="" -="" 2),="" camshaft="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-12,="" intake="" or="" over-advanced="" p0021="" performance="" position="" system="" tim-ing="" to="" trouble=""></ref.>
P0026	Intake Valve Control Solenoid Circuit Range/Performance (Bank 1)	<ref. (bank="" (dtc)="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-13,="" intake="" p0026="" performance="" range="" solenoid="" to="" trouble="" valve=""></ref.>
P0028	Intake Valve Control Solenoid Circuit Range/Performance (Bank 2)	<ref. (bank="" (dtc)="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-15,="" intake="" p0028="" performance="" range="" solenoid="" to="" trouble="" valve=""></ref.>
P0030	HO2S Heater Control Circuit (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-16,="" heater="" ho2s="" p0030="" sensor="" to="" trouble=""></ref.>
P0031	HO2S Heater Control Circuit Low (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-18,="" heater="" ho2s="" low="" p0031="" sensor="" to="" trouble=""></ref.>
P0032	HO2S Heater Control Circuit High (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-20,="" heater="" high="" ho2s="" p0032="" sensor="" to="" trouble=""></ref.>
P0037	HO2S Heater Control Circuit Low (Bank 1 Sensor 2)	<ref. (bank="" (dtc)="" 1="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-22,="" heater="" ho2s="" low="" p0037="" sensor="" to="" trouble=""></ref.>
P0038	HO2S Heater Control Circuit High (Bank 1 Sensor 2)	<ref. (bank="" (dtc)="" 1="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-24,="" heater="" high="" ho2s="" p0038="" sensor="" to="" trouble=""></ref.>
P0050	HO2S Heater Control Circuit (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-26,="" heater="" ho2s="" p0050="" sensor="" to="" trouble=""></ref.>
P0051	HO2S Heater Control Circuit Low (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-26,="" heater="" ho2s="" low="" p0051="" sensor="" to="" trouble=""></ref.>
P0052	HO2S Heater Control Circuit High (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-26,="" heater="" high="" ho2s="" p0052="" sensor="" to="" trouble=""></ref.>
P0057	HO2S Heater Control Circuit Low (Bank 2 Sensor 2)	<ref. (bank="" (dtc)="" 2="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-26,="" heater="" ho2s="" low="" p0057="" sensor="" to="" trouble=""></ref.>
P0058	HO2S Heater Control Circuit High (Bank 2 Sensor 2)	<ref. (bank="" (dtc)="" 2="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-26,="" heater="" high="" ho2s="" p0058="" sensor="" to="" trouble=""></ref.>
P0068	MAP/MAF - Throttle Position Correlation	<ref. (dtc)="" -="" code="" correlation,="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-27,="" maf="" map="" p0068="" position="" throttle="" to="" trouble=""></ref.>
P0076	Intake Valve Control Solenoid Circuit Low (Bank 1)	<ref. (bank="" (dtc)="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-30,="" intake="" low="" p0076="" solenoid="" to="" trouble="" valve=""></ref.>
P0077	Intake Valve Control Solenoid Circuit High (Bank 1)	<ref. (bank="" (dtc)="" 1),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-31,="" high="" intake="" p0077="" solenoid="" to="" trouble="" valve=""></ref.>

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P0082	Intake Valve Control Solenoid Circuit Low (Bank 2)	<ref. (bank="" (dtc)="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-32,="" intake="" low="" p0082="" solenoid="" to="" trouble="" valve=""></ref.>
P0083	Intake Valve Control Solenoid Circuit High (Bank 2)	<ref. (bank="" (dtc)="" 2),="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-32,="" high="" intake="" p0083="" solenoid="" to="" trouble="" valve=""></ref.>
P0101	Mass or Volume Air Flow Circuit Range/Performance	<ref. air="" cir-<br="" dtc="" flow="" gd(h6do)-32,="" mass="" or="" p0101="" to="" volume="">CUIT RANGE/PERFORMANCE, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0102	Mass or Volume Air Flow Circuit Low Input	<ref. air="" cir-<br="" dtc="" flow="" gd(h6do)-35,="" mass="" or="" p0102="" to="" volume="">CUIT LOW INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0103	Mass or Volume Air Flow Circuit High Input	<ref. air="" cir-<br="" dtc="" flow="" gd(h6do)-37,="" mass="" or="" p0103="" to="" volume="">CUIT HIGH INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0107	Manifold Absolute Pressure/Baro- metric Pressure Circuit Low Input	<ref. <br="" absolute="" dtc="" gd(h6do)-39,="" manifold="" p0107="" pressure="" to="">BAROMETRIC PRESSURE CIRCUIT LOW INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0108	Manifold Absolute Pressure/Barometric Pressure Circuit High Input	<ref. <br="" absolute="" dtc="" gd(h6do)-41,="" manifold="" p0108="" pressure="" to="">BAROMETRIC PRESSURE CIRCUIT HIGH INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0111	Intake Air Temperature Sensor 1 Circuit Range/Performance	<ref. (dtc)="" 1="" air="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-43,="" intake="" p0111="" performance,="" range="" sensor="" temperature="" to="" trouble=""></ref.>
P0112	Intake Air Temperature Sensor 1 Circuit Low	<ref. (dtc)="" 1="" air="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-45,="" intake="" low,="" p0112="" sensor="" temperature="" to="" trouble=""></ref.>
P0113	Intake Air Temperature Sensor 1 Circuit High	<ref. (dtc)="" 1="" air="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-47,="" high,="" intake="" p0113="" sensor="" temperature="" to="" trouble=""></ref.>
P0117	Engine Coolant Temperature Circuit Low	<ref. coolant="" dtc="" engine="" gd(h6do)-49,="" p0117="" temperature<br="" to="">CIRCUIT LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0118	Engine Coolant Temperature Circuit High	<ref. coolant="" dtc="" engine="" gd(h6do)-51,="" p0118="" temperature<br="" to="">CIRCUIT HIGH, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0122	Throttle/Pedal Position Sensor/ Switch "A" Circuit Low	<ref. dtc="" gd(h6do)-53,="" p0122="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "A" CIRCUIT LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0123	Throttle/Pedal Position Sensor/ Switch "A" Circuit High	<ref. dtc="" gd(h6do)-55,="" p0123="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "A" CIRCUIT HIGH, Diagnostic Trouble Code (DTC) Detect- ing Criteria.&gt;</ref.>
P0125	Insufficient Coolant Temperature For Closed Loop Fuel Control	<ref. coolant="" dtc="" gd(h6do)-57,="" insufficient="" p0125="" tempera-<br="" to="">TURE FOR CLOSED LOOP FUEL CONTROL, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0126	Insufficient Engine Coolant Temperature For Stable Operation	<ref. (dtc)="" code="" coolant="" criteria.="" detecting="" diagnostic="" dtc="" engine="" for="" gd(h6do)-59,="" insufficient="" operation,="" p0126="" stable="" temperature="" to="" trouble=""></ref.>
P0128	Coolant Thermostat (Engine Coolant Temperature Below Thermostat Regulating Temperature)	<ref. (dtc)="" (engine="" below="" code="" coolant="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-61,="" p0128="" regulating="" temperature="" temperature),="" thermostat="" to="" trouble=""></ref.>
P0131	O2 Sensor Circuit Low Voltage (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-63,="" low="" o2="" p0131="" sensor="" to="" trouble="" voltage=""></ref.>
P0132	O2 Sensor Circuit High Voltage (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-65,="" high="" o2="" p0132="" sensor="" to="" trouble="" voltage=""></ref.>
P0133	O2 Sensor Circuit Slow Response (Bank 1 Sensor 1)	<ref. circuit="" dtc="" gd(h6do)-67,="" o2="" p0133="" sensor="" slow<br="" to="">RESPONSE (BANK 1 SENSOR 1), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0134	O2 Sensor Circuit No Activity Detected (Bank 1 Sensor 1)	<ref. (bank="" (dtc)="" 1="" 1),="" activity="" circuit="" code="" criteria.="" detected="" detecting="" diagnostic="" dtc="" gd(h6do)-70,="" no="" o2="" p0134="" sensor="" to="" trouble=""></ref.>
P0137	O2 Sensor Circuit Low Voltage (Bank 1 Sensor 2)	<ref. (bank="" (dtc)="" 1="" 2),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-72,="" low="" o2="" p0137="" sensor="" to="" trouble="" voltage=""></ref.>

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P0138	O2 Sensor Circuit High Voltage (Bank 1 Sensor 2)	<ref. (bank="" (dtc)="" 1="" 2),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-74,="" high="" o2="" p0138="" sensor="" to="" trouble="" voltage=""></ref.>
P0139	O2 Sensor Circuit Slow Response (Bank 1 Sensor 2)	<ref. circuit="" dtc="" gd(h6do)-76,="" o2="" p0139="" sensor="" slow<br="" to="">RESPONSE (BANK 1 SENSOR 2), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0140	O2 Sensor Circuit No Activity Detected (Bank1 Sensor2)	<ref. (bank1="" (dtc)="" activity="" circuit="" code="" criteria.="" detected="" detecting="" diagnostic="" dtc="" gd(h6do)-82,="" no="" o2="" p0140="" sensor="" sensor2),="" to="" trouble=""></ref.>
P0151	O2 Sensor Circuit Low Voltage (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" low="" o2="" p0151="" sensor="" to="" trouble="" voltage=""></ref.>
P0152	O2 Sensor Circuit High Voltage (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" high="" o2="" p0152="" sensor="" to="" trouble="" voltage=""></ref.>
P0153	O2 Sensor Circuit Slow Response (Bank 2 Sensor 1)	<ref. circuit="" dtc="" gd(h6do)-84,="" o2="" p0153="" sensor="" slow<br="" to="">RESPONSE (BANK 2 SENSOR 1), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0154	O2 Sensor Circuit No Activity Detected (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" 1),="" 2="" activity="" circuit="" code="" criteria.="" detected="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" no="" o2="" p0154="" sensor="" to="" trouble=""></ref.>
P0157	O2 Sensor Circuit Low Voltage (Bank 2 Sensor 2)	<ref. (bank="" (dtc)="" 2="" 2),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" low="" o2="" p0157="" sensor="" to="" trouble="" voltage=""></ref.>
P0158	O2 Sensor Circuit High Voltage (Bank 2 Sensor 2)	<ref. (bank="" (dtc)="" 2="" 2),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" high="" o2="" p0158="" sensor="" to="" trouble="" voltage=""></ref.>
P0159	O2 Sensor Circuit Slow Response (Bank 2 Sensor 2)	<ref. circuit="" dtc="" gd(h6do)-84,="" o2="" p0159="" sensor="" slow<br="" to="">RESPONSE (BANK 2 SENSOR 2), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0160	O2 Sensor Circuit No Activity Detected (Bank2 Sensor2)	<ref. (bank2="" (dtc)="" activity="" circuit="" code="" criteria.="" detected="" detecting="" diagnostic="" dtc="" gd(h6do)-84,="" no="" o2="" p0160="" sensor="" sensor2),="" to="" trouble=""></ref.>
P0171	System Too Lean (Bank 1)	<ref. (bank="" (dtc)="" 1),="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-85,="" lean="" p0171="" system="" to="" too="" trouble=""></ref.>
P0172	System Too Rich (Bank 1)	<ref. (bank="" (dtc)="" 1),="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-87,="" p0172="" rich="" system="" to="" too="" trouble=""></ref.>
P0174	System Too Lean (Bank 2)	<ref. (bank="" (dtc)="" 2),="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-88,="" lean="" p0174="" system="" to="" too="" trouble=""></ref.>
P0175	System Too Rich (Bank 2)	<ref. (bank="" (dtc)="" 2),="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-88,="" p0175="" rich="" system="" to="" too="" trouble=""></ref.>
P0181	Fuel Temperature Sensor "A" Circuit Range/Performance	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-89,="" p0181="" performance,="" range="" sensor="" temperature="" to="" trouble=""></ref.>
P0182	Fuel Temperature Sensor "A" Circuit Low Input	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-92,="" input,="" low="" p0182="" sensor="" temperature="" to="" trouble=""></ref.>
P0183	Fuel Temperature Sensor "A" Circuit High Input	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-94,="" high="" input,="" p0183="" sensor="" temperature="" to="" trouble=""></ref.>
P0196	Engine Oil Temperature Sensor Circuit Range/Performance	<ref. dtc="" engine="" gd(h6do)-96,="" oil="" p0196="" sen-<br="" temperature="" to="">SOR CIRCUIT RANGE/PERFORMANCE, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0197	Engine Oil Temperature Sensor Low	<ref. dtc="" engine="" gd(h6do)-98,="" oil="" p0197="" sen-<br="" temperature="" to="">SOR LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0198	Engine Oil Temperature Sensor High	<ref. dtc="" engine="" gd(h6do)-99,="" oil="" p0198="" sen-<br="" temperature="" to="">SOR HIGH, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0222	Throttle/Pedal Position Sensor/ Switch "B" Circuit Low	<ref. dtc="" gd(h6do)-100,="" p0222="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "B" CIRCUIT LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0223	Throttle/Pedal Position Sensor/ Switch "B" Circuit High	<ref. dtc="" gd(h6do)-102,="" p0223="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "B" CIRCUIT HIGH, Diagnostic Trouble Code (DTC) Detect- ing Criteria.&gt;</ref.>

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P0230	Fuel Pump Primary Circuit	<ref. (dtc)="" circuit,="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-104,="" p0230="" primary="" pump="" to="" trouble=""></ref.>
P0301	Cylinder 1 Misfire Detected	<ref. (dtc)="" 1="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-106,="" misfire="" p0301="" to="" trouble=""></ref.>
P0302	Cylinder 2 Misfire Detected	<ref. (dtc)="" 2="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-111,="" misfire="" p0302="" to="" trouble=""></ref.>
P0303	Cylinder 3 Misfire Detected	<ref. (dtc)="" 3="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-111,="" misfire="" p0303="" to="" trouble=""></ref.>
P0304	Cylinder 4 Misfire Detected	<ref. (dtc)="" 4="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-111,="" misfire="" p0304="" to="" trouble=""></ref.>
P0305	Cylinder 5 Misfire Detected	<ref. (dtc)="" 5="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-111,="" misfire="" p0305="" to="" trouble=""></ref.>
P0306	Cylinder 6 Misfire Detected	<ref. (dtc)="" 6="" code="" criteria.="" cylinder="" detected,="" detecting="" diagnostic="" dtc="" gd(h6do)-111,="" misfire="" p0306="" to="" trouble=""></ref.>
P0327	Knock Sensor 1 Circuit Low (Bank 1 or Single Sensor)	<ref. (bank="" (dtc)="" 1="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-112,="" knock="" low="" or="" p0327="" sensor="" sensor),="" single="" to="" trouble=""></ref.>
P0328	Knock Sensor 1 Circuit High (Bank 1 or Single Sensor)	<ref. (bank="" (dtc)="" 1="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-114,="" high="" knock="" or="" p0328="" sensor="" sensor),="" single="" to="" trouble=""></ref.>
P0332	Knock Sensor 2 Circuit Low (Bank 2)	<ref. (bank="" (dtc)="" 2="" 2),="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-115,="" knock="" low="" p0332="" sensor="" to="" trouble=""></ref.>
P0333	Knock Sensor 2 Circuit High (Bank 2)	<ref. 2="" circuit="" dtc="" gd(h6do)-115,="" high<br="" knock="" p0333="" sensor="" to="">(BANK 2), Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0335	Crankshaft Position Sensor "A" Circuit	<ref. crankshaft="" dtc="" gd(h6do)-116,="" p0335="" position="" sensor<br="" to="">"A" CIRCUIT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0336	Crankshaft Position Sensor "A" Circuit Range/Performance	<ref. crankshaft="" dtc="" gd(h6do)-118,="" p0336="" position="" sensor<br="" to="">"A" CIRCUIT RANGE/PERFORMANCE, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0340	Camshaft Position Sensor "A" Circuit (Bank 1 or Single Sensor)	<ref. "a"="" (bank="" (dtc)="" 1="" camshaft="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-120,="" or="" p0340="" position="" sensor="" sensor),="" single="" to="" trouble=""></ref.>
P0345	Camshaft Position Sensor "A" Circuit (Bank 2)	<ref. "a"="" (bank="" (dtc)="" 2),="" camshaft="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-122,="" p0345="" position="" sensor="" to="" trouble=""></ref.>
P0420	Catalyst System Efficiency Below Threshold (Bank 1)	<ref. (bank="" (dtc)="" 1),="" below="" catalyst="" code="" criteria.="" detecting="" diagnostic="" dtc="" efficiency="" gd(h6do)-123,="" p0420="" system="" threshold="" to="" trouble=""></ref.>
P0442	Evaporative Emission Control System Leak Detected (Small Leak)	<ref. (dtc)="" (small="" code="" control="" criteria.="" detected="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-125,="" leak="" leak),="" p0442="" system="" to="" trouble=""></ref.>
P0447	Evaporative Emission Control System Vent Control Circuit Open	<ref. (dtc)="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-140,="" open,="" p0447="" system="" to="" trouble="" vent=""></ref.>
P0448	Evaporative Emission Control System Vent Control Circuit Shorted	<ref. (dtc)="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-142,="" p0448="" shorted,="" system="" to="" trouble="" vent=""></ref.>
P0451	Evaporative Emission Control System Pressure Sensor	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-144,="" p0451="" pressure="" sensor,="" system="" to="" trouble=""></ref.>
P0452	Evaporative Emission Control System Pressure Sensor Low Input	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-146,="" input,="" low="" p0452="" pressure="" sensor="" system="" to="" trouble=""></ref.>
P0453	Evaporative Emission Control System Pressure Sensor High Input	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-148,="" high="" input,="" p0453="" pressure="" sensor="" system="" to="" trouble=""></ref.>

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DTC	Item	Index
P0456	Evaporative Emission Control System Leak Detected (Very Small Leak)	<ref. (dtc)="" (very="" code="" control="" criteria.="" detected="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-149,="" leak="" leak),="" p0456="" small="" system="" to="" trouble=""></ref.>
P0457	Evaporative Emission Control System Leak Detected (Fuel Cap Loose/Off)	<ref. (dtc)="" (fuel="" cap="" code="" control="" criteria.="" detected="" detecting="" diagnostic="" dtc="" emission="" evaporative="" gd(h6do)-149,="" leak="" loose="" off),="" p0457="" system="" to="" trouble=""></ref.>
P0458	Evaporative Emission System Purge Control Valve Circuit Low	<ref. dtc="" emission="" evaporative="" gd(h6do)-150,="" p0458="" system<br="" to="">PURGE CONTROL VALVE CIRCUIT LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0459	Evaporative Emission System Purge Control Valve Circuit High	<ref. dtc="" emission="" evaporative="" gd(h6do)-152,="" p0459="" system<br="" to="">PURGE CONTROL VALVE CIRCUIT HIGH, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0461	Fuel Level Sensor "A" Circuit Range/Performance	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-154,="" level="" p0461="" performance,="" range="" sensor="" to="" trouble=""></ref.>
P0462	Fuel Level Sensor "A" Circuit Low	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-156,="" level="" low,="" p0462="" sensor="" to="" trouble=""></ref.>
P0463	Fuel Level Sensor "A" Circuit High	<ref. "a"="" (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-158,="" high,="" level="" p0463="" sensor="" to="" trouble=""></ref.>
P0464	Fuel Level Sensor Circuit Intermittent	<ref. (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-160,="" intermittent,="" level="" p0464="" sensor="" to="" trouble=""></ref.>
P0483	Fan Rationality Check	<ref. (dtc)="" check,="" code="" criteria.="" detecting="" diagnostic="" dtc="" fan="" gd(h6do)-163,="" p0483="" rationality="" to="" trouble=""></ref.>
P0500	Vehicle Speed Sensor "A"	<ref. "a",="" (dtc)="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-164,="" p0500="" sensor="" speed="" to="" trouble="" vehicle=""></ref.>
P0506	Idle Air Control System RPM Lower Than Expected	<ref. (dtc)="" air="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" expected,="" gd(h6do)-166,="" idle="" lower="" p0506="" rpm="" system="" than="" to="" trouble=""></ref.>
P0507	Idle Air Control System RPM Higher Than Expected	<ref. (dtc)="" air="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" expected,="" gd(h6do)-168,="" higher="" idle="" p0507="" rpm="" system="" than="" to="" trouble=""></ref.>
P0512	Starter Request Circuit	<ref. (dtc)="" circuit,="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-170,="" p0512="" request="" starter="" to="" trouble=""></ref.>
P0513	Incorrect Immobilizer Key	<ref. (dtc)="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-171,="" immobilizer="" incorrect="" key,="" p0513="" to="" trouble=""></ref.>
P0519	Idle Air Control System Performance	<ref. (dtc)="" air="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-172,="" idle="" p0519="" per-formance,="" system="" to="" trouble=""></ref.>
P0600	Serial Communication Link	<ref. (dtc)="" code="" communication="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-173,="" link,="" p0600="" serial="" to="" trouble=""></ref.>
P0604	Internal Control Module Random Access Memory (RAM) Error	<ref. control="" dtc="" gd(h6do)-174,="" internal="" module<br="" p0604="" to="">RANDOM ACCESS MEMORY (RAM) ERROR, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0605	Internal Control Module Read Only Memory (ROM) Error	<ref. control="" dtc="" gd(h6do)-176,="" internal="" module<br="" p0605="" to="">READ ONLY MEMORY (ROM) ERROR, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P0607	Control Module Performance	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-177,="" module="" p0607="" perfor-mance,="" to="" trouble=""></ref.>
P0638	Throttle Actuator Control Range/ Performance (Bank 1)	<ref. (bank="" (dtc)="" 1),="" actuator="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-180,="" p0638="" performance="" range="" throttle="" to="" trouble=""></ref.>
P0691	Fan 1 Control Circuit Low	<ref. (dtc)="" 1="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" fan="" gd(h6do)-183,="" low,="" p0691="" to="" trouble=""></ref.>
P0692	Fan 1 Control Circuit High	<ref. (dtc)="" 1="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" fan="" gd(h6do)-184,="" high,="" p0692="" to="" trouble=""></ref.>
P0700	Transmission Control System (MIL Request)	<ref. (dtc)="" (mil="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-185,="" p0700="" request),="" system="" to="" transmission="" trouble=""></ref.>

DTC	Item	Index
P1152	O2 Sensor Circuit Range/Performance (Low) (Bank1 Sensor1)	<ref. (bank1="" (dtc)="" (low)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-186,="" o2="" p1152="" per-formance="" range="" sensor="" sensor1),="" to="" trouble=""></ref.>
P1153	O2 Sensor Circuit Range/Performance (High) (Bank1 Sensor1)	<ref. (bank1="" (dtc)="" (high)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-188,="" o2="" p1153="" per-formance="" range="" sensor="" sensor1),="" to="" trouble=""></ref.>
P1154	O2 Sensor Circuit Range/Performance (Low) (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" (low)="" 1),="" 2="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-189,="" o2="" p1154="" per-formance="" range="" sensor="" to="" trouble=""></ref.>
P1155	O2 Sensor Circuit Range/Performance (High) (Bank 2 Sensor 1)	<ref. (bank="" (dtc)="" (high)="" 1),="" 2="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-189,="" o2="" p1155="" per-formance="" range="" sensor="" to="" trouble=""></ref.>
P1160	Return Spring Failure	<ref. (dtc)="" code="" criteria.="" detecting="" diagnostic="" dtc="" failure,="" gd(h6do)-190,="" p1160="" return="" spring="" to="" trouble=""></ref.>
P1400	Fuel Tank Pressure Control Sole- noid Valve Circuit Low	<ref. (dtc)="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-192,="" low,="" p1400="" pressure="" solenoid="" tank="" to="" trouble="" valve=""></ref.>
P1420	Fuel Tank Pressure Control Sol. Valve Circuit High	<ref. (dtc)="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-194,="" high,="" p1420="" pressure="" sol.="" tank="" to="" trouble="" valve=""></ref.>
P1443	Vent Control Solenoid Valve Function Problem	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" function="" gd(h6do)-196,="" p1443="" problem,="" solenoid="" to="" trouble="" valve="" vent=""></ref.>
P1518	Starter Switch Circuit Low Input	<ref. (dtc)="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-198,="" input,="" low="" p1518="" starter="" switch="" to="" trouble=""></ref.>
P1560	Back-up Voltage Circuit Malfunction	<ref. back-up="" circuit="" dtc="" gd(h6do)-199,="" mal-<br="" p1560="" to="" voltage="">FUNCTION, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P1570	Antenna	<ref. (dtc)="" antenna,="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-200,="" p1570="" to="" trouble=""></ref.>
P1571	Reference Code Incompatibility	<ref. (dtc)="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-200,="" incompatibility,="" p1571="" reference="" to="" trouble=""></ref.>
P1572	IMM Circuit Failure (Except Antenna Circuit)	<ref. (dtc)="" (except="" antenna="" circuit="" circuit),="" code="" criteria.="" detecting="" diagnostic="" dtc="" failure="" gd(h6do)-200,="" imm="" p1572="" to="" trouble=""></ref.>
P1574	Key Communication Failure	<ref. (dtc)="" code="" communication="" criteria.="" detecting="" diagnostic="" dtc="" failure,="" gd(h6do)-200,="" key="" p1574="" to="" trouble=""></ref.>
P1576	EGI Control Module EEPROM	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" eeprom,="" egi="" gd(h6do)-200,="" module="" p1576="" to="" trouble=""></ref.>
P1577	IMM Control Module EEPROM	<ref. (dtc)="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" eeprom,="" gd(h6do)-200,="" imm="" module="" p1577="" to="" trouble=""></ref.>
P1578	Meter Failure	<ref. (dtc)="" code="" criteria.="" detecting="" diagnostic="" dtc="" failure,="" gd(h6do)-200,="" meter="" p1578="" to="" trouble=""></ref.>
P2088	Intake Camshaft Position Actuator Control Circuit Low (Bank 1)	<ref. (bank="" (dtc)="" 1),="" actuator="" camshaft="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-201,="" intake="" low="" p2088="" position="" to="" trouble=""></ref.>
P2089	Intake Camshaft Position Actuator Control Circuit High (Bank 1)	<ref. (bank="" (dtc)="" 1),="" actuator="" camshaft="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-203,="" high="" intake="" p2089="" position="" to="" trouble=""></ref.>
P2092	Intake Camshaft Position Actuator Control Circuit Low (Bank 2)	<ref. (bank="" (dtc)="" 2),="" actuator="" camshaft="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-204,="" intake="" low="" p2092="" position="" to="" trouble=""></ref.>
P2093	Intake Camshaft Position Actuator Control Circuit High (Bank 2)	<ref. (bank="" (dtc)="" 2),="" actuator="" camshaft="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-204,="" high="" intake="" p2093="" position="" to="" trouble=""></ref.>
P2096	Post Catalyst Fuel Trim System Too Lean Bank 1	<ref. (dtc)="" 1,="" bank="" catalyst="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-205,="" lean="" p2096="" post="" system="" to="" too="" trim="" trouble=""></ref.>

# **List of Diagnostic Trouble Code (DTC)**

### **GENERAL DESCRIPTION**

DTC	Item	Index
P2097	Post Catalyst Fuel Trim System Too Rich Bank 1	<ref. (dtc)="" 1,="" bank="" catalyst="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-207,="" p2097="" post="" rich="" system="" to="" too="" trim="" trouble=""></ref.>
P2098	Post Catalyst Fuel Trim System Too Lean Bank 2	<ref. (dtc)="" 2,="" bank="" catalyst="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-208,="" lean="" p2098="" post="" system="" to="" too="" trim="" trouble=""></ref.>
P2099	Post Catalyst Fuel Trim System Too Rich Bank 2	<ref. (dtc)="" 2,="" bank="" catalyst="" code="" criteria.="" detecting="" diagnostic="" dtc="" fuel="" gd(h6do)-208,="" p2099="" post="" rich="" system="" to="" too="" trim="" trouble=""></ref.>
P2101	Throttle Actuator Control Motor Circuit Range/Performance	<ref. actuator="" control<br="" dtc="" gd(h6do)-209,="" p2101="" throttle="" to="">MOTOR CIRCUIT RANGE/PERFORMANCE, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2102	Throttle Actuator Control Motor Circuit Low	<ref. actuator="" control<br="" dtc="" gd(h6do)-211,="" p2102="" throttle="" to="">MOTOR CIRCUIT LOW, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2103	Throttle Actuator Control Motor Circuit High	<ref. (dtc)="" actuator="" circuit="" code="" control="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-213,="" high,="" motor="" p2103="" throttle="" to="" trouble=""></ref.>
P2109	Throttle/Pedal Position Sensor "A" Minimum Stop Performance	<ref. dtc="" gd(h6do)-215,="" p2109="" pedal="" position="" sen-<br="" throttle="" to="">SOR "A" MINIMUM STOP PERFORMANCE, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2122	Throttle/Pedal Position Sensor/ Switch "D" Circuit Low Input	<ref. dtc="" gd(h6do)-217,="" p2122="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "D" CIRCUIT LOW INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2123	Throttle/Pedal Position Sensor/ Switch "D" Circuit High Input	<ref. dtc="" gd(h6do)-219,="" p2123="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "D" CIRCUIT HIGH INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2127	Throttle/Pedal Position Sensor/ Switch "E" Circuit Low Input	<ref. dtc="" gd(h6do)-221,="" p2127="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "E" CIRCUIT LOW INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2128	Throttle/Pedal Position Sensor/ Switch "E" Circuit High Input	<ref. dtc="" gd(h6do)-223,="" p2128="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "E" CIRCUIT HIGH INPUT, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2135	Throttle/Pedal Position Sensor/ Switch "A"/"B" Voltage Correlation	<ref. dtc="" gd(h6do)-225,="" p2135="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "A"/"B" VOLTAGE CORRELATION, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2138	Throttle/Pedal Position Sensor/ Switch "D"/"E" Voltage Correlation	<ref. dtc="" gd(h6do)-227,="" p2138="" pedal="" position="" sen-<br="" throttle="" to="">SOR/SWITCH "D"/"E" VOLTAGE CORRELATION, Diagnostic Trouble Code (DTC) Detecting Criteria.&gt;</ref.>
P2227	Barometric Pressure Circuit Range/Performance	<ref. (dtc)="" barometric="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-229,="" p2227="" performance,="" pressure="" range="" to="" trouble=""></ref.>
P2228	Barometric Pressure Circuit Low	<ref. (dtc)="" barometric="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-230,="" low,="" p2228="" pressure="" to="" trouble=""></ref.>
P2229	Barometric Pressure Circuit High	<ref. (dtc)="" barometric="" circuit="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-231,="" high,="" p2229="" pressure="" to="" trouble=""></ref.>
P2503	Charging System Voltage Low	<ref. (dtc)="" charging="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-232,="" low,="" p2503="" system="" to="" trouble="" voltage=""></ref.>
P2504	Charging System Voltage High	<ref. (dtc)="" charging="" code="" criteria.="" detecting="" diagnostic="" dtc="" gd(h6do)-233,="" high,="" p2504="" system="" to="" trouble="" voltage=""></ref.>