191 - Giulietta 1.4 Turbo MultiAir Crankshaft Position Camshaft Position Correlation P0016

			Test results		
1	COMPONENT CONCERNED	TIMING BELT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing belt	Check that the timing belt is fitted correctly	Go to Step 2	Incorrect fitting of timing belt.	Restore the timing belt correct fitting
2	COMPONENT CONCERNED	TIMING SENSOR CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor	Check that the timing sensor is working properly	Go to Step 3	Timing sensor not working	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
3	COMPONENT CONCERNED	RPM SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Rpm sensor	Check that the rpm sensor is positioned correctly	Go to Step 4	Rpm sensor not correctly positioned	Restore the correct position of the rpm sensor
4	COMPONENT CONCERNED	CHECK THE AIR GAP BETWEEN RPM SENSOR AND TOOTHED WHEEL	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air gap between rpm sensor and toothed wheel	Check the correct air gap between the rpm sensor and the toothed wheel	Go to Step 5	Incorrect air gap	Restore the correct air gap
		UNIAIR MODULE	OK (NO		

5	COMPONENT CONCERNED	PUMPING ELEMENT CHECKS	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module pumping elements	Check that the camshaft is not locked due to the Uniair module pumping element seizing	Go to Step 6	Uniair module pumping element seizing	Uniair module replacement Op. 1036F20 UNIAIR MODULE - R.R.
6	COMPONENT CONCERNED	ENGINE TIMING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine timing	Check that the engine timing is correct	End of diagnosis	Timing not correct	Restore the correct timing

			Test results		
1	COMPONENT CONCERNED	CHECK DUMP VALVE AND ENGINE MANAGEMENT CONTROL UNIT CONNECTIONS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Dump valve and engine management control unit (short circuit to GND)	Check for the presence of loose connections on the Dump Valve and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (short circuit to GND)	Check the correct insulation of the wiring	Go to Step 3	Short circuit to GND	Restore insulation to earth
3	COMPONENT CONCERNED	DUMP VALVE FUNCTIONALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve (short circuit to GND)	Enter the active diagnosis with the diagnosis equipment and check the Dump valve activation	Go to Step 4	Incorrect Dump valve activation	Replace the Dump Valve Op. 1064A27 PIPE BETWEEN VACUUM RESERVOIR AND ACTUATOR CONTROL SOLENOID VALVE - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
					Replace the engine

	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Incorrect operation of engine management control unit	management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CHECK DUMP VALVE AND ENGINE MANAGEMENT CONTROL UNIT CONNECTIONS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Dump valve and engine management control unit (short circuit to Vbatt)	Check for the presence of loose connections on the Dump Valve and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (short circuit to Vbatt)	Check the correct insulation of the wiring	Go to Step 7	Short circuit to Vbatt.	Restore insulation to battery +
7	COMPONENT CONCERNED	DUMP VALVE FUNCTIONALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve (short circuit to Vbatt)	Enter the active diagnosis with the diagnosis equipment and check the Dump valve activation	Go to Step 8	Incorrect Dump valve activation	Replace the Dump Valve Op. 1064A27 PIPE BETWEEN VACUUM RESERVOIR AND ACTUATOR CONTROL SOLENOID VALVE - R.R.
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management	Go to Step 9	Incorrect operation of engine	Replace the engine management control unit Op. 1056B82

	(short circuit to Vbatt)	control unit is working properly		management control unit	INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	CHECK DUMP VALVE AND ENGINE MANAGEMENT CONTROL UNIT CONNECTIONS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Dump valve and engine management control unit (open circuit)	Check for the presence of loose connections on the Dump Valve and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (open circuit)	Check for the presence of unstable earth connections	Go to Step 11	Earth connections unstable	Restore the correct earth connections
11	COMPONENT CONCERNED	DUMP VALVE FUNCTIONALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve (open circuit)	Enter the active diagnosis with the diagnosis equipment and check the Dump valve activation	Go to Step 12	Incorrect Dump valve activation	Replace the Dump Valve Op. 1064A27 PIPE BETWEEN VACUUM RESERVOIR AND ACTUATOR CONTROL SOLENOID VALVE - R.R.
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	Go to Step 13	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

13	COMPONENT CONCERNED	CHECK DUMP VALVE AND ENGINE MANAGEMENT CONTROL UNIT CONNECTIONS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Dump valve and engine management control unit (solenoid valve stuck closed)	Check for the presence of loose connections on the Dump Valve and the engine management control unit	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (solenoid valve stuck closed)	Check the correct insulation of the wiring	Go to Step 15	Short circuit to Vbatt.	Restore insulation to battery +
15	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (solenoid valve stuck closed)	Check for the presence of unstable earth connections	Go to Step 16	Earth connections unstable	Restore the correct ear connections
16	COMPONENT CONCERNED	CHECKS OF WASTEGATE SOLENOID VALVE PNEUMATIC DUCTS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Pneumatic ducts on wastegate solenoid valve (solenoid valve stuck closed)	Check that the pneumatic duct connections on the wastegate solenoid valve have not been swapped	Go to Step 17	Pneumatic ducts swapped	Restore the correct connection for the pneumatic ducts on the wastegate solenoid valve
17	COMPONENT CONCERNED	DUMP VALVE FUNCTIONALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
					Replace the Dump

	Dump valve (solenoid valve stuck closed)	Enter the active diagnosis with the diagnosis equipment and check the Dump valve activation	Go to Step 18	Incorrect Dump valve activation	Valve Op. 1064A27 PIPE BETWEEN VACUUM RESERVOIR AND ACTUATOR CONTROL SOLENOID VALVE - R.R.
18	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (solenoid valve stuck closed)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Dump valve and engine management control unit (solenoid valve stuck closed)	Check for the presence of loose connections on the Dump Valve and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (solenoid valve stuck closed)	Check the correct insulation of the wiring	Go to Step 3	Short circuit to Vbatt.	Restore insulation to battery +
3	COMPONENT CONCERNED	DUMP VALVE WIRING CHECKS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve wiring (solenoid valve stuck closed)	Check for the presence of unstable earth connections	Go to Step 4	Earth connections unstable	Restore the correct earth connections
4	COMPONENT CONCERNED	CHECKS OF WASTEGATE SOLENOID VALVE PNEUMATIC DUCTS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Pneumatic ducts on wastegate solenoid valve	Check that the pneumatic duct connections on the wastegate solenoid	Go to Step 5	Pneumatic ducts swapped	Restore the correct connection for the pneumatic ducts on the wastegate solenoid

	(solenoid valve stuck closed)	valve have not been swapped			valve
5	COMPONENT CONCERNED	DUMP VALVE FUNCTIONALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Dump valve (solenoid valve stuck closed)	Enter the active diagnosis with the diagnosis equipment and check the Dump valve activation	Go to Step 6	Incorrect Dump valve activation	Replace the Dump Valve Op. 1064A27 PIPE BETWEEN VACUUM RESERVOIR AND ACTUATOR CONTROL SOLENOID VALVE - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (solenoid valve stuck closed)	Check that the engine management control unit is working properly.	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Toot ma 14-		
			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the continuity of the oxygen sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the correct insulation of the oxygen sensor wiring (short circuit between conductors)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK OXYGEN SENSOR PREHEATING RESISTANCE OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the correct operation of the oxygen sensor			

	Oxygen sensor preheating resistance	preheating resistance. The nominal resistance value at 20°C is 3 Ω (in the event of values higher than 40 Ω replace the upstream sensor)	Go to Step 5	Incorrect operation of the preheating resistance	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON INTAKE PRESSURE SENSOR AND ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor and engine management control unit	Check for loose connections and wiring continuity on the intake pressure sensor and the engine management control unit.	Go to Step 2	Presence of loose connections and incorrect wiring continuity	Restore correct wiring and connections
2	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor wiring	Check the correct insulation of the intake pressure sensor wiring	Go to Step 3	Wiring insulation not correct	Restore the correct insulation
3	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor	Check the correct operation of the intake pressure sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR	Go to Step 4	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.

		INTAKE AIR TEMPERATURE SENSOR			
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON INTAKE PRESSURE SENSOR AND ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor and engine management control unit	Check for loose connections and wiring continuity on the intake pressure sensor and the engine management control unit.	Go to Step 2	Presence of loose connections and incorrect wiring continuity	Restore correct wiring and connections
2	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor wiring	Check the correct insulation of the intake pressure sensor wiring	Go to Step 3	Wiring insulation not correct	Restore the correct insulation
3	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor	Check the correct operation of the intake pressure sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR	Go to Step 4	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.

		AND/OR INTAKE AIR TEMPERATURE SENSOR			
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Mass or Volume Air Flow ""A"" Circuit Range/Performance" P0101

			Test results		
1	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor	Connect the diagnosis equipment to the engine management control unit and check that the value of parameter "intake pressure" is 300 mbar with engine warmed-up	Go to Step 3	Value read inconsistent	Go to Step 2
2	COMPONENT CONCERNED	INTAKE MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake manifold	Check for the presence of penetration/leaks in the intake manifold	Go to Step 3	Presence of penetration/leaks in the intake manifold	Restore the correct seal of the intake manifold
3	COMPONENT CONCERNED	THROTTLE BODY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check the correct position of the throttle body on the intake manifold	Go to Step 4	Throttle body not correctly positioned	Restore the correct position of the throttle body
4	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Intake pressure sensor wiring	Check the correct insulation of the intake pressure sensor wiring	Go to Step 5	Wiring insulation not correct	Restore the correct insulation
5	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor	Check the correct operation of the intake pressure sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	End of diagnosis	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.

191 - Giulietta 1.4 Turbo MultiAir Manifold Absolute Pressure/Barometric Pressure Circuit P0105

			Test results		
1	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor (short circuit to Vbatt)	Check for loose connections on the intake pressure sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor wiring (short circuit to Vbatt)	Check the correct insulation of the intake pressure sensor wiring	Go to Step 3	Correct wiring insulation	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor wiring (short circuit to Vbatt)	Check the correct continuity of the intake pressure sensor wiring	Go to Step 4	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
4	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the correct operation of the intake pressure			

	Intake pressure sensor (short circuit to Vbatt)	sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 5	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
5	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor (short circuit to GND or open circuit)	Check for loose connections on the intake pressure sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor wiring (short circuit to GND or open circuit)	Check the correct insulation of the intake pressure sensor wiring	Go to Step 8	Correct wiring insulation	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	INESSURE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Intake pressure sensor wiring (short circuit to GND or open circuit)	Check the correct continuity of the intake pressure sensor wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (short circuit to GND or open circuit)	Check the correct operation of the intake pressure sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 10	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor (signal variation below threshold)	Check for loose connections on the intake pressure sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	ENGINE TIMING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine timing (signal variation below threshold)	Check that the engine timing is correct	Go to Step 3	Timing not correct	Restore the correct timing
3	COMPONENT CONCERNED	ENGINE COMPRESSION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine compression (signal variation below threshold)	Check that the engine compression is correct Op. 0520G15 COMPRESSION TEST - CHECK WITH EXAMINER WITH SPARK PLUGS/INJECTORS REMOVED	Go to Step 4	Compression incorrect	Overhaul the engine
4	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Intake pressure sensor (signal variation below threshold)	Check the correct position of the intake pressure sensor	Go to Step 5	Intake pressure sensor not correctly positioned	Restore the correct position of the intake pressure sensor
5	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (signal variation below threshold)	Check correct operation of the intake pressure sensor by carrying out the Test_1056BU	Go to Step 6	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal variation below threshold)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor (signal variation above threshold)	sensor and the engine	Go to Step 8	Presence of loose connections	Restore the correct connections
8	COMPONENT CONCERNED	ENGINE TIMING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine timing (signal variation above threshold)	Check that the engine timing is correct	Go to Step 9	Timing not correct	Restore the correct timing
9	COMPONENT CONCERNED	ENGINE COMPRESSION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		CHECK	DETECTED)		
	Engine compression (signal variation above threshold)	Check that the engine compression is correct by performing the Op. 0520G15 COMPRESSION TEST - CHECK WITH EXAMINER WITH SPARK PLUGS/INJECTORS REMOVED	Go to Step 10	Compression incorrect	Overhaul the engine
10	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (signal variation above threshold)	Check the oil level inside the module See Test	Go to Step 11	Oil level low	Restore the correct oil level
11	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (signal variation above threshold)	Check if the MultiAir module inlet oil filter is clogged	Go to Step 12	Oil filter clogged	Replace the oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
12	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (signal variation above threshold)	Check the correct position of the intake pressure sensor	Go to Step 13	Intake pressure sensor not correctly positioned	Restore the correct position of the intake pressure sensor
13	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (signal variation above threshold)	Check correct operation of the intake pressure sensor by carrying out the Test_1056BU	Go to Step 14	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.

14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal variation above threshold)	Check that the engine management control unit is working properly	Go to Step 15	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on intake pressure sensor (incorrect comparison signal)	Check for loose connections on the intake pressure sensor and the engine management control unit	Go to Step 16	Presence of loose connections	Restore the correct connections
16	COMPONENT CONCERNED	ENGINE TIMING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine timing (incorrect comparison signal)	Check that the engine timing is correct	Go to Step 17	Timing not correct	Restore the correct timing
17	COMPONENT CONCERNED	ENGINE COMPRESSION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine compression (incorrect comparison signal)	Check that the engine compression is correct by performing the [PR_0520G15]	Go to Step 18	Compression incorrect	Overhaul the engine
18	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (incorrect comparison	Check if the MultiAir module inlet oil filter is clogged	Move on to Step 19	Oil filter clogged	Replace the oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.

	signal)				
19	COMPONENT CONCERNED	UNIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (incorrect comparison signal)	Check the oil level inside the module See Test	Move on to Step 20	Oil level low	Restore the correct oil level
20	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (incorrect comparison signal)	Check the correct position of the intake pressure sensor	Move on to Step 21	Intake pressure sensor not correctly positioned	Restore the correct position of the intake pressure sensor
21	COMPONENT CONCERNED	INTAKE PRESSURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake pressure sensor (incorrect comparison signal)	Check the correct operation of the intake pressure sensor See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 22	Intake pressure sensor not working properly	Replace the intake pressure sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
22	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air temperature sensor (short circuit to GND)	Check for loose connections on the air temperature sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (short circuit to GND)	Check the continuity of the air temperature sensor wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (short circuit to GND)	Check the correct insulation of the air temperature sensor wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check that the air			

	Air temperature sensor Air temperature sensor wiring (short circuit to GND)	temperature sensor is working properly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 5	Air temperature sensor not working properly	Replace the air temperature sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check for loose connections on the air temperature sensor and the engine management control unit	Go to Step 7	Presence of loose connections Restore the correct connections	
7	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the continuity of the air temperature sensor wiring	Go to Step 8	Wiring faults	Restore the correct wiring

8	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the air temperature sensor wiring	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor Air temperature sensor wiring (short circuit to Vbatt or open circuit)	Check that the air temperature sensor is working properly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 10	Air temperature sensor not working properly	Replace the air temperature sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	Go to Step 11	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air	Check for loose connections on the air		Presence of	

	temperature sensor (signal interference)	temperature sensor and the engine management control unit	Go to Step 12	loose connections	Restore the correct connections
12	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (signal interference)	Check the continuity of the air temperature sensor wiring	Go to Step 13	Wiring faults	Restore the correct wiring
13	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor wiring (signal interference)	Check the correct insulation of the air temperature sensor wiring	Go to Step 14	Wiring insulation not correct	Restore the correct insulation of the wiring
14	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor Air temperature sensor wiring (signal interference)	Check that the air temperature sensor is working properly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 15	Air temperature sensor not working properly	Replace the air temperature sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Engine management control unit (signal interference)	Check that the engine management control unit is working properly	End of diagnosis	engine	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--	--	---	---------------------	--------	--

191 - Giulietta 1.4 Turbo MultiAir Intake Air Temperature Sensor 1 Circuit Range/Performance P0111

Test results AIR TEMPERATURE OK (NO COMPONENT **FAULT** 1 SENSOR **FAULTS** OPERATION **CONCERNED** DETECTED CONNECTION DETECTED) CHECK Check for loose Connections connections on on air the air temperature Presence of Restore the correct temperature Go to Step 2 loose sensor sensor and the connections (incorrect connections engine comparison management signal) control unit AIR OK (NO COMPONENT **TEMPERATURE** FAULT 2 **FAULTS OPERATION CONCERNED** DETECTED SENSOR DETECTED) **CHECK** Check that the air temperature sensor is working properly Air See Test Replace the air temperature Air temperature 1056BU CHECK sensor temperature sensor ON Go to Step 3 sensor not Op. 1056B54 INTAKE AIR (incorrect OPERATION OF working PRESSURE/TEMPERATURE comparison PRESSURE SENSOR - R.R. properly] signal) SENSOR AND/OR INTAKE AIR TEMPERATURE **SENSOR ENGINE** OK (NO COMPONENT **MANAGEMENT** FAULT 3 **FAULTS OPERATION** CONTROL CONCERNED DETECTED DETECTED) **UNIT CHECK** Check that the Incorrect Replace the engine Engine engine operation of management control unit management Move on to management engine control unit Op. 1056B82 Step 4 control unit is management INJECTION/IGNITION (incorrect working properly control unit SYSTEM E.C.U. (ONE) - R + comparison

	signal)				R
4	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air temperature sensor (signal out of tolerance)	Check for loose connections on the air temperature sensor and the engine management control unit	Go to Step 5	Presence of loose connections	Restore the correct connections
5	COMPONENT CONCERNED	AIR TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air temperature sensor (signal out of tolerance)	Check that the air temperature sensor is working properly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 6	Air temperature sensor not working properly	Replace the air temperature sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results WATER TEMPERATURE OK (NO COMPONENT **FAULT** 1 SENSOR **FAULTS** OPERATION **CONCERNED** DETECTED CONNECTION DETECTED) **CHECK** Check for loose connections on Connections on water the water Presence of Restore the correct temperature temperature Go to Step 2 loose sensor (short sensor and the connections connections circuit to engine GND) management control unit WATER OK (NO COMPONENT TEMPERATURE FAULT 2 **FAULTS** OPERATION **CONCERNED** SENSOR DETECTED DETECTED) CHECK Check that the water temperature Replace the water Water sensor is working Water temperature sensor temperature properly temperature Op. 1056B50 ENGINE sensor (short See Test 1056BC Go to Step 3 sensor not COOLANT circuit to Engine coolant working TEMPERATURE GND) properly temperature SENSOR - R + Rsensor operation <u>check</u> **ENGINE** OK (NO COMPONENT MANAGEMENT **FAULT** 3 **FAULTS OPERATION** CONCERNED CONTROL DETECTED DETECTED) UNIT CHECK Replace the engine Engine Check that the Incorrect management control unit management operation of engine Go to Step 4 control unit management engine Op. 1056B82 (short circuit to control unit is management INJECTION/IGNITION GND) control unit SYSTEM E.C.U. working properly (ONE) - R + RWATER 4 **OPERATION** TEMPERATURE OK (NO **COMPONENT SENSOR FAULTS FAULT**

	CONCERNED	CONNECTION CHECK	DETECTED)	DETECTED	
	Connections on water temperature sensor (short circuit to Vbatt or open circuit)	Check for loose connections on the water temperature sensor and the engine management control unit	Go to Step 5	Presence of loose connections	Restore the correct connections
5	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the continuity of the water temperature sensor wiring	Go to Step 6	Wiring faults	Restore the correct wiring
6	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the water temperature sensor wiring	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	•	Check that the water temperature sensor is working properly See Test 1056BC Engine coolant temperature sensor operation check	Go to Step 7	Water temperature sensor not working properly	Replace the water temperature sensor Op. 1056B50 ENGINE COOLANT TEMPERATURE SENSOR - R + R
		ENGINE			

8	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	Go to Step 8	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on water temperature sensor (signal interference)	Check for loose connections on the water temperature sensor and the engine management control unit	Go to Step 9	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (signal interference)	Check the continuity of the water temperature sensor wiring	Go to Step 10	Wiring faults	Restore the correct wiring
11	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (signal interference)	Check the correct insulation of the water temperature sensor wiring	Go to Step 11	Wiring insulation not correct	Restore the correct insulation of the wiring
12	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR	OK (NO FAULTS	FAULT DETECTED	OPERATION

		СНЕСК	DETECTED)		
	Water temperature sensor (signal interference)	Check that the water temperature sensor is working properly See Test 1056BC Engine coolant temperature sensor operation check	Go to Step 12	Water temperature sensor not working properly	Replace the water temperature sensor Op. 1056B50 ENGINE COOLANT TEMPERATURE SENSOR - R + R
13	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal interference)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	<u> </u>				
			Test results		
1	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on water temperature sensor (incorrect comparison signal)	Check for loose connections on the water temperature sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (incorrect comparison signal)	Check the continuity of the water temperature sensor wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (incorrect comparison signal)	Check the correct insulation of the water temperature sensor wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Water temperature sensor (incorrect comparison signal)	Check that the water temperature sensor is working properly See Test 1056BC Engine coolant temperature sensor operation check	Go to Step 5	Water temperature sensor not working properly	Replace the water temperature sensor Op. 1056B50 ENGINE COOLANT TEMPERATURE SENSOR - R + R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 6	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on water temperature sensor (signal out of tolerance)	Check for loose connections on the water temperature sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor wiring (signal out of tolerance)	Check the continuity of the water temperature sensor wiring	Go to Step 8	Wiring faults	Restore the correct wiring
8	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR	OK (NO FAULTS	FAULT DETECTED	OPERATION

		WIRING CHECK	DETECTED)		
	Water temperature sensor wiring (signal out of tolerance)	Check the correct insulation of the water temperature sensor wiring	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	WATER TEMPERATURE SENSOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Water temperature sensor (signal out of tolerance)	Check that the water temperature sensor is working properly See Test 1056BC Engine coolant temperature sensor operation check	Go to Step 10	Water temperature sensor not working properly	Replace the water temperature sensor Op. 1056B50 ENGINE COOLANT TEMPERATURE SENSOR - R + R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal out of tolerance)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ACCELERATOR PEDAL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on accelerator pedal (short circuit to Vbatt)	Check for the presence of loose connections on the accelerator pedal and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to Vbatt)	Check the continuity of the accelerator pedal wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to Vbatt)	Check the correct insulation of the accelerator pedal wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK ACCELERATOR PEDAL POTENTIOMETER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal potentiometer (short circuit to Vbatt)	Connect the diagnosis equipment to the engine management control unit and check that the accelerator pedal potentiometer is working properly	Go to Step 5	Accelerator pedal potentiometer not working properly	Replace the accelerator pedal Op. 1068A20 ACCELERATOR PEDAL WITH BUILT-IN POTENTIOMETER - R.R

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ACCELERATOR PEDAL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on accelerator pedal (short circuit to GND or open circuit)	Check for the presence of loose connections on the accelerator pedal and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to GND or open circuit)	Check the continuity of the accelerator pedal wiring	Go to Step 8	Wiring faults	Restore the correct wiring
8	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to GND or open circuit)	Check the correct insulation of the accelerator pedal wiring	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	CHECK ACCELERATOR PEDAL POTENTIOMETER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Connect the			Replace the accelerator

	Accelerator pedal potentiometer (short circuit to GND or open circuit)	diagnosis equipment to the engine management control unit and check that the accelerator pedal potentiometer is working properly	Go to Step	Accelerator pedal potentiometer not working properly	pedal Op. 1068A20 ACCELERATOR PEDAL WITH BUILT- IN POTENTIOMETER - R.R
10	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1		1		
			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body (short circuit to GND)	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the continuity of the throttle body wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the condition of the earth connections (earths not correctly tightened, oxidised or painted)	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the correct earths

5	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body (short circuit to GND)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body (short circuit to Vbatt or open circuit)	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 8	Presence of loose connections	Restore the correct connections
8	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt or open circuit)	Check the continuity of the throttle body wiring	Go to Step 9	Wiring faults	Restore the correct wiring
9	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check the correct		Wiring	

	wiring (short circuit to Vbatt or open circuit)	insulation of the throttle body wiring	Go to Step 10	insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt or open circuit)	Check the condition of the earth connections (earths not correctly tightened, oxidised or painted)	Go to Step 11	Incorrect tightening, oxidation or painting of earth connections	Restore the correct earths
11	COMPONENT CONCERNED	THROTTLE BODY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body (short circuit to Vbatt or open circuit)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 12	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1				
			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (voltage below threshold)	Check the continuity of the oxygen sensor wiring (signal cable swapping)	Go to Step 2	Faults in the continuity of the wiring	Restore the correct wiring
2	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (voltage below threshold)	Check the correct insulation of the oxygen sensor wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (voltage below threshold)	Check the condition of the earth connections	Go to Step 4	Poor earth connections	Restore the correct earth connections
4	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (voltage below threshold)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 5	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R

5	COMPONENT CONCERNED	UNIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (voltage below threshold)	Check the oil level inside the module See T UNIAIR MODULE OIL LEVEL CHECK	Move on to Step 20	Oil level low	Restore the correct oil level
6	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (voltage below threshold)	Check the condition of the MultiAir module inlet oil filter	Go to Step 7	Oil filter clogged	Replace the filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 8	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (signal not plausible)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 9	Presence of loose connections	Restore the correct connections
9	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Oxygen sensor wiring (signal not plausible)	Check the continuity of the oxygen sensor wiring (signal cable swapping)	Go to Step 10	Faults in the continuity of the wiring	Restore the correct wiring
10	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (signal not plausible)	Check the correct insulation of the oxygen sensor wiring (short circuit between signal cables)	Go to Step 11	Wiring insulation not correct	Restore the correct insulation of the wiring
11	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (signal not plausible)	Check for the presence of any seepage on the exhaust manifold	Go to Step 12	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
12	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal not plausible)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 13	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
13	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal not plausible)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation	Go to Step 14	Upstream oxygen sensor not working	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH

		of the upstream Lambda sensor		properly	CATALYTIC CONVERTER - R.R
14	COMPONENT CONCERNED	UNIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (signal not plausible)	Check the oil level inside the module See T UNIAIR MODULE OIL LEVEL CHECK	Go to Step 15	Oil level low	Restore the correct oil level
15	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (signal not plausible)	Check the condition of the MultiAir module inlet oil filter	Go to Step 16	Oil filter clogged	Replace the filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
16	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not plausible)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	I				
			Test results		
1	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold	Check for the presence of any seepage on the exhaust manifold	Go to Step 2	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
2	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 3	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
3	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 4	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1080B82 PARTICULATE FILTER DIFFERENTIAL PRESSURE (D.P.F.) SENSOR - R.R.
--	--------------------------------------	---	---------------------	---	--

	T				
			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (circuit resistance out of tolerance)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 2	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
2	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (circuit resistance out of tolerance)	Check that the Lambda sensor is working properly See Test 1080BD Check on the operation of the downstream Lambda sensor	Go to Step 3	Downstream oxygen sensor not working properly	Replace the downstream Lambda sensor Op. 1080B95 REAR LAMBDA SENSOR TO CATALYTIC CONVERTER - R.R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit resistance out of tolerance)	Check that the engine management control unit is working properly	Go to Step 4	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
4	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		CHECK	DETECTED)		
	Oxygen sensor connections (signal low)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 5	Presence of loose connections	Restore the correct connections
5	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (signal low)	Check the continuity of the oxygen sensor wiring (signal cable swapping)	Go to Step 6	Faults in the continuity of the wiring	Restore the correct wiring
6	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (signal low)	Check the correct insulation of the oxygen sensor wiring (short circuit to GND)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (signal low)	Check for the presence of any seepage on the exhaust manifold	Go to Step 8	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
8	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal low)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing.	Go to Step 9	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly

		Also check that it is correctly fitted.			
9	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal low)	Check that the Lambda sensor is working properly by performing the See Test 1080BD Check on the operation of the downstream Lambda sensor	Go to Step 10	Downstream oxygen sensor not working properly	Replace the downstream Lambda sensor Op. 1080B95 REAR LAMBDA SENSOR TO CATALYTIC CONVERTER - R.R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal low)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (signal locked high)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (signal locked high)	Check the continuity of the oxygen sensor wiring (signal	Go to Step 13	Faults in the continuity of the wiring	Restore the correct wiring

		cable swapping)			
13	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (signal locked high)	Check the correct insulation of the oxygen sensor wiring (short circuit to Vbatt)	Go to Step 14	Wiring insulation not correct	Restore the correct insulation of the wiring
14	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (signal locked high)	Check for the presence of any seepage on the exhaust manifold	Go to Step 15	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
15	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal locked high)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 16	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
16	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal locked high)	Check that the Lambda sensor is working properly See Test 1080BD Check on the operation of the downstream Lambda sensor	Go to Step 17	Downstream oxygen sensor not working properly	Replace the downstream Lambda sensor Op. 1080B95 REAR LAMBDA SENSOR TO CATALYTIC CONVERTER - R.R
		ENGINE	OK (NO		

1	.7	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Engine management control unit (signal locked high)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1				
			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the continuity of the oxygen sensor wiring (signal cable swapping)	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the correct insulation of the oxygen sensor wiring (short circuit to Vbatt)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor	Check that the Lambda sensor is working properly See Test 1080BD Check	Go to Step 5	Downstream oxygen sensor not	Replace the downstream Lambda sensor Op. 1080B95 REAR LAMBDA SENSOR

		on the operation of the downstream Lambda sensor		working properly	TO CATALYTIC CONVERTER - R.R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1	<u> </u>			
			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (short circuit to Vbatt)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to Vbatt)	Check the continuity of the oxygen sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to Vbatt)	Check the correct insulation of the oxygen sensor wiring (short circuit between conductors)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (short circuit to	Check that the Lambda sensor is working properly See Test 1080BD Check	Go to Step 5	Downstream oxygen sensor not	Replace the downstream Lambda sensor Op. 1080B95 REAR LAMBDA SENSOR

	Vbatt)	on the operation of the downstream Lambda sensor		working properly	TO CATALYTIC CONVERTER - R.R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to GND or open circuit)	Check the continuity of the oxygen sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to GND or open circuit)	Check the correct insulation of the oxygen sensor wiring (short circuit between conductors)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring

Ç	9	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Oxygen sensor (short circuit to GND or open circuit)	Check that the Lambda sensor is working properly See Test 1080BD Check on the operation of the downstream Lambda sensor	Go to Step 10	Downstream oxygen sensor not working properly	Replace the downstream Lambda sensor Op. 1056B95 INJECTOR CABLE LOOM - R.R.
1	0	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1	T			
			Test results		
1	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (incorrect comparison signal)	Check for the presence of any seepage on the exhaust manifold	Go to Step 2	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
2	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect comparison signal)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 3	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
3	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors (incorrect comparison signal)	Check for fuel seepage from the injectors	Go to Step 4	Injector seepage	Restore the correct operation of the injectors
4	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect comparison signal)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation	Go to Step 5	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC

		of the upstream Lambda sensor			<u>CONVERTER - R.R</u>
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (incorrect signal plausibility)	Check for the presence of any seepage on the exhaust manifold	Go to Step 7	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
7	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect signal plausibility)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 8	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
8	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors (incorrect signal plausibility)	Check for fuel seepage from the injectors	Go to Step 9	Injector seepage	Restore the correct operation of the injectors
9	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Oxygen sensor (incorrect signal plausibility)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 10	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect signal plausibility)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (signal out of tolerance)	Check for the presence of any seepage on the exhaust manifold	Go to Step 12	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
12	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal out of tolerance)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 13	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
13	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors	Check for fuel	Go to Step	Injector	Restore the correct

	(signal out of tolerance)	seepage from the injectors	14	seepage	operation of the injectors
14	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal out of tolerance)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 15	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal out of tolerance)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1	T			
			Test results		
1	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (incorrect comparison signal)	Check for the presence of any seepage on the exhaust manifold	Go to Step 2	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
2	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect comparison signal)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 3	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
3	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors (incorrect comparison signal)	Check for fuel seepage from the injectors	Go to Step 4	Injector seepage	Restore the correct operation of the injectors
4	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect comparison signal)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation	Go to Step 5	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC

		of the upstream Lambda sensor			CONVERTER - R.R
5	COMPONENT CONCERNED	UNIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (incorrect comparison signal)	Check the oil level inside the module See T UNIAIR MODULE OIL LEVEL CHECK	Go to Step 6	Oil level low	Restore the correct oil level
6	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (incorrect comparison signal)	Check the condition of the MultiAir module inlet oil filter	Go to Step 7	Oil filter clogged	Replace the oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 8	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (incorrect signal plausibility)	Check for the presence of any seepage on the exhaust manifold	Go to Step 9	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
9	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Oxygen sensor (incorrect signal plausibility)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 10	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
10	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors (incorrect signal plausibility) Check for fuel seepage from the injectors		Go to Step 11	Injector seepage	Restore the correct operation of the injectors
11	COMPONENT CONCERNED	LAMBDA SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (incorrect signal plausibility)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 12	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
12	COMPONENT CONCERNED	UNIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil level (incorrect signal plausibility)	Check the oil level inside the module See T UNIAIR MODULE OIL LEVEL CHECK	Go to Step 13	Oil level low	Restore the correct oil level
13	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Uniair module inlet oil filter (incorrect signal plausibility)	Check the condition of the MultiAir module inlet oil filter	Go to Step 14	Oil filter clogged	Replace the oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect signal plausibility)	Check that the engine management control unit is working properly	Go to Step 15	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	EXHAUST MANIFOLD CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Exhaust manifold (signal out of tolerance)	Check for the presence of any seepage on the exhaust manifold	Go to Step 16	Seepage on exhaust manifold	Restore the correct operation of the intake manifold
16	COMPONENT CONCERNED	OXYGEN SENSOR CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor (signal out of tolerance)	Check for the presence of any oil or oxidation on the sensitive element, or impact on the sensor casing. Also check the correct fitting	Go to Step 17	Sensor fouled, contaminated or not correctly fitted	Clean the sensor or fit it correctly
17	COMPONENT CONCERNED	INJECTOR SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors (signal out of tolerance)	Check for fuel seepage from the injectors	Go to Step 18	Injector seepage	Restore the correct operation of the injectors
18	COMPONENT	LAMBDA SENSOR	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	OPERATION CHECK	DETECTED)	DETECTED	
	Oxygen sensor (signal out of tolerance)	Check that the Lambda sensor is working properly See Test 1080BA Check on the operation of the upstream Lambda sensor	Move on to Step 19	Upstream oxygen sensor not working properly	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
19	COMPONENT CONCERNED	MULTIAIR MODULE OIL LEVEL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	MultiAir module oil level (signal out of tolerance)	Check the oil level inside the module See T UNIAIR MODULE OIL LEVEL CHECK	Move on to Step 20	Oil level low	Restore the correct oil level
20	COMPONENT CONCERNED	MULTIAIR MODULE INLET OIL FILTER CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	MultiAir module inlet oil filter (signal out of tolerance)	Check the condition of the MultiAir module inlet oil filter	Move on to Step 21	Oil filter clogged	Replace the oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
21	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal out of tolerance)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON UNIAIR MODULE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor (short circuit to GND)	Check for loose connections on the Uniair module engine oil temperature sensor and the engine management control unit	Go to Step 2	Loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK WIRING ON UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module engine oil temperature sensor wiring (short circuit to GND)	Check the correct insulation of the Uniair module engine oil temperature sensor wiring	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor (short circuit to GND)	Check the correct operation of the Uniair module engine oil temperature sensor	Go to Step 4	Incorrect operation of temperature sensor	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR MODULE OIL TEMPERATURE

					SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CHECK CONNECTIONS ON UNIAIR MODULE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor (short circuit to Vbatt or open circuit)	temperature sensor and the	Go to Step 6	Loose connections	Restore the correct connections
6	COMPONENT CONCERNED	CHECK WIRING ON UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module engine oil temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the Uniair module engine oil temperature sensor wiring	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	CHECK WIRING ON UNIAIR MODULE	OK (NO FAULTS	FAULT DETECTED	OPERATION

		ENGINE OIL TEMPERATURE SENSOR	DETECTED)		
	Uniair module engine oil temperature sensor wiring (short circuit to Vbatt or open circuit)	Check the continuity of the Uniair module engine oil temperature sensor wiring	Go to Step 8	Wiring faults	Restore the correct wiring
8	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor (short circuit to Vbatt or open circuit)	Check the correct operation of the Uniair module engine oil temperature sensor	Go to Step 9	Incorrect operation of temperature sensor	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR MODULE OIL TEMPERATURE SENSOR - R.R.
9	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Engine Oil Temperature Sensor Range/Performance P0196

			Test results				
1	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Uniair module inlet oil filter	Check the condition of the MultiAir module inlet oil filter	Go to Step 2	Oil filter clogged	Replace the filter [PR_1036F22]		
2	COMPONENT CONCERNED	OIL PUMP OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Oil pump	Check that the engine oil pump is working properly	Go to Step 3	Incorrect operation of the engine oil pump	Replace the engine oil pump		
3	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Uniair module oil temperature sensor	Check the correct operation of the Uniair module engine oil temperature sensor	Go to Step 4	Incorrect operation of temperature sensor	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR MODULE OIL TEMPERATURE SENSOR - R.R.		
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
					Replace the engine		

	Engine management control unit	Check that the engine management control unit is working properly	End of	operation of engine management	management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--	--------------------------------------	---	--------	--------------------------------	--

	1	1			
			Test results		
1	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (short circuit to GND)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 2	Loose connections	Restore the correct connections
2	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to GND)	Check continuity of injector wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to GND)	Check the insulation of the injector wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector (short circuit to GND)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 5	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (short circuit to Vbatt)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 7	Loose connections	Restore the correct connections
7	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check continuity of injector wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check the insulation of the injector wiring (short circuit to Vbatt)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Injector (short circuit to Vbatt)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 10	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (open circuit)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 12	Loose connections	Restore the correct connections
12	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check continuity of injector wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct wiring
13	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check the insulation of the injector wiring	Go to Step 14	Wiring insulation	Restore the correct insulation of the wiring

		(open circuit)		not correct	
14	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector (open circuit)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 15	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1			
		Test results		
COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Connections on injector (short circuit to GND)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 2	Loose connections	Restore the correct connections
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector wiring (short circuit to GND)	Check continuity of injector wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
3		Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector (short circuit to GND)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 5	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
	Connections on injector (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED	COMPONENT CONCERNED Connections on injector (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring (short circuit to GND)	COMPONENT CONCERNED INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) Connections on Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 COMPONENT CONCERNED INJECTOR OK (NO FAULTS DETECTED) COMPONENT CONCERNED INJECTOR OF AULTS DETECTED) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION Go to Step 5 Injector (short circuit to GND) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION	COMPONENT CONNECTION CHECK INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 Loose connections COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) FAULT DETECTED Linjector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 Wiring insulation not correct of EAULTS DETECTED COMPONENT CONCERNED INJECTOR OFERATION CHECK OK (NO FAULT DETECTED) FAULT DETECTED Cleck that the injector is working properly See Test (1056BA INJECTOR OPERATION) Go to Step 5 Injector not working correctly

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (short circuit to Vbatt)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 7	Loose connections	Restore the correct connections
7	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check continuity of injector wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check the insulation of the injector wiring (short circuit to Vbatt)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Injector (short circuit to Vbatt)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 10	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (open circuit)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 12	Loose connections	Restore the correct connections
12	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check continuity of injector wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct wiring
13	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check the insulation of the injector wiring	Go to Step 14	Wiring insulation	Restore the correct insulation of the wiring

		(open circuit)		not correct	
14	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector (open circuit)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 15	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1			
		Test results		
COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Connections on injector (short circuit to GND)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 2	Loose connections	Restore the correct connections
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector wiring (short circuit to GND)	Check continuity of injector wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
3		Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector (short circuit to GND)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 5	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
	Connections on injector (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED	COMPONENT CONCERNED Connections on injector (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring (short circuit to GND)	COMPONENT CONCERNED INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) Connections on Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 COMPONENT CONCERNED INJECTOR OK (NO FAULTS DETECTED) COMPONENT CONCERNED INJECTOR OF AULTS DETECTED) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION Go to Step 5 Injector (short circuit to GND) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION	COMPONENT CONNECTION CHECK INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 Loose connections COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) FAULT DETECTED Linjector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 Wiring insulation not correct of EAULTS DETECTED COMPONENT CONCERNED INJECTOR OFERATION CHECK OK (NO FAULT DETECTED) FAULT DETECTED Cleck that the injector is working properly See Test (1056BA INJECTOR OPERATION) Go to Step 5 Injector not working correctly

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (short circuit to Vbatt)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 7	Loose connections	Restore the correct connections
7	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check continuity of injector wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check the insulation of the injector wiring (short circuit to Vbatt)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Injector (short circuit to Vbatt)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 10	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (open circuit)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 12	Loose connections	Restore the correct connections
12	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check continuity of injector wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct wiring
13	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check the insulation of the injector wiring	Go to Step 14	Wiring insulation	Restore the correct insulation of the wiring

		(open circuit)		not correct	
14	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector (open circuit)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 15	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1			
		Test results		
COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Connections on injector (short circuit to GND)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 2	Loose connections	Restore the correct connections
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector wiring (short circuit to GND)	Check continuity of injector wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
3		Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
Injector (short circuit to GND)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 5	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
	Connections on injector (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED Injector wiring (short circuit to GND) COMPONENT CONCERNED	COMPONENT CONCERNED Connections on injector (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring Injector wiring (short circuit to GND) Component Concerned Injector wiring (short circuit to GND)	COMPONENT CONCERNED INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) Connections on Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) Injector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 COMPONENT CONCERNED INJECTOR OK (NO FAULTS DETECTED) COMPONENT CONCERNED INJECTOR OF AULTS DETECTED) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION Go to Step 5 Injector (short circuit to GND) Check that the injector is working properly See Test 1056BA INJECTOR OPERATION	COMPONENT CONNECTION CHECK INJECTOR CONNECTION CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Connections on injector (short circuit to GND) Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector Go to Step 2 Loose connections COMPONENT CONCERNED INJECTOR WIRING CHECK OK (NO FAULTS DETECTED) FAULT DETECTED Injector wiring (short circuit to GND) Check continuity of injector wiring of injector wiring (short circuit to GND) OK (NO FAULTS DETECTED) FAULT DETECTED Linjector wiring (short circuit to GND) Check the insulation of the injector wiring (short circuit to GND) Go to Step 4 Wiring insulation not correct of EAULTS DETECTED COMPONENT CONCERNED INJECTOR OFERATION CHECK OK (NO FAULT DETECTED) FAULT DETECTED Cleck that the injector is working properly See Test (1056BA INJECTOR OPERATION) Go to Step 5 Injector not working correctly

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (short circuit to Vbatt)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 7	Loose connections	Restore the correct connections
7	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check continuity of injector wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (short circuit to Vbatt)	Check the insulation of the injector wiring (short circuit to Vbatt)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Injector (short circuit to Vbatt)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 10	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	INJECTOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on injector (open circuit)	Check for loose electrical connections on the injector on the engine management control unit and at the vehicle isolating connector	Go to Step 12	Loose connections	Restore the correct connections
12	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check continuity of injector wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct wiring
13	COMPONENT CONCERNED	INJECTOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector wiring (open circuit)	Check the insulation of the injector wiring	Go to Step 14	Wiring insulation	Restore the correct insulation of the wiring

		(open circuit)		not correct	
14	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector (open circuit)	Check that the injector is working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 15	Injector not working correctly	Replace the injector Op. 1056B70 INJECTOR (ONE) - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMNT
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Connect the diagnosis equipment to the engine management control unit and check if overrevs occurred and for how long	Go to Step 2	Presence of overrevolutions	Instruct the customer in the correct use of the car
2	COMPONENT CONCERNED	TIMING BELT CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing belt	Check correct tensioning of the timing belt	Go to Step 3	Incorrect tensioning of the timing belt	Restore correct tensioning of the timing belt
3	COMPONENT CONCERNED	ENGINE TIMING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine timing	Check that the engine timing is correct	Go to Step 4	Timing not correct	Restore the correct timing
4	COMPONENT CONCERNED	CHECK CORRECT VALVE OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Valves	Check the condition and operation of the valves	End of diagnosis	Valves not working correctly	Restore correct valve operation

			Test results	_	
1	COMPONENT CONCERNED	ACCELERATOR PEDAL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal connections (short circuit to Vbatt)	Check for the presence of loose connections on the accelerator pedal and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to Vbatt)	Check the continuity of the accelerator pedal wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to Vbatt)	Check the correct insulation of the accelerator pedal wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK OPERATION OF ACCELERATOR PEDAL POTENTIOMETER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal potentiometer (short circuit to Vbatt)	Connect the diagnostic equipment to the engine management control unit and check that the accelerator pedal	Go to Step 5	Accelerator pedal potentiometer not working properly	Replace the accelerator pedal Op. 1068A20 ACCELERATOR PEDAL WITH BUILT-IN POTENTIOMETER

		potentiometer is working properly			<u>- R.R</u>
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ACCELERATOR PEDAL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the accelerator pedal and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to GND or open circuit)	Check the continuity of the accelerator pedal wiring	Go to Step 8	Wiring faults	Restore the correct wiring
8	COMPONENT CONCERNED	ACCELERATOR PEDAL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal wiring (short circuit to GND or open circuit)	Check the correct insulation of the accelerator pedal wiring	Go to Step 9	Wiring insulation not correct	Restore the correct insulation
9	COMPONENT CONCERNED		OK (NO FAULTS	FAULT DETECTED	OPERATION

		PEDAL POTENTIOMETER	DETECTED)		
	Accelerator pedal potentiometer (short circuit to Vbatt)	Connect the diagnostic equipment to the engine management control unit and check that the accelerator pedal potentiometer is working properly	Go to Step 10	Accelerator pedal potentiometer not working properly	Replace the accelerator pedal Op. 1068A20 ACCELERATOR PEDAL WITH BUILT-IN POTENTIOMETER - R.R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body connections (short circuit to GND)	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the continuity of the accelerator pedal wiring	Go to Step 3	Wiring faults	Restore the correct wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the correct insulation of the accelerator pedal wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to GND)	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
	COMPONENT	THROTTLE BODY	OK (NO	FAULT	

5	CONCERNED	OPERATION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Throttle body (short circuit to GND)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body (short circuit to Vbatt or open circuit)		Go to Step 8	Presence of loose connections	Restore the correct connections
8	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt or open circuit)	Check the continuity of the accelerator pedal wiring	Go to Step 9	Wiring faults	Restore the correct wiring
9	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Throttle body wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the accelerator pedal wiring	Go to Step 10	Wiring insulation not correct	Restore the correct insulation
10	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt or open circuit)	Check the condition of the earth connections on the throttle body wiring	Go to Step 11	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
11	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body (short circuit to Vbatt or open circuit)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 12	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	FUEL PUMP RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay connections (short circuit to GND)	Check for the presence of loose connections on the fuel pump relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	FUEL PUMP RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay wiring (short circuit to GND)	Check the correct insulation of the fuel pump relay (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	FUEL PUMP RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay (short circuit to GND)	Connect the diagnosis equipment to the engine management control unit and check that the "fuel pump relay" is working properly in active diagnosis	Go to Step 4	Fuel pump relay not working properly	Replace the fuel pump relay
		FUEL PUMP			

4	COMPONENT CONCERNED	RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay connections (short circuit to Vbatt)	Check for the presence of loose connections on the fuel pump relay and the engine management control unit	Go to Step 5	Presence of loose connections	Restore the correct connections
5	COMPONENT CONCERNED	FUEL PUMP RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay wiring (short circuit to Vbatt)	Check the correct insulation of the fuel pump relay (short circuit to Vbatt)	Go to Step 6	Wiring insulation not correct	Restore the correct insulation of the wiring
6	COMPONENT CONCERNED	FUEL PUMP RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay (short circuit to Vbatt)	Connect the diagnosis equipment to the engine management control unit and check that the "fuel pump relay" is working properly in active diagnosis	Go to Step 7	Fuel pump relay not working properly	Replace the fuel pump relay
7	COMPONENT CONCERNED	FUEL PUMP RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay connections	Check for the presence of loose connections on the fuel pump	Go to Step 8	Presence of loose	Restore the correct

	(open circuit)	relay and the engine management control unit		connections	connections
8	COMPONENT CONCERNED	FUEL PUMP RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay wiring (open circuit)	Check the correct continuity of the fuel pump relay wiring	Go to Step 9	Wiring faults	Restore the correct wiring
9	COMPONENT CONCERNED	FUEL PUMP RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel pump relay (open circuit)	Connect the diagnosis equipment to the engine management control unit and check that the "fuel pump relay" is working properly in active diagnosis	End of diagnosis	Fuel pump relay not working properly	Replace the fuel pump relay

			Test results		
1	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on supercharging pressure sensor (short circuit to Vbatt)	Check for loose connections on the supercharging pressure sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Supercharging pressure sensor wiring (short circuit to Vbatt)	Check the correct continuity of the supercharging pressure sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Supercharging pressure sensor wiring (short circuit to Vbatt)	Check the correct insulation of the supercharging pressure sensor wiring (short circuit to Vbatt)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
				Supercharging	Replace the

	Supercharging pressure sensor (short circuit to Vbatt)	Check that the supercharging pressure sensor is working properly	Go to Step 5	pressure sensor not working properly	turbocharging pressure sensor Op. 1056B44 AIR PRESSURE SENSOR - R + R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working correctly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on supercharging pressure sensor (short circuit to GND or open circuit)	Check for loose connections on the supercharging pressure sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	SUPERCHARGING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Supercharging pressure sensor wiring (short circuit to GND or open circuit)	Check the correct continuity of the supercharging pressure sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Supercharging pressure sensor wiring (short	Check the correct insulation of the supercharging pressure sensor	Go to Step 9	Wiring insulation not	Restore the correct insulation of the wiring

	circuit to GND or open circuit)	wiring (short circuit to GND)		correct	
9	COMPONENT CONCERNED SUPERCHARGING PRESSURE SENSOR OPERATION CHECK		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Supercharging pressure sensor (short circuit to GND or open circuit)	Check that the supercharging pressure sensor is working properly	Go to Step 10	Supercharging pressure sensor not working properly	Replace the turbocharging pressure sensor Op. 1056B44 AIR PRESSURE SENSOR - R + R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working correctly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Turbocharger/Supercharger Boost Sensor ""A"" Circuit Range/Performance" P0236

Test results OK (NO SUPERCHARGING COMPONENT **FAULT OPERATION** 1 AIR SUPPLY FAULTS CONCERNED **DETECTED** CIRCUIT CHECKS DETECTED) Restore the Presence of correct Check for leaks/damage Supercharging operation of leaks/damage on the End of on the air supply the supercharging air diagnosis supercharging circuit supercharging air supply supply circuit air supply circuit circuit

			Test results		
1	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on wastegate solenoid valve (short circuit to GND)	Check for loose connections on the supercharging pressure sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve wiring (short circuit to GND)	Check the correct insulation of the wastegate solenoid valve wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve (short circuit to GND)	Check that the wastegate solenoid valve is working properly See Test 1064BB TURBOCHARGING PRESSURE SOLENOID (PIERBURG) VALVE OPERATION CHECK	Go to Step 4	Wastegate solenoid valve not working properly	Replace the wastegate solenoid valve Op. 1064B38 WASTE GATE SUPERCHARGING PRESSURE ADJUSTMENT SOLENOID VALVE - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working correctly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on wastegate solenoid valve (short circuit to Vbatt)	Check for loose connections on the supercharging pressure sensor and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the wastegate solenoid valve wiring (short circuit to Vbatt)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve (short circuit to GND)	Check that the wastegate solenoid valve is working properly See Test 1064BB TURBOCHARGING PRESSURE SOLENOID (PIERBURG) VALVE OPERATION CHECK	Go to Step 8	Wastegate solenoid valve not working properly	Replace the wastegate solenoid valve Op. 1064B38 WASTE GATE SUPERCHARGING PRESSURE ADJUSTMENT SOLENOID VALVE - R.R.
8	COMPONENT	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	OPERATION CHECK	DETECTED)	DETECTED	
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working correctly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITIO SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on wastegate solenoid valve (open circuit)	Check for loose connections on the supercharging pressure sensor and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve wiring (open circuit)	Check the continuity of wastegate solenoid valve wiring	Go to Step 11	Faults in the continuity of the wiring	Restore the correct wiring
11	COMPONENT CONCERNED	WASTEGATE SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wastegate solenoid valve (open circuit)	Check that the wastegate solenoid valve is working properly See Test 1064BB TURBOCHARGING PRESSURE SOLENOID (PIERBURG) VALVE OPERATION CHECK	Go to Step 12	Wastegate solenoid valve not working properly	Replace the wastegate solenoid valve Op. 1064B38 WASTE GATE SUPERCHARGING PRESSURE ADJUSTMENT SOLENOID VALVE - R.R.
12	COMPONENT	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT	OPERATION

CONCERNED	OPERATION CHECK	DETECTED)	DETECTED	
Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working correctly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results WASTEGATE SOLENOID OK (NO **COMPONENT** FAULT 1 **FAULTS OPERATION** VALVE CONCERNED DETECTED CONNECTION DETECTED) CHECK Check for loose connections on the Connections Presence of supercharging Restore the correct on solenoid pressure sensor and Go to Step 2 loose connections the engine valve connections management control unit SUPERCHARGING OK (NO PRESSURE **COMPONENT** FAULT 2 SENSOR **FAULTS OPERATION CONCERNED** DETECTED DETECTED) OPERATION CHECK Replace the Supercharging Check that the turbocharging pressure pressure Supercharging supercharging sensor sensor not Go to Step 3 pressure sensor is pressure sensor Op. 1056B44 AIR working working properly PRESSURE SENSOR properly R + RTURBOCHARGER OK (NO **COMPONENT FAULT** 3 OPERATION **FAULTS** OPERATION **CONCERNED** DETECTED **CHECK** DETECTED) Replace the turbocharger Op. 1064A27 PIPE Check that the Turbocharger BETWEEN VACUUM turbocharger is Go to Step 4 not working RESERVOIR AND Turbocharger working properly properly **ACTUATOR** CONTROL **SOLENOID VALVE -**R.R. **ENGINE** OK (NO **COMPONENT FAULT MANAGEMENT** 4 **FAULTS OPERATION** CONCERNED DETECTED CONTROL UNIT DETECTED) OPERATION

	СНЕСК			Replace the engine
	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE OIL HEAT EXCHANGER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine oil heat exchanger	Check that the engine oil heat exchanger is working properly	Go to Step 2	The engine oil heat exchanger is not working properly	Replace the engine oil heat exchanger Op. 1084B36 ENGINE OIL FILTER MOUNTING AND HEAT EXCHANGER - R.R
2	COMPONENT CONCERNED	THERMOSTAT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine water thermostat	Check that the engine water thermostat is working properly	Go to Step 3	The engine water thermostat is not working properly	Replace the engine water thermostat Op. 1088C40 THERMOSTAT- R + R
3	COMPONENT CONCERNED	ENGINE WATER PUMP OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine water pump	Check that the engine water pump is working properly	Go to Step 4	The engine water pump is not working properly	Replace the engine water pump Op. 1088C14 WATER PUMP - R + R WITH TIMING BELT(S) REMOVED
4	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter	Check the condition of the MultiAir module	Go to Step 5	Oil filter clogged	Replace the filter Op. 1036F22 UNIAIR MODULE ENGINE

		inlet oil filter			OIL FILTER - R.R.
5	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor	Check that the Uniair module engine oil temperature sensor resistance is $10 \text{ k}\Omega$ at 25°C and $20 \text{ k}\Omega$ at 10° C	Go to Step 6	Sensor resistance different from the indicated values	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR MODULE OIL TEMPERATURE SENSOR - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

		1			
			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON COILS AND INJECTORS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coils and injectors	Check for the presence of loose connections on the coils, injectors and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check the condition of the wiring's insulation (possible short circuit to Vbatt of coil and/or injector control)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	FUEL PUMP OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Electric fuel pump	Check that the fuel pump is working correctly	Go to Step 5	The fuel pump is not working correctly	Replace the fuel pump Op. 1040A70 SUBMERGED PUMP ASSEMBLY COMPLETE WITH LEVEL GAUGE CONTROL - R + R

5	COMPONENT CONCERNED	FUEL QUALITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel	Check the quality of the fuel in the tank and check for the presence of water.	Go to Step 6	Fuel not compliant	Replace the fuel with fuel that is compliant
6	COMPONENT CONCERNED	CHECK FOR SEEPAGE IN INTAKE/EXHAUST MANIFOLDS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake/exhaust manifolds	Check for the presence of seepage in the intake/exhaust manifolds	Go to Step 7	Seepage in the intake/exhaust manifolds	Restore the correct operation of the intake/exhaust manifolds
7	COMPONENT CONCERNED	ENGINE COMPRESSION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine compression	Check the engine compression Op. 0520G15 COMPRESSION TEST - CHECK WITH EXAMINER WITH SPARK PLUGS/INJECTORS REMOVED	Go to Step 8	Insufficient engine compression	Go to Step 9
8	COMPONENT CONCERNED	ENGINE VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Valves	Check that the engine valves are perfectly sealed	Go to Step 9	Valve seal insufficient	Overhaul the cylinder head
9	COMPONENT CONCERNED	CYLINDER/PISTON RING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Cylinders/piston rings	Remove the cylinder head and check the wear condition of the cylinders/piston rings Op. 1016C10 SINGLE CYLINDER HEAD - R.R. AND	Go to Step 10	Cylinder/piston ring wear out of tolerance	Restore correct operating clearance

	COMPONENT	REPLACE GASKET RPM SENSOR	OK (NO	FAULT	
10	CONCERNED	POSITION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Rpm sensor	Check the position of the rpm sensor, rpm sensor/toothed wheel air gap, toothed wheel condition (possible impacts) and conformity of toothed wheel	Go to Step 11	Rpm sensor not correctly positioned/air gap too large	Restore the correct operation of the rpm sensor
11	COMPONENT CONCERNED	SPARK PLUG STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Spark plugs	Check the condition of the spark plugs (fouling by engine oil or unburnt fuel) and that they are working properly	Go to Step 12	Spark plugs fouled	Replace the spark plugs.
12	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injectors	Check that the injectors are working properly See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 13	Injectors not working properly	Replace the injectors Op. 1056B68 SET OF INJECTORS - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMENT
13	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coils	Check that the ignition coils are working correctly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL	Go to Step 14	Ignition coils not working properly	Replace the ignition coils Op. 5510C14 IGNITION COIL/S - R.R.

		RESISTANCE CHECK			
14	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON COILS AND INJECTORS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coils and injectors	Check for the presence of loose connections on the coils, injectors and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check the condition of the wiring's insulation (possible short circuit to Vbatt of coil and/or injector control)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	SPARK PLUG CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the			

	Spark plug	condition of the spark plugs (fouling by engine oil or unburnt fuel) and that they are working properly	Go to Step 5	Spark plug fouled	Replace the spark plug
5	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector	Check that the injectors are working properly by performing the Test_1056BA See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 6	Injectors not working properly	Replace the injectors Op. 1056B68 SET OF INJECTORS - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMENT
6	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coils	Check that the ignition coils are working correctly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	End of diagnosis	Ignition coils not working properly	Replace the ignition coils Op. 5510C14 IGNITION COIL/S - R.R.

			Test results	1	
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON COILS AND INJECTORS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coils and injectors	Check for the presence of loose connections on the coils, injectors and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check the condition of the wiring's insulation (possible short circuit to Vbatt of coil and/or injector control)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	SPARK PLUG CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the			

	Spark plug	condition of the spark plugs (fouling by engine oil or unburnt fuel) and that they are working properly	Go to Step 5	Spark plug fouled	Replace the spark plug
5	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector	Check that the injectors are working properly by performing the Test_1056BA See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 6	Injectors not working properly	Replace the injectors Op. 1056B68 SET OF INJECTORS - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMENT
6	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coils	Check that the ignition coils are working correctly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	End of diagnosis	Ignition coils not working properly	Replace the ignition coils Op. 5510C14 IGNITION COIL/S - R.R.

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON COILS AND INJECTORS	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coils and injectors	Check for the presence of loose connections on the coils, injectors and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check the condition of the wiring's insulation (possible short circuit to Vbatt of coil and/or injector control)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	SPARK PLUG CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the			

	Spark plug	condition of the spark plugs (fouling by engine oil or unburnt fuel) and that they are working properly	Go to Step 5	Spark plug fouled	Replace the spark plug
5	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector	Check that the injectors are working properly by performing the Test_1056BA See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 6	Injectors not working properly	Replace the injectors Op. 1056B68 SET OF INJECTORS - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMENT
6	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coils	Check that the ignition coils are working correctly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	End of diagnosis	Ignition coils not working properly	Replace the ignition coils Op. 5510C14 IGNITION COIL/S - R.R.

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON COILS AND INJECTORS	OK (NO FAULTS DETECTED)	FAULTS PAULT	
	Connections on coils and injectors	Check for the presence of loose connections on the coils, injectors and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK COIL AND INJECTOR WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil and injector wiring	Check the condition of the wiring's insulation (possible short circuit to Vbatt of coil and/or injector control)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	SPARK PLUG CONDITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the			

	Spark plug	condition of the spark plugs (fouling by engine oil or unburnt fuel) and that they are working properly	Go to Step 5	Spark plug fouled	Replace the spark plug
5	COMPONENT CONCERNED	INJECTOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Injector	Check that the injectors are working properly by performing the Test_1056BA See Test 1056BA INJECTOR OPERATION CHECK	Go to Step 6	Injectors not working properly	Replace the injectors Op. 1056B68 SET OF INJECTORS - R + R WITH FUEL MANIFOLD PIPE REMOVED - INCLUDES SEAL REPLACEMENT
6	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coils	Check that the ignition coils are working correctly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	End of diagnosis	Ignition coils not working properly	Replace the ignition coils Op. 5510C14 IGNITION COIL/S - R.R.

			Test results		
1	COMPONENT CONCERNED	KNOCK SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor connections	Check for loose connections on the knock sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	KNOCK SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor position	Check the position and correct tightening of the knock sensor	Go to Step 4	Knock sensor not correctly tightened/positioned	Restore the correct position/tightening of the knock sensor
4	COMPONENT CONCERNED	KNOCK SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor	Check whether the knock sensor is working properly	Go to Step 5	Knock sensor not working properly	Replace the knock sensor Op. 5510C42 DETONATION SENSOR (ONE) - R.R.
I	I .			I	

5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE RPM SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine rpm sensor connections	Check for loose connections on the engine rpm sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	ENGINE RPM SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine rpm sensor wiring	Check for breaks in the wiring continuity caused by oxidised or corroded terminals	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	ENGINE RPM SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine rpm sensor wiring	Check the correct insulation of the engine rpm sensor wiring (short circuit to Vbatt or to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK THE AIR GAP BETWEEN ENGINE RPM SENSOR AND TOOTHED WHEEL	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Air gap between engine rpm sensor and toothed wheel	Check the correct air gap between the engine rpm sensor and the toothed wheel	Go to Step 5	Incorrect air gap	Restore the correct air gap
5	COMPONENT CONCERNED			FAULT DETECTED	OPERATION
	Rpm sensor	Check that the engine rpm sensor is working properly See Test 5510CF RPM SIGNAL CHECK	Go to Step 6	Engine rpm sensor not working properly	Replace the engine rpm sensor Op. 5510C26 ENGINE RPM SENSOR - R+R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

		1			
			Test results		
1	COMPONENT CONCERNED	TIMING SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on timing sensor (short circuit to GND)	Check for loose connections on the timing sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	TIMING SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor wiring (short circuit to GND)	Check the correct insulation of the timing sensor wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	TAPPET COVER POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Tappet cover position (short circuit to GND)	Check the correct position of the tappet cover	Go to Step 4	Tappet cover not correctly positioned	Restore the correct position of the tappet cover
4	COMPONENT CONCERNED	TIMING SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor (short circuit to GND)	Check that the timing sensor is working properly	Go to Step 5	Timing sensor not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
		ENGINE			

5	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	TIMING SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on timing sensor (short circuit to Vbatt or open circuit)	Check for loose connections on the timing sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	TIMING SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the timing sensor wiring (short circuit to Vbatt)	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	TAPPET COVER POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Tappet cover position (short circuit to Vbatt or open circuit)	Check the correct position of the tappet cover	Go to Step 9	Tappet cover not correctly positioned	Restore the correct position of the tappet cover
9	COMPONENT CONCERNED	TIMING SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor			Timing	Replace the timing

	(short circuit to Vbatt or open circuit)	Check that the timing sensor is working properly	Go to Step 10	sensor not working properly	sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	TIMING SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on timing sensor (incorrect comparison signal)	Check for loose connections on the timing sensor and the engine management control unit	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	TIMING SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor wiring (incorrect comparison signal)	Check the correct insulation of the timing sensor wiring (short circuit to GND)	Go to Step 13	Wiring insulation not correct	Restore the correct insulation of the wiring
13	COMPONENT CONCERNED	TAPPET COVER POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Tappet cover position (incorrect comparison signal)	Check the correct position of the tappet cover	Go to Step 14	Tappet cover not correctly positioned	Restore the correct position of the tappet cover

14	COMPONENT CONCERNED	TIMING SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Timing sensor (incorrect comparison signal)	Check that the timing sensor is working properly	Go to Step 15	Timing sensor not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Ignition Coil ""A"" Primary/Secondary Circuit" P0351

			Test results		
1	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coil (short circuit to Vbatt)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to Vbatt)	Check the correct insulation of the ignition coil wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to Vbatt)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 4	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SUPPLY FUSE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coil supply fuse (short circuit to GND or open circuit)	Check that the ignition coil supply fuse is working properly	Go to Step 7	Fuse blown	Replace the fuse and find out what caused the malfunction
7	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the correct insulation of the ignition coil wiring (short circuit to GND)	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the continuity of the ignition coil wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct wiring
		IGNITION COIL	OK (NO		

9	COMPONENT CONCERNED	OPERATION CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to GND or open circuit)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 10	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Ignition Coil ""B"" Primary/Secondary Circuit" P0352

			Test results		
1	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coil (short circuit to Vbatt)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to Vbatt)	Check the correct insulation of the ignition coil wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to Vbatt)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 4	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SUPPLY FUSE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coil supply fuse (short circuit to GND or open circuit)	Check that the ignition coil supply fuse is working properly	Go to Step 7	Fuse blown	Replace the fuse and find out what caused the malfunction
7	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the correct insulation of the ignition coil wiring (short circuit to GND)	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the continuity of the ignition coil wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct wiring
		IGNITION COIL	OK (NO		

9	COMPONENT CONCERNED	OPERATION CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to GND or open circuit)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 10	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Ignition Coil ""C"" Primary/Secondary Circuit" P0353

			Test results		
1	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coil (short circuit to Vbatt)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to Vbatt)	Check the correct insulation of the ignition coil wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to Vbatt)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 4	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SUPPLY FUSE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coil supply fuse (short circuit to GND or open circuit)	Check that the ignition coil supply fuse is working properly	Go to Step 7	Fuse blown	Replace the fuse and find out what caused the malfunction
7	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the correct insulation of the ignition coil wiring (short circuit to GND)	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the continuity of the ignition coil wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct wiring
		IGNITION COIL	OK (NO		

9	COMPONENT CONCERNED	OPERATION CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to GND or open circuit)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 10	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Ignition Coil ""D"" Primary/Secondary Circuit" P0354

			Test results		
1	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on coil (short circuit to Vbatt)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to Vbatt)	Check the correct insulation of the ignition coil wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	IGNITION COIL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to Vbatt)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 4	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	IGNITION COIL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the coil and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SUPPLY FUSE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition coil supply fuse (short circuit to GND or open circuit)	Check that the ignition coil supply fuse is working properly	Go to Step 7	Fuse blown	Replace the fuse and find out what caused the malfunction
7	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the correct insulation of the ignition coil wiring (short circuit to GND)	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	IGNITION COIL WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil wiring (short circuit to GND or open circuit)	Check the continuity of the ignition coil wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct wiring
		IGNITION COIL	OK (NO		

9	COMPONENT CONCERNED	OPERATION CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Coil (short circuit to GND or open circuit)	Check that the ignition coil is working properly See Test 5510CI CHECK ON OPERATION OF IGNITION COILS And See Test 5510OB IGNITION COIL RESISTANCE CHECK	Go to Step 10	Ignition coil not working properly	Replace the timing sensor Op. 1056B51 CAM ANGLE SENSOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results **EXHAUST** OK (NO COMPONENT **FAULT** 1 MANIFOLD FAULTS **OPERATION** CONCERNED **DETECTED** CHECK DETECTED) Check for the Restore the Seepage on Exhaust presence of correct Go to Step 2 exhaust manifold seepage on the operation of the manifold exhaust manifold intake manifold **OXYGEN** OK (NO COMPONENT **SENSOR FAULT** 2 FAULTS **OPERATION** CONCERNED POSITION DETECTED DETECTED) CHECK Restore the Check that the Incorrect oxygen sensor is correct position oxygen sensor Oxygen sensor Go to Step 3 properly of the oxygen position positioned sensor **ENGINE** MANAGEMENT OK (NO COMPONENT CONTROL **FAULT** 3 FAULTS **OPERATION** CONCERNED **UNIT DETECTED** DETECTED) **CALIBRATION** CHECK Connect the diagnosis Carry out the equipment and Engine correct check if the management calibration of Calibration not engine Go to Step 4 control unit updated the engine management calibration management control unit has control unit been correctly calibrated LAMBDA OK (NO COMPONENT **SENSOR FAULT** 4 **OPERATION** FAULTS CONCERNED **OPERATION DETECTED** DETECTED) CHECK Replace the Lambda sensor Check that the Lambda sensor is Op. 1080B94 working properly Upstream FRONT

	Oxygen sensor	See Test 1080BA Check on the operation of the upstream Lambda sensor	Go to Step 5	oxygen sensor not working	LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
5	COMPONENT CONCERNED	CATALYTIC CONVERTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Catalytic converter	Check that the catalytic converter is working properly	End of diagnosis	Catalytic converter not working properly	Replace the catalytic converter Op. 1080B62 CATALYTIC CONVERTER - R + R

			Test results		
1	COMPONENT CONCERNED	CANISTER SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on canister solenoid valve (short circuit to GND)	Check for the presence of loose connections on the canister solenoid valve and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CANISTER SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve wiring (short circuit to GND)	Check the correct insulation of the canister solenoid valve wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	CANISTER SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve (short circuit to GND)	Check that the canister solenoid valve is working correctly	Go to Step 4	Canister solenoid valve not working correctly	Replace the canister solenoid valve Op. 1080E28 PIPE FROM ACTIVE CHARCOAL FILTER TO SOLENOID - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CANISTER SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on canister solenoid valve (short circuit to Vbatt)	Check for the presence of loose connections on the canister solenoid valve and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	CANISTER SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the canister solenoid valve wiring (short circuit to GND)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	CANISTER SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve (short circuit to Vbatt)	Check that the canister solenoid valve is working correctly	Go to Step 8	Canister solenoid valve not working correctly	Replace the canister solenoid valve Op. 1080E28 PIPE FROM ACTIVE CHARCOAL FILTER TO SOLENOID - R.R.
		ENGINE MANAGEMENT			

8	COMPONENT CONCERNED	CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	CANISTER SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on canister solenoid valve (open circuit)	Check for the presence of loose connections on the canister solenoid valve and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	CANISTER SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve wiring (open circuit)	Check the continuity of the canister solenoid valve wiring	Go to Step 11	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	CANISTER SOLENOID VALVE OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Canister solenoid valve (open circuit)	Check that the canister solenoid valve is working correctly	Go to Step 12	Canister solenoid valve not working correctly	Replace the canister solenoid valve Op. 1080E28 PIPE FROM ACTIVE CHARCOAL FILTER TO SOLENOID - R.R.
		ENGINE MANAGEMENT			

12	COMPONENT CONCERNED	CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results BODY OK (NO **COMPONENT FAULT** 1 FAULTS OPERATION COMPUTER CONCERNED DETECTED CHECK DETECTED) Connect the diagnosis equipment to Presence of Continue as the Body End of errors in the instructed by Body Computer Computer **Body Computer** the diagnostic diagnosis control unit and equipment control unit check whether there are errors.

	¥	1			
			Test results		
1	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (short circuit to GND)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (short circuit to GND)	Check the correct insulation of the solenoid valve relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (short circuit to GND)	Check that the solenoid valve relay is working correctly	Go to Step 4	Solenoid valve relay not working properly	Replace the solenoid valve relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine	Check that the		Engine	Replace the engine management control

	management control unit (short circuit to GND)	engine management control unit is working properly	Go to Step 5	management control unit not working properly	unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	SOLENOID VALVE RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (short circuit to Vbatt)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (short circuit to Vbatt)	Check the correct insulation of the solenoid valve relay wiring (short circuit to Vbatt)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (short circuit to Vbatt)	Check that the solenoid valve relay is working correctly	Go to Step 8	Solenoid valve relay not working properly	Replace the solenoid valve relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to	Check that the engine management control unit is	Go to Step 9	Engine management control unit not working	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION

	Vbatt)	working properly		properly	SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	SOLENOID VALVE RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (open circuit)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (open circuit)	Check the continuity of the solenoid valve relay wiring	Go to Step 11	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (open circuit)	Check that the solenoid valve relay is working correctly	Go to Step 12	Solenoid valve relay not working properly	Replace the solenoid valve relay
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

		T			
			Test results		
1	COMPONENT CONCERNED	SOLENOID VALVE RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (short circuit to GND)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (short circuit to GND)	Check the correct insulation of the solenoid valve relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (short circuit to GND)	Check that the solenoid valve relay is working correctly	Go to Step 4	Solenoid valve relay not working properly	Replace the solenoid valve relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine	Check that the		Engine	Replace the engine management control

	management control unit (short circuit to GND)	engine management control unit is working properly	Go to Step 5	management control unit not working properly	unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	SOLENOID VALVE RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (short circuit to Vbatt)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (short circuit to Vbatt)	Check the correct insulation of the solenoid valve relay wiring (short circuit to Vbatt)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (short circuit to Vbatt)	Check that the solenoid valve relay is working correctly	Go to Step 8	Solenoid valve relay not working properly	Replace the solenoid valve relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to	Check that the engine management control unit is	Go to Step 9	Engine management control unit not working	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION

	Vbatt)	working properly		properly	SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	SOLENOID VALVE RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on solenoid valve relay (open circuit)	Check for the presence of loose connections on the solenoid valve relay and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	SOLENOID VALVE RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay wiring (open circuit)	Check the continuity of the solenoid valve relay wiring	Go to Step 11	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	SOLENOID VALVE RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Solenoid valve relay (open circuit)	Check that the solenoid valve relay is working correctly	Go to Step 12	Solenoid valve relay not working properly	Replace the solenoid valve relay
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results				
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT AND ABS CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Connections on engine management control unit and ABS control unit	Check for the presence of loose connections on the ABS control unit and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections		
2	COMPONENT CONCERNED	CHECK CAN LINE CONTINUITY BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND ABS CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	CAN line between ABS control unit and engine management control unit	Check CAN line continuity between engine management control unit and ABS control unit	Go to Step 3	Incorrect CAN line continuity	Restore the correct continuity of the CAN line		
3	COMPONENT CONCERNED	ABS CONTROL UNIT ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	ABS control unit	Connect the diagnostic equipment to the ABS control unit and check for the presence of errors	Go to Step 4	Presence of errors in the ABS control unit	Continue as instructed by the diagnostic equipment		

4	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer	Connect the diagnostic instrument to the Body Computer and check for errors	End of diagnosis	Errors present in the Body Computer	Continue as instructed by the diagnostic equipment

	T .				
			Test results		
1	COMPONENT CONCERNED	BRAKE PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on brake pedal switch (open circuit)	Check for the presence of loose connections on the brake pedal switch and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (open circuit)	Check the continuity of the brake pedal switch wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (open circuit)	Check the correct insulation of the brake pedal wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	BRAKE PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (open circuit)	Check that the brake pedal switch is in the correct position	Go to Step 5	Brake pedal switch is in the wrong position	Restore the correct position of the brake pedal switch
		BRAKE PEDAL			

5	COMPONENT CONCERNED	SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (open circuit)	Connect the diagnosis equipment to the engine management control unit and check the brake pedal condition parameter	Go to Step 6	Brake pedal switch is not working correctly	Replace the brake pedal switch Op. 1056B28 SWITCH ON BRAKE PEDAL - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	Go to Step 7	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	BRAKE PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on brake pedal switch (incorrect comparison signal)	Check for the presence of loose connections on the brake pedal switch and the engine management control unit	Go to Step 8	Presence of loose connections	Restore the correct connections
8	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (incorrect comparison signal)	Check the continuity of the brake pedal switch wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct wiring

9	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (incorrect comparison signal)	Check the correct insulation of the brake pedal wiring	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	BRAKE PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (incorrect comparison signal)	Check that the brake pedal switch is in the correct position	Go to Step 11	Brake pedal switch is in the wrong position	Restore the correct position of the brake pedal switch
11	COMPONENT CONCERNED	BRAKE PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (incorrect comparison signal)	Connect the diagnosis equipment to the engine management control unit and check the brake pedal condition parameter	Go to Step 12	Brake pedal switch is not working correctly	Replace the brake pedal switch Op. 1056B28 SWITCH ON BRAKE PEDAL - R.R.
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 13	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
	COMPONENT	BRAKE PEDAL SWITCH	OK (NO	FAULT	

13	CONCERNED	CONNECTION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Connections on brake pedal switch (signal out of tolerance)	Check for the presence of loose connections on the brake pedal switch and the engine management control unit	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (signal out of tolerance)	Check the continuity of the brake pedal switch wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct wiring
15	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (signal out of tolerance)	Check the correct insulation of the brake pedal wiring	Go to Step 16	Wiring insulation not correct	Restore the correct insulation of the wiring
16	COMPONENT CONCERNED	BRAKE PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (signal out of tolerance)	Check that the brake pedal switch is in the correct position	Go to Step 17	Brake pedal switch is in the wrong position	Restore the correct position of the brake pedal switch
17	COMPONENT CONCERNED	BRAKE PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (signal out of tolerance)	Connect the diagnosis equipment to the engine management control unit and	Go to Step 18	Brake pedal switch is not working correctly	Replace the brake pedal switch Op. 1056B28 SWITCH ON BRAKE PEDAL -

		check the brake pedal condition parameter			<u>R.R.</u>
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal out of tolerance)	Check that the engine management control unit is working properly	Move on to Step 19	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
19	COMPONENT CONCERNED	BRAKE PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on brake pedal switch (signal not valid)	Check for the presence of loose connections on the brake pedal switch and the engine management control unit	Move on to Step 20	Presence of loose connections	Restore the correct connections
20	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (signal not valid)	Check the continuity of the brake pedal switch wiring	Move on to Step 21	Faults in the continuity of the wiring	Restore the correct wiring
21	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch wiring (signal not valid)	Check the correct insulation of the brake pedal wiring	Go to Step 22	Wiring insulation not correct	Restore the correct insulation of the wiring

22	COMPONENT CONCERNED	BRAKE PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (signal not valid)	Check that the brake pedal switch is in the correct position	Go to Step 23	Brake pedal switch is in the wrong position	Restore the correct position of the brake pedal switch
23	COMPONENT CONCERNED	BRAKE PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake pedal switch (signal not valid)	Connect the diagnosis equipment to the engine management control unit and check the brake pedal condition parameter	Go on to Step 24	Brake pedal switch is not working correctly	Replace the brake pedal switch Op. 1056B28 SWITCH ON BRAKE PEDAL - R.R.
24	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results				
1	COMPONENT CONCERNED	STARTER SIGNAL FUSE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Starter signal fuse	Check the condition of the fuse F 033 - 20 A - in the engine compartment junction unit	Go to Step 2	Fuse F03 fault	Restore the correct operation of fuse F03 (find out the cause of malfunction)		
2	COMPONENT CONCERNED	CHECK USING DIAGNOSTIC EQUIPMENT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit	Connect the diagnosis equipment to the engine management control unit and check if parameter "Start&Stop function request" is ON (the control has been performed)	Go to Step 3	Parameter OFF	Relay T20 wiring check		
3	COMPONENT CONCERNED	RELAY T20 CHECK STARTING ENABLEMENT RELAY	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Starting enablement relay	Check that the starting enablement relay T20 is working correctly	Go to Step 4	The starting enablement relay T20 is not working correctly	Replace the relay T20		
4	COMPONENT CONCERNED	CHECK THE ELECTRICAL CONNECTIONS FOR THE POWER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		

		SUPPLY WIRING + 30			
	Start&Stop starting wiring	Check for the presence of a short circuit to earth on the supply line +30 See E5010 STARTING AND RECHARING	Go to Step 5	Presence of short circuit to earth	Restore insulation to earth
5	COMPONENT CONCERNED	CHECK THE ELECTRICAL CONNECTIONS FOR THE POWER SUPPLY WIRING + 30	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Start&Stop starting wiring	Check for the presence of an open circuit on the supply line +30 See E5010 STARTING AND RECHARING	Go to Step 6	Presence of open circuit	Restore circuit to correct operation
6	COMPONENT CONCERNED	CHECK THE ELECTRICAL CONNECTIONS FOR THE CONTROL SUPPLY WIRING +50	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Start&Stop starting wiring	Check for the presence of a short circuit to earth on the supply line +50 See E5010 STARTING AND RECHARING	Go to Step 7	Presence of short circuit to earth	Restore insulation to earth
7	COMPONENT CONCERNED	CHECK THE ELECTRICAL CONNECTIONS FOR THE CONTROL SUPPLY	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		WIRING +50			
	Start&Stop starting wiring	Check for the presence of an open circuit on the supply line +50 See E5010 STARTING AND RECHARING	Go to Step 7	Presence of open circuit	Restore circuit to correct operation
8	COMPONENT CONCERNED	ELECTRICAL CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Start&Stop starting wiring	Check for the presence of a short circuit to Vbatt on the feedback wiring for relays T20 and T10 connected to pin 72 of the engine management control unit See E5030 PETROL ENGINES ELECTRONIC MANAGEMENT	End of diagnosis	Presence of a short circuit to Vbatt on the feedback wiring	Replace the engine management control unit wiring, car side

			Test results		
1	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oil pressure switch connections	Check for the presence of loose connections on the oil pressure switch and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	OIL PRESSURE SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oil pressure switch wiring	Check the continuity of the oil pressure switch wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	OIL PRESSURE SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oil pressure switch wiring	Check the correct insulation of the oil pressure switch wiring (short circuit to Vbatt)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	OIL PRESSURE SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oil pressure switch	Check that the oil pressure switch is working correctly	Go to Step 5	The oil pressure switch is not working	Replace the oil pressure switch Op. 1084A42 ENGINE OIL PRESSURE

				correctly	WARNING LIGHT SWITCH - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "A/C Refrigerant Pressure Sensor ""A"" Circuit" P0530

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON AIR CONDITIONING PRESSURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air conditioning pressure sensor (short circuit to Vbatt)	Check for loose connections on the air conditioning pressure sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	AIR CONDITIONING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning pressure sensor wiring (short circuit to Vbatt)	Check the correct continuity of the air conditioning pressure sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	AIR CONDITIONING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning pressure sensor wiring (short circuit to Vbatt)	Check the correct insulation of the air conditioning pressure sensor wiring (short circuit to Vbatt)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
		AIR			

4	COMPONENT CONCERNED	CONDITIONING PRESSURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check that the air conditioning pressure sensor is working properly See Test 5040BA	Move on to Step 5	The air conditioning pressure sensor is not working properly	Replace the air conditioning pressure sensor Op. 5040B20 AIR CONDITIONING LINEAR PRESSURE TRANSDUCER - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	CHECK CONNECTIONS ON AIR CONDITIONING PRESSURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air conditioning pressure sensor (short circuit to GND or open circuit)	Check for loose connections on the air conditioning pressure sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	AIR CONDITIONING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning	Check the correct continuity of the		Faults in the	

	pressure sensor wiring (short circuit to GND or open circuit)	air conditioning pressure sensor wiring	Go to Step 8	continuity of the wiring	Restore the correct wiring
8	COMPONENT CONCERNED	AIR CONDITIONING PRESSURE SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning pressure sensor wiring (short circuit to GND or open circuit)	Check the correct insulation of the air conditioning pressure sensor wiring (short circuit to GND)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	AIR CONDITIONING PRESSURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning pressure sensor (short circuit to GND or open circuit)	Check that the air conditioning pressure sensor is working properly See Test 5040BA	Go to Step 10	The air conditioning pressure sensor is not working properly	Replace the air conditioning pressure sensor Op. 5040B20 AIR CONDITIONING LINEAR PRESSURE TRANSDUCER - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON BRAKE SERVO VACUUM SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on brake servo vacuum sensor (short circuit to Vbatt)	Check for loose connections on the brake servo vacuum sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	BRAKE SERVO VACUUM SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake servo vacuum sensor wiring (short circuit to Vbatt)	Check the correct insulation of the brake servo vacuum sensor wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	BRAKE SERVO VACUUM SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake servo vacuum sensor (short circuit to Vbatt)	Connect the diagnosis equipment to the engine management control unit and check the parameter "brake servo vacuum switch"	Go to Step 4	The brake servo vacuum switch is not working correctly	Replace the brake servo vacuum sensor Op. 5520D02 VACUUM SENSOR OF BRAKE SERVO - R.R.
		ENGINE			

4	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CHECK CONNECTIONS ON BRAKE SERVO VACUUM SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on brake servo vacuum sensor (short circuit to GND or open circuit)	Check for loose connections on the brake servo vacuum sensor and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	BRAKE SERVO VACUUM SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake servo vacuum sensor wiring (short circuit to GND or open circuit)	Check the correct insulation of the brake servo vacuum sensor wiring (short circuit to GND)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	BRAKE SERVO VACUUM SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake servo vacuum sensor wiring (short circuit to GND or open circuit)	Check the continuity of the brake servo vacuum sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
	1				

8	COMPONENT CONCERNED	BRAKE SERVO VACUUM SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Brake servo vacuum sensor (short circuit to GND or open circuit)	Connect the diagnosis equipment to the engine management control unit and check the parameter "brake servo vacuum switch"	Go to Step 9	The brake servo vacuum switch is not working correctly	Replace the brake servo vacuum sensor Op. 5520D02 VACUUM SENSOR OF BRAKE SERVO - R.R.
9	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	BATTERY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connection on battery and alternator (voltage below threshold)	Check for the presence of loose connections on the battery and alternator and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	STARTING WIRING CONTINUITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starting wiring (voltage below threshold)	Check for breaks in the wiring continuity caused by oxidised or corroded terminals See E5010 STARTING AND RECHARING	Go to Step 3	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	BATTERY CHARGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (voltage below threshold)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 4	Battery voltage low	Recharge/replace the battery
4	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check that the alternator is			

	Alternator (voltage below threshold)	working correctly See Test 5530AB ALTERNATOR OPERATION CHECK	Go to Step 5	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	BATTERY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on battery and alternator (voltage above threshold)	Check for the presence of loose connections on the battery and alternator and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	STARTING WIRING CONTINUITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starting wiring (voltage above threshold)	Check for breaks in the wiring continuity caused by oxidised or corroded terminals See E5010 STARTING AND RECHARING	Go to Step 8	Breaks in the continuity of the wiring	Restore the correct continuity for the wiring
8	COMPONENT CONCERNED	BATTERY CHARGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Battery (voltage above	Check the battery charge using the Midtronics	Go to Step	Excessive battery	Go to Step 9
9	threshold) COMPONENT	ALTERNATOR OPERATION	OK (NO FAULTS	voltage FAULT	OPERATION
	CONCERNED	CHECK Check that the	DETECTED)	DETECTED	OI LIVATION
	Alternator (voltage above threshold)	alternator is working correctly See Test 5530AB ALTERNATOR OPERATION CHECK	Go to Step 10	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Cruise Control Multi-Function Input ""A"" Circuit" P0564

			Test results			
1	COMPONENT CONCERNED	CHECK CAN LINE CONTINUITY BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND STEERING COLUMN SWITCH UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	CAN line between steering column switch unit and engine management control unit (short circuit to Vbatt)	Check CAN line continuity between engine management control unit and steering column switch unit	Go to Step 2	Faults on CAN line	Restore the correct continuity of the CAN line	
2	COMPONENT CONCERNED	CRUISE CONTROL LEVER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Cruise Control lever (short circuit to Vbatt)	Connect the diagnostic equipment to the engine management control unit and check the correct operation of the Cruise Control lever	Go to Step 3	The Cruise Control lever is not working properly	Replace the cruise control lever Op. 5580A10	
3	COMPONENT CONCERNED	BODY COMPUTER ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Body Computer	Connect the diagnostic		Errors present	Continue as	

	(short circuit to Vbatt)	instrument to the Body Computer and check for errors	Go to Step 4	in the Body Computer	instructed by the diagnostic equipment
4	COMPONENT CONCERNED	CHECK CAN LINE CONTINUITY BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND STEERING COLUMN SWITCH UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN line between steering column switch unit and engine management control unit (incorrect comparison signal)	Check CAN line continuity between engine management control unit and steering column switch unit	Go to Step 2	Faults on CAN line	Restore the correct continuity of the CAN line
5	COMPONENT CONCERNED	CRUISE CONTROL LEVER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Cruise Control lever (incorrect comparison signal)	Connect the diagnostic equipment to the engine management control unit and check the correct operation of the Cruise Control lever	Go to Step 6	The Cruise Control lever is not working properly	Replace the cruise control lever Op. 5580A10
6	COMPONENT CONCERNED	BODY COMPUTER ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect comparison signal)	Connect the diagnostic instrument to the Body Computer and check for errors	Go to Step 7	Errors present in the Body Computer	Continue as instructed by the diagnostic equipment

7	COMPONENT CONCERNED	CHECK CAN LINE CONTINUITY BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND STEERING COLUMN SWITCH UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check CAN line continuity between engine management control unit and steering column switch unit	Go to Step 8	Faults on CAN line	Restore the correct continuity of the CAN line
8	COMPONENT CONCERNED	CRUISE CONTROL LEVER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Cruise Control lever (message missing)	Connect the diagnostic equipment to the engine management control unit and check the correct operation of the Cruise Control lever	Go to Step 9	The Cruise Control lever is not working properly	Replace the cruise control lever Op. 5580A10
9	COMPONENT CONCERNED	BODY COMPUTER ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (message missing)	Connect the diagnostic instrument to the Body Computer and check for errors	Go to Step 10	Errors present in the Body Computer	Continue as instructed by the diagnostic equipment
		CHECK CAN LINE CONTINUITY BETWEEN			

10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT AND STEERING COLUMN SWITCH UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN line between steering column switch unit and engine management control unit (incorrect operation)	Check CAN line continuity between engine management control unit and steering column switch unit	Go to Step 11	Faults on CAN line	Restore the correct continuity of the CAN line
11	COMPONENT CONCERNED	CRUISE CONTROL LEVER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Cruise Control lever (incorrect operation)	Connect the diagnostic equipment to the engine management control unit and check the correct operation of the Cruise Control lever	Go to Step 12	The Cruise Control lever is not working properly	Replace the cruise control lever Op. 5580A10
12	COMPONENT CONCERNED	BODY COMPUTER ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect operation)	Connect the diagnostic instrument to the Body Computer and check for errors	End of diagnosis	Errors present in the Body Computer	Continue as instructed by the diagnostic equipment

Test results BODY OK (NO COMPONENT COMPUTER **FAULT** 1 **FAULTS** OPERATION CONCERNED DETECTED **ERROR** DETECTED) **CHECK** Connect the diagnostic Continue as Errors present instrument to End of instructed by **Body Computer** in the Body the diagnostic the Body diagnosis Computer Computer and equipment check for errors

191 - Giulietta 1.4 Turbo MultiAir "Cruise Control Multi-Function Input ""A"" Circuit Range/Performance" P0579

			Test results		
1	COMPONENT CONCERNED	BODY COMPUTER ERROR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer	Connect the diagnostic instrument to the Body Computer and check for errors	End of diagnosis	Errors present in the Body Computer	Continue as instructed by the diagnostic equipment

191 - Giulietta 1.4 Turbo MultiAir Internal Control Module Memory Check Sum Error P0601

Test results **ENGINE** MANAGEMENT OK (NO COMPONENT CONTROL **FAULT** OPERATION 1 **FAULTS** CONCERNED DETECTED UNIT DETECTED) **OPERATION CHECK** Replace the engine management control Check that the Engine management unit Engine engine End of management management control unit Op. 1056B82 diagnosis INJECTION/IGNITION control unit control unit is not working SYSTEM E.C.U. working properly properly (ONE) - R + R

Test results **ENGINE** MANAGEMENT OK (NO COMPONENT CONTROL **FAULT** OPERATION 1 **FAULTS** CONCERNED DETECTED UNIT DETECTED) **OPERATION CHECK** Replace the engine management control Check that the Engine management unit Engine engine End of management management control unit Op. 1056B82 diagnosis control unit control unit is not working **INJECTION/IGNITION** SYSTEM E.C.U. working properly properly (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the earth connections for the engine management control unit wiring	Go to Step 2	Fault on earth connections	Restore the correct earth connections
2	COMPONENT CONCERNED	CHECK THE BATTERY CHARGE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery	Check the battery charge using the Midtronics tool no. 180515000	Go to Step 3	Incorrect battery charge	Restore/replace the battery
3	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay	Check that the main relay is working properly	Go to Step 4	The main relay is not working correctly	Replace the main relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Internal Control Module A/D Processing Performance P060B

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Internal Control Module Main Processor Performance P060C

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results	-	
1	COMPONENT CONCERNED	STARTER RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on starter relay (short circuit to GND)	Check the connections on the starter relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	STARTER RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay wiring (short circuit to GND)	Check the correct insulation of the starter relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	STARTER RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay (short circuit to GND)	Check that the starter relay is working properly	Go to Step 4	The starter relay is not working correctly	Replace the starter relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to	Check that the engine management control unit is	Go to Step 5	Engine management control unit not working	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION

	GND)	working properly		properly	SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	STARTER RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on starter relay (open circuit)	Check the connections on the starter relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	STARTER RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay wiring (open circuit)	Check the continuity of the starter relay wiring	Go to Step 7	Faults in the continuity of the wiring	Restore the correct wiring
7	COMPONENT CONCERNED	STARTER RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay (open circuit)	Check that the starter relay is working properly	Go to Step 8	The starter relay is not working correctly	Replace the starter relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		СНЕСК			
	Connections on the starter relay (short circuit to Vbatt or open circuit)	Check the connections on the starter relay and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	STARTER RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the starter relay wiring (short circuit to GND)	Go to Step 11	Wiring insulation not correct	Restore the correct insulation of the wiring
11	COMPONENT CONCERNED	STARTER RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starter relay (short circuit to Vbatt or open circuit)	Check that the starter relay is working properly	Go to Step 12	The starter relay is not working correctly	Replace the starter relay
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

		1			
			Test results		
1	COMPONENT CONCERNED	ALTERNATOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on alternator (short circuit to GND)	Check for the presence of loose connections on the alternator and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	ALTERNATOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator wiring (short circuit to GND)	Check the continuity of the alternator wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (short circuit to GND)	Check that the alternator is working correctly See Test 5530AB ALTERNATOR OPERATION CHECK	Go to Step 4	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management	Go to Step 5	Engine management control unit	Replace the engine management control unit Op. 1056B82

	(short circuit to GND)	control unit is working properly		not working properly	INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	ALTERNATOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator connections (short circuit to Vbatt or open circuit)	Check for the presence of loose connections on the alternator and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	ALTERNATOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator wiring (short circuit to Vbatt or open circuit)	Check the continuity of the alternator wiring	Go to Step 7	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
7	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (short circuit to Vbatt or open circuit)	Check that the alternator is working correctly See Test 5530AB ALTERNATOR OPERATION CHECK	Go to Step 8	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results THROTTLE OK (NO COMPONENT **FAULT** BODY 1 **FAULTS** OPERATION **CONCERNED** CONNECTION DETECTED DETECTED) CHECK Check for the Connections presence of loose on throttle connections on Presence of Restore the correct body (short the throttle body Go to Step 2 loose connections circuit to and the engine connections GND) management control unit CHECK OK (NO COMPONENT FAULT **FAULTS** 2 THROTTLE OPERATION DETECTED CONCERNED DETECTED) BODY WIRING Throttle body Check the Faults in the continuity of the wiring (short Restore the correct Go to Step 3 continuity of circuit to throttle body continuity for the wiring the wiring GND) wiring OK (NO CHECK **COMPONENT FAULT** 3 THROTTLE **FAULTS OPERATION CONCERNED** DETECTED **BODY WIRING** DETECTED) Throttle body Check the correct Wiring wiring (short insulation of the Restore the correct Go to Step 4 insulation circuit to throttle body insulation not correct GND) wiring CHECK OK (NO **COMPONENT FAULT** 4 **OPERATION** THROTTLE **FAULTS** DETECTED **CONCERNED** BODY WIRING DETECTED) Incorrect Check the Throttle body tightening, condition of the wiring (short oxidation or Restore the incorrect earth connections Go to Step 5 circuit to painting of earth connections on the throttle GND) earth body wiring connections THROTTLE COMPONENT **FAULT** 5 **OPERATION** BODY OK (NO CONCERNED DETECTED **OPERATION FAULTS**

		СНЕСК	DETECTED)		
	Throttle body (short circuit to GND)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body (open circuit)	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 8	Presence of loose connections	Restore the correct connections
8	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (open circuit)	Check the continuity of the throttle body wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check the correct		Wiring	

	wiring (open circuit)	insulation of the throttle body wiring	Go to Step 10	insulation not correct	Restore the correct insulation
10	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (open circuit)	Check the condition of the earth connections on the throttle body wiring	Go to Step 11	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
11	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body (open circuit)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 12	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	Go to Step 13	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body (short circuit to	Check for the presence of loose connections on the throttle body and the engine	Go to Step 14	Presence of loose connections	Restore the correct connections

	Vbatt)	management control unit			
14	COMPONENT CONCERNED	THRUTTLE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt)	Check the continuity of the throttle body wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt)	Check the correct insulation of the throttle body wiring	Go to Step 16	Wiring insulation not correct	Restore the correct insulation
16	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (short circuit to Vbatt)	Check the condition of the earth connections on the throttle body wiring	Go to Step 17	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
17	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body (short circuit to Vbatt)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 18	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Move on to Step 19	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
19	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body connection (signal calculated incorrect)	Check for the presence of loose connections on the throttle body and the engine management control unit	Move on to Step 20	Presence of loose connections	Restore the correct connections
20	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (signal calculated incorrect)	Check the continuity of the throttle body wiring	Move on to Step 21	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
21	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (signal calculated incorrect)	Check the correct insulation of the throttle body wiring	Go to Step 22	Wiring insulation not correct	Restore the correct insulation
22	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring (signal calculated incorrect)	Check the condition of the earth connections on the throttle body wiring	Go to Step 23	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
23	COMPONENT CONCERNED	THROTTLE BODY OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		СНЕСК			
	Throttle body (signal calculated incorrect)	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go on to Step 24	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
24	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal calculated incorrect)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Sensor Reference Voltage ""A"" Circuit/Open" P0641

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CONTINUITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the continuity of the wiring from the engine management control unit to the throttle body potentiometers and the accelerator pedal potentiometer	Go to Step 2	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING INSULATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the insulation of the wiring from the engine management control unit to the throttle body potentiometers and the accelerator pedal potentiometer (short circuit to Vbatt or GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	_	Check that the engine management control unit is working properly	End of diagnosis		Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--	---	---	---------------------	--	---

			1		
			Test results		
1	COMPONENT CONCERNED	AIR CONDITIONING RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air conditioning relay (short circuit to GND)	Check for the presence of loose connections on the air conditioning relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	AIR CONDITIONING RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning relay wiring (short circuit to GND)	Check the correct insulation of the air conditioning relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	AIR CONDITIONING RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning relay (short circuit to GND)	Connect the diagnostic equipment to the engine management control unit, enter active diagnosis and check whether the air conditioning relay is working properly	Go to Step 4	The air conditioning relay is not working properly	Replace the air conditioning relay

4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	AIR CONDITIONING RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air conditioning relay (short circuit to Vbatt)	Check for the presence of loose connections on the air conditioning relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	AIR CONDITIONING RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning relay wiring (short circuit to Vbatt)	Check the correct insulation of the air conditioning relay wiring (short circuit to Vbatt)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	AIR CONDITIONING RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning relay (short	Connect the diagnostic equipment to the engine management control unit, enter	Go to Step 8	The air conditioning relay is not	Replace the air

	circuit to Vbatt)	active diagnosis and check whether the air conditioning relay is working properly		working properly	conditioning relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	AIR CONDITIONING RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on air conditioning relay (open circuit)	Check for the presence of loose connections on the air conditioning relay and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	AIR CONDITIONING RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Air conditioning relay wiring (open circuit)	Check the continuity of the air conditioning relay wiring	Go to Step 11	Wiring faulty	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	AIR CONDITIONING RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Connect the			

	Air conditioning relay (open circuit)	diagnostic equipment to the engine management control unit, enter active diagnosis and check whether the air conditioning relay is working properly	Go to Step 12	The air conditioning relay is not working properly	Replace the air conditioning relay
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Sensor Reference Voltage ""B"" Circuit/Open" P0651

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CONTINUITY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the continuity of the wiring from the engine management control unit to: timing sensor, rpm sensor, overboost pressure sensor, intake air pressure/temperature sensor and accelerator pedal potentiometer 2	Go to Step 2	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING INSULATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the insulation of the wiring from the engine management control unit to: timing sensor, rpm sensor, overboost pressure sensor, intake air pressure/temperature sensor and accelerator pedal potentiometer 2 (short circuit to Vbatt or GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	CHECK		
gine nagement	Check that the engine management control unit is working properly	diagnosis	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Actuator Supply Voltage ""A"" Circuit/Open" P0657

			Test results		
1	COMPONENT CONCERNED	MAIN RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay connections (voltage below threshold)	Check for the presence of loose connections on the main relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	MAIN RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay wiring (voltage below threshold)	Check the correct insulation of the main relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay (voltage below threshold)	Check that the main relay is working properly	Go to Step 4	The main relay is not working correctly	Replace the main relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U.

					(ONE) - R + R
5	COMPONENT CONCERNED	MAIN RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay connections (voltage above threshold)	Check for the presence of loose connections on the main relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	MAIN RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay wiring (voltage above threshold)	Check the correct insulation of the main relay wiring (short circuit to GND)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay (voltage above threshold)	Check that the main relay is working properly	Go to Step 8	The main relay is not working correctly	Replace the main relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir ECM/PCM Power Relay Control Circuit/Open P0685

			Test results		
1	COMPONENT CONCERNED	MAIN RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on main relay (short circuit to GND)	Check for the presence of loose connections on the main relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	MAIN RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay wiring (short circuit to GND)	Check the correct insulation of the main relay wiring (short circuit to GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay (short circuit to GND)	Check that the main relay is working properly	Go to Step 4	The main relay is not working correctly	Replace the main relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 5	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U.

					(ONE) - R + R
5	COMPONENT CONCERNED	MAIN RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on main relay (short circuit to Vbatt)	Check for the presence of loose connections on the main relay and the engine management control unit	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	MAIN RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay wiring (short circuit to Vbatt)	Check the correct insulation of the main relay wiring (short circuit to GND)	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
7	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay (short circuit to Vbatt)	Check that the main relay is working properly	Go to Step 8	The main relay is not working correctly	Replace the main relay
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
9	COMPONENT CONCERNED	MAIN RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check for the			

	Connections on main relay (open circuit)	presence of loose connections on the main relay and the engine management control unit	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	MAIN RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay wiring (open circuit)	Check the continuity of the main relay wiring	Go to Step	Wiring faulty	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	MAIN RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Main relay (open circuit)	Check that the main relay is working properly	Go to Step 12	The main relay is not working correctly	Replace the main relay
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir "Sensor Reference Voltage ""C"" Circuit/Open" P0697

			Test results		
1	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the continuity of the wiring from the engine management control unit to the air conditioning pressure sensor and the neutral position sensor	Go to Step 2	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
2	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring	Check the insulation of the wiring from the engine management control unit to the air conditioning pressure sensor and the neutral position sensor (short circuit to Vbatt or GND)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--------------------------------------	--	---------------------	---	---

Test results ROBOTISED OK (NO COMPONENT **FAULT** GEARBOX 1 OPERATION **FAULTS** CONCERNED DETECTED NODE ERROR DETECTED) **CHECK** Connect the diagnostic equipment to the robotised Presence of Continue as Robotised End of errors on the instructed by the diagnostic gearbox control gearbox node diagnosis robotised unit and check equipment gearbox for the presence of errors

			Test results		
1	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on clutch pedal switch (signal locked low)	Check for the presence of loose connections on the clutch pedal switch and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring (signal locked low)	Check the continuity of the clutch pedal switch wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring (signal locked low)	Check the correct insulation of the clutch pedal switch wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (signal	Check that the position of the	Go to Step 5	Clutch pedal switch	Restore the correct position of the clutch

	locked low)	clutch pedal switch is correct		position not correct	pedal switch
5	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (signal locked low)	Connect the diagnosis equipment to the engine management control unit, enter active diagnosis and check whether the clutch pedal switch is working correctly	Go to Step 6	The clutch pedal switch is not working correctly	Replace the clutch pedal Op. 1056B78 SWITCH ON CLUTCH PEDAL - R.R (PETROL ENGINES)
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal locked low)	Check whether the engine management control unit is working correctly	Go to Step 7	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on clutch pedal switch (signal locked high)	Check for the presence of loose connections on the clutch pedal switch and the engine management control unit	Go to Step 8	Presence of loose connections	Restore the correct connections
	COMPONENT	CLUTCH PEDAL	OK (NO	FAULT	

8	CONCERNED	SWITCH WIRING CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Clutch pedal switch wiring (signal locked high)	Check the continuity of the clutch pedal switch wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring (signal locked high)	Check the correct insulation of the clutch pedal switch wiring	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (signal locked high)	Check that the position of the clutch pedal switch is correct	Go to Step 11	Clutch pedal switch position not correct	Restore the correct position of the clutch pedal switch
11	COMPONENT CONCERNED	(XX/1117 'H	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (signal locked high)	Connect the diagnosis equipment to the engine management control unit, enter active diagnosis and check whether the clutch pedal switch is working correctly	Go to Step 12	The clutch pedal switch is not working correctly	Replace the clutch pedal Op. 1056B78 SWITCH ON CLUTCH PEDAL - R.R (PETROL ENGINES)
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS	FAULT DETECTED	OPERATION

		OPERATION CHECK	DETECTED)		
	Engine management control unit (signal locked high)	Check whether the engine management control unit is working correctly	Go to Step 13	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on clutch pedal switch (message missing)	Check for the presence of loose connections on the clutch pedal switch and the engine management control unit	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring (message missing)	Check the continuity of the clutch pedal switch wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring (message missing)	Check the correct insulation of the clutch pedal switch wiring	Go to Step 16	Wiring insulation not correct	Restore the correct insulation of the wiring
16	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Clutch pedal switch (message missing)	Check that the position of the clutch pedal switch is correct	Go to Step 17	Clutch pedal switch position not correct	Restore the correct position of the clutch pedal switch
17	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (message missing)	Connect the diagnosis equipment to the engine management control unit, enter active diagnosis and check whether the clutch pedal switch is working correctly	Go to Step 18	The clutch pedal switch is not working correctly	Replace the clutch pedal Op. 1056B78 SWITCH ON CLUTCH PEDAL - R.R (PETROL ENGINES)
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (message missing)	Check whether the engine management control unit is working correctly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	T				
			Test results		
1	COMPONENT CONCERNED	REVERSING SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Reversing switch connections	Check for the presence of loose connections on the reversing switch and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	REVERSING SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Reversing switch wiring	Check the continuity of the reversing switch wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	REVERSING SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Reversing switch wiring	Check the correct insulation of the reversing switch wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	REVERSING SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Reverse switch	Check the correct position of the reversing switch	Go to Step 5	The reversing switch is not correctly positioned	Restore the correct position of the reversing switch

5	COMPONENT CONCERNED	REVERSING SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Reverse switch	Check the correct operation of the reversing switch	Go to Step 6	The reversing switch is not working correctly	Replace the reversing switch Op. 5550D22 REVERSING LIGHT SWITCH - R+R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check whether the engine management control unit is working correctly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1	1			
			Test results		
1	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch connections	Check for the presence of loose connections on the clutch pedal switch and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch wiring	Check the correct insulation of the clutch pedal switch wiring (short circuit to Vbatt)	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring
3	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch	Connect the diagnosis equipment to the engine management control unit, enter active diagnosis and check whether the clutch pedal switch is working correctly	Go to Step 4	The clutch pedal switch is not working correctly	Replace the clutch pedal Op. 1056B78 SWITCH ON CLUTCH PEDAL - R.R (PETROL ENGINES)

4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check whether the engine management control unit is working correctly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Uniair activation solenoid valve resistance	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Uniair activation solenoid valve resistance	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Uniair activation solenoid valve resistance	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

	Uniair activation solenoid valve resistance	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (faulty program memory)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (faulty program memory)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		•
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (faulty program memory)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		•
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage below threshold)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (voltage above threshold)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (faulty program memory)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Cyl. 1 UniAir actuation electroval. power stage P1031

			Test results			
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Connections on Uniair activation solenoid valve (short circuit to GND)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections	
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring	
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring	
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to	Check for the presence of loose connections on the Uniair activation	Go to Step 8	Presence of loose connections	Restore the correct connections

	Vbatt)	solenoid valve			
8	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (short circuit to Vbatt)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 11	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control	Swap connectors on the Uniair activation solenoid valves		The active diagnosis of	Replace the engine management control unit

	driver (short circuit to Vbatt)	and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 12	the solenoid valve does not work	Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 13	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (open circuit)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (open circuit)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair				

	activation solenoid valve wiring (open circuit)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 16	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
16	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (open circuit)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 17	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
17	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (open circuit)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 18	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (open circuit)	Check that the engine management control unit is working properly	Move on to Step 19	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
		UNIAIR ACTIVATION	OK (NO		

19	COMPONENT CONCERNED	SOLENOID VALVE CONNECTION CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (incorrect signal plausibility)	Check for the presence of loose connections on the Uniair activation solenoid valve	Move on to Step 20	Presence of loose connections	Restore the correct connections
20	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (incorrect signal plausibility)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 21	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
21	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (incorrect signal plausibility)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 22	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
22	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (incorrect	Swap connectors on the Uniair activation solenoid valves and carry out	Go to Step 23	The active diagnosis of the solenoid	Replace the engine management control unit Op. 1056B82

	signal plausibility)	solenoid valve active diagnosis (first reset error memory)		valve does not work	INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
23	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect signal plausibility)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to GND)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to	Check for the presence of loose connections on the Uniair activation	Go to Step 8	Presence of loose connections	Restore the correct connections

	Vbatt)	solenoid valve			
8	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (short circuit to Vbatt)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 11	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control	Swap connectors on the Uniair activation solenoid valves		The active diagnosis of	Replace the engine management control unit

	driver (short circuit to Vbatt)	and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 12	the solenoid valve does not work	Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 13	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND or open circuit)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND or open circuit)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 16	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
16	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND or open circuit)	solenoid valves and carry out solenoid valve	Go to Step 17	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
17	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	Go to Step 18	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve	Check for the presence of loose connections on the Uniair	Move on to Step 19	Presence of loose connections	Restore the correct connections

	(circuit voltage out of range)	activation solenoid valve			
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (circuit voltage out of range)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (circuit voltage out of range)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Move on to Step 21	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
21	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit voltage out of range)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to GND)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to	Check for the presence of loose connections on the Uniair activation	Go to Step 8	Presence of loose connections	Restore the correct connections

	Vbatt)	solenoid valve			
8	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (short circuit to Vbatt)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 11	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control	Swap connectors on the Uniair activation solenoid valves		The active diagnosis of	Replace the engine management control unit

	driver (short circuit to Vbatt)	and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 12	the solenoid valve does not work	Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 13	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND or open circuit)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND or open circuit)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 16	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
16	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND or open circuit)	solenoid valves and carry out solenoid valve	Go to Step 17	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
17	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	Go to Step 18	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve	Check for the presence of loose connections on the Uniair	Move on to Step 19	Presence of loose connections	Restore the correct connections

	(circuit voltage out of range)	activation solenoid valve			
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (circuit voltage out of range)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (circuit voltage out of range)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Move on to Step 21	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
21	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit voltage out of range)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Cyl. 4 UniAir actuation electroval. power stage P1034

			Test results		
1	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to GND)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 5	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
5	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 6	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 7	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
7	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (short circuit to	Check for the presence of loose connections on the Uniair activation	Go to Step 8	Presence of loose connections	Restore the correct connections

	Vbatt)	solenoid valve			
8	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to Vbatt)	Check the correct insulation of the Uniair solenoid valve wiring (short circuit to GND)	Go to Step 10	Wiring insulation not correct	Restore the correct insulation of the wiring
10	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (short circuit to Vbatt)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 11	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control	Swap connectors on the Uniair activation solenoid valves		The active diagnosis of	Replace the engine management control unit

	driver (short circuit to Vbatt)	and carry out solenoid valve active diagnosis (first reset error memory)	Go to Step 12	the solenoid valve does not work	Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 13	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
13	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 14	Presence of loose connections	Restore the correct connections
14	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (short circuit to GND or open circuit)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 15	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
15	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Uniair activation solenoid valve resistance (short circuit to GND or open circuit)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 16	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
16	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (short circuit to GND or open circuit)	solenoid valves and carry out solenoid valve	Go to Step 17	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
17	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	Go to Step 18	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve	Check for the presence of loose connections on the Uniair	Move on to Step 19	Presence of loose connections	Restore the correct connections

	(circuit voltage out of range)	activation solenoid valve			
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (circuit voltage out of range)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE DRIVER CONTROL CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair solenoid valve control driver (circuit voltage out of range)	Swap connectors on the Uniair activation solenoid valves and carry out solenoid valve active diagnosis (first reset error memory)	Move on to Step 21	The active diagnosis of the solenoid valve does not work	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
21	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit voltage out of range)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit current out of range)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal form not compliant)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit current out of range)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal form not compliant)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit current out of range)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal form not compliant)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (circuit current out of range)	Check that the engine management control unit is working properly	Go to Step 2	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
2	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal form not compliant)	Check that the engine management control unit is working properly	Go to Step 3	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results CHECK THE UNIAIR OK (NO **COMPONENT FAULT** 1 **MODULE FAULTS OPERATION** CONCERNED DETECTED INLET OIL DETECTED) **FILTER** Replace the Uniair Uniair module Check the Uniair module inlet oil filter inlet oil filter condition of the module inlet Go to Step 2 Op. 1036F22 UNIAIR (actuator Uniair module oil filter MODULE ENGINE inlet oil filter locked) clogged OIL FILTER - R.R. BATTERY OK (NO **COMPONENT** CHARGE **FAULT** 2 **FAULTS OPERATION** CONCERNED **STATUS** DETECTED DETECTED) CHECK Check the battery charge using the Battery Incorrect Recharge/replace the (actuator Midtronics Go to Step 3 battery battery locked) equipment no. charge 1806515000 ALTERNATOR OK (NO **COMPONENT FAULT OPERATION** 3 **FAULTS OPERATION CONCERNED** DETECTED CHECK DETECTED) check that the The Replace the alternator Alternator alternator is alternator is (actuator working correctly Go to Step 4 Op. 5530A10 not working locked) by carrying out ALTERNATOR - R.R. correctly the Test 5530AB UNIAIR **ACTIVATION** OK (NO **COMPONENT** SOLENOID **FAULT** 4 **OPERATION FAULTS** CONCERNED VALVE DETECTED DETECTED) CONNECTION CHECK Connections Check for the Presence of on Uniair presence of loose Restore the correct Go to Step 5 loose activation connections on connections connections solenoid valve the Uniair (actuator activation

	locked)	solenoid valve			
5	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator locked)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 6	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
6	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator locked)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 7	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator locked)	Check that the engine management control unit is working properly	Go to Step 8	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow	Check the condition of the Uniair module	Go to Step 9	Uniair module inlet oil filter	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE

	when closing)	inlet oil filter		clogged	OIL FILTER - R.R.
9	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when closing)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 10	Incorrect battery charge	Recharge/replace the battery
10	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (actuator too fast/too slow when closing)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 11	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when closing)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when closing)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
		UNIAIR			

13	COMPONENT CONCERNED	ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when closing)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 14	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when closing)	Check that the engine management control unit is working properly	Go to Step 15	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow when opening)	Check the condition of the Uniair module inlet oil filter	Go to Step 16	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
16	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when opening)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 17	Incorrect battery charge	Recharge/replace the battery
17	COMPONENT	ALTERNATOR OPERATION	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	CHECK	DETECTED)	DETECTED	
	Alternator (actuator too fast/too slow when opening)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 1	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when opening)	Check for the presence of loose connections on the Uniair activation solenoid valve	Move on to Step 19	Presence of loose connections	Restore the correct connections
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when opening)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when opening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Move on to Step 21	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
		ENGINE			

21	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when opening)	Check that the engine management control unit is working properly	Go to Step 22	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
22	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator reopening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 22	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
23	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator reopening)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator locked)	Check the condition of the Uniair module inlet oil filter	Go to Step 2	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
2	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator locked)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 3	Incorrect battery charge	Recharge/replace the battery
3	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (actuator locked)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 4	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator	Check for the presence of loose connections on the Uniair activation	Go to Step 5	Presence of loose connections	Restore the correct connections

	locked)	solenoid valve			
5	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator locked)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 6	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
6	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator locked)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 7	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator locked)	Check that the engine management control unit is working properly	Go to Step 8	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow	Check the condition of the Uniair module	Go to Step 9	Uniair module inlet oil filter	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE

	when closing)	inlet oil filter		clogged	OIL FILTER - R.R.
9	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when closing)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 10	Incorrect battery charge	Recharge/replace the battery
10	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (actuator too fast/too slow when closing)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 11	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when closing)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when closing)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
		UNIAIR			

13	COMPONENT CONCERNED	ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when closing)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 14	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when closing)	Check that the engine management control unit is working properly	Go to Step 15	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow when opening)	Check the condition of the Uniair module inlet oil filter	Go to Step 16	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
16	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when opening)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 17	Incorrect battery charge	Recharge/replace the battery
17	COMPONENT	ALTERNATOR OPERATION	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	CHECK	DETECTED)	DETECTED	
	Alternator (actuator too fast/too slow when opening)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 1	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when opening)	Check for the presence of loose connections on the Uniair activation solenoid valve	Move on to Step 19	Presence of loose connections	Restore the correct connections
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when opening)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiri
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when opening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Move on to Step 21	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIF MODULE - R.R.
		ENGINE			

21	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when opening)	Check that the engine management control unit is working properly	Go to Step 22	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
22	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator reopening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 22	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
23	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator reopening)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

Test results CHECK THE UNIAIR OK (NO **COMPONENT FAULT** 1 **MODULE FAULTS OPERATION** CONCERNED DETECTED INLET OIL DETECTED) **FILTER** Replace the Uniair Uniair module Check the Uniair module inlet oil filter inlet oil filter condition of the module inlet Go to Step 2 Op. 1036F22 UNIAIR (actuator Uniair module oil filter MODULE ENGINE inlet oil filter locked) clogged OIL FILTER - R.R. BATTERY OK (NO **COMPONENT** CHARGE **FAULT** 2 **FAULTS OPERATION** CONCERNED **STATUS** DETECTED DETECTED) CHECK Check the battery charge using the Battery Incorrect Recharge/replace the (actuator Midtronics Go to Step 3 battery battery locked) equipment no. charge 1806515000 ALTERNATOR OK (NO **COMPONENT FAULT OPERATION** 3 **FAULTS OPERATION CONCERNED** DETECTED CHECK DETECTED) check that the The Replace the alternator Alternator alternator is alternator is (actuator working correctly Go to Step 4 Op. 5530A10 not working locked) by carrying out ALTERNATOR - R.R. correctly the Test 5530AB UNIAIR **ACTIVATION** OK (NO **COMPONENT** SOLENOID **FAULT** 4 **OPERATION FAULTS** CONCERNED VALVE DETECTED DETECTED) CONNECTION CHECK Connections Check for the Presence of on Uniair presence of loose Restore the correct Go to Step 5 loose activation connections on connections connections solenoid valve the Uniair (actuator activation

	locked)	solenoid valve			
5	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator locked)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 6	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
6	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator locked)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 7	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator locked)	Check that the engine management control unit is working properly	Go to Step 8	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow	Check the condition of the Uniair module	Go to Step 9	Uniair module inlet oil filter	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE

	when closing)	inlet oil filter		clogged	OIL FILTER - R.R.
9	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when closing)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 10	Incorrect battery charge	Recharge/replace the battery
10	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (actuator too fast/too slow when closing)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 11	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when closing)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when closing)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
		UNIAIR			

13	COMPONENT CONCERNED	ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when closing)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 14	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when closing)	Check that the engine management control unit is working properly	Go to Step 15	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow when opening)	Check the condition of the Uniair module inlet oil filter	Go to Step 16	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
16	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when opening)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 17	Incorrect battery charge	Recharge/replace the battery
17	COMPONENT	ALTERNATOR OPERATION	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	CHECK	DETECTED)	DETECTED	
	Alternator (actuator too fast/too slow when opening)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 1	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when opening)	Check for the presence of loose connections on the Uniair activation solenoid valve	Move on to Step 19	Presence of loose connections	Restore the correct connections
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when opening)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiri
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when opening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Move on to Step 21	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIF MODULE - R.R.
		ENGINE			

21	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when opening)	Check that the engine management control unit is working properly	Go to Step 22	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
22	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator reopening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 22	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
23	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator reopening)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results				
1	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Uniair module inlet oil filter (actuator locked)	Check the condition of the Uniair module inlet oil filter	Go to Step 2	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.		
2	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Battery (actuator locked)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 3	Incorrect battery charge	Recharge/replace the battery		
3	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Alternator (actuator locked)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 4	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.		
4	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Connections on Uniair activation solenoid valve (actuator	Check for the presence of loose connections on the Uniair activation	Go to Step 5	Presence of loose connections	Restore the correct connections		

	locked)	solenoid valve			
5	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator locked)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 6	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
6	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator locked)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 7	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator locked)	Check that the engine management control unit is working properly	Go to Step 8	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow	Check the condition of the Uniair module	Go to Step 9	Uniair module inlet oil filter	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE

	when closing)	inlet oil filter		clogged	OIL FILTER - R.R.
9	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when closing)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 10	Incorrect battery charge	Recharge/replace the battery
10	COMPONENT CONCERNED	ALTERNATOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Alternator (actuator too fast/too slow when closing)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 11	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
11	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when closing)	Check for the presence of loose connections on the Uniair activation solenoid valve	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when closing)	Check the continuity of the Uniair solenoid valve wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
		UNIAIR			

13	COMPONENT CONCERNED	ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when closing)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 14	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when closing)	Check that the engine management control unit is working properly	Go to Step 15	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	CHECK THE UNIAIR MODULE INLET OIL FILTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module inlet oil filter (actuator too fast/too slow when opening)	Check the condition of the Uniair module inlet oil filter	Go to Step 16	Uniair module inlet oil filter clogged	Replace the Uniair module inlet oil filter Op. 1036F22 UNIAIR MODULE ENGINE OIL FILTER - R.R.
16	COMPONENT CONCERNED	BATTERY CHARGE STATUS CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Battery (actuator too fast/too slow when opening)	Check the battery charge using the Midtronics equipment no. 1806515000	Go to Step 17	Incorrect battery charge	Recharge/replace the battery
17	COMPONENT	ALTERNATOR OPERATION	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	CHECK	DETECTED)	DETECTED	
	Alternator (actuator too fast/too slow when opening)	check that the alternator is working correctly by carrying out the Test_5530AB	Go to Step 1	The alternator is not working correctly	Replace the alternator Op. 5530A10 ALTERNATOR - R.R.
18	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on Uniair activation solenoid valve (actuator too fast/too slow when opening)	Check for the presence of loose connections on the Uniair activation solenoid valve	Move on to Step 19	Presence of loose connections	Restore the correct connections
19	COMPONENT CONCERNED	UNIAIR SOLENOID VALVE WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve wiring (actuator too fast/too slow when opening)	Check the continuity of the Uniair solenoid valve wiring	Move on to Step 20	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
20	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator too fast/too slow when opening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Move on to Step 21	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
		ENGINE			

21	COMPONENT CONCERNED	MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator too fast/too slow when opening)	Check that the engine management control unit is working properly	Go to Step 22	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
22	COMPONENT CONCERNED	UNIAIR ACTIVATION SOLENOID VALVE RESISTANCE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair activation solenoid valve resistance (actuator reopening)	Check that the Uniair activation solenoid valve resistance value is between 0.25 and 0.30 Ω	Go to Step 22	Incorrect solenoid valve resistance value	Replace the Uniair module Op. 1036F20 UNIAIR MODULE - R.R.
23	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (actuator reopening)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	INTAKE MANIFOLD SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Intake manifold	Check for the presence of seepage on the intake manifold	Go to Step 2	Seepage on intake manifold	Restore the of the intak
2	COMPONENT CONCERNED	THROTTLE BODY POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Throttle body	Check the correct position of the throttle body on the intake manifold	Go to Step 3	throttle body not correctly positioned	Restore the the throttle
3	COMPONENT CONCERNED	INTAKE AIR PRESSURE/TEMPERATURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Intake air pressure/temperature sensor	Check that the intake air pressure/temperature sensor is working correctly by carrying out the Test_1056BU	End of diagnosis	The intake air pressure/temperature sensor is not working correctly	Replace the temperature Op. 1056B PRESSURI SENSOR -

			Test results		
1	COMPONENT CONCERNED	INTAKE AIR PRESSURE/TEMPERATURE SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Connections on intake air pressure/temperature sensor	Check for loose connections on the intake air pressure/temperature sensor	Go to Step 2	Presence of loose connections	Restore the connection
2	COMPONENT CONCERNED	INTAKE MANIFOLD SEEPAGE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Intake manifold	Check for the presence of seepage on the intake manifold	Go to Step 3	Seepage on intake manifold	Restore the of the intak
3	COMPONENT CONCERNED	INTAKE AIR PRESSURE/TEMPERATURE SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
	Intake air pressure/temperature sensor	Check that the intake air pressure/temperature sensor is correctly positioned	Go to Step 4	The intake air pressure/temperature sensor is not	Restore the the intake a pressure/ter
				correctly positioned	
4	COMPONENT CONCERNED	INTAKE AIR PRESSURE/TEMPERATURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OF
4		PRESSURE/TEMPERATURE SENSOR OPERATION CHECK Check whether the intake air pressure/temperature sensor is working correctly	FAULTS	FAULT	Replace the temperature
5	CONCERNED Intake air pressure/temperature	PRESSURE/TEMPERATURE SENSOR OPERATION CHECK Check whether the intake air pressure/temperature sensor is working correctly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR	FAULTS DETECTED)	FAULT DETECTED The intake air pressure/temperature sensor is not	<u>Op. 1056B</u> <u>PRESSUR</u>

	Engine management control unit	Check that the engine management control unit is working properly	diagnosis	Engine management control unit not working properly	Replace the management [PR_1056E] Op. 1056E INJECTION SYSTEM IN R
--	--------------------------------	---	-----------	---	---

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Throttle body wiring continuity faults	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	THROTTLE BODY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the condition of the earth connections (not correctly tightened, oxidised or painted)	Go to Step 5	Poor earth connections	Restore the correct earth connections

5	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check that the throttle body is working properly by carrying out the See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Throttle body wiring continuity faults	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	THROTTLE BODY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the condition of the earth connections (not correctly tightened, oxidised or painted)	Go to Step 5	Poor earth connections	Restore the correct earth connections
		THROTTLE			

5	COMPONENT CONCERNED	BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	<u> </u>					
			Test results			
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON UNIAIR MODULE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Uniair module oil temperature sensor (incorrect comparison signal)	Check for loose connections on the Uniair module engine oil temperature sensor and the engine management control unit	Go to Step 2	Loose connections	Restore the correct connections	
2	COMPONENT CONCERNED	CHECK WIRING ON UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Uniair module engine oil temperature sensor wiring (incorrect comparison signal)	Check the correct insulation of the Uniair module engine oil temperature sensor wiring	Go to Step 3	Wiring insulation not correct	Restore the correct insulation of the wiring	
3	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Uniair module oil temperature sensor	Check the correct operation of the Uniair module engine oil temperature	Go to Step 4	Incorrect resistance	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR	

	(incorrect comparison signal)	sensor. Sensor resistance value with warmed-up engine lower than $10 \ k\Omega$		value	MODULE OIL TEMPERATURE SENSOR - R.R.
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 5	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CHECK CONNECTIONS ON UNIAIR MODULE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check for loose connections on the Uniair module engine oil temperature sensor and the engine management control unit	Go to Step 6	Loose connections	Restore the correct connections
6	COMPONENT CONCERNED	CHECK WIRING ON UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module engine oil temperature sensor wiring (signal out of tolerance)	Check the correct insulation of the Uniair module engine oil temperature sensor wiring	Go to Step 7	Wiring insulation not correct	Restore the correct insulation of the wiring
		СНЕСК			

7	COMPONENT CONCERNED	WIRING ON UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module engine oil temperature sensor wiring (signal out of tolerance)	Check the continuity of the Uniair module engine oil temperature sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	CHECK OPERATION OF UNIAIR MODULE ENGINE OIL TEMPERATURE SENSOR	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module oil temperature sensor (signal out of tolerance)	Check the correct operation of the Uniair module engine oil temperature sensor. Sensor resistance value with warmed-up engine lower than $10~\mathrm{k}\Omega$	Go to Step 9	Incorrect resistance value	Replace the Uniair module engine oil temperature sensor Op. 1036F21 UNIAIR MODULE OIL TEMPERATURE SENSOR - R.R.
9	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal out of tolerance)	Check that the engine management control unit is working properly	End of diagnosis	Incorrect operation of engine management control unit	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Throttle body wiring continuity faults	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	THROTTLE BODY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring	Check the condition of the earth connections (not correctly tightened, oxidised or painted)	Go to Step 5	Poor earth connections	Restore the correct earth connections

5	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check that the throttle body is working properly by carrying out the See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	TOOTHED WHEEL LEARNING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Phonic wheel	Check whether the toothed wheel learning has been carried out	Go to Step 2	Toothed wheel learning procedure not carried out	Carry out the toothed wheel learning Op. 5510C26 ENGINE RPM SENSOR - R+R
2	COMPONENT CONCERNED	ENGINE RPM SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Rpm sensor	Check that the engine rpm sensor is working properly See Test 5510CD RPM SENSOR AND COIL OPERATION CHECK And See Test 5510CF RPM SIGNAL CHECK	Go to Step 3	The rpm sensor is not working properly	Replace the rpm sensor Op. 5510C26 ENGINE RPM SENSOR - R+R
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	GEARBOX LEARNING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gearbox learning (with manual gearbox only) (signal not valid)	Check whether the gearbox learning procedure has been carried out after the engine management control unit replacement	Go to Step 2	Gearbox learning procedure not carried out	Press the clutch with manual gearbox
2	COMPONENT CONCERNED	CLUTCH PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Clutch pedal switch (signal not valid)	Connect the diagnostic equipment to the engine management control unit and check that the clutch pedal switch is working properly	Go to Step 3	The clutch pedal switch is not working correctly	Replace the clutch pedal switch Op. 1056B78 SWITCH ON CLUTCH PEDAL - R.R (PETROL ENGINES)
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	Go to Step 4	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

4	COMPONENT CONCERNED	GEARBOX LEARNING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gearbox learning (with manual gearbox only) (not configured)	Check whether the gearbox learning procedure has been carried out after the engine management control unit replacement	Go to Step 5	Gearbox learning procedure not carried out	Press the clutch with manual gearbox
5	COMPONENT CONCERNED	CHECK CAN LINE BETWEEN ROBOTISED GEARBOX AND ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN line between robotised gearbox and engine management control unit (not configured)	Check CAN line continuity between robotised gearbox and engine management control unit	Go to Step 6	Faults on CAN line	Restore the correct continuity of the CAN line
6	COMPONENT CONCERNED	ROBOTISED GEARBOX CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Robotised gearbox control unit (not configured)	Check that the robotised gearbox control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	NEUTRAL SIGNAL LEARNING PROCEDURE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever position	Connect the diagnosis equipment to the engine management control unit, enter configuration and check whether the "neutral signal learning" procedure has been carried out	End of diagnosis	Neutral signal learning procedure not carried out	Carry out the neutral signal learning procedure with the diagnosis equipment

			Test results		
1	COMPONENT CONCERNED	PERFORMANCE LIMIT PROCEDURE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Connect the diagnosis equipment to the engine management control unit, enter configuration and check whether the "performance limit" procedure has been carried out (this type of error only occurs at the first car delivery to dealership)	End of diagnosis	"Performance limit" procedure not carried out	Carry out the "performance limit" procedure with the diagnosis equipment

			Test results		
1	COMPONENT CONCERNED	UNIAIR MODULE LEARNING PROCEDURE CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Uniair module learning	Connect the diagnosis equipment to the engine management control unit, enter configuration and check whether the "Uniair module learning" procedure has been carried out. This procedure must be carried out after the replacement of following components: - Replace timing sensor - Uniair module replacement - Upstream oxygen sensor replacement - Replace cam axis - Replace engine rpm sensor - Replace engine rpm sensor - Replace engine oil temperature sensor - Engine management control unit replacement	End of diagnosis	Uniair module learning procedure	Carry out the Uniair module learning procedure

			Test results		
1	COMPONENT CONCERNED	KNOCK SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on knock sensor (short circuit to GND)	Check for loose connections on the knock sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	KNOCK SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor wiring (short circuit to GND)	Check the correct continuity of the knock sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (short circuit to GND)	Check whether the knock sensor is correctly positioned	Go to Step 4	Knock sensor not correctly positioned	Restore the correct position of the timing sensor
4	COMPONENT CONCERNED	KNOCK SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (short circuit to GND)	Check that the knock sensor is working properly.	Go to Step 5	The knock sensor is not working properly	Replace the knock sensor Op. 5510C42 DETONATION SENSOR (ONE) - R.R.
		ENGINE MANAGEMENT			

5	COMPONENT CONCERNED	CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	KNOCK SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on knock sensor (short circuit to Vbatt)	Check for loose connections on the knock sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	KNOCK SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor wiring (short circuit to Vbatt)	Check the correct continuity of the knock sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
8	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (short circuit to Vbatt)	Check whether the knock sensor is correctly positioned	Go to Step 9	Knock sensor not correctly positioned	Restore the correct position of the timing sensor
9	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (short circuit to Vbatt)	Check whether the knock sensor is correctly	Go to Step 10	Knock sensor not correctly	Restore the correct position of the timing sensor

		positioned		positioned	
10	COMPONENT CONCERNED	KNOCK SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (short circuit to Vbatt)	Check that the knock sensor is working properly.	Go to Step 11	The knock sensor is not working properly	Replace the knock sensor Op. 5510C42 DETONATION SENSOR (ONE) - R.R.
11	COMPONENT CONCERNED	KNOCK SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on knock sensor (signal with few transitions)	Check for loose connections on the knock sensor and the engine management control unit	Go to Step 12	Presence of loose connections	Restore the correct connections
12	COMPONENT CONCERNED	KNOCK SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor wiring (signal with few transitions)	Check the correct continuity of the knock sensor wiring	Go to Step 13	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
13	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (signal with few transitions)	Check whether the knock sensor is correctly positioned	Go to Step 14	Knock sensor not correctly positioned	Restore the correct position of the timing sensor
14	COMPONENT CONCERNED	KNOCK SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (signal with	Check that the knock sensor is	Go to Step	The knock sensor is not	Replace the knock sensor Op. 5510C42

	few transitions)	working properly.	15	working properly	<u>DETONATION</u> <u>SENSOR (ONE) - R.R.</u>
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal with few transitions)	Check that the engine management control unit is working properly	Go to Step 16	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
16	COMPONENT CONCERNED	KNOCK SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on knock sensor (signal with too many transitions)	Check for loose connections on the knock sensor and the engine management control unit	Go to Step 17	Presence of loose connections	Restore the correct connections
17	COMPONENT CONCERNED	KNOCK SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor wiring (signal with too many transitions)	Check the correct continuity of the knock sensor wiring	Go to Step 18	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
18	COMPONENT CONCERNED	KNOCK SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Knock sensor (signal with too many transitions)	Check whether the knock sensor is correctly positioned	Move on to Step 19	Knock sensor not correctly positioned	Restore the correct position of the timing sensor
19	COMPONENT CONCERNED	KNOCK SENSOR OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION

		CHECK			
	Knock sensor (signal with too many transitions)	Check that the knock sensor is working properly.	Move on to Step 20	The knock sensor is not working properly	Replace the knock sensor Op. 5510C42 DETONATION SENSOR (ONE) - R.R.
20	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (signal with too many transitions)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	STARTING RELAY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starting relay connections	Check the connections on the starting relay and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	STARTING RELAY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starting relay wiring	Check the continuity of the starting relay wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	STARTING RELAY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Starting relay	Check the correct operation of the starting relay from the Body Computer Node	Go to Step 4	Incorrect operation of the starting relay from the Body Computer Node	Replace the starting relay
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine	Check that the engine	End of	Engine management	Replace the engine management control unit

	management control unit	management control unit is working properly			Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--	-------------------------	---	--	--	---

		I	1		
			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
5	COMPONENT CONCERNED	THROTTLE BODY OPERATION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		CHECK	DETECTED)		
	Throttle body	Check that the throttle body is working properly by carrying out the Test_1056BW	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
5	COMPONENT CONCERNED	THROTTLE BODY OPERATION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		CHECK	DETECTED)		
	Throttle body	Check that the throttle body is working properly by carrying out the Test_1056BW	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

	1	1	1		
			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
5	COMPONENT CONCERNED	THROTTLE BODY OPERATION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		СНЕСК	DETECTED)		
	Throttle body	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

		1	1		
			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
5	COMPONENT CONCERNED	THROTTLE BODY OPERATION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		СНЕСК	DETECTED)		
	Throttle body	Check that the throttle body is working properly See Test 1056BW Check on the throttle body actuator operation	Go to Step 6	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 4	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
4	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check that the throttle body is working			Replace the

Throttle body	properly See Test 1056BW Check on the throttle body actuator operation	diagnosis	Throttle body not working correctly	throttle body Op. 1056B14 THROTTLE BODY - R + R
---------------	--	-----------	---	---

			Test results		
1	COMPONENT CONCERNED	THROTTLE BODY CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on throttle body	Check for the presence of loose connections on the throttle body and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the continuity of the throttle body wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	THROTTLE BODY WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the correct insulation of the throttle body wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK THROTTLE BODY WIRING	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body wiring	Check the condition of the earth connections on the throttle body wiring	Go to Step 5	Incorrect tightening, oxidation or painting of earth connections	Restore the incorrect earth connections
5	COMPONENT	WATER TEMPERATURE SENSOR	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	OPERATION CHECK	DETECTED)	DETECTED	
	Water temperature sensor	Check that the water temperature sensor is working properly See Test 1056BC Engine coolant temperature sensor operation check	Go to Step 6	The water temperature sensor is not working correctly	Replace the water temperature sensor Op. 1056B50 ENGINE COOLANT TEMPERATURE SENSOR - R + R
6	COMPONENT CONCERNED	ASPIRATED AIR TEMPERATURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Intake air temperature sensor	Check whether the intake air temperature sensor is working correctly See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 7	The intake air temperature sensor is not working correctly	Replace the intake air temperature sensor Op. 1056B54 INTAKE AIR PRESSURE/TEMPERATURE SENSOR - R.R.
7	COMPONENT CONCERNED	ENGINE RPM SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine rpm sensor	Check whether the engine rpm sensor is working correctly See Test 5510CD RPM SENSOR AND COIL OPERATION CHECK And See Test 5510CF RPM SIGNAL CHECK	Go to Step 8	The rpm sensor is not working properly	Replace the engine rpm sensor Op. 5510C26 ENGINE RPM SENSOR - R+R

8	COMPONENT CONCERNED	ACCELERATOR PEDAL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Accelerator pedal	Check that the accelerator pedal potentiometers are working properly using the diagnostic equipment	Go to Step 9	The accelerator pedal is not working properly	Replace the accelerator pedal Op. 1068A20 ACCELERATOR PEDAL WITH BUILT-IN POTENTIOMETER - R.R
9	COMPONENT CONCERNED	THROTTLE BODY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Throttle body	Check that the throttle body is working properly by carrying out the Test_1056BW See Test 1056BU CHECK ON OPERATION OF PRESSURE SENSOR AND/OR INTAKE AIR TEMPERATURE SENSOR	Go to Step 10	Throttle body not working correctly	Replace the throttle body Op. 1056B14 THROTTLE BODY - R + R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor connections (incorrect signal frequency)	Check for loose connections on the gear lever sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (incorrect signal frequency)	Check the continuity of the gear lever sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
3	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (incorrect signal frequency)	Check the correct insulation of the gear lever sensor wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Linear pressure sensor	Check whether the air conditioning pressure		Presence of oxidation on	Restore the correct

	connector (incorrect signal frequency)	connector is oxidised (gear lever sensor supply from linear pressure sensor)	Go to Step 5	linear pressure sensor connector	operation of the linear pressure sensor connector
5	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position (incorrect signal frequency)	Check whether the gear lever sensor is correctly positioned	Go to Step 6	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor
6	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor (incorrect signal frequency)	Check that the gear lever sensor is working correctly	Go to Step 7	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect signal frequency)	Check that the engine management control unit is working properly	Go to Step 8	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor connections (incorrect	Check for loose connections on the gear lever sensor and the engine	Go to Step 9	Presence of loose connections	Restore the correct connections

	signal plausibility)	management control unit			
9	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (incorrect signal plausibility)	Check the continuity of the gear lever sensor wiring	Go to Step 10	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
10	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (incorrect signal plausibility)	Check the correct insulation of the gear lever sensor wiring	Go to Step 11	Wiring insulation not correct	Restore the correct insulation of the wiring
11	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Linear pressure sensor connector (incorrect signal plausibility)	Check whether the air conditioning pressure connector is oxidised (gear lever sensor supply from linear pressure sensor)	Go to Step 12	Presence of oxidation on linear pressure sensor connector	Restore the correct operation of the linear pressure sensor connector
12	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position (incorrect signal plausibility)	Check whether the gear lever sensor is correctly positioned	Go to Step 13	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor

13	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor (incorrect signal plausibility)	Check that the gear lever sensor is working correctly	Go to Step 14	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect signal plausibility)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			1			
			Test results			
1	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Connections on gear lever sensor (short circuit to GND)	Check for loose connections on the gear lever sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections	
2	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Gear lever sensor wiring (short circuit to GND)	Check the continuity of the gear lever sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring	
3	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Gear lever sensor wiring (short circuit to GND)	Check the correct insulation of the gear lever sensor wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring	
4	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Linear pressure sensor connector (short circuit to	pressure connector is	Go to Step 5	Presence of oxidation on linear pressure	Restore the correct operation of the linear pressure sensor	

	GND)	lever sensor supply from linear pressure sensor)		sensor connector	connector
5	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position (short circuit to GND)	Check whether the gear lever sensor is correctly positioned	Go to Step 6	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor
6	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor (short circuit to GND)	Check that the gear lever sensor is working correctly	Go to Step 7	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
7	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND)	Check that the engine management control unit is working properly	Go to Step 8	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
8	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Connections on gear lever sensor (short circuit to Vbatt or open circuit)	Check for loose connections on the gear lever sensor and the engine management control unit	Go to Step 9	Presence of loose connections	Restore the correct connections

9	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (short circuit to Vbatt or open circuit)	Check the continuity of the gear lever sensor wiring	Go to Step 10	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
10	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (short circuit to Vbatt or open circuit)	Check the correct insulation of the gear lever sensor wiring	Go to Step 11	Wiring insulation not correct	Restore the correct insulation of the wiring
11	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	sensor connector	Check whether the air conditioning pressure connector is oxidised (gear lever sensor supply from linear pressure sensor)	Go to Step 12	Presence of oxidation on linear pressure sensor connector	Restore the correct operation of the linear pressure sensor connector
12	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position (short circuit to Vbatt or open circuit)	Check whether the gear lever sensor is correctly positioned	Go to Step 13	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor
13	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION	OK (NO FAULTS	FAULT DETECTED	OPERATION

		CHECK	DETECTED)		
	Gear lever sensor (short circuit to Vbatt or open circuit)		Go to Step 14	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
14	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt or open circuit)	Check that the engine management control unit is working properly	Go to Step 15	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
15	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor connections (incorrect signal frequency)	Check for loose connections on the gear lever sensor and the engine management control unit	Go to Step 16	Presence of loose connections	Restore the correct connections
16	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor wiring (incorrect signal frequency)	Check the continuity of the gear lever sensor wiring	Go to Step 17	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
17	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever	Check the correct			

	sensor wiring (incorrect signal frequency)	insulation of the gear lever sensor wiring	Go to Step 18	Wiring insulation not correct	Restore the correct insulation of the wiring
18	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Linear pressure sensor connector (incorrect signal frequency)	Check whether the air conditioning pressure connector is oxidised (gear lever sensor supply from linear pressure sensor)	Move on to Step 19	Presence of oxidation on linear pressure sensor connector	Restore the correct operation of the linear pressure sensor connector
19	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position (incorrect signal frequency)	Check whether the gear lever sensor is correctly positioned	Move on to Step 20	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor
20	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor (incorrect signal frequency)	Check that the gear lever sensor is working correctly	Move on to Step 21	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
21	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management	Check that the engine		Engine management	Replace the engine management control unit

	control unit (incorrect signal frequency)	management control unit is working properly	diagnosis		Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
--	--	---	-----------	--	---

			Test results			
1	COMPONENT CONCERNED	GEAR LEVER SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Gear lever sensor connections	Check for loose connections on the gear lever sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections	
2	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Gear lever sensor wiring	Check the continuity of the gear lever sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring	
3	COMPONENT CONCERNED	GEAR LEVER SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Gear lever sensor wiring	Check the correct insulation of the gear lever sensor wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring	
4	COMPONENT CONCERNED	LINEAR PRESSURE SENSOR CONNECTOR CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Linear pressure sensor connector	Check whether the air conditioning pressure connector is oxidised (gear	Go to Step 5	Presence of oxidation on linear pressure	Restore the correct operation of the linear pressure sensor	

		lever sensor supply from linear pressure sensor)		sensor connector	connector
5	COMPONENT CONCERNED	GEAR LEVER SENSOR POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor position	Check whether the gear lever sensor is correctly positioned	Go to Step 6	Incorrect gear lever sensor position	Restore the correct position of the gear lever sensor
6	COMPONENT CONCERNED	GEAR LEVER SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Gear lever sensor	Check that the gear lever sensor is working correctly	Go to Step 7	Incorrect gear lever sensor operation	Replace the gear lever sensor Op. 5520D04 GEAR LEVER IN NEUTRAL SENSOR - R.R.
7	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check that the		Engine	Replace the engine management control unit

Test results ATMOSPHERIC PRESSURE OK (NO COMPONENT **FAULT** 1 SENSOR **FAULTS OPERATION** CONCERNED DETECTED **OPERATION** DETECTED) **CHECK** Connect the Examiner diagnosis Atmospheric equipment, pressure Replace the engine access the engine sensor not management control management working unit Engine End of management control unit and properly Op. 1056B82 diagnosis INJECTION/IGNITION control unit display the (located in "Atmospheric SYSTEM E.C.U. the engine pressure" management $\overline{(ONE)}$ - R + R parameter, control unit) checking if the value is correct

191 - Giulietta 1.4 Turbo MultiAir Barometric Pressure Circuit Range/Performance P2227

			Test results		
1	COMPONENT CONCERNED	ATMOSPHERIC PRESSURE SENSOR OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Connect the Examiner diagnosis equipment, access the engine management control unit and display the "Atmospheric pressure" parameter, checking if the value is correct.	End of diagnosis	Atmospheric pressure sensor not working properly (located in the engine management control unit)	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U.

191 - Giulietta 1.4 Turbo MultiAir O2 Sensor Signal Circuit Shorted to Heater Circuit P2231

			Test results		
1	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (short circuit to Vbatt)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 2	Presence of loose connections	Restore the correct connections
2	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to Vbatt)	Check the continuity of the oxygen sensor wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct wiring
3	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to Vbatt)	Check the correct insulation of the oxygen sensor wiring (short circuit between conductors)	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring
4	COMPONENT CONCERNED	CHECK OXYGEN SENSOR PREHEATING RESISTANCE OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
		Check the correct operation of the			Replace the

	Oxygen sensor preheating resistance (short circuit to Vbatt)	oxygen sensor preheating resistance. The nominal resistance value at 20°C is 3 Ω (in the event of values higher than 40 Ω replace the upstream sensor)	Go to Step 5	Incorrect operation of the preheating resistance	upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to Vbatt)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1080B82 PARTICULATE FILTER DIFFERENTIAL PRESSURE (D.P.F.) SENSOR - R.R.
6	COMPONENT CONCERNED	OXYGEN SENSOR CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor connections (short circuit to GND or open circuit)	Check for the presence of loose connections on the oxygen sensor and the engine management control unit	Go to Step 7	Presence of loose connections	Restore the correct connections
7	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to GND or open circuit)	Check the continuity of the oxygen sensor wiring	Go to Step 8	Faults in the continuity of the wiring	Restore the correct wiring

8	COMPONENT CONCERNED	OXYGEN SENSOR WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor wiring (short circuit to GND or open circuit)	Check the correct insulation of the oxygen sensor wiring (short circuit between conductors)	Go to Step 9	Wiring insulation not correct	Restore the correct insulation of the wiring
9	COMPONENT CONCERNED	CHECK OXYGEN SENSOR PREHEATING RESISTANCE OPERATION	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Oxygen sensor preheating resistance (short circuit to GND or open circuit)	Check the correct operation of the oxygen sensor preheating resistance. The nominal resistance value at 20°C is $3\ \Omega$ (in the event of values higher than $40\ \Omega$ replace the upstream sensor)	Go to Step 10	Incorrect operation of the preheating resistance	Replace the upstream Lambda sensor Op. 1080B94 FRONT LAMBDA SENSOR TO WITH CATALYTIC CONVERTER - R.R
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (short circuit to GND or open circuit)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1080B82 PARTICULATE FILTER DIFFERENTIAL PRESSURE (D.P.F.) SENSOR - R.R.

Test results LAMBDA OK (NO **COMPONENT** SENSOR **FAULT** 1 **FAULTS OPERATION CONCERNED OPERATION** DETECTED DETECTED) CHECK Replace the upstream Lambda sensor Op. 1080B94 The oxygen Check that the **FRONT** sensor is not Oxygen sensor Lambda sensor is Go to Step 2 **LAMBDA** working working properly SENSOR TO properly WITH **CATALYTIC CONVERTER -**R.R **ENGINE MANAGEMENT** OK (NO **COMPONENT** CONTROL FAULT **OPERATION** 2 **FAULTS CONCERNED** DETECTED UNIT DETECTED) **OPERATION CHECK** Replace the engine management Check that the Engine control unit Engine engine management Op. 1080B82 End of management management control unit not **PARTICULATE** diagnosis control unit is control unit working **FILTER** working properly properly **DIFFERENTIAL** <u>PRESSURE</u> (D.P.F.) SENSOR - R.R.

191 - Giulietta 1.4 Turbo MultiAir Brake Pedal Position/Accelerator Pedal Position Incompatible P2299

			Test results			
1	COMPONENT CONCERNED	CHECK THE CUSTOMER'S DRIVING STYLE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Customer driving style	Ask the customer if he drives the vehicle in an unusual way (brake pedal and accelerator pedal pressed simultaneously)	Go to Step 2	Customer drives in an unusual way	Advise the customer to adopt a correct driving style	
2	COMPONENT CONCERNED	BRAKE PEDAL SWITCH WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Brake pedal switch wiring	Check the continuity of the brake pedal switch wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring.	
3	COMPONENT CONCERNED	BRAKE PEDAL SWITCH POSITION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Brake pedal switch	Check that the brake pedal switch is in the correct position	Go to Step 3	Incorrect position of brake pedal switch	Restore the correct position of the brake pedal switch	
4	COMPONENT CONCERNED	BRAKE PEDAL SWITCH OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION	
	Brake pedal switch	Check that the brake pedal switch is working properly using the diagnosis	Go to Step 5	Brake pedal switch is not working correctly	Replace the brake pedal Op. 1056B28 SWITCH ON BRAKE PEDAL - R.R.	

		equipment			
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results				
1	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Connections on engine management control unit (internal electronics fault)	Check for the presence of loose connections on the engine management control unit and the other CAN nodes	Go to Step 2	Presence of loose connections	Restore the correct connections		
2	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	CAN wiring (internal electronics fault)	Check the continuity of the CAN wiring	Go to Step 3	Faults in the continuity of the wiring	Restore the correct continuity for the wiring		
3	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	CAN wiring (internal electronics fault)	Check the correct insulation of the CAN wiring	Go to Step 4	Wiring insulation not correct	Restore the correct insulation of the wiring		
4	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit (internal	Check that the engine management	Go to Step 5	Engine management control unit	Replace the engine management control unit Op. 1056B82		

	electronics fault)	control unit is working properly		not working properly	INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
5	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections (message missing)	Check for the presence of loose connections on the engine management control unit and the other CAN nodes	Go to Step 6	Presence of loose connections	Restore the correct connections
6	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN wiring (message missing)	Check the continuity of the CAN wiring	Go to Step 7	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
7	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN wiring (message missing)	Check the correct insulation of the CAN wiring	Go to Step 8	Wiring insulation not correct	Restore the correct insulation of the wiring
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (internal electronics fault)	Check that the engine management control unit is working properly	Go to Step 9	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
		CHECK CONNECTIONS	OK (NO		

9	COMPONENT CONCERNED	ON ENGINE MANAGEMENT CONTROL UNIT	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections (bus off)	Check for the presence of loose connections on the engine management control unit and the other CAN nodes	Go to Step 10	Presence of loose connections	Restore the correct connections
10	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN wiring (bus off)	Check the continuity of the CAN wiring	Go to Step 11	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
11	COMPONENT CONCERNED	CAN WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	CAN wiring (bus off)	Check the correct insulation of the CAN wiring	Go to Step 12	Wiring insulation not correct	Restore the correct insulation of the wiring
12	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections (bus off) Check that the engine management control unit is working properly End of diagnosis			Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results				
1	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Body Computer (incorrect comparison signal)	Connect the diagnostic equipment to the Body Computer and check for the presence of errors on the Cruise Control lever	Go to Step 2	Presence of errors on the Cruise Control lever	Continue as instructed by the diagnostic equipment		
2	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit connections (incorrect comparison signal)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 3	Presence of loose connections	Restore the correct connections		
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit wiring (incorrect comparison signal)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Go to Step 4	Faults in the continuity of the wiring	Restore the correct continuity for the wiring		
	COMPONENT	BODY COMPUTER	OK (NO	FAULT			

4	CONCERNED	OPERATION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Body Computer (incorrect comparison signal)	Check that the Body Computer is working correctly	Go to Step 5	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (serial data not valid)	Connect the diagnostic equipment to the Body Computer and check for the presence of errors on the Cruise Control lever	Go to Step 7	Presence of errors on the Cruise Control lever	Continue as instructed by the diagnostic equipment
7	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections (serial data not valid)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 8	Presence of loose connections	Restore the correct connections
		ENGINE MANAGEMENT	OK (NO		

8	COMPONENT CONCERNED	CONTROL UNIT WIRING CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (serial data not valid)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (serial data not valid)	Check that the Body Computer is working correctly	Go to Step 10	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (serial data not valid)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect sequence counter)	Connect the diagnostic equipment to the Body Computer and check for the presence of errors on the Cruise Control lever	Go to Step 12	Presence of errors on the Cruise Control lever	Continue as instructed by the diagnostic equipment
	COMPONENT	CHECK CONNECTIONS ON ENGINE	OK (NO	FAULT	

12	CONCERNED	MANAGEMENT CONTROL UNIT	FAULTS DETECTED)	DETECTED	OPERATION
	Engine management control unit connections (incorrect sequence counter)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 13	Presence of loose connections	Restore the correct connections
13	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (incorrect sequence counter)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Go to Step 14	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
14	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect sequence counter)	Check that the Body Computer is working correctly	Go to Step 15	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect sequence counter)	Check that the engine management control unit is working properly	Go to Step 16	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
16	COMPONENT CONCERNED	CHECK ERRORS IN BODY	OK (NO FAULTS	FAULT DETECTED	OPERATION

		COMPUTER	DETECTED)		
	Body Computer (signal not valid)	Connect the diagnostic equipment to the Body Computer and check for the presence of errors on the Cruise Control lever	Go to Step 17	Presence of errors on the Cruise Control lever	Continue as instructed by the diagnostic equipment
17	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections (signal not valid)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 18	Presence of loose connections	Restore the correct connections
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (signal not valid)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Move on to Step 19	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
19	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (signal not valid)	Check that the Body Computer is working correctly	Move on to Step 20	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
	COMPONENT	ENGINE MANAGEMENT CONTROL	OK (NO	FAULT	

20	CONCERNED	UNIT OPERATION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Engine management control unit (signal not valid)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

191 - Giulietta 1.4 Turbo MultiAir Invalid Data Received From Body Control Module U0422

			Test results				
1	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Body Computer (serial data not valid)	Connect the diagnosis equipment to the Body Computer and check for the presence of errors on the key recognition	Go to Step 2	Presence of errors on the key recognition	Continue as instructed by the diagnostic equipment		
2	COMPONENT CONCERNED	CHECK CONNECTIONS ON ENGINE MANAGEMENT CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit connections (serial data not valid)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 3	Presence of loose connections	Restore the correct connections		
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION		
	Engine management control unit wiring (serial data not valid)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Go to Step 4	Faults in the continuity of the wiring	Restore the correct continuity for the wiring		
	COMPONENT	BODY COMPUTER	OK (NO	FAULT			

4	CONCERNED	OPERATION CHECK	FAULTS DETECTED)	DETECTED	OPERATION
	Body Computer (serial data not valid)	Check that the Body Computer is working correctly	Go to Step 5	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (serial data not valid)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	CHECK ERRORS IN BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect sequence counter)	Connect the diagnosis equipment to the Body Computer and check for the presence of errors on the key recognition	Go to Step 7	Presence of errors on the key recognition	Continue as instructed by the diagnostic equipment
7	COMPONENT CONCERNED		OK (NO	FAULT DETECTED	OPERATION
	Engine management control unit connections (incorrect sequence counter)	Check for loose connections on the engine management control unit and the Body Computer	Go to Step 8	Presence of loose connections	Restore the correct connections
		ENGINE MANAGEMENT	OK (NO		

8	COMPONENT CONCERNED	CONTROL UNIT WIRING CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (incorrect sequence counter)	Check the continuity of the wiring from the engine management control unit to the Body Computer	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (incorrect sequence counter)	Check that the Body Computer is working correctly	Go to Step 10	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect sequence counter)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	IGNITION KEY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition keys (not programmed)	Try and see whether the other keys that came with the vehicle are working normally	Go to Step 2	The other keys supplied do not work	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
2	COMPONENT CONCERNED	CODE AERIAL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Code aerial (not programmed)	Check that the code aerial is working properly	Go to Step 3	Code aerial faulty	Replace the code aerial Op. 5580E08 AERIAL FOR ELECTRONIC KEY (CODE) - R.R.
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (not programmed)	Check the correct continuity of the wiring between the engine management control unit and the Body Computer	Go to Step 4	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
4	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (not programmed)	Check that the Body Computer is working correctly	Go to Step 5	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION

					<u>UNIT - R.R.</u>
5	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (not programmed)	Check that the engine management control unit is working properly	Go to Step 6	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
6	COMPONENT CONCERNED	IGNITION KEY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition keys (incorrect comparison signal)	Try and see whether the other keys that came with the vehicle are working normally	Go to Step 7	The other keys supplied do not work	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
7	COMPONENT CONCERNED	CODE AERIAL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Code aerial (incorrect comparison signal)	Check that the code aerial is working properly	Go to Step 8	Code aerial faulty	Replace the code aerial Op. 5580E08 AERIAL FOR ELECTRONIC KEY (CODE) - R.R.
8	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit wiring (incorrect comparison signal)	Check the correct continuity of the wiring between the engine management control unit and the Body Computer	Go to Step 9	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
9	COMPONENT	BODY COMPUTER	OK (NO FAULTS	FAULT	OPERATION

	CONCERNED	OPERATION CHECK	DETECTED)	DETECTED	
	Body Computer (incorrect comparison signal)	Check that the Body Computer is working correctly	Go to Step 10	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
10	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (incorrect comparison signal)	Check that the engine management control unit is working properly	Go to Step 11	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R
11	COMPONENT CONCERNED	IGNITION KEY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition keys (protection time- out on circuit/component)	Try and see whether the other keys that came with the vehicle are working normally.	Go to Step 12	The other keys supplied do not work	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
12	COMPONENT CONCERNED	CODE AERIAL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Code aerial (protection time-out on circuit/component)	Check that the code aerial is working properly	Go to Step 13	Code aerial faulty	Replace the code aerial Op. 5580E08 AERIAL FOR ELECTRONIC KEY (CODE) - R.R.
13	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT WIRING CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Control unit wiring (protection	Check the correct continuity of the wiring between the engine	Go to Step	Faults in the continuity of	Restore the correct

	time-out on circuit/component)	management control unit and the Body Computer	14	the wiring	continuity for the wiring
14	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (protection time- out on circuit/component)	Check that the Body Computer is working correctly	Go to Step 15	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTIO UNIT - R.R.
15	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (protection time- out on circuit/component)	Check that the engine management control unit is working properly	Go to Step 16	Engine management control unit not working properly	Replace the engine management control union Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE R + R
16	COMPONENT CONCERNED	IGNITION KEY OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition keys (anomalous signal)	Try and see whether the other keys that came with the vehicle are working normally.	Go to Step 17	The other keys supplied do not work	Replace Body Compute Op. 5505A35 MAIN BODY COMPUTER/JUNCTIO UNIT - R.R.
17	COMPONENT CONCERNED	CODE AERIAL OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Code aerial (anomalous signal)	Check that the code aerial is working properly	Go to Step 18	Code aerial faulty	Replace the code aerial Op. 5580E08 AERIAL FOR ELECTRONIC KEY (CODE) - R.R.
18	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL	OK (NO FAULTS	FAULT DETECTED	OPERATION

		UNIT WIRING CHECK	DETECTED)		
	Engine management control unit wiring (anomalous signal)	Check the correct continuity of the wiring between the engine management control unit and the Body Computer	Move on to Step 19	Faults in the continuity of the wiring	Restore the correct continuity for the wiring
19	COMPONENT CONCERNED	BODY COMPUTER OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer (anomalous signal)	Check that the Body Computer is working correctly	Move on to Step 20	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
20	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit (anomalous signal)	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK IF THE IMPACT HAS EFFECTIVELY TAKEN PLACE	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Fuel system	This error is stored after fuel pump deactivation due to the intervention of the Air Bag Node in the event of an impact. Check if the impact has effectively taken place.	End of diagnosis	Impact has effectively taken place	Connect the diagnosis equipment to the Body Computer control unit, enter active diagnosis and carry out the procedure "Inertia switch reset (FIS)"

			Test results		
1	COMPONENT CONCERNED	CHECK WIRING BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND BODY COMPUTER	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wiring between engine management control unit and Body Computer	Check that the CAN connections between the engine management control unit and the Body Computer are not faulty. In particular, check that there are no open circuit or short circuit problems [EL_1050]	Go to Step 2	There are faulty connections	Restore or, if necessary, replace the wiring
2	COMPONENT CONCERNED	BODY COMPUTER CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer connections	Disconnect/reconnect the Body Computer control unit connectors and check for the presence of loose pins	Go to Step 3	Presence of a loose pin	Restore the correct operation of the connector
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit connections	Disconnect/reconnect the engine management control unit connectors and check for the presence of loose pins	Go to Step 4	Presence of a loose pin	Restore the correct operation of the connector

4	COMPONENT CONCERNED	BODY COMPUTER CONTROL UNIT SUPPLY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer supply	Check that the supply for the Body Computer control unit is correct	Go to Step 5	Power supply not correct	Restore the correct power supply
5	COMPONENT CONCERNED	BODY COMPUTER CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer	Check that the Body Computer control unit is working properly	Go to Step 6	The Body Computer is not working properly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED	CHECK WIRING BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND ELECTRIC STEERING CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wiring between engine management control unit and electric steering control unit	Check that the CAN connections between the engine management control unit and the electric steering control unit are not faulty. In particular, check that there are no open circuit or short circuit problems See E1050 CAN CONNECTION LINES	Go to Step 2	There are faulty connections	Restore or, if necessary, replace the wiring
2	COMPONENT CONCERNED	ELECTRIC STEERING CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Electric steering control unit connections	Disconnect/reconnect the electric steering control unit connectors and check for the presence of loose pins	Go to Step 3	Presence of a loose pin	Restore the correct operation of the connector
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management	Disconnect/reconnect the engine management control		Presence of	Restore the correct

	control unit connections	unit connectors and check for the presence of loose pins	Go to Step 4	a loose pin	operation of the connector
4	COMPONENT CONCERNED	ELECTRIC STEERING CONTROL UNIT POWER SUPPLY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Electric steering control unit supply	Check the correct supply of the electric steering control unit	Go to Step 5	Power supply not correct	Restore the correct power supply
5	COMPONENT CONCERNED	ELECTRIC STEERING CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Electric steering control unit	Check that the electric steering control unit is working properly	Go to Step 6	The power steering control unit is not working correctly	Replace the electric steering control unit Op. 4110D20
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED			FAULT DETECTED	OPERATION
	Wiring between engine management control unit and ABS control unit	Check that the CAN connections between the engine management control unit and the ABS control unit are not faulty. In particular, check that there are no open circuit or short circuit problems [EL_1050]	Go to Step 2	There are faulty connections	Restore or, if necessary, replace the wiring
2	COMPONENT CONCERNED	• • • • • • • • • • • • • • • • • • •		FAULT DETECTED	OPERATION
	ABS control unit connections	Disconnect/reconnect the ABS control unit connectors and check for the presence of loose pins		Presence of a loose pin	Restore the correct operation of the connector
3	COMPONENT CONCERNED			FAULT DETECTED	OPERATION
	Engine management control unit connections	Disconnect/reconnect the engine management control unit connectors and check for the presence of loose pins	Go to Step 4	Presence of a loose pin	Restore the correct operation of the connector
		ABS CONTROL	OK (NO		

4	COMPONENT CONCERNED	UNIT POWER SUPPLY CHECK	FAULTS DETECTED)	FAULT DETECTED	OPERATION
	ABS control unit supply	Check that the power supply for the ABS control unit is correct	Go to Step 5	Power supply not correct	Restore the correct power supply
5	COMPONENT CONCERNED	ABS CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	ABS control unit	Check that the ABS control unit is working properly	Go to Step 6	The ABS control unit is not working correctly	Replace the ABS control unit [PR_3340A12]
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit [PR_1056B82]

			Test results		
1	COMPONENT CONCERNED	CHECK WIRING BETWEEN ENGINE MANAGEMENT CONTROL UNIT AND ROBOTISED GEARBOX CONTROL UNIT	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Wiring between engine management control unit and robotised gearbox control unit	Check that the CAN connections between the engine management control unit and the robotised gearbox control unit are not faulty. In particular, check that there are no open circuit or short circuit problems See E1050 CAN CONNECTION LINES	Go to Step 2	There are faulty connections	Restore or, if necessary, replace the wiring
2	COMPONENT CONCERNED	ROBOTISED GEARBOX CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Robotised gearbox control unit connections	Disconnect/reconnect the robotised gearbox control unit connectors and check for the presence of loose pins	Go to Step 3	Presence of a loose pin	Restore the correct operation of the connector
3	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT CONNECTION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine	Disconnect/reconnect the engine			

	management control unit connections	management control unit connectors and check for the presence of loose pins	Go to Step 4	Presence of a loose pin	Restore the correct operation of the connector
4	COMPONENT CONCERNED	AUTOMATED GEARBOX CONTROL UNIT POWER SUPPLY CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Robotised gearbox control unit supply	Check that the supply for the robotised gearbox control unit is correct	Go to Step 5	Power supply not correct	Restore the correct power supply
5	COMPONENT CONCERNED	ROBOTISED GEARBOX CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Robotized gearbox control unit	Check that the robotised gearbox control unit is working properly	Go to Step 6	The robotised gearbox control unit is not working correctly	Replace the automated gearbox control unit Op. 2127E10 HYDRAULIC SPEED SELECTION SYSTEM CONTROL UNIT - R.R.
6	COMPONENT CONCERNED	ENGINE MANAGEMENT CONTROL UNIT OPERATION CHECK	OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Engine management control unit	Check that the engine management control unit is working properly	End of diagnosis	Engine management control unit not working properly	Replace the engine management control unit Op. 1056B82 INJECTION/IGNITION SYSTEM E.C.U. (ONE) - R + R

			Test results		
1	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Ignition switch	Check that the ignition switch is working correctly	Go to Step 2	The ignition switch is not working correctly	Replace the ignition switch Op. 5520A10 IGNITION SWITCH ASSEMBLY - R+R
2	COMPONENT CONCERNED		OK (NO FAULTS DETECTED)	FAULT DETECTED	OPERATION
	Body Computer	Check that the Body Computer is working correctly	End of diagnosis	The Body Computer is not working correctly	Replace Body Computer Op. 5505A35 MAIN BODY COMPUTER/JUNCTION UNIT - R.R.