

VIDEO TUTORIAL



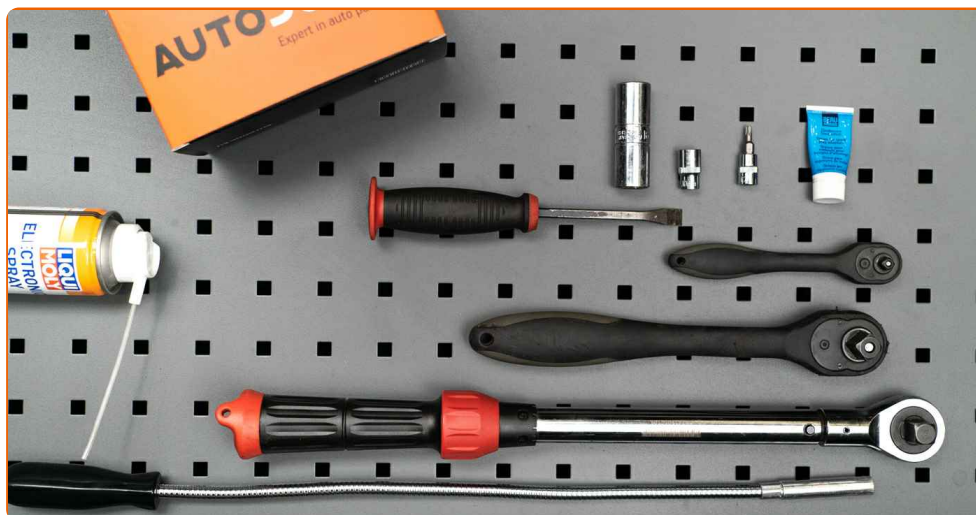
i Important!

This replacement procedure can be used for:

BMW 3 Compact (E46) 316ti 1.8, BMW 3 Compact (E46) 318ti 2.0, BMW 3 Saloon (E46) 318i 2.0, BMW 3 Saloon (E46) 316i 1.8, BMW 3 Touring (E46) 318i 2.0, BMW 3 Touring (E46) 316i 1.8, BMW 3 Saloon (E90) 320i 2.0, BMW Z4 Roadster (E85) 2.0 i, BMW 3 Touring (E91) 320i 2.0, BMW 3 Saloon (E46) 316i 1.6, BMW 3 Coupe (E46) 316Ci 1.6, BMW 3 Saloon (E90) 318i 2.0, BMW X3 (E83) 2.0 i, BMW 3 Touring (E91) 318i 2.0, BMW 3 Convertible (E46) 318Ci 2.0, (+ 15)

The steps may slightly vary depending on the car design.

REPLACEMENT: SPARK PLUGS – BMW E46 CONVERTIBLE. TOOLS YOU MIGHT NEED:



- Electronic spray
- High-temperature anti-seize lubricant
- Torx bit T20
- Spark plug socket # 16
- Ratchet wrench
- Torque wrench
- Telescoping magnet
- Crow bar
- Fender cover

BUY TOOLS

Replacement: spark plugs – BMW E46 convertible. Professionals recommend:

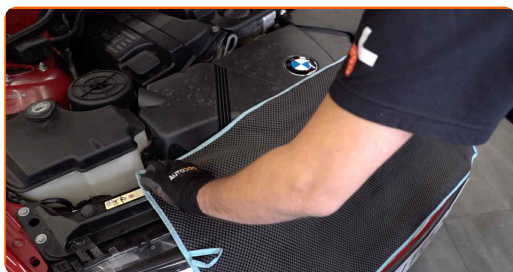
- The replacement procedure is the same for all spark plugs.
- Warning! Shut down the engine before starting any work – BMW E46 convertible.

CARRY OUT REPLACEMENT IN THE FOLLOWING ORDER:

1 Open the hood.



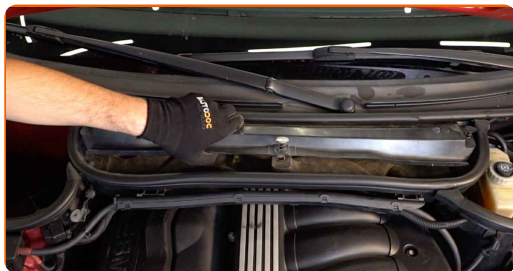
2 Use a fender protection cover to prevent damaging paintwork and plastic parts of the car.



3 Unscrew the fasteners of the cabin filter housing cover.



4.1 Raise a little the cabin filter housing cover.



4.2 Remove the cabin filter.



Replacement: spark plugs – BMW E46 convertible. AUTODOC experts recommend:

- To avoid damaging the cabin filter cover, do not remove it before removing the filtering element.

5 Remove the rubber strip.



6 Remove the cabin filter housing cover.



- 7 Disconnect the wiring harness from the cabin filter housing.



- 8 Unscrew the filter housing fastening bolts. Use Torx T20. Use a ratchet wrench.



- 9 Remove the cabin air filter housing.



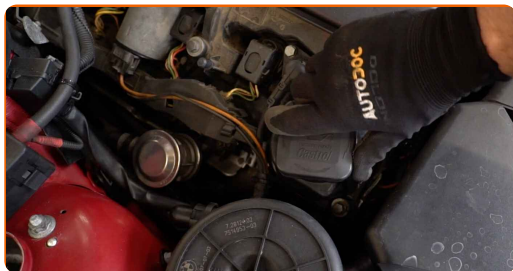
- 10 Unscrew the oil filler plug.



- 11 Remove the engine cover.



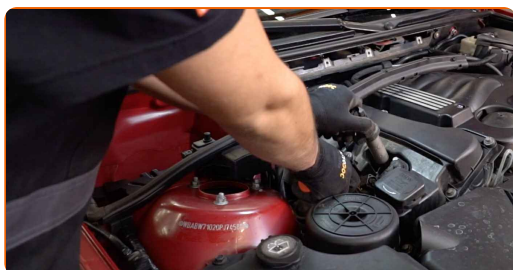
12 Tighten the oil filler cap.



13 Unplug the connectors from the ignition coils.



14 Take out the ignition coil from the spark plug well. Use a crowbar.



Replacement: spark plugs – BMW E46 convertible. Tip:

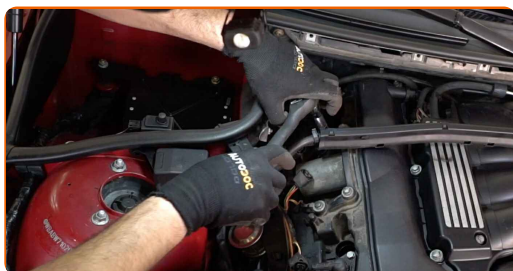
- Remember the sequence of steps for ignition coil demounting.

15 Clean dirt, dust and debris from inside the spark plug wells.



16

Unscrew the spark plugs. Use the spark plug socket #16. Use a ratchet wrench.



17

Take out the spark plugs. Use a telescoping magnet.



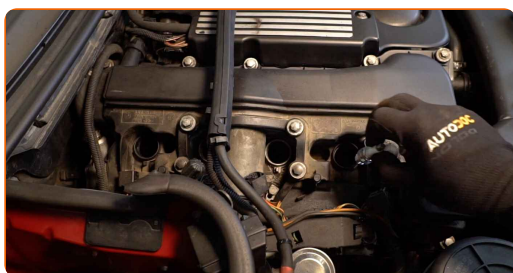
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Apply a thin layer of a special high temperature anti-seize lubricant to the threads of the new spark plugs. Treat the surface of the terminals of the new spark plugs. Use high-temperature grease.



19

Install the new spark plugs into their mounting seats.



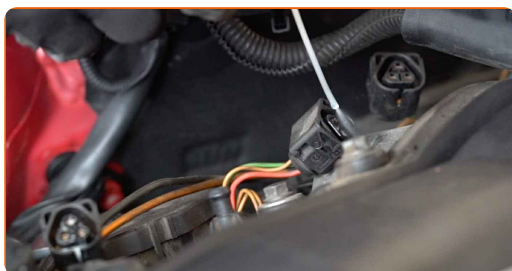
- 20** Screw new spark plugs and tighten them. Use the spark plug socket #16. Use a torque wrench. Tighten it to 27 nm torque.



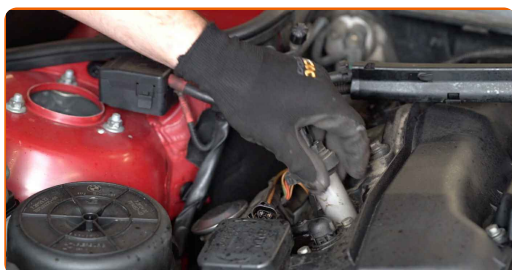
Replacement: spark plugs – BMW E46 convertible. Tip from AUTODOC experts:

- Don't tighten the plugs with excessive force. Exceeding tightening torque can damage the thread connection.
- Be careful when working with a spark plug wrench. Its skewing can cause damage to the threaded connection.

- 21** Treat the ignition coil connector with electronic spray. The spray will protect the electrical contacts from corrosion, oxidation, and will reduce the contact resistance.



- 22** Install the ignition coils to the spark plug wells. Make sure you hear a click indicating that it is locked in place.



Replacement: spark plugs – BMW E46 convertible. AUTODOC recommends:

- Follow the installation sequence.

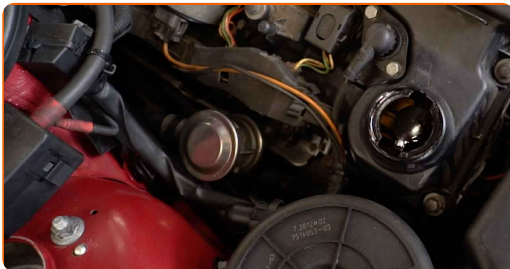
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Plug in the connectors of the ignition coils.



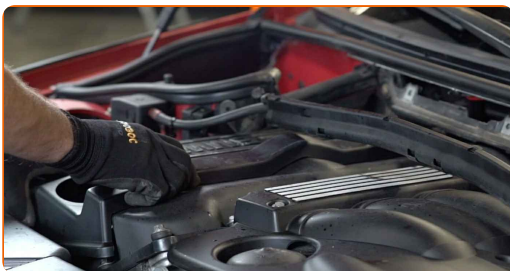
24

Unscrew the oil filler plug.



25

Install the engine cover and secure it.



Replacement: spark plugs – BMW E46 convertible. Tip from AUTODOC experts:

- Make sure the engine cover is properly seated. It should not be displaced with respect to the guiding fasteners.
- Do not apply excessive force when installing the part. Otherwise you may damage the fasteners.

26

Tighten the oil filler cap.



27

Install the cabin air filter housing.



28

Screw in the cabin filter fasteners. Use Torx T20. Use a ratchet wrench.

