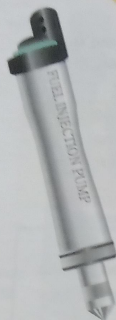


## 2 Diesel vs. gasoline

### Ask the Mechanic!



Diesel engine



VS. Gasoline engine

#### Get ready!

1 Before you read the passage, talk about these questions.

- 1 What are some different types of fuel for vehicles?
- 2 In what part of an engine does fuel ignite?

#### Reading

2 Read the advice column. Then, choose the correct answers.

- 1 What is the purpose of the column?
  - A to show ways to use less fuel
  - B to state the benefits of diesel fuel
  - C to explain the process of combustion
  - D to compare different types of engines
- 2 How is a gasoline engine different from a diesel engine?
  - A A gas engine releases more pollutants.
  - B A gas engine uses spark plugs for ignition.
  - C A gas engine needs more time to warm up.
  - D A gas engine has a smaller fuel injection pump.
- 3 Which of the following is NOT a feature of a diesel engine?
  - A Air and fuel mix before entering the chamber.
  - B It is more durable than a gasoline engine.
  - C It doesn't burn as clean a gasoline engine.
  - D Gasoline cannot be used in it.

#### maintenance



#### combustion chamber



Dear Mechanic, I want to buy my first car. I noticed that some engines **run on gasoline** and others run on **diesel**. What's the difference?

- Todd in Yarmouth

Dear Todd, Both types of engines have **combustion chambers**. However, a diesel engine doesn't have a spark plug. Instead, it uses hot, compressed air to ignite the fuel. The air enters the chamber first. Then the **fuel injection pump** forces fuel into the chamber. Some have **precombustion chambers** or **glow plugs** that **heat up** the air to increase efficiency. In gasoline engines, on the other hand, fuel and air are mixed before entering the chamber, though most use a fuel injection pump as well. Diesel engines also have a higher **compression ratio**.

Diesel has a bad reputation because it doesn't burn as clean as gasoline. New **clean diesel** is much less polluting. And **biodiesel** offers a sustainable fuel option. It's more expensive than gasoline, but provides better fuel economy. Another thing to remember: diesel engines require less **maintenance** and are more **durable**.

#### DIESEL injection pump



#### heat up



#### Vocabulary

3 Read the sentence pair. Choose where the words best fit the blanks.

1 clean diesel / biodiesel

- A Plants are a main source for \_\_\_\_\_.
- B \_\_\_\_\_ was created because regular diesel had too many pollutants.

2 heat up / run on

- A When you start engines they \_\_\_\_\_.
- B Most cars today \_\_\_\_\_ gasoline.

3 durable/ maintenance

- A All vehicles require some \_\_\_\_\_.
- B A \_\_\_\_\_ engine will last a long time.

4 gasoline / diesel


- A \_\_\_\_\_ engines do not use spark plugs.
- B \_\_\_\_\_ engines are the most common today.

- 4 Place the words and phrases from the word bank under the correct heading.


**Word BANK**

fuel injection pump    compression ratio  
glow plug    combustion chamber  
precombustion chamber

| Gasoline and Diesel engines | Diesel engines only |
|-----------------------------|---------------------|
| _____                       | _____               |
| _____                       | _____               |
| _____                       | _____               |

- 5  Listen and read the advice column again. Which type of diesel is the most expensive?

## Listening

- 6  Listen to a conversation between a car buyer and salesperson. Mark the following statements as true