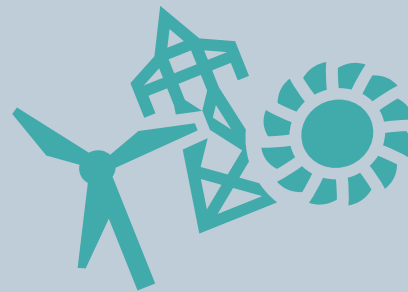
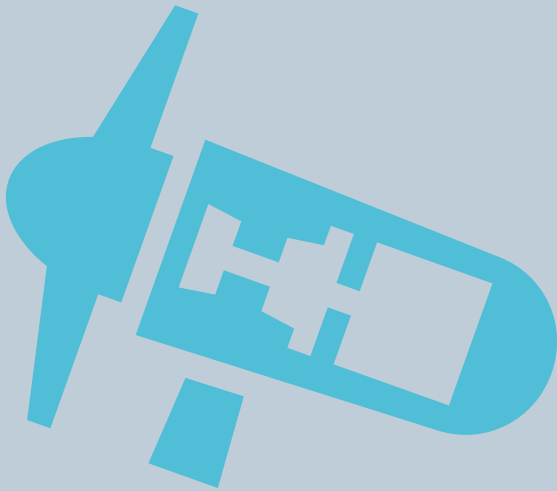
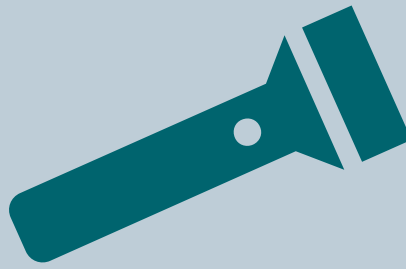


SIEMENS

Ingenuity for life



Energy Quiz

Answer Book

[siemens.co.uk/education](https://www.siemens.co.uk/education)



Though petrol remains the most popular fuel used to power cars in the UK, there are now over 200,000 electric vehicles on the roads in the UK and this number is only going to get bigger in the future.

Question 1

Power is measured in Watts. What is energy measured in?

Joules

Question 2

What is the most common fuel used to power cars in the UK?

Petrol

Question 3

True or False. Energy cannot be created or destroyed?

True

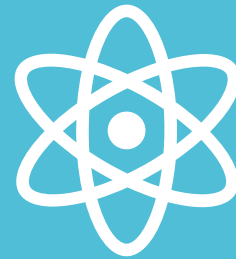
Question 4

Which famous scientist developed the equation for energy, $E = mc^2$?

Albert Einstein

Question 5

Fill in the blanks. Wind turbines convert **kinetic** energy into **electrical** energy.



In 1905 Albert Einstein published a paper containing the equation $E=mc^2$. This paper formed the basis of nuclear energy.

Geothermal energy can harness the heat energy from volcanic activity and use it to heat water and generate electricity!



Question 6

Unscramble 'otgelemrha' to spell a source of renewable energy.

Geothermal

Question 7

What are the three methods of energy transfer?

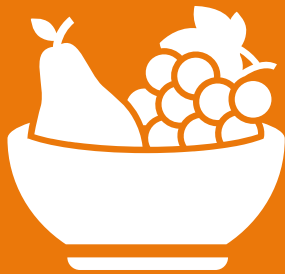
Conduction, convection and radiation

Question 8

Which material is not used as biomass?

C: Waste metal

You need food to fuel your body just like a car needs petrol to drive! Your body needs minerals, vitamins, fibre, fats and protein every day.



Question 9

How do humans get energy to stay alive?

Food

Question 10

Complete the list of the 8 main stores of energy.

- | | |
|--------------------|-------------------------|
| 1. Kinetic | 5. Thermal |
| 2. Magnetic | 6. Elastic |
| 3. Electrostatic | 7. Gravitational |
| 4. Chemical | 8. Nuclear |

Question 11

What is the name given to finite energy sources such as coal and gas?

Non-renewable

Question 12

How much power is consumed on Earth at any given moment?

C. 15,000,000,000,000W

Question 13

Suggest a simple way to save energy around the house?

Switch off lights, insulate walls, install smart thermostat, etc.



Did you know?

Smart meters are devices that let you know how much energy you are consuming. Smart meters can help you to reduce your energy consumption and save money.



Did you know?

Spacecraft and space stations such as the International Space Station use solar panels to generate power on the move.

Question 14

Which device transfers most energy per second:

D: Electric oven.

Question 15

True or false? Solar panels generate more electricity in summer than winter.

True

Discover renewable energy.

Play the Siemens Energy Island interactive game and explore the benefits and challenges of different renewable energies.

Scan the QR code and play now!



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