

# STATIC ELECTRICITY QUIZ QUESTIONS

- Fold these sheets along the centre line so you can only see the questions
- Answer the questions in **writing on lined paper** without using your notes
- Check your answers
- Re-test yourself - the more often you try to remember facts, the more difficult it is to forget them!

## QUESTION

## ANSWER

1	What sort of charge does an electron have?	A negative charge.
2	What does 'static' mean?	Not moving (e.g. a static caravan remains on a site; static electricity remains in place and doesn't flow around a circuit).
3	Do charged objects need to be touching to repel each other?	No. They can repel from a distance.
4	Which type of objects can build up a charge when rubbed together – insulating objects or conducting objects?	Insulating objects.
5	Give two uses of static electricity.	Applications include: photocopiers or printers; electrostatic precipitators to remove dust; paint spraying.
6	If an object loses electrons, what sort of charge does it have?	A positive charge.

7	Give an example of static electricity being dangerous.	Lightning.  Static electricity causing the ignition of a flammable substance such as fuel.  A large charge causing an electric shock to a person.
8	What's an electric field?	The space around a charged object where other charged objects experience a force.
9	Do opposite charges attract or repel?	Opposite charges attract.
10	What's an electrostatic force?	A non-contact force between two charged objects.
11	Define a 'negatively charged object'.	An object that's gained electrons as a result of the charging process.
12	What's an electrostatic precipitator?	A device used in industry (such as power stations and steelworks) that uses static electricity to trap and collect dry dust from process gases. This results in cleaner exhaust gases being released.
13	What's an electron?	A negatively charged sub-atomic (this means part of an atom) particle.
14	Describe how you could demonstrate static electricity with a balloon and small pieces of paper.	Inflate the balloon.  Rub the balloon with a clean dry cloth (or clean dry hair).  Hold the charged balloon close to the small pieces of paper (or close to the hair).  The paper (and hair) should be attracted to the balloon and move or lift and 'stick' to the balloon.
15	How can a charged object lose its charge?	By touching another object and transferring electrons.