

## Bonding bingo!

You have to work out what substance is on your opponent's card by asking questions. You will only get *yes* or *no* as the answer. You have to identify correctly the eight substances on your Bingo card.

### The rules

1. A team has two students.
2. Your team will be given a **Bingo card** and a card with **one** of these names:

**Chlorine**  
**Diamond**  
**Graphite**  
**Iron**  
**Magnesium oxide**  
**Methane**  
**Sodium chloride**  
**Water**

*Do not tell other teams the name of your substance.*

3. Before the game starts, write down some questions that have a yes/no answer about the bonding or properties of materials.

*Examples: Does the bonding involve atoms sharing electrons?  
Does the substance have a high melting point?*

4. To play, join up with another team. Toss a coin to decide who asks questions first.
5. If your team won the toss, ask questions until you find out what the other team's substance is. Confer with your team partner about the answers that you are getting. If you think you know the other team's substance, write it down on a piece of paper and pass it to them.

*Don't guess the name because you only have one go.*

If you are correct, the other team must initial that square on your **Bingo card**.

6. Now you do the reverse with the other team. They ask questions but you can only answer yes or no. If they work out your substance correctly, initial that square on their **Bingo card**. They only have one go at naming the substance.
7. Now find another team and repeat the process.
8. Keep going with yet more teams.

*Watch out! More than one team may have the same substance.  
Some teams may have the same substance as you.*

9. When all of the squares on your **Bingo card** have an initial, shout BINGO! because your team is the winner.

**The questions my team will ask:**

Name .....

**How well I understand about bonding and properties of substances**

I am confident about

I am less sure about

I am not confident about