

Patterns in synthesis, decomposition and displacement reactions and investigate the...

identify patterns in synthesis, decomposition and displacement reactions and investigate the factors that affect reaction rates

Learning intention

- identify patterns in synthesis, decomposition and displacement reactions and investigate the factors that affect reaction rates

Teach and model

- defining and representing synthesis, decomposition and displacement reactions using a variety of formats such as molecular models, diagrams, and word and balanced...
- identifying reaction type and predicting the products
- investigating synthesis reactions such as reaction of metals with oxygen, formation of water and sodium chloride; decomposition reactions such as those used to extract...

Check understanding

- Explain the main idea in patterns in synthesis, decomposition and displacement reactions and investigate the... using an example.
- Show the idea in a second way: with words, a model, a diagram or symbols.
- Apply the idea to a short unfamiliar situation and justify the result.

Teaching cautions

- Ask the student to explain their choice, not only state an answer.
- Check that key vocabulary is understood in a new example.
- Mix representations so the skill is transferred rather than copied.

Quick lesson sequence

- Connect to prior knowledge and introduce the key vocabulary.
- Model one clear example, then solve a second example together.
- Finish with an independent check and a short student explanation.