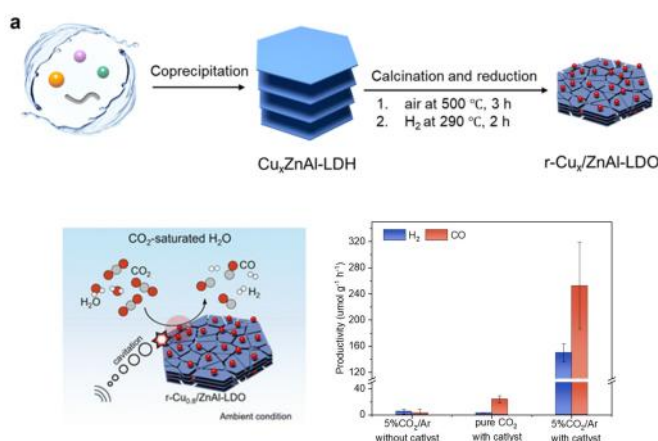


Catalysed sonochemical production of syngas

Oxford scientists have developed a novel metallic copper nanoparticle catalyst for syngas production at room temperature using sonochemical activation.

Applications: Syngas, Sonochemistry, Ultrasound, Catalysts, Layered Double Hydroxides



Features	Benefits
Sonocatalytic reduction of carbon dioxide in water	Room temperature production of syngas (CO/H ₂) using water as source of H ₂
Reactions under ambient conditions	Uses accessible and economically viable layered double oxide catalyst
Green/environmental production route to syngas	Produces both CO & H ₂ in situ
	Produces CO with over 85% selectivity
	Lower costs due to lower thermal requirements

Features

Benefits

Use case for currently employed carbon dioxide sequestration techniques that capture CO₂ in water

Low energy requirements of sonochemical reactor enables greener/renewable power sources

Patented and Available for

- Co-development
 - Consulting
 - Licensing
-

To find out more, contact enquiries@innovation.ox.ac.uk and quote the project number.

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