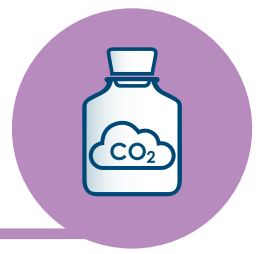
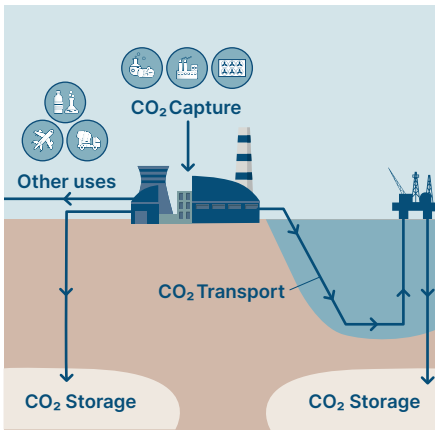


CARBON CAPTURE, STORAGE AND UTILISATION: VITAL BUT LIMITED

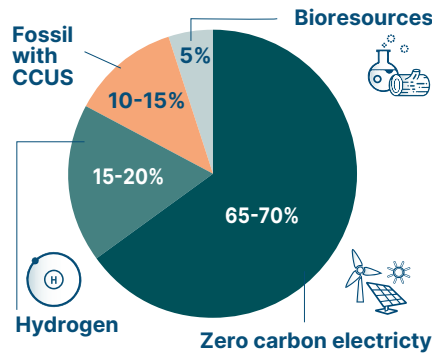


CCUS IS CAPTURING CO₂ FOR STORAGE OR USE



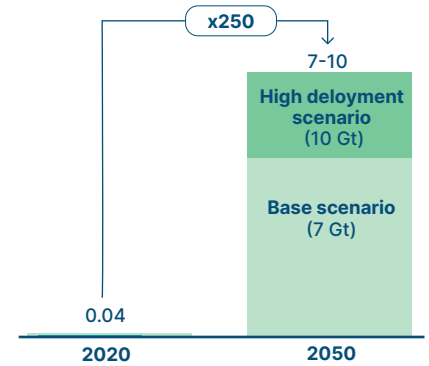
CCUS HAS A VITAL BUT LIMITED ROLE

Final energy mix in a zero-carbon economy by 2050



A SIGNIFICANT SCALE UP IS REQUIRED

Carbon dioxide capture, GtCO₂/year

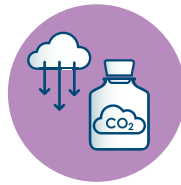


CCUS WILL BE NEEDED IN THREE CONTEXTS

ESSENTIAL ROLE – limited technical alternatives



In industrial processes which produce CO₂ and cannot be decarbonised via other zero-carbon solutions



To provide crucial engineered CO₂ removals from the atmosphere

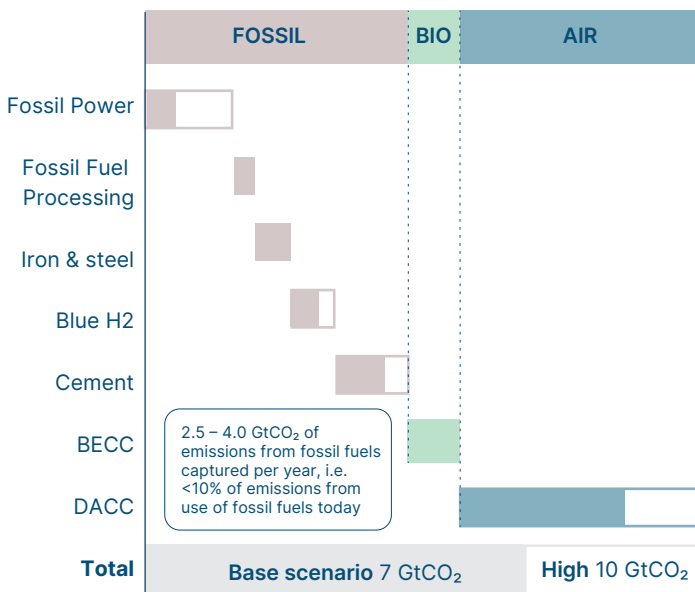


Where it is the lowest-cost decarbonisation solution given local resources and costs

What will it take?

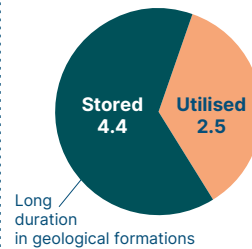
CAPTURING 7-10 GTCO₂ PER YEAR

Captured CO₂ by sector, GtCO₂/year



MOST CO₂ STORED; SOME UTILISED

CO₂ end of life in 2050, GtCO₂/year



HOW IS CO₂ UTILISED?

- 35% Synthetic Aviation Fuel
- 25% High value chemicals & plastics
- 20% Enhanced oil recovery, under specific and limited conditions
- 20% Stored in building materials (i.e. cement & concrete)

INVESTMENT MUST REACH \$285bn PER YEAR BY 2050

Annual CAPEX by CCS Segment

