Session 5 – Moving from Brown to Green Ammonia

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“In-situ” retrofit
A3000
Ax-Radial beds
3-bed converter
A6000
Pseudo-isothermal converter
A600
Super Revamp
AWU
A2000
A60
AMMONIA PROCESS
A60
KNOWLEDGE CONDENSED IN A SMALL PLANT
Minimum energy

Economy of scale

Small scale, distributed?
A60, RE-FOCUS DESIGN

SIMPPLICITY

TIME

COSTS
RENEWABLE AMMONIA: WHY?

Small scale

CO₂ free

Energy storage
NH₃ FROM RENEWABLES

Electrolyser → H₂ Purification → H₂ Buffer → Compression → NH₃ Synthesis → NH₃

Water → Power

N₂ Production → Air

Purge gas
NH₃ FROM RENEWABLES

Water → Electrolyser → H₂ Purification → H₂ Buffer → Compression → NH₃ Synthesis → NH₃

Power

N₂ Production

Air

Purge gas
THE CULTURE OF INNOVATION

THANK YOU

CASALE

A FULL RANGE OF TECHNOLOGIES AND SERVICES