

## **Applications & Technologies Offered By NGCC**

## A. Sulphur Removal (H<sub>2</sub>S, RSH) from Gasses (NG-MODULES):

- New Technology Basis (Electro-Catalytic Principle)
- Extreme High Performance
- Low Specification Range (ppbV) as guaranteed
- All Sulphur components transformed to Elemental Sulphur
- Zero Waste

 $\rightarrow$  Test Container Modules Available (25-50 Nm<sup>3</sup>/h)

 $\rightarrow$  Industrial designs possible ranging <u>100 up to 10.000 Nm<sup>3</sup>/h</u> (modular unit)

## B. CO<sub>2</sub> Methanation to CH<sub>4</sub>:

- New Technology Basis (New Advanced Catalyst System)
- Extreme High Performance (>90% conversion rate)
- Mild Operational Conditions: 280°C / 8 barg
- Upstream NG-Module to remove H<sub>2</sub>S to ppbV range

 → Industrial designs possible ranging <u>100 to 3000 Nm<sup>3</sup>/h</u> (modular system)
→ Total Concept Design possible - including all system elements: (pre-treatment, methanation reactor system, H<sub>2</sub> electrolyzer supply system)

## C. Gas conversion to Liquid Fuels (GTL):

- Modular, Skid-Based Small to Mid-Size Units
- Technical Co-Operation with Calvert Energy Systems
- Extreme High Performance, smallest food print
- Lowest Energy consumption (electrical energy/steam)
- New Advanced Technologies like Plasma Reforming