

Technology and cost assessment of hydrogen propulsion systems and on-board storage for commercial vehicle and marine applications

CLIENT: GLOBAL ENERGY CORPORATION

BACKGROUND: Customer wishes to understand details of hydrogen engine and on-board storage technology for commercial vehicle and ocean-going marine applications; FEV performed a technical and cost assessment

DELIVERABLES

- Assessment of key technologies and their efficiency and cost implications for each application, in terms of:
 - H₂-ICE technologies including combustion, main engine systems, efficiency and emissions
 - H₂ tank technologies, including safety, available space and operational considerations
 - H₂ refueling methods and the enabling technologies required
- Overview of the use of ammonia as an alternative to hydrogen fuel in marine applications
- Assessment of likely “winning concepts” for each aspect, and implications for wider hydrogen economy

