



ADVANTICA

A Germanischer Lloyd Company



Enhancing Safety and Performance

www.advanticagroup.com

Who are Germanischer Lloyd?



- Long established, privately owned and profitable German engineering consultancy
 - £320m turnover (€420m, \$650m)
 - 4100 employees
 - 191 offices
 - 76 countries
 - Headquartered in Hamburg
(Numbers include Advantica)
- They have two businesses
 - Maritime Services
 - Industrial Services



Who are Germanischer Lloyd?



- Long established, privately owned and profitable German engineering consultancy
- **Maritime Services**
 - Leading provider of maritime inspection, classification and certification (for sea-going vessels)
 - Global market leader in ship container classification
 - Safety surveys on 6300 ships worldwide
 - Orders to provide classification for 1300 ships under construction



Who are Germanischer Lloyd?



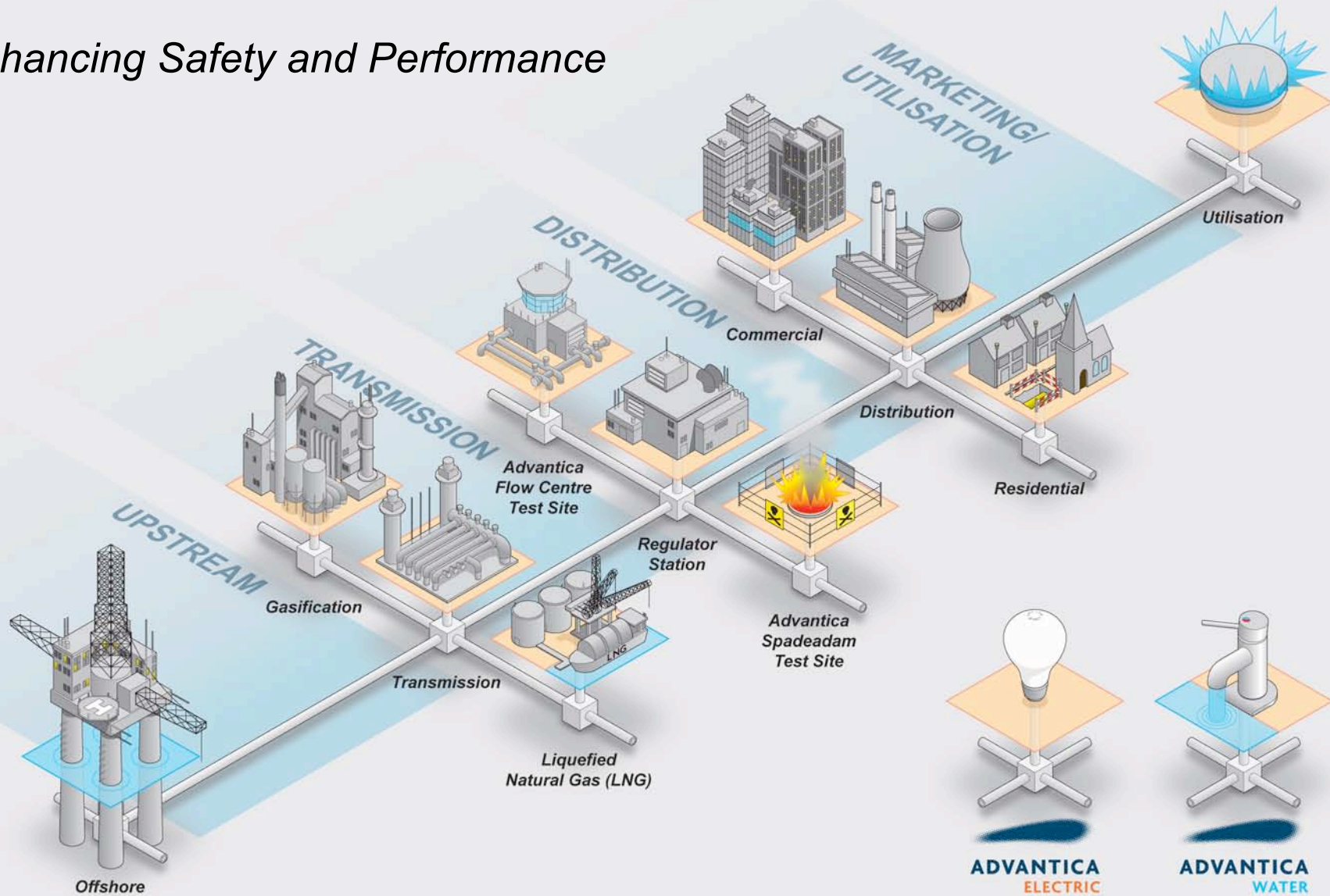
- Long established, privately owned and profitable German engineering consultancy
- Maritime Services
- **Industrial Services**
 - Rapidly growing business operating in four areas:
 - **Oil & Gas**
 - **Wind Energy**
 - **Systems Certification**
 - **Materials & Failure Analysis**

Advantica joined
**Germanischer Lloyd
Industrial Services**
in August 2007



Supporting the supply chain

Enhancing Safety and Performance



Services across the asset lifecycle



■ GL Oil & Gas Services

■ Advantica Services

Services across the asset lifecycle



Project
Identification

Basic & Detail
Engineering

Construction
& Start-up

Operations

Abandonment

Design

Independent review and verification

Certification

Classification of offshore units

Pre-qualification of manufacturer

Risk assessment

FMEA, ETA, FTA

HazID, HazOP, QRA

Network planning software

Design services

Project management consultancy

Specialist engineering support

Gas treatment technologies

Pipeline & gas measurement

Commercial & business systems

Pipeline asset management

Pipeline integrity management

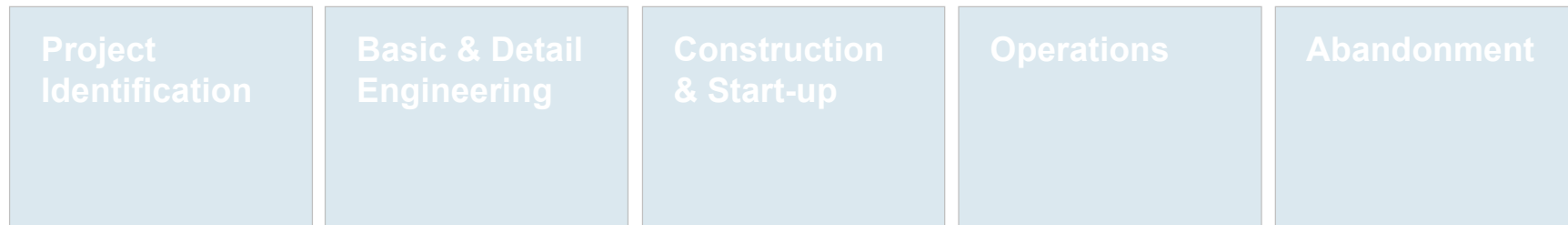
Hazard & risk

Safety management systems

■ GL Oil & Gas Services

■ Advantica Services

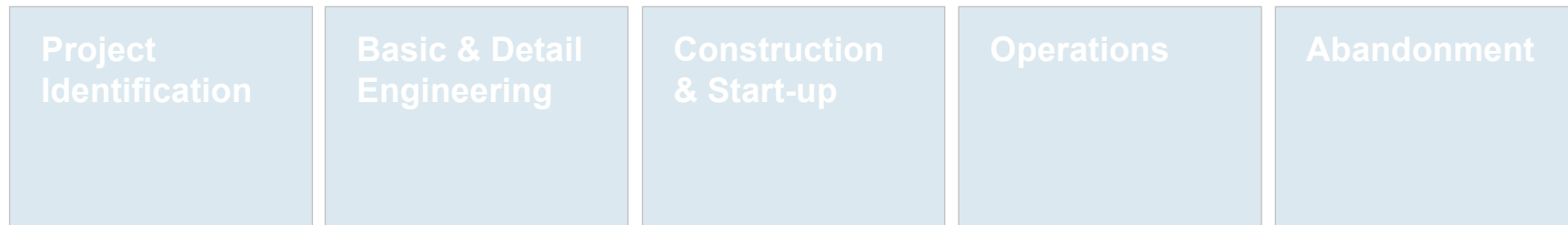
Services across the asset lifecycle



Vendor inspection
Verification
Certification
Equipment tests
Quality assurance and control (QA/QC second and third party)
Acceptance test (start-up)
Risk assessment
Update of risk register
Construction risk
Start-up risk

Project management consultancy
Specialist engineering support
Gas treatment technologies
Rotating equipment services
Pipeline asset management
Pipeline integrity management
Hazard & risk
Safety management systems
Destructive/Non-destructive testing

Services across the asset lifecycle



Asset integrity management
Certification/ Re-certification
Risk assessment

Network planning software
Network planning & analysis
Design services
Project management
Specialist engineering
Meter asset management
Gas treatment
Pipeline/gas measurement
Commercial & business systems
Energy consultancy

Rotating equipment services
Diagnostics
Pipeline asset management
Pipeline integrity management
Hazard & risk
Plant integrity management
Safety management
Investigatory services
Destructive/Non-destructive testing
Appliance certification

Services across the asset lifecycle



Project
Identification

Basic & Detail
Engineering

Construction
& Start-up

Operations

Abandonment

Lifetime extension studies
Risk assessment
Supervision of deconstruction

Project management consultancy
Specialist engineering support
Hazard & risk
Safety management