

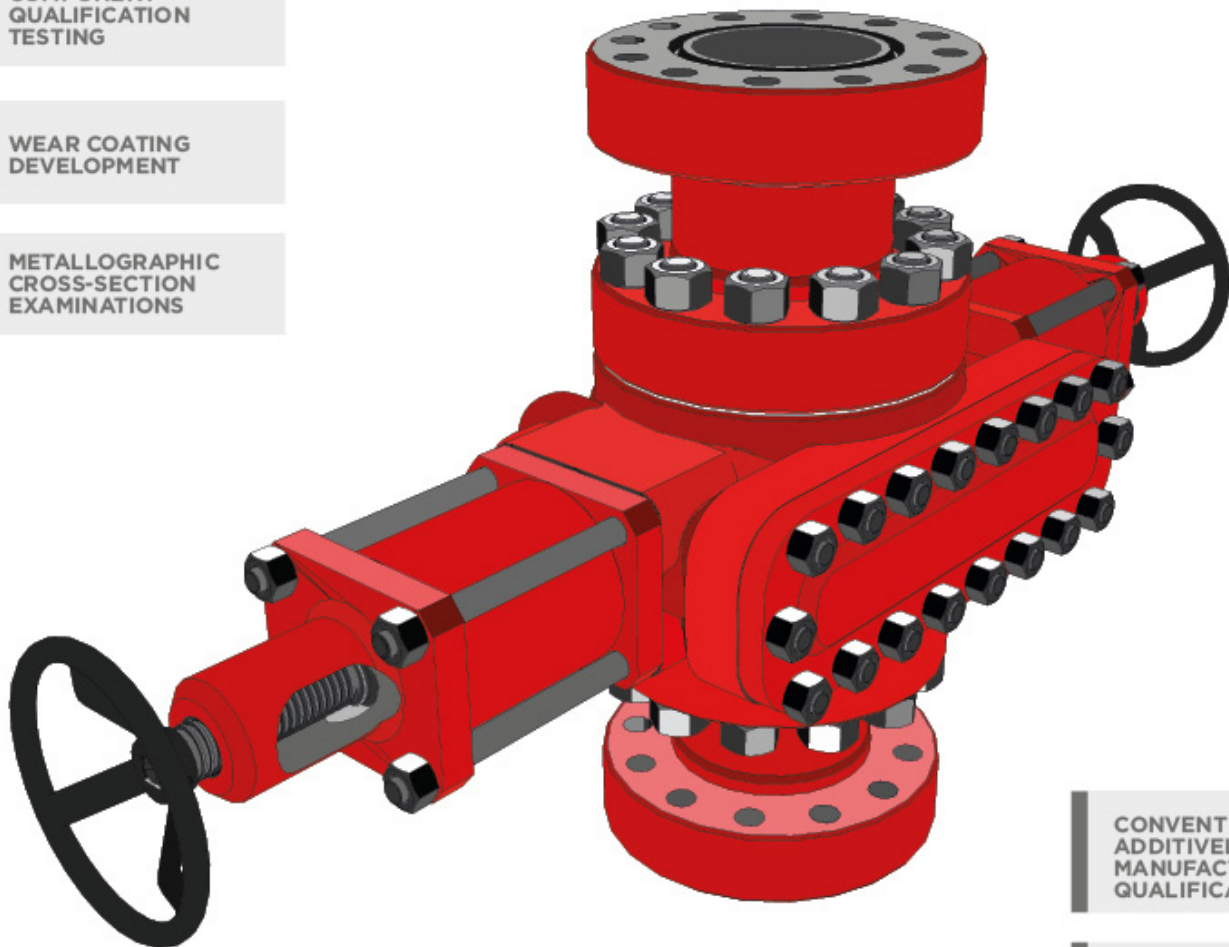
OIL & GAS SERVICES

FAILURE ANALYSIS

COMPONENT
QUALIFICATION
TESTING

WEAR COATING
DEVELOPMENT

METALLOGRAPHIC
CROSS-SECTION
EXAMINATIONS



CONVENTIONALLY &
ADDITIVELY
MANUFACTURED PART
QUALIFICATION

PROCESS & REPAIR
QUALIFICATIONS

CONVENTIONALLY & ADDITIVELY MANUFACTURED PART QUALIFICATION

At Lucideon, we offer a range of comprehensive support services, including analysis of powder materials and raw stock, metallurgical evaluation, chemical analysis, mechanical property characterization, failure analysis and recommendations for improvement.

WEAR COATING DEVELOPMENT

Expert metallographic preparation of applied wear coatings is key to assessing coating material selection, homogeneity, bonding, interface interactions and effects from wear. Techniques ranging from optical microscopy to surface analysis techniques applied to cross-section analysis are used to develop fundamental understanding of wear coating performance and to expedite new product development.

METALLOGRAPHIC CROSS-SECTION EXAMINATIONS

Our experts provide imaging and analysis of a wide variety of materials, including metals, welds, brazes, coatings, ceramics, composites and concrete to examine grain size, microstructure, porosity, constituent distribution, phases, bonding interfaces, and dimensional measurements, all documented with high-quality photo macrographs and micrographs.

COMPONENT QUALIFICATION TESTING

The Lucideon team provides third-party independent inspections and specification testing to verify the quality of materials and manufactured goods for sale, acceptance testing for OEM and regulatory compliance, and property validation for new product offerings.

PROCESS & REPAIR QUALIFICATIONS

We provide data and evidence that supports utilizing new techniques and procedures to provide high-quality, repeatable results.

FAILURE ANALYSIS

At Lucideon, we specialize in complete physical and chemical characterization to analyze failures in metallic and non-metallic materials. Our expertise in metallic materials encompasses analysis of corrosion, erosion, wear, fatigue, impact, heat treatment, castings, coatings and surface treatments, powder metallurgy, welding, brazing, component design, and the analysis of contamination.