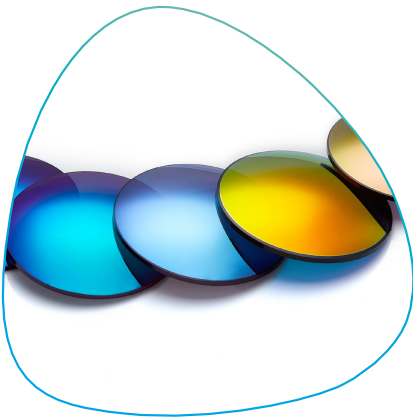
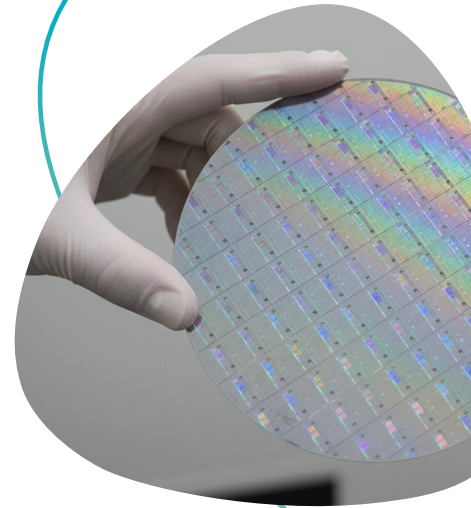


SURFACE MATERIAL ENGINEERING



**“A Pioneer of Surface Material
Engineering, Dedicated to Transforming
Science into Industrial Reality”**



ABRISA TECHNOLOGIES

YOUR TOTAL SOLUTION PARTNER

Abrisa Technologies is Your Total Solution Partner for both Coating Design and Specialty Glass Expertise with OEM Volume Manufacturing Experience.

- Custom coatings from the UV to the infrared
- Large angle of incidence AR or Non-Glare Glass
- Index-Matched Transparent Conductive ITO/IMITO
- Filters, Dichroics, Beamsplitters, Mirrors, Colored Glass
- Bio/chem compatibility, Chemical resistance
- HIE™ Aluminosilicates, chemical and heat tempering
- Specialty in Fabricated Sheet, Float and Flat Glass

ELECTRO-OPTICAL DEVICES

Transparent Conductive Coatings
ITO, Index-Matched, AR, Filters
Bus Bars and Wire Bonding
EMI Shields, Heaters, LC-Switch

ULTRA-THIN SOLUTIONS

Ultra-thin glass $\leq 0.2\text{mm}$
Coated Micro-components
Fabrication and Wafer Dicing
LIDAR, MEMs, Sensors, Displays

DAMAGE RESISTANT OPTICS

Auto-claveable, Thermal Shock
Bio/Chemical Compatible
Oleo/Hydrophobic Optical Coatings
Bio/Medical Imaging, Industrial





KERDRY THIN FILM COATING

Kerdry realizes standard coatings on request.

The company can integrate new projects from initial phase to industrialization.

A wide range of applications:

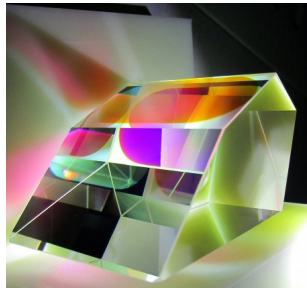
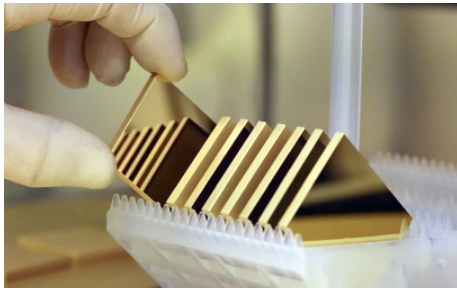
- Spatial, Defense, Metrology,
- Optoelectronic, Astronomy, Medical, Photonics, Luxury,
- Telecommunication

Manufacturing features:

16 coating machines in 1000 m² of clean room.

Substrates up to 1400 mm diameter.

Combination of metallic and optical coating on the same substrate.



METALLIC COATING

(Au, Ti, Pt, Ag, Al, Cu, Cr, Ni, Nb...)
Evaporation and Sputtering Mirror,
Soldering, Conductivity,
Air tightness of packaging...

OPTICAL COATING

Dielectric coatings, Anti-reflective,
Mirror, Dicroic, Filter ...
Bandwidth : from UV to IR (0,35 µm
to 15 µm.)

PHOTOLITHOGRAPHY

On substrate from 2" up to 8"
Lift-off process, Classical process
Resolution: few micrometers

COATING ON OPTICAL FIBER

Optical and metallic Coating



HEF PHOTONICS

PHOTOLITHOGRAPHY & OPTICS

Precision optics and photolithography at the highest level.

Experts in precision optics, photolithography, and thin film technologies deliver a complete range of high-end optical solutions – from coating and lithography to advanced polishing and optical assembly. Integrated capabilities ensure exceptional quality and consistency across the entire process chain, from prototype to large-scale production, and from UV to IR.

Activity sectors:

Aeronautics, Astronomy, Electronics, Medical, Defense, Telecommunications, Space, and Industrial applications.

METALLIZATION

on all types of substrates (glass, single crystals, organic), by E-Beam, and evaporation

POLISHED SURFACES

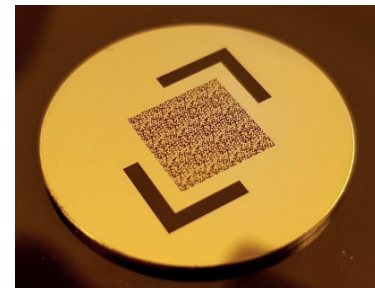
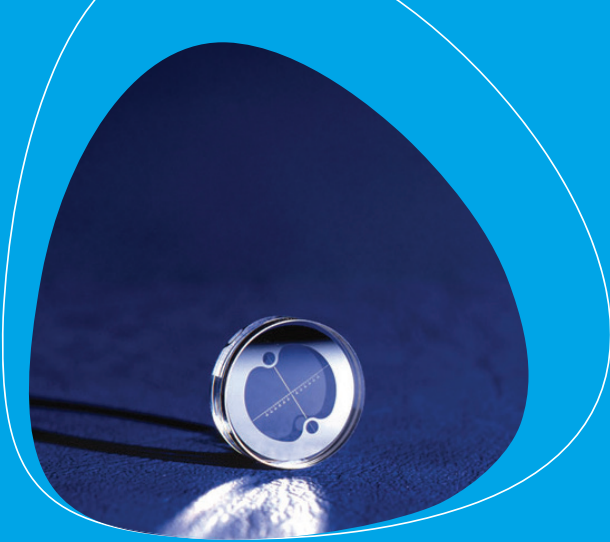
Windows, mirrors, prisms, cubes, lenses, beamsplitters, crystals, rods, double-side polishing

OPTICAL COATINGS

Anti-reflection, dielectric, metallic, infrared, dichroic, multi-spectral, and customized coatings

PHOTOLITHOGRAPHY

masking and creation of complete optical components





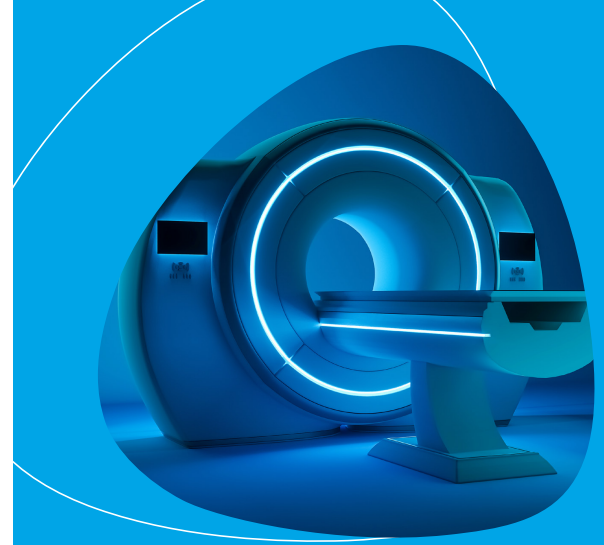
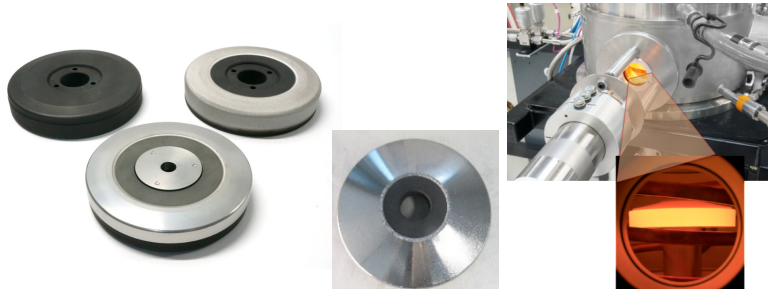
ACERDE

LIGHT ROTATING ANODES, INNOVATIVE SOLUTION IN X-RAY TUBES

ACERDE has developed a unique know-how on high temperature CVD for thick coatings and high purity powders.

The company provides solutions to:

- Refurbishment of existing X-ray targets with W-Re alloys
- W, Re and Mo coatings on carbonaceous substrates
- Synthesis of fluoride compounds
- High temperature CVD deposition



MAIN MATERIALS

W / Re / Mo

MAIN SKILLS

HT CVD

Fluoride chemistry

MAIN APPLICATIONS

Graphite X-ray rotating anodes

(60 mm to 200 mm anodes)

Refurbishment of used X-ray anodes

Thick coatings for harsh environment

High purity powders



TELIC COMPANY

PRECISION PHOTOLITHOGRAPHY

TELIC is a recognized supplier of precision thin film coatings and substrates.

The company is specialized in thin film sputtering, photoresist coating, and double-side polishing on a wide range of substrates.

TELIC combines advanced technology with decades of expertise to deliver high-quality, customized solutions for demanding applications.

Activity sectors:

Semiconductor, Nanofabrication, Microfluidics, Optics, Holography

PHOTOMASKS

Blanks for optical lithography (soda lime, borosilicate, fused silica, crown glass).
Sizes from 2" to 24", thickness 0.3–6 mm.

PVD SPUTTERING

Thin films of Al, Cr, Cu, Au, Ni, Pt, Ag, Ta, Ti, Zr.

PHOTORESIST

Spin coating of positive & negative resists and BARCs up to 50"×50", up to 50 μm thick.

DOUBLE-SIDE POLISHING

From 1" – 31" (up to 50" square), thin glass down to 0.3 mm.

PHOTOLITHOGRAPHY

Lift-off and multi-layer lithography, apertures, reticles, encoders, resolution down to 1 μm.





NEYCO

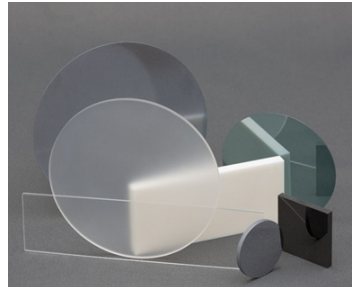
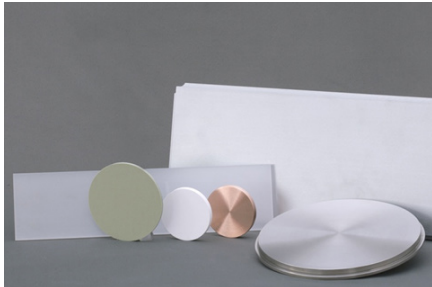
VACUUM AND MATERIALS

High vacuum & UHV, inorganic materials and thin films specialist.

Neyco's structure ensures that you receive qualified and efficient personal contact in order to understand, create, transform and deliver the products you need.

Neyco is the **“Vacuum and Materials” bridge between industries and scientific research centers.**

Neyco is ISO 9001:2015 and ISO 14001:2015 certified, and committed to achieving the highest quality standards with minimal environmental impact.



MAIN SKILLS

Materials: pellets, sputtering targets & backing plates, precious metals, filaments & boats, cones & liners, wafers & substrates

Thin films: thickness measurement and quartz, magnetrons, electron beam guns

Vacuum chambers & components

Sputtering & evaporators on request



EXPERTISE

Tribology
 Photonics
 Hydrogen technologies
 PVD & PE-CVD coatings
 Functional powders
 Femtosecond laser processing

IREIS

RESEARCH AND DEVELOPMENT SERVICES IN SURFACE ENGINEERING

IREIS is a center of excellence dedicated to tribology, photonics, and hydrogen technologies.

The institute develops advanced solutions at the intersection of scientific research and industrial needs.

- Cutting edge optical design and materials
- Innovative surfaces functionalities
- Femtosecond laser processing
- Thin films and materials patterning
- Development of new complex optical components

Applications :

Telecommunications, Healthcare, Aerospace, Space, and Defense

