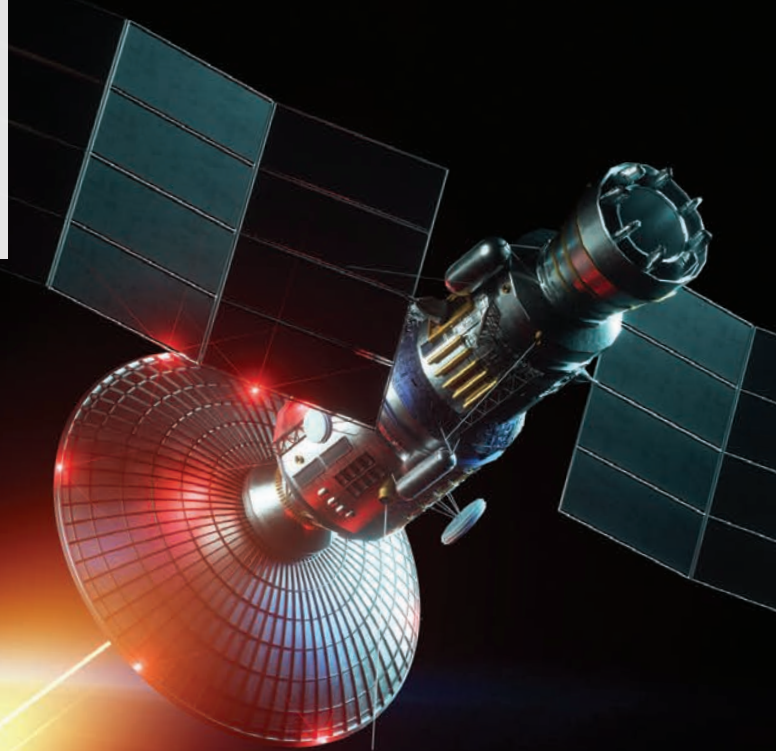




Aerospace & Defense

Innovative Photonic Solutions
Designed to Support Tactical
Mission Requirements





At the Speed of Relevance

Coherent Facts

- Founded in 1966, 5200 employees, 27 global locations
- Over 1000 global patents
- All facilities are ISO 9001:2015 certified
- ITAR Compliant

Coherent delivers photonic and laser technology that advances performance, improves quality and lowers costs. Our products are deployed in strategic space and defense programs, and support targeting, imaging, guidance, SATCOM and directed energy systems. While widely recognized as a leader in lasers, Coherent also produces a diverse range of components and sub-systems, as well as laser-based manufacturing systems for marking, cutting, welding and other processes. Choose Coherent to bring innovative photonic solutions to your most challenging mission requirements.

Vertically Integrated and Domestically Sourced

Did you know that Coherent has a fully vertically integrated and domestically sourced supply chain? Coherent facilities in the US manufacture diode lasers, solid-state lasers, fiber amplifiers, meter class optics, Volume Bragg Gratings, gain and non-linear crystals, optical fibers, and optical isolators. We offer an extensive array of standard products, many of which are readily customized to meet demanding system requirements.

Products

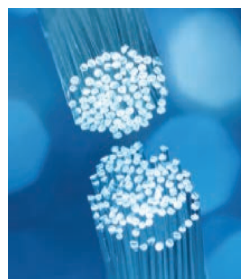


Solid-State and Gas Lasers

Coherent has been at the forefront of laser innovation since 1966. No other laser company matches our breadth of products, enabling Coherent customers to choose the exactly the right wavelength, linewidth, pulse characteristics and power for nearly any application, from precision manufacturing to high energy systems.

Fiber Amplifiers

Coherent fiber amplifiers are based on continual improvements in design that enable us to deliver amplifiers offering unmatched performance and control. Available as stand-alone amplifiers, or complete laser systems (including integrated seed source and conditioning hardware), they are available with a choice of packaging and interface options.



Specialty and Custom Optical Fibers

Coherent manufactures over 10 million meters of specialty fiber each year, deployed in high energy laser amplifiers, harsh environment sensing, LiDAR, sensor arrays and more. A diverse range of standard and custom fibers types are available, including radiation hardened, beam delivery, single mode, multi-kW, gyro, sensing, polarization maintaining, and rare-earth doped active and precision matched passive fibers.

Products

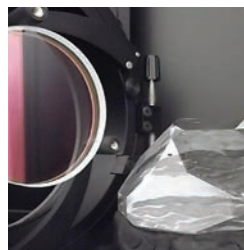


Meter Class Optics

The Coherent Tinsley custom optics group is a premier supplier of meter class optics, supplying primary mirrors for the James Webb Space Telescope, Thirty Meter Telescope, and more. This group supports beam director and imaging systems with spherical, aspheric, free-form and cylindrical surfaces, in materials ranging from standard and low expansion glass, to aluminum, beryllium, nickel and silicon carbide. Coherent Tinsley also has in-house capabilities for space-qualified metal coatings.

Laser Optics

Our fabrication expertise includes low absorption, very high laser damage threshold coatings, applied in high volume on fused silica substrates up to 200 mm. Coherent also produces volume holographic/ Bragg grating filters to enable line narrowed, stabilized laser output over a broad temperature range. These are made using a proprietary photosensitive optical glass for degradation-free performance over an unlimited lifetime.

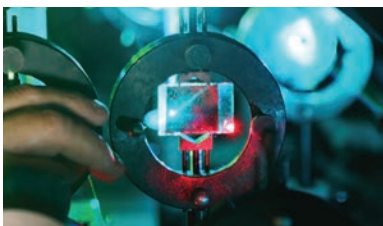


Laser Crystals

Nearly every type of currently deployed non-linear or gain crystal is available from Coherent, with a wide variety of size and coating options. We offer full production services, including crystal growth, precisely characterized coatings, metrology, simulation, and testing. Products range from individual components to complete assemblies, including Q-switch and harmonic crystal ovens, providing a simple field replacement strategy.

Diode Laser Components

Our comprehensive product range of diode laser sources will match virtually any system power and wavelength requirement. Choose from unmounted bars and chips, single emitters, packaged bars, horizontal and vertical stacked arrays, and fiber coupled modules. Our new FACTOR series of high power (up to 400 W) diode lasers provide substantially improved pumping capabilities, enabling DPSS lasers with higher power and superior beam quality.



Optical Isolators and Rotators

Get superior isolation without sacrificing transmission, damage threshold or reliability with Coherent Faraday rotators and isolators. Both standard and custom products are available at wavelengths from the visible through the mid-IR, with a choice of apertures sizes and specialized characteristics like minimized group velocity dispersion.



Inertial Navigation and Fiber Sensors

Coherent fiber coils used in iFOGs are widely deployed in critical navigation and guidance applications. We offer a diverse range of standard and custom designs, including various winding, configuration, and length and radiation resistant options. Our fiber sensor arrays are light-weight, wide aperture solutions for use in harsh and demanding environments.



Sapphire Windows

Coherent is the world's largest producer of sapphire windows, growing, polishing and coating over 50,000 units annually. Plano windows are available in diameters from 3 mm to 200 mm. They provide environmental stability and damage resistance to MIL-STD_810G standards for targeting and imaging systems from the UV through the mid-IR.

Aerospace & Defense

Manufacturing Partners

Recent expansions in our manufacturing capacity across several locations enable Coherent to be responsive to complex customer requests, including designing and delivering sub-systems or acting as a contract manufacturing partner. Coherent has invested to secure a continuous supply of field-ready, next-generation, and relevant high-performance devices. These can complement existing systems to meet your current requirements, or help you prepare for future missions. Leverage our photonics expertise by letting us design, test and manufacture your next system, allowing you to focus on integration.



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