Industrial & Automotive Components

Fine Ceramic Components

Since its founding, Kyocera’s track record in fine ceramics has been unmatched. We utilize our extensive resources in research, development, and production to select the optimal raw materials and manufacturing methods for each new application. Breakthroughs and improvements in a wide range of industries are facilitated by the unique qualities of Kyocera’s fine ceramics.

Industrial Machinery
Fine ceramics have physical and chemical properties that are superior to metals and plastics, Kyocera utilizes that superiority to support continued technological advancement in the world’s most vital industries.

Ultra-High Vacuum Applications
Kyocera components developed through ceramic-to-metal bonding technologies bring high reliability to ultra-high vacuum applications in a wide range of high-technology manufacturing and scientific research fields.

Sapphire Substrates for LEDs
Substrates of highly reliable single-crystal sapphire are used to form the polycrystalline nitride layer necessary for the production of LEDs.

Semiconductor Processing and LCD Manufacturing Equipment
Kyocera creates fine ceramics without equal through continuous material development. We use fine ceramics to produce structural components of extreme precision, heat resistance, and chemical stability – enhancing the wafer-fabrication process, enabling higher circuit densities and improving the production of LCDs.

Ferrite Components
Kyocera’s ferrite materials and high-ferrite ferrite technologies support the miniaturization of electronics by facilitating smaller, better-performing inductors.

Automotive Components

Kyocera supplies a wide range of products for automotive applications that require extreme reliability. Our products support the rapid advancement of x-vehicle electronics, making cars smarter, safer, cleaner and more comfortable.

Ceramic Glow Plugs
Our glow plugs are widely used in start-and-stop systems that require rapid heating, excellent durability at high temperatures, and reliability over extended duty cycles.

Oxygen-Sensor Heaters
Our sensor heaters reach operating temperature just seconds after a cold engine starts, ensuring cleaner exhaust by allowing emissions sensors to function almost immediately.

Piezoelectric Stacks for Fuel Injectors
These components enable ultra-quick response and precise control of fuel delivery to make diesel engine vehicles cleaner than ever.

Camera Modules
High reliability and excellent optical sensing help ensure vehicle safety and convenience.

Fine Ceramics used in Solid Oxide Fuel Cells (SOFCs)
A fuel cell causes hydrogen in utility gas to react with oxygen in the air, generating electricity and a heat source for hot water in residential and institutional applications. Kyocera has applied its fine ceramic materials and manufacturing technologies to create an innovative cell stack for the fuel cell, creating a next-generation power system that offers significant improvements in efficiency, durability and carbon emissions.