

# Global High Performance Ceramic Coatings Market Size study & Forecast, by Technology( Thermal Spray, Physical Vapor Deposition, Chemical Vapor Deposition, Others) by End User(Automotive, Aviation, Chemical Equipment, Medical, Others) and Regional Analysis, 2023-2030

<https://marketpublishers.com/r/G7A62A96B6F0EN.html>

Date: July 2024

Pages: 200

Price: US\$ 3,218.00 (Single User License)

ID: G7A62A96B6F0EN

## Abstracts

Global High Performance Ceramic Coatings Market is valued approximately USD XX billion in 2022 and is anticipated to grow with a healthy growth rate of more than XX% over the forecast period 2023-2030. High performance ceramic coatings are advanced protective coatings that are applied to various surfaces to enhance their durability, performance, and appearance. These coatings are typically made from ceramic materials such as oxides, carbides, nitrides, or borides, which offer exceptional properties such as high hardness, corrosion resistance, heat resistance, and thermal insulation. The High-Performance Ceramic Coatings market is expanding because of factors such as growing demand from end-use industries, increasing emphasis on fuel efficiency and lightweight materials, growing demand for medical implants and devices.

These coatings are applied to engine components such as pistons, cylinder heads, and exhaust systems to reduce heat transfer. By providing excellent thermal insulation, allow the engine to operate at higher temperatures without compromising the structural integrity of the components. This enables the use of lightweight materials in the engine, resulting in improved fuel efficiency and reduced emissions. Automobile manufacturers are concentrating on making lightweight automobiles to reduce CO2 emissions due to strict emissions restrictions brought on by increased exhaust emissions. One gramme of CO2 is thought to be saved every kilometer for every 10 kg of weight lost. The average fuel economy standard in the United States must reach 54.5 miles per gallon by 2025,

according to the laws. According to the US Department of Energy (DOE), a 10% decrease in the vehicle's weight might result in an improvement in fuel efficiency of 6-8%. Thus, the rising demand for fuel efficiency is catering for market growth. In addition, rising advancements in coating technologies and government regulations and environmental concerns is creating lucrative opportunity to the market. However, the high cost of High- Performance Ceramic Coatings and lack of skilled labor stifles market growth throughout the forecast period of 2023-2030.

The key regions considered for the Global High Performance Ceramic Coatings Market study includes Asia Pacific, North America, Europe, Latin America, and Middle East & Africa. North America dominated the market in 2022 owing to the dominance of key market players, rising technological advancement and rising adoption from end use industry. Asia Pacific is expected to grow significantly during the forecast period, owing to factors such as rising demand from end use industries and rising technological advancement.

Major market player included in this report are:

Aremco Products, Inc  
A.W. Chesterton Company  
Saint Gobain SA.  
Bodycote Plc  
Praxair Surface Technologies, Inc.  
Oerlikon Metco  
Swain Tech Coatings, Inc.  
Zircotec Limited  
APS Materials, Inc.  
Draslovka Holding B.V.

Recent Developments in the Market:

In October 2022, Apex Auto Care has introduced a new self-healing ceramic coating service to the automobile industry. The self-healing ceramic coating technology comes in two main varieties: Heal Light and Self Heal Plus. Both types instantly fix any small dings and swirls once heated to a temperature above 60 °C. Even when kept at room temperature.

In October 2020, US-based chemicals business SDC Technologies Inc. acquired COTEC GmbH. The goal of this acquisition was to increase SDC Technologies' selection of liquid hard coatings and supply the necessary coating components for an entire stack of eyeglass lens coatings. Ceramic coatings are created by the German business COTEC GmbH.

Global High Performance Ceramic Coatings Market Report Scope:

Historical Data – 2020 - 2021

Base Year for Estimation – 2022

Forecast period - 2023-2030

Report Coverage - Revenue forecast, Company Ranking, Competitive Landscape, Growth factors, and Trends

Segments Covered – Technology, End User, Region

Regional Scope - North America; Europe; Asia Pacific; Latin America; Middle East & Africa

Customization Scope - Free report customization (equivalent up to 8 analyst's working hours) with purchase. Addition or alteration to country, regional & segment scope\*

The objective of the study is to define market sizes of different segments & countries in recent years and to forecast the values to the coming years. The report is designed to incorporate both qualitative and quantitative aspects of the industry within countries involved in the study.

The report also caters detailed information about the crucial aspects such as driving factors & challenges which will define the future growth of the market. Additionally, it also incorporates potential opportunities in micro markets for stakeholders to invest along with the detailed analysis of competitive landscape and Technology offerings of key players. The detailed segments and sub-segment of the market are explained below:

By Technology:

Thermal Spray

Physical Vapor Deposition

Chemical Vapor Deposition

Others

By End User:

Automotive

Aviation

Chemical Equipment

Medical

Others

By Region:

North America

U.S.

Canada

Europe

UK

Germany

France

Spain

Italy

ROE

Asia Pacific

China

India

Japan

Australia

South Korea

RoAPAC

Latin America

Brazil

Mexico

Middle East & Africa

Saudi Arabia

South Africa

Rest of Middle East & Africa

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