

Low-Carbon Propulsion Market by Fuel Type (CNG, LNG, Ethanol, Electric and Hydrogen), Mode (Rail and Road), Vehicle Type (Heavy-Duty and Light-Duty), Rail Application (Passenger and Freight), Electric Vehicle, and Region - Global Forecast to 2027

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Abstracts

“Government regulations for emission controls in vehicles will positively fuel the market low-carbon propulsion market.”

The global low-carbon propulsion market size is projected to grow from 2,980 thousand units in 2020 to 11,640 thousand units by 2027, at a CAGR of 21.5 % during the forecast period. The expected growth of the market can be attributed due to increasing demand for emission-free vehicles and energy-efficient transport, government regulations regarding fluctuations in fuel prices, and vehicle conversions.

“Rail is expected to have the fastest market during the forecast period, by mode.”

The rising income levels of the general population have raised the demand for personal mobility, which has led to an increase in road traffic, and road network infrastructure in major cities across the globe is proving to be insufficient. The increase in traffic has resulted in road congestion and extended commute time in urban areas. Urban planners and local governments are merging rapid transit networks and tramways with the existing infrastructure of cities to reduce traffic congestion.

Additionally, commuters demand transit options that are ecofriendly, reliable and cost-effective alternatives to personal transportation. Thus, Asia Pacific occupies the largest share of rail transport mode due to the growing population and increasing air pollution. Developed nations such as Germany, France, and the UK are actively promoting the

use of rapid transit systems to reduce traffic congestion as well.

“Freight segment is expected to be the fastest in the market during the forecast period, by rail application.”

Freight is an essential pillar in any country’s economy as it is a major transporting medium. It is cheaper and safer than any other mode of transport. A strong railway network is an indicator of the strong economic condition of a country. The US is leading the freight train market in the world with around 2.6 trillion tonne-kilometers yearly, followed by China with 2.5 trillion tonne-kilometers annually. While all other modes of international freight transport have been adversely affected by COVID-19, the increase in freight carried by railways will boost in the coming years as it uses less manpower over long distances. Each freight train can carry between 40 to 70 times equivalents of lorry loads of goods in a safer and more secure environment, thereby offering an advantage in these current circumstances where less human interaction is the norm

“Europe is projected to be the fastest in the market of low-carbon propulsion during the forecast period, by region.”

Europe has been at the forefront of improving the safety and fuel efficiency of commercial vehicles, for which the EU institutions have announced their plans to replace gasoline and diesel stations with CNG, LNG, electric, and other biofuels. Though electric vehicles present a clearer path to decarbonization in transport, biomethane as a fuel remains a favored option for heavy-duty vehicles. Thus, CNG and LNG represent a major source of renewable fuels for low-carbon propulsion in Europe.

Europe's targets for 2021 are the most stringent in the world. The 2021 targets for the European fleet are far tougher to achieve than those in the US, China, or Japan (US: 121g, Japan: 117g, China: 119g). Thus, auto manufacturers, distributors, and fuel providers are taking measures to fulfill the targets. For instance, French hauler Jacky Perrenot has 550 Iveco Stralis NP trucks and plans to increase to 1,000 by 2020. Jost Group from Belgium intends to have 35% of its fleet running on LNG by 2020. In 2018, DHL announced switching its long-haul fleet to LNG powered Stralis tractors with a range of 1,500 km. As a result of companies in the region, the low-carbon propulsion market is expected to fuel in the coming years.

The study contains insights from various industry experts, ranging from component suppliers to tier 1 company and OEMs. The break-up of the primaries is as follows:

By Level: Tier 1: 31%, Tier 2: 48%, OEM: 21%

By Designation: C-level Executives: 40%, Directors: 35%, Others: 25%

By Region: North America: 30%, Europe: 50%, Asia Pacific: 15%:RoW:5%

Major players profiled in the report are:

Tesla, Inc (US)

BYD (China)

Yutong (China)

Proterra (US)

Nissan Motor (Japan)

Bombardier (Canada)

Alstom (France)

Toyota (Japan)

Honda (Japan)

Hyundai (South Korea)

Siemens (Germany)

MAN (Germany)

Research Coverage:

The report covers the low-carbon propulsion market, by volume (thousand units), By Fuel Type (CNG Electric, Ethanol, Hydrogen, and LNG), Vehicle Type (Light-Duty, Heavy-Duty), Mode (Rail, Road), Rail Application (Passenger, Freight), Electric Vehicle

Low-Carbon Propulsion Market by Fuel Type (CNG, LNG, Ethanol, Electric and Hydrogen), Mode (Rail and Road), Ve...

(Electric Passenger Car, Electric Bus, Electric Two-Wheeler, Electric Off-Highway), and Region (North America, Europe, Asia Pacific, and the Rest of the World).

The report contains various levels of analysis, including industry analysis, industry trends, and company profiles, which together comprise and discuss the basic views on the emerging and high-growth segments of the low-carbon propulsion market, high-growth regions and countries, government initiatives, and market dynamics such as drivers, restraints, opportunities, and challenges.

Reasons to Buy the Report:

The report enables new entrants and smaller firms as well as established firms to understand the market better to help them acquire a larger market share. Firms purchasing the report could use any one or a combination of the four strategies (market development, product development/innovation, market diversification, and competitive assessment) mentioned below to strengthen their position in the market.

The report provides insights into the following points:

Market Penetration: The report offers comprehensive information about the low-carbon propulsion market and the top players in the market.

Product Development/Innovation: The report provides detailed insights into the upcoming technologies, R&D activities, and new product launches in the low-carbon propulsion market.

Market Development: The report offers comprehensive information about the commercial vehicle radar market. The report analyzes the low-carbon propulsion market across regions and provides comprehensive information about lucrative emerging markets.

Market Diversification: The report provides exhaustive information about new products, untapped regional markets, recent developments, and investments in the low-carbon propulsion market.

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