

Nickel Cadmium Battery Market by Type (C, D, A, AA, AAA, 9 V), Block Battery Construction (L Range, M Range, H Range), End-user (Aerospace & Defense, Automotive, Consumer Electronics, Healthcare, Industrial, Marine) and Region - Global Forecast to 2027

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Abstracts

The global nickel cadmium battery market size is projected to grow from USD 1.4 Billion in 2022 to USD 1.6 Billion by 2027 at a CAGR of 2.8% during the forecast period.

Presently, the majority of Ni-Cd batteries are adopted in industrial applications as these batteries are being replaced in the majority of consumer applications due to the toxicity of cadmium and its harmful effects on the environment and human health. However, due to advantages such as long life, low maintenance, gradual capacity loss, and resistance to mechanical & environmental abuse, these batteries are still being widely used in industrial applications across sectors such as oil & gas, energy & power, mining, manufacturing, aerospace & defense, automotive & transportation, marine, healthcare, and others. Hence, their adoption in industrial applications will drive the growth of the global Ni-Cd battery market during the forecast period.

'H range batteries to grow at an impressive CAGR from 2022 to 2027"

The H Range batteries are designed with very thin plates for applications that require significantly high current discharge in a short period. The capacity for these batteries typically ranges from 8 Ah to 1012 Ah. The battery is designed so that the discharge is frequent or infrequent and a high current is supplied for about 60 minutes or less. The applications for H Range batteries are engine starting, power plant emergency backup applications, generator starting, UPS, diesel locomotive cranking, and aircraft/helicopter

ground starting applications. For instance, Saft Groupe SAS offers a KPH range of high-rate performance batteries for applications that require high current supply over short periods.

“Aerospace & defense end-user to hold a significant market share of nickel cadmium battery market”

The aerospace and defense applications include military aircraft, commercial aircraft, helicopters, business jets, and UAVs. The nickel cadmium batteries are used to power emergency lighting, engine starting, radios, intercommunication devices, critical backup power for aircraft control & signaling systems, power backup for emergency generators, etc. The nickel cadmium batteries can withstand high vibrational stresses as well as extreme temperature conditions, which are experienced in aircraft. Hence, the Ni-Cd batteries are the most preferred batteries over any other battery technology for aircraft.

“The market in Europe is expected to grow at an significant CAGR during the forecast period”

Europe is further segmented into the major European countries, which include the UK, Germany, France, and the Rest of Europe. The region constitutes various developed and industrialized economies, which use nickel cadmium batteries in sectors such as manufacturing, automotive, and healthcare. In addition, the region has a well-connected railway system that uses nickel cadmium batteries for power backup systems. Hence, the transportation infrastructure is also one of the major contributors to the growth of the nickel cadmium battery market in the region. Besides, the European Union has passed laws on nickel cadmium batteries limiting battery usage only in emergency systems and lighting, such as alarms, medical equipment, and cordless power tools. Hence, owing to the regulations passed by the EU, the growth of the nickel cadmium battery market in the region is stagnant.

Breakdown of the profiles of primary participants:

By Company Type: Tier 1 - 30%, Tier 2 - 40%, and Tier 3 - 30%

By Designation: C-level Executives - 40%, Directors - 45%, and Others - 15%

By Region: North America - 29%, Europe – 27%, Asia Pacific - 36%, and RoW - 8%

Major players profiled in this report are as follows: ALCAD A.B. (Sweden), EnerSys (US), GS Yuasa Corporation (Japan), HOPPECKE Batterien GmbH & Co. KG (Germany), HBL Power Systems Limited (India), Saft Groupe SAS (France) and others.

Research Coverage

In this report, the nickel cadmium battery market has been discussed in detail, with segmentation based on cell type, type, block battery construction, end-user, and region. The cell types include vented and sealed types of Ni-Cd batteries. The types of nickel cadmium batteries include sealed batteries such as C, D, A, AA, AAA, and 9 V. The block battery construction segment includes vented type batteries such as L, M, and H ranges, which are used in industrial applications. Furthermore, end-users of Ni-Cd batteries include aerospace and defense, automotive & transportation, consumer electronics, healthcare, industrial, marine, and others. The market has also been segmented into four regions—North America, Asia Pacific, Europe, and RoW.

Key Benefits of Buying the Report:

The report would help market leaders/new entrants in this market in the following ways:

This report segments of the nickel cadmium battery market comprehensively and provides the closest approximation of the overall market size and subsegments that include cell type, type, block battery construction, end-user, and region.

The report would help stakeholders understand the pulse of the market and provide them with information on key drivers, restraints, challenges, and opportunities pertaining to the nickel cadmium battery market.

This report would help stakeholders understand their competitors better and gain more insights to enhance their position in the business.

The competitive landscape section includes the competitor ecosystem, as well as growth strategies such as product launches and acquisitions carried out by major market players.

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