

Piezoelectric Materials Market Opportunity, Growth Drivers, Industry Trend Analysis, and Forecast 2025 - 2034

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Abstracts

The Global Piezoelectric Materials Market was valued at USD 4.2 billion in 2024 and is estimated to grow at a CAGR of 7.5% to reach USD 8.5 billion by 2034. This rapid expansion is mainly driven by the rising demand for sensors and actuators across a wide spectrum of industries. These materials are highly valued for their ability to detect pressure, sense vibration, and provide accurate motion control, making them indispensable in automation and smart manufacturing environments. As the global push toward advanced industrial systems continues, the use of high-performance piezoelectric solutions is becoming more common, enhancing operational precision and efficiency.

Simultaneously, the market is benefiting from expanding usage in healthcare technologies, where demand for high-sensitivity, reliable components is on the rise. Increasing adoption of piezoelectric-enabled systems in diagnostics and surgical equipment is tied closely to the growth in chronic illnesses and a shift toward less invasive procedures. Moreover, the accelerating need for intelligent and interactive consumer electronics is helping expand this market. Integration of piezoelectric components into modern devices is enhancing user experience with improved feedback, touch sensitivity, and gesture control. Additionally, innovation in energy harvesting applications is opening new channels of opportunity for piezoelectric materials.

In 2024, the piezoelectric ceramics segment generated USD 2.3 billion and is projected to grow at a 6.7% CAGR from 2025 to 2034. These ceramics hold the largest market share due to their versatility, high mechanical strength, and strong performance in critical applications. Their long-term reliability and cost-efficiency make them the

preferred choice for use in a range of equipment across industrial and technological sectors. Their wide applicability continues to push this segment's growth, especially in systems requiring durable and accurate piezoelectric functions.

The sensors segment generated USD 1.7 billion in 2024 and is estimated to grow at a CAGR of 7% from 2025 to 2034. The sensors category holds the top position in terms of market contribution, driven by increasing demand for precise and responsive solutions in the fields of consumer tech, transportation, and medical diagnostics. Their ability to leverage the inherent responsiveness of piezoelectric materials makes them a cornerstone in high-precision electronic systems, enhancing functionality in a broad array of industries.

United States Piezoelectric Materials Market was valued at USD 1.04 billion in 2024 and is projected to grow at a 7.2% CAGR through 2034. The U.S. continues to show strong growth, fueled by sustained demand in critical sectors such as defense, medical equipment, and electronics. A strong ecosystem of R&D activity, supported by a solid presence of major industry players and the swift adoption of next generation sensing technologies, continues to give the U.S. market a competitive edge. The rising interest in compact and wearable tech solutions is also accelerating the use of these materials domestically.

Key players in the Global Piezoelectric Materials Market, including TDK Corporation, CTS Corporation, Kyocera Corporation, APC International Ltd., and Murata Manufacturing Co., Ltd., are locked in fierce competition across various strategic areas. To secure stronger market positioning, leading companies in the piezoelectric materials sector are deploying a mix of forward-looking strategies.

Significant investment in research and development remains central, with a focus on boosting product performance, miniaturization, and integration into next-gen systems. Strategic partnerships and collaborations with OEMs help expand customer reach and technical capability. Firms are also scaling up their global manufacturing and supply chain infrastructure to meet growing demand, while diversifying their product portfolios to address niche segments like energy harvesting and advanced medical technologies. These approaches are essential in maintaining competitive advantage and ensuring long-term growth.

Contents

CHAPTER 1 METHODOLOGY

- 1.1 Market scope and definition
- 1.2 Research design
 - 1.2.1 Research approach
 - 1.2.2 Data collection methods
- 1.3 Data mining sources
 - 1.3.1 Global
 - 1.3.2 Regional/Country
- 1.4 Base estimates and calculations
 - 1.4.1 Base year calculation
 - 1.4.2 Key trends for market estimation
- 1.5 Primary research and validation
 - 1.5.1 Primary sources
- 1.6 Forecast model
- 1.7 Research assumptions and limitations

CHAPTER 2 EXECUTIVE SUMMARY

- 2.1 Industry 360° synopsis
- 2.2 Key market trends
 - 2.2.1 Regional
- 2.3 TAM Analysis, 2025-2034
- 2.4 CXO perspectives: Strategic imperatives
 - 2.4.1 Executive decision points
 - 2.4.2 Critical success factors
- 2.5 Future Outlook and Strategic Recommendations

CHAPTER 3 INDUSTRY INSIGHTS

- 3.1 Industry ecosystem analysis
 - 3.1.1 Supplier Landscape
 - 3.1.2 Profit Margin
 - 3.1.3 Value addition at each stage
 - 3.1.4 Factor affecting the value chain
 - 3.1.5 Disruptions
- 3.2 Industry impact forces

- 3.2.1 Growth drivers
- 3.2.2 Industry pitfalls and challenges
- 3.2.3 Market opportunities
- 3.3 Growth potential analysis
- 3.4 Regulatory landscape
 - 3.4.1 North America
 - 3.4.2 Europe
 - 3.4.3 Asia Pacific
 - 3.4.4 Latin America
 - 3.4.5 Middle East & Africa
- 3.5 Porter's analysis
- 3.6 PESTEL analysis
 - 3.6.1 Technology and Innovation landscape
 - 3.6.2 Current technological trends
 - 3.6.3 Emerging technologies
- 3.7 Price trends
 - 3.7.1 By region
 - 3.7.2 By product
- 3.8 Future market trends
- 3.9 Technology and Innovation landscape
 - 3.9.1 Current technological trends
 - 3.9.2 Emerging technologies
- 3.10 Patent Landscape
- 3.11 Trade statistics (HS code) (Note: the trade statistics will be provided for key countries only)
 - 3.11.1 Major importing countries
 - 3.11.2 Major exporting countries
- 3.12 Sustainability and Environmental Aspects
 - 3.12.1 Sustainable practices
 - 3.12.2 Waste Reduction strategies
 - 3.12.3 Energy Efficiency in production
 - 3.12.4 Eco-friendly initiatives
- 3.13 Carbon footprint considerations

CHAPTER 4 COMPETITIVE LANDSCAPE, 2024

- 4.1 Introduction
- 4.2 Company market share analysis
 - 4.2.1 By region

- 4.2.1.1 North America
- 4.2.1.2 Europe
- 4.2.1.3 Asia Pacific
- 4.2.1.4 LATAM
- 4.2.1.5 MEA
- 4.3 Company matrix analysis
- 4.4 Competitive analysis of major market players
- 4.5 Competitive positioning matrix
- 4.6 Key developments
 - 4.6.1 Mergers & acquisitions
 - 4.6.2 Partnerships & collaborations
 - 4.6.3 New Product Launches
 - 4.6.4 Expansion Plans

CHAPTER 5 MARKET ESTIMATES AND FORECAST, BY MATERIAL TYPE, 2021 – 2034 (USD BILLION) (KILO TONS)

- 5.1 Key trends
- 5.2 Piezoelectric ceramics
 - 5.2.1 Lead zirconate titanate (PZT)
 - 5.2.2 Barium titanate (BaTiO?)
 - 5.2.3 Sodium potassium niobate (KNN)
 - 5.2.4 Sodium bismuth titanate (NBT)
 - 5.2.5 Other piezoelectric ceramics
- 5.3 Piezoelectric polymers
 - 5.3.1 Polyvinylidene fluoride (PVDF)
 - 5.3.2 PVDF copolymers
 - 5.3.3 Other piezoelectric polymers
- 5.4 Piezoelectric composites
 - 5.4.1 Ceramic-polymer composites
 - 5.4.2 Ceramic-ceramic composites
 - 5.4.3 Other piezoelectric composites
- 5.5 Piezoelectric single crystals
 - 5.5.1 Quartz
 - 5.5.2 Relaxor-PT single crystals
 - 5.5.3 Other piezoelectric single crystals
- 5.6 Other piezoelectric materials

CHAPTER 6 MARKET ESTIMATES AND FORECAST, BY FORMS, 2021 – 2034

(USD BILLION) (KILO TONS)

- 6.1 Key trends
- 6.2 Bulk materials
- 6.3 Thin films
- 6.4 Nanostructures
- 6.5 Multilayer structures
- 6.6 Others

CHAPTER 7 MARKET ESTIMATES AND FORECAST, BY APPLICATION, 2021 – 2034 (USD BILLION) (KILO TONS)

- 7.1 Key trends
- 7.2 Sensors
 - 7.2.1 Pressure sensors
 - 7.2.2 Accelerometers
 - 7.2.3 Force sensors
 - 7.2.4 Other sensors
- 7.3 Actuators
 - 7.3.1 Precision positioners
 - 7.3.2 Ultrasonic motors
 - 7.3.3 Piezoelectric pumps
 - 7.3.4 Other actuators
- 7.4 Transducers
 - 7.4.1 Ultrasonic transducers
 - 7.4.2 Acoustic transducers
 - 7.4.3 Other transducers
- 7.5 Generators
 - 7.5.1 Energy harvesters
 - 7.5.2 Ignition systems
 - 7.5.3 Other generators
- 7.6 Motors
- 7.7 Others

CHAPTER 8 MARKET ESTIMATES AND FORECAST, BY END USE INDUSTRY, 2021 – 2034 (USD BILLION) (KILO TONS)

- 8.1 Key trends
- 8.2 Consumer electronics

- 8.2.1 Smartphones and tablets
- 8.2.2 Wearable devices
- 8.2.3 Other consumer electronics
- 8.3 Healthcare
 - 8.3.1 Medical imaging
 - 8.3.2 Surgical devices
 - 8.3.3 Implantable devices
 - 8.3.4 Other healthcare applications
- 8.4 Automotive
 - 8.4.1 Fuel injection systems
 - 8.4.2 Engine management systems
 - 8.4.3 Tire pressure monitoring systems
 - 8.4.4 Other automotive applications
- 8.5 Industrial
 - 8.5.1 Process control
 - 8.5.2 Non-destructive testing
 - 8.5.3 Precision machining
 - 8.5.4 Other industrial applications
- 8.6 Aerospace & defense
 - 8.6.1 Structural health monitoring
 - 8.6.2 Sonar systems
 - 8.6.3 Other aerospace & defense applications
- 8.7 Energy harvesting
- 8.8 Others

CHAPTER 9 MARKET ESTIMATES AND FORECAST, BY REGION, 2021 – 2034 (USD BILLION) (KILO TONS)

- 9.1 Key trends
- 9.2 North America
 - 9.2.1 U.S.
 - 9.2.2 Canada
- 9.3 Europe
 - 9.3.1 Germany
 - 9.3.2 UK
 - 9.3.3 France
 - 9.3.4 Spain
 - 9.3.5 Italy
 - 9.3.6 Rest of Europe

9.4 Asia Pacific

9.4.1 China

9.4.2 India

9.4.3 Japan

9.4.4 Australia

9.4.5 South Korea

9.4.6 Rest of Asia Pacific

9.5 Latin America

9.5.1 Brazil

9.5.2 Mexico

9.5.3 Argentina

9.5.4 Rest of Latin America

9.6 Middle East and Africa

9.6.1 Saudi Arabia

9.6.2 South Africa

9.6.3 UAE

9.6.4 Rest of Middle East and Africa

CHAPTER 10 COMPANY PROFILES

10.1 Murata Manufacturing Co., Ltd.

10.2 TDK Corporation

10.3 Kyocera Corporation

10.4 CTS Corporation

10.5 PI Ceramic GmbH

10.6 Morgan Advanced Materials

10.7 Physik Instrumente (PI) GmbH & Co. KG

10.8 APC International, Ltd.

10.9 Piezosystem Jena GmbH

10.10 Piezo Technologies

10.11 Exelis Inc. (Harris Corporation)

10.12 Piezo Kinetics Inc.

10.13 Meggitt PLC

10.14 Piezo Solutions

10.15 Smart Material Corp.

10.16 Solvay S.A.

10.17 Arkema Group

10.18 Piezocryst Advanced Sensorics GmbH

10.19 Channel Technologies Group

10.20 Kistler Group

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