

# Induction Motor Market Report by Product Type (Single Phase Induction Motor, Three Phase Induction Motor), End-Use Sector (Industrial, Commercial, Residential), and Region 2024-2032

https://marketpublishers.com/r/I66161F69F01EN.html

Date: January 2024

Pages: 143

Price: US\$ 3,899.00 (Single User License)

ID: I66161F69F01EN

# **Abstracts**

The global induction motor market size reached US\$ 21.8 Billion in 2023. Looking forward, IMARC Group expects the market to reach US\$ 42.4 Billion by 2032, exhibiting a growth rate (CAGR) of 7.5% during 2024-2032. The increasing adoption of renewable energy systems like wind turbines, rising preferences for automated manufacturing and process control systems, and the growing consumption of processed food products are some of the major factors propelling the market.

An induction motor is a type of electric motor that works on the principle of electromagnetic induction, which converts electrical energy into mechanical energy. It is known for its efficiency, durability, and low maintenance requirements and is versatile and capable of operating under different speeds and loads. It is less susceptible to mechanical wear and tear, which makes it a durable choice for industrial applications. It can power conveyor belts, water pumps, and fans, among other machinery. It is also highly customizable and caters to different power, speed, and torque requirements.

The increasing adoption of renewable energy systems like wind turbines is catalyzing the demand for induction motors around the world. Moreover, shifting preferences for automated manufacturing and process control systems are driving the need for reliable and efficient induction motors. In addition, there is a rise in the use of induction motors in numerous food equipment, such as mixers, grinders, and conveyors. This, coupled with the growing consumption of processed and ready to eat (RTE) food products among the masses on account of rapid urbanization, busy schedules, and expanding purchasing power of consumers, is influencing the market positively. Apart from this,



significant growth in the automotive industry, the escalating demand for hybrid and luxury vehicles, and the increasing need for enhanced convenience and safety features in vehicles are favoring the growth of the market. Furthermore, rising concerns about water conservation and treatment are strengthening the growth of the market.

Induction Motor Market Trends/Drivers: Increase in energy-efficiency

One of the most significant factors driving the demand for induction motors is their energy efficiency. These motors consume less electricity for the same amount of work, which translates to lower energy costs as compared to other types of motors. This feature has become increasingly important as businesses and consumers alike seek ways to reduce their carbon footprint and energy expenditures. Regulatory bodies are also encouraging the adoption of greener technologies, which makes energy efficient induction motors more attractive. The efficiency levels can often exceed 90%, which offers a quick return on investment for both industrial and residential applications.

# Rise in regulatory compliance

With governments worldwide implementing stricter energy conservation laws, compliance has become a major consideration for businesses. Induction motors often meet or exceed the regulatory standards for energy-efficiency. This is particularly relevant for industries that need to adhere to energy consumption limits and environmental guidelines. The compliance with such regulations helps in preventing penalties and enhances the reputation of a company.

Associated benefits of induction motor influencing market positively

Induction motors are known for their versatile applications across various industries, including manufacturing, heating, ventilation, and air conditioning (HVAC) systems, and automotive. They can operate under harsh conditions and have fewer components that wear out, which makes them more durable and reduces the need for regular maintenance. This low maintenance requirement is a strong selling point, as it brings down the lifetime costs associated with the motor. Hence, businesses looking for a cost-effective, reliable solution are increasingly opting for induction motors.

Induction Motor Industry Segmentation:

IMARC Group provides an analysis of the key trends in each segment of the global induction motor market report, along with forecasts at the global and regional levels



from 2024-2032. Our report has categorized the market based on product type and enduse sector.

Breakup by Product Type:

Single Phase Induction Motors
Three Phase Induction Motors

Three phase induction motors dominate the market

The report has provided a detailed breakup and analysis of the market based on the product type. This includes single phase induction motors and three phase induction motors. According to the report, three phase induction motors represented the largest segment. Three phase induction motors are used in industrial and high-power applications wherein a reliable and efficient source of mechanical energy is needed. They are generally employed in machinery that requires more than 5 horsepower (HP), such as large pumps, compressors, and conveyor systems. They are self-starting and do not require any additional components for this purpose. They run on a three-phase alternating current (AC), which makes them more efficient and capable of delivering a higher torque compared to single-phase motors.

Single phase induction motors are commonly used in low-power applications, such as household appliances, small pumps, and fans. They are suitable for applications where the power requirement is below 5 horsepower (HP). They rely on a single-phase alternating current (AC) for its operation.

Breakup by End-Use Sector:

Industrial
Commercial
Residential

Industrial holds the largest share in the market

A detailed breakup and analysis of the market based on the end-use sector has also been provided in the report. This includes industrial, commercial and residential. According to the report, industrial accounted for the largest market share. In the industrial setting, induction motors are often used in manufacturing processes, heavy machinery, and automated systems. These motors are particularly popular for high-



power, high-efficiency requirements. Three-phase induction motors are commonly chosen for these applications due to their higher efficiency and torque capabilities. The industrial sector often demands rugged, durable motors capable of running for long periods, and induction motors generally meet these criteria.

In the commercial sector, induction motors are used in a variety of equipment, such as elevators, escalators, and commercial HVAC systems. They are also used in office appliances like photocopiers and in retail settings for conveyor systems. Both single-phase and three-phase induction motors are used, depending on the power requirements and operational needs. The focus in the commercial sector is often on reliability and less frequent maintenance.

In the residential sector, single-phase induction motors are predominantly used. These are employed in household appliances like washing machines, refrigerators, and small fans. The motors used in this sector are generally low-power and are designed for shorter operational cycles compared to industrial and commercial applications. The emphasis here is on compact size, lower noise levels, and affordability.

Breakup by Region:

Asia Pacific
North America
Europe
Middle East and Africa
Latin America

Asia Pacific exhibits a clear dominance, accounting for the largest induction motor market share

The market research report has also provided a comprehensive analysis of all the major regional markets, which include Asia Pacific, North America, Europe, Middle East and Africa, and Latin America. According to the report, Asia Pacific accounted for the largest market share.

The increasing demand for electric vehicles (EVs) due to an enhanced focus on sustainable development among the masses represents one of the primary factors driving the demand for induction motors in the Asia Pacific region. Moreover, the rising automation in numerous industry verticals is bolstering the market growth in the region. Besides this, the growing focus on upgrading the existing grid infrastructure is



influencing the market positively in the region.

North America is estimated to witness stable growth, owing to the extensive research and development (R&D) activities, product innovations, integration of advanced technologies, etc.

# Competitive Landscape:

The leading companies are launching energy efficient induction motors that are designed with a focus on energy efficiency to meet global sustainability standards and reduce operational costs. They are integrating variable frequency drives to allow for better control of the speed and torque of the motor and provide precise control in applications, such as conveyor belts and pumping stations. Moreover, key players are incorporating advanced sensor technology to provide real time monitoring and diagnostics and track various parameters like temperature, vibration, and load conditions, which enables predictive maintenance and reducing downtime. They are also integration artificial intelligence (AI) and the internet of things (IoT) to predict maintenance needs and optimize performance.

The report has provided a comprehensive analysis of the competitive landscape in the market. Detailed profiles of all major companies have also been provided. Some of the key players in the market include:

ABB

Ametek

**Emerson Electric** 

Siemens

**WEG** 

**Brook Crompton** 

**Danaher Corporation** 

Johnson Electric Holdings

Regal Beloit

Recent Developments:

In November 2020, ABB launched new range of low voltage IEC induction motors, which are compactly designed and minimize the overall size of the equipment by minimizing space and total cost of ownership.

In 2023, Ametek recently acquired Bison Gear & Engineering Corp. (Bison) to expand motion control and automation solutions businesses. Their strong engineering expertise and broad product portfolio provide individuals with expanded capabilities and solution offerings serving attractive growth markets.



# Key Questions Answered in This Report

- 1. What was the size of the global induction motor market in 2023?
- 2. What is the expected growth rate of the global induction motor market during 2024-2032?
- 3. What are the key factors driving the global induction motor market?
- 4. What has been the impact of COVID-19 on the global induction motor market?
- 5. What is the breakup of the global induction motor market based on the product type?
- 6. What is the breakup of the global induction motor market based on the end-use sector?
- 7. What are the key regions in the global induction motor market?
- 8. Who are the key players/companies in the global induction motor market?



# **Contents**

#### 1 PREFACE

#### **2 SCOPE AND METHODOLOGY**

- 2.1 Objectives of the Study
- 2.2 Stakeholders
- 2.3 Data Sources
  - 2.3.1 Primary Sources
  - 2.3.2 Secondary Sources
- 2.4 Market Estimation
  - 2.4.1 Bottom-Up Approach
  - 2.4.2 Top-Down Approach
- 2.5 Forecasting Methodology

## **3 EXECUTIVE SUMMARY**

#### **4 INTRODUCTION**

- 4.1 Overview
- 4.2 Key Industry Trends

#### **5 GLOBAL INDUCTION MOTOR MARKET**

- 5.1 Market Overview
- 5.2 Market Performance
- 5.3 Impact of COVID-19
- 5.4 Market Breakup by Product Type
- 5.5 Market Breakup by End-Use Sector
- 5.6 Market Breakup by Region
- 5.7 Market Forecast
- 5.8 SWOT Analysis
  - 5.8.1 Overview
  - 5.8.2 Strengths
  - 5.8.3 Weaknesses
  - 5.8.4 Opportunities



- 5.8.5 Threats
- 5.9 Value Chain Analysis
  - 5.9.1 Overview
  - 5.9.2 Research and Development
  - 5.9.3 Raw Material Procurement
  - 5.9.4 Manufacturing
  - 5.9.5 Distribution
  - 5.9.6 Export
  - 5.9.7 End-Use
- 5.10 Porters Five Forces Analysis
  - 5.10.1 Overview
  - 5.10.2 Bargaining Power of Buyers
  - 5.10.3 Bargaining Power of Suppliers
  - 5.10.4 Degree of Competition
  - 5.10.5 Threat of New Entrants
  - 5.10.6 Threat of Substitutes
- 5.11 Price Analysis
  - 5.11.1 Key Price Indicators
  - 5.11.2 Price Structure
  - 5.11.3 Margin Analysis

#### **6 MARKET BREAKUP BY PRODUCT TYPE**

- 6.1 Single Phase Induction Motors
  - 6.1.1 Market Trends
  - 6.1.2 Market Forecast
- 6.2 Three Phase Induction Motors
  - 6.2.1 Market Trends
  - 6.2.2 Market Forecast

# 7 MARKET BREAKUP BY END-USE SECTOR

- 7.1 Industrial
  - 7.1.1 Market Trends
  - 7.1.2 Market Forecast
- 7.2 Commercial
  - 7.2.1 Market Trends
  - 7.2.2 Market Forecast
- 7.3 Residential



- 7.3.1 Market Trends
- 7.3.2 Market Forecast

## **8 MARKET BREAKUP BY REGION**

- 8.1 Asia Pacific
  - 8.1.1 Market Trends
  - 8.1.2 Market Forecast
- 8.2 North America
  - 8.2.1 Market Trends
  - 8.2.2 Market Forecast
- 8.3 Europe
  - 8.3.1 Market Trends
  - 8.3.2 Market Forecast
- 8.4 Middle East and Africa
  - 8.4.1 Market Trends
  - 8.4.2 Market Forecast
- 8.5 Latin America
  - 8.5.1 Market Trends
  - 8.5.2 Market Forecast

#### 9 INDUCTION MOTOR MANUFACTURING PROCESS

- 9.1 Product Overview
- 9.2 Raw Material Requirements
- 9.3 Manufacturing Process
- 9.4 Key Success and Risk Factors

# 10 COMPETITIVE LANDSCAPE

- 10.1 Market Structure
- 10.2 Key Players
- 10.3 Profiles of Key Players
  - 10.3.1 ABB
  - 10.3.2 Ametek
  - 10.3.3 Emerson Electric
  - 10.3.4 Siemens
  - 10.3.5 WEG
  - 10.3.6 Brook Crompton



- 10.3.7 Danaher Corporation
- 10.3.8 Johnson Electric Holdings
- 10.3.9 Regal Beloit



# **List Of Tables**

#### LIST OF TABLES

Table 1: Global: Induction Motor Market: Key Industry Highlights, 2023 & 2032

Table 2: Global: Induction Motor Market Forecast: Breakup by Product Type (in Million

US\$), 2024-2032

Table 3: Global: Induction Motor Market Forecast: Breakup by End-Use Sector (in

Million US\$), 2024-2032

Table 4: Global: Induction Motor Market Forecast: Breakup by Region (in Million US\$),

2024-2032

Table 5: Induction Motor Manufacturing: Raw Material Requirements

Table 6: Global: Induction Motor Market: Competitive Structure

Table 7: Global: Induction Motor Market: Key Players



# **List Of Figures**

#### **LIST OF FIGURES**

Figure 1: Global: Induction Motor Market: Major Drivers and Challenges

Figure 2: Global: Induction Motor Market: Sales Value (in Billion US\$), 2018-2023

Figure 3: Global: Induction Motor Market: Breakup by Product Type (in %), 2023

Figure 4: Global: Induction Motor Market: Breakup by End-Use Sector (in %), 2023

Figure 5: Global: Induction Motor Market: Breakup by Region (in %), 2023

Figure 6: Global: Induction Motor Market Forecast: Sales Value (in Billion US\$),

2024-2032

Figure 7: Induction Motor Market: Total Production Cost Breakup (in %)

Figure 8: Induction Motor Market: Price Structure

Figure 9: Global: Induction Motor Industry: SWOT Analysis

Figure 10: Global: Induction Motor Industry: Value Chain Analysis

Figure 11: Global: Induction Motor Industry: Porter's Five Forces Analysis

Figure 12: Global: Induction Motor (Single Phase) Market: Sales Value (in Million US\$),

2018 & 2023

Figure 13: Global: Induction Motor (Single Phase) Market Forecast: Sales Value (in

Million US\$), 2024-2032

Figure 14: Global: Induction Motor (Three Phase) Market: Sales Value (in Million US\$),

2018 & 2023

Figure 15: Global: Induction Motor (Three Phase) Market Forecast: Sales Value (in

Million US\$), 2024-2032

Figure 16: Global: Induction Motor (Industrial) Market: Sales Value (in Million US\$),

2018 & 2023

Figure 17: Global: Induction Motor (Industrial) Market Forecast: Sales Value (in Million

US\$), 2024-2032

Figure 18: Global: Induction Motor (Commercial) Market: Sales Value (in Million US\$),

2018 & 2023

Figure 19: Global: Induction Motor (Commercial) Market Forecast: Sales Value (in

Million US\$), 2024-2032

Figure 20: Global: Induction Motor (Residential) Market: Sales Value (in Million US\$),

2018 & 2023

Figure 21: Global: Induction Motor (Residential) Market Forecast: Sales Value (in Million

US\$), 2024-2032

Figure 22: Asia Pacific: Induction Motor Market: Sales Value (in Million US\$), 2018 &

2023

Figure 23: Asia Pacific: Induction Motor Market Forecast: Sales Value (in Million US\$),



2024-2032

Figure 24: North America: Induction Motor Market: Sales Value (in Million US\$), 2018 & 2023

Figure 25: North America: Induction Motor Market Forecast: Sales Value (in Million US\$), 2024-2032

Figure 26: Europe: Induction Motor Market: Sales Value (in Million US\$), 2018 & 2023

Figure 27: Europe: Induction Motor Market Forecast: Sales Value (in Million US\$), 2024-2032

Figure 28: Middle East and Africa: Induction Motor Market: Sales Value (in Million US\$), 2018 & 2023

Figure 29: Middle East and Africa: Induction Motor Market Forecast: Sales Value (in Million US\$), 2024-2032

Figure 30: Latin America: Induction Motor Market: Sales Value (in Million US\$), 2018 & 2023

Figure 31: Latin America: Induction Motor Market Forecast: Sales Value (in Million US\$), 2024-2032

Figure 32: Induction Motor Manufacturing: Detailed Process Flow



## I would like to order

Product name: Induction Motor Market Report by Product Type (Single Phase Induction Motor, Three

Phase Induction Motor), End-Use Sector (Industrial, Commercial, Residential), and

Region 2024-2032

Product link: https://marketpublishers.com/r/l66161F69F01EN.html

Price: US\$ 3,899.00 (Single User License / Electronic Delivery)

If you want to order Corporate License or Hard Copy, please, contact our Customer

Service:

info@marketpublishers.com

# **Payment**

To pay by Credit Card (Visa, MasterCard, American Express, PayPal), please, click button on product page <a href="https://marketpublishers.com/r/l66161F69F01EN.html">https://marketpublishers.com/r/l66161F69F01EN.html</a>

To pay by Wire Transfer, please, fill in your contact details in the form below:

First name:	
Last name:	
Email:	
Company:	
Address:	
City:	
Zip code:	
Country:	
Tel:	
Fax:	
Your message:	
	**All fields are required
	Custumer signature

Please, note that by ordering from marketpublishers.com you are agreeing to our Terms & Conditions at <a href="https://marketpublishers.com/docs/terms.html">https://marketpublishers.com/docs/terms.html</a>

To place an order via fax simply print this form, fill in the information below



and fax the completed form to +44 20 7900 3970