

# **Chelants Market - Global Industry Size, Share, Trends, Opportunity & Forecast, Segmented By Product (Sodium gluconate, Organphosphonates, Aminopolycarboxylate, Others), By Application (Household & industrial cleaning, Pulp & Paper, Chemical processing, Water treatment, Agrochemicals, Consumer products, Pharmaceutical, Others), By Region, & Competition, 2020-2030F**

<https://marketpublishers.com/r/CB28D53C2448EN.html>

Date: August 2025

Pages: 185

Price: US\$ 4,500.00 (Single User License)

ID: CB28D53C2448EN

## **Abstracts**

### **Market Overview**

Global Chelants market was valued at USD 8.82 Billion in 2024 and is expected to reach USD 11.24 Billion by 2030 with a CAGR of 4.12%. The Global Chelants Market is witnessing consistent expansion, fueled by targeted demand from high-impact sectors such as agrochemicals, pharmaceuticals, industrial water treatment, and pulp & paper processing. Chelants specialty compounds engineered to sequester metal ions are being increasingly integrated into formulations to address specific performance challenges such as metal-catalyzed degradation, process fouling, and micronutrient inefficiencies.

Industries are leveraging chelants not only to optimize chemical reactions and protect active ingredients, but also to meet stringent regulatory and environmental standards related to heavy metal contamination and wastewater discharge. With a growing focus on operational precision, sustainability, and compliance, chelants have evolved from auxiliary additives to mission-critical components in industrial chemistry. As production processes become more specialized and demand for high-performance, eco-compliant

inputs increases, the chelants market is positioned for sustained growth driven by innovation in biodegradable formulations, regional manufacturing expansions, and rising downstream integration across value-added sectors.

## Key Market Drivers

### Growing Demand of Chelants in Agrochemicals Industry

The growing demand for chelants in the agrochemicals industry is a significant driver propelling the growth of the Global Chelants Market, as the agricultural sector increasingly turns to advanced chemical solutions to enhance crop yield, nutrient availability, and sustainable farming practices. This trend is underpinned by both economic and environmental considerations, with chelating agents playing a central role in modern agronomic formulations. Chelants are essential components in micronutrient fertilizers, where they bind with metal ions such as iron (Fe), zinc (Zn), copper (Cu), and manganese (Mn) to form stable, soluble complexes. These chelated nutrients: Prevent precipitation or fixation in the soil, Enhance absorption through roots or leaves, Improve nutrient mobility and bioavailability. This function is especially critical in alkaline and calcareous soils, where traditional inorganic micronutrients are often rendered ineffective due to rapid immobilization. Chelated fertilizers ensure efficient nutrient uptake, directly translating into healthier crops and higher productivity.

The global population is forecasted to exceed 9.7 billion by 2050, according to current projections. This demographic shift is expected to place significant pressure on global food systems, agricultural productivity, and resource efficiency prompting accelerated demand for advanced agrochemical solutions, including chelants, to ensure sustainable and high-yield farming practices. This has led to a global push for precision farming, where chelated micronutrient formulations are gaining traction due to their: Targeted delivery systems, Compatibility with fertigation and foliar spray technologies, Reduced environmental losses and higher ROI for farmers. Chelants are thus emerging as integral components of next-generation agrochemical solutions, aligning with the global objective of boosting yields sustainably.

The global expansion of organic and sustainable farming practices is also contributing to the increased use of biodegradable and plant-friendly chelating agents such as EDDS (ethylenediamine-N,N'-disuccinic acid) and gluconates. These alternatives to synthetic chelants like EDTA and DTPA: Meet environmental safety standards, Minimize heavy metal accumulation in soils, Reduce the ecological footprint of agriculture. This shift is especially pronounced in developed markets like Europe and

North America, where consumers and regulators demand greater sustainability and traceability in food production. Global agribusiness firms are heavily investing in research and development to innovate high-efficiency crop nutrition solutions. Chelants are being incorporated into a wide range of formulations, including: Soil-applied chelated fertilizers, Foliar sprays, Controlled-release nutrient systems. The development of customized chelants for specific crops, soils, and climates is further enhancing their adoption. These advancements are helping agrochemical companies differentiate their products and meet the needs of regional agricultural practices, thus driving demand on a global scale.

## **Key Market Challenges**

### **Decline in Consumption of Phosphate-Based Agents**

Chelating agents are molecules that possess the capability to form stable complexes with metal ions, thereby preventing these ions from participating in chemical reactions that may result in undesirable effects such as oxidation, corrosion, or scale formation. Historically, phosphate-based chelating agents have been widely utilized due to their effective metal ion binding properties. However, growing concerns regarding the environmental impact of phosphates have prompted a shift away from their use. Discharge of phosphates into water bodies can contribute to nutrient pollution, leading to issues such as harmful algal blooms and degradation of aquatic ecosystems. As a result, stricter regulations have been implemented and there is a growing demand for more sustainable alternatives.

## **Key Market Trends**

### **Growth in Technological Advancements**

In the realm of modern industry, the pursuit of efficiency, sustainability, and innovation has driven the continuous evolution of chemical solutions. Advanced analytical techniques and computational modeling are revolutionizing the formulation of chelants. Through precise molecular structure adjustments, researchers can design compounds with enhanced metal binding properties and selectivity. This precision empowers industries to optimize their processes and reduce overall chemical usage. Innovations in smart materials and responsive polymers are now applied to chelant design, enabling selective binding to metal ions triggered by specific factors like changes in pH or temperature. This responsiveness allows for more controlled and targeted metal removal, particularly in complex systems. Nanotechnology is making significant strides

in the chelants market. Nanostructured chelants possess unique properties attributed to their small size and increased surface area. These properties have the potential to enhance metal chelation efficiency and drive innovation in areas such as drug delivery and catalysis. Moreover, industries are increasingly adopting automation and the Internet of Things (IoT) to optimize their processes. In the chelants market, automated dosing systems and real-time monitoring are elevating the efficiency of chelant application, ensuring precise and consistent control over metal ions.

### **Key Market Players**

AkzoNobel N.V.

Archer Daniels Midland Company (ADM)

Cargill, Incorporated

BASF SE

Valero Energy Corporation

The Dow Chemical Company

Mitsubishi Rayon Co. Ltd.

Lanxess AG

Tate & Lyle PLC

Shandong IRO Chelating Chemical Co. Ltd.

### **Report Scope:**

In this report, the Global Chelants Market has been segmented into the following categories, in addition to the industry trends which have also been detailed below:

Chelants Market, By Product:

Sodium gluconate

Organophosphonates

Aminopolycarboxylate

Others

#### Chelants Market, By Application:

Household & industrial cleaning

Pulp & Paper

Chemical processing

Water treatment

Agrochemicals

Consumer products

Pharmaceutical

Others

#### Chelants Market, By Region:

North America

United States

Canada

Mexico

Europe

France

United Kingdom

Italy

Germany

Spain

Asia-Pacific

China

India

Japan

Australia

South Korea

South America

Brazil

Argentina

Colombia

Middle East & Africa

South Africa

Saudi Arabia

UAE

## **Competitive Landscape**

Company Profiles: Detailed analysis of the major companies present in the Global Chelants Market.

**Available Customizations:**

Global Chelants Market report with the given market data, TechSci Research offers customizations according to a company's specific needs. The following customization options are available for the report:

**Company Information**

Detailed analysis and profiling of additional market players (up to five).

## Contents

### 1. PRODUCT OVERVIEW

- 1.1. Market Definition
- 1.2. Scope of the Market
  - 1.2.1. Markets Covered
  - 1.2.2. Years Considered for Study
  - 1.2.3. Key Market Segmentations

### 2. RESEARCH METHODOLOGY

- 2.1. Objective of the Study
- 2.2. Baseline Methodology
- 2.3. Key Industry Partners
- 2.4. Major Association and Secondary Sources
- 2.5. Forecasting Methodology
- 2.6. Data Triangulation & Validation
- 2.7. Assumptions and Limitations

### 3. EXECUTIVE SUMMARY

- 3.1. Overview of the Market
- 3.2. Overview of Key Market Segmentations
- 3.3. Overview of Key Market Players
- 3.4. Overview of Key Regions/Countries
- 3.5. Overview of Market Drivers, Challenges, Trends

### 4. VOICE OF CUSTOMER

### 5. CHELANTS MARKET OUTLOOK

- 5.1. Market Size & Forecast
  - 5.1.1. By Value
- 5.2. Market Share & Forecast
  - 5.2.1. By Product (Sodium gluconate, Organophosphonates, Aminopolycarboxylate, Others)
  - 5.2.2. By Application (Household & industrial cleaning, Pulp & Paper, Chemical processing, Water treatment, Agrochemicals, Consumer products, Pharmaceutical,

Others)

5.2.3. By Region

5.2.4. By Company (2024)

5.3. Market Map

## **6. NORTH AMERICA CHELANTS MARKET OUTLOOK**

6.1. Market Size & Forecast

6.1.1. By Value

6.2. Market Share & Forecast

6.2.1. By Product

6.2.2. By Application

6.2.3. By Country

6.3. North America: Country Analysis

6.3.1. United States Chelants Market Outlook

6.3.1.1. Market Size & Forecast

6.3.1.1.1. By Value

6.3.1.2. Market Share & Forecast

6.3.1.2.1. By Product

6.3.1.2.2. By Application

6.3.2. Canada Chelants Market Outlook

6.3.2.1. Market Size & Forecast

6.3.2.1.1. By Value

6.3.2.2. Market Share & Forecast

6.3.2.2.1. By Product

6.3.2.2.2. By Application

6.3.3. Mexico Chelants Market Outlook

6.3.3.1. Market Size & Forecast

6.3.3.1.1. By Value

6.3.3.2. Market Share & Forecast

6.3.3.2.1. By Product

6.3.3.2.2. By Application

## **7. EUROPE CHELANTS MARKET OUTLOOK**

7.1. Market Size & Forecast

7.1.1. By Value

7.2. Market Share & Forecast

7.2.1. By Product

7.2.2. By Application

7.2.3. By Country

7.3. Europe: Country Analysis

7.3.1. Germany Chelants Market Outlook

7.3.1.1. Market Size & Forecast

7.3.1.1.1. By Value

7.3.1.2. Market Share & Forecast

7.3.1.2.1. By Product

7.3.1.2.2. By Application

7.3.2. United Kingdom Chelants Market Outlook

7.3.2.1. Market Size & Forecast

7.3.2.1.1. By Value

7.3.2.2. Market Share & Forecast

7.3.2.2.1. By Product

7.3.2.2.2. By Application

7.3.3. Italy Chelants Market Outlook

7.3.3.1. Market Size & Forecast

7.3.3.1.1. By Value

7.3.3.2. Market Share & Forecast

7.3.3.2.1. By Product

7.3.3.2.2. By Application

7.3.4. France Chelants Market Outlook

7.3.4.1. Market Size & Forecast

7.3.4.1.1. By Value

7.3.4.2. Market Share & Forecast

7.3.4.2.1. By Product

7.3.4.2.2. By Application

7.3.5. Spain Chelants Market Outlook

7.3.5.1. Market Size & Forecast

7.3.5.1.1. By Value

7.3.5.2. Market Share & Forecast

7.3.5.2.1. By Product

7.3.5.2.2. By Application

## **8. ASIA-PACIFIC CHELANTS MARKET OUTLOOK**

8.1. Market Size & Forecast

8.1.1. By Value

8.2. Market Share & Forecast

- 8.2.1. By Product
- 8.2.2. By Application
- 8.2.3. By Country
- 8.3. Asia-Pacific: Country Analysis
  - 8.3.1. China Chelants Market Outlook
    - 8.3.1.1. Market Size & Forecast
      - 8.3.1.1.1. By Value
    - 8.3.1.2. Market Share & Forecast
      - 8.3.1.2.1. By Product
      - 8.3.1.2.2. By Application
  - 8.3.2. India Chelants Market Outlook
    - 8.3.2.1. Market Size & Forecast
      - 8.3.2.1.1. By Value
    - 8.3.2.2. Market Share & Forecast
      - 8.3.2.2.1. By Product
      - 8.3.2.2.2. By Application
  - 8.3.3. Japan Chelants Market Outlook
    - 8.3.3.1. Market Size & Forecast
      - 8.3.3.1.1. By Value
    - 8.3.3.2. Market Share & Forecast
      - 8.3.3.2.1. By Product
      - 8.3.3.2.2. By Application
  - 8.3.4. South Korea Chelants Market Outlook
    - 8.3.4.1. Market Size & Forecast
      - 8.3.4.1.1. By Value
    - 8.3.4.2. Market Share & Forecast
      - 8.3.4.2.1. By Product
      - 8.3.4.2.2. By Application
  - 8.3.5. Australia Chelants Market Outlook
    - 8.3.5.1. Market Size & Forecast
      - 8.3.5.1.1. By Value
    - 8.3.5.2. Market Share & Forecast
      - 8.3.5.2.1. By Product
      - 8.3.5.2.2. By Application

## **9. SOUTH AMERICA CHELANTS MARKET OUTLOOK**

- 9.1. Market Size & Forecast
  - 9.1.1. By Value

## 9.2. Market Share & Forecast

9.2.1. By Product

9.2.2. By Application

9.2.3. By Country

## 9.3. South America: Country Analysis

9.3.1. Brazil Chelants Market Outlook

9.3.1.1. Market Size & Forecast

9.3.1.1.1. By Value

9.3.1.2. Market Share & Forecast

9.3.1.2.1. By Product

9.3.1.2.2. By Application

9.3.2. Argentina Chelants Market Outlook

9.3.2.1. Market Size & Forecast

9.3.2.1.1. By Value

9.3.2.2. Market Share & Forecast

9.3.2.2.1. By Product

9.3.2.2.2. By Application

9.3.3. Colombia Chelants Market Outlook

9.3.3.1. Market Size & Forecast

9.3.3.1.1. By Value

9.3.3.2. Market Share & Forecast

9.3.3.2.1. By Product

9.3.3.2.2. By Application

## **10. MIDDLE EAST AND AFRICA CHELANTS MARKET OUTLOOK**

### 10.1. Market Size & Forecast

10.1.1. By Value

### 10.2. Market Share & Forecast

10.2.1. By Product

10.2.2. By Application

10.2.3. By Country

### 10.3. MEA: Country Analysis

10.3.1. South Africa Chelants Market Outlook

10.3.1.1. Market Size & Forecast

10.3.1.1.1. By Value

10.3.1.2. Market Share & Forecast

10.3.1.2.1. By Product

10.3.1.2.2. By Application

### 10.3.2. Saudi Arabia Chelants Market Outlook

#### 10.3.2.1. Market Size & Forecast

##### 10.3.2.1.1. By Value

#### 10.3.2.2. Market Share & Forecast

##### 10.3.2.2.1. By Product

##### 10.3.2.2.2. By Application

### 10.3.3. UAE Chelants Market Outlook

#### 10.3.3.1. Market Size & Forecast

##### 10.3.3.1.1. By Value

#### 10.3.3.2. Market Share & Forecast

##### 10.3.3.2.1. By Product

##### 10.3.3.2.2. By Application

## 11. MARKET DYNAMICS

### 11.1. Drivers

### 11.2. Challenges

## 12. MARKET TRENDS & DEVELOPMENTS

### 12.1. Recent Developments

### 12.2. Product Launches

### 12.3. Mergers & Acquisitions

## 13. GLOBAL CHELANTS MARKET: SWOT ANALYSIS

## 14. COMPETITIVE LANDSCAPE

### 14.1. AkzoNobel N.V.

#### 14.1.1. Business Overview

#### 14.1.2. Product & Service Offerings

#### 14.1.3. Recent Developments

#### 14.1.4. Financials (If Listed)

#### 14.1.5. Key Personnel

#### 14.1.6. SWOT Analysis

### 14.2. Archer Daniels Midland Company (ADM)

### 14.3. Cargill, Incorporated

### 14.4. BASF SE

### 14.5. Valero Energy Corporation

- 14.6. The Dow Chemical Company
- 14.7. Mitsubishi Rayon Co. Ltd.
- 14.8. Lanxess AG
- 14.9. Tate & Lyle PLC
- 14.10. Shandong IRO Chelating Chemical Co. Ltd.

## **15. STRATEGIC RECOMMENDATIONS**

## **16. ABOUT US & DISCLAIMER**

## I would like to order

Product name: Chelants Market - Global Industry Size, Share, Trends, Opportunity & Forecast, Segmented By Product (Sodium gluconate, Organphosphonates, Aminopolycarboxylate, Others), By Application (Household & industrial cleaning, Pulp & Paper, Chemical processing, Water treatment, Agrochemicals, Consumer products, Pharmaceutical, Others), By Region, & Competition, 2020-2030F

Product link: <https://marketpublishers.com/r/CB28D53C2448EN.html>

Price: US\$ 4,500.00 (Single User License / Electronic Delivery)

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

[info@marketpublishers.com](mailto:info@marketpublishers.com)

## Payment

To pay by Credit Card (Visa, MasterCard, American Express, PayPal), please, click button on product page <https://marketpublishers.com/r/CB28D53C2448EN.html>