

# **Aircraft Structures Market Forecasts to 2034 – Global Analysis By Structure Type (Fuselage Structures, Wing Structures, Empennage Structures, Landing Gear Structures and Other Structure Types), Material Type, Aircraft Type, Manufacturing Process, and End User**

<https://marketpublishers.com/r/A7ABB5652067EN.html>

Date: May 2026

Pages: 200

Price: US\$ 4,150.00 (Single User License)

ID: A7ABB5652067EN

## **Abstracts**

According to Statistics MRC, the Global Aircraft Structures Market is accounted for \$141.4 billion in 2026 and is expected to reach \$235.5 billion by 2034 growing at a CAGR of 6.6% during the forecast period. Aircraft Structures refer to the physical framework of an aircraft, including components such as the fuselage, wings, empennage, and landing gear structures. These structures are designed to withstand aerodynamic forces, weight loads, and environmental conditions while maintaining safety and performance. Materials such as aluminum alloys, composites, and titanium are commonly used. Advances in lightweight materials and structural design are improving fuel efficiency and durability. Increasing aircraft production and demand for high-performance designs are driving innovation in aircraft structural engineering and manufacturing.

Market Dynamics:

Driver:

Rising demand for lightweight materials

Advanced composites such as carbon fiber-reinforced polymers are increasingly replacing traditional metals in structural components. Lighter structures contribute to lower fuel consumption, reduced emissions, and improved aircraft performance. Airlines are prioritizing fuel efficiency to manage operating costs and meet environmental regulations. Continuous innovation in material science is enabling stronger and lighter structural designs. As sustainability and efficiency become key priorities, demand for

lightweight aircraft structures continues to grow.

**Restraint:**

**High material and manufacturing costs**

Production of high-performance materials involves complex processes and specialized equipment. Maintenance and repair of composite structures can also be more expensive compared to conventional materials. Manufacturers must invest in skilled labor and advanced technologies for fabrication and quality control. These cost factors can limit adoption, especially for smaller manufacturers and operators. As a result, high costs can slow market growth despite technological advancements.

**Opportunity:**

**Additive manufacturing in structures**

3D printing technologies allow manufacturers to design optimized structures that improve strength-to-weight ratios. This approach also reduces production lead times and enables rapid prototyping. Additive manufacturing supports customization and efficient production of spare parts. Aerospace companies are increasingly investing in these technologies to enhance manufacturing efficiency. As innovation in additive manufacturing continues, its application in aircraft structures is expected to expand significantly.

**Threat:**

**Structural fatigue and failure risks**

Over time, these factors can lead to material degradation and potential structural failures. Ensuring durability and safety requires rigorous testing, monitoring, and maintenance processes. Failure to address fatigue risks can result in safety concerns and regulatory issues. Manufacturers must continuously improve material quality and design standards to mitigate these risks. Persistent safety challenges may impact market confidence and increase operational costs.

**Covid-19 Impact:**

The COVID-19 pandemic had a negative impact on the Aircraft Structures Market due to a sharp decline in global air travel and reduced aircraft production. Airlines deferred or canceled new aircraft orders, affecting demand for structural components. Supply chain disruptions and manufacturing slowdowns further impacted production activities. However, the recovery phase has seen gradual resumption of aircraft manufacturing and increasing demand for fuel-efficient aircraft. Manufacturers are focusing on innovation and lightweight materials to support market recovery.

The fuselage structures segment is expected to be the largest during the forecast period. The fuselage structures segment is expected to account for the largest market share during the forecast period as it represents the primary structural component of an aircraft, housing passengers, cargo, and critical systems. It requires advanced materials and engineering to ensure strength, safety, and weight optimization. Increasing

production of commercial aircraft is driving demand for efficient fuselage structures. Manufacturers are incorporating composite materials to improve durability and reduce weight. Continuous advancements in design and manufacturing processes further support segment growth.

The military aircraft segment is expected to have the highest CAGR during the forecast period

Over the forecast period, the military aircraft segment is predicted to witness the highest growth rate due to rising defense budgets and increasing investments in advanced aviation technologies. Governments are focusing on modernizing military fleets with next-generation fighter jets, transport aircraft, and unmanned aerial systems. These platforms require highly durable and lightweight structural components. Demand for stealth capabilities and enhanced performance is further driving innovation in materials and design. Ongoing geopolitical tensions are also contributing to increased procurement of military aircraft.

Region with largest share:

During the forecast period, the North America region is expected to hold the largest market share owing to a well-established aerospace industry. The region has strong production capabilities and continuous investment in advanced materials and structural technologies. High demand for commercial and military aircraft further supports market growth. Government defense spending also contributes significantly to aircraft production and innovation. Established supply chains and technological expertise enhance competitiveness. These factors position North America as the leading regional market.

Region with highest CAGR:

Over the forecast period, the Asia Pacific region is anticipated to exhibit the highest CAGR driven by increasing aircraft demand. Rising passenger traffic is encouraging airlines to expand fleets and invest in new aircraft. Governments are supporting domestic aerospace manufacturing and infrastructure development. Growing low-cost carrier presence is also contributing to higher aircraft procurement. Adoption of advanced materials and manufacturing technologies is increasing across the region.

Key players in the market

Some of the key players in Aircraft Structures Market include Airbus SE, Boeing Company, Lockheed Martin Corporation, Northrop Grumman Corporation, Spirit AeroSystems Holdings, Inc., GKN Aerospace, Safran S.A., Leonardo S.p.A., Mitsubishi Heavy Industries Ltd., Triumph Group, Inc., Kawasaki Heavy Industries Ltd., Embraer S.A., Bombardier Inc., Aernnova Aerospace and Comac (Commercial Aircraft Corporation of China).

Key Developments:

In January 2026, COMAC officially rolled out the first prototype of its stretched

C919-600 variant in Shanghai, targeting the high-capacity segment occupied by the Airbus A321neo. This product launch is part of a broader strategy to develop a full aircraft family spanning 140 to 240 seats, even as the program works to overcome production bottlenecks that limited 2025 deliveries to 16 aircraft.

In December 2025, Boeing successfully completed the acquisition of Spirit AeroSystems, bringing the production of 737 fuselages and major structures for the 787 Dreamliner back in-house. This strategic move aims to strengthen commercial production stability and aviation safety by integrating Spirit's Wichita-based commercial operations directly into Boeing's supply chain management.

Structure Types Covered:

Fuselage Structures

Wing Structures

Empennage Structures

Landing Gear Structures

Other Structure Types

Material Types Covered:

Aluminum Alloys

Titanium Alloys

Composite Materials

Steel Alloys

Other Material Types

Aircraft Types Covered:

Commercial Aircraft

Military Aircraft

Business Jets

Helicopters

Other Aircraft Types

#### Manufacturing Processes Covered:

Casting & Forging

Machining & Fabrication

Additive Manufacturing

Composite Layup Processes

Other Manufacturing Processes

#### End Users Covered:

OEMs (Aircraft Manufacturers)

MRO Providers

Defense Organizations

Aerospace Suppliers

Other End Users

#### Regions Covered:

North America

United States

Canada

Mexico

## Europe

United Kingdom

Germany

France

Italy

Spain

Netherlands

Belgium

Sweden

Switzerland

Poland

Rest of Europe

## Asia Pacific

China

Japan

India

South Korea

Australia

Indonesia

Thailand

Malaysia

Singapore

Vietnam

Rest of Asia Pacific

South America

Brazil

Argentina

Colombia

Chile

Peru

Rest of South America

Rest of the World (RoW)

Middle East

Saudi Arabia

United Arab Emirates

Qatar

Israel

Rest of Middle East

Africa

South Africa

Egypt

Morocco

Rest of Africa

What our report offers:

Market share assessments for the regional and country-level segments

Strategic recommendations for the new entrants

Covers Market data for the years 2023, 2024, 2025, 2026, 2027, 2028, 2030, 2032 and 2034

Market Trends (Drivers, Constraints, Opportunities, Threats, Challenges, Investment Opportunities, and recommendations)

Strategic recommendations in key business segments based on the market estimations

Competitive landscaping mapping the key common trends

Company profiling with detailed strategies, financials, and recent developments

Supply chain trends mapping the latest technological advancements

Free Customization Offerings:

All the customers of this report will be entitled to receive one of the following free

*Aircraft Structures Market Forecasts to 2034 – Global Analysis By Structure Type (Fuselage Structures, Wing St...*

customization options:

#### Company Profiling

Comprehensive profiling of additional market players (up to 3)

SWOT Analysis of key players (up to 3)

#### Regional Segmentation

Market estimations, Forecasts and CAGR of any prominent country as per the client's interest (Note: Depends on feasibility check)

#### Competitive Benchmarking

Benchmarking of key players based on product portfolio, geographical presence, and strategic alliances

## Contents

### **1 EXECUTIVE SUMMARY**

- 1.1 Market Snapshot and Key Highlights
- 1.2 Growth Drivers, Challenges, and Opportunities
- 1.3 Competitive Landscape Overview
- 1.4 Strategic Insights and Recommendations

### **2 RESEARCH FRAMEWORK**

- 2.1 Study Objectives and Scope
- 2.2 Stakeholder Analysis
- 2.3 Research Assumptions and Limitations
- 2.4 Research Methodology
  - 2.4.1 Data Collection (Primary and Secondary)
  - 2.4.2 Data Modeling and Estimation Techniques
  - 2.4.3 Data Validation and Triangulation
  - 2.4.4 Analytical and Forecasting Approach

### **3 MARKET DYNAMICS AND TREND ANALYSIS**

- 3.1 Market Definition and Structure
- 3.2 Key Market Drivers
- 3.3 Market Restraints and Challenges
- 3.4 Growth Opportunities and Investment Hotspots
- 3.5 Industry Threats and Risk Assessment
- 3.6 Technology and Innovation Landscape
- 3.7 Emerging and High-Growth Markets
- 3.8 Regulatory and Policy Environment
- 3.9 Impact of COVID-19 and Recovery Outlook

### **4 COMPETITIVE AND STRATEGIC ASSESSMENT**

- 4.1 Porter's Five Forces Analysis
  - 4.1.1 Supplier Bargaining Power
  - 4.1.2 Buyer Bargaining Power
  - 4.1.3 Threat of Substitutes
  - 4.1.4 Threat of New Entrants

- 4.1.5 Competitive Rivalry
- 4.2 Market Share Analysis of Key Players
- 4.3 Product Benchmarking and Performance Comparison

## **5 GLOBAL AIRCRAFT STRUCTURES MARKET, BY STRUCTURE TYPE**

- 5.1 Fuselage Structures
- 5.2 Wing Structures
- 5.3 Empennage Structures
- 5.4 Landing Gear Structures
- 5.5 Other Structure Types

## **6 GLOBAL AIRCRAFT STRUCTURES MARKET, BY MATERIAL TYPE**

- 6.1 Aluminum Alloys
- 6.2 Titanium Alloys
- 6.3 Composite Materials
- 6.4 Steel Alloys
- 6.5 Other Material Types

## **7 GLOBAL AIRCRAFT STRUCTURES MARKET, BY AIRCRAFT TYPE**

- 7.1 Commercial Aircraft
- 7.2 Military Aircraft
- 7.3 Business Jets
- 7.4 Helicopters
- 7.5 Other Aircraft Types

## **8 GLOBAL AIRCRAFT STRUCTURES MARKET, BY MANUFACTURING PROCESS**

- 8.1 Casting & Forging
- 8.2 Machining & Fabrication
- 8.3 Additive Manufacturing
- 8.4 Composite Layup Processes
- 8.5 Other Manufacturing Processes

## **9 GLOBAL AIRCRAFT STRUCTURES MARKET, BY END USER**

- 9.1 OEMs (Aircraft Manufacturers)

- 9.2 MRO Providers
- 9.3 Defense Organizations
- 9.4 Aerospace Suppliers
- 9.5 Other End Users

## **10 GLOBAL AIRCRAFT STRUCTURES MARKET, BY GEOGRAPHY**

- 10.1 North America
  - 10.1.1 United States
  - 10.1.2 Canada
  - 10.1.3 Mexico
- 10.2 Europe
  - 10.2.1 United Kingdom
  - 10.2.2 Germany
  - 10.2.3 France
  - 10.2.4 Italy
  - 10.2.5 Spain
  - 10.2.6 Netherlands
  - 10.2.7 Belgium
  - 10.2.8 Sweden
  - 10.2.9 Switzerland
  - 10.2.10 Poland
  - 10.2.11 Rest of Europe
- 10.3 Asia Pacific
  - 10.3.1 China
  - 10.3.2 Japan
  - 10.3.3 India
  - 10.3.4 South Korea
  - 10.3.5 Australia
  - 10.3.6 Indonesia
  - 10.3.7 Thailand
  - 10.3.8 Malaysia
  - 10.3.9 Singapore
  - 10.3.10 Vietnam
  - 10.3.11 Rest of Asia Pacific
- 10.4 South America
  - 10.4.1 Brazil
  - 10.4.2 Argentina
  - 10.4.3 Colombia

- 10.4.4 Chile
- 10.4.5 Peru
- 10.4.6 Rest of South America
- 10.5 Rest of the World (RoW)
  - 10.5.1 Middle East
    - 10.5.1.1 Saudi Arabia
    - 10.5.1.2 United Arab Emirates
    - 10.5.1.3 Qatar
    - 10.5.1.4 Israel
    - 10.5.1.5 Rest of Middle East
  - 10.5.2 Africa
    - 10.5.2.1 South Africa
    - 10.5.2.2 Egypt
    - 10.5.2.3 Morocco
    - 10.5.2.4 Rest of Africa

## **11 STRATEGIC MARKET INTELLIGENCE**

- 11.1 Industry Value Network and Supply Chain Assessment
- 11.2 White-Space and Opportunity Mapping
- 11.3 Product Evolution and Market Life Cycle Analysis
- 11.4 Channel, Distributor, and Go-to-Market Assessment

## **12 INDUSTRY DEVELOPMENTS AND STRATEGIC INITIATIVES**

- 12.1 Mergers and Acquisitions
- 12.2 Partnerships, Alliances, and Joint Ventures
- 12.3 New Product Launches and Certifications
- 12.4 Capacity Expansion and Investments
- 12.5 Other Strategic Initiatives

## **13 COMPANY PROFILES**

- 13.1 Airbus SE
- 13.2 Boeing Company
- 13.3 Lockheed Martin Corporation
- 13.4 Northrop Grumman Corporation
- 13.5 Spirit AeroSystems Holdings, Inc.
- 13.6 GKN Aerospace

13.7 Safran S.A.

13.8 Leonardo S.p.A.

13.9 Mitsubishi Heavy Industries Ltd.

13.10 Triumph Group, Inc.

13.11 Kawasaki Heavy Industries Ltd.

13.12 Embraer S.A.

13.13 Bombardier Inc.

13.14 Aernnova Aerospace

13.15 Comac (Commercial Aircraft Corporation of China)

## List Of Tables

### LIST OF TABLES

- Table 1 Global Aircraft Structures Market Outlook, By Region (2023-2034) (\$MN)
- Table 2 Global Aircraft Structures Market, By Structure Type (2023–2034) (\$MN)
- Table 3 Global Aircraft Structures Market, By Fuselage Structures (2023–2034) (\$MN)
- Table 4 Global Aircraft Structures Market, By Wing Structures (2023–2034) (\$MN)
- Table 5 Global Aircraft Structures Market, By Empennage Structures (2023–2034) (\$MN)
- Table 6 Global Aircraft Structures Market, By Landing Gear Structures (2023–2034) (\$MN)
- Table 7 Global Aircraft Structures Market, By Other Structure Types (2023–2034) (\$MN)
- Table 8 Global Aircraft Structures Market, By Material Type (2023–2034) (\$MN)
- Table 9 Global Aircraft Structures Market, By Aluminum Alloys (2023–2034) (\$MN)
- Table 10 Global Aircraft Structures Market, By Titanium Alloys (2023–2034) (\$MN)
- Table 11 Global Aircraft Structures Market, By Composite Materials (2023–2034) (\$MN)
- Table 12 Global Aircraft Structures Market, By Steel Alloys (2023–2034) (\$MN)
- Table 13 Global Aircraft Structures Market, By Other Material Types (2023–2034) (\$MN)
- Table 14 Global Aircraft Structures Market, By Aircraft Type (2023–2034) (\$MN)
- Table 15 Global Aircraft Structures Market, By Commercial Aircraft (2023–2034) (\$MN)
- Table 16 Global Aircraft Structures Market, By Military Aircraft (2023–2034) (\$MN)
- Table 17 Global Aircraft Structures Market, By Business Jets (2023–2034) (\$MN)
- Table 18 Global Aircraft Structures Market, By Helicopters (2023–2034) (\$MN)
- Table 19 Global Aircraft Structures Market, By Other Aircraft Types (2023–2034) (\$MN)
- Table 20 Global Aircraft Structures Market, By Manufacturing Process (2023–2034) (\$MN)
- Table 21 Global Aircraft Structures Market, By Casting & Forging (2023–2034) (\$MN)
- Table 22 Global Aircraft Structures Market, By Machining & Fabrication (2023–2034) (\$MN)
- Table 23 Global Aircraft Structures Market, By Additive Manufacturing (2023–2034) (\$MN)
- Table 24 Global Aircraft Structures Market, By Composite Layup Processes (2023–2034) (\$MN)
- Table 25 Global Aircraft Structures Market, By Other Manufacturing Processes (2023–2034) (\$MN)
- Table 26 Global Aircraft Structures Market, By End User (2023–2034) (\$MN)
- Table 27 Global Aircraft Structures Market, By OEMs (Aircraft Manufacturers) (2023–2034) (\$MN)

Table 28 Global Aircraft Structures Market, By MRO Providers (2023–2034) (\$MN)

Table 29 Global Aircraft Structures Market, By Defense Organizations (2023–2034) (\$MN)

Table 30 Global Aircraft Structures Market, By Aerospace Suppliers (2023–2034) (\$MN)

Table 31 Global Aircraft Structures Market, By Other End Users (2023–2034) (\$MN)

Note: Tables for North America, Europe, APAC, South America, and Rest of the World (RoW) are also represented in the same manner as above.

## I would like to order

Product name: Aircraft Structures Market Forecasts to 2034 – Global Analysis By Structure Type (Fuselage Structures, Wing Structures, Empennage Structures, Landing Gear Structures and Other Structure Types), Material Type, Aircraft Type, Manufacturing Process, and End User

Product link: <https://marketpublishers.com/r/A7ABB5652067EN.html>

Price: US\$ 4,150.00 (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/A7ABB5652067EN.html>