+44 20 8123 2220
info@marketpublishers.com

Aluminum Extrusion Market Report by Product Type (Mill Finished, Anodized, Powder Coated), Alloy Type (1000 Series Aluminum Alloy, 2000 Series Aluminum Alloy, 3000 Series Aluminum Alloy, 5000 Series Aluminum Alloy, 6000 Series Aluminum Alloy, 7000 Series Aluminum Alloy), End-Use Industry (Building and Construction, Transportation, Machinery and Equipment, Consumer Durables, Electrical, and Others), and Region 2024-2032

https://marketpublishers.com/r/ACF00A461A08EN.html
Date: March 2024
Pages: 138
Price: US$ 3,899.00 (Single User License)
ID: ACF00A461A08EN

Abstracts

The global aluminum extrusion market size reached 32.0 Million Metric Tons in 2023. Looking forward, IMARC Group expects the market to reach 43.2 Million Metric Tons by 2032, exhibiting a growth rate (CAGR) of 3.3% during 2024-2032. The escalating focus on sustainable architecture, the availability of raw materials and relatively lower manufacturing costs, and the widespread utilization of aluminum extrusion in construction and automotive industry yare some of the major factors propelling the market.

Aluminum extrusion is a manufacturing process used to create objects with a fixed, cross-sectional profile. The process involves forcing molten aluminum through a die, which is a shaped opening that gives the resulting extruded material its specific shape. Typically, aluminum billets are heated to a high temperature and then pushed or pulled through the die using a hydraulic press or ram. This process is highly versatile and can produce complex, intricate shapes with a high degree of accuracy and consistency. Aluminum extrusion is commonly used to make a wide range of products, such as frames, rails, tracks, and even heat sinks for electronic applications. As aluminum is

lightweight, corrosion-resistant, and has good thermal conductivity, it is a preferred material for various industries, including automotive, aerospace, and construction.

The escalating focus on sustainable architecture is driving the global market. Environmentally responsible and resource-efficient green buildings are becoming increasingly popular worldwide. These structures frequently employ aluminum extrusions in key components, such as windows and doors, enhancing the material's demand in the building sector. Additionally, the inherent flexibility of aluminum, which allows for easy shaping and bending with minimal energy expenditure, heightens its appeal for a variety of industrial uses. The versatility of aluminum extrusions, which can be customized to meet specific requirements, appeals to various industries, including aerospace, energy, and electronics. This adaptability opens new markets and applications for aluminum extrusion products. The availability of raw materials and relatively lower manufacturing costs, especially in regions, including Asia-Pacific, make aluminum extrusions an economical choice for various applications. This cost-effectiveness is particularly appealing for large-scale projects and for industries aiming to reduce overall material costs.

Aluminum Extrusion Market Trends/Drivers:
Increasing Demand in Automotive and Transportation Sector

As environmental concerns push the automotive industry toward more sustainable practices, there is an increasing need for lightweight, energy-efficient materials. By using aluminum components, manufacturers can significantly reduce vehicle weight, thereby improving fuel efficiency and lowering greenhouse gas emissions. Given that the transportation sector is one of the largest consumers of energy, this transformation has a profound ripple effect. In addition, aluminum’s high resistance to corrosion makes it ideal for external automobile parts exposed to the elements, as well as for use in marine and aerospace applications. Electric vehicles (EVs) also contribute to this demand. As the transition from internal combustion engine vehicles to EVs accelerates, the need for lightweight materials, such as extruded aluminum is expected to increase, especially for battery enclosures and structural components. Moreover, the ongoing investment in public transport infrastructures, including metros, trams, and high-speed trains globally fuels demand for aluminum extrusion in the transportation sector.

Growing Construction Industry

The aesthetic appeal, corrosion resistance, and high strength-to-weight ratio of

+44 20 8123 2220
info@marketpublishers.com

aluminum make it a sought-after material for modern architectural designs. Green construction or sustainable building practices are augmenting the need for materials that are not only durable but also environmentally friendly. Aluminum is recyclable and using it in construction often contributes to LEED (Leadership in Energy and Environmental Design) certification points. The construction industry is experiencing rapid growth in developing countries, partly due to urbanization and growing populations. This uptick in construction activities leads to a higher demand for aluminum extrusion products. Moreover, advancements in extrusion technology allow for increasingly complex and aesthetically pleasing designs, further boosting aluminum's appeal in construction applications.

Technological Advancements in Manufacturing Processes

Advanced methods, including direct extrusion, indirect extrusion, and hydrostatic extrusion offer higher flexibility and open up new avenues for creating more complex shapes and forms. Moreover, Industry 4.0 initiatives incorporate smart manufacturing practices that include real-time monitoring, predictive maintenance, and data analytics, thus ensuring optimal production levels and quality control. These advancements have reduced operational costs and increased output capabilities, allowing manufacturers to offer more competitive pricing and diverse product portfolios. As a result, industries that might have previously overlooked aluminum extrusion due to cost or complexity are now more inclined to consider it as a viable option, thereby expanding the market demand.

Aluminum Extrusion Industry Segmentation:
IMARC Group provides an analysis of the key trends in each segment of the global aluminum extrusion market report, along with forecasts at the global, regional, and levels for 2024-2032. Our report has categorized the market based on product type, alloy type and end-use industry.

Breakup by Product Type:

Mill Finished
Anodized
Powder Coated

Mill finished dominates the market

The report has provided a detailed breakup and analysis of the market based on the product type. This includes mill finished, anodized and powder coated. According to the

+44 20 8123 2220
info@marketpublishers.com

report, mill finished represented the largest segment.

Mill finished extrusions are essentially aluminum profiles that have gone through the extrusion process and are in a form that is ready to be used or further processed. These profiles have not been anodized, painted, or otherwise coated and typically have a fairly smooth surface with some manufacturing lines visible. One of the main reasons for the dominance of mill-finished products is their versatility and adaptability. Since they have not undergone additional finishing treatments, they can be easily customized by the end-user for a variety of applications, be it in construction, automotive, or electrical engineering. This flexibility is particularly advantageous for industries that require specific, custom solutions. Skipping the additional treatment processes not only reduces production time but also minimizes costs, making mill-finished products more affordable. Moreover, the properties of mill-finished aluminum, such as corrosion resistance and high strength-to-weight ratio, are often sufficient for many applications, negating the need for further surface treatments.

Breakup by Alloy Type:

1000 Series Aluminum Alloy
2000 Series Aluminum Alloy
3000 Series Aluminum Alloy
5000 Series Aluminum Alloy
6000 Series Aluminum Alloy
7000 Series Aluminum Alloy

6000 series aluminum alloy dominates the market

The report has provided a detailed breakup and analysis of the market based on the alloy type. type. This includes 1000 series aluminum alloy, 2000 series aluminum alloy, 3000 series aluminum alloy, 5000 series aluminum alloy, 6000 series aluminum alloy and 7000 series aluminum alloy. According to the report, 6000 series aluminum alloys aluminum extrusion represented the largest segment.

6000 series aluminum alloys primarily composed of aluminum, magnesium, and silicon, are renowned for their versatility, combining multiple beneficial attributes, including high strength, excellent corrosion resistance, and superior machinability. The 6000 Series is particularly indispensable in sectors, such as automotive and construction, where there's an increasing demand for materials that are both lightweight and strong. In the automotive industry, the alloys are integral to the development of parts that are durable

+44 20 8123 2220
info@marketpublishers.com

yet light enough to enhance fuel efficiency and reduce greenhouse gas emissions. The construction industry values the 6000 Series for its excellent formability, making it a go-to choice for structural components such as window and door frames, curtain walls, and roofing systems. Its corrosion-resistant qualities and the ease with which it can be anodized add to its durability and aesthetic versatility, making it suitable for both indoor and outdoor applications.

Breakup by End-Use Industry:

Building and Construction
Transportation
Machinery and Equipment
Consumer Durables
Electrical
Others

Building and construction dominate the market

The report has provided a detailed breakup and analysis of the market based on the end-use industry. This includes building and construction, transportation, machinery and equipment, consumer durables, electrical and others. According to the report, building and construction represented the largest segment.

The construction industry values aluminum extrusions for their versatility and aesthetic appeal. Advances in extrusion technology have enabled increasingly intricate and complex designs, thereby expanding the architectural possibilities. This is especially crucial in an era where sustainable, yet aesthetically pleasing, construction is becoming the norm. Aluminum's recyclability aligns well with green building initiatives, and its use can contribute to certifications, such as Leadership in Energy and Environmental Design. Additionally, rapid urbanization and economic development, particularly in emerging economies, have fueled an unprecedented boom in construction activities. This has generated a rising demand for durable and cost-effective materials, and aluminum extrusions perfectly fit that criterion. Moreover, as modern buildings become more complex with integrated systems for energy efficiency, the flexibility of aluminum extrusions to be easily customized makes them an even more attractive choice for builders and architects. They can be used in a multitude of applications, from HVAC systems to solar panel installations, making them integral to the modern construction landscape.

+44 20 8123 2220
info@marketpublishers.com

Breakup by Region:

Asia Pacific
Europe
North America
Middle East and Africa
Latin America

Asia Pacific exhibits a clear dominance, accounting for the largest aluminum extrusion market share

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

The automotive industry in the Asai Pacific region is an upward trajectory, with countries like Japan and South Korea being notable automotive powerhouses, and China emerging as the world’s largest auto market. The push for lightweight and fuel-efficient vehicles to meet increasingly stringent environmental regulations further propels the need for aluminum extrusion products. Also, the Asia Pacific region is a hub for manufacturing and technology, sectors that also make extensive use of aluminum extrusions. Whether it's in consumer electronics, machinery, or even aerospace, the diversity of applications adds to the region's consumption of extruded aluminum. Additionally, several governments in the region are actively investing in infrastructure development, further impelling demand for aluminum in sectors, including transportation and public utilities. Furthermore, rapid industrialization, expanding construction, a escalating automotive sector, and favorable economic conditions the Asia Pacific region not only dominates the current aluminum extrusion market but is also poised for significant growth in the foreseeable future.

Competitive Landscape:
Several companies are investing in R&D to develop new, innovative products. This includes more efficient extrusion processes, as well as new alloy compositions that offer improved properties, such as higher tensile strength or better corrosion resistance. Numerous companies are focusing on creating more energy-efficient manufacturing processes or using more recycled material in their products. They aim to reduce their carbon footprint and appeal to environmentally conscious consumers Additionally, various major companies have opted for vertical integration, where they control multiple

+44 20 8123 2220
info@marketpublishers.com

stages of the supply chain, from raw material extraction to the final extruded product. Companies are continually exploring new applications for aluminum extrusions in various industries, including renewable energy, healthcare, and consumer electronics, thereby diversifying their portfolio, and reducing dependency on a single sector. Companies also invest in ensuring that their processes and products comply with industry-specific regulations and standards, including environmental regulations and safety standards, to avoid legal issues and to build trust among consumers.

The competitive landscape of the market has been studied in the report with the detailed profiles of the key players operating in the market.

Key Questions Answered in This Report

1. How big is the global aluminum extrusion market?
2. What is the expected growth rate of the global aluminum extrusion market during 2024-2032?
3. What are the key factors driving the global aluminum extrusion market?
4. What has been the impact of COVID-19 on the global aluminum extrusion market?
5. What is the breakup of the global aluminum extrusion market based on the product type?
6. What is the breakup of the global aluminum extrusion market based on the alloy type?
7. What is the breakup of the global aluminum extrusion market based on the end-use industry?
8. What are the key regions in the global aluminum extrusion market?

+44 20 8123 2220
info@marketpublishers.com

Contents

+44 20 8123 2220
info@marketpublishers.com

7 MARKET BREAKUP BY ALLOY TYPE

8 MARKET BREAKUP BY END-USE INDUSTRY

+44 20 8123 2220
info@marketpublishers.com

+44 20 8123 2220
info@marketpublishers.com

+44 20 8123 2220
info@marketpublishers.com

List Of Tables

LIST OF TABLES

+44 20 8123 2220
info@marketpublishers.com

List Of Figures

LIST OF FIGURES

+44 20 8123 2220
info@marketpublishers.com

+44 20 8123 2220
info@marketpublishers.com

+44 20 8123 2220
info@marketpublishers.com

I would like to order

Product name: Aluminum Extrusion Market Report by Product Type (Mill Finished, Anodized, Powder Coated), Alloy Type (1000 Series Aluminum Alloy, 2000 Series Aluminum Alloy, 3000 Series Aluminum Alloy, 5000 Series Aluminum Alloy, 6000 Series Aluminum Alloy, 7000 Series Aluminum Alloy), End-Use Industry (Building and Construction, Transportation, Machinery and Equipment, Consumer Durables, Electrical, and Others), and Region 2024-2032

Product link: https://marketpublishers.com/r/ACF00A461A08EN.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 https://marketpublishers.com/r/ACF00A461A08EN.html

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

+44 20 8123 2220
info@marketpublishers.com

& Conditions at https://marketpublishers.com/docs/terms.html

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