

# **Solar Tracker Market by Axis Type (Single-axis, Dual-axis), Type (Grid-connected, Off-grid), Application (Utility, Non-utility), Region (Asia Pacific, North America, Europe, Latin America, Middle East & Africa) - Global Forecast to 2029**

<https://marketpublishers.com/r/S4089B35760BEN.html>

Date: April 2025

Pages: 167

Price: US\$ 4,950.00 (Single User License)

ID: S4089B35760BEN

## **Abstracts**

The solar tracker market is estimated to reach USD 22.87 billion by 2029 from an estimated value of USD 10.32 billion in 2024, at a CAGR of 17.3% during the forecast period. The Solar Tracker Market is driven by advancements in AI-enabled tracking systems, increasing demand for optimized land use, and the integration of bifacial solar modules. Enhanced durability and reduced maintenance costs make trackers more viable. Additionally, growing emphasis on energy resilience and climate targets prompts greater adoption in disaster-prone and remote regions, fueling overall market expansion.

“Utility segment held larger share of solar tracker market based on application”

The utility segment held a larger share of the solar tracker market in 2023 due to the increasing deployment of large-scale solar power plants to meet growing electricity demand and achieve clean energy targets. Utilities are rapidly adopting solar trackers to maximize energy yield and improve project economics, especially in regions with high solar irradiation. Government incentives, power purchase agreements (PPAs), and favorable grid integration policies are further encouraging investments in utility-scale solar projects. Additionally, the declining cost of solar technology, combined with advancements in tracker design, is making utility-scale projects more efficient and financially viable. Utilities also benefit from economies of scale, which enhance cost-effectiveness and operational efficiency. With the rising need for decarbonization and energy diversification, the utility segment continues to contribute globally to solar tracker

installations.

#### “Single-axis solar trackers to lead market based on axis type”

The single-axis segment continues to hold a strong position in the solar tracker market due to its cost-effectiveness, ease of installation, and proven efficiency in utility-scale solar projects. It allows solar panels to follow the sun's path from east to west, significantly improving energy output compared to fixed-tilt systems. Single-axis trackers are especially suitable for large ground-mounted installations, where maximizing land use and power generation is crucial. Their relatively low operational and maintenance costs make them attractive for investors seeking high returns. Growing adoption in emerging markets, favorable government policies, and increasing demand for renewable energy further accelerate their deployment. As solar energy becomes a cornerstone of global energy strategies, the single-axis tracker segment is expected to maintain its strong market presence, especially in high-solar-radiation regions.

#### “North America to record second-highest CAGR in solar tracker market”

North America is expected to record the second-highest CAGR in the solar tracker market, driven by supportive policies, technological advancements, and increasing demand for renewable energy. The United States and Canada are leading this growth through substantial investments in utility-scale solar projects, backed by federal and state-level incentives, tax credits, and renewable energy mandates. The adoption of single-axis trackers, particularly in Texas and California, has become prevalent due to their cost-effectiveness and ability to enhance energy yield. Furthermore, integrating bifacial solar modules with tracking systems is gaining traction, offering improved efficiency and reduced levelized cost of electricity (LCOE). The region's focus on grid modernization and the expansion of smart grid infrastructure also contributes to the increased deployment of solar trackers. Additionally, the presence of key industry players and ongoing research and development efforts foster innovation and drive the market. As North America prioritizes clean energy transitions, the solar tracker market is poised for significant growth in the coming years.

#### Breakdown of Primaries:

In-depth interviews have been conducted with various key industry participants, subject-matter experts, C-level executives of key market players, and industry consultants, among other experts, to obtain and verify critical qualitative and quantitative information and assess future market prospects. The distribution of primary interviews is as follows:

By Company Type: Tier 1 - 40%, Tier 2 - 33%, and Tier 3 - 27%

By Designation: C-Level Executives - 50%, Directors - 30%, and Other Designations- 20%

By Region: North America - 15%, Europe - 30%, Asia Pacific - 40%, Latin America - 10%, and Middle East & Africa - 5%

Note: Other designations include product engineers, product specialists, and engineering leads.

The tiers of the companies are defined based on their total revenues as of 2023. Tier 1: >USD 1 billion, Tier 2: from USD 500 million to USD 1 billion, and Tier 3:

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