



## Continuous Development Of Automated Machine Learning (AML) Helps to Reduce Many Mundane Tasks and Iterative Tasks Such as Parameter Selection and Data Cleaning by Using Algorithm Rather Than Humans to Build Learning Models

### ➔ Market Situation

By employing algorithms rather than humans to create learning models, automated machine learning (AML) is helping to decrease numerous repetitive and tedious processes, including parameter selection and data cleaning. The process of formulating and testing hypotheses will continue owing to machine learning, a component of data science. The goal of autoML is to automate these processes to find the optimal algorithm within the range of features, algorithms, and hyperparameters that are accessible. The ML workflow's intelligent automation of repetitive processes is expected to be made easier by autoML. This makes it possible for high-value resources to shift from monotonous work to analysis and evaluation of the best-performing models that offer value. As a result, the time it takes to produce models and solutions based on them will be significantly reduced. Although AutoML systems are capable of producing predictive models quickly enough to attain near-optimal performance, their reach is still limited, and their full promise remains unrealized. Even though AutoML is becoming more and more prevalent in featuring engineering and data preparation, there are still some highly domain-dependent applications where it is more of an art than engineering. AutoML will play a significant role in accelerating the adoption of ML-based solutions as it is an active research topic that is making great progress (with several players tackling existing challenges in automating the complete model development process).

### 💡 Client Challenges



The client wanted to analyze the opportunities and challenges in relation to automated machine learning (AML). The main objective of the client is to align their solution offerings with upcoming customer demands for better decision-making, low cost, increased efficiency, innovation and to gain a competitive advantage by staying at the forefront of technological advancements.

Following are the requirements asked by the client:

- Total addressable market size (TAM) and YoY growth rate on both regional and country level
- Current and future technological trends, along with the challenges faced while implementation
- Company comparative analysis of both leading and upcoming players, including market share, trackable revenue, strategic initiatives, technological adoption, vendor selection criteria and others
- Investment strategy and funding by different players
- Market opportunities and attractiveness assessment
- Emerging applications of automated machine learning (AML)
- Regulatory requirements and compliance on the country level

### DBMR Approach/Research Methodology

DBMR conducted a comprehensive analysis of the market landscape, identifying relevant trends and providing actionable insights to guide the client. We followed the tripod model for analyzing and validating data to provide valuable insights based on client requirements. DBMR's approach or research methodology for analyzing and estimating automated machine learning (AML) is explained below:

Our approach involves the usage of both primary as well as secondary research methodologies to estimate, analyze and validate the data.

DBMR conducted secondary and primary research for both top-down and bottom-up methods for data analysis and validation. This approach was utilized to access both qualitative as well as quantitative data for each mentioned segments on global, regional and country-level data.

- Secondary research comprised of data published by different government associations, certified publications, investor presentations, SEC filing annual reports, company website, journals, white papers, and articles from recognized authors and others
- Primary research includes in-depth interviews with various primary respondents via cold calling, LinkedIn, e-mail, and others, with key industry participants, subject-matter experts (SMEs), C-level executives of key market players, and industry consultants to validate both qualitative and quantitative information. This is basically performed by our dedicated primary team and individuals (third parties) present at the local site. Moreover, we even prepare an exhaustive questionnaire and discussion guide which incorporates both structured as well as unstructured data points in order to conduct a discussion-based approach

Above methodology was followed to analyze client requirement:

- The market size has been derived considering both top down and bottom up approach
- Competitive Analysis: Company analysis based on trackable revenue, solution offerings, strengths and weakness, market share, geographical scope, strategic initiatives, and investment and funding, among others, to identify key vendors, prospect vendors, market disruptors and niche players to gain competitive advantage
- Factors such as drivers, restraints, opportunities and challenges affecting the overall market were also studied
- Impact of both internal and external factors, namely compatibility and complexity issues, presence of substitute technology, regulatory environment and cooperation, COVID-19, and Russia-Ukraine war on both demand and supply side
- A thorough assessment of the regulatory landscape along with in-depth research to analyze potential customers for this market, was also conducted. Moreover, close collaboration with the client's stakeholders helps us to identify specific applications or use cases where this market could bring significant value

**Hence, by following the above-mentioned approach, market insights were provided to the client accordingly.**

### 📊 Business Solutions

**Following are the solutions provided while analyzing the automated machine learning (AML) solution market:**

- Market size and CAGR of Automated Machine Learning (AML) solution on global, regional and country level was provided to comprehend the market potential for each segment
- Detailed analysis on Automated Machine Learning (AML) along with its implementation trends such as data normalization, data cleaning and data transformation was provided on country level. AML will help in cost minimization, faster result (data analysis) & decision making, streamlined operations with improved preformation and more competitive advantage.
- Company comparative analysis was shared in terms of company profiling, positioning & application grid, company landscape, SWOT, strategic initiatives and others in order to identify the market competition and gain competitive advantage.
- Insights on technological advancements including cloud based computing, AI, robotics and others along with others market opportunities & challenges impacting the overall market was also provided. It has been witnessed that cloud market is easier to access, more scalable and flexible than on premise model. Moreover, this is an cost effective model as it delivers pay as you go model thus, will be very helpful for every organization especially small and medium sized enterprises.
- On regional footprint North America account maximum market share owing to the presence of leading companies which caters the demand of machine learning deployment in several end user industries including BFSI, healthcare and retail

### Business Impact

The client had a clear insight regarding the market competitiveness, upcoming technological implementation, and strategic steps/plans which will help them to cater prominent end users in different countries. The company has improved its conversion rates through its latest automated offering, which provides the most effective solution at different points in its buyer's journey.

### Conclusion

Data Bridge Market Research has provided in-depth insights related to the automated machine learning (AML) market to cater to each requirement. Adding to this, the report's factual and consolidated information will help the client to evaluate the company's growth in terms of technology penetration and can also be further utilized for decision-making and future planning. Apart from this, the client can even access/capture the business opportunities from the reports' information.