Frost Radar in the US Healthcare Data Analytics Market

A Measurement System to Spark Companies 2 Action (C2A)—Innovation That Fuels New Deal Flow and Growth Pipelines

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Industry Overview
Definition and Segmentation: Healthcare Data Analytics

Healthcare data analytics is an IT-enabled capability that allows end users to normalize disparate patient data and report personalized evidence for the purpose of improving operational efficiencies, eliminating preventable costs, and standardizing clinical diagnosis and reporting.

Healthcare Data Analytics Segmentation

- **Types**
  - Descriptive
  - Prescriptive
  - Predictive
  - Discovery*

- **Applications**
  - Clinical
  - Financial
  - Operational

- **Deployment Models**
  - On-Premises
  - Cloud

- **End Users**
  - Hospitals
  - Physician Practices
  - Payers
  - Pharma Companies

*Discovery Analytics = Augmented Analytics + Embedded Analytics

Source: Frost & Sullivan
Industry Overview

The US healthcare data analytics market continues to expand as payers and providers allocate a higher percentage of their growing IT spend to procure and deploy data management, business intelligence, and data visualization capabilities. The market is valued at $7.95 billion in 2019; it is expected to grow at a compound annual growth rate (CAGR) of 15.75% from 2019 to 2024 to reach $16.52 billion by 2024, reflecting a exponential revenue shift of 107.8%. Revenue contribution from payers and providers would average 70% and 30% of the total market, respectively, during the study period.

<table>
<thead>
<tr>
<th>Year</th>
<th>Total Market Revenue* (US$ Billion)</th>
<th>Provider Market Revenue (US$ Billion)</th>
<th>Payer Market Revenue (US$ Billion)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2019</td>
<td>7.95</td>
<td>5.56</td>
<td>2.39</td>
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<tr>
<td>2020</td>
<td>9.25</td>
<td>6.49</td>
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<tr>
<td>2021</td>
<td>10.75</td>
<td>7.58</td>
<td>3.17</td>
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<tr>
<td>2022</td>
<td>12.41</td>
<td>8.76</td>
<td>3.65</td>
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<tr>
<td>2023</td>
<td>14.32</td>
<td>10.10</td>
<td>4.21</td>
</tr>
<tr>
<td>2024</td>
<td>16.52</td>
<td>11.63</td>
<td>4.88</td>
</tr>
</tbody>
</table>

*Excluding revenue contribution by pharmaceutical and public sector markets.

Source: Frost & Sullivan
The Frost Radar—US Healthcare Data Analytics Market
The Frost Radar
US Healthcare Data Analytics Market

Source: Frost & Sullivan
Frost Radar—Description of Companies Plotted

• US-based providers lose, as a whole, $260 billion to $270 billion annually due to poor financial risk management and lack of infrastructure to support data-driven business decisions. For every dollar claimed, both private and public payers on average offer a reimbursement of 86 cents to providers, resulting in a negative margin of 14% per dollar per patient. Additionally, large, integrated hospitals incur operating expenses of $200 million to $700 million annually to embrace value-based payment programs that require an interoperable IT ecosystem—one that consists of an integrated electronic medical record (EMR), a payer-agnostic revenue cycle management (RCM) platform, and a cross-functional supply chain management solution.

• Healthcare data analytics solutions collect data from these underlying sources and normalize evidence at patient, provider, and payer levels. They allow end users to identify gaps in care early and to intervene with evidence that quantifies how to save money, increase revenue, and improve outcomes. As a result, the US healthcare data analytics market is growing rapidly as all types of healthcare organizations rely on IT-enabled data management, business intelligence, and quality reporting capabilities to transform their clinical performance, operational agility, and financial competitiveness.

• Early adopters have shown an intent to move beyond the traditional use cases of analytics to pioneer advanced applications such as imaging analytics, genomics analytics, social vulnerability index classification, automated claims pre-adjudication, and real-time supply chain management reporting. Consequently, more than 150 companies are offering both modular and plug-in analytics solutions in the US healthcare marketplace. Frost & Sullivan believes that of these, 70 have demonstrated adequate levels of technological sophistication to meet current and future industry needs.
C2A—
Market Participant Profile
Athenahealth

• Athenahealth is a major US-based EMR and data analytics company.
• For the 12 months ended in June 2018, the company reported revenue of $1.28 billion, up 10% year-on-year.
• In 2019, athenahealth was merged with Virence Health by parent company Veritas Capital to build end-to-end capabilities around clinical, financial, and operational analytics for healthcare in the United States.

COMPANY DIAGNOSTIC

FROST RADAR POSITIONING

• Athenahealth is positioned just outside of the Radar sweet spot.
• Revenue growth for the last few years has been consistent.
• It takes an inorganic approach to acquire innovative solutions that appear competitive.

STRENGTHS

• Athenahealth offers a cloud-based analytics platform that is embedded into its flagship EMR, RCM, and PHM platforms.
• Athenahealth’s underlying analytics solution collects data from its network of more than 120,000 providers across the United States. The data set is used to benchmark a customer’s clinical quality and financial performance at a regional or national level.
• The analytics engine allows payers and providers to practice value-based care as per the guidelines of MACRA (Medicare Access and CHIP Reauthorization Act) and MIPS (Merit-Based Incentive Payment System).

OPPORTUNITIES

• The company should explore building or acquiring imaging analytics capabilities that can result in incremental growth.
• Capabilities related to social determinants of health for all patients receiving long-term care management services will help payers and providers optimize post-operative outcomes through personalized communication and engagement.

Source: Frost & Sullivan
The Last Word
The scope of healthcare data analytics is expanding beyond siloed business process improvement objectives to encompass holistic population health management initiatives—ones that consider social determinants of health and combine them with patients’ clinical and financial risk factors to create precise medical workflows that trigger clinical intervention, automate operations, and improve financial experience.

Emerging technologies such as genomics analytics coupled with radiology analytics are showing great potential to aid predictive diagnosis at the point of care. Complex data management and advanced data visualization capabilities are accelerating value-based care at scale for providers and expediting drug discovery research for pharmaceutical companies.

Next-generation analytics will be driven by advanced AI technologies including machine learning and natural language processing to drive clinical and financial scenario-based healthcare decisions for both patients and employees.
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About the Frost Radar
Vertical Axis

**Growth index (GI)** is a measure of a company’s growth performance and track record, along with its ability to develop and execute a fully aligned growth strategy and vision; a robust growth pipeline system; and effective market, competitor, and end-user focused sales and marketing strategies.

- **GI1: Market Share (previous 3 years):** Market share relative to its competitors in a given market space for the previous three years.
- **GI2: Revenue Growth (previous 3 years):** Revenue growth rate for the previous three years in the market/industry/category that forms context for the given Frost Radar.
- **GI3: Growth Pipeline:** This is an evaluation of the strength and leverage of the company’s growth pipeline system, to continuously capture, analyze and prioritize its universe of growth opportunities.
- **GI4: Vision and Strategy:** This is an assessment of how well a company’s growth strategy is aligned with its vision. Are the investments the company is making in new products and markets consistent with the stated vision?
- **GI5: Sales and Marketing:** This is a measure of effectiveness of a company’s sales and marketing efforts in helping the company drive demand and achieve its growth objectives.

Source: Frost & Sullivan
Horizontal Axis

Innovation index (II) is a measure of a company’s ability to innovate products/services/solutions that are developed with a clear understanding of disruptive Mega Trends, are globally applicable, are able to evolve and expand to serve multiple markets, and are aligned to customers’ changing needs. Key elements of this index include:

- **II1: Innovation Scalability**: This determines whether the organization’s innovations are globally scalable and applicable in both developing and mature markets, and also in adjacent and non-adjacent industry verticals.

- **II2: Research and Development**: This is a measure of the efficacy of a company’s R&D strategy, as determined by the size of its R&D investment and how it feeds the innovation pipeline.

- **II3: Product Portfolio**: This is a measure of the company’s product portfolio, focusing on the relative contribution of new products to its annual revenues.

- **II4: Mega Trends Leverage**: This is an assessment of a company’s proactive leverage of evolving long-term opportunities and new business models as the foundation of its innovation pipeline.

- **II5: Customer Alignment**: This evaluates the applicability of a company’s products/services/solutions to current and potential customers (7-year horizon) as well as how its innovation strategy is influenced by evolving customer needs.