

IQVIA AI for Hospitals and Health Systems

AI medical event prediction

Artificial intelligence and machine learning (AI/ML) models have transformed the ability to identify opportunities to reduce avoidable costs, predict medical events, and, ultimately, improve patient care. But developing and implementing the models, and then interpreting the insights to drive actionable results can get tricky. You need the right data, the right process, and the right actions to be successful.



Common AI implementation pitfalls

Data science resource limitationsProject de-prioritization due to

 Model drift, bias, and uninterpretable results.

staffing limitations.

Under-and over-localization

- Siloed, home-grown models.
- Black box models with limited configuration.



Limited clinical resources for actioning

 Investments that do not yield actionable information.



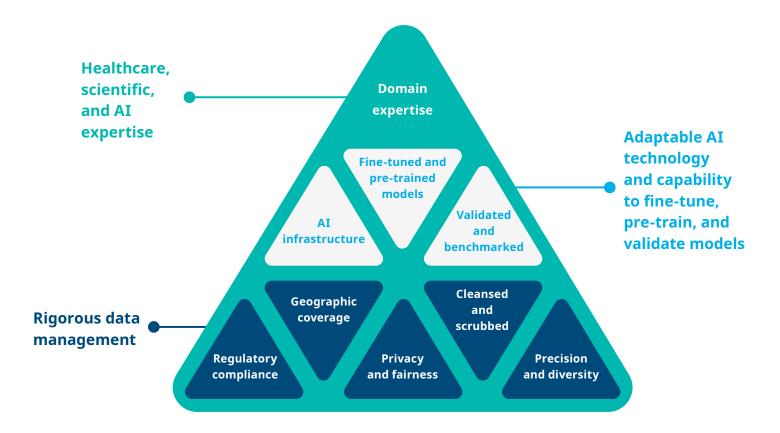
IQVIA Healthcare-grade AI™ in action

NEEDS	BENEFITS
Earlier detection of disease progression	More timely interventions enable early treatment to improve patient outcomes.
	Cost savings for more expensive, late-stage treatments.
	Improved patient prognosis enhances the ability to manage chronic diseases effectively.
Identification of treatment non-adherence	Enhanced patient engagement helps providers address barriers to adherence.
	Better outcomes by ensuring patients follow prescribed treatments for maximum benefit.
	Resource optimization through a reduction in unnecessary hospital visits and re-admissions.
Understand patterns of disease progression	Personalized care facilitates tailored treatment plans based on individual disease trajectories.
	Predictive insights to anticipate future health issues and plan accordingly.
	Research advancements by identifying new patterns and correlations.
Ability to predict risk of adverse events	Preventive measures allow for proactive management to prevent adverse events.
	Risk stratification to prioritize high-risk patients for closer monitoring.
	Improved safety by reducing the likelihood of complications.
Identification of risk for emergency room (ER) visits and re-admission	Reduced ER visits leading to significant cost savings.
	Efficient resource allocation based on improved ability to predict demand.
	Patient satisfaction and experience by reducing wait times and overcrowding.
	Targeted follow-up ensures high-risk patients receive appropriate follow-up care.
	Cost reduction by decreasing readmission rates, leading to lower healthcare costs.
	Quality of care is enhanced by addressing potential issues before they lead to readmission.
Proactively predict treatment responses	Optimized treatment plans and adjustments based on predicted responses.
	Increased efficacy of treatments by tailoring them to individual patients.
	Reduced side effects by predicting and avoiding ineffective treatments.

Why IQVIA?



IQVIA Healthcare-grade AI[™] is a model for trusted intelligence with key building blocks to help organizations account for fairness, privacy, precision, and actionable insights.



AI and healthcare expertise required at all stages

Data and insights



Tailored data and expert inputs

- · Regulatory compliant.
- Validated at scale.
- Diverse and inclusive data.
- Industry expertise, knowledge-based, and historical.

Fine-tuning



AI models optimized for the healthcare industry

- Accelerates time-to-value.
- Improves accuracy.
- Designed by AI and healthcare experts working side-by-side.

Validation



Validated outputs

- Industry experts in the loop ensure pre-trained model accuracy.
- Benchmarked against traditional outputs.

Implementation



Specialists expertly guiding execution

- AI embedded into solutions by industry experts, PhDs, and data scientists.
- Access to a variety of AI models to ensure right fit.
- AI UX expertise required for effective adoption.

All learnings fed back to training



Assess business needs

 Understand customer key objectives and goals.



Specifications and design

- · Assess feasibility.
- Establish optimal approach (dynamic, predictive vs. rules-based analytics).



On-premise implementation

 Support implementation and ensure customer satisfaction.



Dedicated collaboration

- · Dedicated client success advocate.
- Ongoing support for data inquiries and methodology review.



Analytic tool development

 Create fit-for-purpose model, test, revise, optimize, and deliver.

With decades of experience in data science, AI-powered analytics, and innovative technologies, our teams at IQVIA have developed a model for scalable, secure information management and technology enablement to accelerate the reliable and responsible adoption of AI in healthcare.