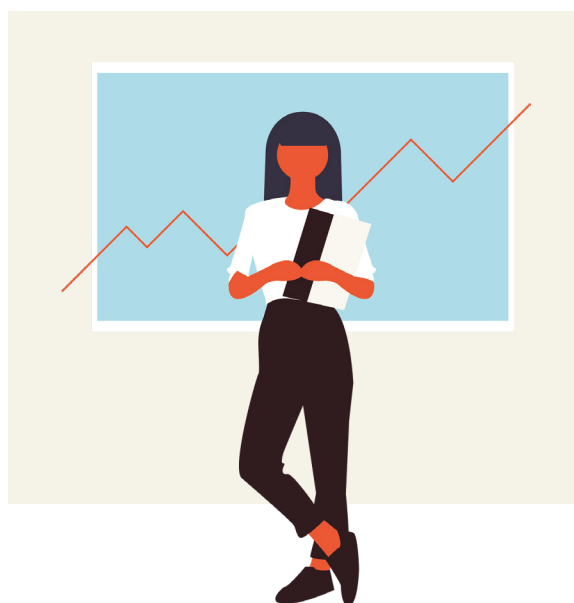


For the world's leading organizations, accurately predicting key business metrics like customer behavior, sales and risk can give them a significant edge and boost profits. However, making those predictions with confidence, repeatedly, and executing on those predictions has eluded businesses.

In this article, we've identified the three components that are critical to developing business-accelerating prediction capabilities. When consistently incorporated, these components empower companies to create a highly accurate, replicable predictions pipeline and give data-driven organizations a true competitive edge.



Alternative Data

Businesses today are rich with their own data, but are they getting the most out of their data analysis? Companies have adopted data curation platforms, constructed vast data lakes and built their own data science and analytics teams in pursuit of an information advantage. But even with all that firepower, most companies have yet to take advantage of their data. Why not?

Along with using their own proprietary data, innovative organizations incorporate external, alternative data sources to uncover powerful new insights about their market. Companies that only use internal data for analyses limit their opportunities for novel intelligence that can give them a competitive edge.

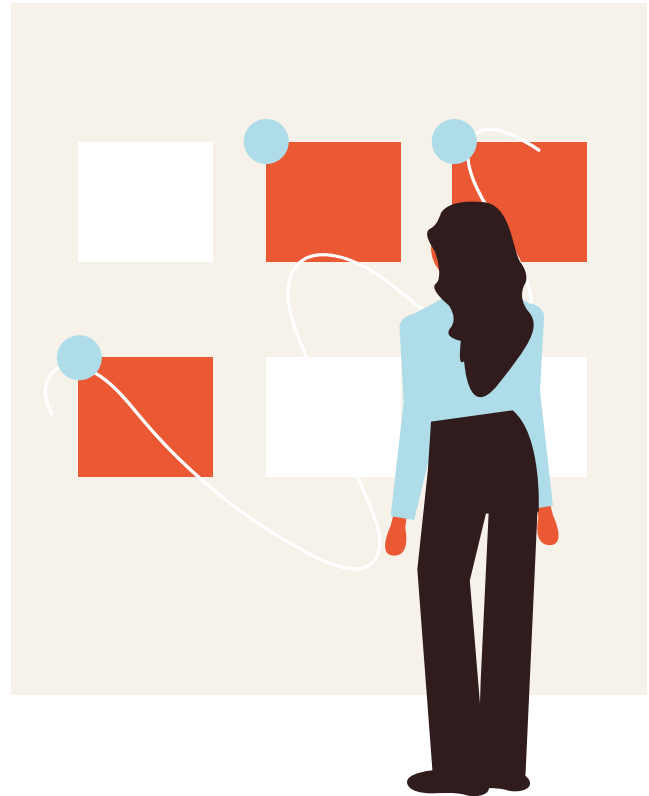
WorldQuant Predictive, an AI-powered predictions products company, recently used alternative data for a project with a Fortune 5 retailer to predict store sales within $\pm 2\%$ during the pandemic – when historical data was rendered useless. Using data from a surprising source – the online real estate marketplace company, Zillow – we found signals that would have otherwise been missed. We created and tested models that yielded insights and predictions which correlated with consumer buying behavior, and translated those findings into highly accurate sales projections.

Model Diversity

Predictions are only as good as the prediction model you use. The challenge is that when you begin, you may not know which prediction model will yield the best results. What's the best and most efficient way to deal with this important blind spot? Model diversity.

Ideally, you want to build, test and deploy hundreds of prediction models. (Note: these projects should be conducted quickly, when the data is fresh, so insights are real world actionable.) To ensure diversity, it's best to tap into a network of experts from around the world with varied backgrounds in AI, advanced machine learning, data modeling and data science. When data scientists from diverging backgrounds collaborate, model bias is eliminated and prediction power is greatly enhanced.

Leveraging alternative data sets across a worldwide network of collaborating experts has been successfully used in the financial industry over the past two decades. This same approach, idea arbitrage, can help companies develop the most accurate predictions rapidly – in weeks instead of months.

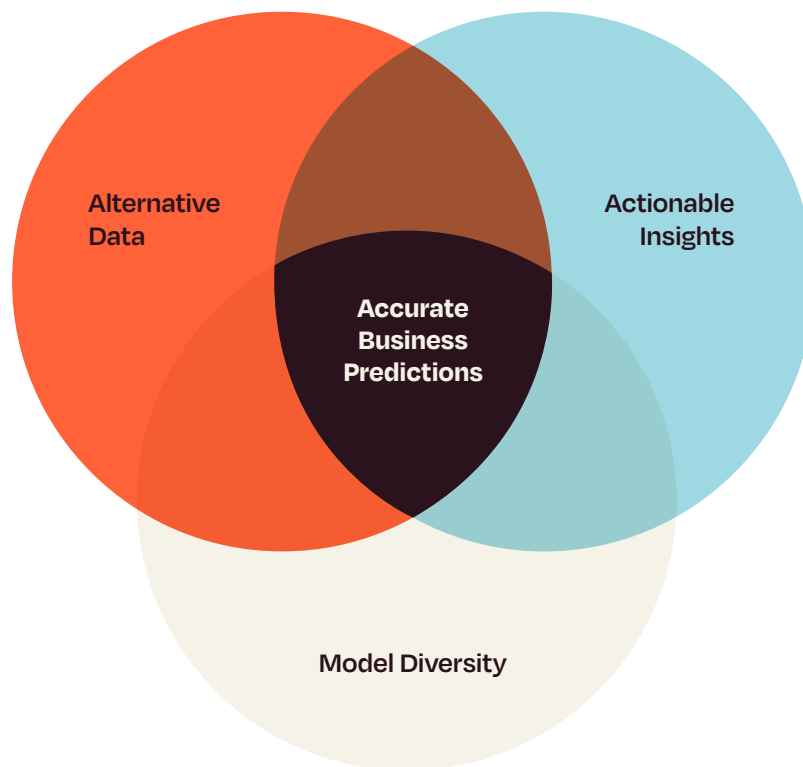


Actionable Insights

We've covered two of the three essential components, alternative data and a diverse collection of prediction models. It's critical to overlay predictions with a third component to be successful: actionable, timely insights. When realistically implemented, these insights are a game changer. Without them, everything else is essentially just data gymnastics – the AI data analysis box is checked, but they will not yield the ROI companies need. So, as models are developed, tested and confirmed, ask this question: is the output actionable?



Beyond pure data science, implementing predictive models requires a deep domain knowledge and an understanding of how business users can take advantage of these predictions. The ability to predict, simulate and optimize with alternative data and the best models is a critical part of the equation, but your organization also needs accessible applications. Putting predictive power in the hands of users at every level across an organization allows insights to be adopted and implemented, yielding the greatest results.



Summary

As businesses move into the age of AI and prediction, it's clear that unique capabilities around alternative data, diverse models and insight delivery are critical for success. Could your business benefit from more speed, scale and accuracy as you transform complex data pipelines and models into actionable insights? If so, WorldQuant Predictive can help. Our global team of experts reframes business challenges as prediction problems, then rapidly generates powerful, accurate solutions with an unwavering focus on business optimization. **Reach out to us** to share the prediction you'd like help with for your business. We'll schedule a complimentary 30-minute session with our team of data experts.