



**The data  
visualization  
journey for retail**

By the numbers

Motivating the customer to act remains a top priority for retailers today. But accomplishing the job—whether through customer engagement, inventory strategies, marketing tactics, or other methods—can become more challenging in a rapidly evolving digital world where the customer is in charge.

Enhanced data visualization tools offer retailers an opportunity to better understand customer behavior, product trends, store-specific performance, and more. Embarking on a new data visualization journey, however, requires a clear understanding of the terrain. How can you take analytics to the next level and gain an insight-driven advantage? Here's a look at a number of issues that should be on your mind.



**3 things retailers struggle with today**

- Discovering new opportunities to enhance revenue or deliver efficiencies
- Presenting and understanding data in a way that unlocks value
- Gaining insights from data quickly, to make the right decisions at the right time

**2 keys to potential value**

- Provide actionable information at the right time to the right employees to increase sales or reduce costs
- Use IoT data to gain detailed insights into customer behavior and operations—and then leverage those insights to drive revenue

**2 big obstacles along the way**

- Latency in data
- Inability of frontline retail workers to interact with data

**1 solution to know about to address the challenge**

**An interactive data visualization tool**

With a user-friendly data visualization tool, you can work with more data, more frequently, to solve retail challenges—in a simple way. It allows you to interrogate data functionally to get answers to highly specific questions. (For example, a store manager can see a real-time spike in purchases for a particular product and then make instant stocking/display decisions.)

**3 ways data visualization can meet modern needs**

- **Enhance inventory visibility (both IoT- and non-IoT-enabled).** Aggregate data from inventory sensors and filter it to sales agents' screens, enabling them to visualize fast movers, slow movers, and customer engagement with products, relative to shelving and position in the planogram
- **Improve merchandising competitive positioning.** Leverage internal and third-party data to understand the differences in merchandising perceptions when it comes to styles, trends, and pricing
- **Explore omnichannel marketing impact.** Understand customer behavior as it relates to campaigns, using online and in-store data to create heat maps and compare behaviors

**6 ways to move forward with a visualization strategy for retail**

How do you get more value from data visualization? Here are a few key steps.

- Assemble dynamic teams of business and IT stakeholders, to help address the full spectrum of analytic and data visualization requirements
- Establish sharing and pull capabilities that allow workers to access insights originally discovered by others. (Example: A store manager interrogates data, decides in real time how to adjust a stock presentation, and shares insights with other managers and associates)
- Encourage more creativity at the point of decision, eliminating layers of discussions and approvals
- Expand your data universe to include big data (demographics, geographic information, social media content, etc.) and correlate it with your own enterprise-specific data
- Use more of the data you do have and keep looking for new sources of data (within your organization as well as from third parties) so you can evolve your capabilities and provide new insights
- Apply data science to develop a deep understanding of the data and address key questions systematically

**5 things you should know along the way**

- **The opportunities.** Where are you leaving money on the table?
- **The enablers.** Which core people, processes, and technologies can you use to expedite the journey?
- **The emerging technologies.** Which new tools will have an impact on your data visualization efforts?
- **Your champion.** Who will drive your transformation?
- **The controls.** What measures and systems will you put in place to support your vision of visualization?

**3 things to keep you moving ahead**

- **An agile, business-driven approach.** Keep assessing where and how you can use the solution. All data is a candidate.
- **A critical mindset.** Keep evaluating the business value (ROI) you get from the solution.
- **Persistence.** Iterate, iterate, iterate. Keep feeding new data into the solution, and ensure you are doing it effectively.

**1 more step**

Beginning a data visualization journey requires more than a vision of where you want to go. It requires a strategy, industry-specific experience, business focus, and technical know-how. We can help. Deloitte understands the potential of data and how to unlock it—across all industries and across the globe. Ready to begin your journey? Contact us to get started.



## 5 possibilities: potential benefits of visualization for retailers

- Leverage IoT technology to enable relevant, real-time purchase-related connections with customers
- Tap real-time in-store analytics on promotions, enabling augmented in-store decision-making
- Capture behavior data along with transaction data to develop customized loyalty-building interactions with different consumer types
- Use IoT data for immediate back-store, in-store decisions—triggering augmented behavior among employees and in-store connected tools
- Make multistore data available for analysis to derive actionable insights

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