

# How Business Intelligence (BI) Drives Apparel E-commerce Transformation



## KAVINDRA SINGH

has more than 18 years of experience of working in companies like Kanbay, Intellicus, Kyvos and Patanjali. He is a solution expert on implementing analytics in the FMCG domain. He started career as a COBOL programmer with Kanbay Inc. Soon he moved to Intellicus to work as a Java programmer and was leading the UI team.

The apparel industry is in a constant state of flux. If labor intensive processes, shortening production cycles, large capital outlays and seasonal demand fluctuations were not enough, proliferating online brands and channels have created a dynamic and chaotic market. In addition, consumers demand heightened levels of personalized services and product offerings from retailers.

With a constant stream of shifts in business environment, the pace of change continues to accelerate. Even established brands have become vulnerable in this chaos and struggle to grapple with these transformative forces; while opportunity is wide open for new entrants who learn how to tide over ambiguity.

One essential tool that has emerged as a game changer amid this uncertainty is business intelligence (BI). It transforms raw data into actionable information, helping companies optimize production processes, streamline supply chains and anticipate market trends. It provides pivotal data-driven insights that let businesses see patterns beyond the chaos and make informed decisions.

Focusing on the dynamic intersection of fashion and technology, let's explore six ways that BI is revolutionizing the industry:

**Staying Ahead of Trends:** By tracking purchasing patterns, social media interactions and online behavior, BI helps businesses anticipate emerging trends much before they become mainstream. This proactive approach allows fashion companies to stay ahead of the curve and cater to the demands of younger consumers who seek the latest and most innovative styles. Further, BI tools dig deep into demographic data to help fashion brands understand their target audiences. This includes regional fashion tastes in colors and fabrics that resonate with consumers in specific locations. Thus, product offerings can be tailored for specific geographies and customer segments according to their preferences.

**Warehousing Optimization:** BI proves to be a great tool to classify SKUs based on various factors such as sales velocity, style, colors, popularity or size. This helps in efficient allocation of storage space and prevents overstocking and understocking. Fast-moving items are stacked in easily accessible locations, while slower-moving or seasonal items are strategically stored in less prime area minimizing picking and packing times. Thus, a smart warehouse layout based on insights gleaned from data streamlines e-commerce operations, accelerates order fulfillment and minimize labor costs.

**Inventory Management and Fulfillment:** BI leverages historical sales data, seasonality trends and market movement to forecast demand accurately. Apparel brands can optimize their stocks using data-backed predictions of product velocity. Stocks are maintained for fast-moving items and trendsetting products which are anticipated to be in high demand during specific

periods or regions. Slow-moving stock or fading trends are identified early in BI reports allowing brands to swiftly phase them out from inventory. This dynamic approach to inventory management ensures an agile response to the volatile nature of fashion trends, minimizing holding costs and freeing up resources for products that resonate well with the customers.

**Logistics and Delivery:** The apparel e-commerce industry needs to continuously orchestrate a fast and most efficient delivery process. By analyzing data on customer locations, delivery preferences and market movements, BI helps brands optimize their supply chains. The inventory stays fresh with minimal overstocking of obsolete items. Furthermore, BI reports are used to reduce operational costs and enhance sustainability. By optimizing routes and delivery methods, brands can reduce fuel consumption and minimize their carbon footprint. This not only aligns with growing environmental consciousness but also strengthens brand affinity by showcasing a commitment to responsible logistics practices.

**Value-Added Services:** Retailers use value-added services to create a differentiation. These services may range from use of merchandise barcoding systems, custom hang tags, returns and exchange management, next-day shipping, strategic warehouse locations, eco-friendly packaging solutions, garment hanging and custom branding. Among the plethora of services that may be offered, brands would like to know what matter most to their target group (TG). BI delves into the behavioral data to provide insights into what resonates most with their clientele. It quantifies the impact of these services by tracking their attributions to sales and website traffic. By focusing on their TG's preferences, retailers both online and offline improve customer loyalty, repeat purchases, achieve better product ratings and drive an overall increase of profitability.

**Returns Management:** Managing returns is a multifaceted challenge that requires retailers to strike a balance between customer convenience and operational efficiency. Faced with one of the highest return rates in e-commerce industry, it is critical for apparel brands to manage it efficiently. Using BI tools, online retailers can gain deep understanding into specific reasons for returns. A granular understanding empowers them to take proactive measures to mitigate returns. For instance, they can improve product descriptions, provide size guides or adjust marketing strategies to align with TG/ regional preferences.

To conclude, in the ever-evolving world of fashion and e-commerce, change is the only constant. In this VUCA business environment, BI has emerged as a guiding beacon for the industry to not only adapt but thrive among the chaos. BI enables apparel brands to forge deeper connections with their customers. Harnessing the power of data-driven insights, it acts as a compass that ensures that retailers stay agile, customer centric and successful. ■