

#### WHITE PAPER

# The Mandate of Customer-centric IT

BUILDING BUSINESS INTELLIGENCE SOLUTIONS AROUND CUSTOMERS, RATHER THAN PRODUCTS, WILL KEEP YOU LOOKING AHEAD-NOT IN THE REARVIEW MIRROR Business intelligence and reporting have served companies well over the years by inspiring smart decisions based on sales analysis. But remaining competitive in the new, constricted world economy, in which a single order might mean the difference between survival and demise, requires a far more proactive approach. Companies must be so attuned

to customer behaviors and buying patterns that they can anticipate market needs and deliver products before their competitors have a chance to even think about, let alone capitalize on, an opportunity.

But conventional business intelligence—which enables sales trending for a particular product or products based on line of business—doesn't lend itself to driving the market in this way. More typically, the widget business unit gets its product reports and the doohickey division gets its product reports, but even though the same customers buy widgets and doohickeys, the product-centric nature of traditional business intelligence keeps that information separate. Today's economy demands a new form of business intelligence, one that places the emphasis on the customer rather than the product.





Customer-centric business intelligence is contextual and predictive in nature, not historical. As Lyn Robison, a vice president and research director of data management strategies for Burton Group, says: "Certainly customer-centric business intelligence provides better, more indicative insight into what's happening in a company's marketplace."

#### Understanding the Business **Imperative for Customer-Centric IT**

Competitive advantage today depends on such intelligence. Companies have to be able to respond rapidly to or, better yet, preempt customer needs. In 2010 and beyond, companies that achieve such nimbleness will set themselves apart from the pack.

CIOs clearly recognize the business imperative. A recent IBM study of more than 2,500 global CIOs shows that using data to gain a competitive advantage and improve business decision making is a top priority. A healthy 83 percent of the survey respondents identified business intelligence and analytics as the way they will enhance their organizations' competitiveness. What's more, 68 percent of CIOs at high-growth organizations said they are seeking ways to achieve greater integration and transparency with customers, according to Harriet Fryman, business unit executive with IBM Synergy.

"If we take this statistic as a trend, we know that the majority of organizations are starting to look at customer-centric business intelligence," Fryman says.

# Knocking Down the Barriers to **Customer-Centric IT**

Enabling a customer-centric view of the business seems a logical, sensible objective, but obstacles loom. On the budget side, the same economic forces that are pushing companies to take a customer-centric view are hampering their ability to do so. Grappling with a faltering economy has many CIOs focusing internally on how to cut costs and drive efficiencies, leaving little time to focus on the next step in business intelligence, Fryman explains.

Organizationally, product-based business intelligence happens first and is perpetuated because it matches the way most companies have structured their data—which is to say, by business line or in silos. The silos, in turn, are often product-centric themselves, centered on the business processes required to manufacture a product and get it out the door to customers.

"In a nutshell, product-based business intelligence is being done first because that's the data that can be easily accessed and analyzed," Robison explains. "Customer-centric business intelligence is more difficult because customer data tends to be spread throughout the enterprise in multiple silos. Customer data is scattered, redundant and hasn't been reconciled among the silos—customer 47 in one silo

is probably different from customer XYZ in another silo, but there's no way of knowing that."

## Performance Management's **Place in Customer-Centric IT**

As CIOs finesse the move from product- to customer-centric business intelligence, what they're really doing is evolving from business intelligence alone to that discipline combined with performance management.

"If a company moves from internal data to market-driven analysis, performance management has a role in providing insight that company can use to understand how to respond to different customer groups," says Fryman. "Rather than treating each group as a revenue line item for a particular product, the company gets an understanding of which customers have preferences for which products, so it can then sense and respond better to market conditions." In short, she adds, "taking business intelligence from an understanding to an action really happens with performance management."

#### Wiley: A Leader's Perspective on Customer-Centric IT

Companies that want to play in the customer-centric business intelligence/performance management game will need a common information foundation. That common foundation enables "one version of the truth," says Warren Fristensky, senior vice president and CIO at John Wiley & Sons Inc., a \$1.6 billion global book publisher headquartered in Hoboken, N.J. A company can have the greatest tools in hand, but without good information and data to feed them, they're of little value, he says.

<sup>66</sup> From Day 1 of its business intelligence strategy, Wiley recognized the importance of having trusted information. It really focused on the importance of having a sound information base for its business intelligence initiative, as well as recognizing that **being customer**centric means looking forward as well as backward.

"When you talk about common databases and laying a foundation for business intelligence, the data come first and the tools come second," Fristensky explains. "You need both, but to craft a business intelligence capability, you need to have a place to stand. Our place to stand is our common platform, with common data, so we understand what 'one version of the truth' means. When we're talking about a particular customer or product, everybody uses the same terminology."

Once this foundation is in place, CIOs can harness the power of business intelligence tools—in Wiley's case, from IBM Cognos Software—to enhance decision making. "Then they can feed appropriate information to the business intelligence data warehouse, cube or modules, whatever your business calls them, and develop key views and reporting mechanisms on top of that. It's an additive process," Fristensky says.

<sup>66</sup> To our delight, we discovered that people consumed our scientific material **with a passion**. The business intelligence we picked up helped us to **promote its discoverability** and allow more and more people to **access that content more frequently**.<sup>99</sup>

 WARREN FRISTENSKY, Senior Vice President and CIO, John Wiley & Sons Inc.

It also enables that much-sought-after nimbleness. "Being able to view timely and accurate information allows you to manage the ship en route, versus looking at results after the fact and saying, 'Oh, so that's what happened,'" Fristensky says. "You really don't want to look in the rearview mirror to manage. You want to be able to manage in the current environment and use analytics to take you forward into the future."

Fristensky speaks from experience—and has the numbers to justify Wiley's bold move into customer-centric business intelligence. Under his expert guidance, Wiley numbers among a select group of companies that are successfully operating from a customer-centric view of the business.

"From Day 1 of its business intelligence strategy, Wiley recognized the importance of having trusted information," Fryman says. "It really focused on the importance of having a sound information base for its business intelligence initiative, as well as recognizing that being customer-centric means looking forward as well as backward." Wiley didn't land among this elite class of companies overnight. Its business intelligence journey began more than a decade ago, coincident with the rise of the World Wide Web and the advent of the Internet's use as a commercial, not merely academic, platform. Until that point, Wiley had been progressing merrily along the path it had embarked upon nearly 200 years ago: producing books, journals, monographs and other literary products for sale through intermediaries such as agents, booksellers and distributors to the ultimate customer: readers.

"For a long time in our history, we didn't know much about who was reading our titles, or how or when they were reading them," Fristensky says. "We'd send the stuff out through intermediaries, and while we would get some feedback from them, we didn't learn much directly from our ultimate customers."

As it did for many companies, the Web turned Wiley's traditional business model on its head. "Through the enabling technology of the Internet, we were able to interact with our customers, see how they viewed our content, when they viewed it, how they used it, what they didn't use and so forth, and it allowed us to more rapidly and fully respond to customer need and use with different types of products some print, some electronic and some a blend of both," Fristensky says.

A good example comes from 1999, when it began providing online access to scholarly material via its Wiley InterScience platform. "To our delight, we discovered that people consumed our scientific material with a passion. The business intelligence we picked up helped us to promote its discoverability and allow more and more people to access that content more frequently," Fristensky says. Wiley InterScience today provides access to more than 3 million articles across nearly 1,500 journals and 7,000 online books and major reference works.

Wiley set out to create more product and business models that would enable it to serve not only its traditional intermediaries and institutional customers but also individual consumers now reachable via an online presence, building on the common global technology platform architecture that had been integrated during the prior decade.

"We started out with our back-end infrastructure as totally integrated, so whether a customer ordered by fax, over the phone, by mail or over the Internet, that order against that account was kept in one place and available by customer service reps in real time," Fristensky says. "Because we already had this common platform, we were able to do this integration so our front-end Web sites could be physically located anywhere but be logically tied together." Likewise, Wiley employees from New Jersey to New Delhi get business intelligence in their own context, using local spellings, converted to the appropriate currencies and the right pricing for whatever region their customers reside.

The company accomplishes this using a variety of IBM Cognos Software business information management tools, including Cognos Enterprise Planning, Cognos 8 and Cognos TM1. "With the Cognos tools, we're able to look at the three-dimensional nature of information and construct copies of that data that users can organize, slice and dice for their own view," Fristensky says. For example, a U.S. executive gets global sales data delivered in dollars, while a U.K. executive sees the stats delivered in pounds sterling.

### The Golden Rule: One Version of the Truth

It all boils down to that one version of the truth, with its singular benefit of enabling Wiley to navigate its way through an increasingly fast-paced business environment with agility.

Companies can build customer-centric IT models without establishing a common data platform, but Fristensky advises against it. "A lot of people try taking data from disparate systems, but they have a huge reconciliation process to get the data into similar format, and then they have to apply business intelligence on top of that," he explains. "That can work, but it takes a long time, is hard to do and never reconciles back into the original system."

#### The Next Step for Customer-Centric IT

As business intelligence leaders such as Wiley continue to evolve their customer-centric strategies, content and predictive analytics will play increasingly important roles, experts say.

Cognos 8, for example, reads not only structured data but also unstructured data pulled from e-mails, call center transcripts, legal documents and the like. With such a capability, a customer-centric organization is able to top off quantitative, factual customer data such as orders placed with qualitative information such as dissatisfaction with a product. "It can determine whether a customer is complaining or happy, see what products come up the most in conversation, then analyze what sorts of customers are making what types of comments—and make business decisions based on that information," Fryman says. Fristensky sees enormous growth potential as companies draw more customer analytics out of tagged content. "We haven't even scratched the service of what the power tools of business intelligence and content analytics can do in that area," he says.

That also holds true for predictive analytics, which enables companies to analyze historical patterns to forecast future behavior (a capability IBM Cognos Software acquired from SPSS Inc.). What patterns does Wiley see, for example, among customers buying its pharmaceutical materials? "It could use this type of information as it's considering altering a product portfolio or moving into a new country to predict the expected business outcome," Fryman says.

Wiley has the numbers to prove the effectiveness of its customer-centric strategy. Since 2000, traffic to the myriad Wiley sites has grown at a dramatic compounded rate of more than 40 percent per year, Fristensky reports. This year, traffic load will crack the 600 million customer visits level, placing Wiley.com among the top 1,000 Web sites by traffic volume as ranked by Alexa Internet Inc., an Amazon.com company. As of mid-November 2009, Wiley.com ranked 777th among U.S. sites and 1,346th worldwide.

<sup>66</sup> There's an awful lot of what people in retail would call 'foot traffic' through our Internet sites. And that's a dramatic indication or **metric showing how successful the transition from a print world** where we didn't really know our customers to the **online world where we fully understand them and how they behave**.<sup>99</sup>

- HARRIET FRYMAN, IBM Synergy

