

Winning the War on Complexity

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“Integration is the most important thing. Without that, it doesn’t matter how agile your applications and systems are. If they are not interrelated and all on one database, you’ll never achieve the goal of making it easier for customers and yourself.”

— Sam Changizi, vice president of E-commerce, @Comm

FOLLOW THE LEADER

Margin increases of 14 percent over two years. Savings of more than \$1 billion in a year. How does a company achieve figures like these in today’s markets? Simple.

Or rather, by simplifying.

In 1998, Oracle Corporation managed its worldwide operations in much the same way that many multinational companies still do: The company had built a huge, distributed, worldwide corporate culture on a client/server computing infrastructure. Hundreds of databases in countries around the world held silos of information. Sixty independent profit centers created redundant data and applications, independent spending, productivity inefficiencies, and huge maintenance bills.

“To find the answers to simple questions, such as how many employees we had, we would literally have to go out and touch 60 databases,” admits Gary Roberts, senior vice president, Global IT, Oracle Corporation. “We were spending uncontrollably, adding more databases, applications, infrastructure, and personnel to support our growth, while exponentially increasing complexity. For example, we had 120 e-mail databases globally. The cost and effort of doing a simple upgrade was going through the ceiling, and . . . we were eating up our profit margins.”

Roberts and other senior officers decided to transform Oracle into a model e-business. The company began centralizing data, automating and integrating core business functions, and leveraging standard internet business processes, using its own E-Business Suite of software. Oracle expected by doing so to save money and increase margins. And it did, saving \$1 billion in the first year alone and improving profit margins as well. Over the past two fiscal years, Oracle’s annualized operating margins have improved from 21 percent to 35 percent.

But saving money was only a start. Oracle’s transformation to an e-business also transformed the corporate culture, making it easy to

share information around the globe, so that senior management could make decisions based on facts about the business. It transformed sales, automating and enforcing a step-by-step process for selling products that can be seamlessly tracked from lead to close. It transformed customer service, providing self-service access to most of the information that customers need and freeing support personnel to focus on critical issues. Employees, customers, and suppliers now have access to the applications and data they need—when they need it—and decisions are based on current, consistent information across the board.

How can other companies achieve similar success? By leveraging the internet as a global network and centralizing information, enabling access from anywhere in the world with a standard Web browser. By adopting new internet business practices rather than modifying software to work with outmoded business processes. And by relying on integrated, complete software suites that link together all company departments into one seamless information flow—from marketing to Web store to telesales to sales to accounting—rather than cobbling together point solutions that were never engineered to work together.

“The ability to access our Oracle database through a Web browser has given us a global knowledge of our suppliers and buying patterns, so that we can combine worldwide purchases to get better terms, pricing, and service.”

— John Basone, director of IT, CSX Lines

CENTRALIZED DATA=CENTRAL INTELLIGENCE

Many global enterprises add unnecessary complexity to their operations by distributing the workload to local systems. For these organizations, simplifying IT activities involves buying software applications that support consistent, worldwide operations from a single instance of the software. These centralized implementations can be accessed from any point on the globe via a simple Web browser.

“We’re using technology to differentiate ourselves from our competitors. The shared-service model with the Oracle E-Business Suite has vastly reduced our overall costs and enabled us to supply more timely information to our managers,” reports John Basone, director of IT Finance at CSX Lines, the largest U.S.-based ocean carrier, serving more than 100 seaports and transportation terminals in 80 countries and territories around the world. To reduce the cost of doing business, CSX Lines implemented a global purchasing network based on Oracle applications. “The ability to access our Oracle database through a Web browser has given us a global knowledge of our suppliers and buying patterns, so that we can combine worldwide purchases to get better terms, pricing, and service,” Basone explains. “We centralized the Oracle database in North America with access through our frame-relay network to all of our 240 sites throughout the world.”

Having a centralized source of global data also streamline manufacturing operations, as McDATA has demonstrated. With operations in Canada, the United States, Germany, the United Kingdom, and Japan, McDATA is implementing the Oracle E-Business Suite and Oracle8i Database to centrally manage its multicurrency, multiorganizational operations from a single source of data. “We’ll be doing everything on Oracle—designing and building our products, shipping, managing credit and collections—essentially, we’ll be running our entire business on the Oracle platform,” explains Debra Morton, director of business systems at McDATA.

“In today’s market, with tight technical staffing and application vendors producing upgrades at a furious pace, the ‘toolkit’ approach simply doesn’t make sense. With Oracle and the integrated Oracle E-Business Suite, we don’t have to write interfaces and keep up with software upgrades. We have a comprehensive solution, and we get support and consulting from a single source. The result is a major competitive advantage.”

— Doug Allen, CIO and president, ASP Hosting and Managed Services Group, Hostcentric

TRANSFORMING BUSINESS

Companies look to a variety of software applications to help them expand markets, strengthen relationships with customers, and increase overall business efficiency. But software is a parts-and-labor business. Building an e-business involves connecting the various parts of a business together, improving business efficiencies and customer service and reducing costs. In most cases, companies buy the parts and integrators put them together. These application integration efforts involve expensive and time-consuming custom development work to connect applications, data, and business processes as hardware is deployed, networks configured, and software installed. But far and away the largest integration cost stems from trying to integrate two or several pieces of software to fit seamlessly together into one business system.

A recent Meta Group study revealed that many companies are spending as much as a quarter of their IT budgets trying to integrate their business systems. Of the companies surveyed, 63 percent said it was still difficult to access information held across the company, and 59 percent said the main barrier to information access was IT systems that didn’t intercommunicate. More than a third of these companies believed that not being able to access and manage information efficiently could lead to a loss of customers.

A December 2000 Gartner Group report found that back-end integration efforts can represent 90 percent of the implementation work, making it one of the top three reasons why sales force automation projects fail. Sales applications must interface with inventory, order entry, billing, and tracking systems. Web stores must be integrated with fulfillment systems. And so on.

For example, with enough integration work, an order that originates in a BroadVision Web store can be passed to a JD Edwards order-management system. Companies can use vendor-built middleware interfaces—or “connectors”—to simplify the job. But it’s still a big

“There is no better integration method than designing the entire application suite to work together to begin with, and here Oracle has a huge head-start on the industry.”

— Sharon Ward, director of Enterprise Business Applications, Hurwitz Group

task for consultants—which means a big expense for the company. Even the connectors need to be tuned and customized to fit a particular integration task. If anything goes wrong, it’s the customer’s problem.

And integration takes time: Full-scale enterprise software implementations involving cobbled-together best-of-breed applications can take as long as two years to complete. No sooner has a company finished the integration project, moreover, than one of the software products gets updated, the interfaces change, and the entire process starts all over again. Each time someone upgrades a single component of the application environment, developers have to take apart the software, add the upgrade, reintegrate the components, test the new system, and then deploy all over again.

No wonder many companies avoid upgrades altogether, even if it means foregoing key new developments in software functionality.

There are many reasons for this expensive scenario:

- Conflicting development agendas by multiple vendors
- Time-consuming and costly integration processes
- Nonunified upgrade procedures
- Cross-training issues related to a shortage of skillful labor
- Lack of vendor accountability due to multiple sources of support
- Time-consuming deployment cycles, including juggling multiple platforms, architectures, software packages, and consulting services as part of project management
- Multiple vendor contracts and sources of support
- The need for a common data model, which must be cobbled together or “reverse-engineered” from various applications

COMPLETE AND SIMPLE

Does deploying application software have to be so complex? Not if businesses implement integrated software *suites* built from the start to work together instead of attempting to build a business system from disparate parts. According to Colleen Niven of AMR, integrated suites allow users to share information between applications, making it easier to manage business processes and track related activities. She points to the Oracle E-Business Suite as a leading example—a comprehensive e-business software environment designed and supported by one company. From customers to suppliers and everything in between, businesses can

“Oracle is now integrating all of its applications into a modular, seamlessly upgradeable suite that will allow customers to gain all enterprise-application functionality without retaining expensive consultants to bolt together multiple disparate pieces, from multiple vendors.”

— *The Death of Best of Breed*, a Summit Strategies newsletter, April 2001

run one integrated system across all their operations around the world.

This shift in business strategy can yield tremendous cost savings. “We estimate that just in purchasing alone, based on converting our worldwide sites to the Oracle purchasing module and improving our processes . . . we’re going to save \$35 million per year,” CXS Lines’ Basone says.

The Oracle E-Business Suite simplifies the integration process by coordinating all key business functions, from marketing and sales to manufacturing, order processing, fulfillment, and customer service. It pivots around open standards that streamline data-processing activities both within the Oracle E-Business Suite and with third-party software applications.

Agilera looked for this type of integrated suite to tie together its call center activities with each customer’s e-mail and Web interactions. The motivation for the full-service application service provider (ASP) was to simplify its marketing campaigns by correlating customer data from each interaction point into a cohesive marketing program. “With the integrated Oracle E-Business Suite, we don’t have to write interfaces and keep up with software upgrades,” says Doug Allen, CIO and president of Agilera’s ASP Hosting and Managed Services Group. “We have a comprehensive solution, and we get support and consulting from a single source. The result is a major competitive advantage.”

Staff Leasing, the largest professional employer organization in the U.S., also cites integration as a major attraction of the E-Business Suite. “A single-vendor relationship simplifies matters, and integration is extremely important,” says Senior Vice President and CIO Lisa Harris. Staff Leasing’s integrated system reduces the time company agents spend on the phone by an average of 30 seconds per call and cuts total work time spent on select clients by 27 percent. The benefits are irresistible: improved customer service, reduced costs, and a stronger competitive advantage.

And for McDATA, the integrated system makes it easier to track production schedules, arrange for shipments, and book revenue. “With our former business systems, the purchase-order cycle took about two weeks,” says Morton. “With Oracle, we can turn POs around in one day.”

These customer successes are in marked contrast to typical enterprise software implementations, which often get bogged down by complex integration efforts. The reason is simple: Most application software vendors sell components that must be modified to meet each customer’s unique business needs.

Consultants and systems integrators glue the pieces together, resulting in a unique software configuration for each customer. As new versions of the software are released, the customized configurations must be upgraded and reintegrated.

Oracle takes a different approach, motivated by one overriding premise: reduce complexity. Take the labor out. Remove the variations from one installation to the next by encouraging customers to run standard, certified configurations.

Sharon Ward, director of Enterprise Business Applications at Hurwitz Group, calls the Oracle E-Business Suite the first contender in an elite echelon of software that she calls “über” applications: applications that cover the functionality typically provided by ERP, CRM, SCM, e-business, and a host of niche applications. “Businesses require this type of integrated suite to support the complex, fast-paced, multichannel economy we live in,” she says.

According to AMR’s Niven, with an integrated application suite, there is no need to spend time or money on integration. Working with a single vendor simplifies support and maintenance. And the releases of the individual products and modules are coordinated, lessening the burden on the IT staff for upgrades. The software company handles the software business, allowing their customers to focus on core business.

“The Oracle E-Business Suite gives users an unprecedented breadth of functionality without the messy integration challenges associated with best-of-breed approaches.”

— Sharon Ward, director of Enterprise Business Applications, Hurwitz Group

THE SIMPLE BUSINESS CASE

Winning the war on complexity means more than centralizing data and implementing an integrated suite of software. It also means avoiding the temptation to modify packaged applications—to “force-fit” them to conform to outdated business processes. To stay on-track, companies are better off implementing standard applications that yield a rapid ROI.

When Hitachi Systems decided to upgrade from Release 10.7 to Oracle’s E-Business Suite Release 11*i*, the world-leading global electronics company saw the chance to update its business processes as well. “We were using highly customized applications that would taken years to upgrade, ” says Dave Farwell, vice president of Business Finance at Hitachi Data Systems. “ We wanted to do it fast, and we wanted to eliminate all this customization going forward.” Hitachi decided instead to implement the Oracle E-Business Suite in a “plain vanilla” fashion, wherever possible modifying its business processes to match the software.

Put simply, companies need to make the distinction between what they need and what they want. In most cases, what they need represents 80 percent of the value of a particular business application. Is it worth undergoing tedious and expensive

customization work to attain that last 20 percent? In some cases, the answer is yes – particularly when that last bit of business functionality yields a competitive edge. But for standard functions such as expense reporting and order entry, the objective should be to implement the basics and move on. These business processes are not what differentiates the business in the marketplace. Why not save time and money by modifying the business practice to conform to the software rather than the other way around?

Smart customers are coming to the same conclusion Hitachi did. When a large global energy company realized its core business competency lay in building power plants rather than modifying software, Oracle worked with senior managers to redefine, simplify, and modernize the company's core processes, move them to the internet, and map them to the Oracle E-Business software. No changes were required to the standard implementations, and it took just five months to roll out the first manufacturing plant. Now, the company has a stable set of software applications that are easy to upgrade and maintain, because they are based on standard configurations.

How is this possible? Within most industries, the lion's share of the deployment is common from one site to the next. Because Oracle owns both the software and the consulting practice, innovations learned during repeated consulting engagements gradually end up back in the product and become the standard way of doing business. As time goes on, the standard software begins to match the best practices for that industry. The software becomes progressively more refined with each implementation.

By helping customers centralize, transform, and simplify their businesses, Oracle removes complexity and cost and frees corporate resources for those unique projects that truly differentiate a business from its competitors.

“Oracle has done the hard work of pulling many best-of-breed solutions into an integrated application suite. Its XML-based integration architecture is both open and comprehensive. There aren’t many companies with the resources to pull this off, and none that could do it any better than Oracle.”

**—Joshua Greenbaum,
principal, Enterprise
Applications Inc.**

“Oracle has attacked the deadly dragon of costly, extended ERP implementations with consistent, fixed-scope methodology and, according to FastForward customers, has handily won.”

— Aberdeen Group

BUSINESS FLOWS

In a typical e-business scenario, customer-order information is simultaneously transmitted from the marketing applications to the ordering system to the back-office financial and inventory applications—and then on to supply-chain partners for manufacturing, design, and fulfillment. Putting all the pieces together in a cohesive fashion is an incredibly complex task. That’s why Oracle’s top-notch applications come with best-of-breed internet business processes that have been refined and perfected on thousands of implementations.

For example, instead of implementing a new marketing campaign management system or procurement system, Oracle allows customers to implement complete business flows such as “campaign to cash” and “procure to pay.”

Most marketing VPs don’t have a view into the “cash” part of their marketing campaigns, because most marketing software allows a company to plan marketing campaigns but doesn’t tell the business how many leads were generated or how much product was sold. Marketing is important, but being able to follow the dollar—from marketing campaign to cash in the general ledger—is much more important. Business must be able to track the cost of a marketing campaign to the receipt of payment from the customer.

This type of holistic business approach made an immediate impact at McDATA Corporation, where recognizing deferred revenue is now automatic, as is generating month-end journal entries to adjust for multiple currencies. Oracle E-Business Suite applications drive an automated order-to-configure process that extends throughout the supply chain. “The old way of creating journal entries was very time consuming,” says McDATA’s Morton. “Oracle automates the process; it is much more efficient.”

FASTFORWARD FLOWS TO RAPID RETURNS

Implementing enterprise software is traditionally a lengthy process, often taking as long as two years to complete. McDATA hired Oracle Consulting to manage an implementation process that took just ten weeks. Morton and her team have witnessed quick improvements in their internal business processes. What’s the reason? Other vendors offer point products for specific, unrelated tasks. Oracle offers complete solutions with guaranteed implementation timeframes.

For example, with Oracle Internet Procurement, Oracle offers the only solution for automating the entire purchasing process—from procurement to payment—within a fixed time frame. Another example of rapid delivery is Oracle’s new Global CRM in 90 Days

initiative. Using CRM applications to improve customer retention and acquisition has never been more critical, and this solution offers swift returns on a company's investment in global customer relationship management.

With Oracle FastForward Flows, Oracle has defined a set of proven business flows and packaged them with rapid implementation services, support, education, and software. Designed to dramatically reduce the complexity, time, and cost associated with large-scale implementations, these standard implementations give customers a path to fast business benefits.

“When we originally looked at outsourcing the Oracle ERP solution, we estimated that a hosted versus an in-house solution would yield a 64 percent return on investment. We went live in May 2000, and year-to-date now we are realizing approximately a 76percent return on investment.”

— David Lachicotte, vice president of Information Technology, Commercial Net Lease Realty

GET IT ONLINE: SOFTWARE AND SERVICES

For companies that want to avoid in-house implementations altogether, Oracle offers E-Business Suite applications as an online, hosted option via Oracle.com. As part of the FastForward Flows deployment, customers can choose whether to deploy the software in-house, via Oracle.com, or through one of Oracle's ASP partners.

And unlike other vendors that focus on making disparate applications interface merely to implement a local ERP system, Oracle offers E-Consulting, which focuses on leveraging the expertise inherent in integrated software in order to implement global e-business strategies. Oracle's E-Consulting methodology allows much of the implementation work to take place off-site, rather than at the customer's location.

For large ERP deployments, AMR estimates the cost associated with software interfacing can be as much as \$13 million the first year and \$2.4 million per year thereafter. With an estimated 50 percent of IT budgets designated to software interfacing, Oracle E-Consulting provides an option that enables rapid implementation of e-business strategies at significantly reduced cost, eliminating the need for time-consuming, costly software interfacing.

Establishing standard, virtual consulting practices not only speeds the implementation process but also streamlines the process of managing the applications remotely. In many cases, Oracle can manage an entire e-business system for its customers from its virtual Oracle.com environment.

With its three core components, eSelling, eDelivery, and eManagement, Oracle E-Consulting uses the internet to rapidly deliver strategy, technology, and implementation services that transform traditional businesses into e-businesses, using Oracle software.

“Our growing needs in Europe, Asia, and the U.S. can only be met with a flexible, open system like Oracle’s E-Business suite. Oracle also has expertise in the high-tech discrete manufacturing sector. That’s the business model we want to follow and Oracle supports it as part of its standard implementation.”

— Debra Morton, director of Business Systems, McDATA Corp.

STANDARD FROM TOP TO BOTTOM

From top-tier e-business applications through middle-tier application servers to the underlying database, Oracle’s entire thrust is toward standardization. Instead of multiple options for its core infrastructure products such as Oracle9i Database and Oracle9i Application Server, there are just a handful of standard configurations and options. This makes it easier for customers to track software releases, upgrade their applications, and obtain technical support.

Standard configurations also make it easier to offer remote management capabilities. Regardless of where the computers reside, Oracle can run the applications and manage them over time. Oracle can even become a “virtual DBA”—handling backups, upgrading software, maintaining the network, tuning the systems, and troubleshooting problems. Standard configurations, easily accessed and managed via the internet, make location irrelevant.

Oracle is also working with vendors such as Compaq Computer Corporation to certify standard application platforms in which the hardware, operating system, and all the software applications have been tested to work together seamlessly. The motivation is obvious: make complex systems simple by delivering preconfigured and preintegrated e-business infrastructure solutions.

With this standard, repeatable, quantifiable approach to enterprise software deployments, Oracle envisions a New World Order for its e-business customers, based on internet business practices (IBPs) that define new rules of engagement:

- Centralize critical business information and make it accessible via a standard Web browser.
- Deploy globally rather than locally.
- Implement complete internet business flows rather than dated business rules.
- Use standardized, certified configurations rather than modifying packaged applications.
- Invest in integrated software suites designed and engineered to work together.
- Focus on your core competency: Shift complexity out of your IT organization by deploying online services.

It’s all made possible by the power and integration of the Oracle E-Business Suite and supporting infrastructure software, such as Oracle9i Database and Oracle9i Application Server. Customers who

choose to build their businesses around these products benefit in many ways:

- Increased profits
- Reduction in overall labor costs
- Improved reliability
- Streamlined operations
- Rapid implementation and speedy ROI
- Better performance
- Configurations that are easier to manage and upgrade
- Minimized training
- Higher user satisfaction
- Improved customer information and business intelligence

“Customers achieve infrastructure savings from the thin-client model. But over the long term, the real savings spring from putting business processes online.”

**—Josh Greenbaum,
principal, Enterprise
Applications Inc.**

ROI: RELY ON ORACLE’S INTEGRATION

In its report “E-Biz: Down but Hardly Out” (March 26 2001), *BusinessWeek* found investments in e-business remained strong, despite the current economic slowdown. A recent *Time Magazine* article reported the new rallying cry in today’s economy is “spend to save” (April 1, 2001). The article quotes General Electric CEO Jack Welch proclaiming “You won’t see one ounce of slowdown in tech spending from us. We are driving the hell out of IT spending.” Companies are forging ahead with their plans for automating front-office and back-office operations, focusing on software implementations that give the most rapid results.

Simplification equals cost reduction. Cost reduction equals rapid implementation. Rapid implementation equals rapid ROI. Few business leaders question the potential of e-business systems to reduce costs, increase productivity, improve accuracy, and get closer to customers. Achieving these objectives is a lot easier when the e-business applications are tightly integrated. Gone are the days of buying different applications from a host of technology vendors and spending countless hours and dollars integrating them. The goal is to obtain working software, right out of the box. The Oracle E-Business Suite enables companies to efficiently manage customer processes, manufacture products, execute marketing campaigns, ship orders, and collect payments—all from the same set of business systems.

Companies that want to succeed in today’s marketplace need to begin by waging their own war on complexity. It’s up to senior

executives such as Welch to lead the charge, since decisions about enterprise software ultimately affect every part of the organization. And for the roadmap, the tools, and the services they need to help their companies win, they won't find a better ally than Oracle.

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