Payment Processing as a Strategic Advantage

Using Next-Generation Technology to Cut Costs, Optimize Adaptability, Ease Compliance, Mitigate Risk, and Deliver Competitively Differentiated Services

Payment Processing as a Strategic Advantage

Using Next-Generation Technology to Cut Costs, Optimize Adaptability, Ease Compliance, Mitigate Risk, and Deliver Competitively Differentiated Services

Executive summary

Banks, financial services companies, government agencies, and corporations have to process high volumes of payments that arrive in a variety of forms—including paper checks and electronic remittances. They have to accurately associate these payments with specific invoices, accounts, shipments, and/or promotions. They have to do this as quickly as possible to optimize cash flow. And they have to do it as cost-effectively as possible to optimize operating margins.

Historically, these objectives have primarily been the concern of the operations managers who have implemented the location- and hardware-bound systems that most financial institutions use today. Growing market pressures, however, are putting new demands on payment processing architectures. These include:

- Growing pressure to address the operational and competitive implications of Check 21
- Growing pressure to reduce costs, optimize accuracy, accelerate processes, and improve scalability
- Growing pressure to gain the efficiencies that result from being able to perform different tasks at different locations while maintaining centralized control
- Growing pressure to add value by providing customers with competitively differentiated services—including rich, real-time payment data
- Growing pressure to mitigate risks, including those associated with regulatory mandates and management of the enterprise IT environment
- Growing pressure to ensure that payment processing operations are highly adaptable to changes in both the business and the marketplace

Payment processing technology is thus no longer exclusively a functional concern of operations managers. It has now become highly relevant to the various strategic concerns of C-level executives, senior product managers, and other corporate decision-makers.

Fortunately, a new generation of payment processing technology has become available just as these market conditions are so dramatically altering payment processing requirements. This new generation of technology allows document capture and back-end payment processing tasks to be performed anywhere on any vendor's hardware. It makes it easier to intelligently link multiple document images and electronic files to each other in order to consolidate posting, archiving, and reporting of all transaction data. It facilitates the discovery and correction of processing errors by operations staff. It integrates seamlessly into multi-platform enterprise and inter-enterprise computing environments. And it simplifies the extraction and delivery of payment data for reporting, alerting, analytics, and other value-added functions.

This new generation of payment processing technology thereby empowers financial institutions of all kinds to meet the diverse requirements of operations, product, finance, IT, and compliance managers—including reduced cost, more effective mitigation of risk, greater adaptability, and the ability to more readily develop and deliver the differentiated services that are so critical to success in today's highly competitive global marketplace.

Payment processing pressures

Once upon a time, payment processing operations were fairly simple and straightforward. Banks, payment processing service providers, and other financial institutions received checks and other traditional paper-based forms of payment. These payments were appropriately processed at the location where they were received. Operations managers therefore focused primarily on making sure that payment processing tasks could be accomplished quickly, accurately, and cost-effectively.

The business environment, however, has changed significantly over time as image-based processing and non-traditional electronic forms of payments become increasingly common—and as changing business conditions put new pressures on payment processing infrastructure. As a result, payment processing is no longer merely a functional concern of operations managers. In fact, payment processing issues now directly bear upon the strategic objectives of C-level executives, senior product managers, and other corporate decision-makers.

Key factors contributing to the growing strategic importance of payment processing include:

Growing pressure to address the operational and competitive implications of Check 21
Check 21 is a disruptive factor in the payment processing market. Traditional banking sector lockbox service providers, for example, used to be able to offer the advantage of more immediate access to check clearing systems. With Check 21, this is no longer necessarily the case—which means that outsourcers can compete by simply delivering services such as data entry at lower cost. All entrants in the market must therefore take steps to ensure that their operational approach to processing of truncated checks remains fully competitive.

Growing pressures to reduce costs, optimize accuracy, accelerate processes, and improve scalability
In challenging market conditions, cost reduction becomes more essential than ever for maintaining or improving profitability. Cost reduction, however, can be a major challenge as entrenched costs are amortized over a declining number of paper checks—and as processors have to support an increasingly complex payment environment that includes checks, credit and debit cards, wire transfers, ACH, Paypal, and other emerging digital transaction types. At the same time, processors have to be able to scale the total volume of payments they can handle, without sacrificing speed or accuracy. In fact, there are significant advantages to be gained by improving both the accuracy and speed with which they can expedite payments.

Growing pressure to perform different tasks at different locations while maintaining centralized control

One of the most compelling ways to cut operational costs in today's globalized business environment is to perform tasks where the right skills are available at the lowest rate. In some cases, this may mean utilizing an offshore outsourcer. In others, it may mean taking advantage of the home-based labor pool available in areas of the country where the cost of living is low. Regardless of which route a company may choose to take, it can only do so if its payment processing architecture allows for such tasks to be readily distributed geographically.

Growing pressure to add value by providing customers with competitively differentiated services—including rich, real-time payment data

Customers are no longer content just to have their providers process payments. They now also expect their service providers to be able to supply them with a variety of value-added services, so they can turn payment data into actionable information—and turn that information into real business intelligence—so they can better manage cash flow, understand and serve their own customers, and fulfill their various other business objectives. To compete successfully in this evolving service market, payment processors need to be able to capture and manage a richer set of data—right down to line items on an invoice, in some cases. Service providers also need their payment processing systems to readily integrate with other information systems in order to quickly and flexibly feed payment data into customer-facing reporting and analysis applications.

Growing pressure to mitigate risks, including those associated with regulatory mandates and management of the enterprise IT environment

Payment processors have to mitigate a broader range of business risks than ever. Escalating regulatory pressures, for example, require that financial institutions maintain appropriate visibility and implement appropriate process controls across all of their operational systems. Payment processing systems must therefore integrate with corporate risk and compliance management mechanisms. This integration—as well as all the other types of integrations that may be necessary in order to fulfill any other future requirements of the business and/or its customers—is more readily performed if the payment processing environment conforms to corporate IT standards.

Growing pressure to ensure that payment processing operations are highly adaptable to changes in both the organization and in the marketplace

To survive and thrive in challenging times, organizations must be highly nimble. In some cases, this may mean acquiring, merging, or being acquired by other companies. Payment processing environments that cannot be easily mixed and matched across companies, business units, or contracting relationships create a significant impediment to such organizational adaptability. Closed, inflexible payment processing environments also limit the ability of an organization to add new features or incremental capacity in response to market changes.

Obviously, issues such as compliance, competitive positioning, and the ability to rapidly support M&A activity transcend the specific functional concerns of payment processing operations managers. This is not to say that those functional concerns aren't still important. They certainly are. It is, in fact, critical that payment processing environments perform reliably and efficiently in order to support day-to-day operations.

But in today's high-pressure markets, decisions about payment processing architecture have strategic implications as well. It thus makes sense to consider the interests and objectives of C-level executives and senior managers across the organization when making decisions about the future of any financial institution's payment processing architecture.

The limitations of conventional payment processing environments

Payment processing has evolved considerably over the past couple of decades. It wasn't that long ago that banks had to manually photocopy checks to provide customers with document images for their records. Nor was it that long ago that processing systems were limited to check processing only and/or tied directly to mainframes.

In other words, payment processing environments have had to continuously evolve in order to address the new pressures and challenges facing financial institutions and their clients.

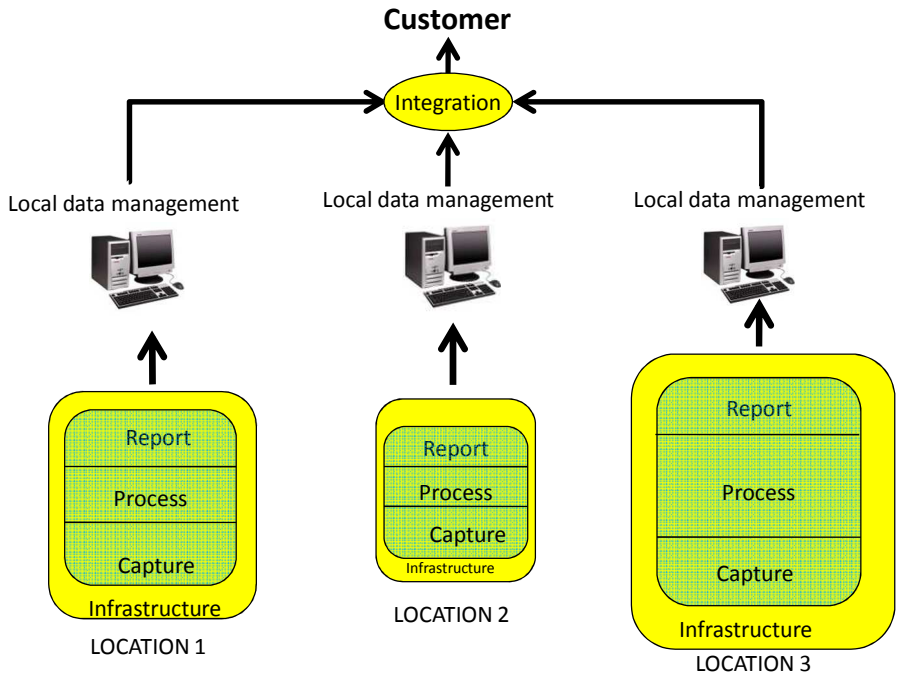

Fig.1 – Conventional payment processing has always been bound by physical location, with a higher cost of ownership due to the local dimension of labor rates, fixed costs associated with real estate and infrastructure and high technology support costs.

The same is true today. The payment processing environments that most institutions presently have in place were not designed to cope with the growing pressures they now face as described in the previous section. The specific limitations of these current payment processing environments include:

Location-bound processing. Payment processing environments at most institutions are still heavily tied to location. Document scanning, data entry, transaction balancing, and/or data management must all be performed at a single facility. This limits operations in several ways. Many lockbox providers, for example, have to take all the payments they receive at their regional facilities and physically ship them to some central location in order to achieve required economies of scale. Location-bound processing also limits the ability of processors to dynamically distribute labor-intensive tasks to offshore and/or home-based workers on demand.

Closed architectures. Payment processing environments at most institutions are still based on closed architectures. That is, they do not readily allow for integration with other systems and/or the incremental addition of new features and capabilities through third-party solutions. So in the event of a merger, for example, upper management is often forced to "rip and replace" one of the merged entity's processing environment entirely in order to consolidate operations. Or, similarly, if an institution wants to offer customers some new method of collecting stranded payments (such as immediate on-site scanning of personal checks), its choice of devices may be limited to a single approved vendor.

Inadequate real-time intelligence. Traditionally, payment processing environments at most institutions have lacked sufficient native intelligence to meet evolving analytical and compliance requirements. To perform data analysis on the transactions being executed in these existing environments, for example, IT has had to export transaction data and run reports in batch mode. This severely limits their ability to pinpoint specific transactions or types of transactions occurring in real time at various stages in the process—which, in turn, compromises their ability to deliver real-time reporting services, to implement adequate compliance controls, and to respond immediately to anomalous events.

Built-in inefficiencies. Payment processing environments at most institutions suffer from a variety of built-in inefficiencies. For example, checks often have to be run through these systems twice: once to capture the initial image and a second time after keying to add MICR encoding. This slows processing and doubles the physical stress on processing equipment. Existing systems are also typically inefficient when it comes to reject and exception handling. These inefficiencies significantly increase the cost of achieving the near-100% accuracy required to successfully satisfy today's demanding customers.

Limited adaptability. Payment processing environments at most institutions require too much customization, while providing insufficient configurability. They were simply never designed to facilitate the kind of modification required to deal with unforeseen market requirements that may emerge in the future. Modification of workflows, templates, and application interfaces typically require intervention by the platform vendor or an authorized third-party contractor—instead of being capable of being performed by in-house staff or contractors with standard skill sets.

It is important that these limitations do not in any way compromise a financial institution's ability to process payments with reasonable speed and accuracy. Banks, lockbox service providers, and other processors can therefore continue to operate their businesses on a day-to-day basis without upgrading their aging environments.

But this is precisely the problem. Because payment processing is not explicitly "broken" at these institutions, there is no immediately apparent urgency to change. So it is relatively easy from a strictly operational perspective to remain complacent about upgrading the processing environment.

In today's high-pressure/high-stakes marketplace, however, financial institutions cannot afford to remain complacent about their payment processing environments. Nor can they afford to take a strictly operational view of those environments. Payment processing has significant implications in regards to competitive service offerings, mitigation of compliance-related business risk, effective support of M&A activity, and broader strategies for cost control. Banks and other financial institutions must therefore continue to enhance their payment processing environments in order to successfully compete in a constantly evolving marketplace, comply with increasingly complex regulatory mandates, and sustain profitability under challenging market conditions.

Next-generation payment processing

So what kinds of changes should banks and other payment handlers be looking to make to their processing operations? What characteristics are likely to distinguish the next generation of payment processing environments?

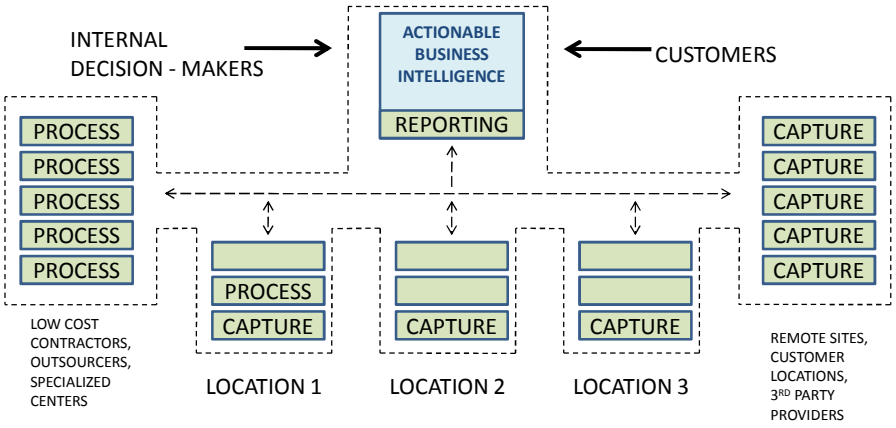

Fig. 2 - The optimal next generation payments system is not bound by location nor built in a closed architecture manner, provides flexibility to deploy a lower variable cost structure, enables the translation of data into actionable business intelligence, and is designed around complex business rules.

While specific technology choices will obviously vary from institution to institution based on their particular needs and their enterprise IT strategies, certain capabilities are clearly going to be necessary to ensure long-term competitiveness in highly dynamic regional and global markets:

Location independence. To stay competitive in terms of both service and cost, payment processors must be able to "capture anywhere, process anywhere, and report anywhere." Payment processing architecture must therefore be capable of securely distributing, routing, and load-balancing processing tasks to any authorized location as required.

Open architecture. Next-generation payment processing environments will of necessity utilize open architectures. Through the use of programming interfaces and conformance to broader IT standards, these environments will provide loosely coupled integration with third-party systems, devices, components, and services—while allowing staff with standardized skill-sets to support and modify operating parameters as required.

Native real-time data management and analysis. Payment processing systems are now beginning to offer real-time visibility into active transactions across the entire processing lifecycle. This real-time visibility enables payment processors to more closely monitor operations, to more easily pinpoint any transaction or set of transactions for analysis, and to more flexibly extract any data sets necessary to fulfill customers' ad hoc reporting requests.

Data management as a separate architectural layer. By implementing data management and analysis functions as a separate layer on top of underlying processing infrastructure, next-generation systems eliminate information "silos" and deliver actionable business intelligence wherever it's needed. The use of a separate data management layer also allows business intelligence capabilities to be enhanced as necessary over time—without the cost and disruption associated with periodic infrastructure upgrades, employee re-training, or hardware replacement.

Performance-enhancing features. Next-generation payment processing environments feature a variety of new, value-added capabilities such as rules-based validation of payment and document data using techniques such as cross-reference tables and digit checking. These new capabilities can be readily grafted onto existing infrastructure—rather than requiring "rip and replace" infrastructure overhauls.

Policy-based compliance monitoring and risk mitigation. By combining real-time data access with programmable rule engines, next-generation payment processing environments can deliver superior policy-based monitoring of end-to-end workflows—thereby enabling more rigorous compliance controls and more transparent reporting to risk managers, auditors, and regulators.

Check 21 support. Advanced payment processing environments support Check 21 so that both the financial institution and its customers can benefit from the advantages associated with truncation/image-based processing of paper checks.

Automated receivables matching. Open-architecture payment processing environments can be enhanced with a wide range of functionality such as the automated matching of payments with customers' receivables, bills of lading, claims, etc.—thereby substantial value for customers by ensuring that payments are quickly and accurately mapped to open invoices and account balances.

Web-based customer empowerment. By extending access to all relevant transaction data out to customers via the web, payment processors can empower customers to more quickly and easily make real-time decisions that eliminate processing errors and speed access to funds. Customers can view images and/or associated data to make a pay/no-pay decision on presented items—or provide the institution with the information necessary to complete the processing of a questionable item.

Float optimization. The next generation of payment processing systems can also help financial institutions to more effectively put their money to work and better measure the profitability of lockbox services by closely tracking funds float from encode time and/or deposit cutoff time. Float tracking can also be used as a value-added service to help customers better manage their working capital.

Self-service lockbox capabilities. The combination of secure open architecture and Check 21 can enable financial institutions to extend full self-service lockbox functionality to their corporate customers—including remote deposit, automated inter-enterprise workflow, and complete to-the-desktop reporting and analysis capabilities.

Again, the above is by no means a complete listing of all the features and functionality that will characterize next-generation payment processing environments. But these attributes do highlight the fact that there are likely to be substantive differences between the types of systems in place today—many of which already lag significantly behind currently available technologies—and those that are likely to be found at the best-performing banks, financial services companies, government agencies, and corporations.

It is also important to note that, unlike previous technology cycles, migration to this next generation of payment processing environment will generally not require extensive "forklift" overhauls of existing infrastructure. With their open architectures and support for third-party products, next-generation processing solutions can sit on top of existing infrastructure and integrate it into a more flexible and location-independent environment. This non-disruptive approach to implementation significantly reduces the cost and risk associated with technology migration—while substantially accelerating time-to-benefit.

Payment processing as a strategic advantage

Financial institutions, government agencies, and other payment processors are under extraordinary pressure to re-structure and re-engineer themselves in order to cope with a perfect storm of tighter resource constraints, escalating customer demands, and a rapidly shifting technology landscape. In times like these, executives have to be highly selective about which

projects they green-light and which ones they defer. It is therefore natural to ask why migration to a next-generation payment processing environment should be prioritized over other potential investments.

There, are, however, multiple compelling reasons why such organizations should upgrade their payment processing environments with all deliberate speed. These reasons include:

Cost and resource savings. Next-generation payment processing enables costs to be quickly pushed out of core operations through both increased efficiency and the ability to securely distribute tasks wherever it makes the most economic sense to have them performed. These savings—which will increase as total transaction volume grows—can be used to fund other initiatives.

Rich, actionable business intelligence. By making it easier to collect, analyze, and deliver data across all locations, payment types, and processes, next-generation environments provide a wealth of actionable business intelligence. This business intelligence can be used by payment processors themselves for better real-time and strategic decision-making—and can also be delivered to customers as a highly significant value-add and competitive differentiator.

Healthier operating margins. By enabling financial institutions to deliver competitively differentiated services, next-generation payment processing environments empower them to avoid the price erosion associated with commoditized offerings—and to develop differentiated services that can command premium pricing. The combination of healthier pricing and reduced costs can help sustain profitability even in the face of growing global competition.

Increased marketshare. The adaptable configurability of next-generation payment processing environments enable organizations to win more business by both 1) delivering a level of service that is competitively differentiated and 2) by creating services tailored to meet the specific requirements of targeted market segments and/or select high-value clients. In addition, the location-independence of these environments empowers organizations to extend their reach geographically. The combination of increased marketshare and healthier margins can result in significantly greater overall profitability.

Increased deposits. Financial institutions that can deliver differentiated payment processing services—and/or that can forge and maintain partnerships with new global entrants into the payment processing market—can capture high volumes of deposits. This is a significant consideration both in terms of institutional performance and emerging regulatory requirements for capitalization.

Reduction of business risk. Conventional payment processing systems leave organizations exposed to a wide range of business risks—including operational risk (i.e. processing error), compliance-related risk (which can result in fines and brand erosion), and the risk of being late to enter new markets. The reliability, visibility and controls integration that characterize next-generation payment processing environments substantially mitigate these diverse risks.

Better M&A execution. The financial services market is likely to be characterized by greater M&A activity, as well as new types of strategic partnerships. The openness and adaptability of next-generation payment processing systems greatly facilitate the kinds of technology integrations that are typically necessary to quickly and cost-effectively execute these business moves.

More nimble responsiveness to change. In addition to facilitating organizational change such as M&A activity, the flexibility of an open architecture and a separate data management layer enable payment processors to respond to all kinds of other business change—including the emergence of new payment types, new financial services consortia, and new regulatory reporting requirements.

More closely bonded customer relationships. In a highly competitive business environment, it is essential to minimize "churn" by creating closely bonded relationships in which customers have multiple disincentives to take their business elsewhere. The high-quality, cost-effective value-added services enabled by next-generation payment processing environments can help financial organizations develop these disincentives.

These combined advantages are quite compelling in light of today's dynamic market conditions and increasing competitive pressures. As Check 21 becomes more pervasive, as the volume of paper checks decreases, as regional players seek to go national, and as the expectations of business customers continue to escalate, payment providers will need their processing systems to keep pace—which means that they will need the advantages that next-generation systems uniquely offer.

These advantages are thus of obvious interest to various stakeholders across the organization—including product managers, IT managers, compliance managers, C-level executives, and even board members. In fact, the evolution and enhancement of an organization's payment processing environment has such broad implications that it can potentially be championed by any and all of these stakeholders, as well as the operations managers who have historically borne primary responsibility for such decisions.

Organizations seeking these advantages should therefore consider take the following steps:

1. **Inventory both current payment processing capabilities and those enabled by new technologies**
2. **Map out the differentiated "delta" between these two sets of capabilities**
3. **Poll all potential stakeholders to determine which of these differentiated capabilities they consider most valuable—and how valuable they consider them to be**
4. **Use that collaborative value assessment to determine how to prioritize specific payment processing infrastructure enhancements in relationship to other organizational imperatives**
5. **Initiate communications with vendors to develop a technology RFP that is appropriate to the organization in terms of scope, resources, and time horizons**

It is important to emphasize the fact that payment processing infrastructure enhancements offer cumulative value to the organization that transcends operational/cost advantages alone. Without this broader perspective on the impact of such enhancements, most organizations will under-value and under-prioritize it.

It is also important to emphasize the fact that such enhancements do not of necessity require disruptive or costly "rip and replace" infrastructure overhauls. With open architectures, payment processing environments can be significantly enhanced by overlaying appropriate additional functionality on top of existing infrastructure.

In addition, some solution vendors offer subscription-based models that allow payment processors to enhance their environments without major expenditure of capital.

The bottom line is that organizations that process large volumes of payments for others and/or themselves will be at a substantial disadvantage if they do not continue to improve their capabilities in response to changing market conditions. Resources are tight. Customers are more demanding. And regulatory mandates are expanding. To survive and thrive in such an environment, organizations must invest in more intelligent and adaptable payment processing infrastructure—or cede the business advantages that such infrastructure provides to those that do.

About *ImageScan*

ImageScan develops and delivers next-generation payment processing solutions that meet the evolving needs of financial institutions, operations outsourcers, corporations, and government agencies. *ImageScan's* industry-specific solutions uniquely enable these organizations to reduce costs, optimize speed and accuracy, and distribute processing tasks anywhere in the world. With *ImageScan* solutions and support services, organizations can successfully address their most pressing payment processing challenges—including the growth of image-based processing, increased business intelligence requirements, and expanding regulatory mandates. Through technology integration and flexible pricing models, *ImageScan* also ensures that migration to next-generation payment processing is rapid, non-disruptive, and cost-effective.

For more information on ImageScan solutions and services, please visit www.goimagescan.com or call us at 301-306-0700.