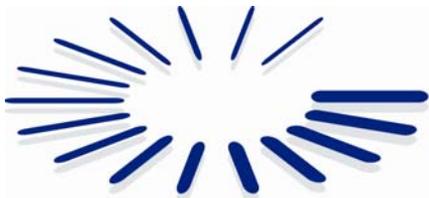




# *A Whitepaper for Independent Software Vendors (ISVs)*

## *A Guide to Provisioning, Billing and Nurturing Users of Web Applications and On-Demand Solutions*

An Independent analysis published on behalf of OpSource.



**OpSource**<sup>TM</sup>  
The SaaS Delivery Experts

## Executive Overview

A confluence of factors is driving customers to adopt a new generation of web-based, on-demand business applications via the Internet. The emergence of these Software-as-a-Service (SaaS) solutions is being driven by three primary forces:

1. Growing frustration among corporate end-users and executives with the costs and complexities associated with traditional, on-premise applications.
2. Broad-based acceptance of consumer-oriented, on-demand services which are setting a new standard for ease-of-use and cost-effectiveness.
3. Rapid evolution of enabling technologies which make it more economical to develop and deliver SaaS solutions.

As a consequence of these trends, THINKstrategies has found that corporate adoption of SaaS is accelerating. This adoption is not only among small- and mid-sized businesses (SMBs), but also large-scale enterprises. It is not only in 'front-office' applications, such as customer relationship management (CRM), but also in 'back-office' areas, such as accounting and financial systems. Industry-specific, vertical market oriented SaaS solutions are also emerging.

The rapid growth of the SaaS market has attracted a widening array of competitors, both start-ups and established independent software vendors (ISVs), seeking to capitalize on this new opportunity. This competition is placing greater pressure on aspiring SaaS providers to develop and deliver highly differentiated solutions at the lowest possible cost.

One of the key attractions of SaaS solutions is their ease of deployment and use from a customer, or end-user, perspective. These same attributes are critical for SaaS providers who must acquire new customers and scale their operations in a cost-effective manner. However, this "on-boarding" process is fraught with complications and pitfalls that can lead to service delivery problems and customer dissatisfaction.

As a result, SaaS is fundamentally changing the nature of the software industry and the way software companies do business. In many cases, the shift to a SaaS model is forcing ISVs to think like a web company, rather than a software vendor. This means creating new ways to engage customers via the web, as well as setting new standards for rapid deployment of their applications.

If a SaaS vendor can't quickly and cost-effectively on-board customers, it won't succeed in this online business. And, if it can't automate the on-boarding process, it can't build a scalable and profitable business.

Yet, Tier 1 Research has found that only 13% of SaaS providers had 'click-to-buy' functionality on their websites. And, amazingly 70% of web applications and on-demand companies do not have an integrated billing solution.

This whitepaper will discuss these challenges and examine how OpSource, in conjunction with its growing ecosystem partners, is helping ISVs overcome these barriers to success.

## The State of the SaaS Market

THINKstrategies believes the SaaS market is being driven by a combination of ten macro-trends:

1. Globalization
2. Commoditization/Differentiation
3. Mobility & Worker Dispersion
4. Consumerism
5. Web 2.0
6. Social Networking
7. On-Demand
8. Reliability/Security
9. Operational Efficiency
10. Out-tasking

Globalization has changed the competitive landscape within nearly every major industry sector. Globalization has not only opened up new markets, it has also opened the door to a new set of offshore competitors offering low-cost products and services which is commoditizing many markets and creating price competition. This commodization is making it more difficult for companies to differentiate their goods and services.

Worker dispersion and mobility is also allowing people to work anywhere, creating new challenges for companies seeking to give these employees access to corporate applications and databases remotely and securely. At the same time, many workers and corporate executives are becoming comfortable using on-demand, web-based solutions in their personal lives, and are seeking the same ease of use and low cost services to address their corporate and professional needs.

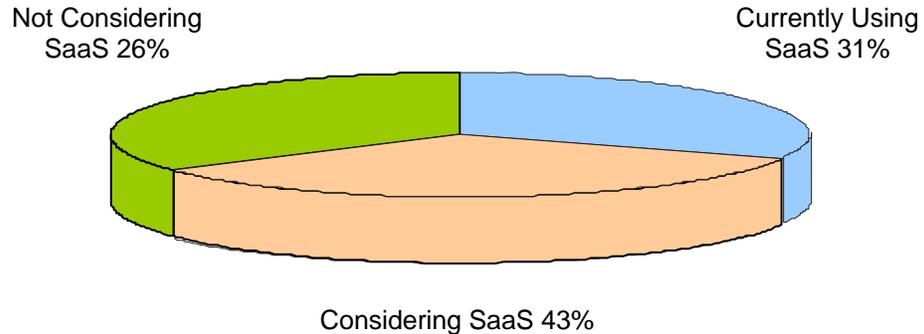
Business professionals have also become more comfortable using online services, such as Amazon.com and iTunes, in their personal lives. This positive consumer experience has set a new standard for the ease-of-use they expect from their software applications in their professional lives.

Today's Web 2.0 and social networking tools are also being applied to the corporate environment, creating new ways for dispersed workers to interact internally and corporations to engage customers externally.

Growing dependence among companies to communicate internally and externally via the Web has also made them more aware of the escalating challenges of delivering reliable and secure online services. These pressures are intensifying as they attempt to gain greater operating efficiencies in an increasingly competitive market.

Despite these trends, many industry observers view online services and SaaS as an isolated trend. THINKstrategies, on the other hand, has found almost a third of organizations have already adopted some form of on-demand Software-as-a-Service (SaaS) and 43% are considering SaaS, up from 34% in 2005. (See, Figure 1)

Figure 1

**Majority of Businesses Using or Considering SaaS**

Source: 2006 THINKstrategies/Cutter Consortium Survey

**Organizations Turn to On-Demand Solutions to Overcome the Shortcomings of Legacy Applications**

The growing interest in SaaS solutions is also being driven by escalating frustration, among corporate executives and business end-users, with the fundamental shortcomings of traditional, on-premise software applications.

This frustration is due to the fact that over half of legacy software deployment projects take twice as long or cost twice as much as originally estimated, and nearly a third of software projects are cancelled before they are completed, according to government studies.

The cost overruns continue after the deployment process is completed because maintenance and management costs to keep traditional applications up and running can often be ten times the original license fee, according to AMR Research. AMR Research has also found that the majority of legacy application deployments which are completed are under-utilized. This is because many organizations over-provision their license agreements to simplify the procurement process.

In an increasingly competitive marketplace, companies cannot afford the inefficiencies of legacy applications. Instead, a growing proportion of organizations are looking for new ways to acquire software functionality without the added hardware and staff costs, and ongoing administrative hassles of the past.

As a result of this rising customer interest, Gartner predicts over 25% of all software sales will be via services by year-end 2011. THINKstrategies believes this figure will be far greater.

Maybe the clearest indication of the magnitude of this shift toward software services came from Microsoft's CEO, Steve Ballmer, who predicted at a gathering of public sector CIOs in March 2007 that 80% of their organizations would be utilizing SaaS solutions by the end of the decade.

## The Challenges of Meeting the Varying Needs of Business Users in an On-Demand World

The good news is that a growing number of organizations are willing to adopt SaaS to achieve their business objectives. However, based on their consumer experiences, they expect that they will be able to easily acquire on-demand solutions via a simple online transaction and immediately begin to utilize the online application to meet their business needs.

However, corporate demands can be far more complicated than consumer expectations. Many companies will want to try an application before they buy it. They may want to acquire a single user license before making a commitment to an enterprise license. They may want to vary the number of users, number of application modules or level of usage. They may want to use the on-demand applications in business situations which require varying levels of security and reliability.

The intensifying competitive landscape is creating greater pressure on aspiring SaaS vendors to deliver highly differentiated solutions at the lowest possible costs without sacrificing quality. Many of these aspiring on-demand solution providers have not fully considered the complexities of delivering reliable and cost-effective solutions. They often depend on viral marketing and social networking tactics to grow their installed base of customers, but are not prepared for the variety of ways that potential customers might want to acquire their on-demand solutions. However, a bad experience can reduce the likelihood of repeat customers and customer referrals.

Therefore, SaaS vendors must design the solutions to maximize their ease-of-use and optimize the user experience. The quality of the user experience depends on the reliability and performance of a SaaS provider's service delivery capabilities, as well as the lifecycle of procurement, provisioning, metering, billing and reporting components which are integral to the service delivery process.

Given the impact of escalating price competition within the SaaS market, it is essential for successful SaaS providers to have cost-effective customer acquisition and service delivery management systems in place so they can generate greater sales, without requiring additional staff or cumbersome processes to properly support new customers.

With the success of consumer-oriented on-demand solutions, an expectation has been set that business-oriented SaaS solutions will be equally easy to acquire and use. Many online vendors have promised highly automated procurement, billing and reporting systems. However, the reality can be very different for many SaaS providers.

Tier 1 Research reported at its SaaS Evolution Summit in March 2007, that only 13% of SaaS providers had 'click-to-buy' functionality on their websites. Although many of these companies offer online demos of their SaaS solutions, when a customer decides to subscribe to the service a salesperson must become engaged to administer the transaction.

While this human interaction may seem attractive, it can result in a clumsy and costly manual process. This is especially true as corporate customers demand

varying contracting arrangements. Some may want per user pricing, while others may be seeking usage-based pricing. SaaS companies that don't have integrated order entry and service provisioning capabilities to handle new customers or modify the service levels of existing accounts will face serious operational constraints as they try to scale their business.

The marketing hype surrounding on-demand, SaaS solutions has also set an expectation that companies will be able to acquire online services on a true, pay-as-you-go basis. But, many SaaS companies also lack reliable service usage metering and measurement capabilities to properly monitor and bill for services. This deficiency can create billing disputes and cause SaaS companies to miss new service sales opportunities.

These issues can become even more complicated when a SaaS company attempts to enlist channel partners to sell its services, or when a SaaS company attempts to integrate its solutions with third-party SaaS providers. Tracking these transactions can create a multitude of provisioning, metering and billing issues.

Closely associated with these service management issues is the multi-tenant architecture which makes SaaS scalable and profitable. Many aspiring SaaS companies are migrating from an on-premise, single-instance, packaged software architecture, and need help designing, developing and hosting a new multi-tenant architecture to ensure it can withstand escalating customer demand.

In many business application areas, sophisticated certifications are required to comply with governmental and/or industry regulations. An increasingly important certification in the online transaction business is the Payment Card Industry Data Security Standard (PCI DSS 1.1).

This worldwide data security standard applies to any organization which stores, transmits or processes credit cardholder data. Because many SaaS solution customers will acquire these online services via a credit card, it is essential that the SaaS vendor, or its hosting partner, have proper PCI procedures and certifications.

In addition, many SaaS companies are still relying on hosting companies that cannot consistently meet their availability and performance promises. These SaaS vendors are under the misconception that hosting is a commodity business and can be taken for granted. They fail to recognize that many general purpose hosting companies lack high-availability service delivery capabilities, comprehensive management systems and proactive reporting mechanisms to support the 'five nines' service standards necessary in the SaaS market.

As a consequence, the SaaS providers relying on general purpose hosting companies are often notified by their customers when service outages occur. This is no way to win and retain customer trust and confidence, and build a SaaS business.

In fact, falling short in any of these areas can have a detrimental impact on the quality of the customer experience, harm customer satisfaction and lead to customer abandonment. Just as in the wireless service business, customer churn can be very costly in the SaaS market. But, with the plethora of online chat

rooms, reports of poor customer service travel faster and further in the SaaS market, seriously undercutting a SaaS vendor's chances for success.

However, most aspiring SaaS companies face escalating competitive pressures which require them to focus their energies on building the best on-demand applications possible, rather than worrying about the service delivery infrastructure and operational processes which will support them. The subscription fee structure associated with SaaS also makes it difficult for companies to invest in their own service delivery infrastructure and support staff to address these issues.

Therefore, it's essential for SaaS vendors to select an application delivery company which understands the unique challenges associated with on-demand services and has the right technologies, policies and personnel in place to satisfy these needs. Ideally, the hosting company will be more than just a service provider, it will also be a business advisor and partner.

## How OpSource Is Addressing the SaaS On-Boarding Challenges

OpSource has been a pioneer in helping ISVs migrate to a SaaS model. OpSource On-Demand, the company's web application delivery platform includes the essential elements for the successful delivery of on-demand services.

OpSource's approach goes far beyond traditional hosting and managed services. Instead, OpSource likes to refer to its services as "managed hosting on steroids" for the on-demand world. The company is focused on handling all the service delivery requirements for online applications so an on-demand company can focus its internal resources on building its core or strategic intellectual property as well as on sales and marketing activities.

The OpSource On-Demand platform provides an end-to-end set of services which enable Web application and on-demand companies to more quickly and effectively develop and deliver their online solutions.

OpSource Billing™ is a payment and collections processing solution to help Web application and on-demand companies overcome the challenges of billing for software delivered via the Web. OpSource Billing handles account activation, sets pricing and rates, captures usage information, generates and sends invoices, and processes payments, collections, and service suspensions. OpSource Billing includes real-time account creation, user authentication and authorization, activity tracking, pricing and rating, billing, and customer service that can scale to millions of users.

It is a fully integrated billing service built in OpSource's Services Bus (OSB) unified application delivery platform. OSB is built on a service-oriented architecture and a web services application program interface (API) that adheres to the strict operating standards of the PCI DSS 1.1 that require payment card data be encrypted at both the network layer and the database layer, with network access tightly controlled and monitored by firewalls and intrusion detection systems on a 24x7x365 basis.

OpSource Billing can accommodate flat rate, usage-based, or a combination of other billing types. It also supports multiple promotion campaigns and special

pricing offers, such as “try before you buy” plans, to meet varying customer needs. OpSource Billing enables Web application and on-demand companies to improve their financial effectiveness and profitability. In addition, OpSource Billing also includes an intuitive billing application format which can increase your customer satisfaction.

OpSource Analytics™ enables web application and on-demand solutions companies to obtain a wide range of operational indicators to better manage their business and optimize their performance. These indicators include,

- Bandwidth consumed
- Performance thresholds
- Units consumed: Clicks, seats, downloads
- Sign-on rates
- Customer churn
- Growth rates
- Advertising ROI
- Feature utilization
- Daily revenue run rates

OpSource’s services allow Web application and on-demand companies to obtain billing and analytics functionality without having to invest their limited financial and staff resources. Instead, OpSource allows these companies to focus their energies on developing leading edge solutions rather than trying to build reliable procurement processes.

OpSource has also created a partner ‘ecosystem’ of enabling technology companies with proven solutions and skills to address ISVs’ SaaS development, procurement, pricing, and reporting requirements.

Finally, recognizing that the subscription fee model associated with SaaS can represent a significant impediment for many ISVs who are attempting to start-up and later scale their operations, OpSource created a unique Success-Based Pricing<sup>SM</sup> model.

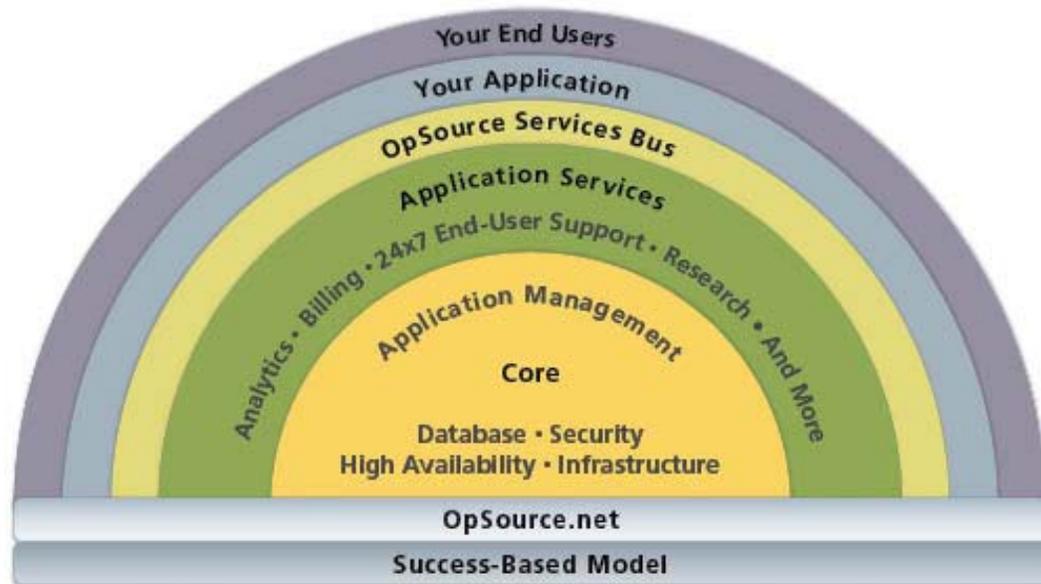
Under the Success-Based Pricing model, OpSource customers pay for OpSource’s services as they generate revenue from their SaaS solutions. This eliminates expensive investments in infrastructure and staff and reduces start-up risk. OpSource sums this up neatly in its philosophical statement “your success is our success”.

Every OpSource customer benefits from the integrated collection of services that comprise OpSource On-Demand. From the complete set of core services that provide SAS 70 Type II audited on-demand application delivery to access to important application services such as analytics, on-boarding and billing.

The OpSource Services Bus provides quick and easy access to a wide range of additional web services which allows OpSource customers to share, sell and purchase web services among the OpSource ecosystem.

OpSource On-Demand is summarized in Figure 2.

Figure 2  
OpSource On-Demand



These technical attributes, plus OpSource's SaaS business consulting skills, appealed to **Xythos Software**, an ISV focused on content management solutions, when the company decided to move from an on-premise to an on-demand orientation. This is never an easy transition, because it entails fundamental changes to nearly every aspect of an ISV's operations.

In order to minimize the disruption of this migration process and ensure its ultimate success, Xythos Software selected OpSource to manage its legacy applications as a first step toward re-architecting its software to a true multi-tenant structure. By offloading the operational requirements to OpSource, Xythos was able to focus its limited resources on redesigning its software and repositioning the company from a marketing perspective.

***“OpSource not only had the technical platform and service delivery capability to support our on-demand application, it also provided the business insight and advice to help us transform our operating model,”*** according to Emile Baizel, director of Xythos' On-Demand division. ***“This allowed us to bring our services to market quicker, capture new customers more smoothly and grow these accounts more effectively.”***

OpSource's redundant load balancing architecture and high availability infrastructure is governed by SAS-70 Type II audited management procedures. The scalability and reliability of OpSource's service delivery platform was a pivotal component of JasperSoft's selection criteria.

**JasperSoft** is a rapidly growing provider of on-demand, open source, business intelligence (BI) solutions. The company has more than 5,000 commercial customers in 81 countries which have downloaded more than two million copies of its solutions.

According to Jose Morales, JasperSoft's Vice President of Business Development, demonstrating the company's reliability and security capabilities has been essential to winning new customers. ***"Customers demand more from their service providers than they do from their inhouse staff and IT operations,"*** according to Morales. ***"By demonstrating that we could offer reliable and secure services, we've been able to rapidly expand our base and deepen our account penetration."***

OpSource's SAS 70 audit completion has satisfied customers' questions about the reliability and security of JasperSoft's open source solutions. OpSource's operational policies and procedures have also assured that JasperSoft's new customers can adopt its BI capabilities easily and quickly. As a result, a majority of JasperSoft's trial customers have acquired its solutions.

OpSource also works with ISVs to develop realistic pricing models that match their target customer profiles. In addition, they help ISVs create Service Level Agreements (SLAs) that are competitive and supportable. OpSource has teamed with technology partners to provide sales order entry and invoicing services, as well as performance management and service level management (SLM) reporting.

The integrated payment platform has been a key reason for **Marketo** to work with OpSource to support its on-demand marketing automation software. Marketo helps B2B companies automate their lead generation and nurturing programs. The company specifically offers on-demand pay-per-click management and landing page optimization solutions.

The nature of Marketo's business requires an activity-driven pricing model based on the total marketing spend of the user, rather than the more common per user or per seat pricing approach. Marketo selected OpSource to support its SaaS solution because of the versatility of its payment platform and expertise of its staff.

***"OpSource had the right platform and people to enable us to launch our services and start serving customers in just five weeks,"*** according to Phil Fernandez, Marketo's President and CEO. ***"OpSource has also ensured that our services are readily available and secure, giving our customers the confidence that they can depend on our solutions on an increasing basis."***

For hundreds of software and web 2.0 companies, OpSource has been a key partner in launching and growing their on-demand business. OpSource's on-demand expertise, complete OpSource On-Demand solution and success-based model are differentiators that appeal to ISVs like JasperSoft, Business Objects and others. As a result, OpSource delivers hundreds of applications to millions of end-users creating billions of transactions every day.

## Summary and Conclusions

As organizations become increasingly fed up with the costs and complexities of legacy applications, they are becoming more receptive to on-demand software alternatives. The pervasive nature of on-demand services in the consumer world has also made business professionals more aware of the potential benefits of these online, SaaS alternatives.

However, the ease of use and reliability of these consumer-oriented, web-based services has set a high standard for the quality of service which corporate users expect from their SaaS solutions. They expect it to be just as easy to get on-board with SaaS solutions as it is to acquire popular online services. ISVs seeking to become leading SaaS vendors must implement procurement and provisioning system which makes this possible.

Ironically, the pay-as-you-go subscription services model associated with SaaS makes it difficult for ISVs to invest in service delivery infrastructure, provisioning, billing and reporting systems to fully meet the needs of their customers. Instead, ISVs must focus their limited financial and staff resources on designing web-based applications which are 'more compelling than their competitors'.

As a result, smart ISVs are teaming with service providers who can do more than simply host their applications. They are looking for providers who can help them design their applications to ensure they are scaleable and secure. They are looking for providers who can monitor and manage the applications 24x7. They are looking for providers who can help them provision and charge for their applications. And, they are looking for providers who can help them build a successful SaaS business in an increasingly challenging market.

OpSource has made a commitment to meet these needs. It has made investments in its service delivery infrastructure and staff, and has established partnerships with specialized solution providers to address these needs.

OpSource customers benefit from the integrated collection of services that comprise OpSource On-Demand. This set of enablement services includes everything from SAS 70 Type II audited on-demand application delivery to service analytics, on-boarding and billing.

Through its integrated billing, invoicing and payment collection platform OpSource can help ISVs charge for their services in an automated and reliable fashion. This PCI-compliant platform permits 'click to buy' functionality, and includes self-service and customer service representative tools.

And, the OpSource Services Bus allows OpSource customers to share, sell and purchase web services across OpSource's growing ecosystem.

OpSource has also recognized the unique financial burdens of the SaaS business, and offers "Success Based" pricing to accommodate SaaS vendors' special needs. In this way, OpSource has aligned its success with the ISVs success.

It is for these reasons that OpSource has become a recognized leader in Web application and on-demand services enablement.

***This independent analysis was published on behalf of OpSource.***

### **About OpSource**

OpSource™ delivers Web applications and software as a service for on-demand companies, with hundreds of applications, millions of users and billions of transactions supported daily. OpSource On-Demand, the leading platform for Web application delivery, is defining how Web-based software is delivered. By choosing OpSource as their Web application delivery partner, companies are freed from investing in and managing the complex and costly infrastructure and services necessary to deliver applications over the Web. They can instead focus their resources on developing, marketing and selling their applications and services. OpSource On-Demand is suitable for companies at any stage of growth, with any type of on-demand application. OpSource is the only company to offer Success-Based Pricing<sup>SM</sup>, a unit-based pricing model that allows businesses to begin with a modest minimum commitment and scale expenses as revenues increase. Headquartered in Santa Clara, CA, OpSource has Web Application Delivery Centers in Virginia, London and Bangalore. For more information about OpSource, visit [www.opsource.net](http://www.opsource.net).

### **About THINKstrategies, Inc.**

*THINKstrategies is a strategic consulting services company formed specifically to address the unprecedented business challenges facing IT managers, solutions providers and investors today as the technology industry shifts toward a services orientation. The company's mission is to help our clients re-THINK their corporate strategies, and refocus their limited resources to achieve their business objectives. We help enterprise decision-makers with their sourcing strategies, IT solutions providers with their marketing strategies, and VCs with their investment strategies. THINKstrategies is also the founder of the Software-as-a-Service Showplace ([www.saas-showplace.com](http://www.saas-showplace.com)) a vendor-independent, online directory and information resource center of SaaS solutions. For more information regarding our unique services, visit [www.thinkstrategies.com](http://www.thinkstrategies.com), or contact us at [info@thinkstrategies.com](mailto:info@thinkstrategies.com).*