Application Service Providers

Expert knowledge means success

Contents
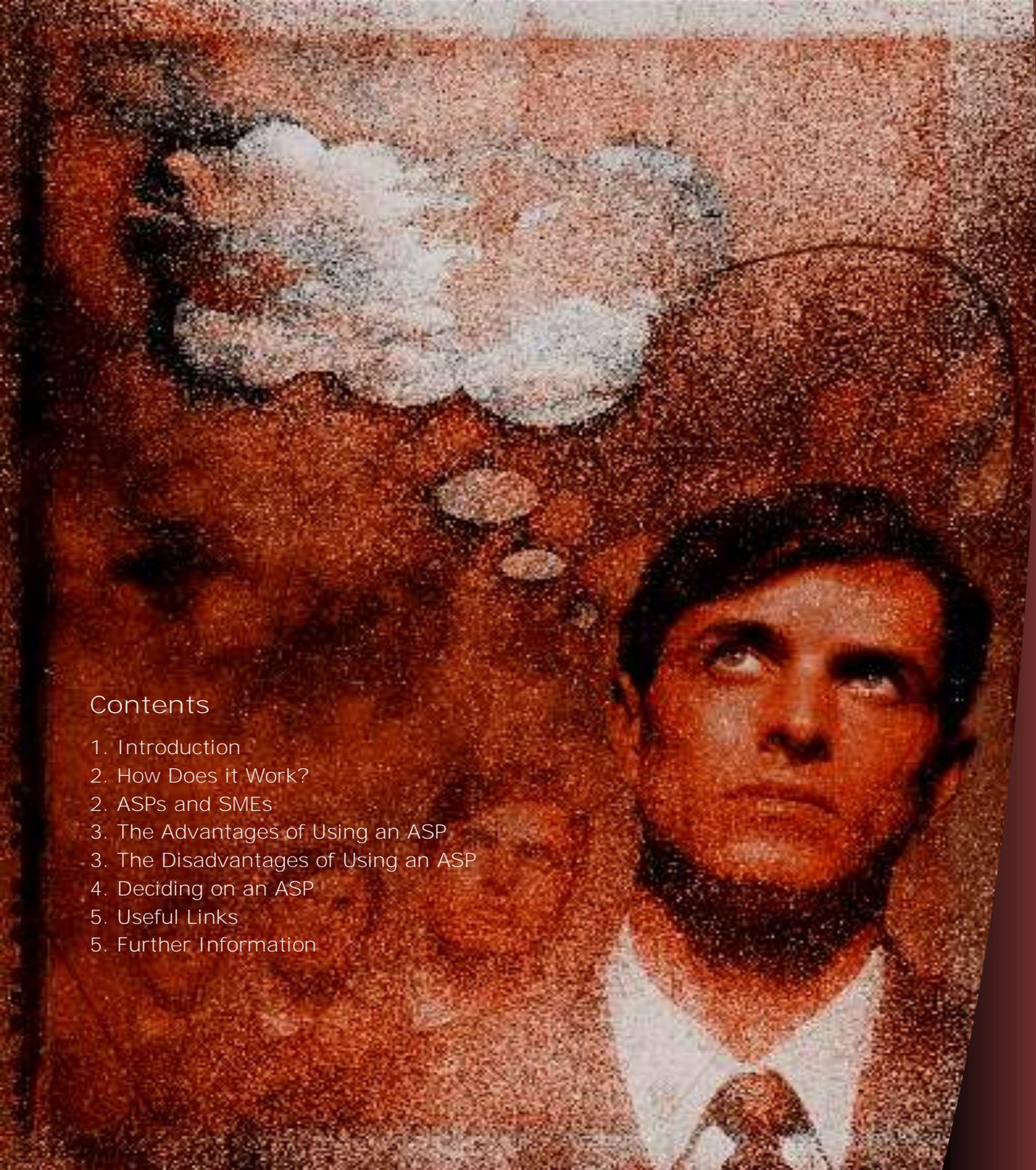
Introduction

When Application Service Providers or ASP's became common buzzwords at the end of the '90s, they were seen as the new Internet enablers that would allow companies to reap the benefits of expensive software, rented and delivered over the Internet for a modest "rental" fee. They were expected to change the face of the IT department forever in organisations all over the world. Whatever applications were wanted would be remotely delivered over the Internet and meet all the possible needs of any business - large or small: an incredible and flexible IT solution.

Certainly the theoretical model was well established: in the 1960s applications were often run under timesharing services, where users logged into mainframes from remote terminals. In the current internet-based model, the application software sits and runs remotely on the ASP's servers, but from the user's PC it appears as if it was running on your own network. This ASP model enables organisations to utilise packaged applications quickly and at affordable prices, while allowing them to concentrate on growing their businesses – making it particularly suited to the business and IT needs of SMEs.

The take-off of the ASP industry did not match the initial hyped expectations. Security concerns and the absence of realistically-priced and completely reliable Internet access made the ASP model unattractive for many businesses. Sales did not meet analysts' predictions and The Application Service Provider Industry Consortium, originally formed in May 1999 from an international group of more than 730 companies was disbanded. It is only in recent years that ASPs or "on demand" applications have started to attract interest again. Broadband connections are now fast, relatively inexpensive and available in the majority of the UK. Many consumers now use ASPs without even being aware of it. For example a Microsoft Hotmail user is using remote processing and data storage with Microsoft acting as the mail ASP. Some mail ASP providers also provide enhanced security through virus detection, admin tools and data backup.

Sage (UK)'s hosted Customer Relationship Management (CRM) offering has boosted the ASP industry. NetSuite has also stepped up its activity in the UK to win business for its integrated, web-based financial, CRM, stock and e-commerce suite. Microsoft and Google both endorse the ASP model, but there is a difference: their offerings are targeted at individual users. ASP applications - for example, CRM - tend to be used throughout an enterprise.

ASP offerings used to be focussed on accountancy or CRM based applications; now word processing, spreadsheets, online document storage and on-line back-up facilities are all examples of the services that ASPs may provide. The larger ASPs, for example Oracle and SAP can provide complete corporate IT services.

When you use an ASP, you can stop worrying about your IT functions. Dedicated professionals at the ASP data control centre do the worrying for you and guarantee access and operability at near 100% of the time. They host your business applications (the programs you use) at their data centre to allow you access to them, at anytime, from anywhere in the world, when you need it and where you want it.

The cost advantages of using an ASP can be substantial. Before ASPs, if your business wanted to use a particular piece of software, it would need to buy a software license for each user, or a corporate license where appropriate. With an ASP you typically pay a per-user fixed monthly fee, for the services that you want at a considerable reduction when compared to licensing costs. Cost of ownership is also significantly reduced, as when a new version of the ASP software is launched, you don't have to worry about paying additional licensing costs, nor do you have to buy the software or install it on the PCs at your office. The ASP does all that for you at the data centre.

Accessing software on a rental basis allows new and small businesses to implement software with no capital outlay and removes the headaches of software and network upgrades as the business grows. For mobile employees it can have the added attraction of making the application accessible anywhere in the world where an Internet connection is available.

What's an ASP?

An ASP is a company hosting software on their server that is accessible to users over the Internet to provide remote computing, file serving, and other application services for individuals or corporate users. The ASP owns the software and the servers that run and support the software.

An ASP provides a contractual service offering to deploy, host, manage and rent access to an application from a centrally managed facility - the data centre. Data and services are available to customers over the Internet or via a thin client.

An ASP bills its customers either on a usage basis or on a fee basis.

How Does it Work?

When a business uses an ASP, it effectively outsources its software applications to a third party (the ASP). The ASP provides the business access to the applications it needs - on a pay-as-you-go, per-user, per-desk basis.

The ASP's performance is usually tied to a fixed service level agreement. A business gains by having no upfront hardware costs and no software or updates to pay for, or to install or manage. The pay-as-you-go rental model provided by the ASPs can be an effective means for companies to cut down huge bills on expensive and ever-changing enterprise software solutions.

The ASP runs the applications from its remote site and provides all the technical backup and support. The ASP is responsible for upgrading software and seeing that technical glitches are ironed out with the software supplier. Using an ASP, many businesses can do away with their IT department. An ASP could handle all requirements from basic word processor desktop applications to more complex applications.

E-Mail and Messaging were the Most Popular

Types of Applications Used Through ASPs

Communications*	60%
Financial, accounting	37%
E-Commerce**	37%
Education, training	36%
Customer relationship management	30%
Human resources	22%
Personal productivity***	18%
Supply-chain management	14%
Project management	13%
Sales force automation	10%
Enterprise resource planning	5%

Based on a survey of 87 businesses that use ASP services.
*E-mail, messaging and groupware.
**Transactions and billing.
***Word processing and spreadsheets.

Source: Zona Research, May 2000

ASPs and SMEs

For SMEs to engage in e-commerce successfully, they need to have as sophisticated a back-office system in place as their larger corporate counterparts. However, until recently most SMEs have been unable to afford expensive enterprise resource planning (ERP) systems that cost millions and take months to implement.

Small to medium-sized enterprises (SMEs) have particularly complex e-business requirements as they try to compete with large competitor organisations. Although SMEs need to closely manage time to market, costs and budgets in their ever-changing markets, they can't afford problems such as system failures, downtime, under-par bandwidth and the inability to deliver the services demanded and expected by their customers. An ASP provides the solution to these problems for SMEs - see the advantages in the Table on the next page.

Microsoft Office 365 offers a set of software products from Microsoft Corporation, with the initial plan including a Professional subscription (for organizations of 25 and smaller) and an Enterprise subscription (for organizations with more individuals).

Office 365 includes the Microsoft Office suite of desktop applications and hosted versions of Microsoft's Server products (including Exchange Server, SharePoint Server, and Lync Server), delivered and accessed over the Internet, in effect, the next version of Business Productivity Online Suite (BPOS).

In December 2011, Microsoft launched Trust Center and announced that Office 365 now complies with EU privacy regulations.

Source: Wikipedia

The Advantages of Using an ASP

When people work conventionally, they have all their applications and data on the desktop on their local PC. It's simple but it suffers from one main problem - when they're not physically at work they can't view, or update, or download or print files. For the average user, it means access to information is available only at work and, more specifically, only when the user is sat in front of their PC.

Using an ASP provides access to data 24 hours a day, every day of the year. Access is provided from home, on the road or thousands of miles away from any desktop anywhere in the world. All the user has to do is to fire up his/her Internet browser on a PC and enter the user name and password. In a flash, a customised, personalised desktop appears on screen complete with all the applications, functions and files. Add to this the highest level of security and you have the ASP model.

The Disadvantages of Using an ASP

There are also disadvantages to using an ASP. The Application Software provided will be generic rather than customized to your business and may therefore have limited functionality or be difficult to integrate with any existing applications your business runs.

As the data is stored by the ASP rather than on your premises there are obviously concerns over both access and security that will need to be considered and addressed. For example if you or the ASP loses internet connectivity you will lose access to your data.

You need to be certain that the ASP has suitable security arrangements in place before you entrust them with sensitive customer data. You should also ensure that you can get your data back easily if the agreement is terminated.

ASP Advantages

The advantages of the ASP model are considerable:
- No installation, upgrade of software and hardware.
- 24 hour, 365 days a year maintenance of software applications and the application environment.
- Overcoming diseconomies of scale.
- Simple, easy monthly rental basis.
- Predictability of costs. One of the benefits of the ASP is that costs are fixed and can be calculated easily throughout the year, which makes it easier to budget accordingly.
- Reduced total cost of IT ownership and easier budgeting of IT costs - since the task of managing and running the application on an on-going basis is off-loaded to the ASP provider, the customer does not need to hire and train in-house staff to manage the application. There is only a limited need for a specialist in-house IT team, enabling focus of resources on core business issues, rather than IT concerns.
- Good technical support - continuous access to the latest technology needed to run a business but without the risks, costs and administrative responsibilities of developing and maintaining the required IT infrastructure.
- Enabling focus on the business, not technology. Since the ASP will also be providing application management services, the customer gains access to trained personnel right away. This enables the customer to use the in-house IT personnel to solve core IT issues and focus on the strategy of the enterprise.
- Access to software that might otherwise be too expensive to buy.
- Easily upgraded software - faster implementation of new applications and technologies with reduced risk to existing systems environment.
- Easy application scalability and increased IT flexibility.
- Access to reliable security, back up, disaster recovery and support services.
- Existing investment in legacy computers is not thrown away.
- Quicker implementation. ASP-delivered enterprise applications can often reduce the complexity of installing a new system. In addition to removing many issues relating to hardware and networking, ASPs often aim to deliver a standardized configuration, thus reducing time to go live.
- Keeping current on the latest technology. Customers can automatically leverage the latest technology in their system without incremental upgrade expense or the worries of upgrading the system themselves.

Deciding on an ASP

There are several forms of ASPs. These include:

- A specialist or functional ASP delivers a single application, such as credit card payment processing or timesheet services;

- A vertical market ASP delivers a solution package for a specific customer type, such as a dental practice;

- An enterprise ASP delivers broad spectrum solutions;

- A local ASP delivers small business services within a limited area.

- Some analysts identify a volume ASP as a fifth type. This is basically a specialist ASP that offers a low cost packaged solution via their own website. PayPal was an instance of this type, and their volume was one way to lower the unit cost of each transaction.

Once you have determined the right type of ASP for you then before you choose one find out:

- What kind of services are provided and will they be cost-effective for you?

- Who is actually providing the service?

- What kind of security (firewall) and online data protection is offered?

- Are there any single points of failure?

- What type of server configuration is being used?

- How frequently are back-ups taken and are they stored off-site?

- How long does it take to install the necessary software or access coding?

- How fast are security patches and upgrades installed?

- How soon will it be before you are able to use the ASP's services?

- How will the ASP report its delivery performance and results?

- What help desk facilities are available?

- How does pricing and additional billing work?

- Is there a limit on data storage (disk space) at the data centre?

- What is the contract period?

- How are files recovered from the ASP at the end of the contract period?

- What systems availability guarantees are provided?

- How is sub-standard delivery of service and downtime handled by the ASP?

Top 25 software or infrastructure providers for the ASP, Web Services and Utility Computing industries.	
Company	Description
Abridean	Infrastructure ISV
Agiliti	Managed Hosting Provider
Apptix	Private-label Service Provider
BEA Systems	Infrastructure ISV
BMC Software	Infrastructure ISV, Infrastructure ASP
Citrix	Infrastructure ISV
Computer Associates	Application Software Vendor, Software-as-Service Provider
Data Return	Managed Hosting Provider
Digex	Managed Hosting Provider
EDS	IT Service Provider, Managed Hosting Provider
Ensim	Infrastructure ISV
Hewlett-Packard	Infrastructure ISV, Systems Manufacturer
IBM	Infrastructure ISV, Application Infrastructure Provider, Systems Manufacturer
Macromedia	Infrastructure ISV
McAfee	Application Software Vendor, Software-as-Service Provider
MetraTech	Infrastructure ISV
Microsoft	Application Software Vendor, Software-as-Service Provider
NaviSite	Managed Hosting Provider
Onyx Software	Application Software Vendor
Oracle	Application Software Vendor, Application Outsourcer
Progress Software	Infrastructure ISV
SAP	Application Software Vendor, Application Outsourcer
Sun Microsystems	Infrastructure ISV, Systems Manufacturer
SWsoft	Infrastructure ISV
VeriCenter	Managed Hosting Provider

Source: ASPnews.com
(April 2005)

What's Cloud Computing?

The Cloud is the concept that all your programs and files can be held online rather than on just one computer in your office.

An extension of current web services, cloud computing eases the software and hardware demands placed on you and your business, since the network of computers that makes up 'the cloud' handles these for you. All you need, as a user, is the software required to let you access your resources online. Simple examples of this are - email providers like Yahoo, Hotmail or Google.

Instead of running an e-mail client locally on your computer, you access your e-mails from any computer, anywhere in the world, by logging on to your account over the internet. Cloud computing builds on this model providing both cost benefits

Useful Links

Working with an ASP offers a number of valuable business benefits. These benefits include the potential to significantly reduce information technology costs, reduce time to market for new products and services, and more effectively allocate scarce resources.

- **ASP News** - Breaking news releases, plus detailed news and analysis of the top global ASP news stories updated frequently. www.aspnews.com

- **IT-Director.com** - ASP technology spotlight. www.it-director.com/asps/index.html

- **FindApps** - provides a comprehensive guide to hosted web applications and Application Service Providers (ASPs). www.findapps.com

- **ASPStreet** – ASP directory which includes ISVs, infrastructure providers, network service providers and other ASP players such as ASP event organizers. www.aspstreet.com

- **Network World's ASP Research** - ASP search engine, overviews, major resources, publications, case studies and directories. www.nwfusion.com/research/asp.html

- **Software Source** Read about ASPs and outsourcing on the Software Source website. www.softwaresource.co.uk/ED_Asps_MENU.asp

Further Information

ASPs may never entirely replace bought-in, locally stored software, and there will always be a market for self-sustaining, offline applications. But the ASP delivery model is now sufficiently advanced that it will not only become more and more competitive in the IT sector - it will also continue to make outsourcing the most attractive option for many SMEs. With the advent of Microsoft Office 365, the idea of outsourcing software to a remote location may well have finally caught on.

This guide is for general interest - it is always essential to take advice on specific issues. We believe that the facts are correct as at the date of publication, but there may be certain errors and omissions for which we cannot be responsible.