

Should your CIO's head be in the Clouds???

The opportunity of Cloud Computing for Financial Services businesses

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Cloud Computing – Hype or Silver Bullet?

Cloud Computing - Everyone's talking about it – from Gartner to the Economist to the Man-in-the-Street (or my son at least). How many of us understand what it is though? (I include many CIOs in that question). Is it yet another over-hyped, under-delivering piece of packaging from the technology geeks or could it really be the silver bullet which will revolutionise our IT departments?

Relatively few companies are truly using it, but it could have the potential to dramatically change the means and the cost of future IT services provision – to a commodity model!

IT Cost Saving versus Service Delivery Improvement

In my article for Motor Finance magazine last January (<http://www.woburnconsulting.com/protecting-it-investment-in-a-downturn.htm>) I challenged CIOs to reduce their IT spend by 25%. I wonder how many have really taken that challenge on board – maintaining and even improving their service delivery and project completion while taking serious positive action on the bottom line?

Among the techniques I proposed to help achieve this goal were virtualisation and outsourcing – two underlying elements of Cloud Computing.

Virtualisation delivers optimized use of data centre resources

For almost ten years now we have seen the growth of server virtualisation in our data centres. Physical server boxes have been pooled and sub-defined into multiple 'logical' machines enabling more cost-efficient use of capacity, reduced power usage, increased responsiveness and higher reliability.

We have seen similar advances in storage utilisation – storage abstraction has enabled disparate storage elements to be managed as a single environment and delivered dynamically on-demand, once again maximising the utilisation of available capacity and providing greater reliability.

Web Services have encouraged Application Outsourcing

Most enlightened IT organisations have been moving towards the increasing use of Service Oriented Architecture (SOA) in their application portfolios over the past few years. SOA breaks applications into autonomous system services abstracted from one another. Each service provides a self-contained function with a published interface conforming to Web Services Architecture (WSA) standards.

The services can be made available over the internet either as unique elements or built into complete application packages, Software as a Service (SaaS).

Employing application structures which can benefit from web services enables faster, simpler and cheaper application development to be achieved. Many companies from SMEs to large multi-nationals have made significant investment in this area already

Next step – Cloud Computing

Cloud Computing is the next logical step which combines the two concepts of Data Centre Virtualisation and Web-based Application Services.

Cloud Computing utilises the power of a broad base of multi-tenancy physical computing and software services resources to deliver capacity and applications on demand via the internet. Not just Software as a Service but also Platform as a Service (PaaS) and Infrastructure as a Service (IaaS).

Ultimately, Cloud could achieve the utopian vision of 'Computing On Demand', moving IT spend from capital expenditure to operating expenditure and commoditising the IT industry! This would be much to the chagrin of many of my CIO friends but it's some way off yet!

The Financial Services sector is afraid of the Cloud

Reports on recent research by the Financial Services Club think tank indicate that of 230 financial firms surveyed, none has yet completed a cloud computing project. Within the retail banking sector almost 38% of organisations are not considering cloud computing at all. This figure only improves to 24% in the investment banking sector.

Given the potential benefits, why are Financial Services companies so reluctant to give it a try?

The answer is that they have real fears. Embracing Cloud Computing means reviewing many of the cornerstones of financial services computing - control of applications; regulatory concerns (where data will be stored); business continuity, security and critically, accountability. Who is brave enough to mess with these in the current economic and political climate?

But we should be brave! All advances in technology present new capabilities which can challenge many of our pre-existing operational norms. These need to be understood and managed to ensure continued smooth operation and regulatory compliance but they should not prevent us from making those financial and technical advances necessary for

long-term survival. This has been true with all stages of IT development and cloud computing is no different.

An 'Internal Cloud' is a no-brainer

Financial institutions in particular usually have large data centres with masses of computing power, much of it under-utilized. In recent years, server and storage virtualisation techniques will have undoubtedly provided some significant cost and flexibility benefits.

There is a chance to go further. The Internal Cloud is a solution which could provide greater increases in data centre utilisation, uptime, dynamic adaptability and, ultimately, cost efficiency.

Under the Internal Cloud concept all the company's IT resources are managed as a conglomerate whole, to deliver computing services on an 'as and when required' basis without the control, security and regulatory concerns of an external solution. Also, the CIO and his Team still remain fully accountable.

This is a great place to start your journey to the Clouds.

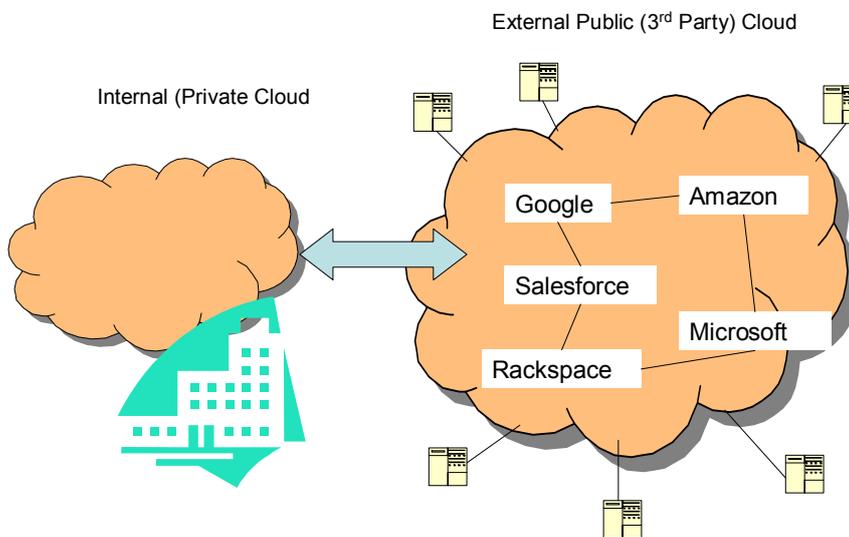
The External Cloud is maturing fast

Virtualisation software providers such as VMware, Citrix and Microsoft are addressing the overall management and continuity issues with rapidly maturing sophisticated solutions. Cloud platform and application providers, such as Amazon, Rackspace, Salesforce, Microsoft and Google are aware of the regulatory issues and, for instance, when required can guarantee the countries in which data will reside.

The Cloud is however unlikely to ever be suitable for all of a company's IT needs. Many key applications will remain bespoke to a particular company and will run under the tight control of that company's IT department for many years to come.

The most likely end state for larger companies is a Connected Enterprise Cloud – a combination of the Internal Cloud – the trusted, reliable, secure and accountable internal data centre and the Public Cloud - the efficient, flexible and dynamic multi-tenant internet services.

Connected Enterprise Cloud



The Cloud opportunity is just too good to ignore

With the cost pressures and the public spotlight on all Financial Services businesses we need our CIOs to be investigating every opportunity for efficiency. The utopian promise of Cloud Computing is certainly over-hyped BUT...

Can we afford to ignore the opportunity and miss out on the prospect of some very real advantages, not only in cost but also in flexibility and agility for the future organisation?

Some 3.4% of retail banks in the Financial Services Club research reported they have started a cloud project and this rises to 4% of investment banks.

You should join them. Pick an application area which is not business-critical or unique to your operation and dip your toe in the water – or your head in the clouds!

Good luck!

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