

Ubiquitous availability, usable handsets and availability of the right applications are combining to realise the dream of the mobile office that is everywhere

The iPhone ushers in an age of true mobility



The iPhone is giving Apple the incentive to start wooing the enterprise for business applications

The mobile phone and the internet have already transformed peoples' social lives and made a great impact in the workplace. Most of us can still remember the first clunky handsets became available as executive toys or car phones, not something for the masses.

But today the workplace is on the verge of becoming truly mobile, totally virtual to the concept of the "office". In fact it is no exaggeration to suggest that the concept of the office that we and particularly our parents grew up with will be completely redrawn over the next five to 10 years as mobility becomes woven right into the fabric of working practices across enterprises of all sizes.

Indeed the impact of this impending mobility revolution will be felt most strongly in smaller organisations, the SMEs, which generally have not yet given staff remote access to communications and messaging services.

Even in larger enterprises, mobile access to messaging and communications remains a disjointed affair at present, obtained through a combination of laptops in hotspots, and VPNs, on an intermittent basis.

Of course nearly everybody in advanced nations has a mobile phone now: penetration has reached the point where the population of handsets is greater than people in a few countries such as the Netherlands and Japan. This familiarity with the mobile phone, along with the dexterity to exploit its features efficiently, has created the cultural platform, and the basic underlying skill set, for the mobility revolution in the workplace, without any need or role for formal education.

But this alone would not deliver true mobile working without three key technological developments.

The first is ubiquitous broadband bandwidth as offered by existing or emerging 3G and 4G cellular networks, providing always-on access to enterprise applications and communications services. By definition, full mobile working, in effect taking the office with you wherever you go, cannot be achieved if connectivity is intermittent, with broadband access confined to hotspots or patches of coverage in urban areas.

The second key step is the device itself, which must have the processing capability, memory and above all user interface needed to make mobile access seamless and match as closely as possible the experience of the office desk with a PC and fixed line phone.

The arrival of Apple's iPhone and particularly the second version, the iPhone 3G, launched in June 2008, proclaimed this new era of portable devices providing the display, touch screen capability for easy input of text, and functions needed to interact with corporate applications, even if it was initially conceived more for consumer applications.

Of course there are other devices edging towards this idea of the universal mobility enterprise handset, such as the RIM BlackBerry Storm; the Sony P990i smartphone; the T-Mobile HTC Google; and the Nokia N96 16 gigabyte smartphone.

But the iPhone — along with Apple's associated decision to target the corporate market seriously for the first time — is the herald announcing enterprise mobility's coming of age.

Apple's cofounder and CEO Steve Jobs is notorious for his dislike of wearing a suit and until now has not gone for suits as customers either. But that is all changing, as Apple realises that its future as a major IT player lies as much in enterprise mobility as in consumer chic.



Steve Jobs, Apple CEO: company's future lies as much in enterprise mobility as in consumer chic

Indeed there are rumours that Jobs is considering taking a step that might stick in the throat of Apple purists, by bringing out a version of the iPhone with a keyboard. Whether true or not remains to be seen, but the point is that the maturation of mobility has provided Apple with the cue and incentive to start wooing the enterprise.

The third key ingredient of enterprise mobility that Apple has been quick to embrace falls under the banner of the mobilised application. This includes unified communications or messaging, which is in effect a horizontal application common to all businesses.

It also includes more specific in-house applications tailored to the enterprise, such as customer relationship management.

For some years large enterprises have provided various messaging services, and access from laptops to corporate applications, but now the same capabilities are becoming available on mobile handsets. Communication is much more continuous, increasingly available even in aircraft, where smaller handsets are more convenient even for text-based processes in cramped seating.

These three threads together — ubiquitous availability, usable handsets and availability of the right applications — are realising the dream of the mobile office that is with you everywhere. Whether you are in a hotel, an internet café or your sister's house in the evening, your office will be with you.

This does not mean people will never be able to switch off though. It may sound paradoxical, but mobility actually will make it easier for people to enjoy quality leisure time with friends or family, without making themselves totally unavailable.

Unified communications from the likes of CommuniGate Systems ensures that all employees can manage their “presence” specifically, defining exactly when they are available to whom, and how they can be contacted. While reading to their children or going to a medical appointment, for example, executive staff can be unavailable to everyone except the CEO and even then only for urgent calls.

Other messages can be left in voice or email, with the option of generating alerts either at the time or afterwards.

Then for SMEs in particular the availability of useful and compelling applications for handsets is going to provide the tipping point for mobility, bringing together voice, messaging, and presence.

This trend is reflected in Apple's App Store environment within the iTunes store, which now has 10,000 applications that users can browse through and download to iPhones or the wifi-enabled iPod Touch portable media player.

This in turn is driving a change in usage patterns, with over a million AppStore downloads a month by late 2008. A more telling statistic is that 87% of iPhone 3G users now access the internet from the device, compared with just under 10% historical usage models of users of other 3G devices.

Indeed various other statistics from recent market research confirm that people are making much greater use of handsets for accessing data services and browsing the internet, sowing the seeds for the enterprise mobility revolution, although in truth it is

more of a rapid evolution that is just taking off than a sudden gearshift.

An important step, according to Strategy Analytics, is the anticipated collapse in cost of data browsing and roaming to flat rate packages. As Strategy Analytics' senior analyst for wireless media strategies, Nitesh Patel, recently pointed out, handset browsing has been popular in Japan and Korea for several years — but now the availability of low cost monthly browsing plans will enable western Europe and the US to catch up.

But translating such activities into greater enterprise usage brings another requirement that really comes halfway between the handset and the central application. This is the ability to create, deploy and access new applications readily without all the heavy lifting traditionally associated with enterprise application development, particularly on the client side.

Fortunately this piece of the mobility puzzle is also falling into place through two developments. Firstly the growing maturation and acceptance of Software as a Service are creating an environment where applications can be used on tap almost via a pay-as-you-go model if required.

Secondly, and just as importantly, the Adobe Flash Player is emerging as the client run-time system of choice for handsets, providing a secure and robust platform for deploying mobile applications without having to install any software manually on the client side.

CommuniGate Systems was quick to recognise the power of Flash and employ it in its Pronto! client, which is the first unified communications product for the desktop.

In Pronto! the company has combined the security of traditional enterprise clients with the intuitive interface, performance, and functionality that subscribers are coming to expect from access anywhere at anytime.

Amid all these developments it is easy to forget that voice remains a highly important component of mobility and enterprise messaging.

So much so in fact that a vital ingredient of true enterprise mobility is the ability to turn every handset into an extension of the PBX, with all the same functions wherever the employee happens to be in the world. CommuniGate Systems has achieved this with the MobiConnect fixed/mobile convergence platform, which mobilises the PBX.

MobiConnect turns a mobile handset into a mobile extension sharing all the PBX features. For example separate mobile calls can be joined together in a conference, and a user can have any number of calls active at any one time.

Furthermore voice calls can be diverted to voice mail or to colleagues on the fly.

The overall message then is that enterprises are ready to bring mobility into the heart of their applications and processes, as witnessed by the fact that productivity and flexibility are now cited as the top business benefits brought by portable devices.

CommuniGate Systems in turn is ready with the right platform to extend mobility across the enterprise, within a flexible and powerful unified communications framework — premise-based or delivered by its partners in a SaaS model. ■