The Economist

A world of connections

A special report on social networking

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A world of connections

Also in this section

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Online social networks are changing the way people communicate, work and play, and mostly for the better, says Martin Giles

THE annual meeting of the World Economic Forum in Davos, currently in progress, is famous for making connections among the global great and good. But when the delegates go home again, getting even a few of them together in a room becomes difficult. To allow the leaders to keep talking, the forum's organisers last year launched a pilot version of a secure online service where members can post mini-biographies and other information, and create links with other users to form collaborative working groups. Dubbed the World Electronic Community, or WELCOM, the forum's exclusive online network has only about 5,000 members.

But if any service deserves such a grand title it is surely Facebook, which celebrates its sixth birthday next month and is now the second most popular site on the internet after Google. The globe's largest online social network boasts over 350m users—which, were it a nation, would make Facebook the world's third most populous after China and India. That is not the only striking statistic associated with the business. Its users now post over 55m updates a day on the site and share more than 3.5 billion pieces of content with one another every week. As it has grown like Topsy, the site has also expanded way beyond its American roots: today some 70% of its audience is outside the United States.

Although Facebook is the world's biggest social network, there are a number of other globetrotting sites, such as MySpace, which concentrates on music and entertainment; LinkedIn, which targets career-minded professionals; and Twitter, a networking service that lets members send out short, 140-character messages called "tweets". All of these appear in a ranking of the world's most popular networks by total monthly web visits (see chart 1, next page), which also includes Orkut, a Google-owned service that is heavily used in India and Brazil, and QQ, which is big in China. On top of these there are other big national community sites such as Skyrock in France, VKontakte in Russia, and Cyworld in South Korea, as well as numerous smaller social networks that appeal to specific interests such as Muxlim, aimed at the world's Muslims, and ResearchGATE, which connects scientists and researchers.

Going public

All this shows just how far online communities have come. Until the mid-1990s they were largely ghettos for geeks who hid behind online aliases. Thanks to easy-to-use interfaces and fine-grained privacy controls, social networks have been transformed into vast public spaces where mil-

lions of people now feel comfortable using their real identities online. ComScore, a market-research firm, reckons that last October big social-networking sites received over 800m visitors. “The social networks’ greatest achievement has been to bring humanity into a place that was once cold and technological,” says Charlene Li of the Altimeter Group, a consulting firm.

Their other great achievement has been to turn themselves into superb tools for mass communication. Simply by updating a personal page on Facebook or sending out a tweet, users can let their network of friends—and sometimes the world—know what is happening in their lives. Moreover, they can send out videos, pictures and lots of other content with just a few clicks of a mouse. “This represents a dramatic and permanent upgrade in people’s ability to communicate with one another,” says Marc Andreessen, a Silicon Valley veteran who has invested in Facebook, Twitter and Ning, an American firm that hosts almost 2m social networks for clients.

And people are making copious use of that ability. Nielsen, a market-research firm, reckons that since February 2009 they have been spending more time on social-networking sites than on e-mail, and the lead is getting bigger. Measured by hours spent on them per social-network user, the most avid online networkers are in Australia, followed by those in Britain and Italy (see chart 2). Last October Americans spent just under six hours surfing social networks, almost three times as much as in the same month in 2007. And it isn’t just youngsters who are friending and poking one another—Facebook-speak for making connections and saying hi to your pals. People of all ages are joining the networks in ever greater numbers.

Social-networking sites’ impressive growth has attracted much attention because the sites have made people’s personal relationships more visible and quantifiable than ever before. They have also become important vehicles for news and channels of influence. Twitter regularly scores headlines with its real-time updates on events like the Mumbai terrorist attacks and on the activities of its high-profile users, who include rap stars, writers and royalty. And both Twitter and Facebook played a starring role in the online campaign strategy that helped sweep Barack Obama to victory in the presidential race.

Delivery time

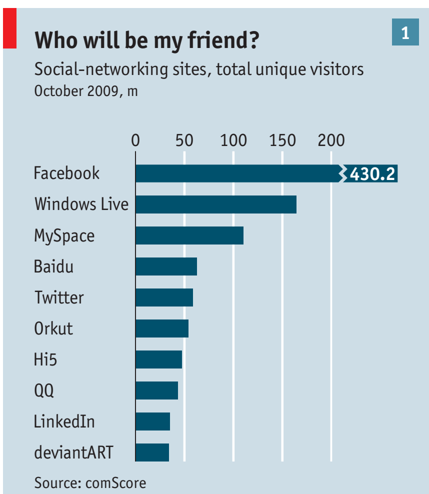
But like Mr Obama, social networks have also generated great expectations along the way on which they must now deliver. They need to prove to the world that they are here to stay. They must demonstrate that they are capable of generating the returns that justify the lofty valuations investors have given them. And they need to do all this while also reassuring users that their privacy will not be violated in the pursuit of profit.

In the business world there has also been much hype around something called “Enterprise 2.0”, a term coined to describe efforts to bring technologies such as social networks and blogs into the workplace. Fans claim that new social-networking offerings now being developed for the corporate world will create huge benefits for businesses. Among those being touted are services such as Yammer, which produces a corporate version of Twitter, and Chatter, a social-networking service that has been developed by Salesforce.com.

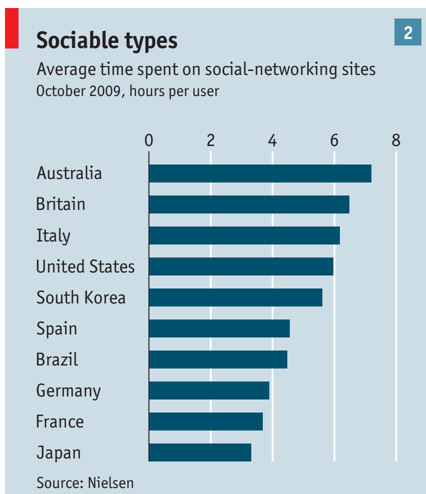
To sceptics all this talk of twittering, yammering and chattering smacks of another internet bubble in the making. They argue that even a huge social network such as Facebook will struggle to make money because fickle networkers will not stay in one place for long, pointing to the example of MySpace, which was once all the rage but has now become a shadow of its former self. Last year the site, which is owned by News Corp, installed a new boss and fired 45% of its staff as part of a plan to revive its fortunes. Critics also say that the networks’ advertising-driven business model is flawed.

Within companies there is plenty of doubt about the benefits of online social networking in the office. A survey of 1,400 chief information officers conducted last year by Robert Half Technology, a recruitment firm, found that only one-tenth of them gave employees full access to such networks during the day, and that many were blocking Facebook and Twitter altogether. The executives’ biggest concern was that social networking would lead to social notworking, with employees using the sites to chat with friends instead of doing their jobs. Some bosses also fretted that the sites would be used to leak sensitive corporate information.

This special report will examine these issues in detail. It will argue that social networks are more robust than their critics think, though not every site will prosper, and that social-networking technologies are creating considerable benefits for the businesses that embrace them, whatever their size. Lastly, it will contend that this is just the beginning of an exciting new era of global interconnectedness that will spread ideas and innovations around the world faster than ever before. ■



Who will be my friend?
Social-networking sites, total unique visitors
October 2009, m



Sociable types
Average time spent on social-networking sites
October 2009, hours per user

Global swap shops

Why social networks have grown so fast—and how Facebook has become so dominant

FACEBOOK has not only helped people to make zillions of new connections, it has also inspired a screenplay. A film called "The Social Network", due to be released later this year, will trace the site's meteoric rise from its foundation in 2004 to become king of the social-networking world. How have social networks managed to shoot to such prominence that they are already being given the Hollywood treatment?

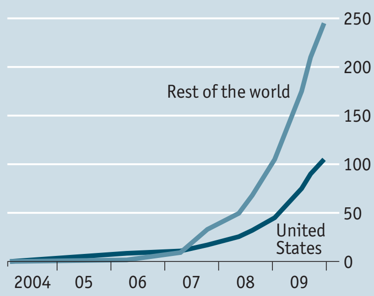
The most important reason for their phenomenal growth is something called the "network effect". Originally coined to describe the rapid spread of telephones, this states that the value of a communications network to its users rises exponentially with the number of people connected to it. This implies that the audience of a social network will grow slowly at first, then explode once it passes a certain point. Jeff Weiner, the chief executive of LinkedIn, which now has some 58m members, says it took the company 16 months to reach its first million users, whereas the most recent additional million came on board in only 11 days. Facebook has had a similar experience. It took almost five years to drum up its first 150m users, but just eight months to double that number (see chart 3).

The network effect has been amplified by the internet's global reach. Gina Bianchini, the boss of Ning, says that within two months of the firm's launch in 2005 people from 80 countries had signed up to networks that it had created on behalf of others. The Ning-hosted network of 50 Cent, a rapper, has 490,000 members the world over, from Australia to Zambia. Some firms have specially tailored their service to broaden its international appeal. Facebook, which is available in 70 different languages, offers Facebook Lite, a stripped-down version of its main site that is popular in countries without fast broadband connections.

All this has allowed social sites to grow quickly without having to spend a fortune on marketing. But it has also created a huge technical challenge. Most web businesses can add servers and databases in a fairly linear fashion as they acquire more users, but social networks find it almost impossible to gauge exactly how much computing power they will need because of the network effect. Some sites set up in the 1990s suffered a series of outages as they struggled to keep up with demand.

Facelift 3

Facebook, number of registered users, m



Source: Facebook

The latest crop of networks, most of which were launched five or six years ago, have benefited from a dramatic fall in the cost of hardware needed to store and process data. They have also been able to use free, open-source software to build systems that scale quickly and easily. And they have come up with some tailor-made solutions to cope with rapid growth.

Thanks for the memory

At Facebook, for example, the firm's software engineers built a system called Multi-Feed that searches databases near-instantly for relevant news from a person's friends. This has allowed the network to add many millions of new users without damaging its ability to provide a constant stream of up-to-date news to people's pages. In another feat of technical wizardry, its engineers have quintupled the performance of an open-source memory system called memcached, which allows frequently used data to be retrieved faster than if stored in a database.

Such creativity has enabled the networks to cope with a tsunami of data, many of which are being produced by another set of technologies that have also helped to drive the growth of social networking. Personal digital cameras and video recorders have greatly reduced the cost of producing high-quality images and made it easy to publish them online. Over 2.5 billion photos a month are uploaded to Facebook, making it one of the largest photo-sharing sites on the web. In Asia video content is hugely popular on services such as Cyworld.

One reason that people are willing to share so much private information on social networks is that many of the sites have developed detailed sets of privacy controls that let users decide what others can and cannot see. This process has had its hiccups. Facebook, for instance, got into hot water when in late 2007 it launched a service called Beacon that tracked users' purchases on some other websites and automatically alerted their friends to them. After a furious reaction from users, Beacon was first modified and then buried for good. Last year Facebook was named one of America's 20 most trusted companies on privacy issues by TRUSTe, an organisation that rates companies' online privacy policies—though there was another outcry in late 2009 when it modified its privacy policy yet again.

Another reason that the networks have become so popular is that there is so much to do on them, mostly because companies such as Facebook and MySpace have allowed independent developers to create programs, known as "apps", which run on their networks and tap into their treasure trove of customer data. These apps range from the inane to the inspiring. SuperPoke!, for example, lets people "spank", "grope" and "kiss" their Facebook friends online, whereas Causes enables them to create virtual groups to pursue charitable endeavours.

This division of labour pays dividends all round. Developers get access to the networks' huge audience, network users enjoy free access to thousands of clever apps and the networks acquire more users because the apps make their sites more addictive. Facebook now has over 1m developers creating software for it and its online directory contains over 500,000 apps. Twitter has spawned over 50,000 apps, including offerings from firms such as Twitpic, which lets people post photos to their Twitter feeds, and Twitscoop, which highlights popular topics being talked about on ▸▸

the service at any moment.

That leaves the networks free to concentrate on innovations that encourage even more sharing. The most striking of these is Facebook Connect, which the company launched just over a year ago. Mark Zuckerberg, the company's founder, describes this as "inverting the model" of social networking. Instead of being obliged to come to Facebook's website, users can take their Facebook identity and network of friends to other websites and to devices such as game consoles. This means they no longer have to create a new online group of friends each time they visit a different destination on the web.

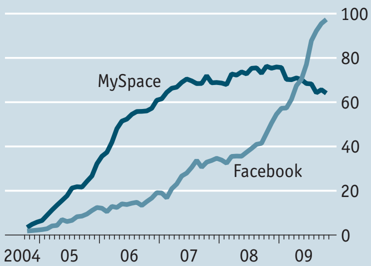
The way it works is that Facebook's partner firms install Connect buttons on their websites and devices which give Facebook users automatic access to information about their friends' activities. At HuffPo Social News, a site run by the Huffington Post, a well-known American blog, Facebook users can see what their friends have been reading and exchange stories and comments with them. At Netflix, which hires out DVDs and Blu-ray discs by post, they can see which films their friends have watched and what other people have written about them. Facebook says there are now some 80,000 Connect-enabled websites and devices, such as Microsoft's Xbox console.

Connect is just the latest in a long line of innovations that have helped to turn Facebook into the dominant global social network. It also reflects the scale of Mr Zuckerberg's ambition. "For the social web, I think the killer app is Facebook," he says. His goal is to connect as much of the world's population as possible via the network and then to get its users to use it as their main doorway to the internet. He is so keen to realise his vision that he is said to have turned down offers to buy the company which would have made him an instant billionaire.

MySpace invader 4

Social-networking sites

Unique visitors in America, m



Source: comScore

Mr Zuckerberg also wants Facebook to map out as much as possible of what people in the social-networking industry refer to as the "social graph", a fancy name for a model of nodes and links in which nodes are people and the links between them represent friendships. He thinks that the relationships between people and objects such as their office buildings, schools and other things can be represented in the same way. The more people that join Facebook, the greater the insights the business will have into the nature of these relationships. And the more it knows about what matters to people, the better it should be at profiting from that knowledge.

Some people think that Facebook's network effect is now so great that it will be impossible to knock it off its pedestal as the world's largest online meeting place.

"It's basically Facebook's to lose", says Mark Pincus, the chief executive of Zynga, a social-gaming firm that develops apps to run on the service.

Not so long ago, exactly the same thing might have been said of MySpace. The site was riding high when News Corp bought it for $580m in 2005. But a few years later it was going downhill (see chart 4). Some see this as a sign that large social networks are destined to disintegrate when they become too big. But there was nothing inevitable about MySpace's decline: the site simply made a series of strategic mistakes. Faced with demanding revenue targets from News Corp, it neglected its technology and added new features such as job listings and horoscopes that drove web traffic but had nothing to do with its core users' interest in music, film and other entertainment. As the site became more cluttered than a teenager's bedroom, some of those users logged off for good. MySpace's share of the American social-networking market fell from 67% in September 2008 to 30% in the same month of last year, according to Hitwise, a research firm.

Network defects

Owen Van Natta, the network's new boss, has already got rid of many of the products that were added and brought in a new management team. MySpace is also cleaning up its pages and developing tools that will let its 100m users search its huge range of content more efficiently. And it has stopped pursuing Facebook to concentrate on a strategy that Mr Van Natta describes as "offering people the ability to engage in content and socialise at the same time".

The idea is that people with, say, similar tastes in music will connect with one another on MySpace and then swap other material too. Last year the firm bought iLike, which allows users to share playlists, and Imeem, a music-streaming service. Its new focus, Mr Van Natta insists, will allow MySpace to rise Phoenix-like from the mess in which he found it. But the—admittedly brief—history of social networking suggests that once a network effect has gone into reverse it rarely returns to form.

Facebook, for its part, is unlikely to make the same strategic mistakes as MySpace because it pays much more attention to the plumbing that connects people with each other than to the content that flows through it. "The people at Facebook are essentially utilitarians," explains Matt Cohler, a former employee who is now a partner at Benchmark Capital, a venture-capital firm. "They want to give people the ▸▸

very best technology for sharing and then get out of their way." That technology is so good that people are willing to stick around on the site as it grows, rather than abandoning it for something edgier.

Another reason for optimism is the firm's hacker-type culture which has produced the innovations that have made the service so addictive. Mike Schroepfer, Facebook's head of engineering, says that one of its mottos is "move fast and break stuff". What matters is getting fresh products out to users quickly, even if they do not always work as intended.

To help generate new ideas, the firm holds all-night "hackathons" at which engineers work on their pet projects, fuelled by Chinese takeaways and energy drinks. It also gives its people plenty of freedom to try out their ideas on Facebook's site. Mr Schroepfer is particularly proud of the fact that the company has only one engineer for every 1.2m users.

It is always possible that a better plumber could turn up, which explains why Facebook's bosses are so wary of potential competitors. The network has been watching Twitter closely and even tried to buy it, but was rebuffed. Despite their differences, both firms are powerful communication tools that compete for people's attention (see box). They also have something else in common: an enormous price tag. Last year Twitter raised a round of venture capital that valued the company at $1 billion, even though it had yet to turn a profit. And an investment in the preference shares of Facebook by a Russian company valued it at $10 billion. Such astronomical sums are a sign that investors think the best social networks will become big money-spinners. ■

Twitter's transmitters

The magic of 140 characters

BIZ STONE, one of Twitter's co-founders, uses the term "social alchemy" to describe the way in which short, seemingly inconsequential 140-character messages are often transformed into something of real value. Imagine, he says, that you are having a drink at an airport bar waiting to catch your flight. You send out a tweet explaining where you are and what you are drinking. Perhaps you get no response. But it is also possible that a friend who is "following" you on Twitter happens to be in the airport at the same time, sees your tweet and comes over to say hello. Thus what would otherwise have been a solitary moment is magically transformed into a pleasant encounter.

Such serendipity helped Twitter attract 58m web visitors in October last year, according to comScore. Recently its growth appears to have faltered in America, but the service is still expanding in countries such as Japan and Germany. This has led to speculation that it could eventually make a dent in Facebook's fortunes, even though size-wise it is not in the same league. Those who see a looming clash note that both companies are in the business of helping people to share information, and both have a real-time element to their services.

That is true, but the services differ in two important respects. The first is the nature of the relationships that underlie them. On Facebook, users can communicate directly only if one of them has agreed to be a "friend" of the other. On Twitter, people can sign up to follow any public tweets they like. The service, which boasts Ashton Kutcher (4.3m followers) and Oprah Winfrey (3m) among its most popular users, is in essence a broadcasting system that lets users transmit short bursts of information to lots of strangers as well as to their pals. Facebook, for its part, is more of an intimate, continuing conversation between friends.

This difference is revealed in research conducted by Mikolaj Jan Piskorski, a professor at Harvard Business School, and one of his MBA students, Bill Heil. They surveyed just over 300,000 Twitter users in May 2009 and found that more than half of them tweeted less than once every 74 days. They also discovered that the most prolific 10% of twitterers accounted for 90% of all tweets. On other online social networks the most active users typically produce just 30% of all content. Another survey published in June by Sysomos, a research firm that had analysed 11.5m Twitter accounts, found that one in five people that were signed up to the service had never posted anything.

Another big difference between Twitter and Facebook is in the kind of content that gets sent over their networks. Facebook allows people to exchange videos, photos and other material, whereas Twitter is part-blog, part e-mail. "There's a real difference here between the power of multimedia and the power of text," says Dom Sagolla, the author of a book about the art of twittering.

Even so, there are some tensions between the two services. Last year, after its takeover talks with Twitter stalled, Facebook introduced several Twitter-like changes to make it more attractive for real-time postings. It also gave more visibility to its pages for athletes, celebrities and musicians and lifted the limits on the maximum number of fans that they could have on the site.

Still, Mr Stone says he sees Twitter as more akin to an outfit like Google than to Facebook. He describes the business as "an information company" whose users are keen to find out answers to what is happening in the world. The billions of tweets that Twitter is gathering up could certainly be the basis for a vast, searchable archive. The challenge facing Mr Stone and his colleagues is to find smart ways of transforming those raw data into profits.

Profiting from friendship

Social networks have a better chance of making money than their critics think

ENTREPRENEURS in Silicon Valley, only half-jokingly, call it the URL strategy. The three letters usually stand for Uniform Resource Locator—the unique address of any file that is accessible via the internet. But in the world of internet start-ups, URL has another meaning: Ubiquity first, Revenue Later. This pretty much describes the strategy of most big online social networks, which over the past few years have concentrated on piling on users rather than worrying about profits. That has allowed them to build huge followings, but it has also raised a big question-mark over their ability to make money from the audiences they have put together.

At issue is whether the social-networking industry can come up with a wildly successful form of advertising that propels it to stardom in the same way that Google has been able to make billions of dollars from the targeted ads that run alongside the search results it serves up. Without such a formula, runs the argument, social networks such as Facebook will never amount to much.

Doubters claim that the networks face two big handicaps. The first is that people logged into social-networking sites are there to hang out with their friends, so they will pay no attention to ads. The second is that because the sites let users generate their own content, they will find it hard to attract advertisers because brands will not want to take the risk of appearing alongside examples of profanity, obscenity or nudity—or all three at once.

Elusive click-throughs

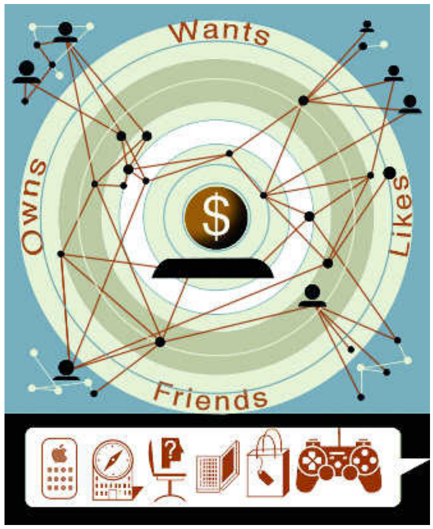
The sceptics have some evidence on their side. Click-through rates on display ads at sites such as Facebook are a small fraction of those that Google commands for its highly targeted search ads. And although marketers love to promote their brands via their own (free) pages on social sites, some are wary of buying ads on them because of those abysmal click-through rates. "We spend the majority of our time engaging with people on these networks, not advertising on them," says Scott Monty, the head of Ford's social-media activities. Although user numbers were sharply up last year, the social-networking industry's revenues in America, its biggest advertising market, rose only by a modest 4% to $1.2 billion, says eMarketer, a market-research firm.

That was still an achievement, because the total online advertising market shrank in 2009. The picture would have been even brighter without MySpace, whose revenues are thought to have fallen last year. Another drop seems likely this year when a deal that MySpace struck with Google to handle search advertising on its site comes up for renewal. Assuming a new agreement can be reached, it will probably be less generous than the old one, which offered MySpace $900m over three years if it hit certain minimum traffic targets.

The broader outlook for networking sites is more encouraging. This year eMarketer expects revenues to grow by over 7% in spite of MySpace's predicament. ComScore, another market-research firm, has found that one in five display ads viewed by American web users last June ran on social-networking sites, with MySpace still accounting for the biggest chunk of the total. Another study in Britain last August came up with a similar proportion, with telecoms companies and retailers providing a big chunk of the business.

Why are the networks becoming more popular when their click-through rates are so low? One reason is that advertisers are being drawn to the leading sites by their sheer scale. "Facebook's audience is bigger than any TV network that has ever existed on the face of the earth," says Randall Rothenberg, the head of the Interactive Advertising Bureau (IAB). Another thing that has attracted companies is the networks' ability to target ads with laser-like precision, thanks to the data they hold on their users' ages, gender, interests and so forth. Although there are still lingering concerns about brands appearing next to racy content, firms seem more willing to run this risk now that the networks' advertising proposition has become more compelling.

The other reason more money is heading the networks' way is that some advertisers are seeing a great return on their investment. Michael Lynton, the boss of Sony Pictures Entertainment, a film studio, says he was deeply sceptical about using social-networking sites for advertising. Indeed, Mr Lynton is famous for having once declared that nothing good had ever come from the internet, which was a jab at online piracy of film studios' content.



But something good did come from an online experiment that Sony conducted last summer. The studio ran a series of ads on Facebook promoting three of its films after they had just featured in a traditional television campaign. "District 9" was aimed at young men, "Julie & Julia" at middle-aged women and "The Ugly Truth" at younger women. Awareness of the films was measured after the TV ads had run and then again after the web ads had run. Each time the online ads significantly boosted awareness. Mr Lynton says he is now convinced that social networks are radically altering the marketing landscape.

Rock, baby

Another firm that has become convinced of that is Toyota, which last year worked with MySpace to create a competition called "Rock the Space" in which bands were invited to send in demo tapes of their music. Some 18,000 entries were received and MySpace's users voted for the best tape, with a record contract as the prize for the winning band. Doug Frisbie, who oversees social-media marketing for Toyota's American operations, says the promotion exceeded the company's hopes for brand ▸▸

promotion "by a factor of several times."

Both firms' experience suggests that people using social networks are more likely to engage with brands than sceptics think. Mr Lynton also reckons that the networks produce a powerful viral marketing effect because friends use them to tell one another about things they have discovered. Marketers have long known that such recommendations are hugely important in purchase decisions (see chart 5). Social networks are harnessing technology to accelerate this process by, for example, automatically alerting a person's friends when he or she signs up to become the fan of a particular brand or product on a site.

The big question is whether all this will translate into an advertising bonanza. "There is a pretty strong argument to be made that social networks are worth more than they are being given credit for," says Andrew Lipsman, an analyst at comScore. But he cautions that the advertising industry may be slow to recognise the shift that is taking place. In a bid to speed things up, Facebook has struck an alliance with Nielsen to create a series of benchmarks for measuring the impact of social-network advertising on brands. Sheryl Sandberg, Facebook's chief operating officer, says this will allow companies to get feedback on the effectiveness of their campaigns much faster than before.

Facebook has also been experimenting with new kinds of ads designed to draw people in, including some with embedded online polls or videos to which comments can be added. So far it has not come up with a killer format, but that does not seem to be holding it back. The company does not reveal numbers, but its revenues last year are thought to have been at least $500m and quite possibly more, which helped it to turn cash-flow positive in mid-2009. Against the backdrop of a world economy in recession and a dire advertising market, that is quite an achievement. It also suggests that Facebook can do well using a variety of different ad formats rather than a single, winning one. "There doesn't have to be one enormous, oh my God hit," says the IAB's Mr Rothenberg.

Fun and gains

Nor does there have to be just one advertising-driven business model. In Asia several firms such as Japan's GREE and China's Tencent, which owns QQ, a service that includes a big online social network, are already making healthy profits from sales of games and virtual goods. In 2008 Tencent, which is listed on the Hong Kong Stock Exchange, reported revenues of just over $1 billion, with $720m coming from online gaming and sales of items such as digital swords and other virtual goods. Many Asian networks such as South Korea's Cyworld and Japan's Mixi also mint money by selling users custom backgrounds and other paraphernalia that allow them to personalise their network pages.

Inspired by this, firms elsewhere are embracing elements of the Asian model. Hi5, which is based in America and has 60m members around the world, has launched a number of games on its platform and created its own virtual currency, called Hi5 coins, for use in them. Alex St John, the firm's chief technology officer, says that gaming and advertising can easily be combined by, for instance, persuading an advertiser to sponsor a currency used by players.

Ning is targeting gifts rather than games. In October it launched an initiative that allows people who have set up networks on its system to sell customised digital items to their members. These cost anything from 50 cents to $10, and over 400,000 of them are now being exchanged every month, with Ning splitting the profit equally with its customers. This will add to the revenues that it makes from ad sales and network-management fees. Even Facebook, with its focus on advertising, has a virtual warehouse of birthday cakes, champagne bottles and other goodies.

The beauty of this business for social networks is that the cost of producing and storing virtual inventory is minimal. Moreover, because these are closed markets, networks can fix prices at levels that generate fat margins. To some, the notion that big money can be made from selling make-believe items may seem bizarre. But the practice replicates the physical presents that people give to one another to cement relationships in the real world. Although Asia remains by far the biggest market for digital knick-knacks, Inside Network, a research firm, has estimated that sales of virtual wares in America on many different kinds of websites reached $1 billion last year and could grow to $1.6 billion in 2010.

In friends we trust 5

Global consumer trust in advertising, Q1 2009

% of respondents

Source: Nielsen

Plain or de luxe?

Another business model that has proved lucrative involves charging users for premium services. The networks that have been best at this have been the business-oriented kind. LinkedIn, for example, provides a free basic service, but asks users to pay a monthly subscription fee of up to $500 for extras, such as being able to send a larger number of introductory e-mails to other people on the site. The firm, which is said to have revenues of over $100m a year, also makes money by charging companies for online tools that help them track down talent. This "freemium" model plus a healthy dose of advertising from big brands aiming to reach its affluent audience has helped the network to turn a profit for several years running.

Social networks have also benefited from search engines' desire to get their hands on more content. Twitter signed lucrative deals with Google and Microsoft's Bing search service in October that allow both companies to include tweets from Twitter's database in their search results. Thanks to these transactions the network is rumoured to have made a small profit last year, though it will not confirm this.

This year it plans to start making more money in two ways. The first involves charging firms for services such as tools for analysing discussions on Twitter and for authenticated accounts that let people know tweets they are receiving come from a genuine business. It is also hoping to profit from advertising by serving up targeted ads in the way Google does. Biz Stone, one of the firm's co-founders, reckons that Twitter's fans will be receptive to these because they already use the service to seek out information from others. They regularly share links to commercial sites and one survey last year found that as people twittered, they mentioned specific brands or products in 20% of their updates. That explains why Twitter and other social networks have caught the attention of millions of small businesses, as well as thousands of big ones. ■

A peach of an opportunity

Small businesses are using networks to become bigger

"THEY first peaches of the season are here. Come and get your peach pie @10am." Simple tweets like that have helped Mission Pie, a small shop in San Francisco, drum up interest in its mouth-watering array of sweet and savoury pies. As well as twittering about its wares, the store also alerts customers to poetry readings and other events it organises. Krystin Rubin, a co-owner of Mission Pie, says the business had just 150 or so followers for a while after one of its bakers started sending out tweets almost a year ago. Then that number suddenly shot up to over 1,000. Over the past few months business has been very brisk and Ms Rubin reckons Twitter deserves part of the credit. "It has a sort of street credibility that's not there with traditional media," she says.

Other companies have discovered the same thing. Kogi BBQ, which has several trucks serving Korean food in Los Angeles, now has over 52,000 followers on Twitter and uses the service to tell customers where they can find its vans each day. Sprinkles, a cupcake bakery with stores all over America and nearly 94,000 fans of its Facebook page, posts a password to that page each day which can be redeemed for a free cake by a certain number of visitors to its shops. Such offers can attract a lot of attention. A survey of 1,000 heavy users of social networks and other digital media conducted in August 2009 by Razorfish, an advertising agency, found that 44% of those following brands on Twitter said they did so because of the exclusive deals the firms offered to users.

As Kogi BBQ and Sprinkles show, social networks are arguably having an even greater impact on small businesses than on the big league. By giving entrepreneurs free access to their audience, services such as Twitter and Facebook are putting corporate tiddlers on a par with behemoths such as Starbucks and Dell when it comes to broadcasting messages to a mass market. They have also created what Steve Hasker of Nielsen calls "the world's biggest, fastest and most dynamic focus groups", which can be a boon to entrepreneurs without fat research budgets.

Some small businesses are already using social networks to generate new ideas. After spending time on Twitter, employees at Cordarounds.com, a small American clothing company, noticed that many folk twittering in their area were using bicycles to get to work. So the firm produced a new line of trousers, dubbed "bike-to-work pants", with built-in reflective materials that make wearers more visible to traffic while cycling at night. And of course it used tweets to get the word out about its new creations.

"Follow me on Twitter" signs are appearing on the doors and windows of small businesses in other countries too. A survey last year by O_2, a mobile-phone operator, found that some 17% of Britain's small businesses were using Twitter. Many of the firms that responded said they were doing this to attract new customers. Some reckoned they had been able to save up to £5,000 (over $8,000) a year by cutting out other forms of marketing in favour of the networking service.

Charging for batteries

The connections made possible by social networks are helping to create new businesses as well as promote existing ones. When Henk van Ess, a Dutch technology consultant, posted a complaint about the short lifespan of his iPhone's battery on LinkedIn a couple of years ago, one respondent suggested that he contact China BAK Battery, which produces a small, plug-in battery for the iPhone. Impressed with the product, Mr Van Ess told members of his online network about it and was soon handling orders for them. After a while he formed his own company, 3GJUICE, to produce a plug-in unit for the iPhone that incorporates the Chinese firm's battery.

Mr Van Ess's firm is tiny, but social networks such as Facebook and MySpace have also served as launching pads for much bigger outfits. Among the largest of these are companies such as Zynga, Playfish and Playdom, whose popular online games run on the big networks' platforms. Some of these games, such as Zynga's "FarmVille", have attracted millions of players and produced mountains of money for their creators. Zynga says it has been profitable almost since it opened in 2007, and last month the business attracted an investment of $180m from a bunch of prominent financiers convinced of its potential. Many of the social-games companies are on a hiring binge, creating hundreds of new jobs at a time when the economy around them is in the doldrums. Their experience provides an insight into how social networks can help propel small businesses to much bigger things.

Like most games, the ones produced by Zynga and its peers appeal to people's natural competitive instincts. Leader boards and a host of other features allow players to show off their status within a game to their friends. But the games also encourage lots of co-operation among players, who can build rapport by, say, sending virtual gifts to each other or handing virtual currency to new players when they join a game. "The best virtual goods have real ▸▸

currency," says Mark Pincus, Zynga's boss. He reckons that the games have become so popular because they combine fun with the various ways to strengthen relationships that Facebook and other networks have brought online.

Better than the real thing

Social games have also become extraordinarily popular because they cleverly exploit those relationships. Once someone has signed up for, say, "Mafia Wars", another Zynga invention, they are urged to invite their friends to join too. And players' gruesome successes in such games are regularly posted to their personal page on Facebook, which can be seen by all of their friends. Thanks to such wheezes, online games benefit from a powerful network effect. "Café World", which gives users the opportunity to run their own virtual restaurant, launched on Facebook at the end of September and within a week had attracted a mind-boggling 10m players.

This astonishing growth has been helped by the fact that social games are free to play. The companies make their money by selling digital goods in the games, by carrying advertising and by getting players to sign up for marketing promotions. Surprising though this may seem to some, virtual goods such as swords, tractors and even digital boyfriends are much in demand. After users of its "Sorority Life" game complained in an online forum that the game lacked virtual men they could date, Playdom quickly introduced some last November. Over 10m of the boyfriends were promptly snapped up, with a few players buying as many as 500 each. Some paid for their digital darlings with virtual credits won in the game, but others stumped up over $5 a time for their beaux.

The rise of the social-gaming firms has not been without controversy. Last year Zynga came under fire from TechCrunch, a Silicon Valley blog, for allowing misleading marketing offers to run on its site. The firm subsequently removed them. But such hiccups have not dented interest in social gaming: last November Playfish was snapped up by Electronic Arts, a big video-game publisher that thinks the business is going to be huge. It may well be right. ThinkEquity, an investment bank, reckons that revenues in America from social games could hit $2.2 billion by 2012, a big leap from last year's $375m.

Admittedly this is an extreme example of the benefits social networks can bring to small businesses. Rewards for outfits such as Mission Pie will be far more modest. But if they were added up across an entire economy, they could have a significant effect on growth. What a pity, then, that many small firms are reluctant to take the plunge into the social-networking world. A survey of 500 small businesses in America conducted by Citibank last October found that most of them had not used online networks at all because they thought they would be a waste of time. ■

Yammering away at the office

A distraction or a bonus?

AN ASTONISHING amount of time is being wasted on investigating the amount of time being wasted on social networks. Studies regularly claim that the use of Twitter, Facebook and other such services poses a threat to corporate wealth. One published last year by Morse, an IT company, estimated that personal use of social networks during the working day was costing the British economy almost £1.4 billion ($2.3 billion) a year in lost productivity. Another, by Nucleus Research, an American firm, concluded that if companies banned employees from using Facebook while at work, their productivity would improve by 1.5%.

This assumes that people would actually work rather than find some other way to pass the time they have to spare. In the same vein, perhaps companies should also ban water coolers and prohibit people sending e-mails to their friends. The assumption that firms can block access to the networks altogether is also rather heroic. Some employees now have web-enabled smart phones, so trying to stop them from surfing their favourite sites will be another waste of time.

To veterans of the technology industry, the fuss over social networking sounds all too familiar. Whenever a new and disruptive technology appears, there is initially a backlash against it before it becomes broadly accepted. Even a seemingly innocent application such as Microsoft's Excel spreadsheet was greeted with much scepticism because managers assumed workers would use it to make lists of their fantasy football teams or their weekend shopping—which is exactly what they did and still do. But along the way, Excel has also become an invaluable business tool.

Social networks were not designed for businesses as Excel was. Instead they are part of a growing trend known as the "consumerisation" of IT. Thanks to companies such as Apple, Google and Facebook, people now have access to communications devices and web applications that are often far superior to those offered by their employers. And thanks to cloud computing, which allows all sorts of computing services to be delivered via the internet, they can use these devices and applications pretty much wherever they like, including in offices and factories. This trend is accelerating as more digitally savvy youngsters enter the workforce with their iPhones at the ready.

Moreover, as people become increasingly used to sharing and collaborating outside the workplace, they are coming to expect firms to be more open and collaborative places too. Many companies are organised into strictly separate regional, product-line and functional "silos", making it hard for people to share information beyond their immediate colleagues. And the rise of vast, globe-spanning corporate empires with hundreds of thousands of employees has left many folk isolated in small work groups run by managers who care only about their particular fiefs. As a result, efforts are duplicated and valuable information ends up being hoarded, not shared.

I spy A-Space

In the corporate world such hoarding leads to lost profits. In the world of intelligence it can lead to lost lives. The recent unsuccessful attempt by a terrorist to blow up an American aircraft in flight has highlighted the need for better information-sharing among security agencies. To improve matters, the intelligence community is developing a system called A-Space, a sort of Facebook for spies that holds profiles of

Social contracts

The smart way to hire workers

WHEN it comes to online networking, cyberspace often mimics the real world. There are networks such as Facebook and MySpace that are mainly for socialising with friends, and there are others such as LinkedIn, France's Viadeo and Germany's Xing that concentrate on work-related matters. The sites aimed at professionals, although much smaller than the ones for hanging out with friends, are already having a big effect on labour markets.

In many ways the world of commerce is a perfect place for a social network to flourish. Doing business, after all, boils down to managing a complex web of relationships with customers, suppliers and others. Professional networks make it easier for people to maintain such relationships and to forge new ones. LinkedIn, for instance, has over 500,000 groups—some better than others—on specialised subjects that people can join to share ideas and make new contacts.

Such connections may prove useful later on: research has shown that the more distant members of people's networks are often the best source of new job leads. Job-hunters can also use their networks to gather intelligence about prospective employers and to solicit recommendations that strengthen their candidacies, and they can benefit from some of the career tools that networks provide. LinkedIn, for example, is developing a service that aggregates data it holds to show career paths for certain professions. So someone who wants to become, say, head of software engineering at a large company in ten years' time can see what sort of jobs have led on to such roles for others.

Online networks have attracted plenty of attention from corporate recruiters too. Olivier Fecherolle, the head of Viadeo's French operations, says that for an employer the networks have several advantages over online job boards. One is that people visit them frequently, so profiles on the sites tend to be more up-to-date than those on job boards. Another benefit, he says, is that the networks' rich profiles help recruiters get a good feel for a candidate without having to delve into a detailed curriculum vitae.

Bargain hunting

But perhaps the biggest attraction is that the networks help firms to cut search costs. Don Cooper, a recruiter at Intel, reckons that the chipmaker saves millions of dollars a year in fees by recruiting senior managers through LinkedIn rather than using headhunters. US Cellular, a telecoms company, says it saved over $1m last year by using a LinkedIn system that produced good candidates for its jobs faster than traditional recruitment channels.

Mr Piskorski of the Harvard Business School thinks professional networks have been so successful because they offer a way for people to participate passively in the job market yet still claim plausibly that they are seeking out information to do their current job better. Companies put up with this, he says, because the benefit they get from better-informed workers more than offsets the cost of losing them if they are poached.

All this makes labour markets more efficient. By cutting out middlemen such as headhunters, firms save money. And by looking at rich online profiles of candidates, they can cut the time it takes to get the right people into jobs. Network users, for their part, get what Reid Hoffman, LinkedIn's chairman, calls an "active sonar" system that publicises their skills to a broad marketplace with minimal effort and collects the responses that ping back.

Social networks have made the labour market more transparent in another way too. A survey by CareerBuilder.com of about 2,700 executives in America last year found that 45% of them looked at job candidates' social-network pages as part of their research, and more than a third of those had unearthed information there that put them off hiring someone. Time to turn up those privacy settings?

analysts from various agencies and allows them to contact one another and to share large amounts of text, graphics, images and videos.

Before a pilot of the system was launched in 2008 it often took weeks, sometimes months, for spooks to track down relevant people to talk to at other agencies. "The intelligence community was a bunch of stove pipes," says Ahmad Ishaq, A-Space's project manager. Now the 14,000 people with access to the secure system can easily and quickly get in touch with each other.

Social networks are being used to break down internal barriers in the corporate world too. A few companies, such as Zappos, an online retailer owned by Amazon, encourage employees to use public networks such as Twitter to share information. The argument for using a system that allows the world to see what a firm's employees are up to is that it helps make faceless corporations seem more human in the eyes of their customers. Networks such as Twitter are also free and very easy to use, which means people adopt them quickly.

But most companies are deeply uncomfortable with the notion of baring all to such a wide public. Among other things, they fret that employees might let slip confidential data, that competitors will be alerted to forthcoming innovations and that the public networks will be hard to integrate with their internal IT systems. Firms in highly regulated industries such as pharmaceuticals and banking are especially wary of allowing information from their staff to circulate freely.

This has generated interest in Enterprise 2.0 networks tailor-made for the corporate world. These work in much the same way as a Twitter or a Facebook, but keep information off the public web and behind a corporate firewall. They have several other advantages too. Many automatically pull information from companies' human-resources systems into people's profiles. Services such as IBM's Lotus Connections and Salesforce.com's Chatter can also be easily integrated with other IT tools that workers use, so they are more likely to be adopted than public networks.

These corporate "Facebooks" can also be tweaked to fit firms' specific needs. Nicolas Rolland, who is helping to bring in an online social network for the almost

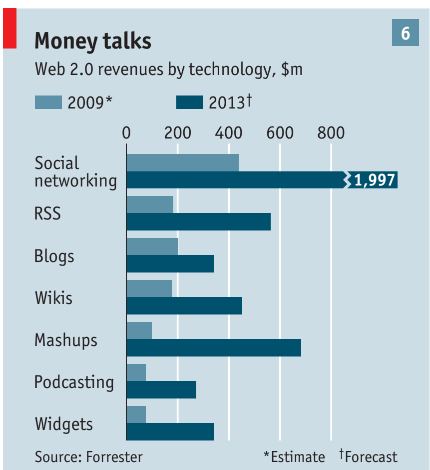
90,000 employees of Danone, a global food group based in France, says that the company added invitation-only private discussion groups after getting requests from staff who wanted to share confidential information. Danone, whose workers are spread across more than 100 countries, is testing its network in several locations before making it more widely available.

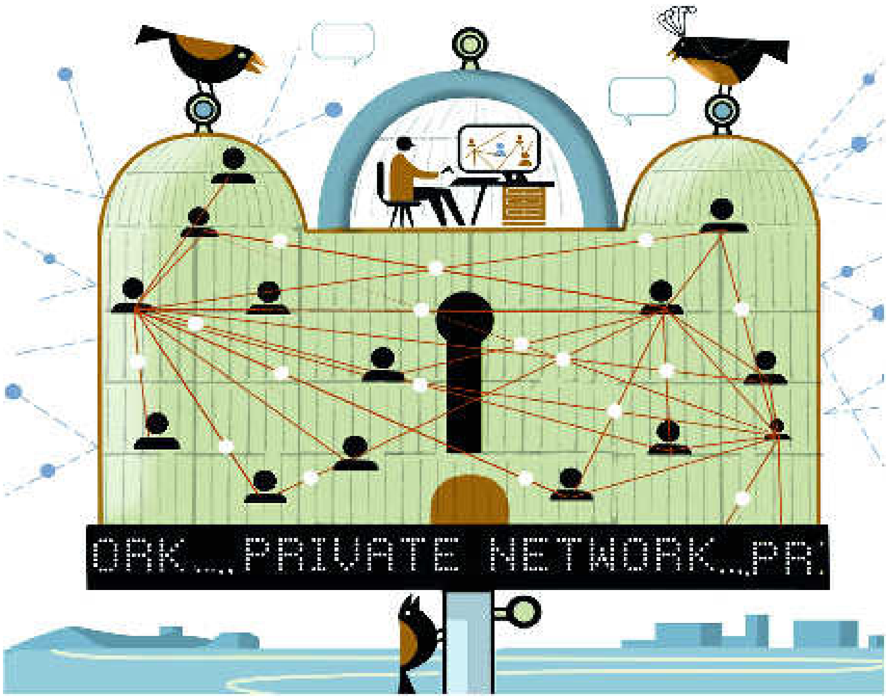
Goodbye to silos

Although these are early days, companies say such network initiatives are already speeding up knowledge-sharing and internal communications. Samuel Driessen, who is overseeing the introduction of Yammer at Océ, a large printer company based in the Netherlands, says the messaging system has helped the firm spot where work is in danger of being duplicated and share information about sales prospects. Danone's Mr Rolland reckons its system has already led to smart operating practices being shared more efficiently.

Marc Benioff, the chief executive of Salesforce.com, predicts that demand for corporate social-networking services will take off as managers realise that they now know more about strangers on Twitter and Facebook than they do about the people in their own organisation. Some analysts agree with him (see chart 6). Mr Benioff even thinks social computing could be the next big business for the IT industry after cloud computing. Perhaps so, but social networks must clear several hurdles before they can enter the corporate mainstream.

The first of these is the lingering doubt about networks' ability to deliver genuine benefits. "The biggest challenge most companies are facing is that the value propositions for social networks are all soft," explains Greg Lowe, who champions the use





of Yammer and other social media at Alcatel-Lucent, a Franco-American telecoms firm. Yet there are grounds for thinking the benefits they create are worth having. A study last year by IDC, a research firm, found that knowledge workers spend between six and ten hours a week hunting for information. By using social networks to find data faster, employees can free up a chunk of that time for other things, says Caroline Dangson, an analyst at the firm.

Yet even if they can make a good business case for a network, some managers hesitate to introduce one because they fear that staff might use it to broadcast politically incorrect comments. Andrew McAfee, a professor at MIT who has seen many corporate networks in action, thinks that this concern is overblown. "I find it hard to believe that employees were waiting for social networks to come around to be able to post something inappropriate," he scoffs. He points out that because all comments can be traced to their authors, people are very careful about what they post.

A flowering of ideas

A third hurdle is that bosses are worried about allowing informal groups of workers to spring up that managers cannot control. Yet this is precisely why the systems are so valuable. Often new ideas and insights—as well as warnings about potential threats—come from informal contacts rather than from formal meetings. The trouble is that existing IT systems are geared towards reinforcing separate silos rather than building bridges between them.

Services such as Yammer and Chatter create a more open workplace by letting people see what others are working on and encouraging sharing. The upshot is that good ideas can emerge from anywhere. This should be a reason for celebration rather than a cause for suspicion. "If you trust your employees, then you have nothing to worry about when deploying a social network," says Eugene Lee, the chief executive of Socialtext, which provides social-media services to firms.

The networks are also a great way to capture knowledge and identify experts on different subjects within an organisation. Mr Driessen at Océ says that many earlier knowledge-management systems were little more than boring collections of documents. Social networks are a huge improvement over them because they combine content with commentary from people whose know-how might previously not have been recognised. Suzanne Livingston, the head of IBM's social-software operations, says that firms can even create new, jointly owned social networks or splice existing ones together to share know-how with outsiders.

Some executives see another big benefit of networking. A few of the systems on offer have analytical tools built into them that let managers track information such as which people are regularly in contact with one another and what subjects they are discussing. This "social business intelligence" can then be used to, for example, identify people for a project team based on their expertise and their links to others whose support will be needed to make the project a success. But the data could also be used to make judgments about candidates for a promotion or to spy on colleagues. All this makes some people queasy. What happens with personal data is a big issue not just within companies but for the big public networks too. ■

Privacy 2.0

Give a little, take a little

IF THERE is one thing that could halt the ascent of social networks, it is the vexed question of privacy. This is controversial because it goes right to the heart of the social-networking business model. In order to attract users, sites need to offer ways for members to restrict the information about themselves that gets shared with a wider public. Without effective controls people would be reluctant to sign up. But if a site allows members to keep too much of their information private, there will be less traffic that can be turned into profit through advertising and various other means, so the network's business will suffer.

"There is a tension here because these networking sites are based on the idea that people will share information about themselves," says Amanda Lenhart of the Pew Institute for the Internet & American Life, a non-profit research group. "If people stop swapping content then the sites will fade away." There is some evidence that people are starting to become more sophisticated about the way in which they manage their data, which could have longer-term implications for the networks' growth.

Research published last year by Pew showed that some 60% of adults are restricting access to their online profiles. In an earlier study the institute had found that, contrary to received opinion, many teenagers and young adults are also using privacy controls to restrict access to online information about them. Nicole Ellison, a professor at Michigan State University who studies social networks, says that over the past few years she has noticed that her students have become steadily more cautious about whom they share information with.

As it happens, the social networks have partly brought this on themselves. In order to offer a better service, many have created extensive sets of privacy controls that allow users to toggle between different levels of protection to shield their online data. Hemanshu Nigam, MySpace's chief security officer, says the site now offers 65 different features that people can use to determine what, if anything, can be seen by other users. Facebook also has a plethora of controls that can be adjusted to create different levels of confidentiality. Default settings for younger people on social-networking sites are often more restrictive than those for adults to ensure they are protected from unwanted attention.

Social networks deserve applause for developing these fine-grained controls, and for their efforts to educate youngsters in the appropriate use of social-networking sites. But their desire for profit can put them on a collision course with privacy activists, regulators and their users.

One bone of contention is social networks' reluctance to draw attention to their privacy statements. A study published last year by two researchers at Cambridge University, Joseph Bonneau and Sören Preibusch, looked at 45 networks and found that many of them buried their privacy statements in obscure corners of their sites. Speculating about the reason for this, the researchers thought it might be concern about "privacy salience": the worry that alerting people to privacy as a potential issue will make them less inclined to share things, even if robust privacy controls are available.

That matters, because networks are doing their best to lock in users. Messrs Bonneau and Preibusch found that none of the sites they looked at made it easy for people to export their profile data, friendship links, photos and other material. The more content that a user produces, the more likely he or she is to remain on a particular site because moving becomes too much trouble. That explains why most sites like to play up the benefits of content-sharing and play down talk about privacy.

We'd like to see more of you

Some of the tactics employed to encourage greater sharing are more blatant. Last month Facebook caused a storm of protest from privacy groups and users when it unveiled plans to simplify its privacy settings. Critics welcomed some of the changes, including one that allows users to specify who can see an individual piece of content—a level of detail not available before. But privacy activists are deeply unhappy with the site's decision to make more data from individuals' Facebook profiles available by default to anyone with access to the internet.

Earlier this month Mr Zuckerberg told an audience in California that he believed social norms had shifted and that people had become willing to share information about themselves more widely. On this view, what Facebook did was simply a reflection of a new social reality. But the firm's critics argue that Facebook is trying to drive change on privacy rather than react to it.

Some privacy groups have filed a complaint against Facebook to America's Federal Trade Commission, arguing that the recent changes to its privacy policies and settings violate federal law. The complaint notes that before Facebook's latest move the only data about individuals that were publicly available were their names and the regional or national network within Facebook that they belonged to. Now far more information is being put on show automatically, though users can change their default privacy settings to restrict access to some of it. Critics argue that Facebook has loosened privacy protections in order to increase traffic and to compete with upstarts such as Twitter.

There may well be more clashes with privacy regulators and privacy groups. Facebook made a number of changes to its privacy policy last year after Canada's privacy watchdog raised several concerns with the firm. In particular, the watchdog wanted Facebook to give members more control over the way their information is used by apps, which the firm agreed to do. Privacy bodies in Europe are also looking into social networks, hoping to establish pan-European guidelines.

Sharing information with apps developers is an especially sensitive issue. If severe restrictions are placed on networks' ability to pass on data, both they and the developers could end up making less money than envisaged. Advertising is another touchy subject. Jeffrey Chester of the Centre for Digital Democracy, a privacy group, sees social networks as part of a broader set of companies that are trying to track individuals' behaviour online to gather data that can be used by marketers for precisely targeted advertising.

Elliot Schrage, Facebook's head of public policy, sees things differently. He points out that companies engaged in so-called "behavioural advertising" are tracking individuals' activities on the web without their knowledge, whereas Facebook seeks its members' explicit permission when they sign up to the service to let it use their data for ad-targeting purposes. He also stresses that the company provides advertisers with data only in aggregated form so that individuals' personal information is not divulged to anyone.

How much is a free lunch?

Most people who use Facebook and other social networks seem prepared to accept the idea of targeted advertising as the price of getting free access to the service. It is less clear whether they are prepared to go along with Facebook's attempts to persuade them to share ever more information about themselves. But Mr Zuckerberg and his colleagues clearly believe that people are happy to do so.

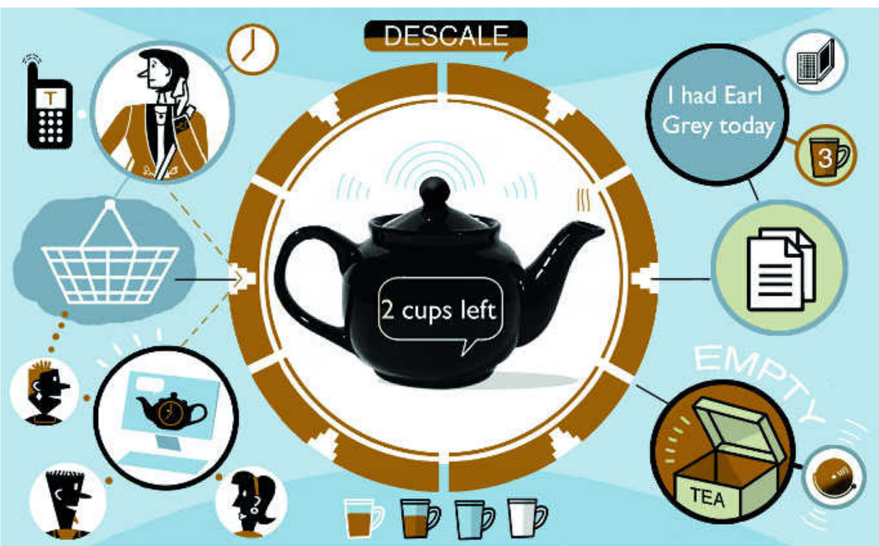
Twitter's Mr Stone also sees a longer-term trend towards greater openness, and claims that his service's users are quite happy to share more information about themselves. The network has recently changed its own terms of service to give it greater leeway to add data about users' physical location to its traffic. Mr Stone says this is critical because the next big wave of social networking will revolve around mobile phones and the places that people take them to. A new crop of networking firms has already sprung up to capitalise on the opportunities offered by mobile phones. That opens up the prospect of even broader changes in the social-networking landscape. ■

Towards a socialised state

The joy of unlimited communication

WHAT will the future of social networking look like? Imagine this: your digital video recorder automatically copies a television show that several of your friends were talking about on a social network before the show went on air. Or this: you get into your car, switch on its navigation system and ask it to guide you to a friend's house. As you pull out of the driveway, the network to which you both belong automatically alerts her that you are on your way. And this: as you are buying a pair of running shoes that you think one of your friends might be interested in, you can send a picture to their network page with a couple of clicks on a keypad next to the checkout counter.

Networking types like to talk about the idea that there is a pervasive social element in all of the things people interact with. Listen to them long enough and you come away with the impression that your teapot will soon be twittering about what you had for breakfast. Some of the ideas outlined above may sound far-fetched, but a service such as Facebook Connect, which already lets people export their social graph of online relationships to other web-enabled gizmos, suggests they are not completely outlandish. Everything from cars to cookers could ultimately have social connectivity embedded in it.



But when it comes to helping social networks achieve ubiquity, none of these things will be remotely as important as the mobile phone. Using a web-enabled phone to post status updates and send messages is still a niche activity in many countries, but it will rapidly become a mainstream one as mobile-broadband services overtake fixed-line ones in a few years' time. One estimate by eMarketer suggests that just over 600m people will use their phones to tap into social networks by 2013, a more-than-fourfold increase on last year's 140m.

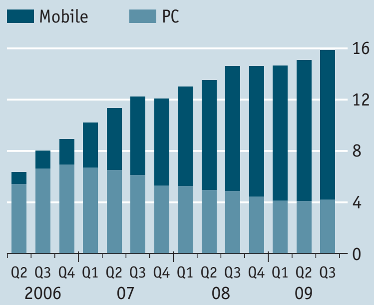
Dial-a-pal

This shift has big implications. For a start, mobile phones in emerging markets—or devices such as cheap netbooks linked to the internet via mobile networks—will open up a brand new audience whose use of social sites has so far been hampered by a frustrating lack of fast, PC-based internet connections. Companies such as Sembuse in Kenya, which bills itself as east Africa's first mobile social network, and South Africa's Mxit are already gearing up to connect millions more people to one another through their mobile phones, providing a big fillip to the amount of information-sharing going on around the world.

The rise of mobile-phone-based networking will have an impact on rich-world markets too. Thanks to fast and relatively cheap mobile broadband services, phones have already become the device of choice for accessing some sites in Asia. Shigeya Kawagishi, an executive at Mixi, one of Japan's largest social networks with 18m members, says the vast majority of its traffic now comes from phone-toting customers who check in to get updates four or five times a day (see chart 7). Facebook, which has some 65m mobile users, says they are almost half as active again on the site as other folk.

On the move 7

Mixi's average monthly page views, m



Sources: Company reports; Morgan Stanley

On location

This trend towards mobile usage is fuelling speculation that the next big thing will be geo-networking apps, which use virtual data to broker real-world encounters. These apps encourage the serendipity that Twitter's Mr Stone talks about by allowing people to use their mobiles to signal where they are to friends who may be nearby. Several start-ups such as Foursquare and Gowalla are building businesses around this idea and Twitter plans to do so too. Asking people to add their whereabouts to their tweets, the firm hopes, will enable it to use these data to direct advertising and other services at people as they move from place to place.

To some, the idea of a technology that can arrange chance meetings with their friends will seem like a dream come true. To others, the thought of being tracked from place to place is a nightmarish prospect that has a Big Brother feel about it. To people who run social networks, location-based networking is a logical extension of their efforts to humanise technology and harness it to the cause of greater global openness.

The networks' founders seem to have an almost Utopian belief in the benefits that their creations will deliver. Facebook's Mr Zuckerberg, for example, describes the greater openness he believes his firm and others like it are bringing to human interactions as "probably the greatest transformative force in our generation, absent a major war." Mr Stone, for his part, reckons Twitter "is something important that has the potential to change the world, though we have a long way to go."

Much the same sort of thing was said about the internet when it first emerged. But it was also met with a great deal of scepticism by those who thought the web could never be used to make money, and from bosses who assumed that workers would use it simply to watch pornography and play online poker. The sceptics were astonished when it went on to produce corporate powerhouses such as Amazon and Google, and provided businesses with remarkable new tools for boosting productivity and generating fresh ideas.

The parallels with social networks are striking. That should come as no surprise, because those networks too are creatures of the internet and the ultimate expression of what its founding father, Sir Tim Berners-Lee, wanted it to be. In his book "Weaving the Web" Sir Tim explained that the internet was always meant to be more of a social creation than a technical one. The ultimate goal, he wrote, was to come up with something that, first and foremost, would make it easier for people to collaborate with one another.

This special report has argued that social networks have already done much to achieve that goal. They have created trusted online venues where people can meet up using their real identities. They have provided firms with new ways to reach their customers and those who influence them. They have reduced friction in the labour market by allowing employers and prospective employees to connect more easily than ever before. And they have speeded up the flow of information within companies.

All of these are impressive achievements. But arguably the most important contribution that the sites have made is to offer a free and immensely powerful set of communication and collaboration tools to everyone on Earth who has access to a broadband internet connection. This democratisation of technology is driving the socialisation of the web and fundamentally changing the way that people interact with one another, as well as with businesses and governments.

It has also made it easy for anyone to form a globe-spanning discussion group of their own with just a few clicks of a mouse. Not so long ago that would have been the preserve of an elite group of companies and institutions which had the necessary financial and technical clout to perform such feats. Now, thanks to the technology created by Facebook and its peers, millions of these conversations can take place simultaneously with the greatest of ease. The world is better off for it. ■