

TABLE OF CONTENTS

Background	2
Summary and conclusions	2
Strategic Issues	3
Question 1: Does your company have a strategy for partnering with 3 rd party organisations?	3
Question 2: Are your business relationships designed to enhance your success with your trading partners or are they primarily adversarial?	3
Question 3: What record do you have for operating partnerships that have achieved their business goals?	3
Culture and reputation	4
Question 4: To what extent does your organisation believe that there can only be one winner in business dealings with third parties?	4
Question 5: What level of trust does your company and brand enjoy among suppliers and customers?.....	4
Processes and systems	5
Question 6: How effective are your processes for learning from your customers to support your product and service innovation?	5
Question 7: Is knowledge sharing actively supported inside your business through formal as well as informal systems?	5
Organisation and management	6
Question 8: Is your company organised to run primarily on functional or multi-disciplinary lines?	6
Question 9: How effectively is your business web-enabled to support collaborative processes and practices?...6	
Question 10: Where does your organisation rate on a spectrum of command and control to team-based management?	6
Percentage responses to each question	7
Aggregate Score	7
Sample Profile	8
Creating the Collaborative Business - White Paper	8

BACKGROUND

The Collaborative Business Forum, organised by Business Intelligence and sponsored by JD Edwards, PeopleSoft and SAP, was held in the Cumberland Hotel, London on 3 July 2001. During the conference, Business Intelligence conducted a brief survey among all the delegates to investigate the collaborative nature of their own organizations. The responses have been analysed and are summarised in this document.

36 delegates took part in the survey. They represented UK and European companies of various sizes (the majority having over 1000 employees) and a wide range of industry sectors including financial services, management consultancy, utilities and IT.

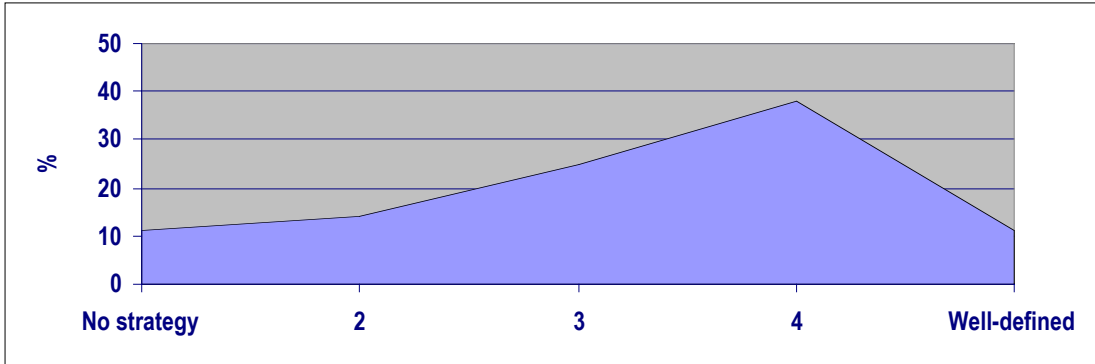
SUMMARY AND CONCLUSIONS

- Well over half of respondents feel their companies have a well-defined strategy for partnering with third parties.
- Adversarial business relationships are gradually being abandoned in favour of more mutually successful relationships.
- Three-quarters claim to have a good record for operating partnerships that have achieved their business goals.
- A clear majority believes there can be a win-win outcome in dealings with third parties and nearly all report a high level of trust between their company and their customers and suppliers.
- Processes for learning from customers are rated as relatively ineffective.
- Views on support for knowledge sharing show no conclusive pattern.
- There is still a strong tendency for companies to be run on functional rather than multi-disciplinary lines.
- A significant majority are not yet sufficiently web-enabled to support collaborative processes.
- Management in companies still tends towards 'command & control' rather than team based.
- Aggregate scores show nearly half the sample rating highly on collaboration, with nobody at the very negative end of the scale.

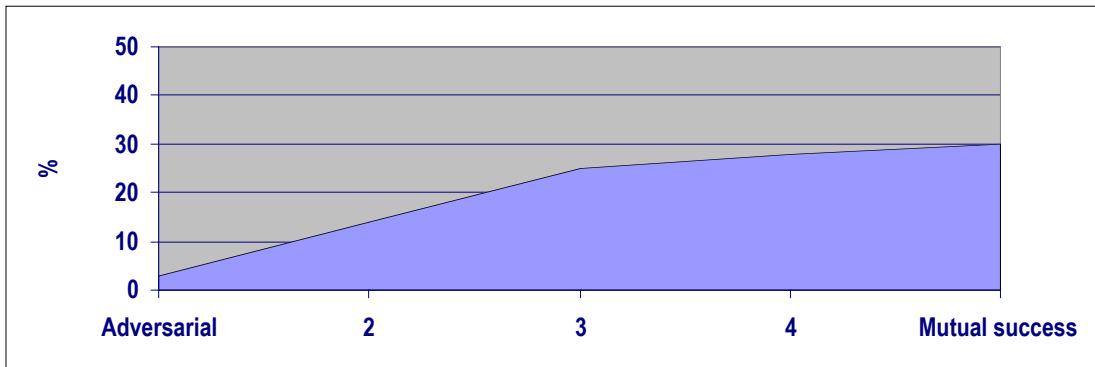
The overriding conclusion from this research is that while companies appear to embrace the ideal of collaborative business both strategically and culturally, their internal processes and management structures still have some way to go and are not yet aligned for true collaboration.

STRATEGIC ISSUES

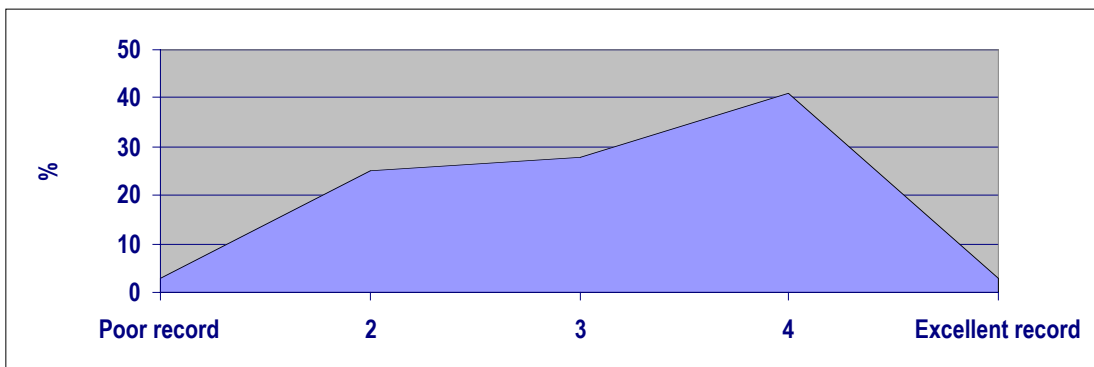
Question 1: Does your company have a strategy for partnering with 3rd party organisations?



Question 2: Are your business relationships designed to enhance your success with your trading partners or are they primarily adversarial?

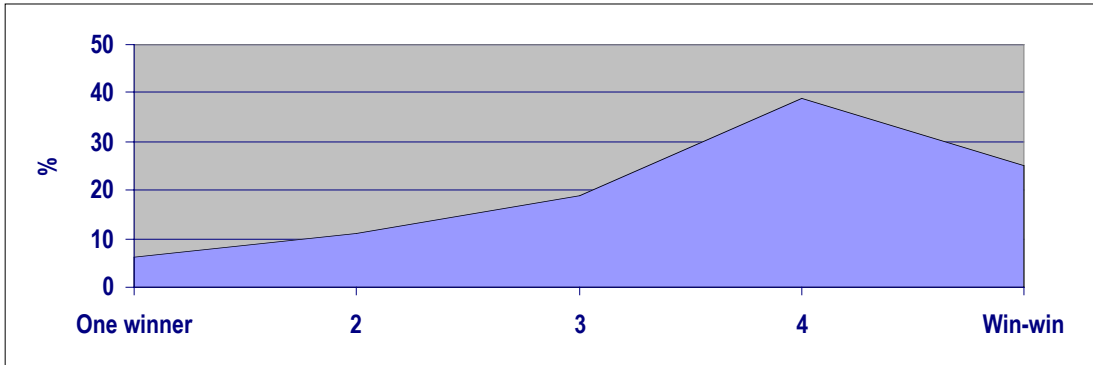


Question 3: What record do you have for operating partnerships that have achieved their business goals?

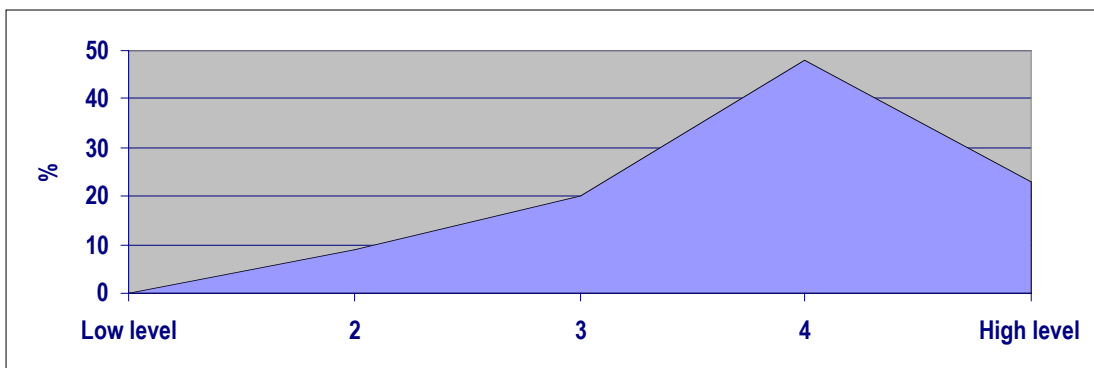


CULTURE AND REPUTATION

Question 4: To what extent does your organisation believe that there can only be one winner in business dealings with third parties?

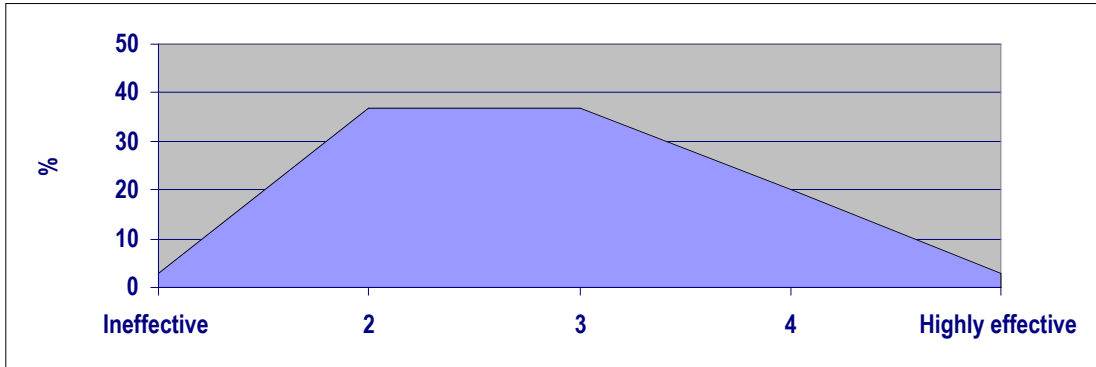


Question 5: What level of trust does your company and brand enjoy among suppliers and customers?

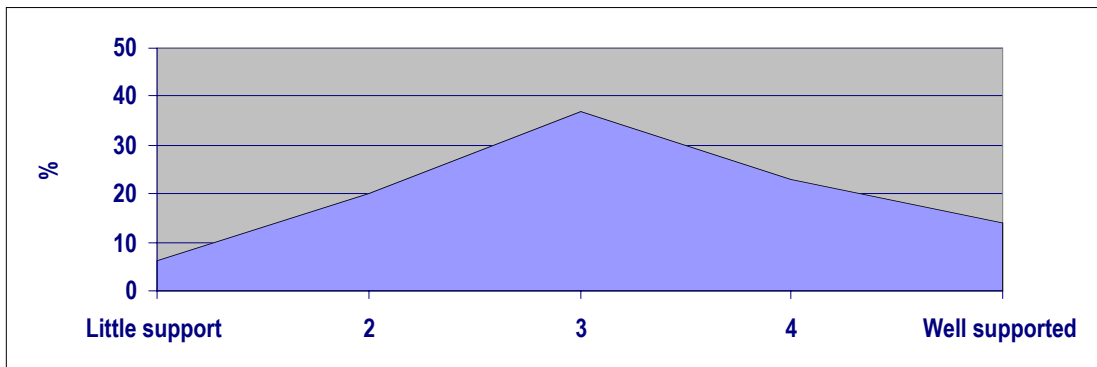


PROCESSES AND SYSTEMS

Question 6: How effective are your processes for learning from your customers to support your product and service innovation?

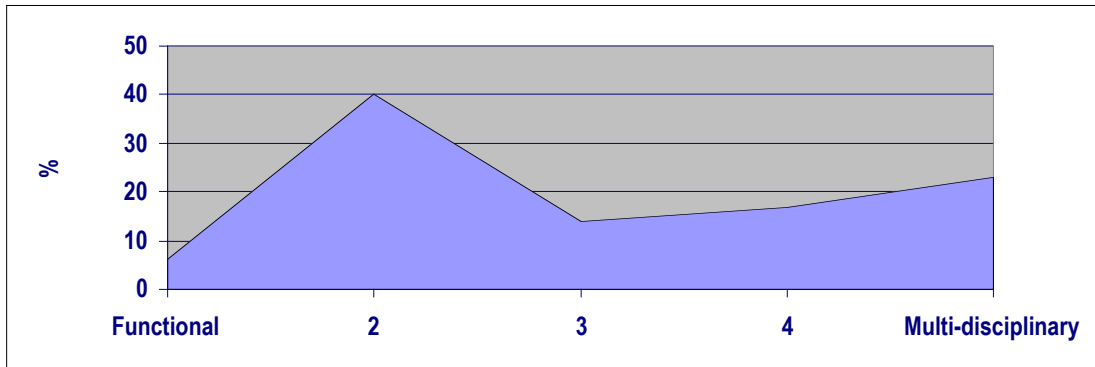


Question 7: Is knowledge sharing actively supported inside your business through formal as well as informal systems?

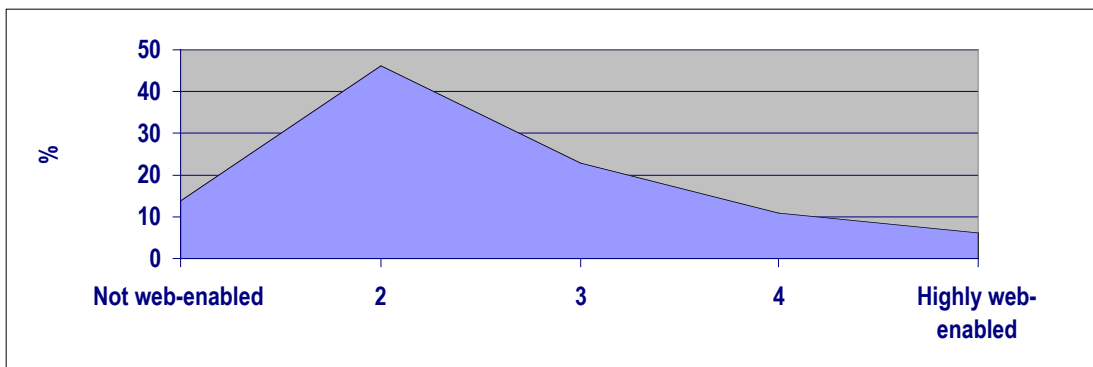


ORGANISATION AND MANAGEMENT

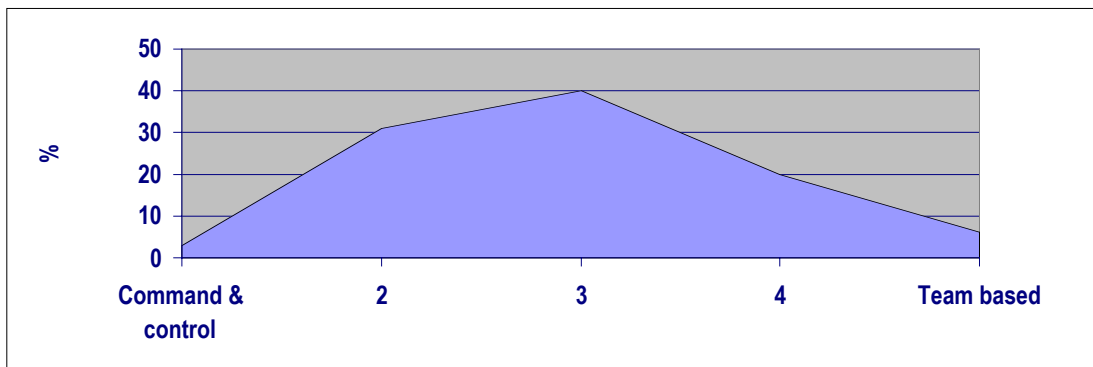
Question 8: Is your company organised to run primarily on functional or multi-disciplinary lines?



Question 9: How effectively is your business web-enabled to support collaborative processes and practices?



Question 10: Where does your organisation rate on a spectrum of command and control to team-based management?

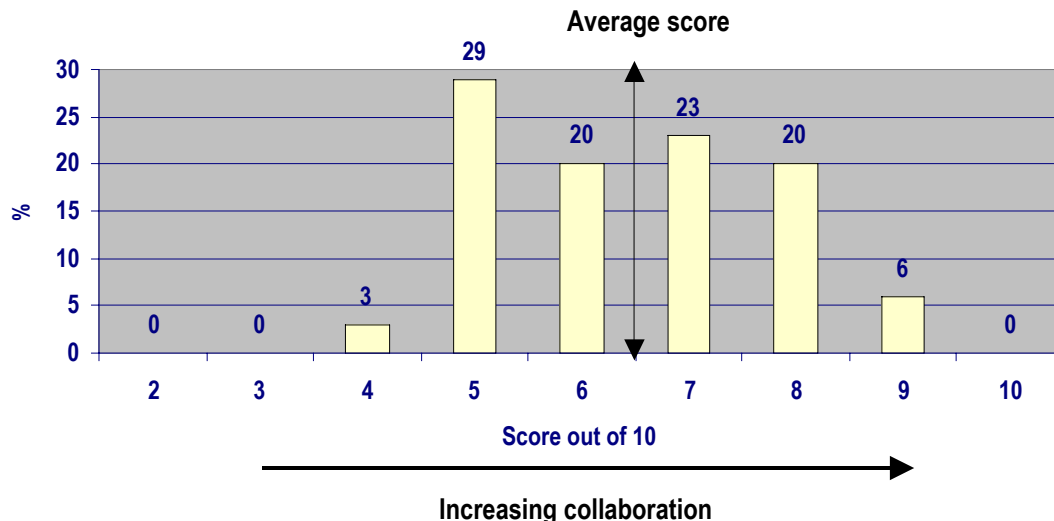


PERCENTAGE RESPONSES TO EACH QUESTION

		1	2	3	4	5	
Does your company have a strategy for partnering with 3 rd party organisations?	No clear strategy	11	14	25	39	11	Well-defined
Are your business relationships designed to enhance your success with your trading partners or are they primarily adversarial?	Adversarial	3	14	25	28	30	Mutual success
What record do you have for operating partnerships that have achieved their business goals?	Poor record	3	25	28	41	3	Excellent record
To what extent does your organisation believe that there can only be one winner in business dealings with third parties?	One winner	6	11	19	39	25	Win-win
What level of trust does your company and brand enjoy among suppliers and customers?	Low level of trust	0	9	20	48	23	High level of trust
How effective are your processes for learning from your customers to support your product and service innovation?	Ineffective	3	37	37	20	3	Highly effective
Is knowledge sharing actively supported inside your business through formal as well as informal systems?	Little supported	6	20	37	23	14	Well supported
Is your company organised to run primarily on functional or multi-disciplinary lines?	Functional	6	40	14	17	23	Multi-discipline
How effectively is your business web-enabled to support collaborative processes and practices?	Not web-enabled	14	46	23	11	6	Highly web-enabled
Where does your organisation rate on a spectrum of command and control to team-based management?	Command & control	3	31	40	20	6	Team based

Aggregate Score

Question responses have been added and converted into a score out of 10. A score of 10/10 would mean that a delegate ticked the most positive end of the scale for every question, whilst 2/10 means the most negative response was given to every question.



SAMPLE PROFILE

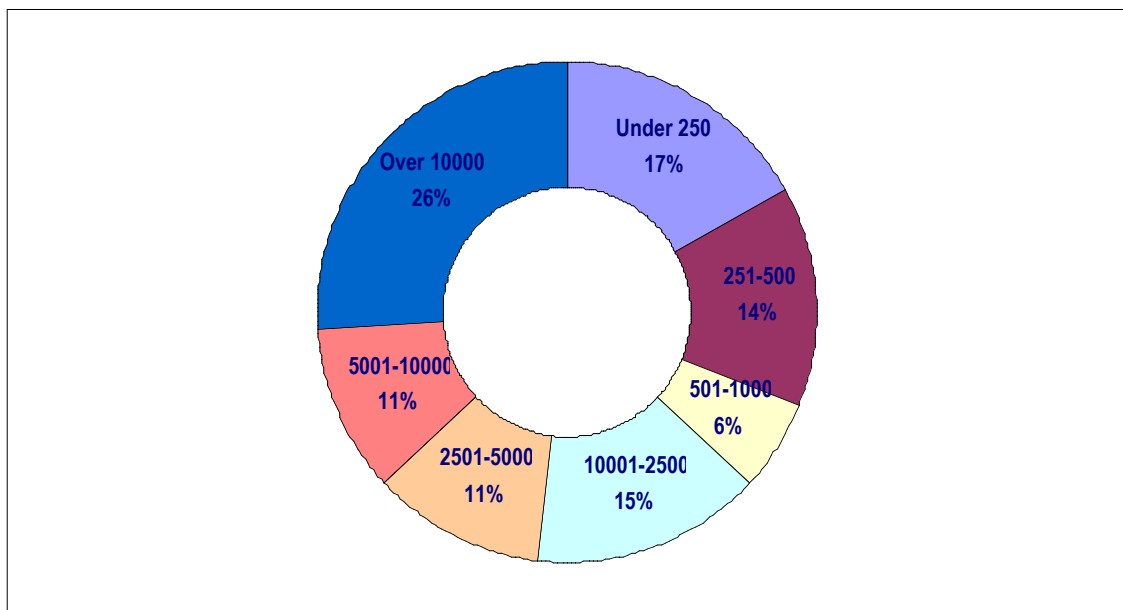
Table 1: Number of employees

Number of employees	No.	%
Under 250	6	17
251-500	5	14
501-1000	2	6
1001-2500	5	15
2501-5000	4	11
5001-10000	4	11
Over 10000	9	26
Total	35	100

(see also chart below)

Table 2: Vertical sector

Vertical sector	No.	%
Banking & finance	5	15
Management consultancy	4	12
Pharmaceuticals	2	6
IT	3	9
Utilities	4	12
Public sector	2	6
Telecommunications	3	9
Training & education	1	3
Construction & engineering	2	6
Transport & leisure	3	9
Food manufacture	2	6
Retail	2	6
Printing	1	3
Total	34	--



– End of the Research Survey Results –

On next page:

CREATING THE COLLABORATIVE BUSINESS - WHITE PAPER

CREATING THE COLLABORATIVE BUSINESS

A Business Intelligence white paper

David Harvey, New Business Director, Business Intelligence Ltd
2001

CONTENTS

	INTRODUCTION	1
1	KEY FEATURES OF THE COLLABORATIVE ENTERPRISE	3
2	COLLABORATIVE ENTERPRISE IN ACTION	9
3	COLLABORATIVE CULTURE	15
4	THE TECHNOLOGY OF COLLABORATION	19
5	CREATING THE COLLABORATIVE ENTERPRISE	21
6	THE WAY FORWARD	23

INTRODUCTION

The origins of collaborative enterprise

There is nothing new about the process of collaboration, which has underpinned trading from the earliest days. But in the current climate, where shareholders, customers, markets and other forces are driving companies to find new ways of delivering improved performance, it is assuming a new importance. Companies are discovering that collaboration offers huge potential for powering the 21st century business. Old, linear approaches to competition, the market, and business generally are outdated and counter productive. Increasingly, companies that refuse to acknowledge the strength of the collaborative enterprise – and the realities of the collaborative economy – risk being left behind. It is not simply something which companies must do themselves. It is a phenomenon which is shaping the markets and environment in which they operate. Customers and other interest groups are forming communities and pressure groups to pursue common causes and create new power bases in the marketplace. Companies need to develop new thinking and strategies to compete in the third millennium.

According to Peter Drucker, the business world's most influential thinker on management, "Demographics, technology and globalisation – the three driving forces of today's society and economy – will make collaboration, alliances and partnerships the most important area of corporate strategy."

Business Intelligence - Charting the way to the collaborative enterprise

This white paper looks at trends in collaborative business, based on findings from Business Intelligence's own sources, along with other supporting material from practitioners, management experts, industry watchers and analysts.

For more than a decade, Business Intelligence has tracked the leading-edge management concepts and practices shaping business, especially those that involve the application of information technology to improve performance. The company has monitored the emergence of the collaborative approach to business, and indeed has featured many of the pioneers of collaborative organizational and management practices in its reports and conferences. Those pioneers range from Dell Computers and stockbrokers Charles Schwab, to Ford and Buckman Laboratories. These companies, and others like them, are part of a movement that is starting to unlock the potential of collaborative business as a new and workable principle for managing in the 21st century

Based on its research, this paper outlines how Business Intelligence defines this powerful new form of business. The following sections describe the drivers behind the emergence of the collaborative economy, examine some examples of the collaborative enterprise in practice, and conclude by analysing the opportunities and challenges for those building or transforming their business to succeed in this new environment.

1 KEY FEATURES OF THE COLLABORATIVE ENTERPRISE

1.1 Defining collaborative enterprise

Collaborative enterprise is the fresh application of a well-established business principle to enable companies to respond to the pressures of the 21st Century. It is not a substitute for competition, but a means of gaining an edge through maximising the value of relationships, both inside and outside the organization. Potentially, it touches all aspects of the enterprise, from strategy to front-line operations.

- The collaborative enterprise maximises the potential of its relationships with competitors, customers, trading partners and employees to improve performance for mutual benefit.

Collaboration with a capital 'C' represents a strategic alternative to the monolithic approach to business development and competition. It invites companies to exploit opportunities across the whole supplier to customer network, as well as between themselves and other market players - including competitors - in the same industry. With a small 'c', it offers opportunities at the operational level for linking processes and individuals across the extended enterprise, to support those broader corporate goals.

Collaboration is a core concept in the knowledge movement with its emphasis on communities of practice and other knowledge sharing activities. In a very real sense, the exchange of best-practice thinking, problem solving and ideas depends on a collaborative approach to business and management. The concept of corporate story telling as a means of sparking innovative thinking, developed by Stephen Denning, Knowledge Management programme director at the World Bank, is a subtly powerful argument for promoting the wider use of knowledge sharing within an organization. In common with many other knowledge practices, it will never take root in a culture stuck in the mechanistic, command and control era. It only works in a collaborative environment.

Combined with the thinking that companies need to concentrate on building businesses round relationships and high-performance teams, these practices and technologies point to the development of a very different kind of business. Business Intelligence calls this evolving model the collaborative enterprise. The relationships that link the organization to its business partners, customers and employees create the channels through which the collaborative enterprise operates, information and knowledge are its currency and

technology, particularly the web, is the enabler. Perhaps more importantly, however, collaborative enterprise also has a distinctive culture. It depends on a high degree of mutual trust, especially considering the confidential nature of sensitive information and intellectual property.

1.2 What makes collaborative enterprise different

Collaboration involves a different approach to business, one that seeks to maximise opportunities across relationships and communities rather than in procedural and technical approaches alone. The lesson of high-performing organizations is that the energy of groups and teams offers largely untapped potential, which businesses must learn to harness. “Where we fall short,” says Professor Leonard Greenhalgh of Amos Tuck School of Business Administration, “is in managing business relationships – between people, within and between groups, and within and between organizations”.

This shortfall in the effectiveness of internal relationships bothered Xerox. Two decades ago, it launched its ‘Collab’ project to improve cross-functional working and co-operation between field engineers and other staff, in order to raise the performance of its customer service. One of the lessons Xerox learnt was that buy-in and commitment of staff is essential to make collaboration a reality. They also found that obtaining that commitment involved understanding in depth how individuals went about their work, their values and practices. It was not something that could be mandated.

One of the dysfunctional aspects of the old business model is that it leads too easily to adversarial relationships with staff, or exploitative relationships with customers and suppliers. The paradox is that while most organizations recognise the value of redeeming these relationships, few seem able to follow this through. Encouragingly, however, those companies that have resolved the paradox can demonstrate that it is worth the effort. Cisco Systems, for example, cites the productivity gains made by customers as one of the reasons why they are more satisfied with web-based than conventional procurement processes.

This kind of experience underlines the fact that collaborative working needs to be simultaneously a business philosophy, strategy and operational principle.

Embracing this concept can also have more awkward implications. While collaboration has many positive connotations, it also has another dimension. Collaboration, as the dictionary states, is not necessarily cosy: “To work in association, sometimes with an enemy ...” Strategically, this may be essential to survival.

1.3 Ten key features of collaborative enterprise

Inevitably, collaborative enterprises differ from other businesses in a number of ways. The following ten key features distinguish the collaborative enterprise from the earlier generation model.

1. Previously, most companies were prepared to rely mainly on their own resources in carving out their fortunes. Today, an effective strategy can involve teaming up with other companies, even competitors, for specific projects or longer-term partnerships.
2. Companies are not equally good at everything. Focusing on a differentiating core competence can be a source of competitive advantage. Partnering with others, even competitors, with complementary competencies can make strategic sense. It is a short step to the virtual organization relying on a web-connected network of partners to achieve business goals.
3. Functional organization has limitations when it comes to managing core processes that cut across departmental lines. Re-engineering to improve responsiveness, innovation and other mission-critical activities established the need for co-operation and the breaking down of traditional departmental barriers. Collaborative enterprise calls for end-to-end processes that extend to customers and other trading partners.
4. In an era of less frantic competition and supply-driven markets, companies did not need to be obsessive about customers. Today, understanding them better in terms of their needs and expectations is a must. Technology has made it possible to segment customers with ever more precision down to the individual. Web technologies also enable companies to communicate with their customers on a one-to-one basis. Similarly, competitor and market intelligence is at a higher premium.
5. If companies could keep themselves to themselves in the past, more intensive and extensive collaboration calls for freer communications and information flows. Today's companies need to be transparent, giving partners access to inventory and other corporate data to speed ordering and other trans-corporate processes.
6. A little more than a decade ago, companies were urged to develop five or ten year strategies. It made sense then because managers had breathing space to follow those strategies through. Not any longer. Rapid change demands rapid response and quick-fire strategies. The prizes now go to companies nimble enough to react rapidly to the opportunities thrown up by the market. Speed and immediacy are the guiding principles.
7. The pace of change has accelerated frighteningly over the past decade and shows no signs of slowing. Handling the impact of change is one of the most important

capabilities for any collaborative enterprise. To seize opportunities, companies must be able to adapt and be capable of living with constant change. Business Intelligence’s research has consistently identified a resilient culture as the critical foundation for adaptability.

8. Sharing information and knowledge is fundamental to closer, more co-operative working. Some companies have recognised the importance of creating an environment where communities of practice make this part of the fabric of corporate life. Knowledge and learning are both essential to keep businesses ahead of the game operationally. They are also the foundation of corporate wealth. Intellectual capital and intangibles, not bricks and mortar, are what count in the emerging economy.
9. In earlier business generations, functional organization resulted in the creation of islands of automation. With the need for connectivity both inside and outside the organization, web-based technologies supported by interactive systems are an essential part of the collaborative infrastructure.
10. Not least, those inside the business have to be able to make collaboration work. They must be able to respond intelligently to requests from customers, fellow staff and external partners. Those closest to the action need to be empowered to make decisions, wherever possible on the spot. They must also operate with a high level of integrity, trust and community of purpose and effort.

The contrast between old and new are summarised concisely in Table 1:

Command-and-Control Model	Collaborative Model
Autonomous and adversarial	Networked and collaborative
Broad spread of competencies	Core-competence focused and virtual
Opaque to the outside world	Transparent to customers and partners
Internally focused	Customer and market centric
Functionally organized and procedural	Multi-disciplinary, community and team based
Long-term strategic horizon	Strategically agile
Well ordered and conservative	Change resilient and risk taking
Hierarchical and information hoarding	Knowledge creating and sharing
Technologically constrained	Web-enabled
Procedurally correct	Empowered and responsive

Table 1 - Ten key features of collaborative enterprise

1.4 The implications for organizational structure

One of the consequences of migrating to a collaborative approach to business is that companies must start to think differently about their organizations. They need to see themselves as part of a larger eco-system linked to customers and suppliers, rather than as self-contained units. This has practical repercussions for the operation of the business. It is no longer adequate to see the enterprise as a set of functions managed for the internal convenience of the business (the hallmark of the hierarchical, bureaucratic organization). Instead, the business needs to be organized around processes that enable the company to interact more effectively with customers, suppliers and the marketplace.

The re-engineering movement saw the first attempts to shift from departmental rigidity to more fluid processes. This proved a hard stretch for all but a small minority of companies. But the collaborative era calls for this kind of open structure to be extended beyond the boundaries of the organization and demands even higher levels of transparency. Without appropriate changes in policy and behaviour, companies will be unable to reap the benefits of collaborative commerce.

One consequence of this shift in strategic and operational emphasis to collaboration is that organizations will need to change their shape and focus. In the collaborative enterprise, operations will converge on three core areas – all of which are being reinvented through the internet:

- **Business to Customer (B2C):** Whether the customer is a consumer or another business, there is a set of management processes and activities involved in building and fostering profitable relationships with customers.
- **Business to Business (B2B):** Beyond streamlining procurement, sourcing, logistics and other supply chain activities, the web has ushered in the era of electronic marketplaces.
- **Business to Employee (B2E):** Internally, companies need to improve their ability to leverage skills and knowledge, manage performance and motivate staff to meet their business goals.

Below are some examples of the types of activities that characterise each of the three spaces:

Business to Customer (B2C)	Business to Business (B2B)	Business to Employee (B2E)
Customer relationship management process	Procurement	Learning
Marketing	Logistics	Benefits management
Sales	E-Marketplaces	Performance reporting

Service	Partnership management	HR services
Call and contact centres	Supply chain management	Knowledge sharing

Table 2 - Examples of supporting processes and activities in the three spaces

Nor are there rigid boundaries between these areas since all serve the larger corporate purpose of delivering products and services that satisfy customer needs. In all these areas, the web provides a medium for conducting essential transactions and two-way communications.

Sainsbury's uses a very similar model in describing its strategic framework. In the context of the supermarket chain, it focuses on:

- Business to customer – developing new customer propositions.
- Business to business – cutting costs through transforming business processes
- Colleague to colleague – improving the effectiveness of internal and external interaction

For companies creating a new organizational focus, the web can support the introduction of collaborative practices in all these areas. Internally, enterprise portals can support staff in their work roles and their wider responsibilities including performance reporting, information retrieval and knowledge sharing. It can also provide self-service access to a range of HR-related services. The web is rapidly becoming the standard, ubiquitous window on every dimension of corporate life including policies, procedures, products, inventory, performance and people. The web-based enterprise portal is bidding to become the common information highway for the management of the enterprise.

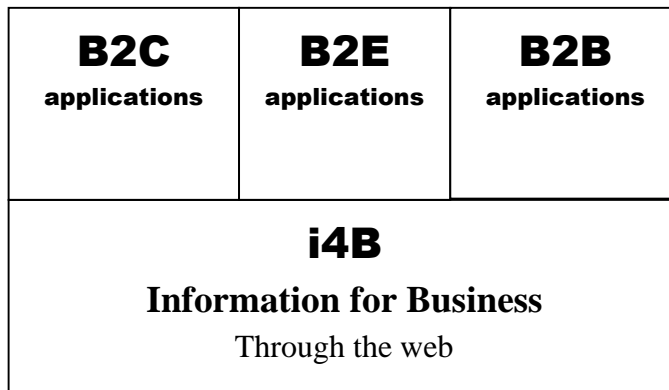


Figure 1 - The three core business activities underpinned by web-delivered information

Underpinning the collaborative enterprise is an e-infrastructure that ties in the company's datawarehouse, business intelligence and other core systems. This infrastructure can be described as information for business (**i4B**). Information technology is the enabler of the collaborative enterprise and the web is increasingly becoming the preferred window on business information. However it must always be remembered that technology is the enabler, not the essence of collaborative enterprise.

2 COLLABORATIVE ENTERPRISE IN ACTION

2.1 Strategic collaboration

Strategic collaboration is a familiar feature of marketplaces ranging from aerospace and automobiles, to manufacturing and energy. However, few sectors thrive on strategic alliances as much as the information technology industry. Almost every player, big and small, is involved in networks of partnerships, based on the ‘complementary core competence’ principle. Even companies like IBM, that once stood aloof in the marketplace, are converts to the principle.

The type of collaborative thinking that characterises information technology could give industries like oil a new spin. After a spate of mega-mergers, some oil companies including Enron and Halliburton have challenged the received wisdom that bigger is better. They believe that the need for agility and flexible pooling of expertise argues for the break-up of corporate giants to create a diversity of specialists able to pool their expertise on a project-by-project basis. For both oil companies, the web’s role as an enabler of virtual teams is a key factor in enabling this re-design of processes and practices.

2.2 Operational collaboration

On the operational side, there are many examples of *de facto* collaboration at work. Multi-disciplinary and cross-functional teams are a staple of corporate life for most companies. Customer relationship management, supply chain management, innovation and other core processes depend both on cross-functional working inside the company and co-operation across corporate boundaries. The collaborative principle underpins communities of practice and knowledge sharing. At the most basic level, an organization that does not collaborate cannot operate. But this is not the same as actively seeking out collaborative opportunities for enhanced performance.

A number of companies are developing their processes and capabilities along collaborative lines to deliver improved customer value. Some businesses have built in the collaborative principle from the point of contact with the customer back into the organization. Companies like specialist chemicals supplier Buckman Laboratories has also gone a long way to create not only the infrastructure to enable this to work, but also a corporate culture that encourages this to happen in practice.

- During the 1990s, Buckman Laboratories repositioned itself from a product seller to a solutions provider capable of helping its customers to solve their production problems. Invariably, sales staff do not have all the answers themselves. However, drawing on their workforce around the globe, they can tap into a world-wide corporate knowledge base using the company's intranet, any time, anywhere. For this to happen, chairman of the executive board, Bulab Holdings, Bob Buckman's mission has been to "create a climate of continuity and trust so that we may have proactive knowledge sharing across time and space".

In order to change its customer proposition, the company has had to remodel the way it operates: culture change and the introduction of knowledge sharing processes went hand in hand. Buckman Laboratories' experience shows that to become adept at managing relationships with third parties, there is a parallel need for closer co-operation inside the organization. In this case, there is a strong emphasis on collaborative working. Buckman defines a team as "a relatively small number of people working collaboratively, who are committed to a common purpose, performance goals and approach for which they hold themselves mutually accountable".

Collaborative commerce is also starting to make a difference to the way companies manage their down-stream suppliers:

- Sainsbury's recently introduced a collaborative planning solution, CPS, that links the supermarket to its 4,000 trading partners. Using a new breed of collaborative software on the web, CPS provides instant information on stock positions to optimise the effectiveness of promotions and product launches. Through this application alone, the company expects an annual saving of £2.5m in reduced wastage and slicker administration.

2.2.1 The role of collaboration in innovation

It is not only in trading that collaboration offers advantages. It can also offer a route to more effective innovation, as David Skyrme points out in his book *Knowledge Networking, Creating the Collaborative Enterprise*. He quotes two examples that show how collaboration has worked in companies' favour:

- A study found that innovation in the medical equipment industry in Holland relied heavily on user-manufacturer collaboration, and that over three-quarters of innovations were developed within networks involving multiple relationships including distributors and other partners.
- Collaboration with dealers, component manufacturers and software developers was central to the rapid rise of Compaq's business.

The reason why collaboration is attractive is revealed in the analysis of 12 innovation networks in Holland. It found six main reasons for collaboration:

- Cost sharing
- Risk sharing
- Additional market information gathering
- Complementing technical and market knowledge
- Serving international markets
- Joint development of industry standards

2.2.2 Collaboration in the supply chain

For some years, collaborative commerce has been a theme in industries such as retailing, where the opportunities for streamlining the supply chain through shared planning and more effective information exchange have been behind a number of initiatives.

'Collaborative Planning Forecasting and Replenishment' (CPFR), the American version, and 'Efficient Consumer Response' (ECR), in Europe, have created a framework for closer links between manufacturers and stores. They involve the creation of mutually profitable alliances involving the freer exchange of information to improve marketing, production and logistics. In Europe, initiatives of this sort are predicted to be capable of saving an amount equivalent to 7.3% of consumer spend as a result of reduced inventory costs and fewer missed sales.

More recently, the potential of the web to create exchanges where companies can achieve a much higher level of speed and effectiveness in collaboration has been the focus of high-profile activity, although much of it has been ill-focused and unsuccessful.

However, despite these false starts, most industry analysts see B2B exchanges as part of the future of trading. According to the Meta Group, electronic exchanges will play an increasingly central role in business-to-business trading because they offer the means for companies to keep pace with the market: "By 2002, accelerated business cycles and channel alignment strategies will transform closed supply chain relationships to dynamic trading networks".

So far, the web has inspired many leading organizations to explore collaborative ventures in the B2B space driven by the lure of economy-of-scale savings and other benefits:

- Aerospace rivals Boeing, Lockheed Martin, BAE Systems and Raytheon joined forces to set up Exostar, an electronic marketplace with an annual procurement budget of \$90bn.
- Ford, General Motors and DaimlerChrysler and other car makers created Covisint, an electronic market for channelling the annual purchase of \$240bn worth of parts from 50,000 suppliers.
- BP Amoco and 14 competitors from the oil industry created a global procurement exchange with an annual purchasing budget of \$125bn.

But the advantages are balanced by business, cultural and technical problems and concerns. While Covisint shows that leading competitors can co-operate, the politics of collaboration prevented a clean sweep of the industry. Having declined to participate in Covisint on the grounds of preserving the integrity of its carefully nurtured supplier network, BMW subsequently teamed up with Volkswagen to create its own e-marketplace. More efficient procurement is going to be weighed against other factors: the degree of influence a participant can expect to have on the marketplace, disruption to existing networks and commercial sensitivities.

The information technology industry has been in the forefront of applying web technologies to enable e-commerce. Cisco Systems, for example, has profitably used the web as the medium for both selling to its customer base and buying from its suppliers.

- Launched in 1984, Cisco Systems started as a supplier of computer network switching technology and is now a leading seller of internet business solutions. Today, 87% of its world-wide customers' orders are placed online – nearly 100% in Europe. Since going online, the company has seen productivity benefits for both Cisco and its customers, with a 25% increase in customer satisfaction. On the buy side, the application of e-procurement to its own supply chain has achieved a 70% reduction in order cycle time, from 6-8 weeks to 1-3 weeks and \$175m savings in annual operating costs. At the same time there have been mutual benefits including a 45% in inventory reduction for Cisco and its partners.

2.2.3 Collaboration in customer relationships

Although most companies invest in multiple channels for customer communication, the web offers a range of unique opportunities for learning about customers' preferences, behaviour and needs. Prior to the introduction of store cards and loyalty programmes, most retailers had little opportunity of knowing who their customers were, let alone their purchasing power and history. The web dramatically improves companies' ability to fill in its knowledge gaps and, depending on their ability to incentivise customers to divulge further information about themselves, a great deal more besides.

While this offers companies a chance to improve their product and service innovation, it also enables them to deliver a more personalised and one-to-one service, notably pioneered by Amazon. By tracking details about customer transactions, the e-tailer can welcome them back with a personalised message, keep them informed on the status of their orders, and by tracking purchasing histories, promote new titles on similar subjects that should interest them:

- Amazon was one of the companies featured at **eCRM**, Business Intelligence's conference highlighting the innovators in this area. During the conference Martine Ferment, Amazon's UK marketing manager, explained how the company promotes collaboration in the virtual environment of the web: "We try to motivate customers to come up with ideas. For example, the 'one-click' was driven by customers asking for the order processing to be made simpler".

A number of companies, especially service-based businesses, have started to extend their knowledge creation and sharing processes to include their customers.

- Arthur Andersen's 'KnowledgeSpace' provides access to databases, information resources and consultants as well as moderated, online discussion forums that allows clients and consultants to exchange information and ideas. Its virtual communities includes CFOs, auditors, energy companies and communications.

According to the one-to-one marketing consultants Peppers and Rogers, the most productive collaborative relationships are based on customer knowledge. The ability to learn about customer needs and preferences is the foundation for adding value to that

relationship, something which the web puts within the grasp of every company. It is also a key process in stimulating the innovation process.

While there is an element of collaboration over which companies have control, collaboration between customers in informal or formal groups is another matter. But the power of these groups to influence, even destabilise, companies and markets has been amplified by the web. Napster is an example of how peer to peer technology has threatened to upend the music industry. It provides an early warning of the potential of new technologies to create new customer power bases in the marketplace.

2.2.4 Collaboration between business and employees

Ultimately, the policies on which companies operate determine the culture and quality of business to employee relationships. One of the most powerful arguments for ensuring that employees are satisfied in their work is the fact that employee morale is one of the biggest factors in customer relationships. Happy staff are more likely to mean happy customers.

On a practical level, there is a need for continuous process improvement, best practice sharing and other forms of knowledge exchange, both to help staff in their jobs and to improve service to customers. These kinds of knowledge activities are ideal candidates for web applications. Companies ranging from BP, with its knowledge portal linking 20,000 staff, through to Buckman Laboratories' K'Netix knowledge network which delivers anywhere-anytime answers to its world-wide sales force, have discovered that the web provides a powerful medium to support collaborative working and problem solving. Consultancies were early adopters of intranets to support knowledge acquisition and sharing.

For many companies, there is a natural evolution from the web as a vehicle for discrete applications to the development of an enterprise information portal. Using the web as the main highway for all corporate information and communications provides staff with a single window on performance, marketing, finance, production and other information. It also creates an interactive forum for user communities.

- The backbone of Ernst & Young's knowledge strategy is its EY/KnowledgeWeb, Kweb, which provides a one-stop-shop for the consultancy's global knowledge resources, with links to key external sources including Reuters and Datamonitor. Not only does it provide a role in enabling internal collaboration between consultants, but recently it has been extended to E&Y's clients who have access to best practice advice, and can also collaboratively develop solutions with consultants. In addition, there is an online advisor to provide clients with answers within a guaranteed time frame.

Equally importantly, the web gives individual employees the power to tailor information retrieval to their own needs, the same personalisation feature that makes the web a versatile tool in B2B and B2C applications. This is a key feature of Philips Electronics' intranet:

- "We have built a new 'smart' generation of corporate intranet, using a portal framework with role-based technologies. Users are presented with a personalised view of intranet and internet content and applications that were previously difficult to find." Philip Reynolds, Country IT Manager (UK and Ireland), Philips Electronics

Until recently, intranets and portals have excelled in terms of content management, search and retrieval and information publishing, with access to other applications and databases. The next phase of technological development should include more powerful collaboration and process management tools that will expand the versatility of enterprise portals still further.

3 COLLABORATIVE CULTURE

The above examples of collaboration in action demonstrate that it is possible to reap real benefits. However, creating the collaborative enterprise is not easy, especially for companies with cultures and strategies rooted in the past. But this cultural transformation is the core challenge. Without a collaborative culture, companies will never realise their business goals for leveraging key relationships. Establishing the appropriate values and beliefs in the company that support these relationships is the make-or-break requirement.

Although the early Nineties saw an upsurge in enthusiasm for partnerships and alliances, many proved to be ineffectual. In most cases, the simple reason was that companies failed to recognise that the success of alliances depends not so much on a well-defined legal framework as in cultural compatibility and productive relationships. The secret of collaboration lies in creating the right corporate environment.

Any form of transformation is notoriously difficult. Business Intelligence's research shows that the record for implementing major change is poor. For example, only ten per cent of those who set out to re-engineer their organizations in the Nineties met or exceeded their performance improvement targets (*Re-engineering: The Critical Success Factors*, Business Intelligence). Most companies have also struggled to realise business benefits from knowledge management. Currently, it is a similar story among those trying to implement customer relationship management projects. Culture-change and project-management difficulties are experienced by the majority of organizations.

Projects to implement collaborative initiatives are unlikely to be any different in this respect, particularly where they throw up all the challenges associated with major change. If the past is indicative, less than a third of companies can expect to negotiate the change process and get near to achieving their objectives. Some of the problems they will meet are generic and reflect the problems of adopting a mechanistic approach to a project. In many cases, initiatives founder on human factors. Business Intelligence has found that the road blocks that impede progress are invariably the same, whatever the nature of the project:

- Inadequate buy-in and sustained sponsorship from the top.
- Corporate culture that stubbornly resists new working practices and procedures.
- Poor planning, management and measurement of change programmes.
- Over-ambitious plans that ask too much of the organization at one time.
- A lack of change management skills.

Although these shortcomings can prove fatal on their own, companies often compound their difficulties through weak programme scoping and implementation.

While these generic problems can be formidable, managing the transition to a collaborative enterprise brings its own special challenges:

- Forging strategic partnerships, particularly with competitors, raises political questions about power and control.
- Web-enabling the supply chain and introducing collaborative processes will involve decisions to share sensitive information with third parties.
- Branding and other commercial concerns will be raised in partnerships.
- Developing a collaborative, learning relationship with customers involves resolving data privacy and personal information sharing issues.
- Creating an effective e-infrastructure capable of supporting collaborative processes presents a significant systems and application integration challenge.
- Instituting knowledge sharing practices means persuading people to adopt different values as well as new systems.
- Developing new skills in customer and partnership relationship management takes time and significant commitment.

None of the generic or specific challenges represent an insuperable barrier to developing a collaborative enterprise. But there is a huge danger of missing the target if these challenges are not addressed up front. Transformational programmes are complex and lengthy, requiring corporate stamina and sustained effort. Not surprisingly, the best-laid plans can easily drift off course or run aground.

4 THE TECHNOLOGY OF COLLABORATION

Confusion of means and ends has bedevilled companies' attempts to apply technology to solve their performance and operational problems over the years. Collaborative business is unlikely to be an exception. Technology, how ever seductively smart, will never be more than an enabler. Whether driven by supplier hype or the desire for instant solutions, some companies will be tempted to reach for the technology first only to realise that they should have started with the business, process and people issues.

As emphasised earlier, the foundation for effective collaboration involves establishing commitment to common trading goals between partners and the creation of a climate of trust at a corporate and personal level. The quality of relationships and willingness to collaborate are what matters most. Operationally, companies need to back this up with processes incorporating sound information and knowledge sharing practices. But given these conditions, technology can make collaborative business fly.

There are several systems that support collaboration by facilitating information sharing, enabling cross boundary processes and decision making. The latest technology that promises to extend the technological spectrum is peer to peer, P2P, networking. Perhaps the most important technology supporting collaborative working, though, is the internet. It provides the backbone of many current solutions.

Web: transforming the old economy

For decades information technologists pursued the goal of transparent inter-computer communication without success. Different vendors stuck resolutely to their proprietary technologies and that defied the best intentions of those searching for an open systems solution. Then along came the web to provide what is effectively the lowest common denominator medium for allowing any computer to speak to any other computer, whatever the make.

Business has been quick to seize on its potential. Most major companies now have internal information sharing through corporate intranets, links with external partners, via extranets, and the corporate portal that provides access to the whole gamut of enterprise applications and services. From relatively simple information posting and email services, web applications have rapidly expanded to support every aspect of working and commerce.

Already companies have started to use the web's genius for raising their game to new levels through collaborative working. Whether by amplifying corporate intelligence at the point of contact with customers the Buckman Laboratories way, or streamlining the whole customer to supply chain along the lines of Dell's Frictionless project, the web has begun to show how companies can transform their performance through web-enabling their businesses. At the same time, the internet is encouraging companies to extend their horizons and search for even more ambitious collaborative ventures. In the aftermath of dot.com disillusionment, it is now clear that the internet's most important legacy will be the transformation of the old economy, rather than the creation of something completely new. There is, though, a long way to go.

Despite its relative cheapness and universal accessibility, the web has its limitations, both technically and as a communications medium. It is not computing nirvana. The internet is a good, but not a perfect, solution to many collaborative business applications.

There are technical issues such as speed and bandwidth: transferring memory-hungry slabs of data or video shows up the relatively slow and clunky nature of the web. There are also concerns about reliability of the underlying network and the threat of degradation in service from user overload. But these limitations should be resolved in time through technical advances. Any open system such as the web also raises concerns when it is used for trading: security, particularly of financial transactions, remains one of the biggest issues for companies and consumers. And not all of the problems are technical in nature.

Collaborative commerce on the web

It has been a natural progression to extend the web from an information sharing medium to trading. Its application to the supply chain, though, has not been straightforward. The development of B2B electronic exchanges has also added further impetus to provide solutions. There is a growing range of software to support collaborative planning, project management, product design as well as transaction over the web. Once again, the development of collaborative commerce is not governed by the availability of suitable software and systems. The absence of universally agreed standards for the terms, definitions and coding used in trading remains a significant barrier.

Towards a common language for collaborative trading

Electronic data interchange, EDI, may have been in use for 30 years, but it has enjoyed limited success among only the largest companies because of systems costs. The web promises to extend electronic trading to a much wider range of organisations. This merely highlights the urgency for resolving the standards issues.

Currently, many hopes are built round an emerging standard language for sharing information and documents over the net and with existing computer systems: XML which stands for extensible markup language. The key word is emerging. Although it has been touted as the way ahead for encoding business information for trading purposes, XML resembles more a collection of heavily inflected dialects than a lingua franca. Currently, there is a plethora of XML versions and little consensus although there are several initiatives to establish standards either across sectors or industry wide.

The Organisation for the Advancement of Structured Information Standards, Oasis, and the United Nations Centre for Trade Facilitation and Electronic Business, Cefact, are two of the independent organisations working on a framework for business document exchange called EBXML. In early 2001, the American National Retail Federation's Association for Retail Technology Standards, Arts, came to Europe to promote the cause of a sector standard. B&Q, Shell and Marks & Spencer are some of the companies exploring its potential. Similar initiatives are underway to standardise XML use within the construction, automobile and other sectors.

As it is, most companies that want to trade more closely with their partners in a virtual environment are obliged to define their own standards. Those involved in B2B exchanges and e-procurement and trading initiatives of their own are in the vanguard of developing the collaborative software that links the players in the supply chain.

Sooner or later, companies will run into the same problems that generic standards like EDI are intended to solve. If industry cannot find the will to set collaborative commerce standards, there is a risk that IT vendors will fill the vacuum and dictate the standards and also the technological agenda. This is one of the more practical and immediate challenges for those who want to succeed in building a collaborative business environment. Success in this venture would be a powerful proof of the collaborative principle.

Collaboration in the workplace

Unlike collaborative commerce, there is an easier technological path for those who want to establish co-operative working in the workplace, either on a one-to-one basis or across communities and teams. There is already a host of tried-and-tested systems on the market that can handle the exchange of both structured and unstructured information. Several of the technologies can facilitate collaborative working across time and space.

Some systems are designed to support same place, same time collaboration:

- Group decision support systems – these allow participants in a meeting to contribute and interact simultaneously. Brainstorming, issue exploration and voting on specific issues are some of the ways in which the software supports meetings.

Those that support different place, same time collaboration include:

- Telephone, audio-conferencing, instant messaging and video-conferencing – although the latter is still limited by bandwidth constraints when run over the telephone network, it is adding a new dimension to computer-based interaction between individuals and groups. BP's offshore exploration rigs use of video-conferencing to link specialists around the globe for trouble shooting and problem solving.

Technologies that deal with collaboration regardless of time and place include:

- Portals, intranets and extranets – providing web-based access to information, services and applications is rapidly becoming the universal choice of companies because of the simplicity and ease of access.
- Email, groupware, document management systems and bulletin boards – increasingly, people are likely to have access to all these collaborative tools through the web. Mobile devices, working over networks with improved capacity, extend the flexibility of many of these systems to anytime, anywhere access.

While these technologies support knowledge sharing and other processes inside companies, many of these interactive technologies are used to support the collaborative aspects of customer relationship management. While there is nothing especially different about the underlying technology, the generic use of the term collaborative technologies in the CRM space is another indication of their relevance to relationships.

Peer to peer, or P2P, networking

Napster, the service that runs allows individuals to exchange music files over the internet, has become infamous for the lawsuit that resulted from its flouting record company copyright. But it has caught the imagination of those who see its relevance to collaborative working. Applying the Napster principle to other forms of file sharing opens up a range of possibilities.

Peer to peer, or P2P, networking will enable individuals to bypass central systems and file servers and communicate directly with other people's computers and mobile devices such as WAP phones. The software allows collaborators to index and search each other's computers. With the spread of wireless networks, this will offer free-wheeling interaction without the need for connecting to physical networks. The P2P principle can be extended to communities and teams to provide a platform for collaborative working.

The net effect of technology

One of the implications of the technology is that it changes the way companies operate. In stark contrast to the hierarchical past, the internet and P2P era encourages more open, unfettered communication not only across the organisation but outside its boundaries. This presents an unparalleled opportunity to rethink the way businesses should be run. The new technologies are in tune with the collaborative economy, the need for just-in-time information and rapid decision making.

According to Gary Hamel, strategy guru and chairman of Strategos consultancy, companies like Dell and Cisco Systems have found the right organisational formula for the current operating environment for a simple reason.

“It is not so much that these companies embraced the internet as that their organisations mirrored the internet – they are democratic, open, experimental, highly networked, non-hierarchical, and malleable. This, then, is the secret to building an organisation that can survive the internet age: it must be like the internet.” (Business 2.0 October 2000 p124).

The other consequence is already being seen in consumer and interest-group behaviour. What the web and P2P technologies can do for companies, it can also do for all stakeholders in the business in providing a universally accessible means of creating forums and communities. Companies have no control over these external collaborative activities. But they cannot be ignored.

5 CREATING THE COLLABORATIVE ENTERPRISE

It is clear that taking full advantage of the opportunities afforded by collaboration involves all aspects of the organization. To help companies to examine their own collaborative capabilities and strengths, Business Intelligence has constructed a self-assessment checklist. Score your organization against the following questions:

THE BUSINESS INTELLIGENCE TEN KEY QUESTIONS

A. STRATEGIC ISSUES

1. Do we have a strategy for partnering with third-party organizations with competencies and strengths that complement our own?

<i>No clear strategy</i>			<i>Well-defined strategy</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

2. Are our business relationships designed to enhance the mutual success of ourselves and our trading partners or are they primarily adversarial?

<i>Adversarial</i>			<i>Mutual success</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

3. What record do we have for operating partnerships that have achieved their business goals?

<i>Poor record</i>			<i>Excellent record</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

B. CULTURE AND REPUTATION

4. To what extent does our organization believe that there can only be one winner in business dealings with third parties?

<i>One winner</i>			<i>Win-win</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

5. What level of trust does our company and brand enjoy among suppliers and customers?

<i>Low level of trust</i>			<i>High level of trust</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

C. PROCESSES AND SYSTEMS

6. How effective are our processes for learning from our customers to support our product and service innovation?

<i>Ineffective</i>			<i>Highly effective</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

7. Is knowledge sharing actively supported inside our business through formal as well as informal processes and systems?

<i>Little support</i>			<i>Well-supported</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

D. ORGANIZATION AND MANAGEMENT

8. Is our company organized to run on functional or multi-disciplinary team lines?

<i>Functional</i>			<i>Multi-disciplinary</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

9. How effectively is our business web-enabled to support collaborative processes and practices?

<i>Not web enabled</i>			<i>Highly web-enabled</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

10. Where does our organization rate on a spectrum of command and control to team-based collaborative management?

<i>Command & Control</i>			<i>Team-based</i>	
<i>1</i>	<i>2</i>	<i>3</i>	<i>4</i>	<i>5</i>
[]	[]	[]	[]	[]

SCORING YOUR RESULT

The higher the score, then the better equipped your organization will be to take advantage of collaborative opportunities. To some extent, all the areas of assessment are inter-related so you might expect a degree of consistency across all sections. A score of 40 or more would certainly indicate that this is the case. If you score between 25 and 40, this indicates that there are likely to be some significant weaknesses in your strategy or capabilities. Alternatively, this score may mean that you have started to move your organization in the direction of collaborative business, but not yet seen the returns. If your score comes in below 25, your organization is probably still rooted in the past and is either unwilling, or unable, to shift from its established business model and practices.

6 THE WAY FORWARD

While there is evidence to show that some companies are adopting collaborative practices in their business, it will be a tough stretch for many organizations. Not surprisingly, it tends to be companies that are either in new industries, notably the information technology sector, or those that have the vision and will to change their business models, that are in the vanguard of exploring the collaborative option. For others, the difficulties are likely to be strategic, cultural and technological. Transformation is never easy.

The development of critical mass in any sector will be influential in promoting the wider adoption of collaborative practices, particularly when leading players exert a pull-through effect on their customers and other trading partners. How fast and widely this can happen is likely to become clearer over the coming years.

The one thing that is certain is that companies that soldier on with out-moded business models and practices will have diminishing opportunities in a marketplace where companies find new, more appropriate ways of competing. The eternal enemies that all businesses face are adverse economic trends, competitive pressure and market forces that test corporate strategies to destruction. In the 21st century, there is every indication that these challenges are becoming stronger and more unpredictable. Although the resulting turmoil throws up plenty of threats, it also creates fresh opportunities.

The effectiveness of collaboration is reflected in the value and productivity of the relationships that companies develop. As Professor Greenhalgh says, “Effective managers in the new era don’t establish and manage relationships to be nice. They do it because strategic success depends on it”.

What the collaborative option offers is a new perspective on strategy, organization and trading. Companies could do far worse than evaluate its relevance to their businesses. If they do not, they can be certain that many of their competitors will have the issue on their agendas.

Peter Edwards, of PA Consulting, concludes from his supply chain research that only a few companies are successfully developing collaborative inter-company structures. “For those that can adapt,” he says, “the prospects of reaping the rewards of greater collaboration are significant. As Dell and Cisco have shown, the potential to operate at high velocity across the globe opens up new and exciting markets that can sustain dramatic long-term growth.”

Creating the Collaborative Business

The final words of Edwards' paper sum up the essence of the challenge for business and underline the importance of the human dimension:

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“The paradox of this new technology-enabled business model is that its success relies, more than ever, on people's ability to build relationships based on mutual trust. In a world of pervasive technological change perhaps what endures more than anything else is the capability of people to collaborate with one another.”

BUSINESS INTELLIGENCE AND THE COLLABORATIVE ENTERPRISE

Business Intelligence believes that the principles that lie at the heart of the collaborative enterprise will come to underpin all aspects of organizational development. Accordingly, these principles are contained in - and drive - the thinking behind our leading reports, conferences, training programmes and exhibitions. The synthesis of our thinking and research, and that of our partners, is represented by the ground-breaking '**Collaborative Business Forum**' event, to be held in London in June 2001. For further information on this event, or to find out more about Business Intelligence and the collaborative enterprise generally, visit our website:

www.business-intelligence.co.uk

ABOUT THE AUTHOR

David Harvey is a co-founder director of Business Intelligence.

Since the company was set up in 1988, he has been responsible for developing Business Intelligence's programme of research, reports and events in the areas of re-engineering, knowledge management, customer relationship management and e-commerce. As well as being responsible for commissioning several Business Intelligence reports, he is the principal author of *Re-engineering: The Critical Success Factors* and co-author of *The Executive Information Systems* report and *Managing and Sustaining Radical Change*. He is also director of Business Intelligence's website, the European Centre for Customer Strategies.

From 1998 to 1999 he was a member of the DTI's Knowledge Management Steering Group which contributed to the current Government's 'Competitiveness' White Paper.

Previously an author and journalist, he has written extensively on management topics for leading business magazines and the national press. He has also written and contributed to a number of business books and reports on management, business and information technology subjects. His career includes a period as associate editor and publications editor with the *Director* and has written for a wide range of business and I.T. magazines, such as *International Management*, *Chief Executive* and *Computer Weekly*, and national papers, including *The Guardian*, *The Independent* and *The Observer*. Immediately before

Creating the Collaborative Business

setting up Business Intelligence with Ian Meiklejohn, he was the editor of *Business Computing & Communications*.