COMPETING IN THE MARKETSPACE:
AN EMPIRICAL STUDY

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Following a unique study, ‘Competing in the Marketspace’, conducted in February 1997, it became apparent that although more than half of all surveyed organisations have established a significant commercial presence in the Marketspace, about a third have only a rudimentary commercial presence, and need to catch up fast to remain competitive. The current trend seems to be towards using the Marketspace simply as an additional channel on which to transport existing business models. This report describes these findings, details the underlying model, and focuses later on cross-regional and cross-sectoral comparisons.
Competing in the Marketspace:
An Empirical Study
Soumitra Dutta, Stephen Kwan, Arie Segev

Executive Summary

A unique study, 'Competing in the Marketspace', was conducted in February '97 to explore the degree to which 150 organisations across different sectors and geographical regions are transforming their business models to exploit the unique opportunities of the Marketspace created by the Internet.

This report is structured in two parts. Part I outlines the model underlying the study and describes the overall findings of the study. Some of the key overall findings include:

• More than half of all surveyed organisations have established a significant commercial presence in the Marketspace. About fifteen percent of firms have pioneered the use of the Marketspace for full-fledged commercial use;

• About a third of all organisations have only a rudimentary commercial presence in the Marketspace. They are lagging and need to catch up fast if they wish to remain competitive in the future.

• Few organisations are rethinking how their business models are getting transformed in the Marketspace. While organisations have been investing in building technically sophisticated Internet sites, the Marketspace presence of most organisations is not very effective. They tend to use their presence in the Marketspace simply as an additional channel on which to transport their existing business model.

Part II of this report focuses on cross-regional and cross-sectoral comparisons. Some of the key findings along the sectoral and regional variations include:

• North American companies have succeeded in establishing a more comprehensive Marketspace presence as compared with firms from Western Europe and Asia. North American organisations lead European and Asian firms in all aspects of the exploitation of the Marketspace.

• Even North American firms have done little to exploit the transformational impact of the Marketspace. This provides hope for European and Asian organisations, if they act quickly and effectively.

• 'Soft' sectors such as software, financial services and media and publishing have an edge over 'hard' sectors such as traditional manufacturing and chemicals and pharmaceuticals in the degree to which they are exploiting the commercial potential of the Marketspace.

• There is a lot of room for improvement across all sectors. The Marketspace can be used to build innovative, learning-orientated relationships with customers and exploit the value-adding information content of products.

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3 The term product is used to refer to both tangible and intangible products, and services.
Part I: General Results

The Rise of the Marketspace

Managers have by now got used to regular attempts at intoxication about the Internet by statistics with several zeros and exponential trends. However, of particular interest are recent reports which show a significant rise in the commercial use of the Internet. Studies (such as the latest CommerceNet/Nielsen Media Research Survey) now show that of the 220 million people over the age of 16 in the US and Canada, 23% (or 50.6 million people) are using the Internet and 17% (or 37.4 million people) use the World Wide Web (WWW). Nearly forty percent of WWW users searched for product information on-line before making a purchase and 15% (or 5.6 million people) actually made a purchase on-line. These numbers represent a near doubling in the commercial use of cyberspace over the last year. The Marketspace has arrived!

Stacey Bressler, Vice President of Marketing at CommerceNet notes that ‘the combination of increased general usage and growth of shopping as an activity, paints an extremely promising future for electronic commerce’. This belief is bolstered by findings that the Internet is becoming increasingly mainstream. While 50% of Internet users in the US were professionals and managers about a year ago, this number recently dropped to 39% and is expected to edge downwards towards the national average of about 25%. Women are also increasingly using the Internet, now accounting for more than 40% of all (North American) cybersurfers.

While the cyber-numbers are probably smaller for Europe and Asia, the rates of growth in the use of the Internet in these regions are equally dramatic. {add some facts about European/Asian usage/growth rates here if available} The momentum is strong and the Marketspace is here to stay. The Internet has made a definite transition from the cloistered world of academia and research to the rough and tumble of everyday business.

Business Innovations in the Marketspace

Pioneer organisations are today using the Internet to adapt, and in some cases revolutionise their business models and create innovative customer relationships. For instance, consider Security First Network Bank (SFNB) - the first FDIC insured Internet bank. While SFNB has one branch (for regulatory requirements), it has a dramatically distinct lower cost structure as compared to traditional banks. Traditional retail banking has been built on the fundamental premise of bricks and mortar - branches which exist in communities and to which customers go for different services. SFNB is able to offer a radically different concept of a bank: a virtual bank, a bank which is open 24 hours a day, which is available within the comfort of a customer’s home (or office) and is able to offer distinctly competitive products and services. This is possible primarily due to the new electronic paradigm of the Marketspace.

The role of customers is also getting transformed in the Marketspace. A radical, new customer self-service model is emerging. Consider the example of stock trading by individual investors. The traditional model has long been based on a trading firm having direct access to current stock market activity data and extensive historical data about company and industry performance. Individual customers approached these firms for all information and advice regarding stock trades. The business has been filled with commissions, fees and other expenses which went to pay for the time of analysts, portfolio managers and other experts. Today in the Marketspace, information is widely and freely available to all. Individual customers can act, if they choose to, as the analyst, the portfolio manager and the broker. Through Internet-based trading firms, anyone with an extra $1000 to invest and the right inclination can take charge of his own investment choices.

The potential of the Marketspace for the transformation of commerce is immense, and so are the challenges and opportunities for businesses as they participate in the Goldrush of the Information Age. Randall Whiting, President and CEO of CommerceNet notes that, ‘While the numbers confirm that the Internet has become an established shopping vehicle, clearly changes
in technology, product offerings and perceptions are needed before most people will want to buy on-line'.

**Design of Study**

The Marketspace model - see Figure 3 - was created by the authors to serve as the model underlying this study. Using the Marketspace model, a questionnaire with 34 questions was designed to explore how the technology perspective of increased interactivity and connectivity were having a fundamental impact on the business perspectives - the nature of the "four P's and one C". Most questions required a response on a seven point scale with one and seven indicating low and high levels of achievement respectively along the dimension addressed by the question (see Box Inset 'Dimensions of Study').

The Marketspace questionnaire was pre-tested and evaluated by independent observers. The actual study of the organisations was conducted in Feb. '97 by 230 1st year MBA students at the Haas School of Business. Students self-selected themselves into groups of four or five members and chose companies based on their interests from an initial list of about 400 organisations. The list of organisations was formed largely from lists of major corporations compiled by Fortune, the Financial Times and Asiaweek. Also included were the recent CommerceNet Award Nominees for innovative web-sites. The evaluation of firms was done through a combination of web-site analyses, e-mail questionnaires and in some cases follow up telephone interviews.

Jenny Redo and Henry Hwong, 2nd year MBA students at the Haas School of Business, played important roles in guiding the 1st year MBA students during the study. The help and support of all Haas MBA students involved in this study is gratefully acknowledged.

**Establishing a Commercial Presence in the Marketspace**

Most surveyed organisations (see Box Inset 'Design of Study' for details of study) have initiated a commercial presence in the Marketspace. Figure 1 depicts the extent of commercial presence of the surveyed firms ranging from a rudimentary presence (level 1) to a full fledged commercial presence (level 7). There is an interesting trend in the twin-peaked curve of Figure 1. More than half of all organisations have established an extensive presence in the Marketspace. They include a host of organisations across sectors such as Volvo, Nokia, American Airlines, Reuters and SAP.

For example, Volvo's Marketspace presence reflects the sophistication of its leading edge products. Volvo offers an extensive breadth of information about Volvo products and company performance. Its web pages are colourful, attractively designed and allows visitors to easily navigate across pages to browse through the extensive available information on Volvo products. Features and related benefits are described and detailed specifications are presented for many models. Information about the company's R&D efforts, environmental concerns and financial data is also presented.
**Dimensions for Study**

The overall score for each dimension was obtained by aggregating a number of items related to the degree and extent to which the corresponding dimension has been transformed in the Marketspace for the surveyed organisations. The items are detailed below for each dimension.

**Technological Sophistication**
- The informative content of the sites - ranging from limited information (1) to extensive business information (7);
- The ease of navigation of the site - ranging from difficult (1) to easy (7);
- The visual appeal of the site - ranging from poor (1) to attractive (7); and
- The technical performance of the site - ranging from slow (1) to fast (7).

**Transformation of Products**
- The availability of product related information on-line - ranging from limited information (1) to detailed information about the complete product line (7):
- The level of customisation of products for individual or groups of customers - ranging from no/low customisation (1) to a high degree of customisation (7); and
- The degree of participation of customers in the specification and design of products - ranging from no/low participation (1) to a high degree of participation (7).

**Transformation of Promotion**
- The extent of use of on-line advertising - ranging from negligible (1) to extensive (7);
- The use of on-line promotions such as sales and discounts - ranging from low (1) to extensive (7);
- The level of customisation of on-line promotions - ranging from low (1) to high (7);
- The level of participation of customers in on-line promotions - ranging from low (1) to high (7); and
- The extent of links with other organisations in organising on-line promotions - ranging from low (1) to extensive (7).

**Transformation of Pricing**
- The degree of customisation of prices to customers on-line - ranging from no/low customisation (1) to extensive customisation (7);
- The degree to which prices are varied dynamically in real-time - ranging from no/low variation (1) to extensive variation (7);
- The degree of on-line price negotiation possible - ranging from no/low negotiation possibility (1) to extensive negotiation scope (7); and
- The possibility to charge customers for only proportions of products consumed - ranging from no/low possibility (1) to extensive facilities for metered pricing (7).

**Transformation of Placement**
- The extent to which the site distributes its products on-line - ranging from low (1) to high (7);
- The availability of one-line order processing - ranging from no/low (1) to complete (7);
- The availability of secured on-line payment - ranging from no/low (1) to complete (7); and
- The extent of involvement of partner organisations in on-line distribution - ranging from some involvement (1) to extensive involvement (7).

**Transformation of Customer Relationships**
- The provision of on-line customer service - ranging from some (1) to extensive (7);
- The on-line identification and tracking of customers to provided customised services - ranging from some (1) to extensive (7);
- The provision of on-line forums for customers - ranging from no/some (1) to extensive (7); and
- The solicitation of on-line feedback from customers - ranging from limited (1) to extensive (7).
Figure 1: Extent of presence in the Marketspace

Nokia's Marketspace presence is a sprawling network of inter-linked web pages and even ties in with country and language specific versions for seven countries around the world. Nokia's products are listed in detail on various lists, each of which is linked to a page that provides precise specifications and features, as well as information on compatibility and other products and accessories. The site even allows for users to try out different designer colours on virtual product models and engages users in a 'mobile phone story' contest. Though impressive, Volvo's and Nokia's presence does not extend all the way to full electronic commerce because customers cannot order their products on-line.

About 15% of the respondents are pioneers who are using their web sites for conducting full electronic commerce. These pioneer organisations range from new Web-based virtual companies such as E*Trade who conduct almost all their business in the Marketspace to more established companies such as Charles Schwab and Reuters who have embraced the capabilities of the electronic medium whole-heartedly.

E*Trade offers about a dozen different types of accounts on-line and allows customers to buy and sell on-line OTC and listed stocks and options and indexed options. Due to its web-based nature, E*Trade is able to offer impressive degrees of customisation and competitive rates to its customers. Customers are able to create individual portfolios and scan them through a customised home page. Pricing is simple and very competitive. For example, customers pay only $14.95 for listed market orders and $19.95 for Nasdaq orders below 5000 shares. This is less than a third of what a customer would typically have to pay with a traditional trading service!

If you are competing against organisations such as E*Trade, you have to seriously reconsider your strategic choices and re-evaluate your cost structures. Charles Schwab and other competitors have been forced to respond to ongoing competitive shifts in the Marketspace and are moving aggressively into the electronic medium. In fact, Charles Schwab expects to sign up more customers in the next 12 months over the Internet than they have in the past decade through every other available channel!
Reuters has developed a vast and sophisticated presence in the Marketspace. Reuters’ web site is a sprawling set of inter-linked pages which integrate seamlessly with its extensive network of joint ventures, subsidiaries and other on-line information companies. While product information and the opportunities to set up accounts or purchase on-line information are available in abundance on the Reuters website, the use of the Internet to seamlessly integrate with other partner organisations is a particularly innovative feature of Reuters Marketspace presence. For Reuters, the Marketspace is clearly a place to both promote and to distribute its information products and services in collaboration with its business network partners.

Of some concern is the fact that about one third of the evaluated organisations have only rudimentary facilities for electronic commerce. These organisations may soon find themselves at a strategic disadvantage in the rapidly evolving Marketspace. The message is clear: if your organisation does not already have facilities for full electronic commerce, this should be one of your top strategic priorities!

Degree of Effectiveness of Marketspace Presence

Figure 2 depicts the subjective assessment of the evaluating team of the degree of overall effectiveness of the Marketspace presence of the surveyed organisations ranging from poor (level 1) to excellent (level 7). The Marketspace presence of about half of all organisations is not very effective. Organisations in this category include leading names from all sectors.

Some organisations are wrongly treating the Marketspace as primarily a one-way medium. For example, Adidas’s Marketspace presence provides no way to get in touch with the organisation through the Internet. There are no phone numbers, no e-mail addresses, except for the webmaster who does not even work for Adidas! A call to the Adidas’ US headquarters revealed that they do not accept e-mails form outside the company. This speaks volumes for the desire of the company to build customer relationships in the Marketspace!

Other organisations are simply extending their paper-based communication mechanisms on-line and missing the commercial potential of the Marketspace. For example, Hoechst views its Marketspace presence largely as a corporate communication tool and not as a commercial tool. Hoechst does not have any product information on its site and neither attempts to learn about visitors to its web site nor engage them in any meaningful interaction. A quick visit to the
Marketspace presence of some of Hoechst’s competitors reveals the ample opportunities that Hoechst is missing.

About half of the surveyed organisations have effective web sites as perceived by visitors to their sites. They have succeeded in building Marketspace sites which are open and inviting to visitors, present relevant information to potential customers and allow customers to conduct all or partial commercial transactions on-line. This is supported by recent data which show that an increasingly large number of people are using the Marketspace to collect product information and make purchase decisions. It is clear that companies that do not make the paradigm shift to the commercial potential of the Marketspace face an uphill battle in the coming years. The responsibility for this paradigm shift lies with the senior management of organisations as opposed to technology staff. It is not clear if managers in most organisations recognise this fact.

The Marketspace Model

The model underlying the study consists of two perspectives: a technology perspective and a business perspective as depicted graphically in Figure 3.

![Figure 3: The Marketspace Model](image)

The technology perspective includes two fundamental characteristics of the Internet and the WWW:

- Interactivity: due to the real-time on-line nature of the Internet, relationships between organisations and customers are becoming more interactive in the Marketspace. This is enhancing the richness of customer relationships and creating new paradigms of product design and customer service; and

- Connectivity: the open and global nature of the Internet is fostering the creation of a shared global Marketspace. The radical increase in connectivity enabled by the Internet is giving rise to new communication and co-ordination mechanisms both across organisations and customers, and also within groups of customers themselves.

The business perspective includes the four P's - Product, Price, Promotion and Placement (or Distribution) and one C - Customer Relationships. The technology perspectives of increased interactivity and connectivity are having a fundamental impact on the business perspectives - the nature of the “four P’s and one C” - in the Marketspace.

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4 The term Product is used to refer to both tangible/intangible products and services.
The electronic medium of the Marketspace is transforming the fundamental nature of products, and causing dramatic shifts in the manner in which they are priced, promoted and distributed to customers. For example, the information content of traditional 'hard' products is increasing. Images and specifications of traditional 'hardware' components such as doors and windows are now stored in 'soft' digital formats and distributed electronically by software companies to architects and designers. In the near future, customers will be able to access on-line libraries of such 'soft' representations and purchase individual elements, on demand and in real-time.

The Marketspace gives organisations the ability to customise their product's characteristics to the needs of specific customers and to customise their pricing strategies for specific customer profiles. For example, when a reader buys a newspaper, he typically pays a 'price' for the entire contents of the paper. The typical reader is not interested in all that a newspaper contains. Suppose that our hypothetical reader is only interested in the Sports and Business sections. Further, assume that the newspaper is available in an on-line version (as is today true for most major publications). Then the Marketspace can be used to allow this reader to buy and pay for only those elements of information which interest him. This is precisely what the on-line publishing companies are offering customers today - Wired Ventures offers personalised news which can be e-mailed directly to customers.

**Transforming Business in the Marketplace**

The interactivity and connectivity characteristics of the Marketspace are clearly transforming the way in which organisations design their products, decide upon pricing strategies, reach customers to distribute products and build customer relationships. Figure 4 depicts the overall degree of technological sophistication of the surveyed web sites and the overall degree of transformation of the organisation's business model in the Marketspace (see Box Inset II for details on the parameters along which the transformations are measured).

As evident from Figure 4, most organisations have made progress in improving the technological sophistication of their Marketspace presence. This reflects both ongoing improvements in web-technology and the focus of efforts within most organisations to build visually appealing, easy to search and informative web sites.

The scores along all five business dimensions are very poor, both individually and in comparison with the score for technological sophistication. It is evident that while most surveyed organisations have succeeded in building technically acceptable sites, they have done
little to exploit the unique interactivity and connectivity characteristics of the Marketspace. The score along the product dimension is higher in relative terms due to the increasingly prevalent practice of organisations making product related information available on-line. However, most organisations have not done much to either customise products on-line or to involve customers in the specification and design of products. There is much to be learnt from information-based companies who have long involved customers actively in different aspects of their business.

For example, ‘closeness to customers’ is very evident in the Marketspace presence of Wired Ventures. Customers are closely involved in the design and development of products. Convenient on-line customer services are offered and feedback from customers is actively and frequently solicited. Wired Ventures is also using the Marketspace to create an innovative two-way flow of information between the company and customers. A customer can enter live chat rooms and engage in talk sessions on various topics. Reputed authorities frequently come on-line to moderate and direct these discussions. Wired Ventures is innovatively using the Marketspace to create a cyber-community which will remain linked to its web site.

Pricing is an area where most organisations have done very little beside simply displaying prices on-line. As a customer engages in real-time interactions with organisations, it is conceivable for customers to negotiate prices directly with organisations. As organisations learn more about specific customers, these prices can be set uniquely for individual customers. In fact, these negotiations can extend across a set of customers. For example, airlines such as Cathay Pacific and American Airlines now routinely auction tickets over the Internet. Customers are invited to submit electronic bids for tickets and an electronic clearing mechanism decides which customer obtains which ticket at what price.

The Marketspace also increases the transparency of prices to customers and will require organisations to rethink their pricing strategies. For example, airlines have traditionally flourished on discriminatory pricing. Customers on a plane usually travel in full ignorance of the fare that their fellow passengers have paid. Today airlines such as American Airlines and United Airlines typically display all different possible fares with their associated restrictions on their web pages. A customer viewing fares between two cities, say London and New York, can easily see how the trans-Atlantic fares can vary for the same class of travel by a factor of four or more!

In summary, most organisations are simply taking their existing business models and transporting them to the Marketspace. Few organisations are seriously evaluating the transformational impact of the Marketspace on their current business models. Most firms seem to be content to view the Internet as an extension of the telephone - simply ‘yet another’ channel. Firms which do not realise the paradigm shift inherent in the Marketspace are in for a shock in the next years.

The responsibility for moving ahead does not lie with technology staff. In fact it is relatively simple technologically for organisations to create a presence in the Marketspace. Rather, the important challenge is in getting senior management to show leadership in thinking through the strategic implications of the Marketspace and then provide the right organisational support to move ahead. The Marketspace has arrived. You cannot afford to miss it!
Part II: Sectoral and Regional Comparisons

One hundred and fifty companies were included in the ‘Competing in the Marketspace’ study. The distribution of the evaluated companies across sectors and geographical regions is indicated in Figure 5.

Figure 5 (a): Distribution of organisations across geographical regions

Figure 5 (b): Distribution of organisations across sectors
Regional Comparisons

The extent and sophistication of presence in the Marketspace varies across geographical regions along different dimensions. Figure 6 depicts the regional variations in the extent, the degree of perceived effectiveness, and the level of technological sophistication of the Marketspace presence of the surveyed organisations. It is evident that North American companies have succeeded in establishing a more comprehensive Marketspace presence as compared with Western Europe and Asia. This is not surprising because the Internet was born in the USA and North American organisations continue to be at the leading edge of the Marketspace revolution. Even today, a dominant majority of all Internet transactions occur within the USA.

![Figure 6: Regional variations in degree and sophistication of Marketspace presence](image)

The dynamic vitality of the high technology sector in the USA, coupled with the unique, fertile environment for entrepreneurship has in recent years created a rush of new ventures which continue to push the boundaries of the Internet revolution. Feeding off some of the best brains in the high technology sector, Internet-related start-ups continue to breed faster than rabbits in Silicon Valley. While the success of Netscape has become part of techno-folklore, new companies keep emerging to try and emulate its success. More than 40 percent of all the Bay Area’s new jobs during the last year sprouted out of the growth of the Internet according to Palo Alto’s Collaborative Economics.

The Marketspace revolution in North America is creating a rush of new business ideas. For example, Travelocity is an on-line travel reservation service started as an alliance between Worldview Systems Corporation and SABRE Interactive in 1996. Beside allowing customers to conveniently book airlines, rental cars and hotels, Travelocity also offers GeoEnabled maps which allow travellers to quickly find shops, restaurants, sporting events and other points of interest. Additionally, the on-line company offers travel packages, cruises and a shopping section featuring travel-related goods.

The excitement surrounding the Marketspace has touched virtually everyone. In the last couple of years, students from leading MBA programmes have successfully started and sold (prior to graduation!) several Internet companies - often for seven figure amounts!
The excitement and fertile environment for Marketspace growth is not replicated in most European and Asian countries and this partially accounts for their lagging positions in Figure 6. Most European and Asian companies have only recently set up a Marketspace presence and many have simply taken their paper-based company literature and dumped them on-line. For example, the web site of the Samsung group, while being an excellent site in terms of visual design and ease of navigation, is filled with information on the Chairman's vision, commitments and values. Details on product features and prices are not provided. It is clear that Samsung views its Marketspace presence merely as an aid to sell its corporate image as opposed to integrating it into its business.

Even venerable European organisations such as the Union Bank of Switzerland have done little to embrace the potential of the Marketspace. Despite the radical transformation underway in financial services with the growth of organisations such as E*Trade and Security First Network Bank, UBS's web site, while aesthetically pleasing, offers its visitors little more value than a short brochure. There is no way for a customer to interact with the bank, check account status or request additional information. There are no products, no catalogues and no services on-line. UBS seems to have restricted its presence in the Marketspace to a mere billboard.

Unfortunately, there is widespread scepticism and ignorance about the long term business impact of the Marketspace in Europe and Asia. Internet-related start-ups have a difficult time to obtain support from both venture capitalists and the traditional business community. Several bright minds from these regions have been forced to seek support and capital in the USA for their Internet start-ups. How can Europe and Asia hope to be at the leading edge of the Marketspace revolution when they are driving the best minds away?

![Figure 7: Degrees of transformation along the Marketspace model dimensions](image)

Figure 7 depicts the degree to which organisations in different geographical regions have transformed their business along the business dimensions of the Marketspace model - the 4 Ps and 1 C - to exploit the potential of the Marketspace. North American organisations again, in general, lead both European and Asian firms. While this lead is not surprising, it is interesting to note that the overall level of achievement for North American firms is quite low along all dimensions. This reflects the fact that firms, regardless of regional origins, are largely
transferring their existing business models onto the Internet. This means that all hope is not lost for European and Asian rivals. They can catch up and perhaps surpass their North American rivals by taking some time today to rethink the transformational impact of the Marketspace and integrate the business potential of the Internet into their current strategies.

**Sectoral Comparisons**

There is also a wide variation in the extent and sophistication of Marketspace exploitation across sectors as shown in Figure 8. Software related organisations have a clear lead over other sectors. This is not surprising given the origins of the Internet in the software industry and the natural affinity of software products and services for the electronic medium. For most software related organisations, the Marketspace represents an incredible opportunity to effortlessly reach customers, costlessly distribute products and fruitfully involve customers in software development efforts.

![Figure 8: Sectoral variations in degree and sophistication of Marketspace presence](image)

'Soft' sectors such as software, financial services and media and publishing have a natural edge over 'hard' sectors such as traditional manufacturing and chemicals and pharmaceuticals. The inability to deliver physical products on-line does limit the degree to which organisations in 'hard' sectors can exploit the commercial abilities of the Marketspace. However, several organisations with 'hard' products are going to great lengths to exploit the potential of the Marketspace. For example, Nissan's web site provides a number of interesting features beside a comprehensive catalogue of information about its products. It allows customers to undertake a virtual test-drive of its products which both educates as well as entertains visitors. Pricing information is available through links to dealer sites where financing options are also clearly explained for different categories of customers. Promotional products such as screen savers
with Nissan products are offered for free downloading by customers. Numerous e-mail links are also provided to enable customers to provide feedback to the company.

Of some concern is the low score of the surveyed organisations from the retail sector. Even a leading American retailer such as Macy's offers an extremely limited website. Only about 30 items are listed on Macy's web site and there does not seem to be any plans to either open a 'virtual store' or offer the entire range of Macy's products on-line. Customer service in Macy's leaves much to be desired - seven e-mails to Macy's on-line customer service by the evaluating team did not elicit any response!

The degree of technical sophistication of the web sites is relatively high across all sectors except for the financial services and retail/wholesale sectors. This is unfortunate, because both of these sectors have traditionally used information technology intensively and can benefit tremendously from the potential to innovate commercially in the Marketspace.

Figure 9: Degrees of transformation along the Marketspace model dimensions

Figure 9 depicts the degree to which organisations in different sectors have transformed their business along the business dimensions of the Marketspace model - the 4 Ps and 1 C - to exploit the potential of the Marketspace. In general, soft sectors such as software and financial services lead other sectors in the degree to which they have embraced the potential of the Marketspace. The degree of transformation is highest along the Product dimension and least along the Price aspect.

Software organisations have long been at the forefront of the Marketspace revolution. For example, BlackSun is a privately held software company with headquarters in Munich and San Francisco that builds 3-D interactive forums for the WWW. Its seven founders, all in their 30's, are from Europe. According to a product manager at BlackSun, 'community in the business space really translates into collaboration'. In line with this philosophy, BlackSun...
takes full advantage of the Marketspace to both create networks with other organisations and to help customers make links among themselves. BlackSun collaboratively markets its products as plug-ins for other products such as Netscape’s Navigator. Customers can download BlackSun’s product, CyberGate over the web. Customers are encouraged to find bugs and have the chance to win prizes by participating in the beta testing of products. BlackSun includes on its site, a model of the Atlanta Braves’ stadium where fans can ‘talk’ to other fans and participate in contests to win prizes. Another unique feature was a virtual treasure hunt, the 1996 CyberRoute contest, in which customers had to explore six cities in the United States. BlackSun also keeps track of customer profiles by requiring them to register while participating in various on-line, interactive games and forums. BlackSun and other software firms have succeeded in exploiting the interactivity and community inherent in Marketspace. Other organisations and sectors would do well to learn from them.

Products are increasingly being moved on-line, starting with usually detailed product information and in some cases, including the abilities to customise products on-line to individual customers. For example, Bank of America allows Home Banking through its web site. Customers can access their bank account, get information on current balances, and perform transactions such as pay bills and transfer funds across accounts. A particularly innovative service offered by Bank of America on its web site is called ‘Build your own Bank’. The bank allows for customers to customise the nature and type of banking services and information which they desire. Not only is comprehensive, up-to-date information available on all products and services, but Bank of America is actively using the ability of the Marketspace to interact with and customise its offerings for individual customers.

There are also stark contrasts in the way organisations from the same sector approach the Marketspace. Consider the examples of Shell and Elf Aquitaine. Even though neither organisation can physically supply oil over the web, their web sites are a study in contrasting approaches. Shell’s Marketspace presence is comprehensive, visually appealing with animation and video clips, and contains detailed information on not only its history and financial situation, but also on its products, processes, people and plans. Shell offers special promotional side-products such as baseball caps, figurines and co-sponsorship items which can be ordered and paid for on-line. Shell focuses on providing a high quality of customer service and offers numerous opportunities for customers to ‘speak’ to the company, such as through its ‘Making Connections’ page. It also guarantees a reply any inquiry within 48 hours, something which was verified by the evaluating team. In contrast, Elf Aquitaine’s Marketspace presence is relatively simple both technically (it is visually simple and lacks any animation or video clips) and strategically, being aimed at simply promoting an institutional image of the company and hardly anything else. Interactions with customers are not encouraged and customer feedback and/or service options are not provided.

It is obvious that much more needs to be done by firms in all sectors to exploit the commercial potential of the Marketspace. The lead will probably be taken by sectors whose products/services are naturally ‘soft’ and can be distributed on-line. However, other sectors should not be content ‘following’ simply because their products cannot be physically distributed on-line. The information content of ‘hard’ products - such as product information, product availability information and distribution status information - can all be distributed on-line (witness the on-line order-tracking available at the Internet presence of leading package delivery service organisations such as Federal Express and UPS). Customers can also be engaged in relationships with organisations on-line. The Marketspace is great for two-way interactive communications between organisations and customers - a learning process for both parties. Chat-rooms and on-line forums are innovative ways to exploit the connectivity of the Marketspace to build communities of customers and to build special relationships both across customers and between organisations and customers.

This use of the Marketspace is not limited just to individual customers. The Marketspace can also be used equally effectively for business partners. Organisations have successfully partitioned their Internet web sites for specific business partners. GE Information Services and
Netscape have formed a joint venture to explore web-based EDI, a development which can radically transform all electronic relationships across organisations.

The Marketspace is changing the business world. This is true for all regions, for all sectors and for all types of commercial relationships. Managers have to question the degree to which their organisations are changing with the changing world. Or they risk being left with corporate dinosaurs.