INDIAN ECONOMIC OUTLOOK (2003-04)¹

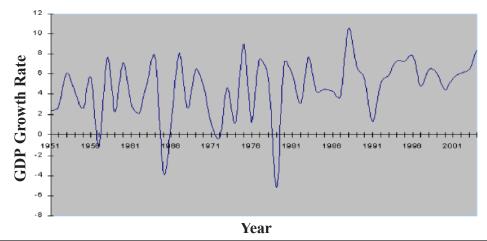
Economics' experts and various studies conducted across the globe envisage India and China to rule the World in the 21st century. For over a century the United States has been the largest economy in the World but major developments have taken place in the World economy since then, leading to the shift of focus from the US and the rich countries of Europe to the two Asian giants - India and China.

The rich countries of Europe have seen the greatest decline in global GDP share by 4.9 percentage points, followed by the US and Japan with a decline of about 1 percentage points each. Within Asia, the rising share of China and India has more than made up the declining global share of Japan since 1990. During the seventies and the eighties, ASEAN countries and during the eighties South Korea, along with China and India, contributed to the rising share of Asia in World GDP.

Expectations are that the share of the US in World GDP is to fall (from twenty-one percent to eighteen percent) and that of India to rise (from six percent to eleven percent in 2025), and hence the latter will emerge as the third pole in the global economy after the US and China.

By 2025 the Indian economy is projected to be about sixty percent the size of the US economy. The transformation into a tri-polar economy will be complete by 2035, with the probability that the Indian economy would be little smaller than the US economy but larger than that of Western Europe. By 2035, India is likely to be a larger growth driver than the six largest countries in the EU, though its impact will be a little over half that of the US.

India, which is now the fourth largest economy in terms of purchasing power parity, is expected to overtake Japan and become third major economic power within 10 years.



India GDP Growth Rate

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A growth rate of above 8% was achieved by the Indian economy during the year 2003-04 and in the advanced estimates; Indian economy has been predicted to grow at a level of 6.5 to 7%. Growth in the Indian economy has steadily increased since 1979, averaging 5.7% per year in the 23 year growth record. In fact, the Indian economy has posted an excellent average GDP growth of 6.8% since 1994 (the period when India's external crisis was brought under control). However, in comparison to many East Asian economies like Hong Kong, Singapore, South Korea, etc. having growth rates above 7%, the Indian growth experience lags behind.

THE THREE SECTORS OF INDIAN ECONOMY¹

Agriculture: More than 58% of country's population depends on agriculture, a sector producing only 22% of GDP. The agriculture and allied sector witnessed a growth of 9.1% in 2003-04, which fell steeply to 1.1% in 2004-05. A favorable monsoon facilitated an impressive growth rate of 9.6% preceded by the negative growth during the year 2002-03. However, deficient rainfall from the southwest monsoon is estimated to have caused a significant decline in kharif crops production in the year 2004-2005.

Industry: Index of Industrial Production (IIP) which measures the overall industrial growth rate, was 10.1% in October 2004 as compared to 6.2% in October 2003. The double digit in IIP was aided by a robust growth of 11.3% in the manufacturing sector followed by mining and quarrying and electricity generation. But industrial production saw a decline in December 2004 when IIP dipped to 8%. Thus one of the critical challenges facing Indian economic policy consists in devising strategies for sustained industrial growth. India's conformity with the international intellectual property system from January 1st 2005, has been a significant development in the World of commerce & industry.

Services: Service sector has maintained a steady growth pattern since 1996-1997, except into a fall in 2000-01. Trade hotels, transport & communications have witnessed the highest growth level of 10.9% in 2004, followed by financial services with an overall growth rate of -6.4 % and community, social & personal services -5.9% of all the three sectors, services have been the highest contributor to total GDP growth rate.

Information Technology Enabled Services (ITES), such as Business Process Outsourcing (BPO) have been growing rapidly in the recent past and will continue to rise. India's large number of English speaking skilled manpower has made India a major exporter of software services and software workers. However, the emergence of somewhat inexplicable protectionist tendencies in some developed countries is a disturbing trend. At the same time it is important that India sees BPO in a larger perspective, than the Internet, as India's share was just \$3.5 billion in December 2004 compared to the global market of US \$178 billion. Also India's outsourcing companies need to work more closely with their customers. In the complex BPOs, customers would like to have hybrid processes to control value. Indian companies need the right mix of domain expertise and process expertise. Further, mere knowledge of English is not sufficient; management skills are also needed. Education for the off shoring industry needs to be given impetus too.

STAGES OF EVOLUTION OF MNCS²

There are three stages of evolution of a multinational company which are listed and described as follows:

- 1. Export stage
 - Initial inquiries firm rely on export agents
 - Expansion of export sales
 - Further expansion of foreign sales branch or assembly operations (to save transport cost)
- 2. Foreign Production stage
 - > There is a limit to foreign sales (tariffs, non tariff barriers)
 - Direct foreign investment vs. licensing. Once the firm chooses foreign production method of delivering goods to foreign markets, it must decide whether to establish a foreign production subsidiary or license the technology to a foreign firm.

	Licensing	Foreign Direct Investment
a.	Licensing is usually the first experience as it is easy to obtain.	a. Probability of FDI as the first step is generally low.
b.	It does not require any capital expenditure.	b. It requires the decision of top management because it is a crucial step.
c.	It is not risky.	c It is risky because of lack of information.
d.	Payment is a fixed percentage of sales.	d. Plants are established in several countries.
e.	The parent firm cannot exercise any managerial control over the licensee.	d. Licensing is switched from independent producers to ITES subsidiaries.
f.	The licensee may transfer industrial secrets to another independent firm, thereby creating a rival.	f. Export continues.

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3. Multinational stage

The company becomes a multinational enterprise when it begins to plan, organize and coordinate production, marketing, research & development, financing and staffing function. For each of these operations, the firm must find the best location.

GLOBALIZATION: A DRIVER TO MULTINATIONALISM

Post 1991, after India faced the worst economic crunch in terms of its forex reserves, it was none other than our then Finance Minister Dr. Manmohan Singh who gifted India with liberalization. The License Raj and the large number of trade barriers were intended to be done away with. Opening up the economy (to MNCs and foreign investors) including the core and financial sectors to private and foreign companies transformed India into a land of opportunities. The Industrial Policy of 1991 drastically affected the growth of Indian businesses by making trade boundaries more permeable.

For example, Aditya Birla group got into acquiring or setting up joint ventures abroad; ITC ramped up its distribution channels in foreign markets to boost exports. Reliance Limited globally sourced its raw material; companies such as Lupin, Arvind Mills, Maruti Limited increased their capacity to achieve global economies of scale; Chevro Shoes and Hero Cycles registered their brands in foreign markets; Asian Paints, CEAT and UB Group started setting up offshore manufacturing facilities.

INDIA GOES GLOBAL³

The liberalisation of the Indian economy has had a stimulating effect on the Indian business. Increased Indian participation in the world's economic activities is evident from the following stray facts:

- Indian exports' growth rate increased from 3.6% in 1992-93 to 22.2% in 1993-94. Infact, between 1990-91 and 1995-96, Indian exports increased more than three fold from Rs. 325,530 mn. to Rs. 1,064,650 mn.
- The number of proposals for overseas investments increased from 107 in 1992 to 230 in 1994.
- By the end of 1994, Indian companies had more than 500 overseas joint ventures spread across 69 countries and about 300 wholly owned subsidiaries in various countries including the US, the UK, Germany and Singapore.
- Once allowed to raise money from foreign capital markets, Indian firms fared exceedingly well; compared to \$240 mn. in 1992, the offering of Indian companies through Euro issues in 1994 grossed more than \$3.06 bn.

The outflow of foreign investment approved by the Indian Government doubled in 1992 (vis-à-vis approvals granted between 1975 to 1991) to Rs. 38.87 bn. This figure scaled to Rs. 88.53 bn. in 1993. This outflow was reciprocated by an inflow of foreign capital products and brands.

India's attractiveness increased with its ability to offer low cost labour, abundant natural resources, the world's third largest technically qualified population and relatively large and well-developed industrial infrastructure. FDI in India increased from \$68 mn. in 1990-91 to \$1,981 mn. in 1995-96. Between 1991 and 1993, the combined cumulative investments from US, UK, Germany and Japan increased from a mere \$127 mn. to \$1.7 bn.

September 1992, when the Indian stock markets were thrown open to Foreign Institutional Investors (FIIs), India offered tremendous opportunities. 22 FIIs by June 1993 had registered themselves with SEBI. This number went up to 55 in August 1993 and by April 1994 it further increased to 161.

INTRODUCTION TO MULTINATIONALS

An Indian MNC, a French MNC, a Dutch MNC, etc. – what could these terms mean? How can a company, which is said to be a multinational, belong to a specific country? The answer lies in the origin of the company. An MNC may belong to a specific country if its inception is in that particular country. By inception we could say the company's basic ideology and concept originated in the country. E.g. Nestle is a Swiss MNC because its concept of business and ideology originated in Switzerland.

A multinational corporation can be defined as one having a subsidiary or a branch or a place of business in two or more countries or operates in two or more countries or territories. Therefore, a multinational can be called so by virtue of its physical presence in two or more countries or by virtue of geographical scope of its operations in two or more countries. Multinationals are sometimes also referred to as 'transnational corporations'. The term 'multinational' is more of an American term whereas the term 'transnational' is European. Conservatively counted there are about 63,000 multinational corporations in the World.

⁵Among the Fortune 500, all major multinational corporations are either American, Japanese or European, such as Nike, Coca-Cola, Wal-Mart, AOL, Toshiba, Honda and BMW. On one side, they create jobs and wealth and improve technology in countries that are in need of such development and on the other hand, they may have undue political influence over governments, exploit developing nations and create a loss of jobs in their own home countries. Very large multinationals have budgets that exceed those of many countries. They can be seen as a power in global politics. Multinationals often make use of outsourcing as a strategy to produce certain goods for them.

MNCs vs. The Country's GDP Size



Wal-Mart Stores Revenues \$287,989 mn.



Royal Dutch/Shell Group Revenues \$268,690 mn.



General Motors Revenues \$193,517 mn.



Norway GDP \$250,805 mn.



South Africa GDP \$213,100 mn.



Nigeria GDP \$71,318 mn

Wal-Mart is bigger than Norway, Royal Dutch/Shell Group is bigger than South Africa and General Motors is over twice as big as Nigeria. Of the largest 100 economic actors in the World today, 51 are corporations and 49 are countries.

It has been estimated that the World's 500 largest companies controlled at least 70% of World trade, 80% of foreign investment, and 30% of global GDP. The 100 largest had assets of \$28,813 billion, of which 40% were located outside their home countries.

Multinationals World over are termed so due to there are ability to market their products and services in various countries. However, they are binational or national in terms of ownership and mangement personnel. To take an example, Royal Dutch/ Shell Group is binational in ownership and managerial personnel but multinational in product/services. The Prolasca in Nicaragua is national in production but

Challenges for Indian Multinationals

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multinational in ownership, marketing, finance and management. On the other hand, Unilever, which is now been multinational in terms of ownership as well as product/ services is a complete multinational.⁶

Thus, multinational companies may have their management as binational and their functions as multinational. We could also have multinational companies based on their pattern adopted in each of the functions such as marketing, production, finance and management.

The first multinational appeared in 1602 and was the Dutch East India Company *(Source: www.sabrizain.demon.co.uk/malaya/dutch1.htm)*. These corporations originated early in the 20th century and proliferated after World War II. Typically, a multinational corporation develops new products in its native country and manufactures them abroad, often in third World nations, thus gaining trade advantages and economies of scale. India was an appendage of Great Britain and the imperial preference policy of Great Britain converted India into an agricultural hinterland. The East India Company used to import raw materials from India at throwaway prices and export the finished goods at high price leaving their colony impoverished as a debtor country. During the last two decades of the 20th century many smaller corporations also became multinational, some of them in developing nations.

THE MULTINATIONAL LEXICON⁵

Foreign – Strange or outlandish, of another country, or society; and in our law, is used adjectively, being joined with drivers substantives in several senses. That which belongs to another; that which is strange; belonging to another nation or country; belonging to or subject to another jurisdiction; that which is out of a certain state, country, jurisdiction, etc; the correlative of "domestic." Of a foreign country.

Foreign company – The term means a company which is not a domestic company.

It means a body corporate incorporated outside India, and includes a firm or other association of individuals.

A foreign company must be deemed to carry on its business at its agent's office in India.

Foreign Corporation – *The term "foreign corporation" is used to designate a corporation created by or under the laws of a foreign country.*

A corporation that was organized and chartered by or under the laws of another State, government, or country (in Arizona, a California corporation is said to be a foreign corporation). - Also termed as alien corporation.

Multinational Company (MNC) – A company or corporation that has manufacturing or trading interests in two or more countries. It may take the form of a holding company based in one country with subsidiary companies in other countries.

A large scale business enterprise having their branches or collaborations with whole or majority ownership of interests in a number of countries.

Also called a multinational enterprise (MNE), a company that has facilities, such as those for production and marketing, in various countries other than its country of origin.

A large scale business enterprise having their branches or collaborations with whole or majority ownership of interests in a number of countries.

Multinational corporation – Corporation that has operations and offices in more than one country.

Transnational corporation (TNC) – Alternative term for a multinational company.

An enterprise consisting of commercial entities in more than one state that are linked by ownership or otherwise. Transnational corporations operate in such a way that they exercise a uniform, cohesive, and common policy in order to further their economic interests. This policy can allow them to wield significant influence over the activities of those states in which they carry out their commercial activities, i.e. by exerting pressure over the direction of domestic policy of the host states. (Oxford Law Dictionary, 5th Edn., 2003)

Transnational or multinational corporations (TNC or MNC) – Large corporations that play a key role in globalising the economy and exploiting and making best use of pools of cheap labour and natural resources in developing countries to increase their GDP.

Source: Advance Law Lexicon by P.Ramanatha Aiyar, Wadhwa Publications

MODES OF OPERATION IN INDIA⁴

A multinational corporation is a large firm with it's head office in one country and several business units operating overseas. The head office implies the prime operation base of the company. Thereafter to expand its operations, the multinational looks for markets in other countries.

To gain competitive advantage as also to capture sizable market share in the foreign markets the multinational may opt for various strategies. It could go in for forward integration or backward integration depending upon its core competencies and competitiveness in the respective sector. One other option that is available as well as beneficial is to acquire similar firms in other countries i.e., acquire similar units. Due to mergers, multinationals can save vital time on setting up their own plant and facilities and that too right from scratch. In other words, it gets access to a readymade plant or facility in the foreign market. Some types of mergers that a multinational can opt for are as under:

Vertical Corporations - These are corporations that have purchased the component businesses that make their product. For example, if Apple Computers bought Intel (the chip manufacturer), a plastics company (for the cases) a shipping company, a CD Rom maker, etc, they would be limiting their costs by purchasing the companies that they used to purchase component products from.

Horizontal Corporations - These are corporations that have purchased competing companies in an attempt to eliminate the competition and gain market share. It would be like IBM purchasing Compaq, Dell and Gateway. The FTC (Federal Trade Commission) watches this very carefully to ensure that anti trust laws are not violated. Some horizontal mergers may be illegal and are halted.

Conglomerates - This is when one company buys other companies that are unrelated to their core business in an attempt to diversify. Corporations may become conglomerates after becoming very large through mergers and acquisitions of a variety of businesses. Diversification is one of the main reasons for conglomerate mergers. By having component businesses each making unrelated products, the overall sales and profits will be protected. For example, isolated economic events, such as bad weather or the sudden change of consumer tastes, may affect some product lines at some point, but not all at one time. One classic conglomerate is ITC which at one point owned international long distance phone service (their original core business), the Sheraton Hotel chain, a large insurance company, a defence contractor and others.

Advantages of Multinationals	Disadvantages of Multinationals
• The foray of multinationals into a country requires labour thereby ensuring new job opportunities.	• Share of profit remitted to the parent company reduces the amount of money created.
• They will bring in advanced technology and management style.	• A strict money-making oriented approach of multinationals may prove to be non-beneficial.
• The pressure of competition forces companies to undertake product innovation as a result of which new and better products flock the market.	• High and regulated transfer prices may increase the costs of operations.
• Better logistics management and financial strength enjoyed by multinationals sets new standards in the prevailing markets	• The enormous financial strength and influence enjoyed by multinationals may be selfishly utilized through political pressure.

MULTINATIONALS : ADVANTAGES AND DISADVANTAGES

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• Expands and creates new markets.	• Multinationals may abuse resources such as labour and natural resources to gain competitive advantage in international markets.
• Improves the income to the exchequer by way of direct and indirect taxes.	• Employees in developed nations are always under the threat of low job securities or loss of jobs.
• Provides economic support for developing nations.	

ORGANIZATIONAL DESIGN OF MULTINATIONALS⁷

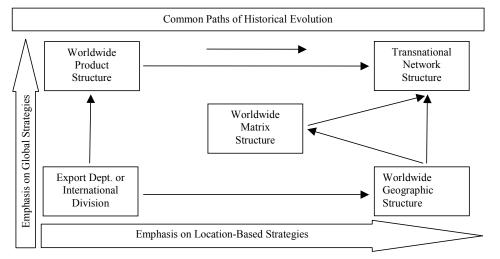
An organisational design determines how organisations structure their subunits and control & coordinate to achieve their goals. Flexibility in organisational design permits delivery of market specific products whereas efficiency allows delivery of low-cost products around the World.

The Nature of Organisational Design

A multinational company must ensure that its foreign operations support the objective of the parent company. Centralised or decentralised decision making is another factor that is considered as far as organisational design of multinationals is concerned.

There is no best organisational design. The choice of strategy determines the organisational design. For companies operating internationally the key issue is the degree to which a company has a local responsiveness or global strategic orientation.

The following figure shows the relationship between the choice of multinational strategy and the choice of organisational structure. The connections between the boxes for each strategy also show typical ways that multinational structure evolves.



Source: Chapter7, Organisational Design, Multinational Management by James Cullen

Challenges for Indian Multinationals

Most companies support their early internationalisation with export departments or international divisions. From there onwards depending upon their strategy, companies evolve into Worldwide product or geographical structures. Because of dual demands of local adaptation and pressures of globalisation many companies move towards a matrix or transnational network structure. Most companies never quite reach the pure matrix or transnational state. They adopt hybrid structures with some transnational and some matrix qualities. Recently because of globalisation of some products and the competitive efficiencies gained with global products, there is a growing tendency of large multinationals to give product divisions, increased power and to create more transnational subsidiaries.

Export Department or International Division is a department that coordinates and controls a company's export operations. When export becomes a significant portion of a company's sales and a company wishes to have greater control over its export operations, managers often create a separate export department. Managers in the export department often control the pricing and promotion of products in the international markets. When a company uses a direct exporting strategy, sales representatives located in other countries may also report to the export department management. As companies evolve beyond initial participation strategies of exporting and licensing, they need more sophisticated organisational structures to implement more complex multinational strategies.

In the **Worldwide geographic structure**, regions or large market countries become the geographical divisions of the multinational company. A multinational company has geographical units representing regions of the World. Since a company with a multidomestic or regional strategy needs to differentiate its product or services by country or by region, it needs an organisational design with maximum geographical flexibility. The semiautonomous regional or country-based subunits of the Worldwide geographic structure provide that flexibility to tailor or develop products that meet the particular needs of the local or geographical market. Large differences in an area's product or service needs or in channels of distribution enhance the need for a geographic structure.

Product divisions form the basic units of **Worldwide product strategies**. Each product or service division assumes responsibility for producing and selling its products or services throughout the World. The product structure supports strategies that emphasize the production and support of Worldwide products. It is usually considered the ideal structure to implement an international strategy. In the international strategy, the company attempts to gain economies of scale by selling Worldwide products with most upstream activities based at home. P&G is moving towards the Worldwide product structure.

To balance the benefits produced by geographic and product structures and coordinate a mixture of product and geographic subunits, some multinationals create a **Worldwide matrix structure**. The Worldwide matrix structure enables a firm to pursue global and local strategies at the same time. Geographical divisions focus on national responsiveness while product divisions focus on finding global efficiencies. The matrix structure works well only when there are equal demands from the environment for local adaptation and for product standardisation with its associated economies of scale. Without these near or equal demands the matrix structure turns out to be a geographic or product structure, based on which side is more important for competitive advantage. The Royal Dutch/Shell Group recently phased out the Worldwide matrix structure due to the bureaucracy it created to adopt the product structure.

The **transnational network structure** represents the newest solution to the complex demand of being locally responsive while taking advantage of global economies of scale and seeking location advantages such as local sources of knowledge. Like the matrix the transnational network tries to get advantage of the various structural options. It combines functional, product and geographic subunits. However, unlike the symmetrical product structure the transnational has no basic form. It has no symmetry or balance between the geographic and product sides of the organisation. Nodes, the units at the centre of the network, coordinate product, functional and geographical information. Different product-group units and geographical-area units have different structures and often no two subunits are alike. Rather, transnational units evolve to take advantage of resources, talent and market opportunities wherever they exist in the World. The Dutch multinational Phillips Electronics N.V. is one example of a transnational network.

INDIAN MULTINATIONALS⁴

When some major Indian business houses established Greenfield manufacturing joint ventures abroad, but most of them, with the exception of the AV Birla group, did not do very well. The Birla group's own ventures abroad were as much the result of business opportunity there, as of the frustration with the denial of industrial licenses in India. The situation has, of course, changed dramatically over the last decade. India Inc. is flying high. Not only over the Indian sky. Many Indian firms have slowly and surely embarked on the global path and lead to the emergence of Indian multinational companies.

With each passing day Indian businesses are acquiring companies abroad becoming World-popular suppliers and are recruiting staff cutting across nationalities. While Asian Paints is painting the World red, Tata is rolling out Indicas from Birmingham and Sundram Fasteners nails home the fact that the Indian company is an entity to be reckoned with. The economic reforms that began in the early 1990s brought many large multinational companies to India. A major challenge for these corporations was to manage the interface of global corporate culture and India's powerful, traditional and widely varying cultural practices.

MULTINATIONALISM BY INDIA AND IN INDIA^{2,4}

Organizations now wish to concentrate on their core activities in order to increase market penetration and become more competitive. Therefore, it becomes essential for businesses to concentrate on what they do best and where they can add value in their value chains. With this, outsourcing has become a strategy for forward thinking by managers. It is not only respected for reducing costs, but also as a tool for adding value to business. It enables organizations to concentrate on their core business, carry out business re-engineering and provide information that is valid, timely and adequate to assist decision making at the top management level and quality and cost control at the middle and lower levels.

Multinationalism by India

In the past few years, whenever organizations around the World have outsourced activities to India, the Indian counterparts have helped to cut costs, while maintaining high quality. Moreover, all these cost and quality advantages are coupled with the use of state-of-the-art technologies.

Indian companies have created value and thereby helped organizations around the globe gain competitive edge. Many Indian companies themselves are now becoming multinationals. Indian direct investment abroad has now gone past the \$10 billion mark. And the driving forces are quite different from what they were during the 'Permit Raj'.

The situation has, of course, changed dramatically over the last decade. One can broadly classify Indian foreign direct investment under the following categories:

Backward integration:	Many large Indian companies in basic industry, such as steel, viscose fiber, copper and so on, have acquired upstream companies in resource-rich countries such as Canada and Australia.
Marketing:	Information technology and pharmaceutical sectors have also established a large number of companies outside India.While some of them are trying to develop stand-alone local operations, most act as marketing and market intelligence arms for the parent companies in India.
Energy security:	Some of the largest foreign investments have been made by ONGC. Its subsidiary, ONGC Videsh, is now active in
	$\mathbf{D}_{\mathbf{n}} = \mathbf{D}_{\mathbf{n}} + $

	15 countries in oil exploration. Other public sector companies like Indian Oil and Bharat Petroleum Corporation Limited are looking at retailing in Sri Lanka, Singapore and south-east Asia, while Hindustan Petroleum Corporation Limited was looking at an investment in a refinery in Saudi Arabia.
	Barring a major domestic oil find, Indian imports of oil will keep growing and, clearly, the ministry of petroleum is encouraging investments abroad, including In gas pipelines, to improve India's energy security. In size, if not in number, the oil and gas sector will probably remain the largest single foreign investor for the foreseeable future.
Forward integration:	Videsh Sanchar Nigam Limited and Reliance have bought underground telephone cable networks at what look like attractive prices, from companies in bankruptcy, as a measure of integrating their domestic telephone networks in the international market.
Business strategy:	Some Indian business groups are acquiring businesses abroad, in industrial countries as well, as a measure of conscious business strategy. The Tatas are, of course, leading the pack starting with the purchase of Tetley Tea some years back, National Steel in Singapore, Daewoo's commercial vehicle unit in South Korea, and so on. The Mahindras have also bought tractor companies as a part of deliberate growth strategy. So have some in the auto- ancillary sector.
	Indian banks and a few insurance companies have been operating abroad for a long time. There has not been much expansion of their activities over the last decade. It is only recently that they seem to be looking at acquiring or developing business abroad, much of which is still focused on non-resident Indians. The hotel industry also does not seem to have grown abroad fast in the last decade. The attraction of Indian companies as employers has increased in recent years — as witness the ability of companies like Ranbaxy, Jet Airways, and several Tata group companies to attract senior foreign nationals in top positions.
	Even at lower levels, many companies in the IT or business

processing outsourcing sector segment are able to attract junior or middle level personnel from Europe and the US to work for them in India. Working for an Indian company seems to be getting accepted as a respectable occupation even in the industrial countries.

Multinationalism in India - Outsourcing

The economic reforms that began in the early 1990s brought many large multinational companies to India. A major challenge for these corporations was to manage the interface of global corporate culture and India's powerful, traditional and widely varying cultural practices.

The story of outsourcing is about extremely fast-paced change. It has been affecting the lives of many. Interestingly, it had a quiet beginning in the early 1990s when pioneers such as GE, Citibank, Amex and British Airways set up captive units in India. Now this trend has burgeoned into a huge industry with third party Information Technology Enabled Services (ITES)/Business Process Outsourcing (BPO) companies bagging prestigious remote services projects from leading global organizations.

In 2003-04 alone, outsourcing in India grew over 25 per cent, and India continued its domination over other competing countries such as China, Ireland, Israel and the Philippines. Based on these factors, projections are flying thick and fast Refer bibliography 8-15 for the six points below __

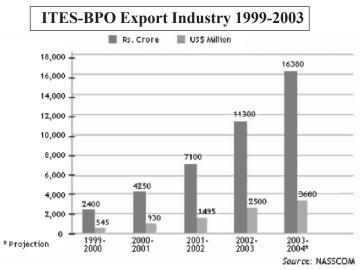
- The McKinsey Global Institute (MGI) estimates that the volume of offshore outsourcing will increase by 30 to 40 percent a year for the next five years.
- Forrester Research estimates that 3.3 million white-collar jobs will move overseas by 2015.
- In one May 2003 survey of chief information officers, 68 percent of IT executives said that their offshore contracts would grow in the subsequent year.
- The Gartner research firm has estimated that by the end of this year, one out of every ten IT jobs will be offshored.
- Deloitte Research predicts the outsourcing of two million financial-sector jobs by 2009.
- According to business intelligence major International Data Corporation (IDC), the IT enabled services market globally will account for revenues of US\$ 1.2 trillion by 2006 end. With growth projected at 11 percent annually, the Information Technology Enabled Services (ITES)/Business Process Outsourcing (BPO) segment will provide one of the most significant business opportunities for the Indian software and services industry.

Fortunately, India appears to be in a position to cater to the demands of the market. Its biggest strength is its vast supply of over 2 million graduates and 300,000 post graduates that pass out of its colleges each year. Its vast resource of English-speaking

college-educated workforce and low-cost labour gives it an edge in the offshoring World.

It isn't only the cost factor that continues to make India an attractive outsourcing destination. The quality of manpower combined with an extremely sophisticated vendor base and improvements in local infrastructure have put it ahead of other offshore destinations.

A review of Indians in one of the news articles abroad speaks as follows "New generation Indians employed in GE and other MNCs that grew up in posteconomically liberalised India, are a new breed with a zip in their step. They're hungry, they're energetic. They're demanding of their government. We interviewed so many of these call centre workers. You bring up Pakistan to them say, Pakistan? Kashmir? They'll say they got better things to do. It's about the global supply chain. You see, when India is part of GE's global supply chain, when they are actually involved in the day-to-day operation of GE's health care, call centers, payroll, they can't take a day off for war."



Indian manpower has been reputed as brilliant and educated. They have now taken lead in colonizing cyberspace. India and its millions of World-class engineering, business and medical graduates are becoming enmeshed in the global new economy in ways most people are only beginning to fathom.

Country	Spending (\$ Mn)		
	On ITES	On administrative	On property rentals
	workers	& general expenses	
US	\$42,927	\$8,571	\$1,500
India	\$6,179	\$1,000	\$847

(Source: NASSCOM)

Challenges for Indian Multinationals

US companies move their business services offshore so that they can make more money. That means wealth is created for the US as well as for the country receiving the jobs. **'Outsourcing causes unemployment'** is an economic myth. It is the figures that are driving the outcry against outsourcing. The truth is that most American jobs will remain unaffected since 70 percent of them require geographic proximity. Most jobs in the US are in service industries such as retailing, catering and personal care. This work, by its very nature, cannot be moved abroad.

Year	Jobs lost	Jobs created		
2000	52,000	55,000		
2001	67,000	85,000		
2002	82,000	110,000		
2003	104,000	119,000		
Total	305,000	369,400		
(Source: IDEE Desegueh)				

(Source: IBEF Research)

It is difficult to evidence the fact that jobs in the high-value-added sector are migrating overseas from the US. It is the standardised repetitive tasks such as data entry, accounting and IT support that are being outsourced.

An Institute for International Economics analysis of Bureau of Labour Statistics employment data revealed that the number of jobs in service sectors where outsourcing is likely actually increased, even though total employment decreased by 1.7 percent. According to the Bureau of Labor Statistics "Occupation Outlook Handbook," the number of Information Technology (IT)-related jobs is expected to grow 43 percent by 2010. The case of IBM reinforces this point: although critics highlight the outsourcing of 3,000 IT jobs, they fail to mention the company's plans to add 4,500 positions to its U.S. payroll. Large software companies such as Microsoft and Oracle have simultaneously increased outsourcing and domestic payrolls.

Delta Airlines outsourced 1,000 call-centre jobs to India in 2003, but the \$25 million in savings allowed the firm to add 1,200 reservation and sales positions in the US. The Forrester prediction of 3.3 million lost jobs, for example, is spread across 15 years. That would mean 220,000 jobs displaced per year by offshore outsourcing — a number that sounds impressive until one considers that total employment in the US is roughly 130 million, and that about 22 million new jobs are expected to be added between now and 2010. Annually, outsourcing would affect less than 0.2 percent of employed Americans.

A closer look at the benefits of US outsourcing in India:

• Every dollar that US companies spend on services that have been moved offshore, they save 58 cents, mainly in wages.

• Besides, Indian companies that provide offshore services need goods and services such as computers and telecommunications equipment and legal, financial and marketing expertise to do business. More often than not, they buy these from US companies such as Microsoft, Lucent, Carrier and Coke. A McKinsey report says that for every dollar of corporate spending that moves offshore, suppliers buy an additional five cents worth of goods and services from the US. Total exports from the US to India have grown from \$2.5 billion in 1990 to \$4.1 billion in 2002. The following estimates are based on data form the year 2002.

Offshoring value to the US (per US \$ 1 spent on offshoring)

Savings accruing to US investors, Customers	0.56 Cents
Import of US goods & services by providers	0.05 Cents
in India	
Transfer of profits by US-based providers in	
India back to the US	0.04 Cents
Net Direct benefits retained in the US	0.67 Cents
Indirect Benefits	0.45 to 0.47 Cents
Total benefits	<u>1.12 to 1.14 Dollars</u>
Source: McKinsey Globe	al Institute Report - Publication on

Ensuring India's offshoring future

Notes:

The above data is based on conservative estimates based on historical and reemployment wage levels; value created from improved global competitiveness of US companies and multiplier effect of increased savings would most likely increase the amount of value created.

Offshoring value to India (per US \$ 1 spent on offshoring)

Offshoring sector Labour	0.10 Cents
Profits retained in India	0.10 Cents
Suppliers	0.09 Cents
Taxes Central Government	0.03 Cents
State Government	<u>0.01 Cents</u>
Total benefits	<u>0.33 Cents</u>
Source: McKinsey C	Flobal Institute Report - Publication on
Ensuring India's off.	shoring future

Notes:

- 1. The above data includes revenue estimates accruing to supplier industries less sales taxes, income taxes for employees and corporate taxes
- 2. It also includes income tax from labour employed in both off-shore services

sector and supplier industries as well as corporate tax on second and third tier suppliers.

3. In further includes sales tax from second and third tier suppliers and revenue from sales of power to offshore services providers (providers earnings are tax exempt).

Many Indian offshore service providers are in fact US companies that repatriate earnings. Such companies generate thirty percent of the revenues of the Indian offshore industry. According to McKinsey estimates this accounts for an additional four cents of every dollar spent on off-shoring to create value for the US.

The savings made from sending jobs abroad can then be utilized to create new jobs. It is evident that the objections to off-shoring will soon die out as public awareness about its benefits begins percolating down to the individual consciousness.

The key trends in India which allure outsourcing are as follows:

- A number of leading software services companies made a foray into the ITES/ BPO domain, either directly, or through the mergers and acquisitions route. Most Indian IT leaders today such as Wipro, Patni, Satyam, HCL among others, have a presence in this market.
- Segments exhibiting maximum growth have been customer care and administration with growth estimates of over seven percent.
- The US and the UK markets are the source of maximum business for ITES/ BPO business in India.
- A large number of Fortune 100 companies are now exploring ITES/BPO from India.
- New opportunity areas include engineering design, biotech research, research outsourcing, customer analytics, market research and equity research.
- At least nine cities witnessed high ITES/BPO business penetration, with NCR (the National Capital Region) drawing the largest number of players. Some of the popular Information Technology Enabled Services (ITES)/Business Process Outsourcing (BPO) hubs included Mumbai, Bangalore, Chennai, Kolkata, Hyderabad, Kochi, Ahmedabad and Pune.
- Analysts are predicting a \$50 billion offshore market for high-end processes by 2010 as more businesses seek the benefits of offshoring.

DIFFERENT OPERATIONAL AREAS OF MULTINATIONALS

Software houses from India have effectively provided many of the Fortune 500 corporations with efficient software solutions. These solutions have helped these companies to be more responsive to their customers and more attractive to their shareholders.

Companies like Citibank, Morgan Stanley, AT&T, General Electric, Reebok, General Motors, Fujitsu, Boeing, Coca-Cola, Pepsi, Swissair and British Airways continue to remain ahead of their rivals due to the efforts of many software companies in India. This is a result of the government (in 1991) passing a series of favorable tax laws and building specialized commerce zones in order to stimulate industry activity. A wave of U.S. high-tech companies began rushing to India to set up sales and research & developement operations. Companies such as Computer Associates, Microsoft, Cisco, Baan, etc have turned to India for high value-added product development including conceptualization. Today the list of software multinationals operating from India reads the greatest names among global software giants - IBM, Microsoft, Novell, Computer Associates, Oracle, AT&T, Fujitsu, Motorola, EDS, SAP, Computer vision, Digital, Hewlett Packard, etc.

During 1998-99, more than 203 of the Fortune 1000 companies outsourced their software requirements to India. This has produced an industry realizing a compounded annual growth of 53.84% over the last five years (up to 2003-04) making India a growing source of Worldwide software development.

The improved infrastructure, combined with more favorable policies allow companies to begin following an outsourcing model, whereby companies could bring projects (and add more value) back to India. By leveraging India's inherently large English-speaking technical professionals and lower costs, **outsourcing** propelled Indian software industry to \$3.9 billion in 1998-99 from just \$835 million in 1994-95, according to NASSCOM.

However, the vast majority of this growth has been fueled by India's export software market using its offshore model. **Software exports** increased over threefold to \$2.65 billion in 1998-99 from only \$485 million in 1994-95.

Besides software and research & development, the following are different operational areas in which major companies are operating as multinationals in India.

- **Tata Motors** sells its passenger-car Indica in the UK through a marketing alliance with Rover and has acquired a Daewoo Commercial Vehicles unit giving it access to markets in Korea and China.
- **Ranbaxy** is the ninth largest generics company in the World. An impressive 76 percent of its revenues come from overseas.
- Dr Reddy's Laboratories became the first Asia-Pacific pharmaceutical company outside Japan to list on the New York Stock Exchange in 2001.
- Asian Paints is among the 10 largest decorative paints makers in the World and has manufacturing facilities across 24 countries.
- Small auto components company **Bharat Forge** is now the World's second largest forgings maker. It became the World's second largest forgings

manufacturer after acquiring Carl Dan Peddinghaus a German forgings company last year. Its workforce includes Japanese, German, American and Chinese people. It has thirty-one customers across the World and only thirtyone percent of its turnover comes from India.

- Essel Propack is the World's largest manufacturers of lamitubes; tubes used to package toothpaste. It has 17 plants spread across 11 countries and a turnover of Rs. 609.2 Crore for the year ended December 2003. The company commands a staggering 30 percent of the 12.8 billion-units global tubes market.
- About 80 percent of revenues for **Tata Consultancy Services** comes from outside India.
- Infosys has 49,422 employees including employees from over 33 nationalities other than Indian. It has (approximately) 30 marketing offices across the World and 26 global software development centers in the US, Canada, Australia, the UK and Japan.
- Sundram Fasteners is not merely a nuts and bolts company. It believes in thinking out of the box. Probably that is why it decided to acquire a plant in China. The plant in Jiaxin city in the Haiyan economic zone has ensured one fact: that its customers who were earlier buying Sundram products in Europe and the US, did not have to go far from home to access the product.

India Inc on a Buying Spree				
Company	Acquired Company	Price (\$ millions)		
Reliance Industries	Flag Telecom, Bermuda & Trevira, Germany	212 95		
Tata Motors	Daewoo, Korea	118		
Infosys Technologies	Expert Information & Services, Australia	3.1		
Bharat Forge	Carl Dan Peddinghaus, Germany	NA		
Ranbaxy	RPG (Aventis) Laboratories, France	NA		
Wockhardt	CP Pharmaceuticals, UK	18		
Cadila Health	Alpharma SAS, France	5.7		
Hindalco	Straits Ply, Australia	56.4		
Wipro	NerveWire Inc, US	18.5		
Aditya Birla	Dashiqiao Chem, China	8.5		
United Phosphorus	Oryzalin Herbicide, US	21.3		

Source: Wall Street Journal; IBEF Research (www.ibef.org))

Source: Wall Street Journal; IBEF Research (www.ibef.org)

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While the World was busy lauding the success of the fast-growing IT and services sector over the past few years, it did not notice the coming-of-age of the old economy brick and mortar businesses.

- Passenger car exports have nearly trebled in the past four years, from 28,122 units in 1998-99 to 1,30,000 units in 2003-04. Revenue from the export of passenger cars shot up 47.85 percent during April-May 2004-05 to Rs 7.16 billion from Rs 4.84 billion in the same period last year.
- Exports of two and three wheelers have crossed the 300,000 mark for the first time clocking around 3,33,000.
- Commercial vehicle exports have also increased to an all time high of over 17,000 as of 2004-05.
- In percentage terms the growth during the year over the previous year (2004-05) has been almost 80 percent for passenger vehicles, over 49 percent for two and three wheelers and over 40 percent for commercial vehicles.
- India's export of auto components crossed the \$1 billion mark in 2003-04. By March 2003, \$850 million worth of the nuts and bolts were exported, up from \$578 million in March 2002.
- Bharat Forge has grown from a turnover of Rs. 519 crore in 1997-98 to Rs 1,500 crore in 2003-2004. Its chairman and managing director Baba Kalyani says: "We are today the most profitable forgings company in the World and the Germans respect that. Today, we are not viewed as a company from the Third World ruling over a German firm."
- Vedanta Resources, the holding company of the Sterlite group raised a record \$1 billion last year in its maiden public offering on the London Stock Exchange (LSE). This was the largest sum garnered by an Indian company in overseas markets and the second largest IPO in Europe in 2003.
- In 2003-04, nearly Rs 2,500 Crore of the total turnover of **Hindalco** Rs 1,800 crore from copper and Rs. 620 crore from aluminum came from the international business, including exports from India. Another space which is seeing hectic activity is the pharma sector.
- **Ranbaxy** has set an aggressive target for itself to become a \$5 billion company by 2012. That would require a compounded annual growth rate in excess of 20 percent. Going by its present growth strategies, that goal should not be far away. The firm exports to over 70 countries, directly manages operations in 34 and manufactures in seven. It has 8,500 employees, of which 2,000 are overseas. Ranbaxy entered into research collaboration with GlaxoSmithkline Plc. which will be just another way in the company becoming a global player.
- **Dr. Reddy's Labs**, which is the second largest pharma company in the country, has operations in many countries with its markets being in US, India, the UK and other countries. The US and India contribute close to 70 percent of its

sales. Dr Reddy's boasts of six FDA inspected API (active pharmaceutical ingredients, or bulk) facilities and seven formulation plants, three of which cater to the US and European markets. It is also the only Indian company to have ever out-licensed three molecules to MNCs.

• Aurobindo Pharma is already part global with eight subsidiaries across the World, two JVs in the US and a new acquisition in China. Half of its revenues come from exports, which accounted for 47 percent of the total sales in 2002-2003. This strength is derived from its strong presence in emerging markets of Asia, Brazil and Latin America.

It's not only the private sector that is in aggressive mode. Even public sector units are rearing their heads to join the global Indian takeover race though for different reasons.

- In the last two years (2003-04 & 2004-05), **ONGC** has become a valuable company with a market capitalization of Rs. 122,000 crore. Now it wants to build bigger energy assets, both in India and abroad.
- The reasons **IOC** has for going global are, in comparison, more market-driven. Its chairman M.S. Ramachandran feels that Southeast Asia and Africa offers great opportunities for the corporation.

In fact, the number of acquisitions abroad has increased considerably in the past few years. Indian multinationals appear to be on a shopping spree. They have acquired 120 foreign firms between 2001-03 for a consolidated amount of \$1.6 billion and are now in the process of further expanding their mergers and acquisition activities to Spain, Brazil, the rest of South America and Europe.

High labour costs coupled with unwillingness of the locals to take up low-end jobs have opened up the prospects of foreign multinationals in Ireland outsourcing their work in India along with a large dose of investments. Information technology, biotechnology, engineering and financial services are sectors that Irish manufacturers are said to be keen on investing in.

INDIAN MULTNATIONALS VIS-À-VIS OTHERS

The following is a brief summary of the findings on parameters discussed between the four countries i.e. India, US, Japan and China for the year 2004-05^{16,17} with respect to number one company and number ten company in each country:

The financial data for Indian companies has been converted into the Dollar equivalent with the help of the prevailing rate as on 31^{st} March, 2005 i.e. 1 = INR 43.62 (taken from rbi.org.in).

India – US

Criteria	Rank.1 Company name (India - US)	India	US	India as
	Rank .10 Company name (India - US)	(\$ mn.)	(\$ mn.)	% of US
Revenues	Indian Oil Corporation Limited - Wal-Mart Stores	34,924.60	287,989.00	12.13
	Mangalore Refin. & Petrochem. Ltd. – IBM	4,788.40	96,293.00	4.97
Assets	State Bank Of India Limited – Citigroup	144,103.10	1,484,101.00	9.7
	HDFC Bank Limited – Wachovia Corp.	11,790.20	493,324.00	2.4
Profits	ONGC – Exxon Mobil	3,326.80	25,330.00	13.1
	TCS Limited – Johnson & Johnson	472.30	8,509.00	5.6
Profit	Mangalam Cement Limited – U.S. Bancorp	45.00	28.33	16.6*
Margin	Infosys Technologies Limited – Wells Fargo	26.50	20.7	5.8*
Asset	HCL Infosystems Limited – Plains All	5.20	6.64	1.5*
Turnover	American Pipeline			
	Nestle India Limited – Publix Super Markets	2.40	3.13	0.8*
ROI	Mangalam Cement Limited – Johnson & Johnson	89.61	15.96	16.6*
	Glaxosmithkline Pharmaceuticals Limited –	24.93	13.19	5.8*
	Nextel Communications			

Table 1

*Difference between India and US

India – Japan

Table 2

Criteria	No.1 Company name	India	Japan	India as %
	No.10 Company name	(\$ mn.)	(\$ mn.)	of Japan
Revenues	Indian Oil Corporation Limited – Toyota motors	34,924.60	172,616.30	20.23
	Mangalore Refin. & Petrochem. Ltd. –	4,788.40	46,962.70	10.20
	Tokyo Electric Power			
Assets	State Bank Of India Limited – Mizuho	144,103.10	1,337,648.40	10.77
	Financial Group			
	HDFC Bank Limited - Nippon	11,790.20	178,556.50	6.6
	Telegraph and Telephone			
Profits	ONGC – Toyota motors	3,326.80	10,898.20	30.53
	TCS Limited – Nippon Life Insurance	472.30	1,886.30	25.04
Profit	Mangalam Cement Limited – Mizuho	45.00	20.64	24.36*
Margin	Financial Group			
	Infosys Technologies Limited - Nissan Motor	26.50	5.97	20.53*
Asset	HCL Infosystems Limited – Mediceo Holdings	5.20	1.95	3.25*
Turnover	Nestle India Limited – Isuzu Motors	2.40	1.30	1.10*
ROI	Mangalam Cement Limited - Canon	89.61	9.07	80.54*
	Glaxosmithkline Pharmaceuticals	24.93	4.75	20.18*
	Limited – Denso			

*Difference between India and Japan

India – China

	Table 3			
Criteria	No.1 Company name	India	China	India as
	No.10 Company name	(\$ mn.)	(\$ mn.)	% of
				China
Revenues	Indian Oil Corporation Limited – Sinopec	34,924.60	75,076.70	46.52
	Mangalore Refin. & Petrochem. Ltd. – China	4,1788.40	19047.9	25.14
	Construction Bank			
Assets	State Bank Of India Limited – Industrial &	144,103.10	685,135.10	21.03
	Commercial Bank of China			
	HDFC Bank Limited - China Telecommunications	11,790.20	65,332.70	18.05
Profits	ONGC – China National Petroleum	3,326.80	87,57.1	37.99
	TCS Limited - China First Automotive Works	472.30	293.40	160.97
Profit	Mangalam Cement Limited –	45.00	30.70	14.31*
Margin	China Construction Bank			
	Infosys Technologies Limited –	26.50	1.60	24.92*
	Agricultural Bank of China			
Asset	HCL Infosystems Limited – Sinochem	5.20	3.30	1.89*
Turnover	Nestle India Limited – China Life Insurance	2.40	0.40	2.04*
ROI	Mangalam Cement Limited –	89.61	7.90	81.71*
	China National Petroleum			
	Glaxosmithkline Pharmaceuticals Limited - Sinopec	24.93	1.70	23.67*

*Difference between India and China

Japan – US

Table	4
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Criteria	No.1 Company name	Japan	US	Japan as
	No.10 Company name	(\$ mn.)	(\$ mn.)	% of US
Revenues	Toyota motors – Wal-Mart Stores	172,616.30	287,989.0	59.90
	Tokyo Electric Power – IBM	46,962.70	96,293.0	48.80
Assets	Mizuho Financial Group – Citigroup	1,337,648.40	1,484,101.00	90.10
	Nippon Telegraph and Telephone –	178,556.50	493,324.00	36.20
	Wachovia Corp.			
Profits	Toyota motors – Exxon Mobil	10,898.20	25,330.00	43.00
	Nippon Life Insurance – Johnson & Johnson	1,886.30	8,509.00	22.20
Profit	Mizuho Financial Group – U.S. Bancorp	20.64	28.33	7.69*
Margin	Nissan Motor – Wells Fargo	5.97	20.70	14.73*
Asset	Mediceo Holdings – Plains	1.95	6.64	4.69*
Turnover	All American Pipeline			
	Isuzu Motors – Publix Super Markets	1.30	3.13	1.83*
ROI	Canon – Johnson & Johnson	9.07	15.96	6.89*
	Denso – Nextel Communications	4.75	13.19	8.44*

*Difference between Japan and US

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The following is the comparison of some popular Indian multinationals with the tenth ranked companies in India with respect to assets, revenues, net profits, profit margin, asset turnover and ROI respectively.

Name	Assets	% of 1*	Revenues	% of 2*	Net Profit	% of 3*
	(\$ mn.)		(\$ mn.)		(\$ mn.)	
Mphasis BFL Ltd.	175.5	1.4	190	1.2	28.6	5.9
NIIT Ltd.	3,984	32.1	3,816	25.1	356	74
Bharat Forge Ltd.	300.4	2.4	372.9	2.5	37	7.7
Sundaram Fasteners	1504.2	12.1	2134.2	14	157	32.7
Ranbaxy	1265.3	10.2	1233.9	8.1	161	33.5
Wockhardt Ltd.	292	2.4	438.8	2.9	48.9	10.2
United Phosphorus	336.7	2.7	441.1	2.9	36	7.5
Dabur India Ltd.	352.4	2.8	214.4	1.4	36	7.5
Mahindra & Mahindra	2302.2	18.6	2,140.50	14.1	166.4	34.6
Jubilant Organosys	220.5	1.8	292	1.9	27.7	5.8
Dr. Reddys Laboratories	441.9	3.6	642.7	4.2	7.3	1.5
Torrent Pharma	1,367.60	11	1150.3	7.6	121.3	25.2
Sun Pharma	689	5.6	285.8	1.9	70.1	14.6
Hero Honda Motors	1970.8	15.9	755.7	5	185.8	38.6
Larsen & Toubro	3380.1	27.3	2984.2	19.6	257.7	53.6

Table 5

Table 6

Name	Profit	Diff.	Asset	Diff.	ROI	Diff
	Margin	from 4*	Turnover	from 5*		from 6*
Mphasis BFL Ltd.	15.00	11.80	1.10	1.50	16.30	8.70
NIIT Ltd.	9.30	17.50	1.00	1.60	8.90	16.10
Bharat Forge Ltd.	9.90	16.90	1.20	1.40	12.30	12.70
Sundaram Fasteners	7.40	19.40	1.40	1.20	10.40	14.60
Ranbaxy	13.00	13.80	1.00	1.60	12.70	12.30
Wockhardt Ltd.	11.20	15.60	1.50	1.10	16.80	8.20
United Phosphorus	8.20	18.60	1.30	1.30	10.70	14.30
Dabur India Ltd.	16.80	10.00	0.60	2.00	10.20	14.80
Mahindra & Mahindra	7.80	19.00	0.90	1.70	7.20	17.80
Jubilant Organosys	9.50	17.30	1.30	1.30	12.60	12.40
Dr. Reddys Laboratories	1.10	25.70	1.50	1.10	1.70	23.30
Torrent Pharma	10.50	16.30	0.80	1.80	8.90	16.10
Sun Pharma	24.50	2.30	0.40	2.20	10.20	14.80
Hero Honda Motors	24.60	2.20	0.40	2.20	9.40	15.60
Larsen & Toubro	8.60	18.20	0.90	1.70	7.60	17.40

Challenges for Indian Multinationals

Notes to table 5 and table 6 :

- 1*. The tenth rank in assets is that of Oriental Bank of Commerce (\$12395.6mn.)
- 2*. The tenth rank in revenues is that of National Thermal Power Corporation (\$15202.5 mn.)
- 3*. The tenth rank in profits is that of Bharat Petroleum Corporation Limited (\$480.8 mn.)
- 4*. The tenth rank in profit margin is that of Hindustan Zinc Limited (26.8%).
- 5*. The tenth rank in asset turnover is that of Mangalore Refinery & Petrochemicals Limited (2.6 times).
- 6*. The tenth rank in ROI is that of Nestle India Limited (25 %).

CONCLUSION

The 'gifted liberalization' has supported the Indian economy and enabled it with wheels of development and progress. Of the three Indian sectors i.e. Agriculture, Industry and Services, though the dependency on Agriculture is most, Services contribute largely to the Indian GDP. The Indian Service sector which now speaks of ITES and BPO has leveraged upon the skilled, educated and youthful population within India thereby providing required employment and forex inflow. The advent of multinationals in India has evolved through various stages but even as of now these companies have not come of age. Globalisation has, of course, provided wings to the activities of investment, financing and operations of Indian companies.

Whether multinational, transnational, international, foreign or non-Indian, these companies have been accepted by the Indian businesses – some as allies and some as adversaries. Whichever may be the case, Indian economy has ensured its development. It now becomes confusing to numerically differentiate a corporate and a country by its size of revenue or GDP respectively. However, huge or small, multinationals have their pros and cons.

Indian markets are now been viewed as growing and creation of new markets through exploration and experiment with the needs of the present cash rich Indian customer is underway. Maturity of industry and segments has urged leading Indian companies to now acquire markets and companies abroad. Though there can be basic distinctions between multinationals in terms of their organizational design, each multinational has customized its structure as per its objectives.

Indian multinationals have just begun to mark their global presence. The coming of age of these multinationals would mean revenues, profits and assets at par with those leading in the World. Indian multinationals are performance-wise improving every year. But what still matters is global presence and reach to a much larger extent.

NOTES TO ANNEXURES 1, 2 & 3

The following study involves comparison of India Inc.'s performance vis-à-vis the performance of the US, Japan and China. It aims to bring out cultural differences prevailing within Indian organizations and those of other nations. Before going further, it is clearly stated that the data with respect to Indian organizations has been made available through the internet (courtesy equitymaster.com) and was available in Rupees-Millions. This financial data was converted into the Dollar equivalent with the help of the prevailing rate as on 31st March, 2005 i.e. 1 = INR 43.62 (taken from rbi.org.in). The financials of US companies have been taken from the Fortune 500 magazine. It has been assumed that the organizations topping the charts in Fortune 500 are those top in their own countries as well (the sheer size of their financials makes them leaders in their own nations).

The comparisons bring out different trends that are being followed lately in the top companies of India and the US. India has been taken as a center and the quality as well as quantity of the financials of its top companies has been compared with those of the US.

The comparison has been structured as follows:

> Summary of the findings

➢ Revenue

Industry ProfileProduct/Service Profile

> Assets

Industry Profile
Product/Service Profile

> Profits

Industry Profile
Product/Service Profile

> Profit Margin

- S Industry Profile
- Service Profile
- ✤ Profit Margin of Companies top in Profit
- Section Profit Margin of Companies top in Revenues

> Asset Turnover

- ✤ Industry Profile
- Service Profile
- Sector Asset Turnover of Companies top in Revenues
- ✤ Asset Turnover of Companies top in Assets

> ROI

- ✤ Industry Profile
- Service Profile
- ✤ ROI of Companies top in Profits
- ✤ ROI of Companies top in Assets
- $\$ ROI of Companies top in Profit Margin
- ✤ ROI of Companies top in Asset Turnover

The comparison of India-US is an elaborated one. The other comparisons i.e. India-Japan and India-China are concised ones, based on the same lines of India-US.

ANNEXURE 1: CROSS CULTURAL COMPARISON OF INDIAN & AMERICAN MULTINATIONALS

SUMMARY OF THE FINDINGS

- 1. The size of revenues, asset and profits of Indian companies is pygmalion as compared to those of the US.
- 2. The scope for improvement in revenue generation of the top ten (revenue) Indian companies is eight to twenty times.
- 3. The scope for improvement in asset size of the top ten (assets) Indian companies is ten to fifty times.
- 4. The scope for improvement in profits of the top ten (profits) Indian companies is eight to twenty times.
- 5. With respect to top ten profit margin companies, India stands ahead of the US. The difference in profit margin gradually reduces as the ranks decrease. The average difference is about 12.21percent.
- 6. With respect to the top ten asset turnover companies, the US stands ahead of India. The difference in asset turnover reduces as the ranks decrease. The average difference is about 1.06 times.
- 7. With respect to the top ten ROI companies, India is far ahead as compared to the US. The difference in ROI reduces as the ranks reduce. The ROI of the top ten companies of the US is between thirteen to sixteen percent.
- 8. The industry profile of the top ten revenue companies in case of the US is diversified whereas it is dominated by petroleum companies in case of India.
- 9. The industry profile of the top ten assets companies in case of the US is entirely dominated by banking and financial services whereas in case of India, dominance is by banking companies.
- 10. The industry profile of the top ten profit companies in case of the US is diversified whereas in case of India it is dominated by petroleum companies.
- 11. The industry profile of the top ten profit margin companies in case of the US as well as India is diversified.
- 12. The industry profile of the top ten asset turnover companies in case of the US as well as India is diversified.

- 13. The industry profile of the top ten ROI companies in case of the US is diversified whereas pharmaceutical companies dominate in the Indian context.
- 14. The product / service profile of the top ten revenue companies is in the ratio of 7:3 in case of the US whereas it is 8:2 in case of India.
- 15. The product / service profile of the top ten asset companies is entirely held by service industries in case of the US whereas it is 4:6 in case of India.
- 16. The product / service profile of the top ten profit companies is in the ratio of 6:4 in case of the US whereas it is 8:2 in case of India.
- 17. The product / service profile of the top ten profit margin companies is in the ratio of 4:6 in case of the US whereas it is 6:4 in case of India.
- 18. The product / service profile of the top ten asset turnover companies is in the ratio of 6:4 in case of the US whereas it is 7:3 in case of India.
- 19. The product / service profile of the top ten ROI companies is in the ratio of 9:1 in case of the US whereas it is 8:2 in case of India.
- 20. With respect to profit margin of top ten profit companies, six Indian companies are ahead of their US counterparts.
- 21. With respect to profit margin of top ten revenue companies, six American companies are ahead of their Indian counterparts.
- 22. With respect to asset turnover of top ten revenue companies, seven Indian companies are ahead of their US counterparts.
- 23. With respect to asset turnover of top ten asset companies, nine Indian companies are ahead of their US counterparts.
- 24. With respect to ROI of top ten profit companies, seven Indian companies are ahead of their US counterparts.
- 25. With respect to ROI of top ten asset companies, seven Indian companies are ahead of their US counterparts.
- 26. With respect to ROI of top ten profit margin companies, seven Indian companies are ahead of their US counterparts.
- 27. With respect to ROI of top ten asset turnover companies, all Indian companies are ahead of their US counterparts.

REVENUES

Economists are of the view that India in the long run would be an economic superpower standing at par with the US. The revenues of the top ten companies in both the countries have been listed below :

Rank	US Companies	*Revenues	Indian Companies	#Revenues	# as
2005		(\$ Mn)		(\$ Mn)	% of *
1	Wal-Mart Stores	287,989.0	Indian Oil Corporation Ltd.	34,924.6	12.13
2	Exxon Mobil	270,772.0	Bharat Petroleum	16,977.6	6.27
			Corporation Ltd.		
3	General Motors	193,517.0	Reliance Industries Ltd.	16,778.1	8.67
4	Ford Motors	172,233.0	Hindustan Petroleum Corp.	15,765.4	9.15
			Ltd.		
5	General Electric	152,866.0	ONGC	14,307.1	9.36
6	Chevron	147,967.0	State Bank Of India Ltd.	10,201.5	6.89
7	Conocco Phillips	121,663.0	Steel Authority Of India	7,743.8	6.36
			Ltd.		
8	Citigroup	108,276.0	NTPC	5,391.1	4.98
9	American International Group	97,987.0	Tata Motors Ltd.	5,205.9	5.31
10	IBM	96,293.0	Mangalore Refin. &	4,788.4	4.97
			Petrochem Ltd.		

Table 1

From what is apparent in the table above, the difference between revenues of the top ten Indian and American companies for the year 2004-05 is vast. The American companies tower their Indian counterparts. Except for IOC which is above ten percent of the revenue of Wal-Mart and two other companies (HPCL and ONGC) which have revenue sizes of approximately ten percent of their respective US counterparts, all others are too small in size of revenue to be even compared. A graph displays the difference visually. What can be inferred is that revenues of top ten Indian companies are within the range of five to twelve percent of their respective American counterparts. Mangalore Refineries and Petrochemicals Limited (tenth rank) is twenty times behind as compared to International Business Machines and ONGC (first rank) is about eight times behind Wal-Mart in terms of revenue generation. Thus, the extent of increase required on the Indian side can be measured. A representative graph is as follows :

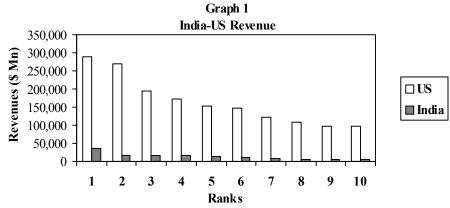
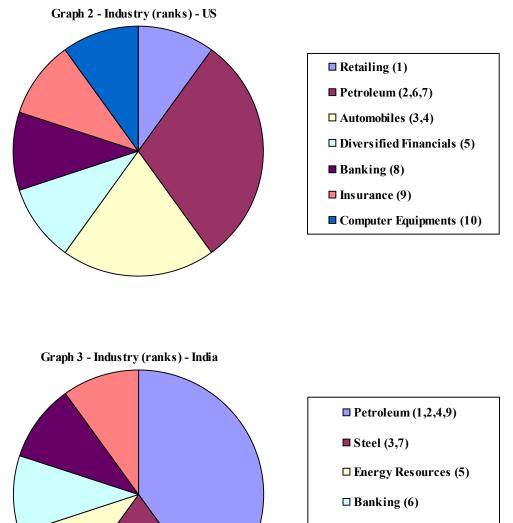




Table	2
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Rank 2005	US Industry Profile	Indian Industry Profile
1	Retailing	Petroleum
2	Petroleum	Petroleum
3	Automobiles	Petroleum
4	Automobiles	Petroleum
5	Diversified Financials	Petroleum
6	Petroleum	Banking
7	Petroleum	Steel
8	Banking	Energy
9	Insurance	Automobiles
10	Computer Equipments	Petroleum

The Indian industry profile has seven petroleum companies. The US top ten, however, has three petroleum giants namely Exxon Mobil, Chevron and ConoccoPhillips. Thus, both countries have a majority of petroleum companies among the ones earning most revenue. Where India, on one hand, has one Automobile company i.e. Tata Motors Limited, US has two automobile manufacturers which are General Motors and Ford Motors. The profile of the remaining US companies consists of retailing (Wal-Mart), diversified financials (General Electric), Banking (Citigroup), Insurance (American International Group) and computer equipments (IBM). The rest of the Indian counterparts are from energy (NTPC) and banking (SBI). The following pie diagrams display the industries to which the top ten companies (in terms of revenue) belong.





Softwares (10)

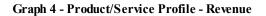
Challenges for Indian Multinationals

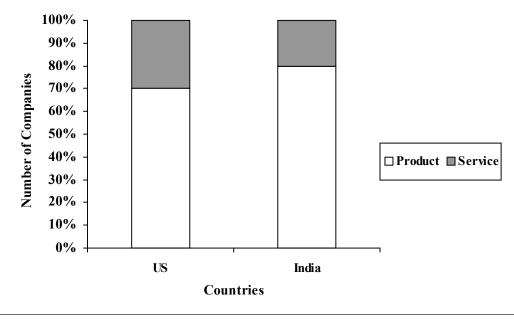
Product / Service Profile – Revenue

Rank	US	Indian
2005	Companies	Companies
1	Product	Product
2	Product	Product
3	Product	Product
4	Product	Product
5	Service	Product
6	Product	Service
7	Product	Product
8	Service	Service
9	Service	Product
10	Product	Product

Table 3

The table displays the product/service profile of the top ten companies. It highlights what the top companies offer i.e. a product or a service. It is evident that in both countries a majority of companies with the largest revenues are those which offer products. In case of the US the product/service ratio for the top ten companies in terms of revenue is 7:3 and in case of India the ratio is 8:2.





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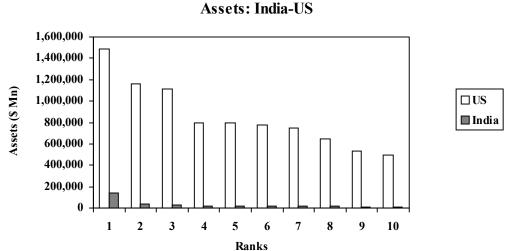
ASSETS

The table below gives the ranks of the top ten Indian and US companies with respect to assets :

Rank	US Companies	*Assets	Indian Companies	#Assets	# as
2005		(\$ Mn)		(\$ Mn)	% of *
1	Citigroup	1,484,101.0	State Bank Of India Ltd.	144,103.1	9.7
2	J.P. Morgan Chase& Company	1,157,248.0	ICICI Bank Ltd.	40,906.4	3.5
3	Bank Of America Corporation	1,110,457.0	Punjab National Bank	29,368.1	2.6
4	American International Group	798,660.0	Bank Of India	21,802.4	2.7
5	Freddie Mac	795,174.0	Reliance Industries Ltd.	18,640.7	2.3
6	Morgan-Stanley	775,410.0	ONGC	17,981.9	2.3
7	General Electric	750,507.0	Indian Oil Corporation Ltd.	17,913.2	2.4
8	Merill Lynch	648,059.0	NTPC	15,202.5	2.3
9	Goldman Sachs Group	531,379.0	Oriental Bank Of Commerce	12,395.6	2.3
10	Wachovia Corp.	493,324.0	HDFC Bank Ltd.	11,790.2	2.4

Table 4

In case of assets, the percentage of assets of Indian companies seem to be within the range of two to ten percent of the assets of their American counterparts. This depicts the size of the US economy and their dominance in the world market. Banks and financial institutions hold the largest of assets in both the cases (quite obvious). The scope for improvement in terms of asset size ranges from fifty times (in case of the tenth ranked HDFC bank) to ten times (in case of first ranked State Bank of India). However, Indian companies should make sure that assets are acquired and used optimally. The subsequent graph enlarges the numerical difference in a more simple manner.



Graph 5 Assets: India-US

Challenges for Indian Multinationals

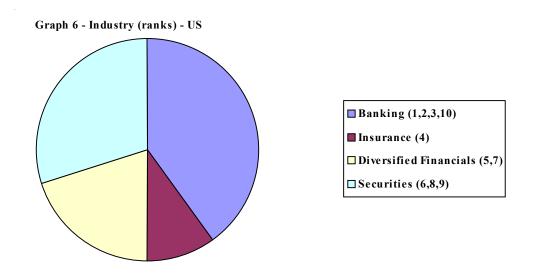
Industry Profile – Assets

The Industry profiles of the top ten companies in terms of assets would appear as follows:

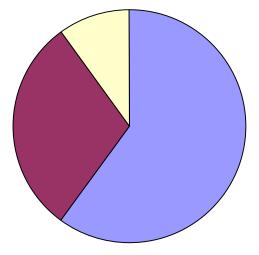
Rank	US Industry	Indian Industry
2005	Profile	Profile
1	Banking	Banking
2	Banking	Banking
3	Banking	Banking
4	Insurance	Banking
5	Diversified Financials	Petroleum
6	Securities	Petroleum
7	Diversified Financials	Petroleum
8	Securities	Energy Resources
9	Securities	Banking
10	Banking	Banking

Table 5

The industry profile of the companies top in assets consists mostly of banks and financial companies. In fact, for the US, Finance and Financial Services is the only profile when it comes to assets. In case of India, sixty percent of the cases are of banking, thirty percent of petroleum and ten percent of energy resources. The following pie diagrams depict a lucid image of what the industry profile is:



Graph 7 - Industry (ranks) - India



Banking (1,2,3,4,9,10)

■ Petroleum (5,6,7)

Energy Resources (8)

Product/Service Profile - Assets

The following is the product/service profile of the companies :

Table o						
Rank	US	Indian				
2005	Companies	Companies				
1	Service	Service				
2	Service	Service				
3	Service	Service				
4	Service	Service				
5	Service	Product				
6	Service	Product				
7	Service	Product				
8	Service	Product				
9	Service	Service				
10	Service	Service				

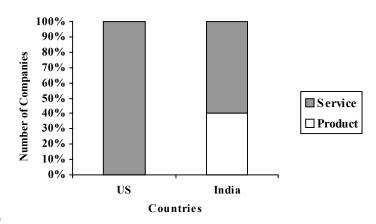
Tabla 6

The top ten companies in case of assets, from the US, are each from the service industry. Contrastingly, the top ten companies with respect to asset size in case of India are not from the service industries. Petroleum and energy resources are two sectors in India that compete well among the top ten in terms of assets. It can also be seen that in case of India the service profile is entirely held by banking whereas, in case of the US it is diversified into banking, insurance, diversified financials and securities.

The following graph provides an easy reference to the tabulated product/service profile data:

38

Graph 8 - Product/Service Profile - Assets



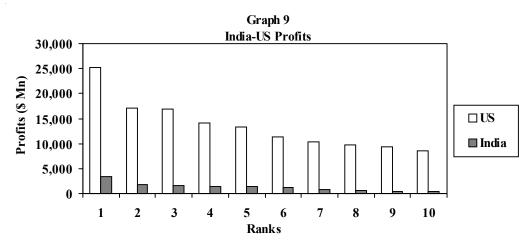
PROFITS

The profits of the top ten companies in the US and India are tabulated below :

Rank	US Companies	* Profits	Indian Companies	#Profits	# as
2005		(\$ Mn)		(\$ Mn)	% of
1	Exxon Mobil	25,330.0	ONGC	3,326.8	13.1
2	Citigroup	17,046.0	Reliance Industries Ltd.	1,748.8	10.3
3	General Electric	16,819.0	SAIL	1,594.1	9.5
4	Bank Of America Corporation	14,143.0	Indian Oil Corporation Ltd.	1,378.3	9.7
5	Chevron	13,328.0	NTPC	1,333.9	10
6	Pfizer	11,361.0	State Bank Of India Ltd.	1,255.7	11.1
7	Wal-mart Stores	10,267.0	TISCO	832.0	8.1
8	American International Group	9,731.0	ITC Ltd.	518.3	5.3
9	Altria Group	9,416.0	BPCL	480.8	5.1
10	Johnson & Johnson	8,509.0	TCS Ltd.	472.3	5.6

Table 7

The profits of Indian companies seem to have the best standing so far in terms of percentages of their respective US counterparts. ONGC's profits are about thirteen percent of those of Exxon Mobil's. Reliance Industries Limited, NTPC and State Bank of India stand at about ten percent of their respective US counterparts. The scope for improvement ranges to about twenty to eight times. A graphical picture of the above is as follows :



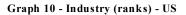
Industry Profile - Profits

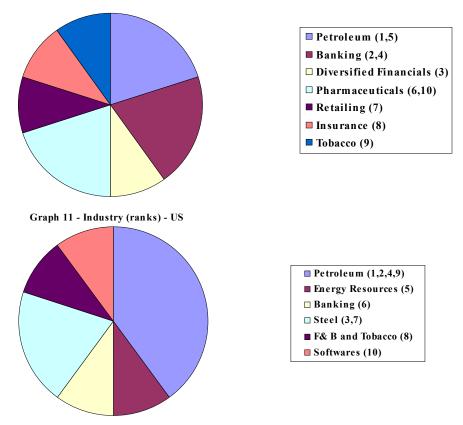
The industry profile would appear as follows :

Rank	US Industry Profile	Indian Industry
2005		Profile
1	Petroleum	Petroleum
2	Banking	Petroleum
3	Diversified Financials	Steel
4	Banking	Petroleum
5	Petroleum	Energy Resources
6	Pharmaceuticals	Banking
7	Retailing	Steel
8	Insurance	Food, Beverages & Tobacco
9	Tobacco	Petroleum
10	Pharmaceuticals	Softwares

Table	8
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Both countries have one company from the tobacco industry. The US has two companies from pharmaceuticals and two from petroleum whereas India has four from petroleum and two from steel. The US profile does not consist of software as one of the top most profitable companies, whereas India banks on one software company. The financial services industry does not seem to gain high priority in India. The pie diagrams for the industry profile of the top ten companies in terms of assets are as follows:





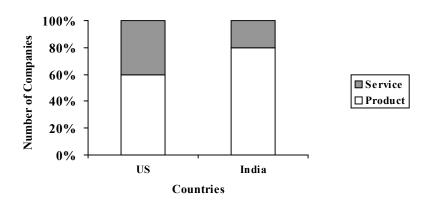
Product/Service Profile – Profits

The product/service profile of the top ten companies with respect to profit would be as follows :

Rank	US	Indian
2005	Companies	Companies
1	Product	Product
2	Service	Product
3	Service	Product
4	Service	Product
5	Product	Product
6	Product	Service
7	Product	Product
8	Service	Product
9	Product	Product
10	Product	Service

Table 9

The product/service ratio among the ten most profit making companies in the US is 6:4 whereas in case of India it is 8:2. For companies selling products in India profits are sizably more as compared to the ones selling services (among the top ten). The following graph makes the facts pictorially clear :



Graph 12 - Product/Service Profile - Assets

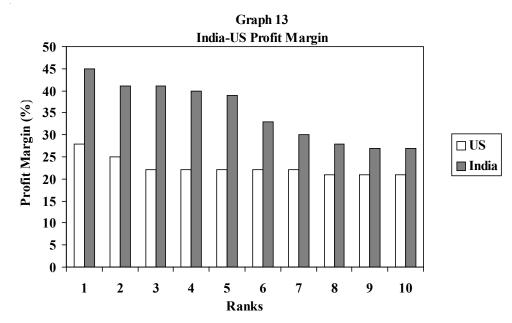
PROFIT MARGIN

The following companies are the ones with the highest profit margins :

Rank	US Companies	*Profit	Indian Companies	#Profit	Difference
2005		Margin		Margin	# - *
		(%)		(%)	
1	U.S. Bancorp	28.3	Mangalam Cement Ltd.	45.0	16.6
2	Merck	25.3	Shipping Corporation Of India	41.0	15.7
			Ltd.		
3	Nextel	22.4	Neyveli Lignite Corporation	40.5	18.1
	Communications		Ltd.		
4	Bank Of America	22.3	Great Eastern Shipping Co. Ltd,	40.2	17.9
	Corporation				
5	Microsoft	22.2	HDFC Ltd.	38.7	16.5
6	Coco-Cola	22.1	Television Eighteen India Ltd.	33.4	11.4
7	Intel	22.0	Sesa Goa Ltd.	30.2	8.2
8	Pfizer	21.5	National Aluminium Company	27.5	6.1
			Ltd.		
9	BellSouth	20.9	Hindustan Zinc Ltd.	26.8	5.8
10	Wells Fargo	20.7	Infosys Technologies Ltd.	26.5	5.8

Table 10

A graphical representation of the data in the table above is as follows.



A completely contrasting picture comes forward when the profit margins of the top companies of both the countries are compared. It is clear that in terms of profit margin-wise ranks of the top ten companies, India stands ahead of the US. It is therefore evident why India is being preferred for international investment. The difference in profit margin gradually reduces as the ranks decrease.

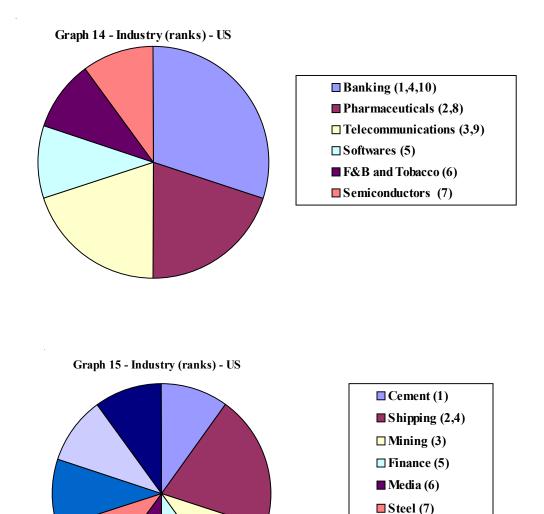
Industry Profile – Profit margin

The industry profile of the top ten companies with respect to profit margin is as follows :

Rank	US Industry	Indian Industry
2005	Profile	Profile
1	Banking	Cement
2	Pharmaceuticals	Shipping
3	Telecommunications	Mining
4	Banking	Shipping
5	Software	Investment & Finance
6	Food, Beverages & Tobacco	Media
7	Semiconductors &	Steel
	Other Components	
8	Pharmaceuticals	Aluminum
9	Telecommunications	Zinc
10	Banking	Softwares

Table 11

Banking in the US appears to give best margins with three of the top ten profit margin companies belonging to it. Popularity of giving good margins in the US also extends to the pharmaceutical (two companies) and telecommunications (two companies) industry. Just as banking in the US, metals (steel, aluminum and zinc) in India constitute a majority of the top profit margin companies. The top Indian companies with respect to profit margin is one that offers a product, whereas in the US it is one that offers a service.





Aluminium (8)

Software (10)

Zinc (9)

Product/Service Profile – Profit margin

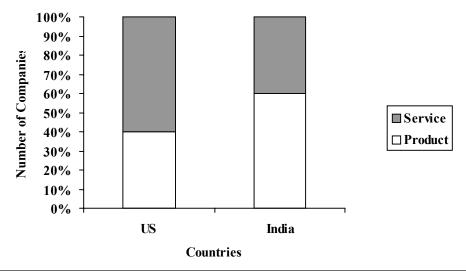
The product/service profile of the top ten companies with respect to profit margin is as follows :

Rank	US	Indian
2005	Companies	Companies
1	Product	Product
2	Service	Product
3	Service	Product
4	Service	Product
5	Product	Product
6	Product	Service
7	Product	Product
8	Service	Product
9	Product	Product
10	Product	Service

Table 12

With respect to profit margin, six out of top ten companies are those of the service industry in the US. In India the case is exactly opposite, six out of the top ten profit margin companies are those of the products or manufacturing/processing industry.

The graph of the tabulated data is as follows :



Graph 16 - Product/Service Profile - Profit Margin

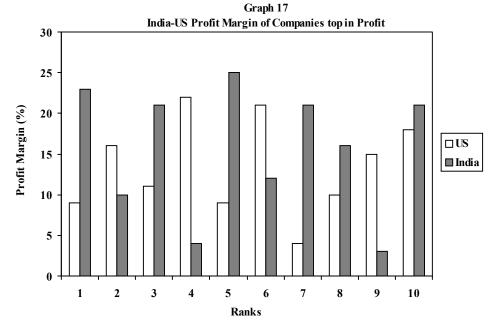
Profit Margins of Companies Top in Profit

The following table contains data on companies top in profit in both the countries and their respective profit margins :

Rank 2005	US Companies	*Profit Margin	Indian Companies	#Profit Margin	# - *
		(%)		(%)	
1	Exxon Mobil	9.4	ONGC	23.3	13.9
2	Citigroup	15.7	Reliance Industries Ltd.	10.4	(5.3)
3	General Electric	11.0	SAIL	20.6	9.6
4	Bank Of America Corporation	22.3	Indian Oil Corporation Ltd.	3.9	(18.4)
5	Chevron	9.0	NTPC	24.7	15.7
6	Pfizer	21.5	State Bank Of India Ltd.	12.3	(9.2)
7	Wal-Mart Stores	3.6	TISCO	20.8	17.3
8	American International Group	9.9	ITC Ltd.	16.2	6.3
9	Altria Group	14.6	BPCL	2.8	(11.8)
10	Johnson & Johnson	18.0	TCS Ltd.	21.2	3.2

Table 13

A graphical representation of the data in the table above is as follows :



Except for the second, fourth, sixth and the ninth ranks India stands ahead i.e. sixty percent of the top ten companies with respect to profit are ahead in terms of profit margin as compared to their US counter parts.

Challenges for Indian Multinationals

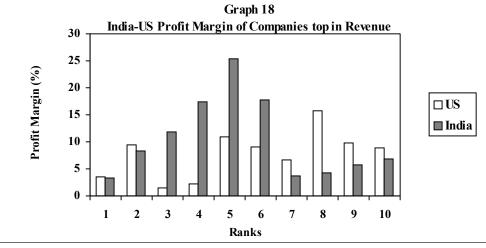
Profit Margins of Companies Top in Revenues

The following table depicts the profit margin of companies top in revenues for both the countries :

Rank	US Companies	*Profit	Indian Companies	# Profit	Difference	
2005		Margin		Margin	# - *	
		(%)		(%)		
1	Wal-Mart Stores	3.6	Indian Oil Corporation Ltd.	3.9	0.4	
2	Exxon Mobil	9.4	Bharat Petroleum	2.8	(6.5)	
			Corporation Ltd.			
3	General Motors	1.5	Reliance Industries Ltd.	10.4	9.0	
4	Ford Motors	2.2	Hindustan Petroleum Corp.	2.1	(0.2)	
			Ltd.			
5	General Electric	11.0	ONGC	23.3	12.3	
6	Chevron	9.0	State Bank Of India Ltd.	12.3	3.3	
7	Conocco Phillips	6.7	Steel Authority Of India Ltd.	20.6	13.9	
8	Citigroup	15.7	NTPC	24.7	9.0	
9	American International Group	9.9	Tata Motors Ltd.	6.1	(3.8)	
10	IBM	8.8	Mangalore Refin. &	4.2	(4.5)	
			Petrochem. Ltd.			

Table 14

Except in four cases, for the top ten companies with respect to revenues, the US is ahead in terms of profit margin as compared to India. Major differences arise in case of the last four ranks. Also the differences, where Indian companies are ahead, are much more as compared to the differences where US companies are ahead. It could be said that in terms of profit margin for the top ten revenue earning companies, if there exists differences where Indian companies stand ahead, the difference is higher as compared to the cases where US companies have higher profit margins. The following graph depicts the above table :



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ASSET TURNOVER

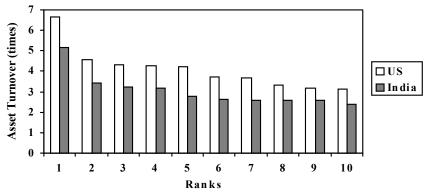
The following table shows the comparison of US & India in terms of top ten asset turnover companies :

Rank	US Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	* - #
		(times)		(times)	
1	Plains All American Pipeline	6.6	HCL Infosystems Ltd.	5.2	1.5
2	AmeriSource Bergen	4.6	Hindustan Petroleum	3.4	1.1
			Corp. Ltd.		
3	Tech Data	4.3	Bongaigaon Refinery &	3.2	1.1
			Petrochemicals Ltd		
4	McKesson	4.3	Kochi Refineries Ltd.	3.2	1.1
5	Express Scripts	4.2	Bharat Petroleum	2.8	1.4
			Corporation Ltd.		
6	Sysco	3.7	Hero Honda Motors Ltd.	2.6	1.1
7	Ingram Micro	3.7	Munjal Showa Ltd.	2.6	1.1
8	Medco Health Solutions	3.4	Marico Industries Ltd.	2.6	0.8
9	Costco Wholesale	3.2	Mangalore Refin. &	2.6	0.6
			Petrochem. Ltd.		
10	Publix Super Markets	3.1	Nestle India Ltd.	2.4	0.8

Table 15

The above table clearly shows the difference between the top ten companies in the US and India in terms of asset turnover, which is marginal within the range of 0.8 (Nestle India Limited ranked tenth) and 1.4 (HCL Infosystems Limited ranked first). This analysis also speaks about how Indian companies are able to keep pace with their American counterparts in terms of asset turnover irrespective of the economic environment prevailing in the respective countries. The following graph makes this more clear :





Industry Profile-Assets

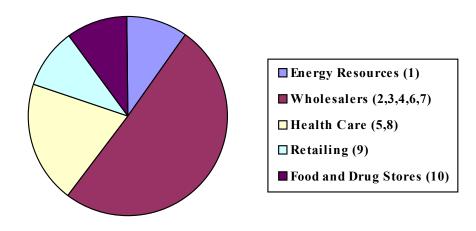
The industry profile would appear as follows :

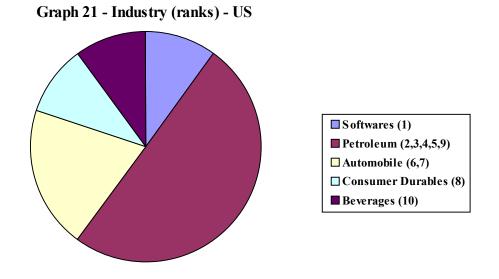
	Table To						
Rank	US Industry	Indian Industry					
2005	Profile	Profile					
1	Energy Resources	Softwares					
2	Wholesalers	Petroleum					
3	Wholesalers	Petroleum					
4	Wholesalers	Petroleum					
5	Health Care	Petroleum					
6	Wholesalers	Automobile					
7	Wholesalers	Automobile					
8	Health Care	Consumer Durables					
9	Retailing	Petroleum					
10	Food and Drug Stores	Beverages					

Table 16

Petroleum companies in India and the US have a high asset turnover. In the US, the ranks are first and fifth whereas in India they are second, fourth and ninth. The US also lists two companies each from banking and pharmaceuticals. India lists two companies from steel and one each from banking, energy resources and other industries.

Graph 20 - Industry (ranks) - US





Product/Service Profile - Profits

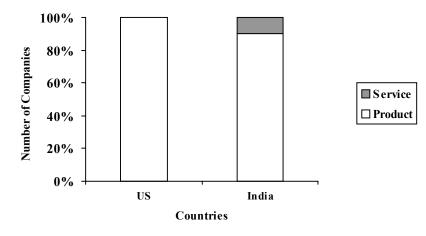
The product/service profile of the companies top in asset turnover is as follows :

Rank	US	Indian
2005	Companies	Companies
1	Product	Service
2	Product	Product
3	Product	Product
4	Product	Product
5	Product	Product
6	Product	Product
7	Product	Product
8	Product	Product
9	Product	Product
10	Product	Product

		-
Ta	ble	17

Sixty percent or six companies of the top ten in terms of asset turnover are those into products. In case of India it is seven companies. Services in both case i.e. the US and India are not top most in terms of asset turnover. The product/service graph is as follows :

Graph 22 - Product/Service Profile - Asset Turnover



Asset Turnover of Companies Top in Revenues

The following table shows the top ten companies in terms of revenues and their respective asset turnovers for both US & India :

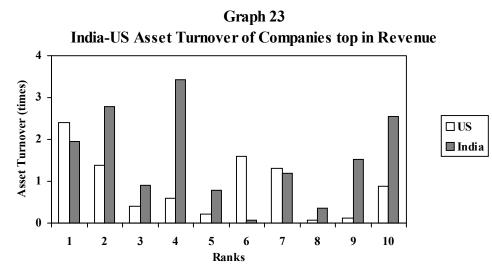
Rank	US Companies	*Asset	Indian Companies	#Asset	
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Wal-Mart Stores	2.4	Indian Oil Corporation Ltd.	1.9	(0.4)
2	Exxon Mobil	1.4	Bharat Petroleum	2.8	1.4
			Corporation Ltd.		
3	General Motors	0.4	Reliance Industries Ltd.	0.9	0.5
4	Ford Motors	0.6	Hindustan Petroleum Corp.	3.4	2.8
			Ltd.		
5	General Electric	0.2	ONGC	0.8	0.6
6	Chevron	1.6	State Bank Of India Ltd.	0.1	(1.5)
7	Conocco Phillips	1.3	Steel Authority Of India Ltd.	1.2	(0.1)
8	Citigroup	0.1	NTPC	0.4	0.3
9	American International Group	0.1	Tata Motors Ltd.	1.5	1.4
10	IBM	0.9	Mangalore Refin. &	2.6	1.7
			Petrochem. Ltd.		

Table 18

The above table shows some important facts which support the performance of the Indian companies with their American counterparts. Here, we can see that there are seven Indian companies which surpass the asset turnovers of their respective American counterparts with major differences. Thus, it could be said that the top ten Indian companies are more efficient in revenue generation than top ten American

companies in terms of asset turnover.

The following graph makes the above analysis attractive in a pictorial form :



Asset Turnover of Companies Top in Assets

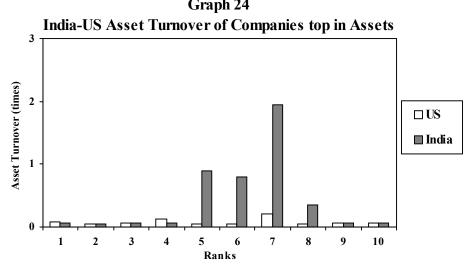
The following table depicts the top ten companies in assets and their respective asset turnover for both, US and India :

Rank	US Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Citigroup	0.07	State Bank Of India Ltd.	0.07	-
2	J.P. Morgan Chase & Company	0.05	ICICI Bank Ltd.	0.06	0.0
3	Bank Of America Corporation	0.06	Punjab National Bank	0.07	0.0
4	American International Group	0.12	Bank Of India	0.06	(0.1)
5	Freddie Mac	0.04	Reliance Industries Ltd.	0.90	0.9
6	Morgan-Stanley	0.05	ONGC	0.80	0.7
7	General Electric	0.2	Indian Oil Corporation Ltd.	1.95	1.8
8	Merill Lynch	0.05	NTPC	0.35	0.3
9	Goldman Sachs Group	0.06	Oriental Bank Of Commerce	0.07	0
10	Wachovia Corp.	0.06	HDFC Bank Ltd.	0.06	-

Table 19

The above table shows the similarity between asset turnover of companies top in assets which is almost similar except for the four companies where the difference is favorable towards Indian companies.

The graph below depicts the differences that occur between the Indian companies and their American counterparts. Graph 24

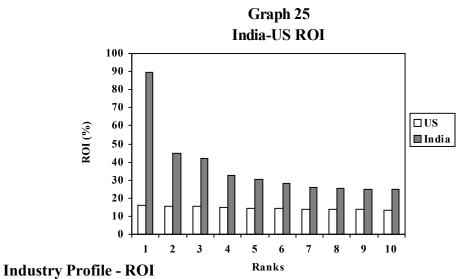


ROI

The further analysis is about ROI of top ten Indian and US companies as follows :

Rank	US Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Johnson & Johnson	15.96	Mangalam Cement Ltd.	89.61	73.65
2	Intel	15.61	Sesa Goa Ltd.	44.96	29.35
3	Coco-Cola	15.47	TCS Ltd.	42.12	26.65
4	PepsiCo	15.05	Abbott India Ltd.	32.78	17.73
5	3M	14.44	Bongaigaon Refinery &	30.63	16.19
			Petrochemicals Ltd		
6	Chevron	14.3	Infosys Technologies Ltd.	28.02	13.72
7	Anheuser-Busch	13.85	Aventis Pharmaceuticals	26.01	12.16
			Ltd.		
8	Publix Super Markets	13.74	P&GHygiene & Healthcare	25.37	11.63
			Ltd.		
9	Merck	13.66	Nestle India Ltd.	25.00	11.34
10	Nextel Communications	13.19	Glaxosmithkline	24.93	11.74
			Pharmaceuticals Ltd.		

The above analysis proves to be more favorable towards Indian companies. The data above shows that none of the American companies are close to their Indian counterparts in terms of ROI. Infact the difference is vast (highest being 73.65% among the first ranked companies of the two countries). This also means that (top ten ROI) Indian companies are able to profitably use assets better than the American ones. The top Indian companies try to give an ROI of at least twenty five percent whereas in the US this percentage is thirteen percent. It should also be noted that the size of the assets of the US companies is large as compared to the Indian ones. The actual challenge for Indian companies is to maintain these returns after attaining a size proportionate to the American companies. The following graph gives a holistic view of the tabulated data :

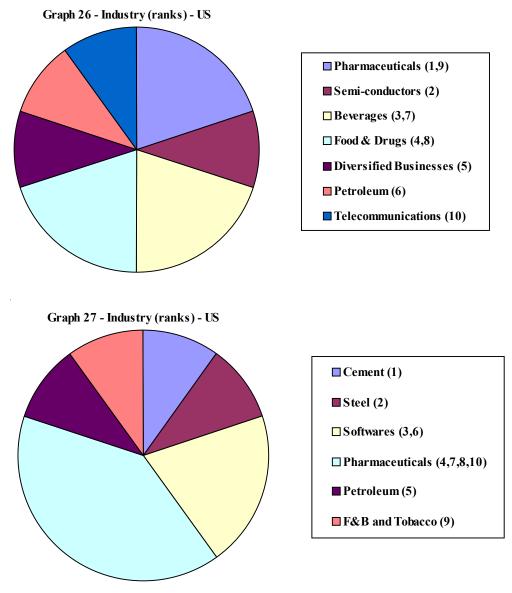


The industry profile would appear as follows :

Rank 2005	US Industry Profile	Indian Industry Profile
1	Pharmaceuticals	Cement
2	Semi-conductors	Steel
3	Beverages	Softwares
4	Food and Drugs	Pharmaceuticals
5	Diversified Financials	Petroleum
6	Petroleum	Softwares
7	Beverages	Pharmaceuticals
8	Food and Drugs	Pharmaceuticals
9	Pharmaceuticals	F&B and
10	Telecommunications	Pharmaceuticals

Challenges for Indian Multinationals

The above industry profile of both the countries has pharmaceuticals as a major contributor towards ROI among the top ten ROI companies - four companies on the Indian side and two companies on the US side. The other industries among the US top ten are (two companies) food & drugs and (two companies) beverages. The Indian side consists of two software companies. The remaining companies are from semi-conductors, diversified businesses, petroleum and telecommunications industry on the US side. The remaining companies in Indian case are from other industries.



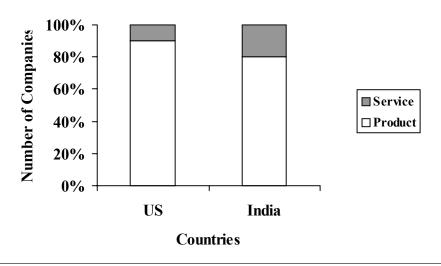
Product/Service Profile

The product/service profile of the companies top in ROI of US and India are as follows :

Rank	US	Indian
2005	Companies	Companies
1	Product	Product
2	Product	Product
3	Product	Service
4	Product	Product
5	Product/Service	Product
6	Product	Service
7	Product	Product
8	Product	Product
9	Product	Product
10	Service	Product

Both the countries seem to have the same profile. Except for the case of 3M i.e. the fifth ranked company of the US and Nextel Communications i.e. the tenth rank, all others offer products. India's high ROIs are earned by selling products. The ratio of products to services among the top companies in terms of ROI is 9:1 for America. The following graph makes clear the number of companies from products or services for both the countries. The fifth rank is assumed to be of a product selling company for the convenience of the graph.

Graph 28 - Product/Service Profile - Profit Margin



Challenges for Indian Multinationals

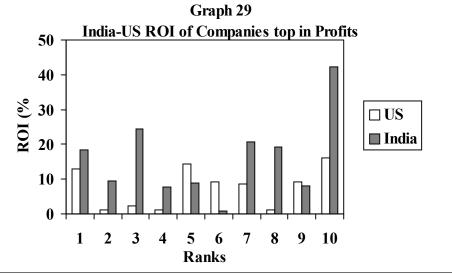
ROI of Companies top in Profits

The following is the comparison between the top ten companies in terms of profits and their ROI for US and India :

Rank	US Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Exxon Mobil	12.97	ONGC	18.5	5.5
2	Citigroup	1.15	Reliance Industries Ltd.	9.4	8.2
3	General Electric	2.24	SAIL	24.4	22.1
4	Bank Of America	1.27	Indian Oil Corporation	7.7	6.4
	Corporation		Ltd.		
5	Chevron	14.3	NTPC	8.8	(5.5)
6	Pfizer	9.19	State Bank Of India Ltd.	0.9	(8.3)
7	Wal-mart Stores	8.54	TISCO	20.8	12.2
8	American	1.22	ITC Ltd.	19.3	18.0
	International Group				
9	Altria Group	9.26	BPCL	7.9	(1.3)
10	Johnson & Johnson	15.96	TCS Ltd.	42.1	26.2

Table 23

Again, Indian companies have an edge over American ones in terms of ROI of the top ten profit making companies. Large differences are found in case of the SAIL - General Electric, TCS - Johnson & Johnson, ITC – American International Group and TISCO – Wal-Mart. In terms of American companies, the range of ROI is between 1 - 15 percent whereas in case of India the range is 0.87 to 43 percent. The graph of the above data is as follows :



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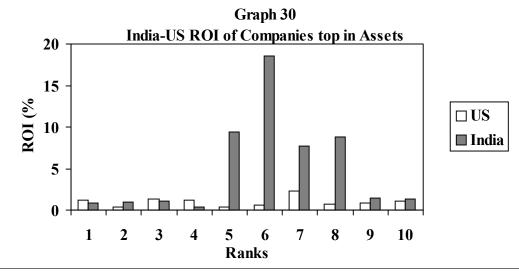
ROI of companies top in Assets

The table below gives the ROI of companies top in assets :

Rank	US Companies	*ROI	Indian Companies	#ROI	Difference		
2005		(%)		(%)	# - *		
1	Citigroup	1.15	State Bank Of India Ltd.	0.9	(0.3)		
2	J.P. Morgan Chase&	0.39	ICICI Bank Ltd.	1.0	0.6		
	Company						
3	Bank Of America	1.27	Punjab National Bank	1.1	(0.2)		
4	American International	1.22	Bank Of India	0.3	(0.9)		
5	Freddie Mac	0.36	Reliance Industries Ltd.	9.4	9.0		
6	Morgan-Stanley	0.58	ONGC	18.5	17.9		
7	General Electric	2.24	Indian Oil Corporation	7.7	5.5		
			Ltd.				
8	Merill Lynch	0.68	NTPC	8.8	8.1		
9	Goldman Sachs Group	0.86	Oriental Bank Of	1.4	0.6		
			Commerce				
10	Wachovia Corp.	1.06	HDFC Bank Ltd.	1.3	0.2		

Table 24

In case of companies top in assets the difference is marginal for the first, third and tenth rank. Indian companies dominate this area with only three of the top ten companies with respect to asset having ROI less than those of their American counterparts. Indian banks appear to be better performers. Indian banks are thus more efficient in terms of assets. The maximum ROI is 2.2 % in case of American companies but is 18.5% in case of Indian companies. However, this can be attributed to the type of business of these companies. The graphical image of the above data is as follows :



Challenges for Indian Multinationals

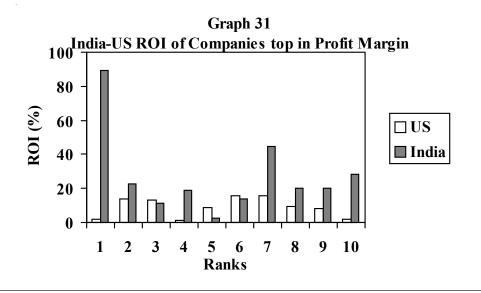
ROI of companies top in Profit Margin

The following table displays the ROI of the top ten companies with respect to Profit Margin in the US and India :

Rank	US Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	U.S. Bancorp	2.14	Mangalam Cement Ltd.	89.6	87.5
2	Merck	13.66	SCI	22.5	8.9
3	Nextel	13.19	Neyveli Lignite Corporation	11.6	(1.6)
	Communications		Ltd.		
4	Bank Of America	1.27	Great Eastern Shipping Co. Ltd,	18.6	17.3
	Corporation				
5	Microsoft	8.84	HDFC Ltd.	2.4	(6.4)
6	Coco-Cola	15.47	Television Eighteen India Ltd.	13.6	(1.9)
7	Intel	15.61	Sesa Goa Ltd.	45.0	29.4
8	Pfizer	9.19	National Aluminium Company	20.0	10.9
			Ltd.		
9	BellSouth	8.00	Hindustan Zinc Ltd.	20.0	12.0
10	Wells Fargo	1.64	Infosys Technologies Ltd.	28.0	26.4

Table 25

The above findings shows how efficient are (top ten in profit margin) Indian companies with regards to their American counterparts in terms of ROI. There has been a wide range of difference found between the two countries top performers. The difference ranges from -1.9 percent to 87.5 percent. The American companies shows a range of ROI at 1.3 percent to maximum 15.6 percent which is poor as compared to Indian companies at 2.4 percent to 89.6 percent.



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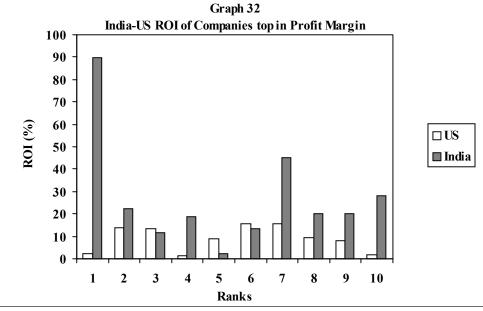
ROI of Companies top in Asset Turnover

The data below gives the comparison of ROI of the top ten companies in terms of asset turnover :

Rank	US Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Plains All American	4.11	HCL Infosystems Ltd.	15.10	11.01
	Pipeline				
2	Amerisourcebergen	4.02	Hindustan Petroleum Corp. Ltd.	7.10	3.04
3	Tech Data	3.57	Bongaigaon Refinery &	30.60	27.07
			Petrochemicals Ltd		
4	McKesson	-0.83	Kochi Refineries Ltd.	17.40	18.24
5	Express Scripts	7.73	Bharat Petroleum Corporation	7.90	0.19
			Ltd.		
6	Sysco	11.56	Hero Honda Motors Ltd.	24.60	13.03
7	Ingram Micro	3.17	Munjal Showa Ltd.	3.40	0.18
8	Medco Health Solutions	4.57	Marico Industries Ltd.	17.50	12.91
9	Costco Wholesale	5.85	Mangalore Refin. & Petrochem.	10.80	4.93
			Ltd.		
10	Publix Super Markets	13.73	Nestle India Ltd.	25.00	11.27

Table 26

The top companies with high asset turnover in case of India have high ROIs as compared to the US. In case of the US low profit margins pull down the high turnovered performance. Only two US companies have ROIs more than ten percent namely Sysco and Publix Supermarkets whereas in case of India, there are seven companies with ROI above ten percent. The following graph displays a clear picture:



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ANNEXURE 2: CROSS CULTURAL COMPARISON OF INDIAN & JAPANESE MULTINATIONALS

Summary of the Findings

- 1. The size of the revenues, asset and profits of Japanese companies is quite large as compared to their Indian counterparts.
- 2. The scope for improvement in terms of revenue generation for the top ten (revenue) Indian companies is five to ten times.
- 3. The scope for improvement in terms of asset size for the top ten (assets) Indian companies is ten to sixteen times.
- 4. The scope for improvement in terms of profit for the top ten (profits) Indian companies is three to four times.
- 5. With respect to top ten profit margin companies India stands ahead of Japan. The average difference in profit margin of the top ten companies with respect to profit margin is about 26.10 percent.
- 6. With respect to the top ten asset turnover companies the India stands ahead of Japan. The average difference is about 1.61 times.
- 7. With respect to the top ten ROI companies India is far ahead as compared to Japan. The difference in ROI reduces as the ranks reduce. The ROI of the top ten companies of Japan is in the range of five to nine percent whereas for Indian companies the ROI is between twenty five percent to ninety percent.
- 8. The industry profile of the top ten revenue companies in case of Japan is dominated by electronics and electrical equipments companies whereas it is dominated by petroleum companies in case on India.
- 9. The industry profile of the top ten assets companies in case of Japan is dominated by banking and financial services whereas in case of India the dominance is by banking companies.
- 10. The industry profile of the top ten profit companies is diversified in case of Japan whereas in case of India petroleum companies dominate it.
- 11. The industry profile of the top ten profit margin companies in case of Japan as well as India is diversified.
- 12. The industry profile of the top ten asset turnover companies in case of Japan is dominated by motor vehicles & parts (automobiles) companies whereas in India

it is diversified.

- 13. The industry profile of the top ten ROI companies in case of Japan is dominated by motor vehicles and parts (automobiles) companies whereas pharmaceuticals companies dominate in the Indian context.
- 14. The product / service profile of the top ten revenue companies in both Japan as well as India is in the ratio of 8:2.
- 15. The product / service profile of the top ten asset companies is in the ratio of 1:9 in case of Japan whereas it is 4:6 in case of India.
- 16. The product / service profile of the top ten profit companies is in the ratio of 6:4 in case of Japan whereas it is 8:2 in case of India.
- 17. The product / service profile of the top ten profit margin companies in both Japan as well as India is in the ratio of 6:4.
- 18. The product / service profile of the top ten asset turnover companies is in the ratio of 9:1 in case of Japan whereas it is 7:3 in case of India.
- 19. The product / service profile of the top ten ROI companies in both Japan as well as India is in the ratio of 8:2.
- 20. With respect to profit margin of top ten profit companies, seven Indian companies are ahead of their Japanese counterparts.
- 21. With respect to profit margin of top ten revenue companies, seven Indian companies are ahead of their Japanese counterparts.
- 22. With respect to asset turnover of top ten revenue companies, seven Indian companies are ahead of their Japanese counterparts.
- 23. With respect to asset turnover of top ten asset companies, seven Indian companies are ahead of their Japanese counterparts.
- 24. With respect to ROI of top ten profit companies, nine Indian companies are ahead of their Japanese counterparts.
- 25. With respect to ROI of top ten asset companies, nine Indian companies are ahead of their Japanese counterparts.
- 26. With respect to ROI of top ten profit margin companies, all Indian companies are ahead of their Japanese counterparts.
- 27. With respect to ROI of top asset turnover companies, nine Indian companies are ahead of their Japanese counterparts.

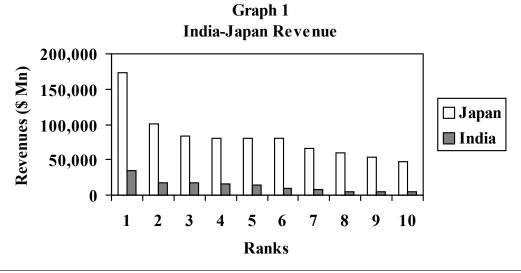
REVENUES

The following pattern shows the top ten companies in terms of revenues in the year 2005 along with their respective figures :

Rank	Japanese Companies	*Revenues	Indian Companies	#Revenues	#as
2005		(\$ Mn)		(\$ Mn)	% of *
1	Toyota motors	172,616.3	Indian Oil Corporation Ltd.	34,924.6	20.23
2	Nippon Telegraph and Telephone	100,545.3	Bharat Petroleum Corporation Ltd.	16,977.6	16.89
3	Hitachi	83,993.9	Reliance Industries Ltd.	16,778.1	19.98
4	Matuchita Electric Industrial	81,077.7	Hindustan Petroleum Corp. Ltd.	15,765.4	19.44
5	Honda Motor	80,486.6	ONGC	14,307.1	17.78
6	Nissan Motor	79,799.6	State Bank Of India Ltd.	10,201.5	12.78
7	Sony	66,618.0	Steel Authority Of India Ltd.	7,743.8	11.62
8	Nippon Life Insurance	60,520.8	NTPC	5,391.1	8.91
9	Toshiba	54,303.5	Tata Motors Ltd.	5,205.9	9.59
10	Tokyo Electric Power	46,962.7	MRPL	4,788.4	10.20

Table 1

Japanese companies dominate in terms of revenue generation as compared to their Indian counterparts. The revenues of the top ten Indian companies are in the range of nine percent (rank 9) to twenty percent (rank 1) of their Japanese counterparts.



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The scope of improvement can be measured from the fact that Indian Oil Corporation (first rank) is five times behind Toyota Motors and Mangalore Refineries and Petrochemical Limited (tenth rank) is ten times behind Tokyo Electric Power.

Industry Profile – Revenue

The industry profile of the Japanese companies is as follows (figures in bracket are ranks) :

Motor Vehicles and Parts (1,5,6); Telecommunications (2); Electronics and Electrical Equipments (3,4,7,9); Insurance (8) and Power (10).

The industry profile of the Indian companies is as follows :

Petroleum (1,2,3,4,5,10); Banking (6); Steel (7); Energy (8) and Automobiles(9).

Product / Service Profile – Revenue

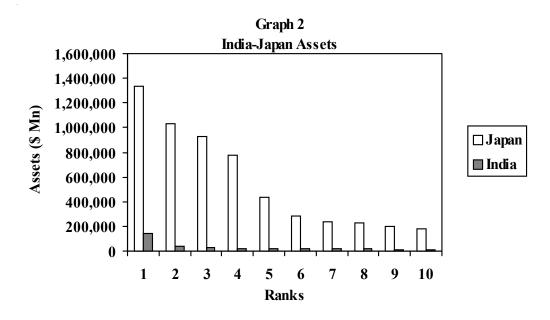
The product / service profile of Japan as well as India is 8:2.

ASSETS

The following table gives the comparison of the top ten Indian and Japanese companies in terms of assets :

Rank 2005	Japanese Companies	*Assets (\$ Mn)	Indian Companies	#Assets (\$ Mn)	# as % of *
1	Mizuho Financial Group	1,337,648.4	State Bank Of India Ltd.	144,103.1	10.77
2	Mitsubishi Tokyo Financial Group	1,031,081.3	ICICI Bank Ltd.	40,906.4	3.97
3	Sumitomo Mitsui Financial Group	932,413.1	Punjab National Bank	29,368.1	3.15
4	UFJ Holdings	771,810.7	Bank Of India	21,802.4	2.82
5	Nippon Life Insurance	437,336.6	Reliance Industries Ltd.	18,640.7	4.26
6	Dai-Ichi Mutual Life Insurance	279,687.9	ONGC	17,981.9	6.43
7	Meiji Yasuda Life Insurance	235,942.1	Indian Oil Corporation Ltd.	17,913.2	7.59
8	Toyota motors	227,512.9	NTPC	15,202.5	6.68
9	Sumitomo Life Insurance	198,897.5	Oriental Bank Of Commerce	12,395.6	6.23
10	Nippon Telegraph and Telephone	178,556.5	HDFC Bank Ltd.	11,790.2	6.60

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The graph clearly depicts the dominance of the Japanese companies over their Indian counterparts. The scope for improvement ranges from ten times for State Bank of India (first rank) to sixteen times for HDFC bank (tenth rank) when compared to their respective Japanese counterparts.

Industry Profile – Assets

The industry profile of the Japanese companies is as follows (figures in bracket are ranks):

Banking (1,2,3,4); Insurance (5,6,7,9); Motor Vehicles and Parts (8) and Telecommunications (10).

The industry profile of the Indian companies is as follows:

Banking (1,2,3,4,9,10); Petroleum (5,6,7) and Energy Resources (10).

Product / Service Profile – Assets

The product / service profile of Japan is 1:9 whereas it is 4:6 in case of India.

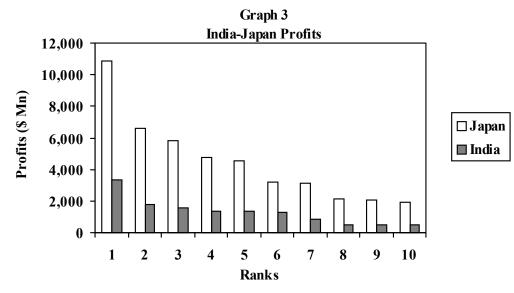
PROFITS

The profits of the top ten companies in Japan and India are tabulated below :

	Tuble 5								
Rank	Japanese Companies	*Profits	Indian Companies	#Profits	# as				
2005		(\$ Mn)		(\$ Mn)	% of				
					*				
1	Toyota motors	10,898.2	ONGC	3,326.8	30.53				
2	Nippon Telegraph and	6,608.0	Reliance Industries Ltd.	1,748.8	26.46				
	Telephone								
3	Mizuho Financial Group	5,837.6	SAIL	1,594.1	27.31				
4	Nissan Motor	4,766.6	Indian Oil Corporation Ltd.	1,378.3	28.92				
5	Honda Motor	4,523.9	NTPC	1,333.9	29.49				
6	Canon	3,175.3	State Bank Of India Ltd.	1,255.7	39.55				
7	Mitsubishi Tokyo Financial	3,148.9	TISCO	832.0	26.42				
	Group								
8	Tokyo Electric Power	2,104.5	ITC Ltd.	518.3	24.63				
9	Nippon Steel	2,052.6	BPCL	480.8	23.42				
10	Nippon Life Insurance	1,886.3	TCS Ltd.	472.3	25.04				

Table 3

The profits of Indian companies seem to have the best standing so far in terms of percentages of their respective Japanese counterparts. ONGC's profits are about thirty percent of those of Toyota Motors. Reliance Industries Limited, SAIL, Indian Oil Corporation, NTPC, TISCO, stand at about twenty-seven percent of their respective Japanese counterparts. The scope for improvement ranges to about three to four times.



Challenges for Indian Multinationals

Industry Profile – Profits

The industry profile of the Japanese companies is as follows (figures in bracket are ranks) :

Motor Vehicles and parts (1,4,5); Telecommunications (2); Banking (3,7); Computer equipment (6); Power (8); Metals (9) and Insurance (10).

The industry profile of the Indian companies is as follows :

Petroleum (1,2,4,9); Energy Resources (5); Banking (6); Steel (3,7); F&B and Tobacco (8) and Softwares (10).

Product / Service Profile – Profits

The product / service profile of Japan is 6:4 where as in case of India it is 8:2.

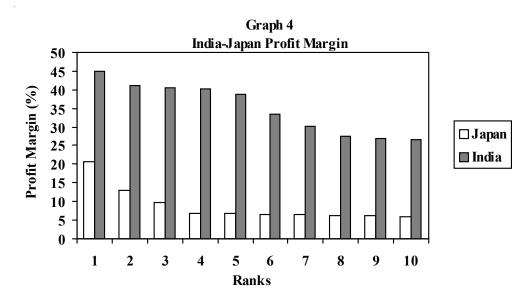
PROFIT MARGIN

The following companies are the ones with the highest profit margins :

Table 4							
Rank	Japanese Companies	*Profit	Indian Companies	# Profit	Difference		
2005		Margin		Margin	# - *		
		(%)		(%)			
1	Mizuho Financial Group	20.64	Mangalam Cement Ltd.	45.0	24.4		
2	Mitsubishi Tokyo	12.9	Shipping Corporation Of	41.0	28.1		
	Financial Group		India Ltd.				
3	Canon	9.9	Neyveli Lignite Corporation	40.5	30.6		
			Ltd.				
4	KDDI	6.9	Great Eastern Shipping Co.	40.2	33.3		
			Ltd.				
5	Central Japan Railway	6.8	HDFC Ltd.	38.7	31.9		
6	Nippon Telegraph and	6.6	Television Eighteen India	33.4	26.8		
	Telephone		Ltd.				
7	Nippon Steel	6.5	Sesa Goa Ltd.	30.2	23.7		
8	Kyushu Electric Power	6.3	National Aluminium	27.5	21.2		
			Company Ltd.				
9	Toyota motors	6.3	Hindustan Zinc Ltd.	26.8	20.5		
10	Nissan Motor	6.0	Infosys Technologies Ltd.	26.5	20.5		

Table 4

A completely contrasting picture comes forward when the profit margins of the top companies of both the countries are compared. It is clear that in terms of profit margins of the top ten companies, India stands ahead of Japan with a very large difference. The difference is in the range of twenty percent to thirty-three percent.



Industry Profile – Profit Margin

The industry profile of the Japanese companies is as follows (figures in bracket are ranks) :

Banking (1,2); Computer Equipment (3); Telecommunications (4,6); Railroads (5); Metals (7); Power (8) and Motor Vehicles and Parts (9,10).

The industry profile of the Indian companies is as follows :

Cement (1); Shipping (2,4); Mining (3); Finance (5); Media (6); Steel (7); Aluminum (8); Zinc (9) and Software (10).

Product / Service Profile – Profit Margin

The product / service profile of Japan as well as India is 6:4.

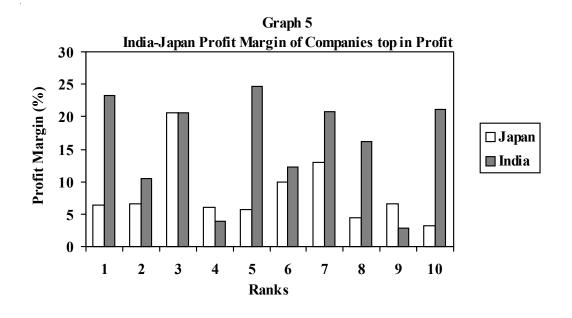
Profit Margins of Companies Top in Profits

The following table contains data with respect to profit margins :

Rank	Japanese Companies	*Profit	Indian Companies	#Profit	Difference
2005		Margin		Margin	# - *
		(%)		(%)	
1	Toyota motors	6.3	ONGC	23.3	17.0
2	Nippon Telegraph and	6.6	Reliance Industries Ltd.	10.4	3.8
	Telephone				
3	Mizuho Financial Group	20.6	SAIL	20.6	(0.0)
4	Nissan Motor	6.0	Indian Oil Corporation Ltd.	3.9	(2.1)
5	Honda Motor	5.6	NTPC	24.7	19.1
6	Canon	9.9	State Bank Of India Ltd.	12.3	2.4
7	Mitsubishi Tokyo	12.9	TISCO	20.8	7.9
	Financial Group				
8	Tokyo Electric Power	4.5	ITC Ltd.	16.2	11.7
9	Nippon Steel	6.5	BPCL	2.8	(3.7)
10	Nippon Life Insurance	3.1	TCS Ltd.	21.2	18.1

Table 5

The graph here shows the dominance of Indian companies over their Japanese counterparts. Except for the third, fourth and the ninth ranks India stands ahead i.e. seventy percent of the top ten companies with respect to profit are ahead in terms of profit margin as compared to their Japanese counterparts.

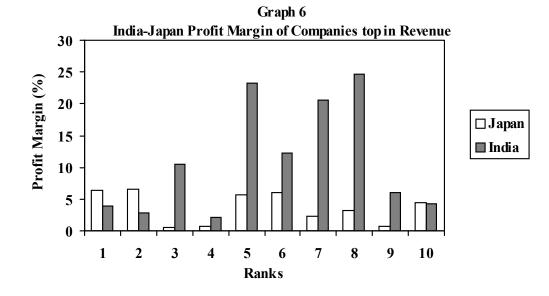


Profit Margins of Companies Top in Revenues

The following table depicts the profit margin of companies top in revenues for both the countries :

Rank	Japanese Companies	*Profit	Indian Companies	#Profit	Difference
2005		Margin		Margin	# - *
		(%)		(%)	
1	Toyota motors	6.3	Indian Oil Corporation Ltd.	3.9	(2.4)
2	Nippon Telegraph and	6.6	Bharat Petroleum Corporation	2.8	(3.8)
	Telephone		Ltd.		
3	Hitachi	0.6	Reliance Industries Ltd.	10.4	9.8
4	Matuchita Electric Industrial	0.7	Hindustan Petroleum Corp.	2.1	1.4
			Ltd.		
5	Honda Motor	5.6	ONGC	23.3	17.7
6	Nissan Motor	6.0	State Bank Of India Ltd.	12.3	6.3
7	Sony	2.3	Steel Authority Of India Ltd.	20.6	18.3
8	Nippon Life Insurance	3.1	NTPC	24.7	21.6
9	Toshiba	0.8	Tata Motors Ltd.	6.1	5.3
10	Tokyo Electric Power	4.5	Mangalore Refin. &	4.2	(0.3)
			Petrochem. Ltd.		

Table 6



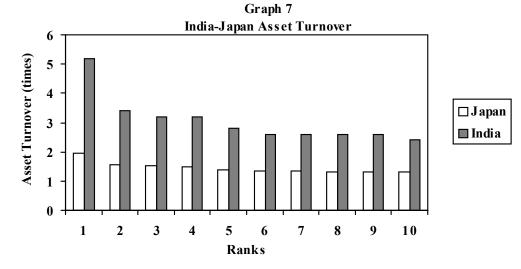
Except in four cases, for the top ten companies with respect to revenues, India is ahead in terms of profit margin as compared to their Japanese counterparts. This also indicates that Indian companies that are top in revenues have kept their profit margin in line with their revenues.

ASSET TURNOVER

The following table shows the comparison of Japan & India in terms of top ten asset turnover companies :

Rank	Japanese Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Mediceo Holdings	2.0	HCL Infosystems Ltd.	5.2	3.3
2	Yamaha Motor	1.6	Hindustan Petroleum Corp.	3.4	1.8
			Ltd.		
3	Mazda Motor	1.5	Bongaigaon Refinery &	3.2	1.7
			Petrochemicals Ltd		
4	Aeon	1.5	Kochi Refineries Ltd.	3.2	1.7
5	Suzuki Motor	1.4	Bharat Petroleum Corporation	2.8	1.4
			Ltd.		
6	Ito-Yokada	1.4	Hero Honda Motors Ltd.	2.6	1.2
7	Nippon Express	1.4	Munjal Showa Ltd.	2.6	1.2
8	Mitsubishi Motors	1.3	Marico Industries Ltd.	2.6	1.3
9	Fujitsu	1.3	Mangalore Refin. &	2.6	1.3
			Petrochem. Ltd.		
10	Isuzu Motors	1.3	Nestle India Ltd.	2.4	1.1

Table 7



The above table shows the difference between the top ten companies in Japan and India in terms of asset turnover, which is marginal within the range of 1.10 times (Nestle India Limited ranked tenth) and 3.25 times (HCL Infosystems Limited ranked first). This analysis also speaks about how Indian companies are able to keep pace with their Japanese counterparts in terms of asset turnover irrespective of the

economic environment prevailing in each country.

Industry Profile – Asset Turnover

The industry profile of the Japanese companies is as follows (figures in bracket are ranks) :

Motor Vehicles and parts (2,3,5,8,10); Food and Drugs (4,6); Package and Freight Delivery (7); Computer Equipment (9) and Others (1).

The industry profile of the Indian companies is as follows :

Computer Equipments (1); Petroleum (2,4,9); Steel (3,7); Energy Resources (5); Banking (6); F&B and Tobacco (8) and Software (10).

Product / Service Profile – Asset Turnover

The product / service profile of Japan is 9:1 where as in case of India it is 7:3.

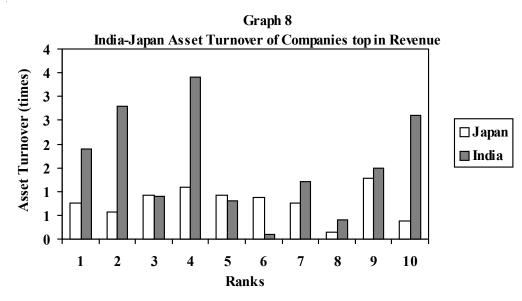
Asset Turnover of Companies Top in Revenues

The following table shows the top ten companies in terms of revenues and their respective asset turnovers for both Japan & India :

Rank	Japanese Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Toyota motors	0.8	Indian Oil Corporation Ltd.	1.9	1.1
2	Nippon Telegraph and	0.6	Bharat Petroleum Corporation	2.8	2.2
	Telephone		Ltd.		
3	Hitachi	0.9	Reliance Industries Ltd.	0.9	(0.0)
4	Matuchita Electric	1.1	Hindustan Petroleum Corp.	3.4	2.3
	Industrial		Ltd.		
5	Honda Motor	0.9	ONGC	0.8	(0.1)
6	Nissan Motor	0.9	State Bank Of India Ltd.	0.1	(0.8)
7	Sony	0.8	Steel Authority Of India Ltd.	1.2	0.5
8	Nippon Life Insurance	0.1	NTPC	0.4	0.3
9	Toshiba	1.3	Tata Motors Ltd.	1.5	0.2
10	Tokyo Electric Power	0.4	Mangalore Refin. &	2.6	2.2
			Petrochem. Ltd.		

Table 8

The above table shows some important facts which support the performance of the Indian companies with respect to their Japanese counterparts. Here, we can see that there are seven Indian companies which surpass the asset turnovers of their respective Japanese counterparts with large differences. Thus, it could be said that the top ten Indian companies are more efficient in asset utilisation than top ten Japanese companies.



Asset Turnover of Companies Top in Assets

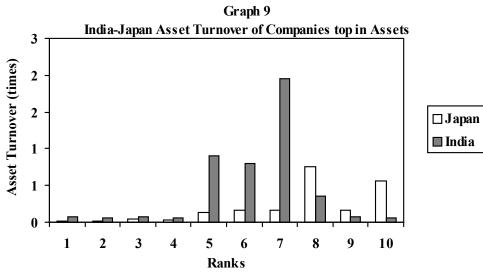
The following table depicts the top ten companies in assets and their asset turnovers in Japan and India :

Rank	Japanese Companies	*Asset	Indian Companies	# Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Mizuho Financial	0.02	State Bank Of India Ltd.	0.07	0.05
	Group				
2	Mitsubishi Tokyo	0.02	ICICI Bank Ltd.	0.06	0.04
	Financial Group				
3	Sumitomo Mitsui	0.04	Punjab National Bank	0.07	0.03
	Financial Group				
4	UFJ Holdings	0.03	Bank Of India	0.06	0.03
5	Nippon Life Insurance	0.14	Reliance Industries Ltd.	0.9	0.76
6	Dai-Ichi Mutual Life	0.16	ONGC	0.80	0.64
	Insurance				
7	Meiji Yasuda Life	0.16	Indian Oil Corporation Ltd.	1.95	1.79
	Insurance				
8	Toyota motors	0.76	NTPC	0.35	(0.41)
9	Sumitomo Life	0.16	Oriental Bank Of Commerce	0.07	(0.09)
	Insurance				
10	Nippon Telegraph and	0.56	HDFC Bank Ltd.	0.06	(0.50)
	Telephone				

Table 9

The above table shows the similarity between asset turnovers of companies top in

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assets and companies top in asset turmover. The difference is within the range of -0.50 to 1.79 which is favorable towards Indian companies.

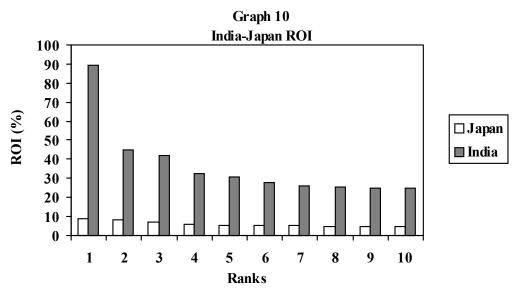
ROI

The analysis is about ROI of top ten Indian and Japanese companies as follows :

Rank	Japanese Companies	*ROI	Indian Companies	#ROI	Difference				
2005		(%)		(%)	# - *				
1	Canon	9.07	Mangalam Cement Ltd.	89.61	80.54				
2	KDDI	8.07	Sesa Goa Ltd.	44.96	36.89				
3	Yamaha Motor	7.10	TCS Ltd.	42.12	35.02				
4	Nippon Steel	5.67	Abbott India Ltd.	32.78	27.11				
5	Isuzu Motors	5.23	Bongaigaon Refinery &	30.63	25.40				
			Petrochemicals Ltd						
6	Honda Motor	5.19	Infosys Technologies Ltd.	28.02	22.83				
7	Nissan Motor	5.18	Aventis Pharmaceuticals Ltd.	26.01	20.83				
8	Nippon Yusen	4.81	P&GHygiene & Healthcare	25.37	20.56				
			Ltd.						
9	Toyota motors	4.79	Nestle India Ltd.	25.00	20.21				
10	Denso	4.75	Glaxosmithkline	24.93	20.18				
			Pharmaceuticals Ltd.						

Table 10

The above table is favorable towards Indian companies. The data shows that none of the American companies are close to their Indian counterparts in terms of ROI. Infact the difference is vast (highest being 80.54% among the first ranked companies of the two countries). This also means that (top ten ROI) Indian companies are able



to profitably use assets better than the Japanese ones. The top Indian companies try to give an ROI of at least twenty five percent where as in Japan this percentage is five percent. It should also be noted that the size of the assets of the Japanese companies is large as compared to the Indian ones. The actual challenge for Indian companies is to maintain these returns after attaining a size proportionate to the Japanese companies.

Industry Profile – ROI

The industry profile of the Japanese companies is as follows (figures in bracket are ranks) :

Computer Equipment (1); Telecommunications (2); Motor Vehicles and parts (3,5,6,7,9,10); Metals (4) and Shipping (8).

The industry profile of the Indian companies is as follows :

Cement (1); Steel (2); Softwares (3,6); Pharmaceuticals (4,7,8,10); Petroleum (5) and F & B and Tobacco (9).

Product / Service Profile – ROI

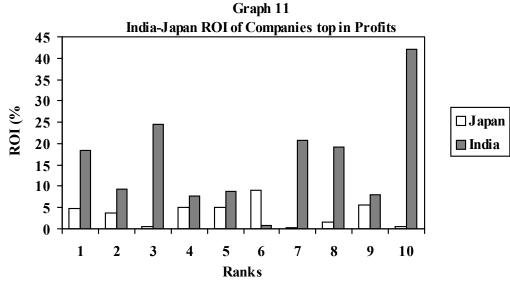
The product / service profile of Japan as well as India is 8:2.

ROI of Companies top in Profits

The following is the comparison between the top ten companies in terms of profits and their ROI for Japan and India :

Rank	Japanese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Toyota motors	4.8	ONGC	18.5	13.7
2	Nippon Telegraph and	3.7	Reliance Industries Ltd.	9.4	5.7
	Telephone				
3	Mizuho Financial Group	0.4	SAIL	24.4	24.0
4	Nissan Motor	5.2	Indian Oil Corporation Ltd.	7.7	2.5
5	Honda Motor	5.2	NTPC	8.8	3.6
6	Canon	9.1	State Bank Of India Ltd.	0.9	(8.2)
7	Mitsubishi Tokyo	0.3	TISCO	20.8	20.5
	Financial Group				
8	Tokyo Electric Power	1.6	ITC Ltd.	19.3	17.7
9	Nippon Steel	5.7	BPCL	7.9	2.2
10	Nippon Life Insurance	0.4	TCS Ltd.	42.1	41.7

Table 11

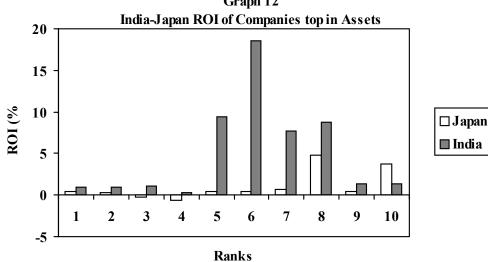


Again, Indian companies have an edge over Japanese ones in terms of ROI of the top ten profit making companies. Large differences are found in case of the SAIL - Mizuho Financial Group, TISCO - Mitsubishi Tokyo Financial Group, ITC Limited - Tokyo Electric Power, TCS Limited - Nippon Life Insurance. In terms of Japanese companies the range of ROI is between 0.31 to 9.07 percent whereas in case of India the range is 0.87 to 43 percent.

ROI of Companies top in Assets

	Table 12								
Rank	Japanese Companies	*ROI	Indian Companies	#ROI	Difference				
2005		(%)		(%)	# - *				
1	Mizuho Financial Group	0.4	State Bank Of India Ltd.	0.9	0.5				
2	Mitsubishi Tokyo Financial	0.3	ICICI Bank Ltd.	1.0	0.7				
	Group								
3	Sumitomo Mitsui Financial	-0.2	Punjab National Bank	1.1	1.3				
	Group								
4	UFJ Holdings	-0.7	Bank Of India	0.3	1.0				
5	Nippon Life Insurance	0.4	Reliance Industries Ltd.	9.4	9.0				
6	Dai-Ichi Mutual Life Insurance	0.5	ONGC	18.5	18.0				
7	Meiji Yasuda Life Insurance	0.7	Indian Oil Corporation Ltd.	7.7	7.0				
8	Toyota motors	4.8	NTPC	8.8	4.0				
9	Sumitomo Life Insurance	0.4	Oriental Bank Of Commerce	1.4	1.0				
10	Nippon Telegraph and	3.7	HDFC Bank Ltd.	1.3	(2.4)				
	Telephone								

The table below gives the ROI of companies top in assets :



Graph 12

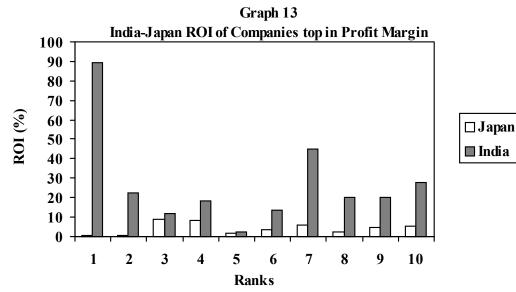
In case of companies top in assets the difference is marginal for the first, second and fourth rank. Indian companies dominate this area with only one of the top ten companies with respect to asset having ROI less than those of their Japanese counterparts. Indian banks appear to be better performers. Indian banks are thus more efficient in terms of assets. The maximum ROI is 4.79 % in case of Japanese companies whereas it is 18.5% in case of Indian companies. However this can be attributed to the type of business of these companies.

ROI of Companies top in Profit Margin

The following table displays the ROI of the top ten companies with respect to Profit Margin in Japan and India :

Rank	Japanese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Mizuho Financial Group	0.4	Mangalam Cement Ltd.	89.6	89.2
2	Mitsubishi Tokyo	0.3	Shipping Corporation of	22.5	22.2
	Financial Group		India		
3	Canon	9.1	Neyveli Lignite	11.6	2.5
			Corporation Ltd.		
4	KDDI	8.1	Great Eastern Shipping Co.	18.6	10.5
			Ltd.		
5	Central Japan Railway	1.8	HDFC Ltd.	2.4	0.6
6	Nippon Telegraph and	3.7	Television Eighteen India	13.6	9.9
	Telephone		Ltd.		
7	Nippon Steel	5.7	Sesa Goa Ltd.	45.0	39.3
8	Kyushu Electric Power	2.2	National Aluminium	20.0	17.8
			Company Ltd.		
9	Toyota motors	4.8	Hindustan Zinc Ltd.	20.0	15.2
10	Nissan Motor	5.2	Infosys Technologies Ltd.	28.0	22.8

Table 13



The above findings show how efficient (top ten in profit margin) Indian companies are with regards to their Japanese counterparts in terms of ROI. There is a wide range of difference between the two countries' top performers. The difference ranges from 0.60 percent to 89.16 percent. The Japanese companies show a range of ROI

Challenges for Indian Multinationals

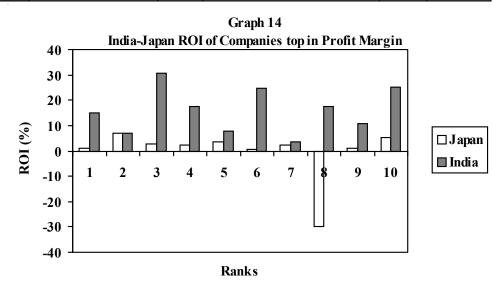
from 0.31 percent to a maximum of 9.07 percent which is poor as compared to that of Indian companies from 2.4 percent to 89.6 percent.

ROI of Companies top in Asset Turnover

The data below gives the comparison of ROI of the top ten companies in terms of asset turnover :

Rank	Japanese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Mediceo Holdings	1.0	HCL Infosystems Ltd.	15.1	14.1
2	Yamaha Motor	7.1	Hindustan Petroleum Corp. Ltd.	7.10	0.0
3	Mazda Motor	2.6	Bongaigaon Refinery & Petrochemicals Ltd	30.6	28.0
4	Aeon	2.2	Kochi Refineries Ltd.	17.4	15.2
5	Suzuki Motor	3.6	Bharat Petroleum Corporation Ltd.	7.90	4.3
6	Ito-Yokada	0.7	Hero Honda Motors Ltd.	24.6	24.0
7	Nippon Express	2.5	Munjal Showa Ltd.	3.4	0.9
8	Mitsubishi Motors	(29.7)	Marico Industries Ltd.	17.5	47.2
9	Fujitsu	0.9	Mangalore Refin. & Petrochem. Ltd.	10.8	9.9
10	Isuzu Motors	5.2	Nestle India Ltd.	25.00	19.8

Table 14



The top companies with high asset turnover in case of India have high ROIs as compared to Japan. In case of Japan low profit margins pull down the high turnovered performance. There is only one Japanese company which has an ROI of more than five percent namely Yamaha Motors whereas in case of India, there are seven companies with an ROI of above ten percent.

ANNEXURE 3: CROSS CULTURAL COMPARISON INDIAN & CHINESE MULTINATIONALS

Summary of the Findings

- 1. The size of the revenues, asset and profits of Chinese companies is comparable to their Indian counterparts.
- 2. The scope for improvement in terms of revenue generation for the top ten (revenue) Indian companies is two to four times.
- 3. The scope for improvement in terms of asset size for the top ten (assets) Indian companies is five to six times.
- 4. The scope for improvement in terms of profit for the top ten (profits) Indian companies is marginal as majority of the companies have more than fifty percent of their Chinese counterparts' profits with one Indian company having one hundred and sixty percent of the profit of its Chinese counterpart.
- 5. With respect to top ten profit margin companies India stands ahead of China. The average difference in profit margin of the top ten companies with respect to profit margin is about 23.86 percent.
- 6. With respect to the top ten asset turnover companies the India surpasses China. The average difference is about 1.98 times.
- 7. With respect to the top ten ROI companies India is far ahead as compared to China. The difference in ROI reduces as the ranks reduce. The ROI of the top ten companies of China is between one to eight percent.
- 8. The industry profile of the top ten revenue companies in case of China is diversified whereas it is dominated by petroleum companies in case of India.
- 9. The industry profile of the top ten assets companies in case of China is dominated by banking and financial services whereas in case of India the dominance is by banking companies.
- 10. The industry profile of the top ten profit companies in case of China is diversified whereas in case of India it is dominated by petroleum companies.
- 11. The industry profile of the top ten profit margin companies in case of China as well as India is diversified.
- 12. The industry profile of the top ten asset turnover companies in case of China as well as India is diversified.

- 13. The industry profile of the top ten ROI companies in case of China is diversified whereas pharmaceuticals companies dominate in the Indian context.
- 14. The product / service profile of the top ten revenue companies is in the ratio of 5:5 in case of China whereas it is 8:2 in case of India.
- 15. The product / service profile of the top ten asset companies is in the ratio of 4:6 in both cases.
- 16. The product / service profile of the top ten profit companies is in the ratio of 6:4 in case of China whereas it is 8:2 in case of India.
- 17. The product / service profile of the top ten profit margin companies is in the ratio of 5:5 in case of China whereas it is 6:4 in case of India.
- 18. The product / service profile of the top ten asset turnover companies is in the ratio of 8:2 in case of China whereas it is 7:3 in case of India.
- 19. The product / service profile of the top ten ROI companies is in the ratio of 7:3 in case of the China whereas it is 8:2 in case of India.
- 20. With respect to profit margin of top ten profit companies, eight Indian companies are ahead of their Chinese counterparts.
- 21. With respect to profit margin of top ten revenue companies, seven Indian companies are ahead of their Chinese counterparts.
- 22. With respect to asset turnover of top ten revenue companies, nine Indian companies are ahead of their Chinese counterparts.
- 23. With respect to asset turnover of top ten asset companies, seven Indian companies are ahead of their Chinese counterparts.
- 24. With respect to ROI of top ten profit companies, nine Indian companies are ahead of their Chinese counterparts.
- 25. With respect to ROI of top ten asset companies, eight Indian companies are ahead of their Chinese counterparts.
- 26. With respect to ROI of top ten profit margin companies, nine Indian companies are ahead of their Chinese counterparts.
- 27. With respect to ROI of top ten asset turnover companies, nine Indian companies are ahead of their Chinese counterparts.

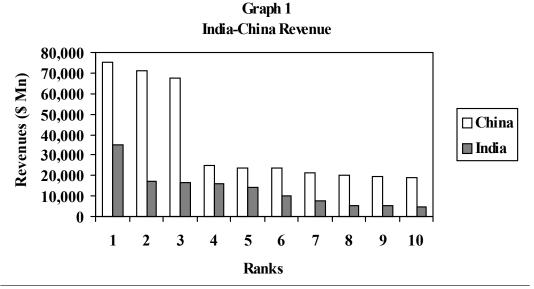
REVENUES

The following pattern shows the top ten companies in terms of revenues in the year 2005 along with their respective figures :

Rank 2005	Chinese Companies	*Revenues (\$ Mn)	Indian Companies	# Revenues (\$ Mn)	# as % of *
1	Sinopec	75,076.7	Indian Oil Corporation Ltd.	34,924.6	46.52
2	State Grid	71,290.2	Bharat Petroleum Corporation Ltd.	16,977.6	23.82
3	China National Petroleum	67,723.8	Reliance Industries Ltd.	16,778.1	24.77
4	China Life Insurance	24,980.6	Hindustan Petroleum Corp. Ltd.	15,765.4	63.11
5	China Mobile Communications	23,957.6	ONGC	14,307.1	59.72
6	Industrial & Commercial Bank of China	23,444.6	State Bank Of India Ltd.	10,201.5	43.52
7	China Telecommunications	21,561.8	Steel Authority Of India Ltd.	7,743.8	35.92
8	Sinochem	20,380.7	NTPC	5,391.1	26.45
9	Shanghai Baosteel Group	19,543.3	Tata Motors Ltd.	5,205.9	26.64
10	China Construction Bank	19,047.9	MRPL	4,788.4	25.14

Table 1

The Chinese companies are larger when it comes to revenue generation. The revenues of the top ten Indian companies are in the range of twenty-four percent to forty seven percent of their Chinese counterparts.



The scope for improvement can be measured for Indian Oil Corporation Limited (first rank) as two times behind Sinopec and for Mangalore Refineries and Petrochemical Limited (tenth rank) to be four times behind China Construction Bank. Thus, India is not much behind China when it comes to revenue generation and can overtake China in the next few years.

Industry Profile – Revenue

The industry profile of the Chinese companies is as follows (figures in bracket are ranks):

Petroleum (1,3); Power (2); Insurance (4); Telecommunications (5,7), Banking (6,10); Trading (8) and Metals (9).

The industry profile of the Indian companies is as follows:

Petroleum (1,2,3,4,5,10); Banking (6); Steel (7); Energy (8) and Automobiles(9).

Product / Service Profile – Revenue

The product / service profile of China is 5:5 whereas it is 8:2 in case of India.

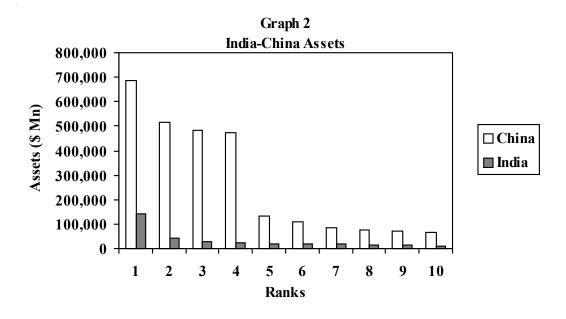
ASSETS

The following table gives the comparison of the top ten Indian and Chinese companies in terms of assets:

Rank 2005	Chinese Companies	*Assets (\$ Mn)	Indian Companies	#Assets (\$ Mn)	# as % of
					*
1	Industrial & Commercial	685,135.1	State Bank Of India Ltd.	144,103.1	21.03
	Bank of China				
2	Bank of China	515,972.0	ICICI Bank Ltd.	40,906.4	7.93
3	Agricultural Bank of China	484,959.6	Punjab National Bank	29,368.1	6.06
4	China Construction Bank	471,791.8	Bank Of India	21,802.4	4.62
5	State Grid	134,300.4	Reliance Industries Ltd.	18,640.7	13.88
6	China National Petroleum	110,396.2	ONGC	17,981.9	16.29
7	Hutchinson Whampoa	84,170.6	Indian Oil Corporation Ltd.	17,913.2	21.28
8	Sinopec	74,941.2	NTPC	15,202.5	20.29
9	China Life Insurance	69,351.7	Oriental Bank Of Commerce	12,395.6	17.87
10	China Telecommunications	65,332.7	HDFC Bank Ltd.	11,790.2	18.05

Table 2

Indian companies are showing a sizeable amount of improvement and there is further improvement required in terms of asset size which ranges from five times for State Bank of India (first rank) to six times for HDFC bank (tenth rank).



Industry Profile – Assets

The industry profile of the Chinese companies is as follows (figures in bracket are ranks):

Banking (1,2,3,4); Insurance (9); Power (5); Petroleum (6,8); Food and drugs (7) and Telecommunications (10).

The industry profile of the Indian companies is as follows:

Banking (1,2,3,4,9,10); Petroleum (5,6,7) and Energy Resources (10).

Product / Service Profile – Assets

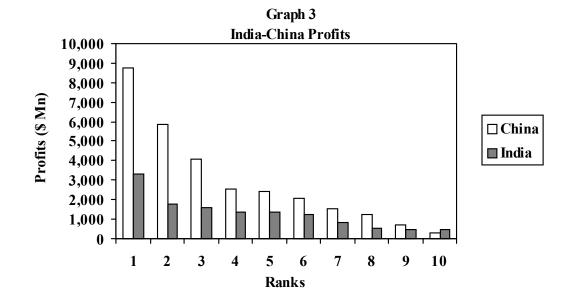
The product / service profile of China and India is 4:6.

PROFITS

The profits of the top ten companies in China and India are tabulated below :

Rank 2005	Chinese Companies	*Profits (\$ Mn)	Indian Companies	#Profits (\$ Mn)	#as % of
					*
1	China National Petroleum	8,757.1	ONGC	3,326.8	37.99
2	China Construction Bank	5,846.2	Reliance Industries Ltd.	1,748.8	29.91
3	China Mobile Communications	4,077.9	SAIL	1,594.1	39.09
4	Bank of China	2,529.0	Indian Oil Corporation Ltd.	1,378.3	54.50
5	China Telecommunications	2,422.0	NTPC	1,333.9	55.07
6	Hutchinson Whampoa	2,070.7	State Bank Of India Ltd.	1,255.7	60.64
7	Shanghai Baosteel Group	1,537.3	TISCO	832.0	54.12
8	Sinopec	1,268.9	ITC Ltd.	518.3	40.85
9	State Grid	694.0	BPCL	480.8	69.28
10	China First Automotive Works	293.4	TCS Ltd.	472.3	160.97

Table 3



The profits of Indian companies seem to have the best standing so far in terms of percentages of their respective Chinese counterparts. ONGC's profits are about thirty eight percent of those of China National Petroleum. The best performance is that of TCS ltd which is one hundred and sixty percent of its Chinese counterpart.

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Industry Profile – Profits

The industry profile of the Chinese companies is as follows (figures in bracket are ranks) :

Petroleum (1,8); Banking (2,4); Telecommunications (3,5); Food and drugs (6); Metals (7); Power (9) and Motor Vehicle and parts (10).

The industry profile of the Indian companies is as follows :

Petroleum (1,2,4,9); Energy Resources (5); Banking (6); Steel (3,7); F&B and Tobacco (8) and Softwares (10).

Product / Service Profile – Profits

The product / service profile of the China is 6:4 where as in case of India it is 8:2.

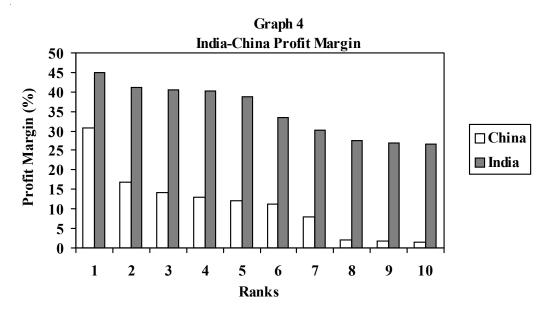
PROFIT MARGIN

The following companies are the ones with the highest profit margins :

Chinese Companies	*Profit	Indian Companies	#Profit	Difference
	Margin		Margin	# -*
	(%)		(%)	
China Construction Bank	30.7	Mangalam Cement Ltd.	45.0	14.31
China Mobile	17.0	Shipping Corporation Of	41.0	23.98
Communications		India Ltd.		
Bank of China	14.1	Neyveli Lignite	40.5	26.42
		Corporation Ltd.		
China National Petroleum	12.9	Great Eastern Shipping Co.	40.2	27.27
		Ltd.		
Hutchinson Whampoa	12.0	HDFC Ltd.	38.7	26.72
China Telecommunications	11.2	Television Eighteen India	33.4	22.17
		Ltd.		
Shanghai Baosteel Group	7.9	Sesa Goa Ltd.	30.2	22.33
China First Automotive	2.1	National Aluminium	27.5	25.38
Works		Company Ltd.		
Sinopec	1.7	Hindustan Zinc Ltd.	26.8	25.11
Agricultural Bank of China	1.6	Infosys Technologies Ltd.	26.5	24.92
	China Construction Bank China Mobile Communications Bank of China China National Petroleum Hutchinson Whampoa China Telecommunications Shanghai Baosteel Group China First Automotive Works Sinopec	Margin (%)China Construction Bank30.7China Mobile17.0Communications14.1Bank of China14.1China National Petroleum12.9Hutchinson Whampoa12.0China Telecommunications11.2Shanghai Baosteel Group7.9China First Automotive2.1Works5Sinopec1.7	Margin (%)Margin (%)China Construction Bank30.7Mangalam Cement Ltd.China Mobile17.0Shipping Corporation Of India Ltd.Communications14.1Neyveli Lignite Corporation Ltd.Bank of China14.1Neyveli Lignite Corporation Ltd.China National Petroleum12.9Great Eastern Shipping Co. Ltd.Hutchinson Whampoa12.0HDFC Ltd.China Telecommunications11.2Television Eighteen India Ltd.Shanghai Baosteel Group7.9Sesa Goa Ltd.China First Automotive2.1National Aluminium Company Ltd.Works1.7Hindustan Zinc Ltd.	Margin (%)Margin (%)China Construction Bank30.7Mangalam Cement Ltd.45.0China Mobile17.0Shipping Corporation Of India Ltd.41.0Communications14.1Neyveli Lignite

Table 4

As is depicted in the graph, it is clear that the Indian companies dominate their Chinese counterparts in terms of profit margin. The difference in profit margin is almost the same except in case of Mangalam Cement Limited which shows fourteen percent difference as compared to it's Chinese counterpart.



Industry Profile – Profit Margin

The industry profile of the Chinese companies is as follows (figures in bracket are ranks) :

Banking (1,3,10); Telecommunications (2,6); Petroleum (4,9); Food and drugs (5); Metals (7) and Motor Vehicle and parts (8).

The industry profile of the Indian companies is as follows :

Cement (1); Shipping (2,4); Mining (3); Finance (5); Media (6); Steel (7); Aluminum (8); Zinc (9) and Software (10).

Product / Service Profile – Profit margin

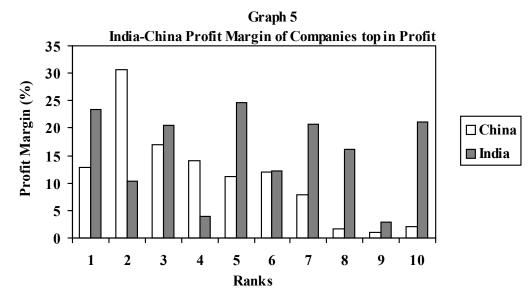
The product / service profile of China is 5:5 where as in case of India it is 6:4.

Profit Margins of Companies Top in Profit

The following table contains data of profit margins of companies top in profit :

Rank	Chinese Companies	*Profit	Indian Companies	#Profit	Difference
2005		Margin		Margin	# - *
		(%)		(%)	
1	China National Petroleum	12.9	ONGC	23.3	10.4
2	China Construction Bank	30.7	Reliance Industries Ltd.	10.4	(20.3)
3	China Mobile Communications	17.0	SAIL	20.6	3.6
4	Bank of China	14.1	Indian Oil Corporation Ltd.	3.9	(10.2)
5	China Telecommunications	11.2	NTPC	24.7	13.5
6	Hutchinson Whampoa	12.0	State Bank Of India Ltd.	12.3	0.3
7	Shanghai Baosteel Group	7.9	TISCO	20.8	12.9
8	Sinopec	1.7	ITC Ltd.	16.2	14.5
9	State Grid	1.0	BPCL	2.8	1.8
10	China First Automotive Works	2.1	TCS Ltd.	21.2	19.1

Table 5



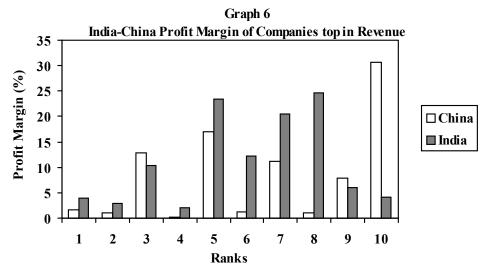
Except for the second and fourth ranks, India stands ahead i.e. eighty percent of the top ten companies with respect to profits are ahead in terms of profit margin as compared to their Chinese counter parts.

Profit Margins of Companies Top in Revenues

The following table depicts the profit margin of companies top in revenues for both the countries :

Rank	Chinese Companies	*Profit	Indian Companies	#Profit	Difference
2005		Margin		Margin	# - *
		(%)		(%)	
1	Sinopec	1.7	Indian Oil Corporation Ltd.	3.9	2.20
2	State Grid	1.0	Bharat Petroleum	2.8	1.8
			Corporation Ltd.		
3	China National Petroleum	12.9	Reliance Industries Ltd.	10.4	(2.5)
4	China Life Insurance	0.3	Hindustan Petroleum	2.1	1.8
			Corp. Ltd.		
5	China Mobile Communications	17.0	ONGC	23.3	6.3
6	Industrial & Commercial Bank of China	1.2	State Bank Of India Ltd.	12.3	11.1
7	China Telecommunications	11.2	Steel Authority Of India Ltd.	20.6	9.4
8	Sinochem	1.1	NTPC	24.7	23.6
9	Shanghai Baosteel Group	7.9	Tata Motors Ltd.	6.1	(1.8)
10	China Construction Bank	30.7	Mangalore Refin. & Petrochem. Ltd.	4.2	(26.5)

Table 6



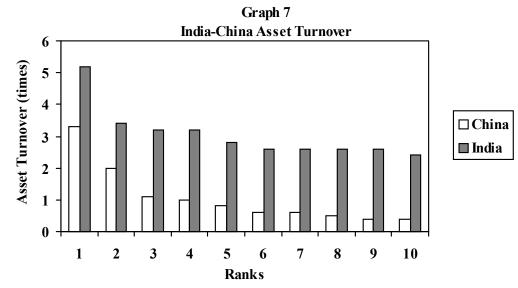
From the graph there are three incidences which shows that China is ahead of India. It could be said that in terms of profit margin for the top ten revenue earning companies, seventy percent of the Indian companies are ahead of their Chinese counterparts.

ASSET TURNOVER

The following table shows the comparison of China & India in terms of top ten asset turnover companies :

Rank	Chinese Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Sinochem	3.3	HCL Infosystems Ltd.	5.2	1.89
2	COFCO	2.0	Hindustan Petroleum	3.4	1.43
			Corp. Ltd.		
3	China First	1.1	Bongaigaon Refinery &	3.2	2.09
	Automotive Works		Petrochemicals Ltd		
4	Sinopec	1.0	Kochi Refineries Ltd.	3.2	2.20
5	Shanghai Baosteel	0.8	Bharat Petroleum	2.8	1.97
	Group		Corporation Ltd.		
6	China Southern Power	0.6	Hero Honda Motors Ltd.	2.6	1.96
	Grid				
7	China National	0.6	Munjal Showa Ltd.	2.6	1.99
	Petroleum				
8	State Grid	0.5	Marico Industries Ltd.	2.6	2.07
9	China Mobile	0.4	Mangalore Refin. &	2.6	2.18
	Communications		Petrochem. Ltd.		
10	China Life Insurance	0.4	Nestle India Ltd.	2.4	2.04

Table 7



The above table clearly shows the difference between the top ten companies in India and China in terms of asset turnover, which is within the range of 2.04 times (Nestle

Challenges for Indian Multinationals

India Limited ranked tenth) and 1.89 times (HCL Infosystems Limited ranked first). This scenario also depicts that Indian companies are more efficient in utilizing their assets towards revenue generation than their Chinese counterparts.

Industry Profile – Asset Turnover

The industry profile of Chinese companies is as follows (figures in bracket are ranks):

Trading (1,2); Motor Vehicle and parts (3); Petroleum (4,7); Metals (5); Power (6,8); Telecommunications (9) and Insurance (10).

The industry profile of the Indian companies is as follows:

Computer Equipments (1); Petroleum (2,4,9); Steel (3,7); Energy Resources (5); Banking (6); F&B and Tobacco (8) and Software (10).

Product / Service Profile – Asset Turnover

The product / service profile of China is 8:2 whereas in case of India it is 7:3.

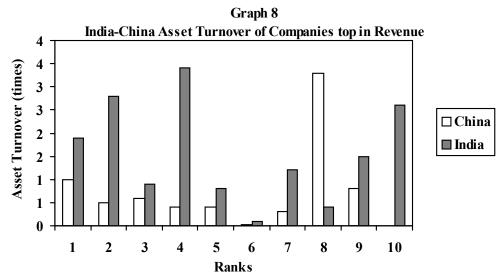
Asset Turnover of Companies Top in Revenues

The following table shows the top ten companies in terms of revenues and their respective asset turnovers for both China & India :

Rank	Chinese Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover	×	Turnover	# - *
		(times)		(times)	
1	Sinopec	1.0	Indian Oil Corporation Ltd.	1.9	0.9
2	State Grid	0.5	Bharat Petroleum	2.8	2.3
			Corporation Ltd.		
3	China National	0.6	Reliance Industries Ltd.	0.9	0.3
	Petroleum				
4	China Life Insurance	0.4	Hindustan Petroleum	3.4	3.0
			Corp. Ltd.		
5	China Mobile	0.4	ONGC	0.8	0.4
	Communications				
6	Industrial & Commercial	0.03	State Bank Of India Ltd.	0.1	0.1
	Bank of China				
7	China	0.3	Steel Authority Of India	1.2	0.9
	Telecommunications		Ltd.		
8	Sinochem	3.3	NTPC	0.4	(2.9)
9	Shanghai Baosteel	0.8	Tata Motors Ltd.	1.5	0.7
	Group				
10	China Construction	0.04	Mangalore Refin. &	2.6	2.6
	Bank		Petrochem Ltd.		

Table 8

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The above table shows some important facts which advocate the performance of the Indian companies with their Chinese counterparts. The graph depicts that there are nine Indian companies which surpass the asset turnovers of their respective Chinese counterparts with major differences. Thus, it could be said that the top ten Indian companies are more efficient in revenue generation than top ten Chinese companies in terms of asset turnover.

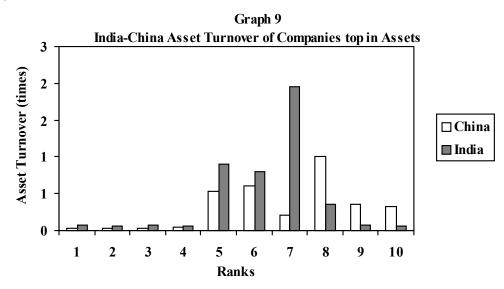
Asset Turnover of Companies Top in Assets

The following table depicts the top ten companies in assets and their asset turnover for both China and India :

Rank	Chinese Companies	*Asset	Indian Companies	#Asset	Difference
2005		Turnover		Turnover	# - *
		(times)		(times)	
1	Industrial & Commercial	0.03	State Bank Of India Ltd.	0.07	0.04
	Bank of China				
2	Bank of China	0.03	ICICI Bank Ltd.	0.06	0.03
3	Agricultural Bank of	0.03	Punjab National Bank	0.07	0.04
	China				
4	China Construction Bank	0.04	Bank Of India	0.06	0.02
5	State Grid	0.53	Reliance Industries Ltd.	0.90	0.37
6	China National Petroleum	0.61	ONGC	0.80	0.19
7	Hutchinson Whampoa	0.21	Indian Oil Corporation Ltd.	1.95	1.74
8	Sinopec	1.00	NTPC	0.35	(0.65)
9	China Life Insurance	0.36	Oriental Bank Of	0.07	(0.29)
			Commerce		
10	China	0.33	HDFC Bank Ltd.	0.06	(0.27)
	Telecommunications				

Table 9

Challenges for Indian Multinationals



The graphical representation and the table above makes the picture more clear for Indian companies and their Chinese counterparts that India is ahead of China in terms of asset turnover of companies top in assets. The difference is favorable towards Indian companies.

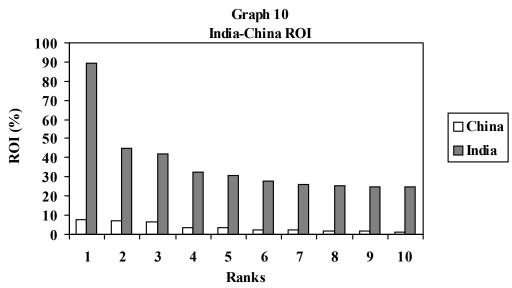
ROI

The further analysis is about ROI of top ten Indian and Chinese companies as follows:

Rank	Chinese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	China National Petroleum	7.9	Mangalam Cement Ltd.	89.6	81.7
2	China Mobile	7.2	Sesa Goa Ltd.	45.0	37.8
	Communications				
3	Shanghai Baosteel Group	6.6	TCS Ltd.	42.1	35.5
4	Sinochem	3.7	Abbott India Ltd.	32.8	29.1
5	China Telecommunications	3.7	Bongaigaon Refinery &	30.6	26.9
			Petrochemicals Ltd		
6	Hutchinson Whampoa	2.5	Infosys Technologies Ltd.	28.0	25.5
7	China First Automotive	2.4	Aventis Pharmaceuticals	26.0	23.6
	Works		Ltd.		
8	Sinopec	1.7	P&GHygiene &	25.4	23.7
			Healthcare Ltd.		
9	COFCO	1.7	Nestle India Ltd.	25.0	23.3
10	China Construction Bank	1.2	Glaxosmithkline	24.9	23.7
			Pharmaceuticals Ltd.		

Table 10

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The above analysis proves to be more favorable towards Indian companies with very large difference. The data above shows that none of the Chinese companies are close to their Indian counterparts in terms of ROI. Infact the difference is vast (highest being 81.71% among the first ranked companies of the two countries). This also means that (top ten ROI) Indian companies are able to profitably use assets better than the Chinese ones. The top Indian companies try to give an ROI of at least twenty five percent whereas in China this percentage is one and half percent. It should also be noted that the size of the assets of Chinese companies is large as compared to the Indian ones. The actual challenge for Indian companies is to maintain these returns after attaining a size proportionate to the Chinese companies.

Industry Profile – ROI

The industry profile of the Chinese companies is as follows (figures in bracket are ranks) :

Petroleum (1,8); Telecommunications (2,5); Metals (3); Trading (4,9); Food and drugs (6); Motor vehicles and parts (7) and Banking (10).

The industry profile of the Indian companies is as follows:

Cement (1); Steel (2); Softwares (3,6); Pharmaceuticals (4,7,8,10); Petroleum (5) and F & B and Tobacco (9).

Product / Service Profile – ROI

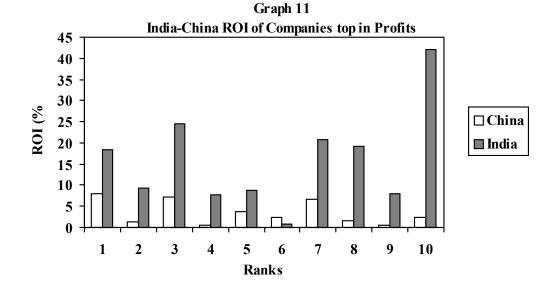
The product / service profile of the China is 7:3 where as in case of India it is 8:2.

ROI of Companies top in Profits

The following is the comparison between the top ten companies in terms of profits and their ROI for China and India :

Rank	Chinese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	China National Petroleum	7.9	ONGC	18.5	10.6
2	China Construction Bank	1.2	Reliance Industries Ltd.	9.4	8.2
3	China Mobile	7.2	SAIL	24.4	17.2
	Communications				
4	Bank of China	0.5	Indian Oil Corporation Ltd.	7.7	7.2
5	China Telecommunications	3.7	NTPC	8.8	5.1
6	Hutchinson Whampoa	2.5	State Bank Of India Ltd.	0.9	(1.6)
7	Shanghai Baosteel Group	6.6	TISCO	20.8	14.2
8	Sinopec	1.7	ITC Ltd.	19.3	17.6
9	State Grid	0.5	BPCL	7.9	7.4
10	China First Automotive	2.4	TCS Ltd.	42.1	39.7
	Works				

Table	11
Iant	



Again, Indian companies have an edge over Chinese companies in terms of ROI of the top ten profit making companies. Large differences are found in case of TCS - China First Automotive Works, ITC – Sinopec and SAIL-China Mobile Communications. In terms of Chinese companies the range of ROI is between 0.05 to 8 percent whereas in case of India the range is 0.9 to 42 percent.

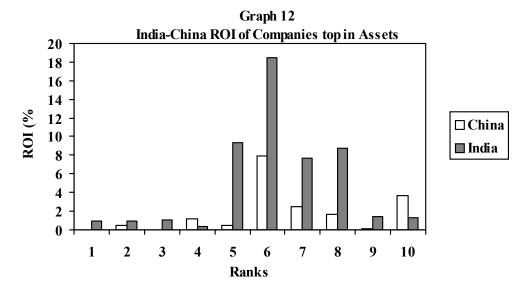
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ROI of Companies top in Assets

The table below gives the ROI of companies top in assets :

Rank	Chinese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Industrial & Commercial	0.04	State Bank Of India Ltd.	0.90	0.86
	Bank of China				
2	Bank of China	0.49	ICICI Bank Ltd.	1.00	0.51
3	Agricultural Bank of China	0.05	Punjab National Bank	1.10	1.05
4	China Construction Bank	1.24	Bank Of India	0.30	(0.94)
5	State Grid	0.52	Reliance Industries Ltd.	9.40	8.88
6	China National Petroleum	7.93	ONGC	18.50	10.57
7	Hutchinson Whampoa	2.46	Indian Oil Corporation Ltd.	7.70	5.24
8	Sinopec	1.69	NTPC	8.80	7.11
9	China Life Insurance	0.11	Oriental Bank Of Commerce	1.40	1.29
10	China Telecommunications	3.71	HDFC Bank Ltd.	1.30	(2.41)

Ta	ble	12



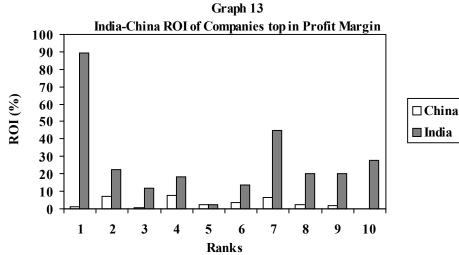
In case of companies top in assets the dominance of Indian companies can be seen from the fact that there are only two of the top ten companies with respect to asset having ROI less than those of their Chinese counterparts. Indian banks appear to be better performers. Indian banks are thus more efficient in terms of asset utilisation. The maximum ROI is 7.93% in case of Chinese companies whereas it is 18.5% in case of Indian companies. However, this can be attributed to the type of business of these companies.

ROI of Companies top in Profit Margin

The following table displays the ROI of the top ten companies with respect to Profit Margin in China and India :

Rank	Chinese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	China Construction Bank	1.24	Mangalam Cement Ltd.	89.60	88.36
2	China Mobile	7.20	Shipping Corporation	22.50	15.30
	Communications		of India Ltd.		
3	Bank of China	0.49	Neyveli Lignite	11.60	11.11
			Corporation Ltd.		
4	China National Petroleum	7.93	Great Eastern Shipping	18.60	10.67
			Co. Ltd.		
5	Hutchinson Whampoa	2.46	HDFC Ltd.	2.40	(0.06)
6	China	3.71	Television Eighteen	13.60	9.89
	Telecommunications		India Ltd.		
7	Shanghai Baosteel Group	6.60	Sesa Goa Ltd.	45.00	38.40
8	China First Automotive	2.40	National Aluminium	20.00	17.60
	Works		Company Ltd.		
9	Sinopec	1.69	Hindustan Zinc Ltd.	20.00	18.31
10	Agricultural Bank of	0.05	Infosys Technologies	28.00	27.95
	China		Ltd.		





The above findings shows how efficient are (top ten in profit margin) Indian companies with regards to their Chinese counterparts in terms of ROI. There has been a wide range of difference found between the two countries top performers. The difference ranges from negative 0.06 percent to 88.36 percent. The Chinese companies shows a range of ROI at 0.5 percent to maximum 7.93 percent which is poor as compared

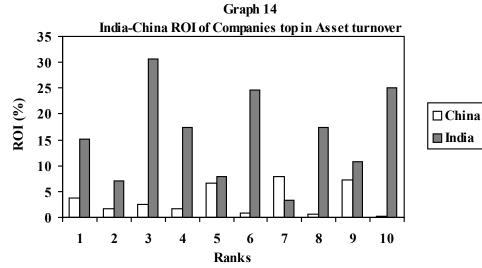
to Indian companies at 2.4 percent to 89.6 percent.

ROI of Companies top in Asset Turnover

The data below gives the comparison of ROI of the top ten companies in terms of asset turnover :

Rank	Chinese Companies	*ROI	Indian Companies	#ROI	Difference
2005		(%)		(%)	# - *
1	Sinochem	3.70	HCL Infosystems Ltd.	15.10	11.40
2	COFCO	1.70	Hindustan Petroleum	7.10	5.40
			Corp. Ltd.		
3	China First Automotive Works	2.40	BRPL	30.60	28.20
4	Sinopec	1.69	Kochi Refineries Ltd.	17.40	15.71
5	Shanghai Baosteel Group	6.60	Bharat Petroleum	7.90	1.30
			Corporation Ltd.		
6	China Southern Power Grid	0.80	Hero Honda Motors Ltd.	24.60	23.80
7	China National Petroleum	7.93	Munjal Showa Ltd.	3.40	(4.53)
8	State Grid	0.52	Marico Industries Ltd.	17.50	16.98
9	China Mobile Communications	7.20	Mangalore Refin. &	10.80	3.60
			Petrochem. Ltd.		
10	China Life Insurance	0.11	Nestle India Ltd.	25.00	24.89

Table 14



The top companies with high asset turnover in case of India have high ROIs as compared to China. In case of the China low profit margins pull down the high turnovered performance. Only three Chinese companies have ROIs more than five percent namely Shanghai Baosteel Group, China National Petroleum, China Mobile Communications whereas in case of India, there are seven companies with ROI above ten percent.

ABBREVIATIONS

ASEAN	=>	Association of South East Asian Nations
BLS	=>	Bureau of Labour Statistics
BPO	=>	Business Process Outsourcing
BSE	=>	Bombay Stock Exchange
EU	=>	European Union
FTC	=>	Federal Trade Commission
NASSCO	M =>	National Association of Software and Services Companies
GDP	=>	Gross Domestic Product
GNP	=>	Gross National Product
IBEF	=>	India Brand Equity Foundation
IDC	=>	International Data Corporation
IIP	=>	Index of Industrial Production
ITES	=>	Information Technology Enabled Services
LSE	=>	London Stock Exchange
MNC	=>	Multinational Corporation / Company
MNE	=>	Multinational National Enterprise
NSE	=>	National Stock Exchange
NYSE	=>	New York Stock Exchange
ROI	=>	Return On Investment
TNC	=>	Transnational Corporation / Company
NCR	=>	National Capital Region

BIBLIOGRAPHY

Specific References

- 1. www.economywatch.com
- 2. www.wikipedia.com
- 3. Madhukar Shukla, Competing through Knowledge, First Edition 1997, Response Books Publications, Chapter 1- The Whirlwind of Change
- Projects of the students of Rizvi Institute of Management, Bandra under the guidance of Dr. Guruprasad Murthy for the MMS/PGDBM courses (2005-06)
- 5. The advance Law dictionary by Wadhwa Publication
- 6. S. Shiva Ramu, Multinational Firms, First Edition, Sultan Chand and Sons
- 7. James B. Cullen, Multinational Management
- 8. www.mckinseyquarterly.com
- 9. www.mckinsey.com
- 10. www.forrester.com
- 11. www.gartner.com
- 12. www.idc.com
- 13. www.nasscom.org
- 14. www.ibef.org an article on "Indian MNCs"
- 15. www.bls.gov
- 16. www.equitymaster.com
- 17. Fortune 500 July 25th , 2005 issue
- 18. Dr. Guruprasad Murthy, Capital Investment Decision in Indian Industry, First Edition June 1985, Himalaya Publishing House
- 19. Dr. Guruprasad Murthy, Management by Ordinances An Anti-Inflationary Offensive, 1974, N.M. Tripathi Pvt. Ltd.,
- 20. Ludwig Von Mises, The Anti-Capitalistic Mentality, Van Nostrand Reinhold Ltd., New York.

- 21 Oskar Lange and Fred M. Taylor, On the Economic Theory of Socialism, 1976, Tata McGraw-Hill
- 22. Prasanna Chandra, Financial Management Theory and Practice, Fifth Edition 2002, Tata McGraw-Hill

General References

- a) Levine, Stephen, Krehbiel and Berenson, Statistics for Managers, Fourth Edition 2005, Prentice Hall of India Publications
- b) S.C.Gupta, Fundamentals of Statistics, Sixth Edition 2004, Himalaya Publishing House
- c) Sinha, B. P. Jai, Multinationals In India: Managing The Interface Of Cultures, First Edition 2004, SAGE Publications
- d) Edwin Mansfield, Managerial Economics Theory, Application and Cases, Fourth Edition 1998, W.W.Norton and Company Inc.
- e) Richard I. Levin and David S. Rubin, Statistics for Managers, Seventh Edition 2004, Prentice Hall of India Publications
- f) S.P.Gupta, Statistical Methods, Second Edition 1994, Sultan Chand and Sons
- g) Prasanna Chandra, Financial Management, Theory and Practice, Sixth Edition 2005, Tata Mc-Graw Hill
- h) Rudiger Dornbusch, Stanley Fishier and Richard Startz, Macro-Economics, nineth Edition 2004, Tata Mc-Graw Hill
- i) P.Ramanatha Aiyar, Advanced Law Lexicon, Third Edition 2005, Wadhwa Nagpur
- j) Philip Vale, Encyclopedia of Management, Financial Management, Volume 72002, Jaico Publishing House
- k) Statistical Outline of India 2004-05, Thirty-first Edition, Editied, Published and Distributed by Siddhartha Roy and R.G.Katoti
- V.P.Michael, Globalisation, Liberalisation and Strategic Management, First Edition 1999, Himalaya Publishing House
- m) K.R.Gupta, Liberlisation and Globalisation of the Indian Economy, Volume 1,2 and 3 1997, Atlantic Publisher and Distributor
- n) Sushil and K.Momaya, Globalisation, Flexibility and Competitiveness, 2001, Vikas Publication House Pvt. Ltd.
- o) Dominic Salvatore, Managerial Economics in a Global Economy, Fourth Edition 2005, South Western College Publishing
- p) HandBook of Statistics of Indian Economy, RBI Sixth Edition 2003-04, Published by Muneesh Kapur for RBI
- q) Alan C. Shapiro, Foundation of Multinational Finance in Management, Third Edition 1998, Prentice Hall of India Publications

- r) P.G.Apte, International Financial Management, Third Edition 1999, Tata Mc-Graw Hill
- s) V.A.Avadhani Global Business Finance, Firstt Edition 2001, Himalaya Publishing House
- t) David K.Eiteman, Arthur I. StoneHill and Michael H. Moffett, Multinational Business Finance, Nineth Edition 2001, Addison Wesley Longman (Singapore) Pte. Ltd, Indian Branch
- u) Maurice D. Levi, International Finance, Third Edition 1996, Mc-Graw Hill