

## MANAGEMENT CASE

describes a real-life situation faced, a decision or action taken by an individual manager or by an organization at the strategic, functional or operational levels

# *Reinventing a Giant Corporation: The Case of Tata Steel*

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**A**t the meeting of the senior management of Tata Steel to celebrate the spectacular performance of the company, Mr. B Muthuraman, the Managing Director, recalled with satisfaction the remarkable strides that the company had made from the difficult days in the early nineties, when the company, used to a protected environment, was suddenly thrown open to global competition, consequent to the liberalization of the Indian economy. The company had closed the year with a record profit of Rs. 34.74 billion. A series of initiatives launched by the company over the last 15 years had culminated in these stellar results although there were many challenges at every step. At each stage in its journey, the company did what needed to be done. In retrospect, however, the various initiatives launched by the company over the years now appeared to fit into a coherent picture.

The company had made steady progress over the years and had now achieved a pre-eminent status in the Indian steel industry. It had become one of the lowest cost steel producers in the world five years ago, a distinction that it had continued to maintain. All key performance indicators indicated that the company was in the pink of health (Table 1). Driven by a huge corporate ambition, the company was set to expand its footprint in the global arena seeking to ramp up its capacity from the current level of about 5 million tonnes per annum (tpa) to over 30 million tpa by the end of the decade. It now sought to become one of the top steel manufacturers in the world.

The senior management team deliberated about the road ahead. Emerging opportunities were indeed enormous. India was increasingly being seen in a very positive light by the world. Indian manufacturing in various sectors was setting global benchmarks in excellence. Tata Steel was rearing to increase its manufacturing presence overseas. The company had already committed to increase its domestic capacity four-fold. A series of well-orchestrated acquisitions were already completed and more were on the anvil. There almost seemed to be no stopping of the growth engine of the company. At the same time, many fresh challenges emerged. Major steel companies, particularly in Asia, were building up huge capacities particularly in China and India as well as several other countries. Prices which were enviable a few months ago were beginning their inevitable slide, a regular feature of the cyclical steel industry. All companies appeared to be recruiting experienced manpower at

### KEY WORDS

Reinvention

Change Management

Turnaround

Tata Steel

Liberalization

Response to  
Globalization

a frenetic pace to cope with the growth. Over the last many years, most graduating engineers were increasingly taking up careers in the IT industry. Where was the human resource pool for the company's own ambitious growth going to come from? While all through the nineties, the company's challenge was one of managing change to enable it to compete in a globalized world, the problems that stared the top management in the face currently was one of managing growth. While this was surely a happy situation to be in, the challenges ahead were many.

## THE ORIGIN

The great visionary Jamsetji Nusserwanji Tata (J N Tata) founded Tata Steel in 1907. It is one of the crown jewels of the Tata Group which has businesses spanning automobiles, steel, chemicals, information technology, communication, power generation, consumer products, hotels, and many more. In 1911, the company started production of pig iron from its blast furnace. Since then it has added on various manufacturing facilities over the years. These facilities together constitute a totally integrated steel manufacturing complex including raw materials mining and processing, sinter making, coke making, iron making, steel making, steel rolling, and a host of other manufacturing facilities and services.

The controlled regime of post-Independent India

(1947-1991) held back Tata Steel from blossoming into a global corporation at the forefront of a cutting-edge technology. Protectionism and government-controlled prices curbed the industry's competitive spirit. When liberalization finally came in the early nineties, the company was ill-prepared to face the emerging business situation that was increasingly characterized by market-determined prices, lower import tariffs, intense competition, and move from a seller's market to a buyer's market. This period also coincided with a change in leadership at Tata Steel when Mr. Ratan Tata (J N Tata's great-grandson) took over as the Chairman of the company and Dr. Irani took over as the Managing Director.

Used to decades of functioning in a protected environment, there was considerable complacency in the rank and file of the company as was the case with most companies in the country during the pre-liberalization era. This was reflected in the performance of the company until the early nineties (Table 1). The Steel Authority of India Ltd. (SAIL), set up in the seventies as a public sector company, appeared to be performing better than the Tata Steel. Several industry experts questioned the wisdom of Tata Group continuing in the steel business. There were only two options for the company: proactively preparing to face the global competition or being relegated into the annals of Indian steel making it as an 'also ran.'

**Table 1: Financial Performance of Tata Steel in the Pre-liberalization Era**

(Rs. Billion)

Year	Total Income	Total Expenditure	Profit before Tax	Profit after Tax	Dividend	Capital	Reserves and Surplus	Debt	Gross Block	Net Block
1974-75	2.80	2.52	0.28	0.15	-	0.5000	0.76	0.63	3.67	1.27
1975-76	2.88	2.75	0.13	0.09	0.0483	0.5000	0.78	0.88	3.96	1.42
1976-77	3.33	3.15	0.18	0.12	0.0599	0.6286	0.71	0.94	4.18	1.50
1977-78	3.60	3.52	0.08	0.08	0.0650	0.6286	0.74	0.88	4.39	1.56
1978-79	3.81	3.56	0.25	0.18	0.0701	0.6286	0.80	0.78	4.64	1.65
1979-80	4.55	4.30	0.25	0.16	0.0779	0.6286	0.88	0.85	4.92	1.77
1980-81	5.21	4.69	0.52	0.26	0.0856	0.6286	1.06	1.05	5.50	2.17
1981-82	7.05	6.27	0.78	0.48	0.1309	0.8344	1.21	2.34	6.50	3.04
1982-83	7.98	7.53	0.45	0.45	0.1309	0.8344	1.53	3.15	7.90	4.20
1983-84	8.90	8.70	0.20	0.20	0.1224	0.7202	1.61	3.81	8.44	4.53
1984-85	11.05	9.93	1.12	1.00	0.1512	0.7202	2.30	3.99	9.12	4.52
1985-86	12.86	11.28	1.58	1.08	0.2060	0.8274	3.34	4.47	11.16	5.77
1986-87	14.16	13.17	1.00	0.88	0.2066	0.8263	4.01	5.17	13.00	7.08
1987-88	15.27	14.15	1.12	0.92	0.2934	1.3601	4.76	5.77	15.25	8.62
1988-89	18.62	16.81	1.80	1.54	0.4617	1.5609	6.46	6.12	17.53	9.99
1989-90	21.36	19.60	1.76	1.49	0.5059	2.2943	11.03	9.54	20.63	12.00
1990-91	23.31	20.93	2.38	1.60	0.7134	2.2989	11.94	11.84	27.03	17.14
1991-92	28.95	26.17	2.78	2.14	0.8055	2.3012	13.15	20.51	40.26	28.78
1992-93	34.23	33.10	1.27	1.27	0.6482	2.7845	17.08	30.40	54.63	41.08

## A DELUGE OF PROBLEMS

The range and magnitude of problems that confronted the company by the early nineties included global competition, product quality issues, poor compliance in meeting delivery commitments, an outdated plant, and an over-sized workforce (about 85,000). Around this time, McKinsey conducted a detailed study for the Tata Group and furnished 'discussion notes' to the top management that raised serious questions on the functioning of Tata Steel and whether it destroyed shareholder value. It was clear that there was a huge misfit between the company and the new emerging environment.

## PHASE I: EMBARKING ON THE REINVENTION JOURNEY

The top management set up two task forces — one to look at realization and the other to look at costs. This brought intense focus on the tasks at hand which together resulted in a focus on improving the profitability. When the company decided to reinvent itself in 1992, it began by looking at its strengths.

### Harnessing New and Better Sources of Raw Materials

One of the biggest strengths of Tata Steel was that it had captive sources for all key raw materials: coal, iron ore, and limestone. The company began to harness its unutilized deposits of iron ore at Joda in Orissa. Beginning from the early nineties, this mine was developed as the main source for iron ore.

### Innovating to Use Blue Dust

The company had, over the years, accumulated large quantities of very fine iron ore called blue dust (an iron-rich ore which is as fine as talcum powder), which was a by-product of iron-ore mining operations. Historically, the mining of ore was done leaving areas of the blue dust. The management decided to explore the possibility of using the blue dust as raw material for its sinter plant. This change resulted in uniform mining operations.

### Process Innovation in the Sinter Plant

By benchmarking with the best plants in the world such as Nippon Steel (Japan), CST (Brazil), and Posco (South Korea), the production of the sinter plant was increased by 60 per cent which was as good as having one sinter plant free.

## New Coke Making Technology

Until the late eighties, Tata Steel, like all other steel manufacturers in India, was importing large quantities of coking coal as Indian coal has high ash content compared to imported coal and cannot be used as coking coal. Coke is an important part of a steel plant. Besides being used for feeding the blast furnaces, it also generates gas that is used as fuel in the rest of the plant.

A programme was launched to use the company's own poor quality coal (from its captive mines) for making good quality coke. At that point of time, however, there was no technology anywhere in the world that could be used to convert poor quality coal into high grade coke. Tata Steel had to indigenously develop the 'stamp charging technology' through painstaking laboratory tests and pilot plant trials over a ten-year period. After successful pilot plant trials, one of the coke ovens was converted to stamp charging. This change to stamp charging involved significant risk. If the technology failed, it would have been a big setback for the company as it would not be possible to revert back to the conventional type of coke oven. The gamble, however, paid off and all the coke ovens were eventually redone using this new method.

The new technology reduced the use of imported coal for coke to a large extent. This has given the company significant sustainable cost advantage because Indian coal is relatively low-cost and the company has an unlimited supply of medium coking coal.

### Blast Furnace Optimization

The company took aggressive steps to maximize usage of its blast furnaces. Examples included increasing the production of hot metal from 2,800 tonnes per day (tpd) to 4,000 tpd in Blast Furnace G through process optimization. Since the company's own iron ore contained high phosphorous, which is not conducive to producing high quality steels, a process was developed to manufacture low phosphorous steel through in-house technology.

### Reducing Energy Costs

The company embarked on several steps to become self-sufficient in its fuel needs. Earlier, it used large quantities of liquid fuel from one of the petroleum refineries. Significant process changes enabled the company to totally stop the use of liquid fuels. With a focus on saving energy costs, the company set up an integrated system

wherein the gas generated from coke ovens, blast furnaces, and LD converters would provide the fuel needed for other downstream processes. This was a major contributor in reducing the cost of manufacture of steel.

### Addressing Overstaffing

The top management of the company was rudely awakened when, in the early nineties, it went overseas to raise US \$ 100 million from international investors. Potential investors acknowledged Tata Steel as a good company but were unhappy that it was grossly overstaffed. Its employee strength was well beyond international norms. This prompted the top management to begin to seriously address the issue of headcount in the company. Implementing reduction of manpower was complicated by the fact that Tata Steel was well-known for its employee-friendly human resource policies. The process of workforce reduction had to commence by convincing the workers' union. The company gave union leaders the full facts about the low productivity of the company *vis-à-vis* global standards. The same message was repeated again and again in various forums for over two years. These included the Joint Department Councils (JDCs) which are forums involving senior management and workmen, held about 50 times a year, covering different departments and divisions of the company. The union leaders were sent to see for themselves the phenomenal productivity gains of steel makers in South-East Asia and Japan.

Based on various initiatives taken, the company set a record for reducing manpower while maintaining the human touch. Its Employee Separation Scheme (ESS) has become a benchmark in terms of its humane approach. From the time of the realization that it had a hugely bloated manpower, it kept dropping its employment figures by a few thousand every year. The manpower was progressively brought down to below 40,000.

### Modernization of Facilities

Many of the initiatives discussed above resulted in improving the performance of the existing assets. Simultaneously, the modernization of the facilities became an important focus area. Although the initiative for modernizing the plant started a few years prior to the liberalization of the Indian economy, it gained urgency and momentum during the post-liberalization period as the company had to grapple with the new realities of the environment. The modernization process took over a

decade to complete. These were difficult years in terms of cash flows and liquidity. The company resorted to increased borrowings to finance the modernization projects. The hot roll mill (1993) and the cold roll mill (CRM) (2000) were set up to enable the company to move towards the production of higher value-added products.

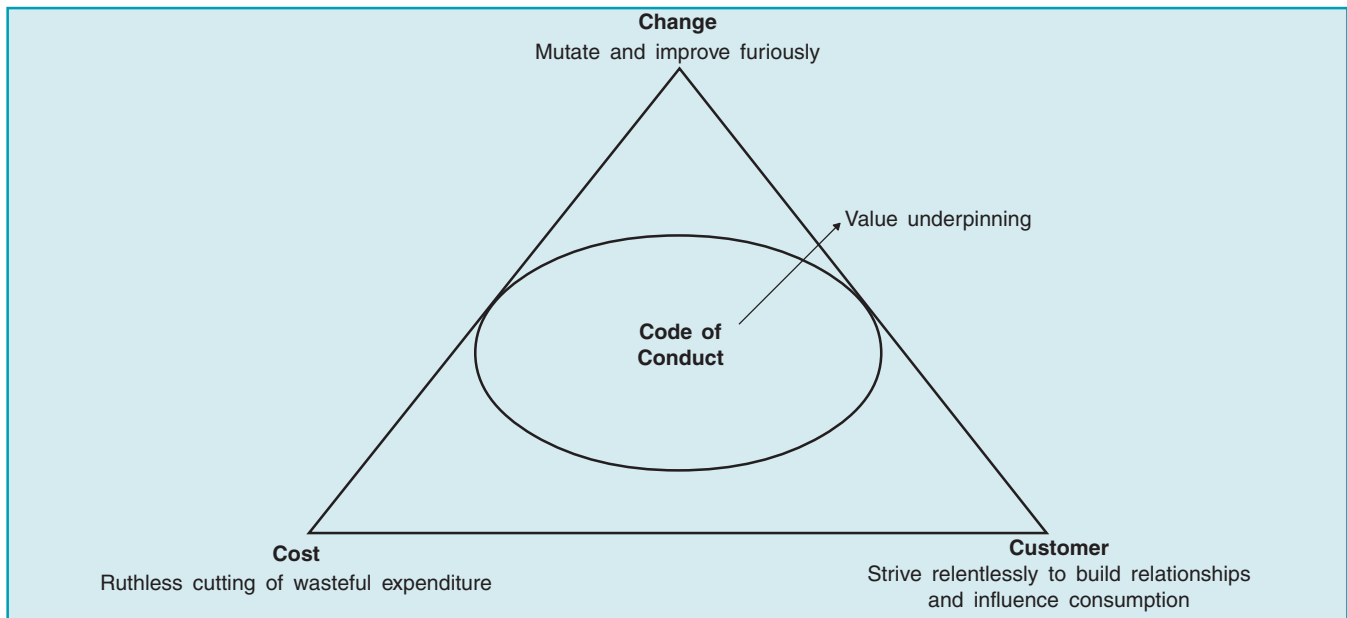
### Creation and Spread of a New Performance Culture

Tata Steel attempted cultural transformation in a very innovative way. When the CRM project was conceived in Jamshedpur, the management thought it appropriate to begin the process of cultural transformation of the company from there. The CRM was fenced off as a 'new plant' creating a physical barrier between the new plant and the old one. This was a 'nursery' where a new culture was being created. Employees for the CRM plant were specially hand-picked from the other parts of the company as well as through fresh recruitment at lower levels. Nearly all the employees who were inducted into the CRM were very young in age. All of them were computer-literate. The number of hierarchical layers in CRM was reduced from over 11 in the rest of the company to just three in the CRM plant. The systems and the working culture in CRM were totally different from those in the rest of the company. The union was requested to hold off and let the new culture develop. Seeing the success of the new culture after three years, the rest of the departments in the company and the union started asking for the same systems and culture to be implemented across the organization.

## PHASE II: THE QUEST FOR BUSINESS EXCELLENCE

Based on the visit of the top management to Japan in the early nineties, it became clear that it is the Chief Executive who has to drive the quality movement and that this responsibility cannot be delegated. However, given the mindset of the organization, bringing quality to the centre-stage of the company's agenda was not going to be easy. The top management appointed a core team of six hand-picked people from the plant who reported directly to the CEO. They were trained in Japan and became trainers within the company to drive the quality process. More than the use of tools and techniques, Tata Steel's journey to international competitiveness had much to do with the personal commitment and change-oriented leadership of its top management with an intense focus on the 3Cs: change, costs, and customers (Figure 1).

**Figure 1 : Tata Steel's 3-C Model for Excellence**



The top management's checklist for driving change in the company included the following:

- Lead the change process and take personal ownership; the responsibility cannot be delegated.
- Be the role model and the first to change; personal involvement and investment of time is key to success.
- Create endless opportunities for two-way communication within the company.
- Create a sense of urgency (not panic); embrace change even when it does not appear necessary.
- Set up a small hand-picked group to drive change in the organization; train and empower them.
- Set key result areas (KRAs) carefully; include the top management in it. In Tata Steel, this is now done through the Managing Director's balanced scorecard. Through this process, the Managing Director puts himself through the credibility test by including himself in the accountability process.

### Quality and Cost at the Centre-stage

The top management of Tata Steel was part of a delegation organized by the Confederation of Indian Industry (CII) in the early nineties to study how the Japanese implemented quality. They found vast differences between the quality practices in Japan and India. ISO 9000, which is a quality certification, was not even heard of in India at that time. Thereafter, the CII formed a Quality Division and Tata Steel enrolled as a member. The start

was tentative with certain quality systems being implemented and integrated into the company. These were important but rudimentary quality systems. The management did not stop at being content with having the ISO system in place. Instead, it launched several initiatives successively to drive quality firmly into the organization. They were not based on the latest fad but, instead, were deliberate steps introduced as part of a larger design to take the company into higher levels of performance on the two important dimensions of quality and cost. Over a period of time, the company has institutionalized several initiatives related to quality and good practices. These include: value engineering, ISO 9000, benchmarking, quality circles, continuous improvement projects, and cost reduction initiatives.

### The Journey towards Excellence

In 1996, the company systematically embarked on the quest for excellence for the organization as a whole through the JRD Tata Quality Value (JRDQV) process which leads to JRDQV Total Quality Award. Managed by the Tata Quality Management Services (TQMS), Pune, for Tata Group companies, the process of qualifying for the JRDQV Award requires the company to successfully pass through exhaustive tests conducted by trained external assessors over a three-month period. Adapted from the stringent Malcolm Baldrige criteria for business excellence, the Tata Business Excellence Model (TBEM) covers almost every aspect of a corporation including

visionary leadership, focus on the future, focus on results, organizational agility, customer-driven excellence, valuing employees and partners, management by fact, managing innovation, systems perspective, and public responsibility. The progress of Tata Steel on the journey of business excellence can be seen from its steadily increasing scores on the JRDQV assessment: 587, 616, and 643 during 1999, 2000, and 2001 respectively. Over the last three years, the company has consistently achieved scores in excess of 700 which are considered excellent by world standards.

### Accountability Issues

The willingness of the top management to create total transparency and subject its performance to discipline and scrutiny of the entire organization helped greatly in bringing about a mental transformation in the entire workforce. The company relies heavily on the balanced scorecard, a performance management and strategy deployment method developed by Robert Kaplan, a Harvard Professor and David Norton, a Consultant, to break down strategy into its component elements and track performance across the organization starting from the Managing Director. It defines KRAs for the top managers which are then cascaded down. The Managing Director's balanced scorecard is widely known across the company. A similar culture of transparency prevails at other levels as well such as at the Vice President and Department-head levels.

### Transformation into a Customer-driven Culture

By 1998, the company had successfully made the transition from operating in a seller's market prior to liberalization to one that was ready to win in a buyer's market. Tata Steel produces flat products such as hot and cold rolled coils and sheets (66% of sales) and long products in the form of wire rods, rebars, forging quality bars, etc. (34% of sales) to cater to the consuming sectors such as auto/auto ancillaries, consumer durables, construction/infrastructure, capital goods, general engineering, and railways. The delivery system was re-engineered with the help of consultants to cater to customer and market requirements. The changed mindset of the company with respect to customer orientation is illustrated by a huge sign in the company that reads, "If we do not take care of our customers, someone else will."

### Challenge of being Internationally Competitive

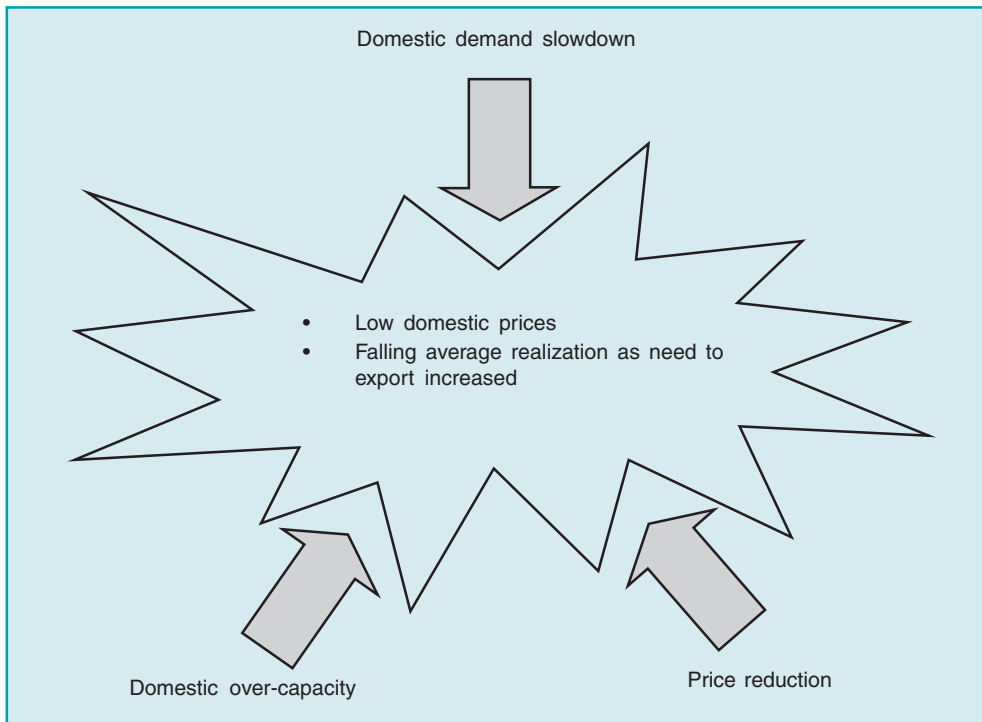
With all the steps discussed above, a lot of progress had been made in putting Tata Steel back on track and positioning it strongly to face the emerging competition in India. The plants were modernized with significant investments (over Rs.100 billion over a ten-year period). The company had implemented several initiatives towards quality enhancement. Product delivery was reasonably streamlined. However, the emerging global steel scenario during the late nineties was a cause for concern for the top management. The forces at play during the turn of the century clearly indicated that the steel industry was indeed in dire straits. There was severe pressure on world steel prices. The world steel industry's cyclical nature had been irrelevant during the pre-liberalization era. However the process of liberalization forced the Indian steel industry to reckon with many factors that were outside its direct control including the various dynamics of the world steel industry (Figures 2 and 3 respectively for the Indian steel scenario during the late nineties and forces shaping the Indian steel industry during the same period).

Tata Steel felt the direct impact as cost of goods sold increased at a compound annual growth rate (CAGR) of 10.2 per cent during 1999-2002 while the CAGR for the price of a typical product category such as hot rolled coil was 8 per cent. This meant that there was a price-cost squeeze of 2 per cent per year on the company. Another area of concern was that the average return on invested capital during the 10-year period (1990-2001) was 9.5 per cent against the weighted average cost of capital of 12 per cent. From this perspective, the shareholder wealth was getting eroded. Based on the above factors as well as due to the other strategic forces impacting the company, the top management came up with key priorities for the company (Figure 4). By 1998, operational improvement became the top-most priority of the company. Since quality was largely addressed due to the enormous progress made through the various business excellence initiatives, the spotlight now shifted to reducing manufacturing costs and maximizing output from the plants.

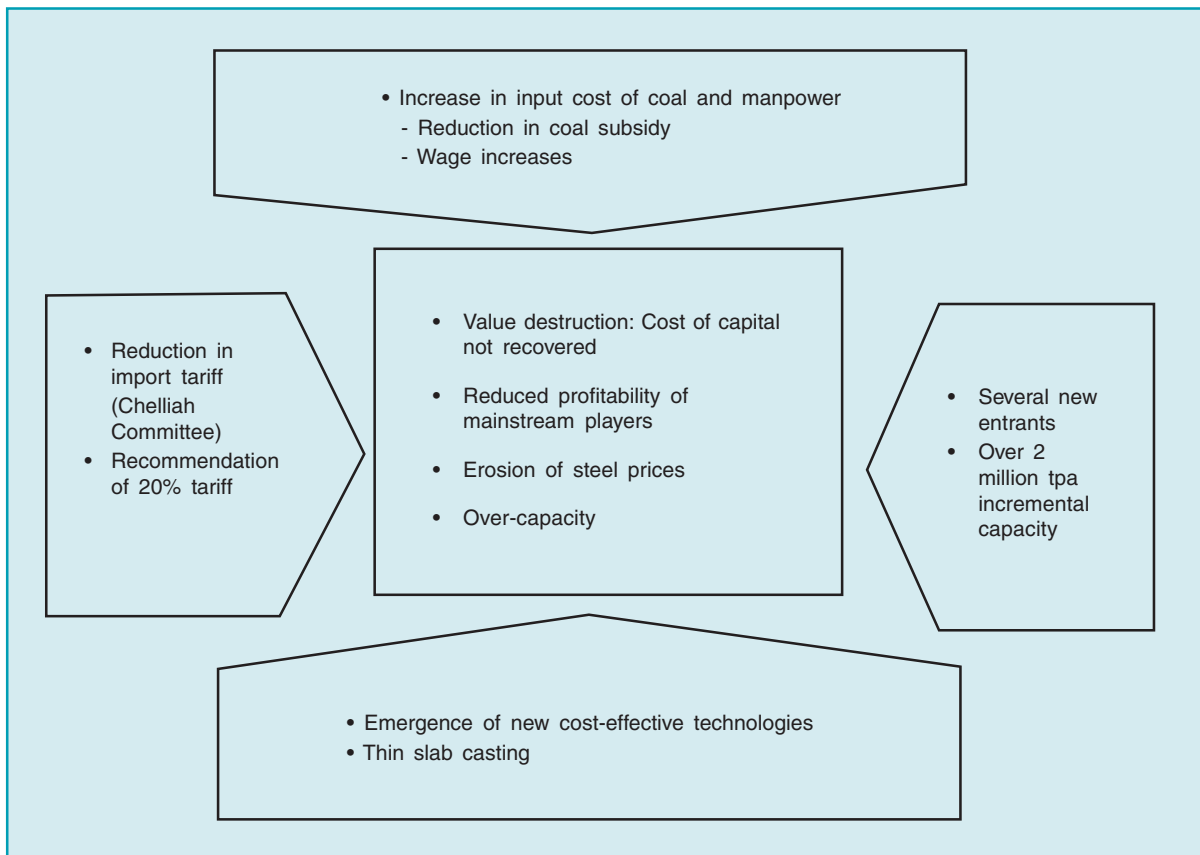
### Response of the Company

In response to these strategic forces impacting the company, a variety of initiatives like total operational performance (TOP), total productive maintenance (TPM),

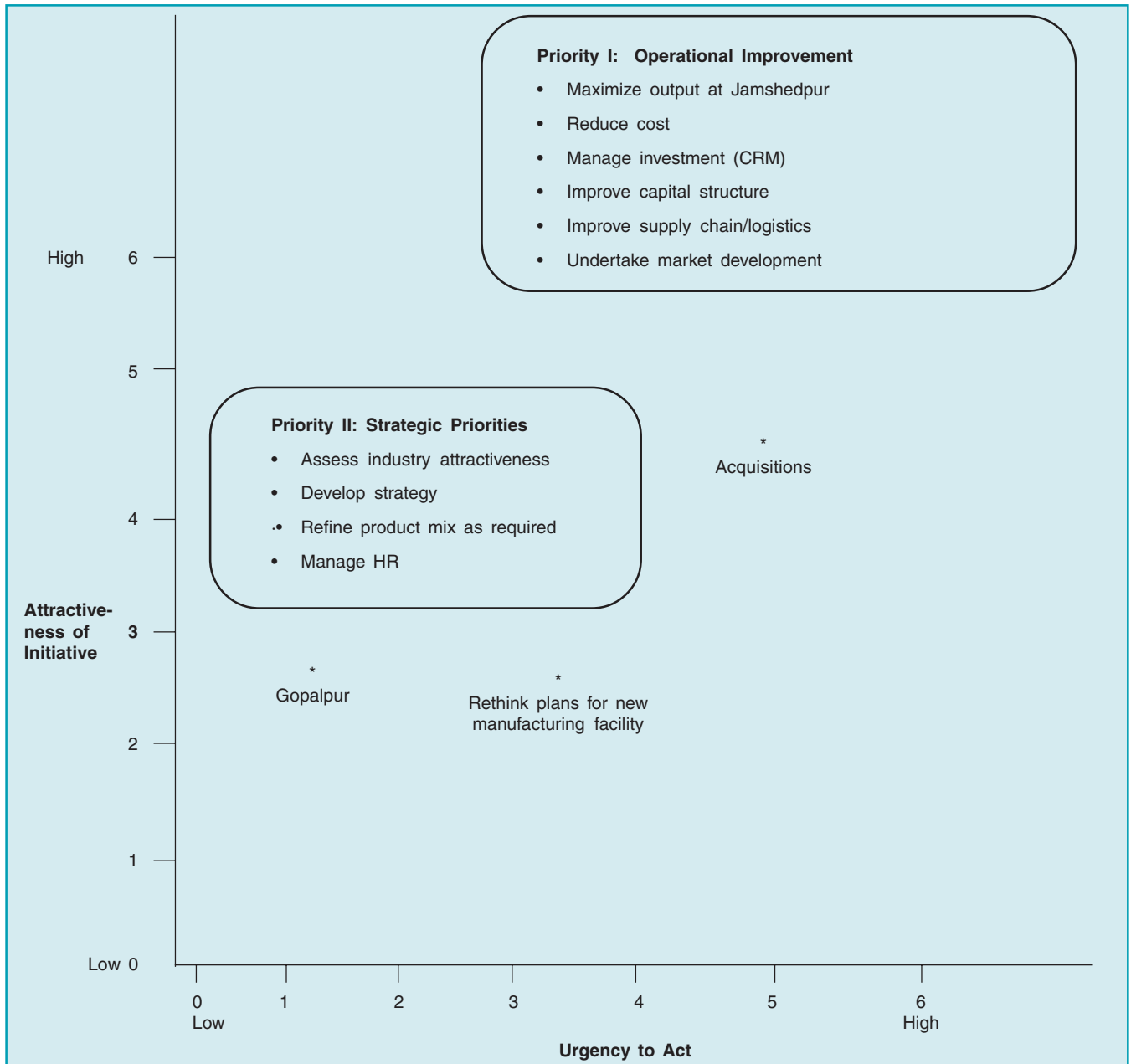
**Figure 2: Indian Steel Scenario during the Late Nineties**



**Figure 3: Forces Shaping the Indian Steel Industry in the Late Nineties**



**Figure 4: Key Priorities for Tata Steel**



knowledge management (KM), operations research and decision support systems (OR & DSS), and Six Sigma were launched. These were integrated through an umbrella programme, ASPIRE (ASPIrational Improvement to Retain Excellence). The idea was to drive cost reduction in operations and seek drastic improvement in productivity. Some of these initiatives also laid a strong foundation for creating a culture of innovation in the organization.

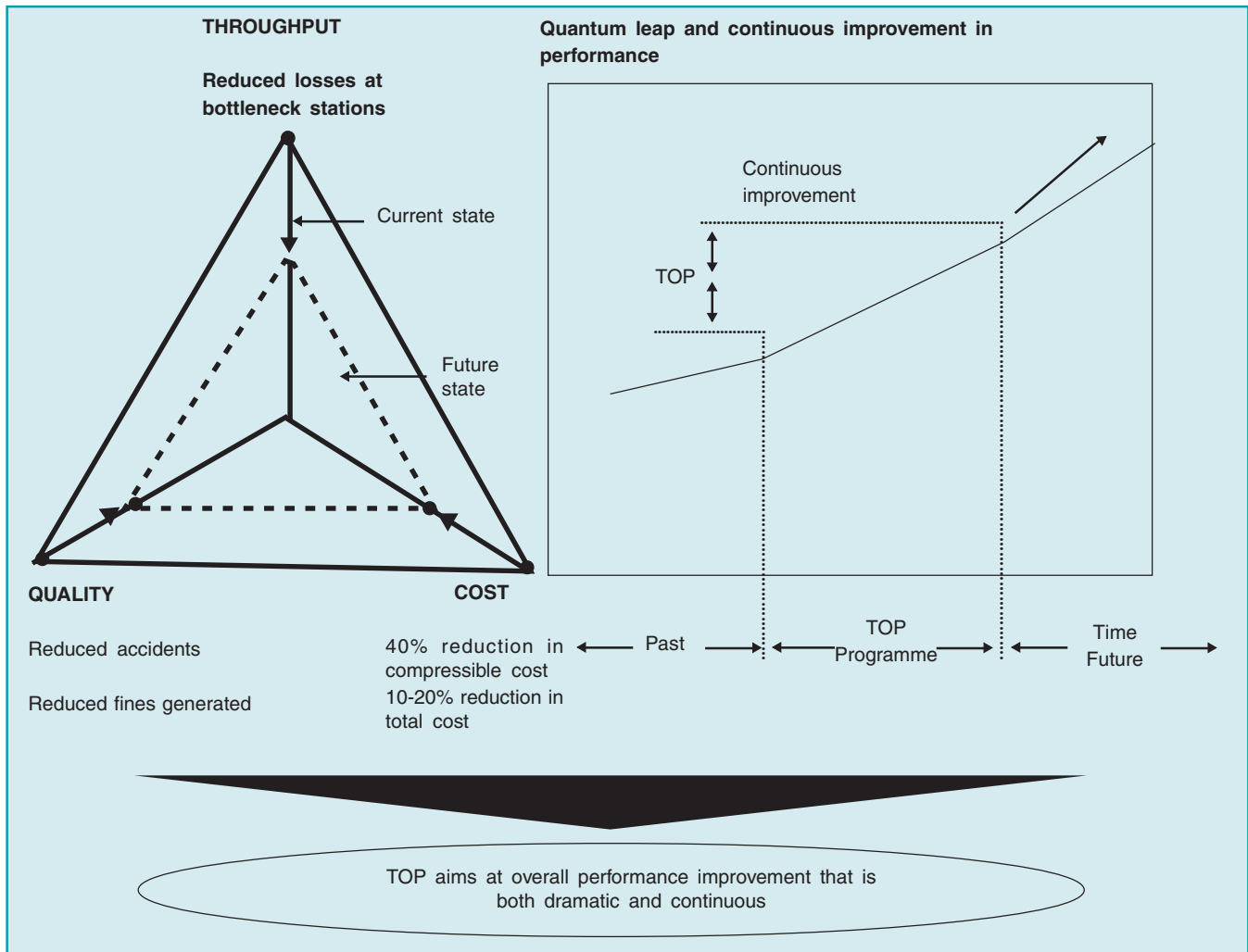
**TOP Initiative**

The company chose McKinsey as its consultant for its

productivity improvements initiative as it had extensive experience in implementing drastic performance improvements in over 250 major companies worldwide. McKinsey’s unique methodology — TOP — resulted in significant demonstrated savings ranging from 6 per cent to over 25 per cent across their various engagements worldwide over the years. TOP is a structured, time-bound, and team-based programme which uses the creativity of the people in the company as well as all its stakeholders. It results in strong positive impact on the company’s top line in the shortest possible time with minimal investment. The implementation of TOP in the



**Figure 5: The Essential Philosophy of TOP Programme**



various units of Tata Steel resulted in significant improvements through taking 'stretch targets.' The essential philosophy of TOP is presented in Figure 5.

### PHASE III: RELENTLESS FOCUS ON THE CUSTOMER

The sudden exposure caused by the opening up of the Indian economy in the early nineties resulted in the Indian steel industry having to suddenly reckon with the forces of liberalization. Inefficient operations, large-scale project delays, and 'big steel plant' mindset characterized the Indian steel industry during the pre-liberalization era. There was hardly any focus on the customer at that time. By the turn of the century, all this had to change. Tata Steel, having ensured that its operations were world-class, now turned its energies on the customer.

### Product and Customer Rationalization

The Indian steel industry is broadly classified as flat products and long products. Steel is used in eight consuming sectors, viz., construction, capital goods, auto and ancillary, packaging, consumer durables, bicycles, railways, and others. For consumption in these eight sectors, the steel is routed to 13 different industries, viz., re-rolling, cold rolling, fabrication, wire drawing, pipes, forging, bright bars, fasteners, LPG, precision tubes, cold forming, electrodes, and electrical stamping. Contrary to what most people think of steel as being a single homogenous product, in reality, there are literally hundreds of variants emanating from the composition, shape, thickness, and various physical and chemical properties.

In terms of competition, the steel industry has six large manufacturers in the flat products range and four large players in the long products range apart from many

small players. Customers are also free to import steel. Many more competitors are planning to set up significant operations in the country and several existing players are planning major expansions.

Tata Steel had a large and fragmented customer base in its business markets. While it served more than 2,000 customers, it had over 200 customers accounting for over 85 per cent of its sales. Of these, the top 50 customers accounted for 60 per cent of the sales.

Until 2000, the company considered itself to be a commodity supplier to both business (B2B) and consumer (B2C) markets. With a capacity of about 5 million tonnes per annum (mtpa) accounting for about 15 per cent of India's steel capacity, all that the company had to do in the past was to supply steel to large users in the industry for processing and value addition. During the nineties, the success of Tata Steel lay on operations excellence, cost cutting, productivity, and quality. Accordingly, all through the nineties, the drive was to improve operational efficiencies. All this led to the company becoming among the lowest cost steel producers in the world by the turn of the century. However, it was clear to Mr. Muthuraman and his senior colleagues that in the changing scenario, cost competitiveness alone would not guarantee that the company would be a successful player in the steel industry.

After it commissioned its cold rolling mill, the marketing challenge lay in Tata Steel's ability to serve a much more fragmented base of customers with stringent quality norms, large number of SKUs (stock keeping units), and different specifications to cater to varied applications. Earlier, it had to deal with large cold rollers which would take bulk hot rolled materials in fewer SKUs. It now had to deal with automotive players, appliance companies, and many more, all of which were hitherto dealing with cold rollers. Most of these new customers had exacting requirements from the steel supplier. A large part of the value addition responsibility began to shift to Tata Steel.

### Old Way of Selling No Longer Relevant

Hitherto, the focus of the salesforce comprising of CAMs (customer account managers) was on meeting the targets to the company's business customers. However, the sales were largely based on price, supplies, deliveries, and leveraging the Tata name. Moreover, the company did not focus much on retail markets in the past.

The old paradigm of doing business suddenly

appeared to have lost its relevance in the changed environment. In the past, lowest price was the basis for obtaining an order. This was further reinforced by the customer's aggressive approach of treating steel as a commodity product. Thus, supplier-customer relationships, far from being cooperative, were largely transactional. The steel industry, in general, historically operated on a 'one size-fits-all' approach. The top management saw that all this had to change and if it could drive the change in the industry, it would emerge as a leader.

In mid-2001, the company was restructured along the profit centre concept with a view to making it more responsive. Two distinct profit centres, viz., flat products and long products were created, each headed by a Vice President (VP), who was responsible for both manufacturing and sales. A key challenge was how the salesforce, which was essentially the same set of people from yesteryears, could be energized to take up the new challenges.

Based on a detailed analysis of the customer base of Tata Steel, the company came up with the following three categories of business market customers:

- Potentially large, long-term accounts called Enterprise Accounts (about 80 accounts).
- Commercial accounts called key accounts (about 150 accounts).
- Distribution (customers accessed through over 50 distributors across the country).

The investments made by the company in modernization and various related initiatives in its plant during the recent times had further strengthened its market image as a quality producer. The brand new cold rolling mill of international standards that was commissioned during 2000 was the first of its kind in India. A new galvanizing line, which was part of the cold rolling mill, produced steel of intricate specifications for the first time in the country. This line catered to high-end applications for the automotive and appliance segments. The company made some headway in setting up service centres across the country to deliver products to its customers using the principles of JIT (just-in-time) manufacturing. These, along with its innovations in processed steel materials as well as technology-related improvements in long and flat products, had positioned Tata Steel as a benchmark of sorts in the Indian steel industry.

Yet the predominant mindset of the company with regard to the sales function had not undergone significant transformation *vis-à-vis* the previous ways of doing

things. As Tata Steel had to meet the sales targets at the end of each month, steel would be thrust on to its business market customers at the end of each month even if the customers did not need the material. Consequently, the customers would often find ways to delay the payment. The purchase managers of the customer firms were typically the sole points of contact for Tata Steel's CAM. It was not uncommon for the customers to squeeze Tata Steel on price frequently demanding a 3 to 5 per cent drop in price each year. With the resulting suspicion on the part of both, it was clear that neither was gaining from the relationship. Customers clearly began to have many options. The company became acutely aware of the fact that it needed to find ways to come out of the commodity trap.

The company found answers to these issues and launched customer value management (CVM) initiative for business markets and retail value management (RVM) for its retail markets. CVM and RVM have redefined the way steel is marketed and sold in the country and have placed the company firmly on a trajectory of profitable growth. These were relentlessly driven by the top management and, in a span of about four years, the entire sales and marketing was brought on par with the best practices of the top steel plants anywhere in the world.

### Customer Value Management (CVM)

CVM has emerged as an important vehicle for customer retention in business markets. Through CVM, Tata Steel, under increasing pressure from relentless competitive forces, sought to retain and increase the share of business from profitable existing customers. In this way, it hoped to find a way out of downward spiralling price pressures.

CVM enables the company to craft competitive value chains. This became a high focus area for the company as it found that, increasingly, the end customer is no longer willing to pay for inefficiencies in the value chains. In this context, Tata Steel realized that its challenge in its business markets is no longer restricted to getting its own operations in order but, additionally, it must ensure that multiple interfaces that exist across the entire value chain all the way until the end customer are streamlined so that the value chain is free of value drains and every meaningful opportunity to create value is exploited. CVM addresses this need in a systematic manner.

Tata Steel has implemented CVM with over 25 large

business customers over the last four years. These customers were selected using a variety of criteria. This has enabled it to successfully come out of the commodity trap that it earlier found itself in. The CVM uses the TOP methodology that was used to achieve drastic performance improvement in the company's operations. However, the company innovated towards applying TOP for marketing and sales.

While one part of the challenge for Tata Steel was to find avenues to create and deliver a unique value to its customer firms, an equally formidable challenge was to obtain an equitable return for the value delivered. CVM enabled the company to equitably share in the superior value that the company delivered to its customers.

Reorienting a large company such as Tata Steel to implement CVM was a huge challenge. The task was akin to 'turning around an oil tanker on the high seas.' One of the key lessons learnt is that CVM is a never-ending journey that requires long-term commitment of the top management in order to be successful. Through CVM, the company was able to address the value drains and discover new value creation avenues along all the interfaces between the various firms constituting the value chain, including Tata Steel, all the way up to the end customer.

### Retail Value Management (RVM)

Tata Steel has redefined steel retailing in the country through its RVM initiative launched in 2002. It has brought order and discipline into the hitherto disorganized retail steel business.

While retailing has been central to FMCG and consumer durables for years, there were no practical examples for the company to emulate on how the company should break the shackles of unstructured retail to pioneer a retail story. RVM provides such a stellar example. Tata Steel has found that the actual process of implementing such a significant change in the functioning of the retail channels in the steel business requires investment of considerable resources, time, and effort of the company including its top management. In the case of a large corporation such as Tata Steel, it requires a complete change in organizational culture, structure, incentives, and mindset. Tata Steel went for a home-grown process to implement RVM by adopting the TOP methodology (that the company earlier perfected to achieve drastic improvement of its plant op-

erations). Through RVM, it 'cleaned up' the working of the retail channels.

## RESULTS

Tata Steel had made significant strides to address the challenges that confronted it consequent to the changed economic policies of the country during most of the nineties. It had put in place rigorous systems to ensure that operational costs were examined through a structured process and ruthlessly reduced. It had implemented mechanisms for productivity enhancement and monitoring equipment to ensure maximum uptimes and efficiencies. The top management found ways to ensure that the enthusiasm of the employees involved in implementing these initiatives was sustained. Appropriate reward and recognition mechanisms were put in place to ensure the development of a true meritocracy.

By all standards, the company had achieved a pre-eminent position, moving into the top slot among world steel manufacturers. It had successfully completed an ambitious modernization programme and implemented the Cold Rolling Mill project in world record time and cost. Subsequently, the company has implemented many more projects setting world records along the way. It has right-sized its headcount, implemented the JRDQV business excellence model, IT-enabled its operations, put in place KM tools, and successfully launched the TOP initiative as part of the overarching ASPIRE initiative. All this was possible by creating a sense of urgency in the minds of the people. The company made record profits over the last several years but the cost-cutting efforts continued with unabated intensity. For the first time in the history of the company, the profits exceeded Rs. 10 billion during 2002-2003. There has been no looking back since then.

CVM has resulted in the company focusing on a few profitable companies with which it chose to do business and delivering extraordinary value to them. This has helped the company to come out of the intense pressures of commoditization in its business markets. It has resulted in increasing the share of wallet that the company enjoys with its chosen customers. It has changed the paradigm for steel manufacturers wanting to do business with large customers in the country, especially those that seek to derive value from steel suppliers. This is especially true of customers in the automobile, white goods, and construction industries where the company primarily seeks to do business.

RVM has established Tata Steel as the leader in branded steel for retail markets. It pioneered the concept of branding steel in the country for retail markets. Consequently, during the last three years, the country has witnessed the emergence of a plethora of local brands, especially for reinforcing bars and GC sheets by various steel manufacturers. Tata TISCON and Tata SHAKTEE GC have emerged as the leaders with a pan-India presence. The impact of the initiative on the common man in the country has been enormous. The consumer now has access to quality steel. Prior to RVM, this was not the case. RVM has been a wake-up call to other major steel producers to clean up the functioning of the channels. RVM has raised the bar for everyone in the country dealing with retailing of steel.

Annexure 1 provides the results achieved by the company over the last decade and highlights some of the challenges ahead.

## LOOKING AHEAD

From its hesitant start in the early nineties, it had taken Tata Steel ten years of focused effort to trim costs, improve operational efficiencies, set up relatively high margin downstream facilities for producing a wider and more profitable product mix, and change mindsets across all levels of the organization. Undoubtedly, it had succeeded in reinventing itself dramatically considering the bleak future that it had to confront in the early nineties. Since 2000, World Steel Dynamics, a well-known independent rating agency, has consistently rated Tata Steel as one of the lowest cost steel producers in the world. This is not a small achievement for a company that was struggling to survive just a decade ago. Given the much higher interest costs of borrowings in India (about 8% to 10% compared to international rates of under 5%), and the high social costs of running business in India, particularly for benevolent companies like Tata Steel, the achievement is particularly commendable.

While many observers were impressed with the company's transformation, some remained skeptical. Criticisms mainly dealt with the pace of change. Could the company have achieved much more than what it actually did subsequent to the opening up of India's economy? The cyclical nature of the steel industry with its 'boom and bust' cycles was a cause for concern. The company was totally dependent on its steel business.

Mr. Muthuraman is paranoid about a sense of complacency that might set into the workforce based on

all the achievements of the company over the last decade. According to him:

The focus is now on gearing up for growth from now on. We need to get past the 20 million tonnes per annum capacity and beyond in the next few years. We will doubtless have to face even stiffer global competition in the years to come. There is likely to be a huge global over-capacity in steel production worldwide in the next few years. There are significant structural problems in the global steel industry. A continued downward pressure on prices from time to time is a reality that the global steel industry worldwide has to live with. At the same time, enormous opportunities are opening up that companies with a winning spirit can harness.

The country's most respected entrepreneur started our company with a pioneering spirit. Our challenge is to sustain that spirit across the organization. To scale newer heights from the stage we have now reached, a managerial attitude alone is not enough. We need an entrepreneurial approach across the organization. One of the things we have to guard against is complacency. It is very easy for people in our company to look at what we have achieved since the early 1990s, and believe that 'we have climbed the Mount Everest.' While we have achieved a lot, how do we continue to press ahead, and ensure that the sense of urgency and purpose is not diluted? How do we continue our forward momentum? ♡

### Annexure 1: Achievements of Tata Steel and Some of the Challenges Ahead

We consider below the performance improvements of the company during the decade 1992 to 2002 which was the period during which many of the key initiatives relating to reinvention of the company were

launched. The results are obvious: on a global basis, the company's direct costs of production are amongst the lowest (Exhibit 1).

#### Exhibit 1: Cost of Steel vs. Global Players

(US\$ per tonne)

	CSN	Thyssen	POSCO	Nippon	Tata Steel		Nucor	SAIL
					2000-01	2001-02		
Coke	86	120	65	107	56	56		99
Sinter	20	29	30	29	15	15		
Hot metal	104	129	87	119	73	75		106
Liquid steel	146	172	123	160	109	109	150	154
HR coil	200	242	154	221	153	151	192	233

Despite being one of the oldest steel companies in India, the average age of Tata Steel's plant is currently 7-8 years. The benefits of modernization have been comprehensive in terms of manufacturing cost and product portfolio:

- Raw material consumption has steadily declined from about 4.8 tonnes per tonne of steel in the financial year 1991 to 3.6 tonnes per tonne of steel in the financial year 2002.
- Labour productivity has improved from 79 tonnes of saleable steel produced per man-year in the financial year 1995 to 182 tonnes in the financial year 2001.
- Energy and refractory consumption have also fallen substantially.

A key highlight of Tata Steel's reinvention is that there have been sustained and consistent improvements on key performance metrics over the years. Despite the pressure of investments, the company has steadily lowered its debt/equity ratio from 1.5 in the financial year 1993 to around 1.0 in the financial year 2001.

Global cost competitiveness provides Tata Steel a significant edge over its industry peers in the Indian market. However, this does not entirely insulate it from the vagaries of global price cycles. There

is considerable over-capacity in the global steel industry that gets accentuated from time to time. Although the prices were buoyant until recently, aided by the large demand for steel from China, there was severe pressure on steel prices not very long ago (Exhibit 2). In the recent past, the downward pressure on steel prices has commenced. In today's globalized world, Tata Steel's profitability is unlikely to escape any prolonged downturn in global steel prices. Exhibit 3 presents the financial performance of the company during the period 1993 to 2005. A close observation of the financials after modernization shows that the company had been maintaining a net profit margin of 6 per cent over its sales and an operating profit margin of 20 per cent. With a marked decline in the interest rate, the debt/equity ratio of the company has improved quite substantially. Demand recession, large-scale dumping by foreign players, and consequent severe pressures on price realization adversely affected Tata Steel's performance in the financial year 2001-02. The company suffered a severe setback with its net profit nose-diving from Rs. 5.53 billion to Rs. 2.05 billion following a drop in sales revenue from Rs.78.10 billion to Rs.76.93 billion. But, for 1998-1999 and 2001-2002, the company has managed to show

*Contd.*

good performance in almost every year following modernization. The period 2003-2005 has shown a spectacular improvement in performance due to a combination of many factors: the culmination of years of consistent focus in reinventing the company, the buoyancy in world steel prices, de-bottlenecking various operations, revamp of key facilities,

higher manpower productivity, focus on the customer through CVM and RVM programmes, and many more initiatives. The upswing in the prices of steel is at best temporary as many previous steel price cycles have demonstrated.

**Exhibit 2: Global Steel Prices (1992-2001)**

Year	Price per Tonne in the Domestic Market (Rs.)	Price per Tonne in Global Markets (US\$)
1992	15,500	310
1993	14,750	295
1994	16,838	382
1995	17,018	373
1996	16,443	298
1997	16,850	343
1998	17,854	258
1999	17,404	272
2000	18,442	275
2001	14,300	218

**Exhibit 3: Financial Performance of Tata Steel since Reinvention**

(Rs. Billion)

Year	Gross Sales	Total Expenditure	Profit before Tax	Profit After Tax	Dividend	Capital	Reserves and Surplus	Borrowings	Gross Block
1993-94	38.23	34.64	1.81	1.81	0.9655	3.3521	21.90	34.33	64.40
1994-95	46.99	41.20	2.81	2.81	1.1824	3.3687	23.51	35.83	69.63
1995-96	58.80	50.17	5.66	5.66	1.5697	3.6723	33.75	38.42	74.08
1996-97	64.09	55.40	5.42	4.69	1.6566	3.6738	36.07	40.83	78.51
1997-98	65.17	58.10	3.63	3.22	1.4725	3.6756	36.97	52.13	89.49
1998-99	63.36	56.38	3.16	2.82	1.4711	3.6777	37.97	55.03	100.32
1999-00	69.43	60.39	4.77	4.23	0	3.6777	40.41	49.46	106.68
2000-01	78.10	67.15	6.03	5.53	1.8389	3.6797	43.80	46.73	112.58
2001-02	76.93	69.17	2.52	2.05	0	3.6797	30.78	47.09	117.42
2002-03	97.93	74.91	12.63	10.12	2.9519	3.6918	28.17	42.26	123.94
2003-04	121.60	79.54	26.66	17.46	3.6898	3.6918	41.47	33.82	132.69
2004-05	160.25	92.59	52.97	34.74	7.1951	5.5367	65.06	27.40	150.55

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