The KAIZEN and the productivity

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Abstract: looking back over the period following the Second World War, we have seen Japan attain the status of a world economic power, going through five phases of adaptation to become a formidable competitor in various product areas. These phases are:

- Large-scale absorption of technology imported from the United States and Europe
- A productivity drive of hitherto unseen dimensions
- A country-wide quality improvement programme
- A great degree of manufacturing flexibility
- Multinationality

After successfully assimilating foreign technology and then achieving very high productivity and top quality, Japanese industries are now focusing on flexible manufacturing technologies. This means having the capability to adapt manufacturing in very short time to changing customer and market requirements. The key words are mechanisation, automation, robotisation and related systems.

The world is going through a period of transition from fragmented markets to a more or less global one. Doing business in such an environment calls for unique characteristics of multinationality. To survive in highly competitive world, it is imperative for multinationals to acquire the finesse which will enable them to be identified with and integrate into the business environment or country in which business is being done. However, successful Japanese companies have been up until now, the real challenge they continue to face lies in becoming truly multinational.

After this short historical introduction we can realise that together with the other some thousands of the studies in this topic, it is easy to discuss on Japanese management systems generally but that moment when we would try to find some indicators to evaluate the productivity of this KAIZEN based management systems or to compare them with the so called ‘Western’ system we must face the difficulties of the same. These problems originated from the differences between the cultural orientation and social value systems.

The traditional appraisal system of the well-known financial indicators is not used at a great extent in our days on the field of corporate planning and evaluation but the majority of the significant firms try to introduce some kind of ‘balanced score card’ or ‘performance prism’ evaluation system.

As we try to apply these up-to-date methods to a KAIZEN system the task will even be more difficult. Of course, our small research group – and in it’s framework this study – should not undertake to try to evaluate the so called ‘original KAIZEN systems’ owned, managed and developed in the ‘authentic Japanese environment’ but what we would try to do is to
draw the attention of Hungarian small and medium size enterprises the advantages of applying KAIZEN elements in their work.

Keywords: KAIZEN philosophy, KAIZEN management, continuous improvement, productivity, profitability

1 The Kaizen Challenge

Kaizen strategy is the single most important concept in Japanese management. Kaizen means improvement. Kaizen means ongoing improvement involving everyone – top management, managers, and workers. In Japan, many systems have been developed to make management and workers Kaizen-conscious.

Kaizen is everybody’s business. The Kaizen concept is crucial to understanding the differences between the Japanese and Western approaches to management. If asked to name the most important difference between Japanese and Western management concepts, I would unhesitatingly say, ‘Japanese Kaizen and its process-oriented way of thinking versus the West’s innovation-oriented thinking’.

Kaizen is one of the most commonly used words in Japan. In the newspapers and on radio and TV, they are bombarded daily with statements by government officials and politicians regarding the Kaizen of their trade balance with the United States, the Kaizen of diplomatic relations with country X, and the Kaizen of the social welfare system. Both labor and management speak of the Kaizen of industrial relations.

In business, the concept of Kaizen is so deeply ingrained in the minds of both managers and workers that they often do not even realize that they are thinking Kaizen.

During the two decades preceding the oil crisis, the world economy enjoyed unprecedented growth and experienced insatiable demand for new technologies and new products. It was a period in which innovation strategy paid off handsomely. Innovation strategy is technology driven and thrives on fast growth and high profit margins. It flourishes in a climate featuring:

- Rapidly expanding markets
- Consumers oriented more toward quantity rather than quality
- Abundant and low-cost resources
- A belief that success with innovative products could offset sluggish performance in traditional operations
- Management more concerned with increasing sales than with reducing costs.
Those days are gone. The oil crises of the 1970s have radically and irrevocably altered the international business environment. The new situation is characterized by:

- Sharp increases in the costs of material, energy, and labor
- Overcapacity of production facilities
- Increased competition among companies in saturated or dwindling markets
- Changing consumer values and more exacting quality requirements
- A need to introduce new products more rapidly
- A need to lower the breakeven point

Despite these changes, however, many executives still subscribe to the innovation strategy and refuse to develop a strategy suited to the new era.

Numerous warning have been issued about the increased cost of resources, stiffer competition to win customers acceptance through quality, and the need to develop more customer-oriented products and services faster than ever before. Yet after having ignored these warnings for so long, Western business now 'suddenly' finds Japanese companies emerging as formidable competitors.

In today’s competitive business environment, any delay in adopting the latest technology is costly. Delays in adopting improved management techniques are no less costly. Yet Western management has been slow to take advantage of Kaizen tools developed by Japanese companies. Even worse, many Western managers are not even aware that a Kaizen strategy is available and could work to their competitive advantage.

Successful companies have shown that it is possible to anticipate change and to meet the challenges while they are still manageable. Japanese companies, for example, have successfully designed, manufactured, and marketed competitive products using Kaizen strategy. Many Western businesspeople are asking how the Japanese have done it; yet, for some reason, scholars attempting to answer this crucial question have ignored Kaizen strategy. While numerous cultural, social, and political factors have been pointed out, very few observers of Japanese management practices have examined the strategy actually employed by Japanese management over the last 50 years.

Most of the articles written on Japanese management have just promoted confusion. Each scholar has had his exclusive explanation of the secret of Japan’s management success- often implying that such success is impossible in the West. Even more confusing has been the semantics. Words like quality, productivity, and all the other jargon, while illuminating for the specialist, tend to leave the lay reader in the dark.
Many Japanese management practices succeed simply because they are good management practices. This success has little to do with cultural factors. And the lack of cultural bias means that these practices can be- and are- just as successfully employed elsewhere. Just as Japan has its plodding companies destined to fall by the wayside of progress, so does the United States have excellent companies setting new standards for product and service quality. The distinction is not one of nationality. It is one of mentally.

Since Kaizen starts with the recognition that any corporation has problems, Kaizen solves problems by establishing a corporate culture in which everyone can freely admit these problems. Problems can be both unifunctional and cross-functional. For instance, developing a new product is a typical cross-functional situation in that it involves collaboration and joint effort of people from marketing, engineering, and production.

In the West, cross-functional problems are often seen in terms of conflict-resolution, while Kaizen strategy has enabled Japanese management to take a systematic and collaborative approach to cross-functional problem-solving. Here in lies one of the secrets of Japanese management’s competitive edge.

Underlying the Kaizen strategy is the recognition that management must seek to satisfy the customer and serve customer needs if it is to stay in business and make profit. Improvements and such areas as quality, cost and scheduling (meeting volume and delivery requirements) are essential. Kaizen is a customer. Driven strategy for improvement. In kaizen, it is an assumed that all activities should eventually lead to increased customer satisfaction.

Kaizen movements are going all the time in most Japanese companies, and most companies contend that management should devote at least 50 percent of its attention to Kaizen. Japanese managers are constantly looking for way to improve in-house systems and procedures, and their involvement is Kaizen extends even to such fields as labor-management relations, marketing practices plants are often warned, "There will be no progress if you keep on doing things exactly the same way all the time.

Another important aspect of Kaizen has been its emphasis on process. Kaizen has generated a process-oriented way of thinking, and a management system that supports and acknowledges people’s process-oriented efforts for improvement. This is in sharp contrast to the Western management practice of reviewing people’s performance strictly on the basis of results and not rewarding the effort made.
2 Kaizen Values

Looking for a key concept to explain two very different management approaches, that might also help explain many Japanese competitive edge. For instance, how do we explain the fact that while most new ideas come from the west and some of the most advanced plants, institutions, and technologies are found there are also many plants there that have changed little?

Change is something which everybody takes for granted. Recently, an American executive at a large multinational firm told his company chairman had said at the start of an executive committee meeting: ‘Gentlemen, our job is to manage change. If we fail, we must change management.’ The executive smiled and said, ‘We all got the massage!’

In Japan, change is a way of life, too. But are we talking about the same change when we talk about managing change or else changing management? It dawned on me that there might be different kinds of change: gradual and abrupt. While we can easily observe both gradual and abrupt changes in Japan, gradual change is not so obvious a part of the Western way of life. How are we to explain this difference?

This question led me to consider the question of values. Could it be that differences between the value systems in Japan and the West account for their different attitudes toward gradual change and abrupt change? Abrupt changes are easily grasped by everyone concerned, and people are usually elated to see them. This is generally true in both Japan and the West. Yet what about the gradual change? The Japanese plant would remain unchanged for years refer to gradual change as well as abrupt change.

Thinking all this over, I came to the conclusion that the key difference between how change is understood in Japan and how it is viewed in the West lies in the Kaizen concept- a concept that is so natural and obvious to many Japanese managers that they often do not even realize that they possess it! The Kaizen concept explains why companies cannot remain the same for long in Japan.

The essence of Kaizen is simple and straightforward: Kaizen means improvement. Moreover, Kaizen means ongoing improvement involving everyone, including both managers and workers. The Kaizen philosophy assumes that their way of life be it their working life, their social life, or their home life deserves to be constantly improved.

In trying to understand Japan’s post-war ‘economic miracle,’ scholars, journalists, and businesspeople alike have dutifully studied such factors as the productivity movement, total quality control (TQC), small-group activities, the suggestion system, automation, industrial robots, and labor relations. They have given much attention to some of Japan’s unique management practices, among them the lifetime employment system, seniority-based wages, and enterprise unions. Yet I
feel they have failed to grasp the very simple truth that lies behind the many myths concerning Japanese management.

The essence of most ‘uniquely Japanese’ management practices be they productivity improvement, TQC activities, Quality Control (QC) cycles, or labor relations- can be reduced to one word: KAIZEN. Using the term Kaizen in place of such words as productivity, Zero Defects (ZD), kamban and the suggestion system paints a far clearer picture of what has been going on in Japanese industry. Kaizen is an umbrella concept covering most of those ‘uniquely Japanese’ practise that have recently achieved such worldwide fame.

The implications of TQC or CWQC (Company- Wide Quality Control) in Japan have been that these concepts have helped Japanese companies generate a process-oriented way of thinking and develop strategies that assure continuous improvement involving people at all levels of the organizational hierarchy. The message of the Kaizen strategy is that not a day should go by without some kind of improvement being made somewhere in the company.

The belief that there should be unending improvement is deeply ingrained in the Japanese mentality. As the old Japanese saying goes, ‘If a man has not been seen for three days, his friends should take a good look at him to see what changes have be fallen him.’ The implication is that he must have changed in three days, so his friends should be attentive enough to notice the changes.

After World War II, most Japanese companies had to start literally from the ground up. Every day brought new challenges to managers and workers alike, and every day meant progress. Simply staying in business required unending progress, and Kaizen has become a way of life.

3 Kaizen and Innovation

There are two contrasting approaches to progress the gradualist approach and the great-leap-forward approach. Japanese companies generally favor the gradualist approach and Western companies the great-leap approach-an approach epitomized by the term innovation.

Western management worships at the altar of innovation. This innovation is seen as major changes in the wake of technological breakthroughs, or the introduction of the latest management concepts or production techniques. Innovation is dramatic. Kaizen, on the other hand, is often undramatic and subtle, and its results are seldom immediately visible. While Kaizen is a continuous process, innovation is generally a one-shot phenomenon.

However, when a factory manager wishes, for example, to make small changes in the way his workers use the machinery, such as working out multiple job
In the next figure compares the main features of Kaizen and innovation. One of the beautiful things about Kaizen is that it does not necessarily require sophisticated technique or state-of-the art technology. To implement Kaizen, you need only simple, conventional techniques such as the seven tools of Quality Control. Often, commonsense is all that is needed. On the other hand, innovation usually requires highly sophisticated technology, as well as a huge investment.

Kaizen is like a hotbed that nurtures small and ongoing changes, while innovation is like magma that appears in abrupt eruptions from time to time.

Finally, the Kaizen philosophy is better to slow growth economy, while innovation is better suited to a fast-growth economy.

**Conclusion**

Arriving to this phase we are now in a position to analyse the message of the earlier chapters of this study and the results of our researching group on the area of investigating the Japanese company culture.

After realising this procedure we can make the following program for our activity:
the collection and analysis of data on the implementation of the elements of the KAIZEN management systems in Hungary and in other ‘non-Japanese’ environment.

• examination of the possibility and intention of the Hungarian SME’s to apply this kind of management methods and practices.

• determination of the principals for the productivity and profitability indicators of the Hungarian SME’s for the measuring possibilities of the changes caused by the implementation of KAIZEN elements. (Capital returning ratios; income, profit and added value for one employee; cost savings; lead-time reductions; technical parameters; defect ratios ect.)

• finalization of the productivity indicators together with the Hungarian SME’s for their effective integration to EU and for an efficient co-operation with the multinational companies using the most up-to-date ‘balanced score card’ and ‘performance prism’ systems.

References
[14] Ágnes Szeghegyi, Barnabás Bede: Bivariate Spline Approximation of Fuzzy Functions and Its Use in Digital Terrain Modeling, in Proceedings of


[18] www.kaizen-institute.com