# Changing work values?

# A study of New Zealand employees in Japanese-owned subsidiaries

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# Abstract

Culture influences the way in which people work, therefore one's work values are influenced by national culture. An increase in globalisation has occurred, resulting in organisations having to adapt to cultural diversity within and between organisations, countries, and cultures.

Japan adopted various production systems developed in the United States to rebuild their economy after World War II. Japan has since become an economic superpower, establishing operations in other countries, and transferring the same successful systems and techniques into other cultures.

This research illustrates the influence of Japanese production systems and management techniques on the work values of New Zealand employees in two Japanese-owned subsidiaries.

The findings indicate that while Japanese production systems and management techniques have been implemented within two participating subsidiaries, the influence of these systems tends to reinforce traditional work values rather than change them.

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## Chapter One - Introduction

### 1.1 Research issues

Values are influenced by various elements within society. Personal values, initially influenced by close family members, are further developed through schooling, community contacts and employment. While it is plausible that personal values including diligence, respect and loyalty may form the foundation of individual work-values, it is not until employment is gained that these personal values can be aligned to work. For individuals to value the importance of co-operation at work, for instance, they would have either learnt the benefits of co-operation from family members, been indoctrinated by society towards accepting co-operation, or they have become part of an organisation that possesses a strong culture, highlighting the importance of co-operation. While values are influenced by schooling, community contacts, and employment, national culture also significantly influences the development of work values. Studies conducted by Hofstede (1980), Laurent (1983), and Trompenaars and Hampden-Turner (1993) have indicated that significant differences in the work values and behaviour of employees working for the same organisation exist, while possessing different nationalities.

With the continual expansion of the global economy, organisations are becoming more culturally diverse and will, increasingly, have to deal with work values from other cultures (Pelled and Xin, 1997). Since economic liberalisation and deregulation of the New Zealand economy began in 1984, foreign owned organisations have invested heavily in New Zealand industries by establishing offshore subsidiaries. The likelihood of conflicting work values developing through the establishment of foreign-owned subsidiaries is possible. Managers no longer have the luxury of ignoring cultural differences; rather, cultural diversity must be acknowledged as an important component of organisational success.

While organisational success can be influenced by minimising the level of conflicting work values, national culture according to Hofstede (1991) can also influence an

organisation's success. Japan adopted numerous production systems from the United States to rebuild the Japanese economy after the devastation of World War II (Gleave and Oliver, 1993). The application of just-in-time production, statistical quality control and total quality management, combined with Japanese culture, proved to be radically successful and established Japan as a new economic super power. Japanese organisations expanded operations internationally, and New Zealand was seen as a positive investment destination due to economic liberalisation (Tradenz, 1997). Japanese organisations were able to increase their holdings in forestry, manufacturing, tourism and hospitality industries, while transplanting the production systems which secured Japan's ultimate business success. However, the importance of Japanese culture and work values as a factor influencing the success of such systems has not been adequately researched (Ford and Honeycutt, 1992). The blanket adoption of total quality management (TQM), quality circles, and just-in-time production without adequate adaptation towards the work values of New Zealanders may result in such systems not being successfully implemented.

No research has been conducted on the influence Japanese production systems have on the work values of New Zealand employees within Japanese subsidiaries. Therefore, the conclusions reached by Hofstede (1980), Trompenaars (1993) and Laurent(1983) discussed above, may not have the same relevance within a New Zealand context. However, the introduction of production systems and management techniques from Japan may, directly or indirectly, influence existing work values of New Zealand employees.

As work is a crucial element of peoples' lives, the possibility of changing work values continue to hold significant importance for individuals, their employers and society as a whole. Hence, a worker's response to changes in work values have important implications for society which deserves further investigation.

## 1.2 Research question and objectives

What influence do selected Japanese production systems and management techniques have on the work values of New Zealand employees in two Japanese-owned manufacturing subsidiaries?

Objectives

1.    To determine which Japanese production systems and management techniques have been implemented and used in two Japanese-owned subsidiaries;

2.    To determine, compare and contrast the work values of employees in two Japanese-owned subsidiaries;

3.    To discover whether selected Japanese management techniques, namely lifetime employment, seniority based promotion, enterprise (in-house) trade unions, and group consultation and decision making, influence the work values held by New Zealand employees;

4.    To discover whether selected Japanese production systems, namely just in time production, kaizen, quality circles and total quality management influence the work values held by New Zealand employees.

## 1.3 Research limitations

Hofstede (1991) remarks that systematic research on values, at times, creates a feeling of ambiguity. This ambiguity is heightened by presuming that what people say implies that this is what they actually do. He emphasises that pen and paper questionnaires should not be taken too literally. In other words, people will not always act as they have scored. Despite this potential problem, the researcher believed that due to the amount of data need to be collected during a relatively short time, a worker survey was the most

appropriate data collection instrument, as such a survey would generate a wide range of rich data in a relatively quick and inexpensive manner.

Due to time and financial limitations imposed, it was considered necessary to use various methods of data collection to improve the validity and accuracy of results. Both a worker survey and semi-structured management interviews were conducted to provide a full understanding of the phenomena and context under study.

To be representative, the sample size of respondents at each participating subsidiary should ideally have been approximately half of all employee numbers. However, because the management of both subsidiaries indicated that worker disruption should be kept to a minimum, respondent numbers of around 40 to 45 percent were considered adequate. Despite limited participation, the researcher was able to undertake adequate data analysis, creating sufficient discussion of results collected, and enabling reliable conclusions to be drawn.

The composition of Section A of the worker survey was based on characteristics developed from Hofstede's five cultural dimensions: those of uncertainty avoidance, power distance, individualism, masculinity and long term orientation. While only one prominent theory has been used in the creation of the seventeen value questions to determine each employee's work values, the adaptation of Hofstede's characteristics was considered appropriate as, to date, it is the largest collection and discussion of work-related values published.

Jaeger (1986) argues that two distinct limitations are noticeable with the results of Hofstede's cross cultural survey: the representativeness of the sample and the validity of dimensions created based on national boundaries, highlighting the potential problem of ignoring cultural diversity within countries. However, despite Hofstede's critics, his research has been replicated and validated in many studies since its completion, highlighting the general acceptance of both his results and conclusions.

## 1.4 Thesis organisation

The following chapter presents a review of pertinent literature, while Chapter Three outlines the research method employed in the present study. The findings and results of the research are presented in Chapter Four, with discussion and analysis following in Chapter Five. To conclude, Chapter Six presents research conclusions and recommendations for further study.

## Chapter Two - Literature Review

### 2.1 - Introduction

Since the 1980s, researchers have attempted to investigate the reason behind Japan's economic success. Ouchi (1981), for example, was interested in differences between work settings in the United States and Japan. He suggests that successful Japanese companies depend more on management than culture to maintain their success. Fukuda (1987) argues that both national and organisational success within Japanese society is based on underlying Confucian teachings, while others argue that Japanese economic success stems from basic economic principles (Stone 1997).

With increased interest from the West, organisations have attempted to transplant numerous Japanese production systems and management techniques into their organisations with various levels of success. New Zealand research conducted by Enderwick (1991a), Harper (1994), and Perry, Davidson and Hill (1995) has shown that a small proportion of both New Zealand organisations and Japanese-owned subsidiaries in New Zealand, have adopted Japanese-style management and production systems and philosophies reducing costs, increasing market share and raising profits (Challis, 1991).

The review of the following literature outlines the need for organisations to consider New Zealand work values when adopting Japanese management techniques and production systems. Further, organisations must adapt these systems to local conditions in order for them to be successful.

## 2.2 - Work values

Recent theory and research regarding work values is based largely on the premise that work values are derived from an individual's personal value system (George and Jones 1997). The development of a personal value system is influenced by various elements within society including schooling, community contacts and employment (Hofstede, 1991). While an individual may acquire fundamental values at an early age, including respect for authority, equity, fairness and co-operation, these values can not be associated with work until employment is gained.

Research conducted by Rokeach (1973) identified 18 fundamental values which, when ranked in terms of importance, represent a person's value system. Many of these values, while generic in nature, can be associated with an individual's work once employment is gained. Rokeach (1973) categorised personal values into two distinct classes. First, he associated values with 'preferable modes of conduct', or those which are intrinsic to the individual but are visible within one's work. Ambition, broadmindedness, helpfulness, honesty, and intelligence are examples. Second, he associated personal values with end-states, or those values which can be aligned to specific outcomes including a comfortable life, a sense of accomplishment, family security, freedom, self-respect, and social recognition. While Rokeach (1973) concluded that personal values are categorised into two distinct classes, each individual possesses both intrinsic and extrinsic values, which tend to influence an individual's behaviour.

An individual's behaviour can be seen as shaped by both personal and work values. George and Jones (1997) suggest that a value system guides behaviour by providing criteria that can be used to evaluate the surrounding world. Further, an individual's personal values determine which types of behaviour are desirable. At work, personal values determine the level of commitment, motivation and co-operation individuals will have towards their work, colleagues and workplace in general (James and James 1989).

According to George and Jones (1997), organisational theorists and researchers have for decades been intrigued by work values and how they affect individual members. Studies have examined the dimensions of job satisfaction and work values, as well as focusing

on the relationship between job satisfaction, job performance, and turnover. George and Jones (1997) shows that such research is disjointed, with studies not giving a sufficient understanding of the magnitude of factors associated with work. While it is important that these studies were conducted, further research must investigate the influence of international work values as a component towards organisational success.

Pelled and Xin (1997) suggested that recent economic developments and changes in international trade relations, including the establishment of regional co-operative agreements, are increasing the ethnic population of multinational organisations. This trend calls for a greater understanding of how work values differ across national borders. Existing research, including that by Hofstede (1980, 1991) and Ralston, Gustafson, Elsass, Cheung, and Terpstra (1992), has devoted little attention to the comparative work values of Pacific Rim countries, focusing instead on how broad dimensions of national culture differ within specific regions.

Existing comparative studies of New Zealand and Japanese work values have generally focused on broad dimensions of national culture rather than values specifically pertaining to the workplace. While national cultural dimensions may shape work values, they are broader than work values and "when extended to a different level of analysis ... they tend to lose predictive validity" (Paik and Teagarden, 1995).

Despite the comments of Paik and Teagarden (1995), Geert Hofstede (1980) identified five dimensions, which he used to differentiate between national cultures. *Masculinity* - the degree to which a society values material success, progress, assertiveness, and gender role differences; *individualism* - the degree to which members of a society focus on satisfying personal interests over the interests of the group; *uncertainty avoidance* - the degree to which members of a society are uncomfortable with or threatened by uncertain, ambiguous, or unstructured situations; *power distance* - the degree to which members of a society accept an unequal distribution of power; and *long term orientation* - the degree to which members of a society focus and plan long term.

Hofstede's (1980) research found clear differences between the national cultures of New Zealand and Japan. Japan held the highest possible score among 53 countries regarding

masculinity with a score of 95, while New Zealand held a substantially lower score of 58, indicating that Japanese value progress, assertiveness, and gender role differences more than New Zealanders do. Similarly, Japan scored significantly higher regarding uncertainty avoidance (92), with New Zealand again recording a substantially lower score of 49. Japan's extremely high uncertainty avoidance score reflects Japanese society being built on mutual harmony and the reduction of uncertainty, reinforced by strict rules, laws, and customs, a high degree of formalisation and a distinct intolerance towards behaviour and opinions that differ significantly from their own (Phatak, 1995). Further, Japan held a higher score (54) regarding power distance, while New Zealand held a significantly lower score (22). In contrast, New Zealand had a relatively high score (79) regarding individualism, while Japan had a significantly lower score of 46. New Zealanders have a tendency towards high individualism, with a low tendency for power distance. Inkson (1998) remarks that "these cultural differences are evident in the way New Zealanders pride themselves on self sufficiency and the notion of a classless society". The last cultural dimension is long term orientation indicating that Japan focuses long term with a score of 80, while New Zealand's score of 30 indicates it does not. Such distinctions in national culture are likely to foster distinctions in work values according to Hofstede (1991).

In addition to the cultural distinctions identified by Hofstede (1980), several other important features of New Zealand and Japanese culture are likely to shape work values. Webster and Perry (1989) noted that international studies suggest national value systems are real factors in obtaining national performance. They suggest, further, that New Zealand's value system stems from two fundamental variables which have influenced its development, namely a Protestant work ethic, and economic liberalisation.

The Protestant work ethic, according to Pelled and Xin (1997), emphasised work as a calling from God - "an obligation which the individual is supposed to feel and does feel towards the content of his professional activity". Although New Zealand has gained a

far greater mixture of religions and religious values since the early settlers, the Protestant work ethic is still believed to be a powerful driving force within New Zealand organisations and is still seen by New Zealanders as being important to gain financial

freedom. However, the "Protestant work ethic has rather lost its religious character and taken on a more materialistic tone that reflects economic thinking" (Walker, Marshall & Humperies, 1995, p.44).

George and Jones (1997) and Robbins, Waters-Marsh, Cacioppe and Millet (1994) argue that values can change over time, especially during major societal upheavals. During the 1980s, major societal and economic changes were implemented within New Zealand society, heralded by the election of the Fourth Labour Government in 1984. Economic liberalisation and deregulation ensued as New Zealand was placed on a competitive level with the rest of the global economy (Enderwick 1997). Prior to 1984, the work values of many, especially within the public sector, were typified by a discouragement of innovation, lack of customer service quality, and overall inefficiency (Inkson, 1998). Organisations needed to become more efficient to survive, therefore necessitating a drastic turn around in work values to enable organisations to compete increasingly on global terms. Walker et al. (1995) comment that "today New Zealanders are increasingly under considerable pressure to compete with Asian economies where social, political and economic realities combine to form a quite different work ethic" (p. 45).

In Japan, work values stem from Confucian teachings and are indigenous to Japanese culture. These teachings advocate respect for work, discipline, thrift, protecting 'face', ordering relationships by status, duty to the family, and economic egalitarianism. Webster and Perry (1991) suggest that the Confucian emphasis on economic development, coupled with a free market economy, has resulted in Japan being a key player in the world economy. Interestingly enough, Confucian teachings in Japan have not changed drastically, like the Protestant work ethic in New Zealand has over the last century. The constant and long held teachings of Confucius, according to Chen (1995), were due to Japan being a closed economy prior to 1852 minimising external influence from Western values and attitudes. Confucian teachings were strengthened further by external trade being conducted only with countries who emphasised similar teachings.

While work and personal values are expected to change over time, according to Hofstede (1991) and Webster and Perry (1991), it is usual for values learnt later in life

to change and not values associated with core beliefs. Values associated with work, for instance, are likely to change from job to job and organisation to organisation. Personal values, based however, on core beliefs learnt at an early age have a lesser likelihood of being altered. Work and personal values held by the Japanese are an example of changing values due to radical economic and social reform (Stone, 1997).

According to three contemporary studies, Webster and Perry (1989); Webster and Perry (1991); and Gold and Webster (1990), both fundamental and work values held by New Zealand society have not altered significantly since economic liberalisation.

Despite the general view held by most New Zealanders that money and work should not be so important, materialism predominates. For example, Gold and Webster (1990) reported that while New Zealanders were concerned with job security, pay remained a high priority, with a third of New Zealanders working solely for or motivated by monetary rewards. Materialism seems, however, to have been replaced during the early 1990s by a greater need for job security and stability, due to increasing unemployment and government restructuring. Young (1992) remarked that individuals were staying in one job longer than in the past, "not necessarily because they want to be there, but often because they dare not give up what they have in the face of little alternative" (p.17).

New Zealanders generally look for satisfaction of a more qualitative nature at work: pleasant work colleagues, interesting and challenging work, with the opportunity to use their skills more fully (Gold and Webster 1990). In the future, the traditional work ethic will tend to be downgraded through new employment patterns and ways of working. This will enable workers to feel more useful and productive at work (Dewe, 1990)

Webster and Perry (1989) indicated that, based on their findings, two general work cultures exist in New Zealand. The first is located among the less educated who are "primarily involved in a quest for comfort and security, with a high level of general satisfaction but no marked degree of ambition or personal investment in work for its own sake" (p.29). This culture is mainly personified by the Maori and Pacific Island populations, whose main motivation towards work is derived only from monetary rewards (Gold and Webster 1990). The second work culture refers to the more

advantaged within New Zealand society, those reflecting ambition and determination, a self growing and learning individual, who has an intrinsic enjoyment for achievement but is not necessarily motivated solely by money. These findings suggest that organisations intending to become more competitive must identify, nurture, and support a variety of work values as no one particular set holds the key to motivating an organisation's workforce.

George at al. (1997) argue that the tenets of Congruence theory suggest that work values can have a powerful impact on the effectiveness of human resource management (HRM) in each country. Nadler and Tushman (1980) remark that congruence refers to "the degree to which the needs, demands, goals, objectives, and/or structures of one component are consistent with the needs, demands, goals, objectives, and/or structures of another component" (p.45). If components are mismatched, they have the possibility of interfering with each other, impairing organisational performance.

Given that congruence between HRM and work values is likely to enhance worker productivity, according to George and Jones (1997), knowledge about work values from different countries may be useful in predicting the effectiveness of HRM in different countries.

Finally, Pelled and Xin (1997) note "that all too often, managers assume HRM practices used in one country will be equally effective in another, only to find that employees abroad have different work values and, hence, do not have the expected response to those practices" (p.186). Managers employed within Japanese owned subsidiaries in

New Zealand can therefore benefit from learning how New Zealand work values differ from those in Japan, while determining the significance differing work values have towards HRM in both countries.

## 2.3 - Japanese-style management

In recent years, the management of human resources in Japanese enterprises has attracted a great deal of attention abroad. Their management systems are considered to be one of the key factors accounting for the success achieved in improving productivity, and the quality of the goods and services they produce. As a result, the transferability of various elements of Japanese management has become of considerable interest to scholars and practitioners (Jain, 1990). However, despite such an increase in popularity, confusion still surrounds the exact definition of Japanese-style management.

Japanese-style management is open to some debate, according to Beechler and Yang (1994), who commented that "generally authors have included the practices of job rotation, seniority-based wages, long-term employment, implicit performance evaluation, team-based employee activities, consensus-style decision making, and a relatively small gap between white-collar and blue collar workers in terms of benefits, salary and on-the-job perquisites. (p.468). This definition, is however, no means universal. Chen (1995) describes Japanese-style management rather loosely as what people see as substantially different between Japanese management techniques and those practised in the West. On the other hand, Whitehill (1991) argues that many articles have been written on the important tenets of the so called 'sacred treasures' of Japanese-style management, namely lifetime employment, seniority based wage and promotion, consensus decision-making, and enterprise unionism. One reason for the lack of a definitive definition is due to the application of such techniques constantly changing, with "important trends in economic and social conditions deeply eroding the unique approach to management which served Japan so well between the end of the Second World War and the historic oil shocks of the early 1970s" (Whitehill, 1991, p. xiii-xiv). Despite the lack of an adequate definition, Tachiki (1991) comments that lifetime employment, age-based seniority, and company unions are considered to be the three pillars of Japanese style management. These three pillars will form the basis for discussing Japanese-style management in this thesis.

## *Lifetime employment*

The first principle, lifetime employment, as Chen (1995) comments, consists of two fundamental components. Each employee is recruited directly from school not from the current labour market; and all employees are expected to stay with the organisation for a lifelong period, in return receiving lifelong job security. Hasegawa (1986) comments that a key factor behind Japan's startling industrial success has often been cited as lifetime employment. He continues to comment that the lifetime employment system is by no means universal in Japan: "lifetime employment is a general guiding principle not an absolute guarantee" (p. 11). Further, lifetime employment applies only to a small proportion of full-time employees particularly males, employed in large organisations which have the financial capability to offer such a principle.

Why do Japanese workers proclaim the merits of a principle that applies only to a small proportion of the working population? Hasegawa (1986) remarks that lifetime employment is viewed as the backbone of Japanese style management, in that it "creates an atmosphere of co-operation and harmony, reducing restlessness and insecurity" (p.12). Harris and Moran (1996), on the other hand argue that the "whole concept of permanent employment is left over from feudal arrangements of the past and is now being undermined by superindustrial developments" (p. 275). Harris and Moran's (1996) view is strengthened by Stone (1997), who comments that the lifetime employment principle was offered not because of cultural mystique but due to economic necessity. He continues to comment that "economics has destroyed the myth of lifetime employment as an expression of Japanese culture" (p.22). Within Japanese society, lifetime employment, especially by younger generations, is no longer seen as an important component of society; instead more and more families "take holidays, spend more time together and possibly change jobs" (Stone, 1997, p.22). The application of lifetime employment within organisations operating in New Zealand is not an economic reality due to business and economic uncertainties. Further, as New Zealand is a relatively small manufacturer and exporter nation, long term, let alone lifetime, employment cannot be assured (Enderwick, 1991a).

*Seniority-based promotion*

Seniority promotion is closely related to the concept of lifetime employment, as the length of employment determines promotion. Chen (1995) comments that lifetime employment, while benefiting fast growing companies, has recently come under tough pressure especially during economic decline. As economic growth slows, increases in pay associated with years of service increase the economic burden on an organisation. The younger generation in Japan have a tendency to be impatient towards promotion based on seniority, instead holding decreased organisation loyalty, increasing the acceptability of job-hopping (Stone, 1997). As this change gains momentum, the basis of harmony, strong emotional ties and an 'extended family' atmosphere within Japanese organisations will weaken. While strong emotional ties and a family atmosphere are not adopted by the majority of organisations operating in New Zealand, harmony (rapport) between workers and management is considered important.

While promotion in New Zealand is based mainly on individual performance and merit, according to Rudman (1994), employees are motivated by individual 'pay-for-performance' schemes. Campbell-Hunt and Corbett (1996) note that there has been a small increase in interest towards alternative reward practices, mainly gain and profit sharing, and small group incentives. However, the majority (62 percent) of organisations surveyed still favour individual incentive plans. Therefore, although some interest has been shown towards alternative reward practices, it is unlikely that many organisations operating in New Zealand will introduce a promotion system solely determined by seniority.

Wilson and Sullivan (1994) and the Australian Manufacturers Counsel (1994), concluded that the number of New Zealand and Australian organisations which utilise reward strategies aimed at 'prospering together' was relatively small, while Japanese

organisations support the advancement of harmony and continued co-operation to prosper. Deming (1986) was highly critical of individual performance management and incentive schemes as they promoted disagreement when the emphasis should be on increasing teamwork. Campbell-Hunt and Corbett (1996) comment that Deming was

insistent that more could be gained by co-operation rather than competition within an organisation's workforce. Kerr (1997) comments that companies have every reason to reward and encourage the attribute of co-operation. "Under the Employment Contracts Act (1991), where direct dealings with employees have replaced bargaining by remote agents, and where pay can be tied to performance more directly than in the past, workplace co-operation has vastly improved" (p.7). Rewards for individual performance are a distinguishing characteristic of human resource strategies used by organisations in New Zealand, that seek to sustain superior performance over the long term. But, in current New Zealand practice, these do not seem to be balanced, as yet, with rewards that encourage a collective commitment on the part of the whole organisation to the co-operative pursuit of enterprise goals.

## Enterprise Trade Unions

Co-operation between management and workers is also visible within Japanese organisations through enterprise trade unions. Enterprise trade unions are an essential aspect of the Japanese labour movement, and are often cited as "a competitive advantage of the Japanese-style management system" (Chen, 1995, p.191). Furthermore, the post war growth of Japanese industry "would have been impossible without the stable, co-operative union-management relations within companies made possible by enterprise unions" (Whitehill, 1991, p.245). Despite overwhelming support and commitment, membership within enterprise trade unions is only available to regular company members, excluding "part-timers, temporary and subcontract workers" (Chen, 1995, p.192). Conflict between these two groups of employees would surely result. However, Japanese society is built upon the foundations of a sense of order, propriety, and appropriate behaviour between superiors and inferiors. Further, there is a tendency, as Harris and Moran (1996) note, away from individual rewards towards group or

organisation recognition. Each individual within Japanese society accepts their position and does not try to change it. However, as commented previously, pressure for change is growing among younger generations. Harris et al. (1996) comment that the "young epitomize the culture of change - energetic, productive, yet anxious for change" (p. 271).

New Zealand unions differ from those in Japan in two significant ways. First, employee unions are classified by industry groupings, rather than specific enterprises. Second, all employees have the opportunity to apply for union membership as there is no distinction between membership of full, part or subcontract workers. However, since the introduction of the Employment Contracts Act (1991), union membership has dramatically declined by 52.2 percent between September 1989 and December 1996 as the Act gave all employees the right to decide whether or not they wished to belong to a union and who they wanted to be represented by (Department of Statistics, 1998, p.323). Lansbury and Macdonald (1992) observe that for employers, enterprise unionism can assist in redirecting the focus of employee loyalty to the company. The Employment Contracts Act (1991) increased freedom for enterprises to organise their own employment relationships, reflecting a move from union to enterprise based bargaining. Boxall and Haynes (1992) explained that a number of enterprises were now fostering and adopting a high trust strategy between managers and workers, established by enterprise-based bargaining brought about by the introduction of the Employment Contracts Act (1991). They commented that, through such a high trust strategy, organisations could encourage serious commitment to total quality management (TQM). Despite the potential for a high trust strategy developing, the majority of organisations trading within New Zealand have indicated few changes to their employment relations since a change to enterprise-based bargaining. Perry et al. (1995) go further to comment on the importance of worker involvement towards workplace change, arguing that if change is to be implemented effectively employee consultation and decision making is required.

## Group consultation and decision-making

There is a tendency for Westerners to claim that all decisions made within Japanese organisations are based on group decision making. Harper (1994) comments that "it is generally accepted that there is greater emphasis upon consultation during business decision-making processes in Japan" (p.68). This is correct when one studies both the *ringi-seido* and the *nemawashi* forms of decision making used within Japanese organisations. However, certain decisions in all organisations regardless of origin require instant decisions to be made by management. Consensus decision making

within Japanese society has deep cultural roots. Chen (1995), comments that, as Japanese society is based on mutual *wa* (harmony) which constitutes the essence of Japanese life, harmony can be maintained via consensus, hence "decisions reached can be carried out more efficiently" (p.184).

Japanese consensus decision making is conducted by two forms. First *ringi-seido*, a formal decision making approach which includes a detailed proposal, documented by middle management which is forwarded to all departments and individuals concerned. Each employee involved attaches their comments to the original proposal, eventually reaching the president of the company where a decision is made based on the attached comments (Whitehill, 1991). The second form of consensus decision making is referred to as *nemawashi*. This is an informal decision making process where the practice of informally sounding out employee ideas about a proposed course of action or project is undertaken (Chen, 1995). A large proportion of organisations operating in New Zealand do not use either the *nemawashi* nor *ringi-seido* systems. Harper (1994) comments that one reason suggested for this lack of use is the small scale of New Zealand operations. Therefore, most authority is either guarded by the managing director, fostering a top-down decision making style, or organisations are relatively small with decision making occurring relatively quickly without such formal collection procedures.

While the review of literature has indicated that the majority of organisations operating in New Zealand have not adopted Japanese-style management techniques, Beechler and Yang (1994) comment there are three schools of thought pertaining to the transfer of Japanese management practices overseas. The first school, referred to as the cultural school regards the multinational enterprise's country of origin as a key determining factor in what human resource management techniques are transferred to overseas subsidiaries. The cultural school holds the belief that the transfer of Japanese-style HRM practices will be difficult, if not impossible, because of major cultural and national differences. The transfer of Japanese HRM practices from a homogeneous and collectively oriented culture such as Japan to New Zealand, a country which epitomises and rewards individuality, would be an extremely arduous undertaking.

The second school of thought is the rationalistic school, which, rather than emphasising national culture as a key determining factor in the transfer of management practices, believes that transferability is a rational response to "industrial development, competitive pressure, and production technologies' (Beechler and Yang, 1994, p.469). Ouchi (1981), for example, carefully analysed fundamental similarities in business functions between Japanese and American firms and concluded "some form of the essential characteristics of Japanese companies must be transferable" (p. viii). Harris and Moran (1996), and Stone (1997) argue further that lifetime employment is left over from feudal arrangements further demystified by rational economic logic, minimising the influence of culture as a determining factor towards overseas adoption.

The final school of thought regarding the transfer of Japanese management practices overseas is referred to as the technology-HRM fit school. Beechler and Yang (1994) comment that writers in this school believe that a contingency perspective is used to focus on the rationality of production technologies. The development of human resource practices and their subsequent transferability to overseas subsidiaries must be aligned directly to implemented production systems and processes.

While Japanese-style HRM has not been implemented within the majority of organisations in New Zealand, the difficulty of transplanting such techniques may indeed highlight the wide gap in cultural differences between Japan and New Zealand. However, as Ouchi (1981), Harris and Moran (1996), and Stone (1997) comment, cultural differences have been negated by industrial developments. This could possibly explain the small number of organisations adopting such practices; however, it does not explain why so many organisations have not. Therefore, national culture may indeed be a formidable barrier to transplantation.

Interest regarding the adaptability on various elements of Japanese-style HRM techniques into Western organisations increased as Japan become a powerful competitive player in global markets. Reitsperger (1986) notes two casual factors regarding the success of Japanese style management. Japanese culture and tradition, which he believes are, both "uniquely engulfed and expressed in the management of personnel" (p.562). These two variables, while essential to the success of management

in Japan, could cause formidable problems when such techniques are adopted in Western organisations. Tachiki (1991) suggests that as enterprise-based unions, age-based seniority, and lifetime employment have been developed by Japanese society they are not well-suited to overseas local conditions. In New Zealand, according to Yarwood (1993), mixed results regarding Japanese management techniques being adopted have led Western analysts to invoke some elusive ingredient to account for Japan's success, such as culture. Bloch (1988) argues that the importance of culture to Japan's managerial success cannot be over emphasised. He has shown that no nation can simply import techniques effectively unless those involved have the appropriate attitudes and values.

Japan has a pluralistic culture: essentially indigenous, but modified by Western influence. The feudal heritage - a sense of responsibility, team-work and the family system - accelerates rather than impedes progress on the economic front, according to Bloch (1988). Japanese culture formally and openly stresses the interests of the group over and above individual success, whereas Western culture glorifies competition and individualism, forming the back bone of Western management. Therefore, as Japanese and Western management aim at achieving different goals (pluralistic versus individualistic), Japanese management techniques cannot be adopted blindly, as many would simply not work within Western organisations.

Japanese management took a firm hold in many organisations, due to the gradual elimination of the motor vehicle assembly industry in New Zealand. Nissan, Suzuki, and Toyota New Zealand all introduced Japanese management techniques into their New Zealand subsidiaries, not because they were Japanese-owned, but because it made economic sense. The Japanese management approach is neither boisterous or mysterious; their methods are so practical that when taken apart and studied they often seem remarkably simple. F Segawa, Nissan New Zealand's managing director, introduced a programme, dubbed 'the Nissan way'. This programme is based on three fundamental principles, namely, best quality, teamwork and flexibility in the workplace. Segawa saw a lack of employee decision making ability within Nissan New Zealand as an organisation-wide problem. He therefore encouraged decision-making at the lowest possible level, something which the Japanese think New Zealand companies do not

encourage enough. Similar to Nissan, Suzuki New Zealand sees team work as an important prerequisite for organisational success. The changes brought about within Nissan New Zealand through 'the Nissan way' have been slow and by no means dramatic. This is partly due to cultural differences limiting the degree to which management styles can cross national boundaries. However, according to Yarwood (1991), it is even more a symptom of Japanese management itself. The Japanese don't force their style on anyone. B Owen (1991), Nissan New Zealand's general manager comments that "this is the way it is done in Japan, if it is appropriate for you in New Zealand then introduce it" (p.15).

The introduction of Japanese management techniques into organisations trading within New Zealand was seen a means to upgrade management effectiveness by employing more superior methods. Enderwick (1991b) notes, in his study of foreign-owned, car-assembly plants in New Zealand that all companies were committed to total quality control, employment stability and a move towards common work conditions. He continues to comment that, while "none of the companies were committed to lifetime employment, they did provide significant employee training, while seven of the eight companies have attempted to rationalise union representation" (p. 122).

What is of utmost importance, according to Enderwick (1991), for the successful implementation of Japanese management techniques, is that each technique is modified not only for the New Zealand environment, but also for each organisation's context. Research conducted by Enderwick (1991) reveals eight domestic companies placing increasing significance on quality, multi-skilling, teamwork, and employee participation. While no company agreed that lifetime employment had been adopted, companies rather claimed a high commitment to employment stability as advocated by Perry et al. (1995). All respondents agreed on the desirability of using Japanese type practices: "half believed they provided a better way of doing things, two identified improvements in quality and productivity and two felt that New Zealand companies now need to find and emulate the best practices available" (Enderwick, 1991, p.99). All respondents further emphasised the importance of adapting these methods to suit conditions and practices in New Zealand.

It was advocated by Enderwick (1991), that Japanese management techniques were introduced to increase the management effectiveness of organisations operating in New Zealand. However, the Fourth Labour Government instituted a variety of changes in a bid to make local assemblers more efficient. Toyota Thames responded to its new market environment with its adaptation of both Japanese management and production systems, achieving not only efficiency gains but also attaining a quality performance level matching assembly plants in Japan. While continued reduction of government intervention in the vehicle assembly industry resulted in only a small number of vehicle assemblers still operating in New Zealand, the Toyota Thames assembly plant's approach to quality management has the potential to be applied in many other manufacturing organisations throughout New Zealand.

The introduction and adaptation of new labour practices at Toyota Thames necessitated the creation of a 'new culture'. Chris Leavy (Toyota Thames plant manager) explains that the culture is referred to as a purpose culture, focusing on people. Individual responsibility was forced downwards to all employees, resulting in increased delegation to workers, while increased communication and information sharing was seen as an important component of the new culture. Standardised work practices, job classifications and a shift towards promotion from within were further seen as important components towards developing and sustaining a new people- focused culture. Toyota New Zealand's head office were of the opinion that management and staff at Toyota Thames were the best ones to make decisions about their own problems; therefore, both management and workers at Thames were kept fully informed about prospective changes. Perry et al. (1995) point to the attitude of staff as one of the key factors in the plant's success: "real gains in the quality of working life have tended to changed worker attitudes in the company ... the key to success is getting staff genuinely onside" (p.185).

Perry et al. (1995) conclude by commenting that "to be truly successful in anything apart from the narrowest economic sense, workplaces must necessarily adapt organisational systems to fit the unique demands of their workforce and socio-cultural settings" (p.189), in turn reinforcing Bloch's warning against adopting Japanese HRM techniques into New Zealand organisations blindly.

## 2.4 - Japanese Production Systems

While Whitehill (1991) remarks that few people have not heard of the 'four sacred treasures' of Japanese management - lifetime employment, seniority based promotion system, consensus decision making, and enterprise unions - individuals are more familiar with the well known Japanese production systems and philosophies: just-in-time production system, kaizen, quality circles and total-quality-management.

Since the early 1980s, Japanese manufacturing in a number of industries, according to Nakamura, Sakaibara and Schroeder (1998), have achieved high levels of international competitiveness. Japanese manufacturing systems, especially those associated with just-in-time manufacturing, have attracted considerable attention in the West. As management today is no longer dominated by European and American perspectives, the emerging 'Japanese way' has become popular. "Japanese management practices appear to give us insight into more efficient and effective planning leading to improved organisational outcomes" (Gilbert et al. 1995, p.57). The most dramatic evidence towards the influence of Japanese production systems in organisations operating in New Zealand has come under the umbrella of total quality management (TQM).

### *Total quality management*

Gilbert et al. (1995) remark that "TQM focuses on the important issue of quality which is dependent upon customer perception rather than a set quality standard" (p.59). TQM is a relatively new approach to leadership and management, which is derived from the *kaizen* philosophy. *Kaizen* meaning continuous improvement organisation-wide. TQM is fast becoming one of New Zealand's most widely adopted management models, with an initial boost from European importers strongly suggesting a quality certification for manufactured goods is obtained by New Zealand organisations. Many New Zealand organisations, including Toyota Thames, Nissan New Zealand, Quality Bakers Limited, and Parkroyal Hotel Christchurch, have adopted TQM to reduce costs, increase market share and raise profits (Challis, 1991).

*Kaizen* is a fundamental component of TQM as the adoption of quality management automatically involves the philosophy of continuous improvement. Kaizen, therefore, according to Harper (1994), is applied to the total organisation in a search for continued improvement, a search for sustained excellence. Toyota Thames, for instance, adopted the kaizen principle to search for continual incremental improvement after the reduction in government subsidiaries by the Fourth Labour Government and the threat of reduced tariffs on imported cars. Toyota Thames realigned its policies to "create a quality organisation that aims for nothing less than perfection ... the philosophy of continuous improvement" (Perry et al, 1995, p.173).

For continuous improvement to be successful, a necessary component is the involvement, commitment, and support of all employees. Campbell (1997), however remarks that for most organisations kaizen and TQM require a total shift in organisational culture. "Its introduction may prove to be problematic unless the concept is fully taken on board by all members of the organisation" (p.219). Various techniques can be utilised by an organisation to obtain employee involvement. One such technique is quality circles.

*Quality circles*

Quality circles are defined by Chen (1995) as "small groups of employees who do similar work and meet regularly to examine, identify, analyse, and solve product quality problems and to improve overall production" (p.206). The extraordinarily rapid and successful growth of Japan has led attempts all over the world to copy quality circles and other participative practices. Lawler (1986) suggest that if any industry wants to successfully compete globally it needs to adopt Japanese democratic decision making practices. However, the transfer of such practices has proven problematic due to socio-cultural differences between Japan and Western countries. Quality circles are used by a number of organisations in New Zealand, citing the advantages of improved communication, greater job satisfaction and improved morale (Whitehill, 1991).

While Dawson and Palmer (1993), remark that group problem solving techniques are an essential and related characteristic of TQM, Enderwick (1991, cited in Perry et al. 1995) argue that the quality circle concept within New Zealand varies considerably from the Japanese model. He comments that "New Zealand quality tends to focus on getting the assembly process right, as opposed to curing component defects" (p.168). Just as Japanese overseas operations vary in the extent to which they maintain Japanese production systems, quality circles within Japanese-owned companies in New Zealand vary in terms of formality, task orientation and which organisational levels are involved (Harper, 1994). Despite this, there is general agreement that quality circles will not work unless there is recognition that they do not operate in isolation; instead they are but one component of the total system towards quality management, including kaizen, statistical quality control and just in time production.

### *Just-in-time production*

Just-in-time production (JITP) is a Japanese management philosophy applied in manufacturing which includes having the right items of the right quality and quantity in the right place and at the right time (Chen and Podolsky 1993). The Japanese tend to have a just-in-time objective. According to Schonberger (1982), the Japanese use engineering to drastically cut machine set-up times, so that it is economical to run small batches. This leads to significantly higher quality and productivity and provides visibility for results so that work responsibility and commitment are improved. Despite these potential advantages, there are strong cultural aspects associated with the emergence of JIT, including the Japanese work ethic, which may possibly limited its transfer to New Zealand. The success of JIT will require companies to identify and work with problems within their organisation which hinder the adaptation of such a production system.

Several Japanese affiliated firms in New Zealand, produce products to order (JIT) rather than producing to stock. However, the just-in-time inventory concept is not well established within New Zealand for a number of reasons. Firstly, New Zealand business

culture is not ideal for JIT inventory; greater flexibility and acceptance of group responsibility is required. Secondly, there is a lack of reliability regarding New Zealand suppliers (Harper, 1994). Toyota Thames is one organisation who successfully implemented both JITP and resolved the problem of unreliable suppliers, by establishing a pick up and delivery system - referred to as the 'milk round', where Toyota collects raw materials from their suppliers. Bayly (1991) comments further that a major barrier to the implementation of JITP is the lack of knowledge and understanding of the JIT concept. Those organisations which do implement it must be aware that while just-in -time production has many components that operate interrelatedly, just-in-time production itself is only one critical component operating systematically within a TQM system.

The introduction of more advanced methods was to increase management effectiveness and resolve productivity and quality performance issues. While this was seen as a positive alternative, the adoption of just-in-time production, TQM, kaizen and quality circles within organisations operating in New Zealand was not 'smooth sailing'. Rather, implementation required adaptation and radical workplace reform. Chapman (1993) showed that many organisations, while enthusiastic about TQM and its potential to deliver a competitive advantage, rushed to implement a range of "quality management initiatives, which have simply been bolted onto various parts of existing corporate structures and management practices" (p.88). He believes workplace reform is not a quick-fix solution; rather, it requires commitment and effort by managers and workers at all levels. For organisations to reap the rewards of improved company performance and profitability associated with total quality management, "managers must unlock their workforces' motivation, skills, and intelligence by creating an environment of true participation and continuous learning" (p.88).

A successful example of implementing Japanese production systems via workplace reform is Toyota Thames. Perry et al. (1995) comment that the inefficiencies inherent in traditional working practices at the Thames plant had been known for a long time, but with legislative changes and changing consumer expectations, as noted by Suzaki (1985), the plant adopted numerous Japanese production systems and philosophies to increase plant efficiencies. The plant created a goal towards 'total quality' in terms of

returning a profit to the company and job security for its workforce. Toyota Thames achieved this by introducing a philosophy of continuous improvement and universal participation via TQM and lean production methods. To implement these changes successfully it was essential for workers to be fully informed, as workplace reform altered the traditional way of work at Toyota Thames, therefore requiring individual workers to alter their attitudes towards work. Further, Perry et al. (1995) show, the introduction of Japanese production systems and philosophies necessitated an incremental approach to gain the confidence of workers during workplace reform. Attitudes towards working can be altered, according to Hofstede (1991); however, change must occur slowly and incrementally, otherwise problems will occur. As was the case when Nissan New Zealand introduced 'the Nissan way', leading to a major industrial dispute lasting for ten weeks. Toyota Thames was well aware of this possibility and minimised its threat through worker consultation and incremental changes.

While Toyota Thames adopted numerous production systems and philosophies from Japan, in order for them to be implemented successfully, adaptation was required. Japanese production systems transplanted into Western organisations regularly encounter problems, due to cultural differences. Westney (1987 p.25, cited in Young, 1992, p.677), comments that "no matter how much a new organization's founders may want to built an exact copy of a model drawn from another society, they can never replicate it completely in the new setting". Therefore, because social and organisational structures differ between Japan and New Zealand, the direct transfer of production systems without adaptation is not ideal.

Chan, Samson, and Sohal (1990) argue that production systems are transferable from Japan, with the key ingredient for success being to understand the broad context of manufacturing culture, infrastructure, and environment, before expecting a transplanted or adapted Japanese manufacturing system to be effective. While it is critical that production systems from Japan are adapted to New Zealand conditions, a change in New Zealand working attitudes and values is also required. New Zealanders, according to Hofstede (1980), generally have a inclination towards individualistic and rather masculine characteristics. The implementation of kaizen and quality circles, in order to

foster commitment towards maintaining an organisation's competitive position through a reduction in wastage and continuous improvement, seems to be in conflict with the view that workers tend to satisfy personal interests before those of the organisation.

With the introduction of TQM, kaizen and quality circles at Nissan New Zealand, Toyota Thames and Suzuki New Zealand, a change in work attitudes was required. These three organisations emphasised the importance of teamwork while fostering a culture of co-operation. Within Suzuki New Zealand, management needed to be seen as teamwork exemplars, emphasising co-operation and harmony before other staff could be expected to be involved in teamwork towards total quality. Further, it was seen as critical at Nissan New Zealand that workers participate in offering suggestions for improvement. However, according to Owen (1987, cited in Yarwood, 1987), a change in attitude towards suggesting improvements was required.

Prior to the introduction of 'the Nissan way', suggestions for improvement were minimal. There was a view that inefficiencies "should be the responsibility of the person who was in charge of the activity, if I am not involved it has nothing to do with me" (Williams, Owen, and Emerson, 1991, p.4). Management at Nissan New Zealand were of the belief that these views to a greater or lesser extent are prevalent in many organisations, not just in New Zealand. K Shimada, director of manufacturing at Nissan New Zealand concludes that "this way of thinking was a result of the environment and systems in place and had little to do with human or kiwi-culture". Therefore, by moulding, supporting and developing workers' attitudes towards teamwork and co-operation, workplace reform was successfully initiated.

To conclude, while interest in the transfer of Japanese production systems to Western organisations has increased, the importance of adapting such systems to local conditions cannot be underestimated. Workplace reform, emphasising a change in employee values and attitudes towards work, is fundamental to the success of such systems. Further, if existing management structures and techniques do not support transplanted production systems, it is possible that such a mismatch of strategies will not produce the benefits of increased productivity, competition and profitability gains as shown by Japanese organisations.

## 2.5 - Conclusions

The adoption of various Japanese management techniques and production system into both New Zealand organisations and Japanese-owned subsidiaries operating within New Zealand, as discussed by Harper (1994), Enderwick (1991), and Perry et al. (1995), has shown that adaptation towards not only the New Zealand environment, but also for each individual organisational context is required.

Further, while Perry et al. (1995) discussed the introduction of TQM, kaizen, and quality circles at Toyota Thames resulting in radical workplace reform, the influence of these production systems on employee work values was not discussed. Harper (1994) in a study of Japanese-affiliated firms in New Zealand follows a path similar to Perry et al. (1995), discussing the adoption of Japanese management and production systems, but disregarding the influence work values have towards successful implementation of such techniques and systems.

Further, given that congruence between Japanese management techniques, production systems and work values is likely to enhance worker productivity, knowledge about the relative work values of New Zealand and Japan is essential to predict the effectiveness of specific management and production systems.

Managers employed within Japanese subsidiaries in New Zealand can therefore benefit from learning how work values between the two countries differ, while determining what influence Japanese-style management techniques and production systems have on the work values of New Zealand employees.

# Chapter Three - Research Method

## 3.1 - Introduction

The basis of this research is a case study. Yin (1994) suggests that case studies can be the basis of an investigation of "a contemporary phenomenon within its real life context" (p.13). Within this research, the phenomenon under study (work values) cannot be isolated from its context (Japanese-owned subsidiaries), but is of critical relevance precisely because it is in relation to its context. A change in employee work values, for instance, can not be isolated from the workplace as the two are explicitly linked.

Yin (1994) also suggests that the case study approach to research is not a method per se, but rather a research strategy in itself. He explains that as the context is deliberately part of the design, there are always too many variables for the observations made. Experiments divide a phenomenon from its context so that attention can be focused on only a few selected variables. A survey, in contrast, can deal with a phenomenon and its context; however, its adequacy for investigating the context under study is extremely limited. A combination of data collection methods were used to determine whether or not any influence towards work values had occurred since the adoption of Japanese production systems or management techniques, under the case study research approach.

Case studies were used for the following reasons:

- to enable the researcher to investigate the phenomenon of work values within Japanese-owned subsidiaries at an in-depth level, in order to determine and understand what influence Japanese management techniques and production systems have had on the work values of New Zealand employees.

- case studies minimise the limitations associated with alternative research strategies, by maximising the exposure of interrelated variables associated with work values.

- case studies enable the researcher to use a combination of data collection methods, namely interviews, document searches, and surveys to investigate the potential changes in work values since the introduction of Japanese management and production systems.

## 3.2 - Population and sample

### 3.2.1 - Participating organisations

The original population sample, sourced from the 1997 Toyokaizi Databank (located at JETRO, Auckland), consisted of 95 Japanese-owned subsidiaries operating within New Zealand. This sample was reduced to ten organisations operating only within the manufacturing industry. The focus on Japanese manufacturing subsidiaries was deliberate for the following reasons.

- Firstly, Japan's economic success can be aligned to its distinctive work values. As New Zealand has a different work ethic and value, the introduction of Japanese production systems and management techniques into Japanese-owned subsidiaries in New Zealand would influence traditional work values. Research and understanding in this field remains superficial.

- Significant anti-Asian sentiment resides in New Zealand associated with inward investment (Enderwick, 1997). The lack of Japanese production and management techniques within New Zealand organisations may reflect this sentiment.

- Finally, the focus on Japanese-owned subsidiaries was deliberate, as a major component of the research question relates to the influence selected Japanese production systems have on employee work values.

The management of ten Japanese-owned subsidiaries in New Zealand were approached to participate, resulting in two organisations consenting: SMC Pneumatics (New Zealand) Limited, located in Mount Wellington, Auckland and Juken Nissho (New Zealand) Limited, Masterton Mill, located four kilometres south of Masterton.

3.2.2 - Participating employees

Yin (1994) remarks that those workers selected to participate are assumed to 'represent' the larger pool of respondents, so that data from a smaller number of respondents are assumed to represent the data that might have been collected from the entire pool. Therefore, it was crucial that due consideration was given to select a sample of employees within both subsidiaries that was representative of the whole organisation.

SMC Pneumatics (NZ) Limited, employs approximately forty-five workers, with a management structure of five. Eighteen workers were approached individually by the researcher, with the assistance from the managing director, through a formal letter outlining the research (Appendix A). Each worker was invited to participate by completing the attached worker survey (Appendix B). Five managers within SMC Pneumatics were approached by phone, after assistance was gained from the managing director, who determined the most appropriate personnel to interview.

Juken Nissho (Masterton) employs approximately three hundred workers, with a management and support staff of thirty. One hundred and twenty employees were approached by the researcher, with the assistance of the mill manager, to gain their individual participation. These workers were spread over two production lines: laminated lumber (50 workers) and laminated veneer lumber (60 workers), the remaining respondents where from the trade (electricians) and maintenance sections.

Managers were approached within Juken Nissho (Masterton) through the assistance of the district manager, who was consulted to determine which managers were the most appropriate to interview regarding the research. The six managers approached were employed within a wide variety of departments including production, safety, finance, purchasing, and general management.

### 3.3 - Data collection instruments

Hartley (1994) suggests that many researchers, in their pursuit of delicate and intricate interactions and processes occurring within organisations, will use a combination of methods. Due to the complex nature of the phenomena under study (work values) several methods have been used for data collection.

### 3.3.1 - Management interviews

Eleven managers, in total, from both participating organisations were interviewed for not more than one hour each. Questions posed were mainly open ended to gain rich and in-depth qualitative data on employee work values (refer Appendix C). Managers were interviewed because of their assumed level of involvement with Japanese production systems and the influence such systems may have on employee work values. Further, managers were possible change agents working closely with both New Zealand workers and Japanese executives to implement Japanese systems and principles, or resolve employee anxieties and fears towards such changes, if any.

### 3.3.2 - Worker survey

The worker survey was distributed to participating workers within group administered sittings not lasting more than 20 minutes, minimising potential disruption. Sekeran (1992), advocates the use of group administered questionnaires to increase the number of completed responses during a short time period, reducing the potential of question ambiguity as clarification can be given. The worker survey was group administered at Juken Nissho (Masterton), while the survey was administered mainly via post at SMC Pneumatics, as a large proportion of workers were not available. Therefore, to increase the survey's response rate it was conducted by post.

The survey consisted of three sections. Section A contained 17 statements about which each participant was required to record their response on a five point Likert scale, ranging from strongly disagree through to strongly agree. Statements were created based

on the characteristics developed by The Institute of Training in Intercultural Management (1998), originating from Hofstede's five cultural dimensions.

Section B of the worker survey consisted of a selection of open and closed ended questions. This was to determine whether Japanese production systems and management techniques had been implemented within participating subsidiaries. Subsequent questions asked were to ascertain the variety of influence such systems and techniques had on employees' work values.

Section C consisted of questions relating to demographics which were used for cross-tabulation purposes to determine specific trends of influence. For instance, years of employment, age, and gender were used to determine the level of knowledge towards Japanese production systems and management techniques, and whether or not this knowledge assisted in the recall of changed work values.

Before the worker survey was distributed, a number of pilot studies were conducted over a period of three months. During this time a total of six trials were conducted resulting in the questionnaire being revised nine times. The questionnaire was trailed on academics, marketing direct experts, Japanese managers and employees of Japanese subsidiaries based within the Wellington region. One aspect highlighted by all six pilots focused on question wording and sequence. The final questionnaire was revised, taking into consideration these two factors in particular.

### 3.4 - Data Analysis

Management interviews were analysed by content analysis. Content analysis was used to make objective and systematic inferences about theoretically relevant messages (Dane, 1990, p.170). The increased popularity of content analysis as a qualitative research technique according to Easterby-Smith, Thorpe and Lowe (1993) and Emory and Cooper (1991) was because of its tendency to increase objectivity, conclusion validity and hypotheses testing. Robson (1993) remark that content analysis does increase objectivity. However, content analysis should be used as part of a multi-method study and not in isolation.

All answers from management interviews were collated according to question number and quantified into a manageable number of sources. Key phrases and words associated with responses were collated further according to their respective answers, with responses counted and, frequencies analysed. Content analysis was used to analyse the responses of management interviews, as valid and reliable conclusions could be drawn from collated responses related directly to research objectives.

Frequency distributions have been used to summarise the responses of questions categorised according to Hofstede's five dimensions, in section A of the worker survey. Frequency distributions were used because they indicate a pattern of variability between responses within a given data set. Johnson and Wichern (1997) remark that such a distribution indicates the possible values, or categories, for the variable and the number of times each value or category occurs. Frequency distributions have been presented graphically in clustered bar charts, as illustrated in the results section, for ease of interpretation. Section B of the worker survey was analysed by cross-tabulation with the assistance of the Statistical Package for Social Sciences (SPSS).

As Zikmund (1997) states, the mere tabulation of data may answer many research questions. Indeed many studies do not go past this basic stage, because the research question has already been answered. However, "although frequency counts, percentage distributions, and averages summarise a considerable amount of information, stopping at simple tabulation may not yield the full value of the research" (p.534). Cross-tabulation is merely a technique for organising data by groups, such as age, gender, and years of employment.

Emory and Cooper (1991) and Zikmund (1997) both advocate the use of percentages in cross-tabulations. Zikmund (1997) comments that the calculation of percentages helps the researcher understand the nature of the relationship by making a relative comparison. While Emory and Cooper (1991) remark that percentages serve two purposes. First, they simplify by reducing all numbers to a range from 0 to 100. Second, they translate the data into standard form, with a base of 100, for relative comparisons.

Both percentages and cross-tabulations have been used by the researcher to compare, interpret and analyse the responses from respondents SMC Pneumatics (NZ) and Juken Nissho (Masterton) Limited.

# Chapter Four - Findings and Results

As outlined previously in the method section, two main data collection instruments were used: a worker survey and in-depth management interviews. This section presents the results gathered using these two instruments from both participating subsidiaries.

## *Worker Survey*

### 4.1 - Section A - Work Values

This section of the worker survey consisted of 17 value statements for which each respondent was to indicate his/her level of agreement along a Likert scale ranging from strongly disagree to strongly agree. These value statements were developed from characteristics of Hofstede's five cultural dimensions.

### Masculinity

**Figure 4.1** illustrates the scores from 18 respondents employed by SMC Pneumatics (NZ) Limited for questions 10, 12, 13, and 14 of the worker survey relating to the characteristics of Hofstede's masculinity dimension as defined in Chapter 2. Most scores tend to be centred around the 'agree' category. 94% of respondents agreed that personal recognition was seen as important in their job, while 77% and 88% indicated strong agreement to the importance of career advancement opportunities and possessing a drive to succeed. In contrast only 50% of respondents agreed that competition was vital to personal success.

**Figure 4.1 - Masculinity Frequency Distribution for SMC Pneumatics (NZ) Limited**
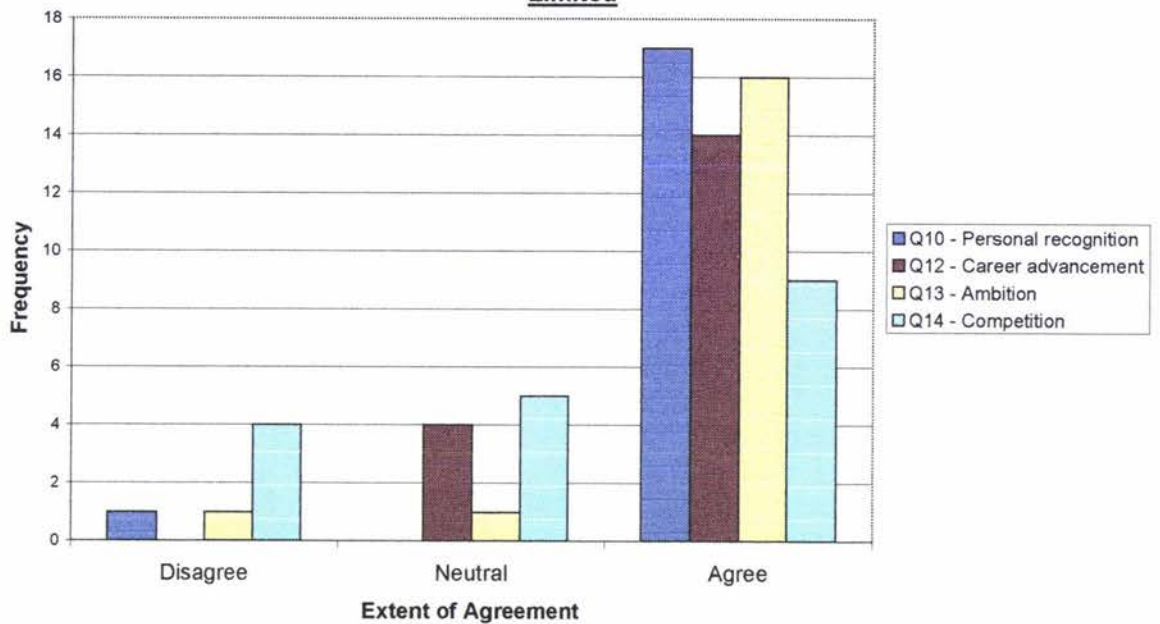


**Figure 4.2** illustrates the scores of questions 10, 12, 13, and 14 from 91 respondents at Juken Nissho (Masterton) Limited, grouped according to Hofstede's masculinity characteristics. Similar to SMC Pneumatics (NZ) Limited, Juken Nissho's scores for each question tend to be centred around the agree category. 89% of respondents agreed that personal recognition is seen as important when a job is well done, while 82% and 84% respectively indicate strong agreement towards the importance of career advancement opportunities, and possessing a drive to succeed. Respondents at Juken Nissho (Masterton) Limited indicated less agreement towards viewing competition as vital for personal success.

Respondents from both participating subsidiaries indicated strong agreement towards Hofstede's masculinity dimension. While SMC Pneumatics (NZ) Limited indicated higher scores for questions ten and thirteen, Juken Nissho (Masterton) Limited indicated higher agreement towards question twelve and fourteen. The difference between the two scores is significant. The results show that SMC respondents assigned more agreement towards *intrinsic* work values, personal recognition and an internal drive to succeed. While respondents at Juken Nissho (Masterton) Limited, on the other

hand, assigned more importance towards *extrinsic* work values, opportunities for career advancement and external competition for personal achievement and success. Therefore, while both Japanese-owned subsidiaries have indicated a level of agreement with Hofstede's masculinity dimension, respondents have different levels of support regarding intrinsic and extrinsic work values.

**Figure 4.2 - Masculinity Frequency Distribution for Juken Nissho (NZ) Limited**



Figure 4.2 - Masculinity Frequency Distribution for Juken Nissho (NZ) Limited
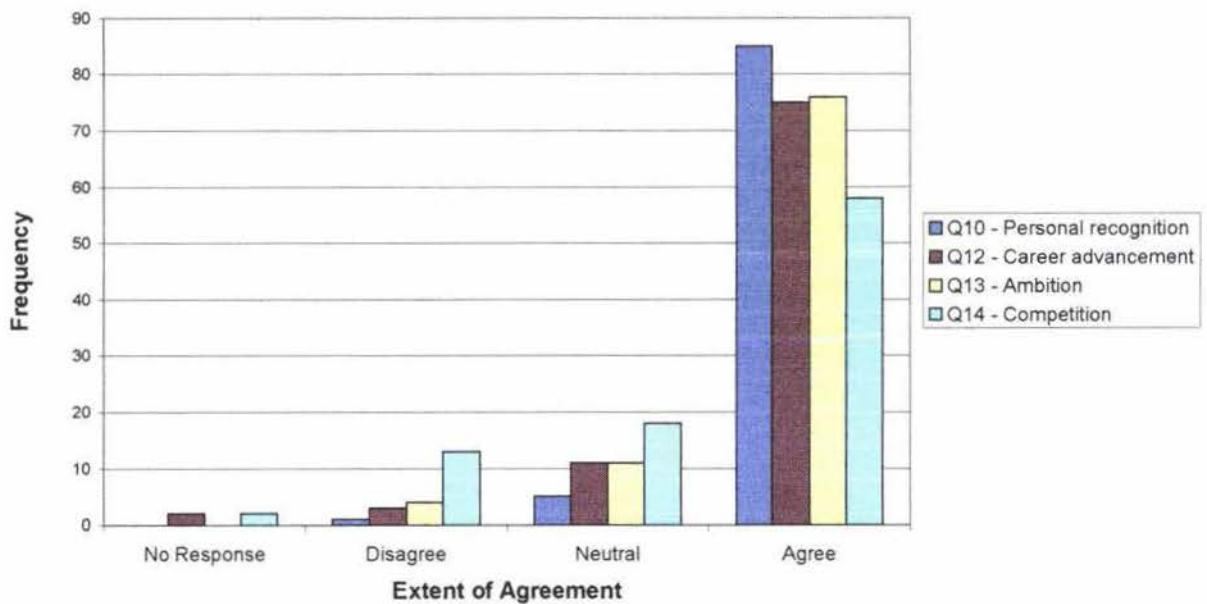
## Uncertainty Avoidance

**Figure 4.3** presents the scores for questions four, five, six, and seven of the worker survey for respondents of SMC Pneumatics (NZ) respondents relating to Hofstede's uncertainty avoidance dimension. There is again, a tendency for respondent scores to be centred around the agree category. All respondents indicated agreement that conflict at work should be minimised, emphasised by a high agreement of written rules and procedures being implemented at work (94%). However, a proportion of respondents personally disagreed that workplace change should happen slowly (33%), while indicating there is a place for stress and anxiety at work (38%).

Figure 4.3 - Uncertainity Avoidance Frequency Distribution for SMC Pneumatics (NZ) Limited
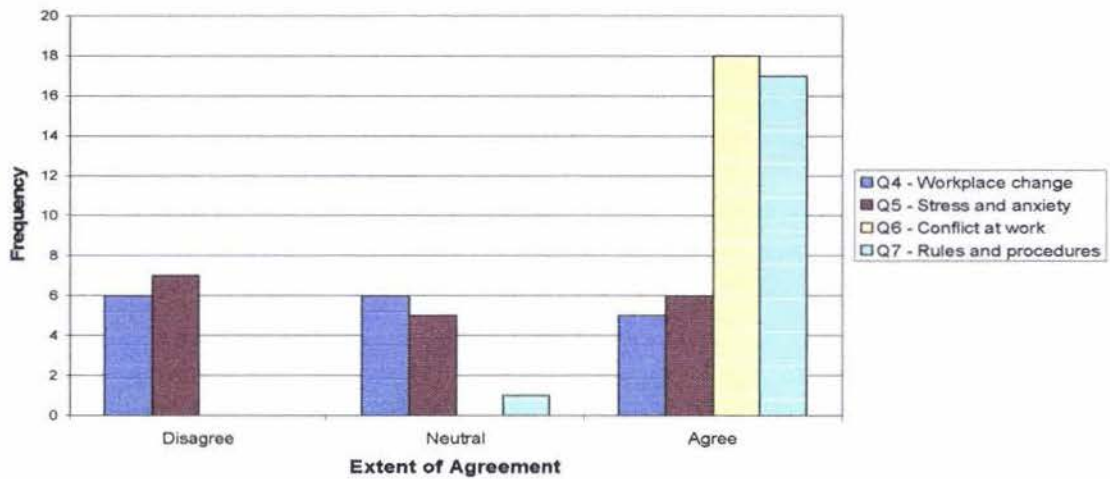
In comparison, respondents at Juken Nissho (Masterton) (**Figure 4.4**) indicated responses centred around the agree category; however, scores relating to questions four and five were equally spread across three categories. This result indicates that respondents at Juken Nissho (Masterton) Limited believe there is no place for stress and anxiety at work (38%), emphasising conflict at work being minimised (100%), while indicating workplace change happening relatively slowly (33%) and implementing written rules and procedures to work from (94%). While both SMC Pneumatics (NZ) Limited and Juken Nissho (Masterton) Limited agree that conflict at work should be minimised by the introduction of written rules and procedures, SMC Pneumatics suggests that there is relative disagreement towards workplace change happening



Figure 4.4 - Uncertainity Avoidance Frequency Distribution for Juken Nissho (NZ) Limited
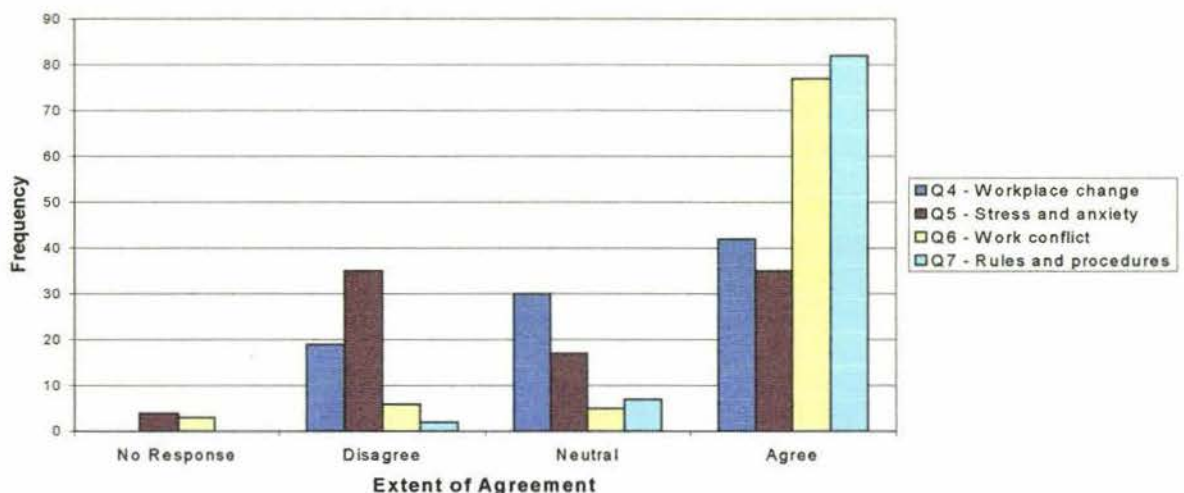
slowly, while indicating that stress and anxiety at work is appropriate.

## Power Distance

**Figure 4.5** presents the scores for SMC Pneumatics (NZ) Limited for questions one, two, and three indicating the level of power distance between management and workers. The majority of responses were again centred around the agree category with the exception of worker-supervisor dependence. The scores indicate general support for worker and management equality (72%), with a relatively high agreement for access to all managers when required (88%), while 72% of respondents disagreed that workers should be dependent on their supervisor at work.



Figure 4.5 - Power Distance Frequency Distribution for SMC Pneumatics (NZ) Limited.
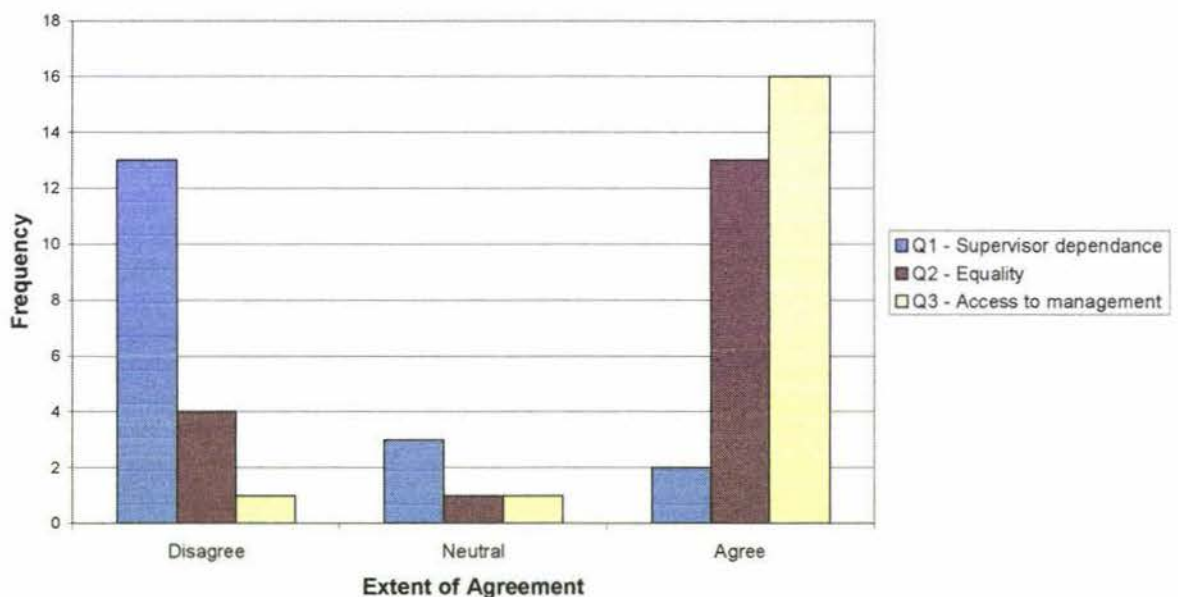
Similar to SMC Pneumatics (NZ) respondents' scores, respondents at Juken Nissho (Masterton) tend to indicate general agreement towards equality existing between workers and managers (86%), with relatively less support (74%) for non-restrictive management access. Despite this, only 34% of respondents from Juken Nissho compared to 72% from SMC Pneumatics disagreed that being dependent on your supervisor at work is important (refer to **Figure 4.6**). Hence, while the majority of respondents at both participating subsidiaries indicated a similar level of agreement towards management and worker equality and non-restrictive management access,

Juken Nissho (Masterton) Limited deviates significantly from SMC Pneumatics regarding supervisor dependence.

Figure 4.6 - Power Distance Frequency Distribution for Juken Nissho (NZ) Limited
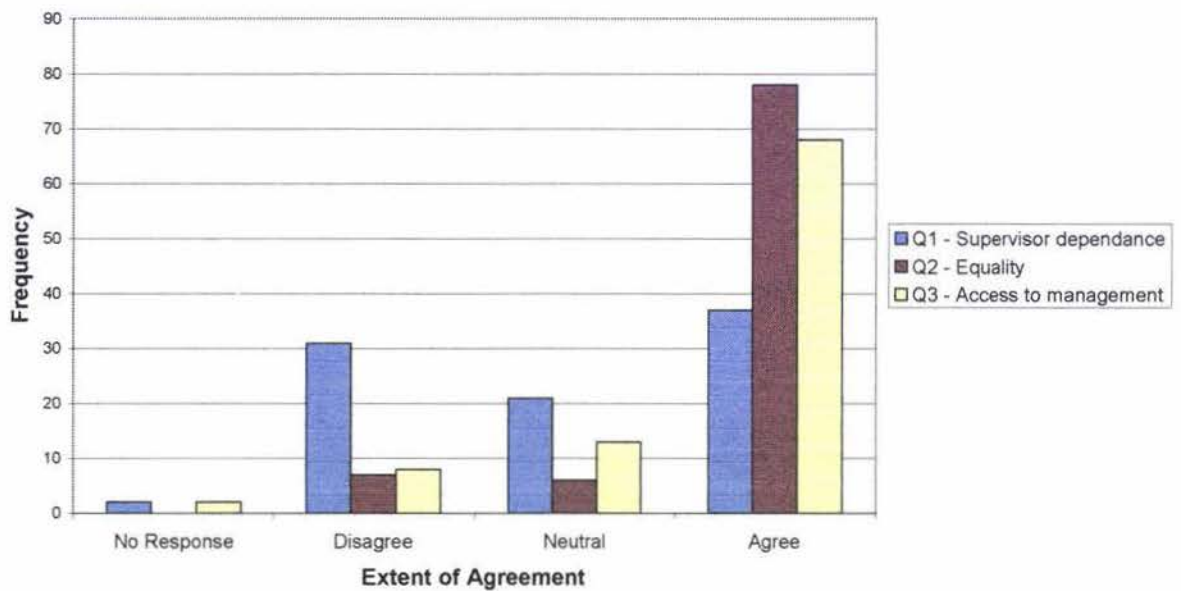


**Long Term Orientation**

Responses from questions 16 and 17 of the worker survey have been combined to determine the level of agreement towards Hofstede's long term orientation dimension by participants of both SMC Pneumatics (NZ) Limited and Juken Nissho (Masterton) Limited. Respondents at SMC Pneumatics indicated strong disagreement (72%) towards emphasising short term rather than long term goals, believing that future work stability is more important than continual workplace change (44%, refer to **Figure 4.7**). Respondents at Juken Nissho Limited, however, indicated relative disagreement for emphasising short term rather than long term goals (40%), while indicating overwhelming agreement (69%) that stability at work is more important than workplace change. While respondents at SMC Pneumatics (NZ) Limited indicated agreement towards long term orientation, less than half of the respondents from Juken Nissho (Masterton) Limited indicated that they neither agree or disagree towards long term orientation. A large proportion (27%) indicated a neutral response. Despite this indefinitive answer, respondents from Juken Nissho (Masterton) indicated the

importance of work stability emphasising the importance of written rules and procedures, while further highlighting the minimisation of work conflict (refer **Figure 4.8**).

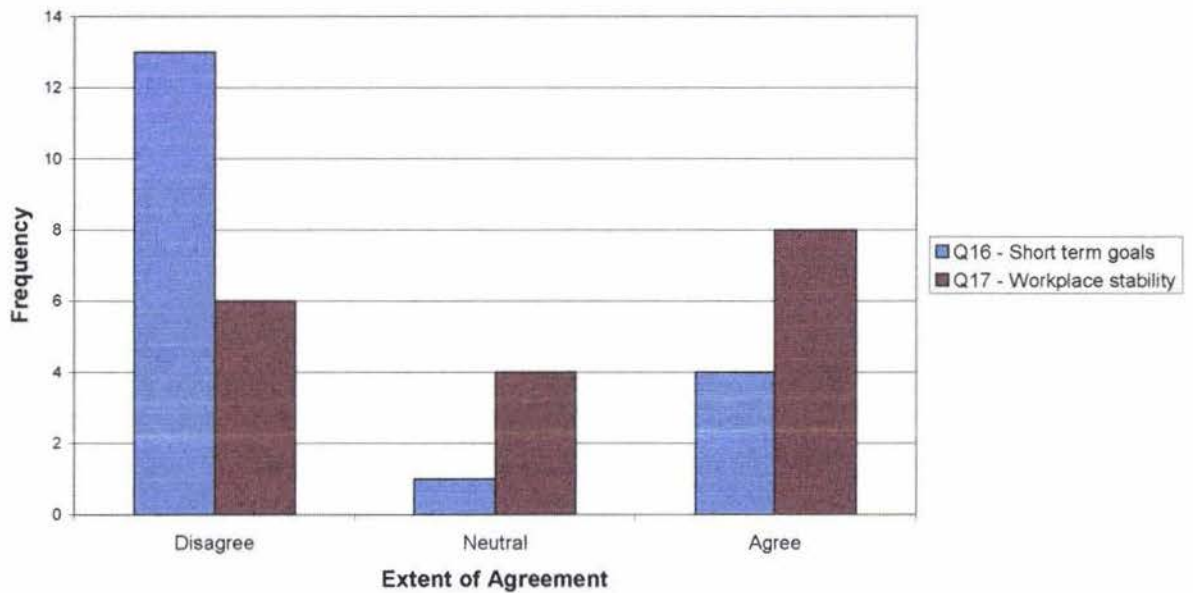**Figure 4.7 - Short Term Orientation Frequency Distribution for SMC Pneumatics (NZ) Limited**



**Figure 4.8 - Short Term Orientation Frequency Distribution for Juken Nissho (NZ) Limited**
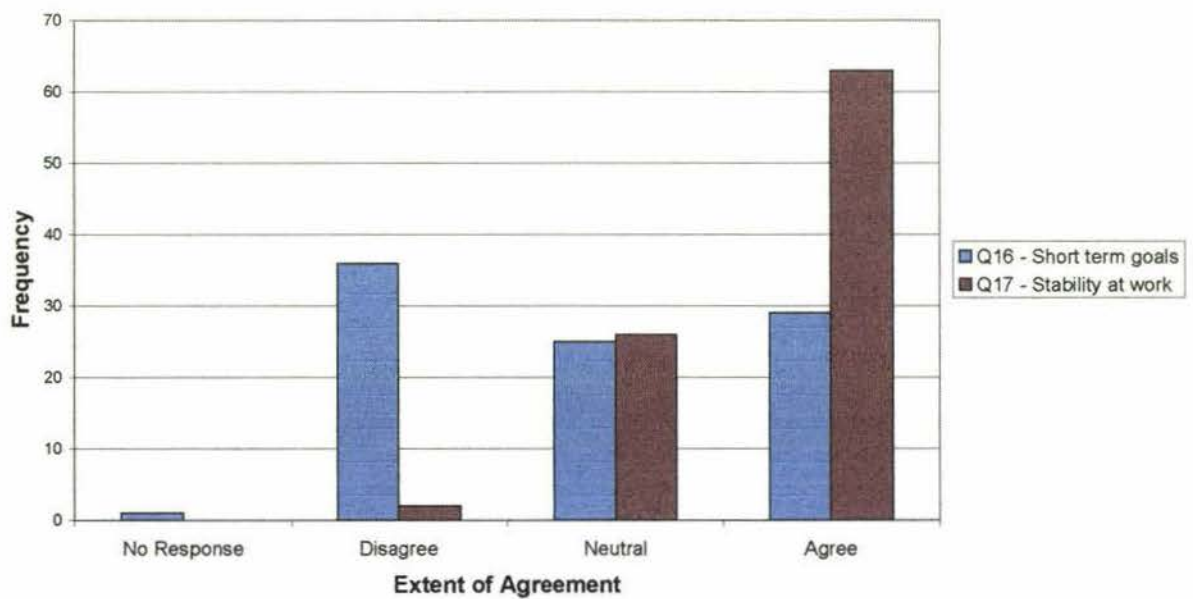
### Individualism

Finally, questions eight, nine, eleven, and fifteen of the worker survey have been combined to determine the level of agreement towards Hofstede's individualism dimension by participants at both SMC Pneumatics (NZ) Limited and Juken Nissho (Masterton) Limited. Respondents at SMC Pneumatics indicated disagreement towards working for themselves first and then the company (55%), while relatively high support was given to having a job that would leave individuals sufficient time for personal/family life (83%). Further, overwhelming support (100%) was given to the importance of having co-operative fellow workers. Finally, strong agreement was given to the importance of having considerable freedom to adopt an individual approach on the job (72%, refer to **Figure 4.9**). Participants from Juken Nissho (Masterton) Limited indicated significantly lower disagreement (36%) towards working for the company as a second priority, while an extremely high level of respondents (90%) indicated the importance of having a job leaving individuals sufficient time for personal and family life. The importance of having co-operative fellow workers decreased slightly (98%) when compared with SMC Pneumatics (100%), while 59% respondents employed within Juken Nissho (Masterton) indicated the importance of having considerable freedom to adopt an individual approach on the job (refer **Figure 4.10**).

**Figure 4.9 - Individualism Frequency Distribution for SMC Pneumatics (NZ) Limited**
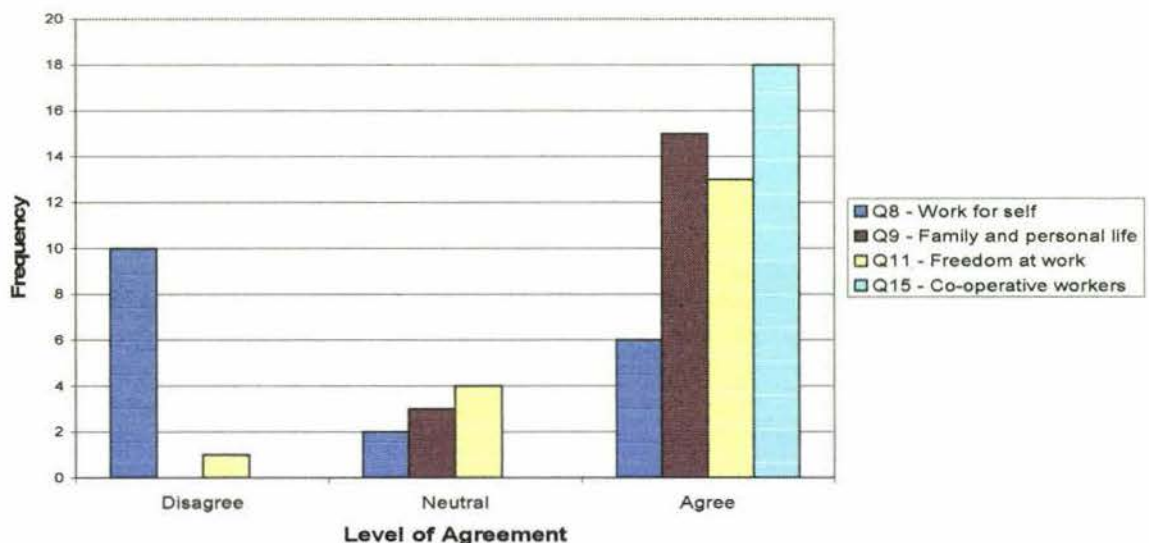
**Figure 4.10 - Individualism Frequency Distribution for Juken Nissho (NZ) Limited**
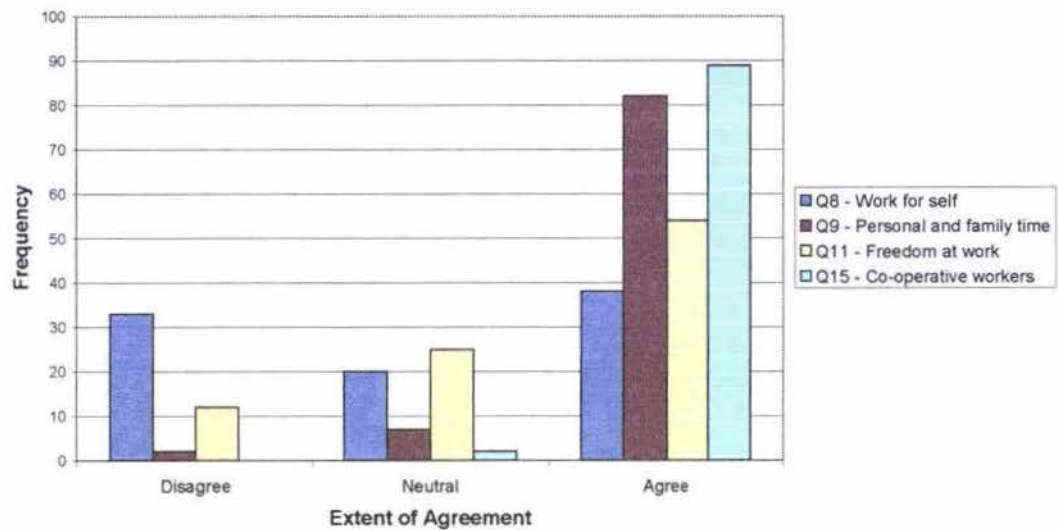
While participants at SMC Pneumatics tended not to view working for one's self as the most important priority, 42% of respondents at Juken Nissho (Masterton) Limited did. This is reflected not only in the high level of agreement given to a job that leaves an individual with sufficient time to pursue leisure, personal and/or family life, but also in the relatively high agreement towards the importance of adopting an individual approach to each task.

## 4.2 – Worker survey - Section B

Section B of the worker survey contained a number of questions regarding the implementation of Japanese production systems at both SMC Pneumatics (NZ) and Juken Nissho (Masterton) Limited. The responses to each question have been tabulated with other responses to determine what influence implemented Japanese production systems and management techniques have had on the work values of employees at both participating subsidiaries.

*Years of employment and production implementation*

Six respondents (33%) indicated Japanese production systems had been implemented at SMC Pneumatics (NZ) Limited, while a larger number of respondents (44%) indicated that they were unsure. At Juken Nissho (Masterton) Limited, 57 respondents (63%) indicated that Japanese production systems had been implemented, with 19 respondents commenting that they were unsure. These results alone are not particularly informative, but when tabulated with average length of employment more significant results become apparent. While 57 respondents employed at Juken Nissho (Masterton) indicated Japanese production systems had been implemented, 30 of these respondents (34%) indicated employment for three years but no greater than seven, with the remaining 24 respondents (26%) indicating employment for more than one year but less than three. In comparison to Juken Nissho (Masterton), respondents at SMC Pneumatics (NZ), employed for three years but no more than seven seemed to be most informed regarding the implementation of Japanese production systems. With two respondents indicating Japanese production systems had been implemented, while a further two remarked that no implementation had occurred. These results tentatively indicate that length of employment suggests awareness of Japanese production systems adopted.

*Years of employment and management implementation*

While respondents at Juken Nissho (Masterton) indicated a relatively modest level of agreement towards the implementation of Japanese production systems, 51 respondents indicated that they were unsure whether Japanese management techniques had been implemented at their workplace. With a further 23 respondents remarking that Japanese management techniques had not been adopted. In contrast to Juken Nissho (Masterton), 8 respondents at SMC Pneumatics (NZ) indicated that their workplace had not adopted Japanese management techniques, while 9 were unsure. These results indicate a slight knowledge shift from an awareness of production systems implemented, to a lack of knowledge regarding management techniques adopted. Despite this knowledge shift, the results indicate that those respondents employed for more than one year but less than seven are still the most knowledgeable regarding the implementation of Japanese production and management techniques.

*Influence of Japanese production systems and length of employment*

At SMC Pneumatics (NZ), 12 respondents (66%) indicated that a positive influence had resulted since the introduction of Japanese production systems. While no negative influence was felt, three employees were unsure what influence had resulted. The influence of Japanese production systems adopted at Juken Nissho (Masterton) as indicated by 42 respondents (46%) was believed to be positive, while 36 respondents remarked that they believed the influence to be negative. When these responses are aligned with years of employment, 41 and 43 respondents respectively have been employed for one to three years, and three to seven years.

*Influence of Japanese management techniques and length of employment*

While 12 respondents at SMC Pneumatics (NZ) indicated a high level of positive influence towards the implementation of production systems, the influence of Japanese management techniques is largely unknown, as 9 participants (50%) indicated no response. One could assume that because 9 respondents indicated no response,

respondents could not answer this question fully due to a lack of awareness regarding Japanese management techniques.

Similar to SMC Pneumatics (NZ), a large proportion of respondents (42) at Juken Nissho (Masterton) indicated a high level of positive influence towards the implementation of Japanese production systems. However, this level of positive influence was not sustained regarding Japanese management techniques. While thirty-one respondents (34%) indicated that the adoption of such techniques had a positive influence, a larger proportion of respondents (51 or 56%), remarked that they were either unsure whether Japanese management techniques had been implemented or offered no response.

## Japanese Production Systems

The following section presents the results of which Japanese production systems have been implemented at both participating Japanese-owned subsidiaries, and what influence they have had on existing employee work values.

### *Just-in-Time Inventory*

Within SMC Pneumatics 16 respondents (88%) indicated that just-in-time inventory had not been adopted. The same percentage of respondents also remarked that there has been no substantial increase in the use of outside contractors. Of these 16 respondents, five remarked that a long-term production focus had resulted since the introduction of just-in-time inventory. The remaining 11 respondents (61%) believed that no long term production focus developed due to a lack of just-in-time inventory being implemented.

Similar to SMC Pneumatics, a large proportion of respondents at Juken Nissho Masterton (63 or 69%) indicated that just-in-time inventory had not been implemented. Nineteen of these respondents remarked that an increase in the use of external contractors had resulted, while the remaining 44 respondents disagreed, suggesting that the increased use of contractors came about as a result of management decisions or the implementation of other production systems. Therefore, while both subsidiaries have

indicate that just-in-time inventory has not been adopted within their workplace, contractor use has increased as well as long term production focus. This long-term production focus is not surprising for Juken Nissho (Masterton), as Japanese companies tend to plan and focus long term. SMC Pneumatics tends to use a large amount of contractors in New Zealand due to its distance from head office in Japan. This however, does not imply that Just-in-time inventory has been adopted.

### *Total Quality Management (TQM)*

Eleven respondents (61%) at SMC Pneumatics (NZ) indicated that TQM had been adopted at their workplace, resulting in no decreased group decision making. Seven of these respondents remarked that an increase in reliance on team members resulted. Eight out of the eleven original respondents within SMC Pneumatics (NZ) also believed that an increase in open communication resulted since TQM's adoption.

Similar to SMC Pneumatics, a moderate level of support, 52 respondents (57%) at Juken Nissho (Masterton) indicated that TQM had been adopted within their workplace, with 45 of these respondents (87%) agreeing that TQM's adoption had not decreased group decision making. Twenty-six of these respondents indicated that an increase in team member reliance resulted due to TQM being implemented, while an equal number remarked that it had not. However, despite 52 respondents (57%) agreeing that TQM had been implemented, only 20 respondents believed that an increase in open communication had resulted.

### *Quality circles*

Fifteen respondents (83%) indicated that quality circles had not been implemented at SMC Pneumatics (NZ). Of these 15 respondents, 11 remarked that no increase in team work had resulted due to the lack of quality circles being adopted, while the remaining four respondents believed it had. However, of the total respondents at SMC Pneumatics (NZ) who remarked that quality circles had not been implemented, 8 or 53 percent indicated that there had been an increased reliance on team members at work. Similar to SMC Pneumatics (NZ), a large proportion of respondents from Juken Nissho Limited

(56 or 61%) indicated that quality circles had not been implemented. Of these 56 respondents, 19 remarked that increased teamwork had resulted. While 14 respondents remarked that an increase in team member reliance had occurred. While both participating subsidiaries indicated a lack of quality circles being adopted, it is not surprising that no increase in teamwork resulted associated with quality circles. As respondents from both participating subsidiaries remarked that co-operative work colleagues was an important work value, and that TQM had been adopted, quality circles could become well established as an alternative technique to search for continual product quality.

*Kaizen*

At SMC Pneumatics (NZ), 11 respondents (61%) indicated that the kaizen philosophy had not been implemented, six commented that it had, while one respondent was unsure. All respondents remarked that a reduction in-group decision making had not resulted due to kaizen not being adopted. Further, of those participants who indicated that kaizen *had* been adopted, five claimed that no decrease in-group decision making occurred. Therefore, 16 respondents, regardless of whether they believed kaizen had been implemented, noted that group decision making had not decreased.

In contrast with SMC Pneumatics, 40 respondents (44%) from Juken Nissho (Masterton) indicated that kaizen had been implemented within their workplace, while 48 respondents (53%) indicated it hadn't, while the remaining 3% were unsure. Thirty-two respondents (80%) who indicated that kaizen had been adopted remarked that no reduction in group decision making resulted, while 44 respondents (91%) who remarked that kaizen had not been implemented, also agreed that group decision making had *not* decreased. Hence, a total of 76 respondents (84%) at Juken Nissho (Masterton) remarked that decreased group decision making had not resulted, regardless of whether kaizen had been adopted. These findings are somewhat surprising. As kaizen is a fundamental component of TQM, for total quality management to be successful continuous improvement towards zero defects and increasing product quality is essential.

### Japanese Management Techniques

*In-House Trade Unions*

All respondents at SMC Pneumatics (NZ) indicated that in-house trade unions had not been implemented. However, within Juken Nissho (Masterton), 10 respondents (11 %) indicated that in-house trade unions *had* been implemented, resulting in increased levels of management. In total, 78 respondents (86%) remarked that increased levels of management have not resulted at Juken Nissho, regardless of in-house trade unions being implemented. Of the 10 respondents, who indicated that in-house trade unions had been implemented at Juken Nissho (Masterton), five believe this had resulted in reduced group decision making. Further, of the 81 respondents who believed that in-house trade unions had not been adopted, 58 commented that no reduction in-group decision making had resulted.

*Lifelong Employment*

Fifteen respondents at SMC Pneumatics (NZ) indicated that life long employment had not been offered, with all respondents indicating that no long-term production focus has occurred. Similar to respondents at SMC Pneumatics (NZ), a large proportion of respondents, 76 (83%) at Juken Nissho (Masterton) indicated that lifelong employment had not been implemented at their workplace. Forty-nine of these respondents indicated that no focus towards long term production had resulted. Of the 76 respondents at Juken Nissho (Masterton) who indicated that lifelong employment had not been implemented, 64 remarked that no reduction in employee power had resulted. Overall, a total of 76 respondents (84 percent) remarked that no reduction in employee power had resulted, regardless of whether or not they believe lifelong employment had been implemented within their workplace.

*Semi-Permanent Employment*

At SMC Pneumatics (NZ) 16 respondents indicated that semi-permanent employment was not offered at their workplace. Eleven of these respondents (69%) believe that no

long-term production focus had resulted due to the lack of semi permanent employment being adopted.

In comparison with SMC Pneumatics, 79 respondents or 87% at Juken Nissho (Masterton) indicated that semi-permanent employment was not offered at their workplace. Forty-eight of these respondents believed that no long term production focus resulted due to a lack of semi-permanent employment, while 30 respondents (38%) believe it had. These findings are interesting as respondents from both Japanese-owned subsidiaries previously indicated that their work values tend to support Hofstede's long term orientation dimension. Respondents specifically from SMC Pneumatics indicated strong disagreement towards emphasising short term over and above long term goals, believing that future work stability was more important than workplace change. Therefore, while respondents at SMC Pneumatics and Juken Nissho (Masterton) had remarked on the lack of employment stability, the gap between employees' work values and the influence of Japanese production systems in this instance seems broad.

### *Seniority Based Wage and Promotion System*

A total of 16 respondents (89%) employed at SMC Pneumatics (NZ) indicated that the Japanese seniority based wage and promotion system had not been implemented. Of these 16 respondents, half commented that an increase in individual accountability and responsibility had resulted due to the lack of adopting such a technique, while the remaining eight respondents indicated that it had not. Individual accountability and responsibility is supported further by a large proportion of respondents previously indicating agreement towards adopting an individualistic approach at work. Managers employed at SMC Pneumatics (NZ) are all New Zealanders, who strongly support an individualistic approach to work. Therefore, promotion based solely on seniority rather than individual merit is not well supported at SMC Pneumatics (NZ). Further, nine respondents remarked that open communication resulted, even though the seniority based promotion system had not been introduced at SMC Pneumatics (NZ).

Similar to SMC Pneumatics (NZ), a large proportion of respondents (79 or 87%) indicated that the seniority based promotion system had not been introduced. However,

55 of these respondents remarked that no individual accountability or responsibility had resulted directly from the lack of Japanese seniority-based promotion not being adopted. Juken Nissho's results regarding individual accountability and responsibility are not overtly surprising considering respondents indicated a low level of power distance, emphasising a high level of supervisor-worker dependence. Respondents however, also indicated overwhelming support towards working for themselves first and placing the subsidiary a close second. Therefore, as seniority based promotion is based on duration within an organisation and not individual merit, the seniority based system tends not be highly supported at Juken Nissho (Masterton).

## *Group Consultation and Decision-Making*

Fourteen respondents (78%) at SMC Pneumatics (NZ) indicated that group consultation and decision making had not been adopted. Eight of these respondents remarked that open communication resulted, while ten respondents remarked that informal communication had not.

Similar to SMC Pneumatics, sixty-three respondents at Juken Nissho (Masterton) indicated that group consultation and decision making had not been implemented. A large proportion of respondents (88%) of those who indicated that group consultation and decision making had not been implemented remarked that no open or informal communication had resulted.

Respondents from both SMC Pneumatics (NZ) and Juken Nissho (Masterton) indicated strong support towards non-restrictive management access. The non-adoption of group consultation and decision making, resulting in a lack of open and informal communication tends to limit these work values. The possibility for open management access will tend to be restrictive, especially if all decisions affecting the subsidiary, are made by management, as is the case at Juken Nissho (Masterton).

## *Management Interviews*

### *4.3 - Management interview responses - SMC Pneumatics (NZ) Limited*

#### Japanese management techniques

All management respondents indicated that SMC Pneumatics (NZ) does not employ in-house trade unions. Three managers indicated that semi-permanent employment was used, however, support for this technique was not as strong as the Japanese technique associated with lifelong employment. One respondent remarked that "it is a written rule, not a strict policy or technique". All management respondents agreed that the seniority-based wage and promotion system had not been adopted, as promotion is based on individual performance and not age or length of employment. Further, three respondents indicated the use of group consultation and decision making, while the remaining two respondents remarked that "Japanese management techniques are not used within SMC Pneumatics (NZ) because they have not been prescribed by our Japanese parent, rather they prefer to leave the management style to the individual country concerned".

#### Why implemented?

Of the respondents who agreed Japanese management techniques *had* been implemented at SMC Pneumatics (NZ), adoption was to ensure that the company runs well and to support the development of a good team environment. One respondent commented that the techniques adopted were not forced on them from Japan, so, if anything, they were seen as a good business practice, a way of maintaining employees' commitment to the company.

#### Japanese production systems

No respondent unanimously agreed that SMC Pneumatics (NZ) adopted all Japanese production systems selected for study. All respondents indicated that just-in-time inventory, statistical quality control, and kanban have not been adopted, while the possible implementation of kanban is growing in popularity, especially from Japan. TQM and quality circles have been implemented under the ISO 9000 quality assurance programme, with kaizen also used, but to a limited extent.

### Why implemented?

Sixty percent of management respondents indicated that the adoption of Japanese production systems was to increase the level of quality demanded from customers. One manager remarked "our customers, particularly government departments have requested that if companies want to become an approved supplier they must have a quality management system in place.

### Altered to fit local workplace

Eighty percent of respondents at SMC Pneumatics (NZ) indicated that production systems adopted have been altered to fit the New Zealand workplace. The work ethic of New Zealanders is quite different from that of the Japanese. One respondent remarked that "SMC Pneumatics has been successful internationally because it has not taken the 'Japanese Way' and enforced Japanese values onto workers in different countries ... SMC Japan know that this would simply not work". Finally, "you can't impose one culture onto another, you need to get the best of both cultures and blend them together and come up with the best result for that subsidiary".

### Externally imposed

Sixty percent of respondents indicated that while head office in Japan had not forced any techniques and systems onto SMC Pneumatics (NZ) they do provide constant guidance. The only system that will be imposed at SMC Pneumatics (NZ) is the two bin (kanban) system to "increase international efficiency". "Each individual subsidiary works out what is best for them".

### Japanese managers

All management respondents at SMC Pneumatics (NZ) indicated that no Japanese managers are employed. There is a distinct philosophy at SMC Pneumatics globally, that local people operate better in local markets. Therefore, Japanese managers operating outside head office in Japan are relatively rare. One manager commented "this is a very modern way of thinking for the Japanese, other companies send Japanese nationals to establish and operate offshore subsidiaries, SMC Pneumatics does not".

**Influence over management decisions**

Only one respondent remarked on possible Japanese influence over management decisions within SMC New Zealand, regarding financial reporting.

**Participative decision making**

All respondents agreed that participative decision making is used at SMC Pneumatics (NZ). All respondents commented that department head meetings are held and all staff are encouraged to participate. One respondent remarked that "I would not regard this as a Japanese technique: it is a good 'Kiwi' system ... it is just good management and business practice". Further, "obviously some decisions must be made without consultation, but you get better performance from people if they can have input into decisions made".

**Quality circles**

All respondents have commented that quality circles are not used at SMC Pneumatics (NZ) as defined by the Japanese. However, at a more general level the subsidiary has adopted a quality assurance programme. Internal audits are conducted as part of ISO 9000 and "our people are very aware of the need for quality and maintaining quality, so there are quality circles, but not specifically as those employed in Japan".

**Unexpected gains or problems using Japanese production systems**

Eighty percent of respondents indicated that no unexpected gains or problems were felt from the introduction of Japanese production systems. One respondent remarked that an "advantage of having a Japanese worker here would be that we could go direct to them and ask for help, rather than communicating with Japan".

**Head office relationship**

All respondents remarked that the relationship between head office (Japan) and SMC Pneumatics (NZ) is beneficial. One respondent commented that "major decisions made in Japan will affect us, for example the reduction of air freight allowed ... or when factories close up for holidays; however, the effect is rather general and indirect". Both parent companies tend to be supportive regarding the allocation of resources and

continual research and development. One respondent commented that "we are not the typical Japanese company; we are left to our own devices ... it is smooth sailing and we tend to get on very well with our Japanese parent companies.

### Factor in organisation's success

Three management respondents at SMC Pneumatics (NZ) indicated that the success of their subsidiary is not directly associated with the adoption of management and production systems from Japan. "Our success is more aligned to these techniques and systems *not* being imposed on us. Rather, local people can develop their own way and mould it to their way of doing business". Further, research and development conducted by the Japanese parent companies help the New Zealand operation to grow. "We have relied on 'Kiwi' initiative for our success; it is important for us to be seen as a New Zealand company, rather than an international company trying to trade in New Zealand.

### Communication

All respondents indicated that both informal and formal communication is used within SMC Pneumatics (NZ). All respondents commented that an open door policy to management is available and if consulting with other people can solve problems then this is supported. Communication is mainly informal; however, formal communication is used when communicating with customers and head office in Japan.

### New Zealand's admiration and cynicism

Eighty percent of respondents commented that New Zealanders have admiration for Japanese management principles and production systems because of the dramatic success Japan has achieved since the devastation of World War II. One manager commented: "Japan has obviously done something right if they can grow to the level they have since World War II". Another remarked that: "Japan has been so successful to date because they seem very focused and plan long term". Despite New Zealand's admiration for the Japanese work ethic, there is a level of cynicism due to the large amounts of foreign investment flowing into New Zealand from Japan and other Asian countries. " I think there is always cynicism about foreign companies coming in and bringing their ideas and imposing them on the local market. SMC Pneumatics does not

do that ... although we are a Japanese owned company; profits are not directed back to Japan at the end of the financial year. They prefer to reinvest profits into individual subsidiaries by employing new people or the purchasing of new premises or equipment".

### Adoption of Japanese principles and systems in wake of Asian crises

All respondents indicated that the need to implement additional Japanese management techniques or production systems within SMC Pneumatics (NZ) in the short to medium term does not exist. "I believe that our company at this stage is running well enough not to warrant any changes in management styles ... our motto is 'always getting better', so if there was a system that looks like it could work in New Zealand that has originated from Japan, then we would consider it, but it would have to be a local progression and not lead from Japan". In addition, another respondent commented, "I personally don't think that adopting Japanese techniques, is necessarily going to make us more competitive".

### Effects experienced using Japanese production systems

SMC Pneumatics' management since the introduction of Japanese production systems has experienced the following effects. These effects were generally perceived as positive

- Increased teamwork
- Reliance on team members, not individuals
- Individual accountability and responsibility
- Open communication
- Informal communication

### Influence of Japanese culture

All management respondents indicated that the influence of Japanese culture was seen as minimal. "There is a tendency to employ locals, rather than Japanese nationals. Unusual for a Japanese company, this could possibly be part of a strategy for future growth". Another respondent commented "we have tried to keep the Japanese culture out of business as much as possible". The only Japanese influence that SMC Pneumatics (NZ) may experience may be through the organisation's research and

development. The Japanese are "always striving to upgrade their products, which has a flow on effect to New Zealand".

**Future growth**

All respondents commented that SMC Pneumatics (NZ) will continue to grow and increase market share to become the number one Pneumatics supplier in New Zealand. One respondent commented this will be achieved by "continuing to offer good service ... SMC's general business philosophy as well as our approach to quality will help get us there". Further, "different markets and possible diversification may be required". SMC Pneumatics (NZ) is very focused and concentrates only on core competencies: pneumatics and automation. This will not change in the near future: "SMC prides itself in being the number one pneumatics research and development company in the world".

**Three most important factors**

Management respondents at SMC Pneumatics (NZ) indicated that the three most important factors to bear in mind when introducing Japanese management techniques and production systems is the acknowledgement and consideration of cultural differences, the adaptation of techniques and systems to local conditions, and the continual support and commitment from all organisational employees.

**Final word**

"SMC Pneumatics is quite an unusual Japanese company; it expects locals to manage subsidiaries and move them forward depending on local conditions".

"SMC Pneumatics is based on service, good service ... this is one of our corner stones for SMC Pneumatics world-wide".

### 4.4 - *Management interview results - Juken Nissho (Masterton)*

**Japanese management techniques**

All respondents indicated that in-house trade unions were employed at Juken Nissho (Masterton), only in the capacity of work-site committees, which were established because of the Employment Contracts Act (1991) rather than Japanese management. Further, all respondents indicated that Juken Nissho (Masterton) had not adopted both

lifelong and semi-permanent employment due to financial and economic constraints. One respondent commented that life long or semi-permanent employment are management techniques, which are not economic reality. Another respondent remarked "there are prospects available with regard to long term employment, but this is not guaranteed". The seniority-based wage and promotion system had not been adopted as individual performance is a major factor towards promotion. All respondents indicated that group consultation and decision making was used; however, all decisions are made by management regardless of worker participation. One respondent commented that "input that is made is not really taken into consideration, as the final decision has already been made by management, prior to worker consultation".

**Why implemented?**

According to two respondents, work site committees were adopted to alleviate union interference as Japanese nationals in New Zealand were well aware of the potential damage trade unions could cause. Juken Nissho (Masterton) established worksite committees as they were used in Japan. It was expected that a direct transfer of knowledge and techniques would occur. Further, it was seen as important to achieve worker involvement towards decisions that directly affected them, hence their adoption.

Group decision-making and consultation was adopted according, to two respondents, to help improve product knowledge and increase worker motivation. One respondent commented that group decision making and consultation was not a Japanese management technique, rather it was just good business sense and hoped that most companies employed it. The remaining techniques were intended to be duplicated exactly from those used by Juken Nissho's two parent companies as these techniques were successful. Therefore, it was expected that the same techniques could be transplanted directly to Juken Nissho (Masterton).

**Japanese Production Systems**

All management respondents indicated that Juken Nissho (Masterton) had adopted total quality management (TQM), quality circles and kaizen. However, the extent of usage varies. Two respondents, for instance, remarked that TQM is used under the Total Productive Maintenance (TPM) system, while another respondent noted that TQM is

utilised under the 5s system. Furthermore, two respondents indicated that both kaizen and quality circles within Juken Nissho are classified under TPM. Half of the management respondents indicated that just-in-time inventory and statistical quality control are used, while only one indicated the introduction and use of kanban.

## Why implemented

All management respondents remarked that those production systems implemented at Juken Nissho (Masterton) were adopted because they were successful in Japan, and it was considered appropriate to transfer these systems to New Zealand. One respondent commented that "basically all production systems were implemented to increase productivity and improve efficiencies reducing machine breakdowns ... to increase efficiency and to be cost competitive both domestically and internationally". Finally, one respondent remarked that "the systems were introduced by the Japanese as they considered this to be the best way ... these systems were grafted onto the New Zealand culture and workplace values, without sufficient consultation, hence they do not work efficiently here".

## Altered to fit local workplace

All management respondents indicated that production systems adopted have been altered to fit the local workplace culture. It was remarked that "there had been a problem with direct transfer regarding aspects of the Japanese work ethic. There was an insistence that what works in Japan should indeed work in New Zealand; however, this is not always the case".

## Externally imposed

All management respondents indicated that those techniques and systems implemented were imposed directly from Japan, which necessitated cultural changes. "The local culture and working environment is different from that in Japan, where huge successes in efficiency have been seen. You can't just totally duplicate Japanese systems into New Zealand; it just doesn't work".

### Influence of Japanese managers over decisions

All respondents indicated that the Japanese mill manager has significant, if not total, control over decision making, productivity, and priority planning within the Masterton plant. One respondent commented, "their decision is final and arguing with them is a waste of time". Forty percent of respondents commented that the influence from the two technical advisors is small, but they do have some influence over customer orders, purchasing, and head office relations.

### Participative decision making

Eighty-three percent of respondents at Juken Nissho (Masterton) indicated that participative decision making was used, with the majority of decisions already made by management prior to consultation. One respondent commented that "management decisions are made by locals in New Zealand and not from Japan". Further, another respondent commented that participative decision making is not used at Juken Nissho (Masterton), as "decisions are based on personal opinions and not by the objective facts that surround alternative options".

### Quality circles

One hundred percent of respondents indicated that quality circles have been used in some capacity within JNL , usually under the TPM system. Two respondents remarked that quality circles have been disbanded.

### Unexpected gains or problems using Japanese production systems

#### Gains

One respondent commented that a better understanding of other cultures has developed since the introduction of Japanese management techniques and production systems. He commented that "as these techniques and systems have worked successfully in Japan and have been adapted and implemented in New Zealand, I believe there has been a change in how people view other cultures. Just because a system or technique has been proven to be successful in one country does not mean that it will be in another".

## Problems

More than half of the management respondents indicated that motivation and 'buy-in' from employees were major problems that were unexpected. One respondent commented that Juken Nissho (Masterton) had been used as an experiment: "many techniques and principles have been implemented or trailed within New Zealand, which has been a steep learning curve"

## Head office relationship

One hundred percent of respondents maintain that Juken Sanyo (Japan) directly controls Juken Nissho Limited. One respondent commented "there is a definite parent-child relationship". Ninety to ninety-five percent of what Juken Nissho produces is exported to Japan for final manufacturing. "We are at the total will of Japan, not a good thing especially now with the economic downturn". "Everything that is done or produced is for the parent company back in Japan". Both parent companies have full control over New Zealand operations.

## Factor in Juken Nissho's success

Half of all management respondents indicated that Japanese management principles and production systems have been a factor in Juken Nissho's success; however, this has been to varying degrees. Remaining respondents commented, "within Juken Nissho there has been resistance to the 'Japanese Way' and I believe it may have influenced our level of success". Further, "these systems have been tested and have worked in Japanese organisations in different countries; however, you need complete support and commitment from all involved for these systems to fully work. This has not been the case at Juken Nissho (Masterton)".

## Communication

All management respondents remarked that Juken Nissho (Masterton) uses both formal and informal communication. All communication to and from Japan is conducted through the technical advisors and, as one respondent commented, "Juken Nissho has a relatively flat organisation structure; informal communication is encouraged".

### New Zealand's admiration and cynicism

#### Admiration

All respondents indicated that admiration for Japanese production and management techniques stems from the dramatic success of Japan since World War II. New Zealanders have seen the benefits gained if organisations adopt such techniques.

#### Cynicism

Half of the management respondents indicated that Xenophobia has inhibited people and organisations from adopting Japanese principles and production systems. One respondent remarked, "Masterton is a very conservative community; people here have very long memories. People still have negative feelings towards the Japanese due to World War II". Further, there is cynicism, especially within certain quarters of Juken Nissho, regarding Japanese dictatorial decision-making. Most cynicism is associated to with Japanese production systems. One respondent commented that "the use of these policies and principles were meant to make New Zealanders work like the Japanese and improve their behaviour; this, however, has not been the case".

#### Adoption of Japanese principles and systems in wake of Asian crises

All respondents have indicated that there is indeed the possibility for adopting Japanese management techniques and production systems in the wake of the latest Asian economic crises, as the two are not linked in any way. "Work techniques and management techniques do have a future as they have been successful in Japanese organisations and are not overly dependent on the Japanese or global economies". Further, "both systems and techniques are proven to be successful and can work correctly within organisations to increase productivity and minimise wastage".

#### Effects experienced using Japanese production systems

The following effects have been experienced by SMC Pneumatics management since the introduction of Japanese production systems.

- Increased teamwork
- Increased levels of management
- More use of contractors

- Reliance on team members, not individuals
- Individual accountability and responsibility
- Long term production focus
- Open communication
- Informal communication

Two respondents did not complete the above table as "the answer to this question is difficult to determine because some of these effects were already being felt prior to the introduction of production systems and management techniques". However, 66 percent of respondents have indicated that these effects have been of a positive nature.

**Influence of Japanese culture**

Half of all management respondents indicated that Japanese culture does have some degree of influence on New Zealand operations, While 50 percent of respondents indicated that no influence has been felt. "Very little influence, we as New Zealanders are changing the personal behaviour of the Japanese managers. "There is a distinct influence towards thinking about quality, production targets and making sure that production will be finished by the required date". Finally, a respondent commented, "what the Japanese managers say goes, this organisation is not run by a group effort".

**Organisation's future using Japanese production systems**

Sixty six percent of respondents indicated that Juken Nissho's (Masterton) future is to develop both domestic and international markets, while maintaining its position in the market, if not bettering it. Further, one respondent has remarked that "there needs to be a compromise between the two cultures and production practices".

**Three most important factors**

Management respondents at Juken Nissho (Masterton) identified the following as important factors to bear in mind when introducing Japanese techniques and systems:

- managers need to gain an understanding of why principles and systems are being introduced;
- these systems and techniques must be adapted to local conditions;
- full participation and acceptance of all employees is required.

All of these factors must be taken into consideration when introducing Japanese management principles and production systems.

**Final word**

"Juken Nissho (Masterton) Limited is different from other organisations in New Zealand. Our workforce is mainly comprised of New Zealanders who have been trained in our Japanese systems. Our subsidiary is a 'greenfields' operation, the 'Japanese Way' was the only way we knew.

"Negative perceptions of both cultures need to be understood and issues resolved if they are a hindrance to working together".

# Chapter Five - Discussion and Analysis

This chapter discusses the results of both the worker survey and management interviews for both participating Japanese-owned subsidiaries.

## *5.1 - Hofstede's Cultural Dimensions*

### Masculinity

Respondents employed by SMC Pneumatics (NZ) tend to agree that personal recognition, career advancement, and to a lesser extent competition, were important factors in their work. They also remarked that to succeed one had to be ambitious and possess an internal drive to succeed. Similar to respondents at SMC Pneumatics, the majority of respondents at Juken Nissho (Masterton) agreed on the importance of personal recognition with adequate opportunities for career advancement. Competition was seen as a critical component for successful promotion, as competition between work colleagues was seen as an important motivator, with individual promotion being based on personal merit and performance.

Webster and Perry (1989, p.29) commented that two distinct work cultures exist in New Zealand. One is personified by the Maori and Pacific Island population, those being less educated and "primarily involved in a quest for comfort and security ... but with no marked degree of ambition". The other is personified by the more educated of New Zealand society, reflecting ambition and an intrinsic enjoyment for achievement. While Webster and Perry's (1989) findings were collated from the responses of a broad spectrum of New Zealand citizens, their specific conclusions contrast significantly with the work values of employees at Juken Nissho (Masterton). With the majority of respondents at Juken Nissho (Masterton) being Maori and Pacific Islanders, these employees according to Webster and Perry (1989), should not be motivated to achieve as they are mainly involved in a quest for comfort and security. In contrast, respondents remarked on the importance of personal recognition with adequate opportunities for career advancement, illustrating their desire and ambition to achieve further.

In addition, findings from SMC Pneumatics (NZ), while similar to those at Juken Nissho (Masterton), reflect the need for personal recognition as well as an internal drive to succeed, supporting Webster and Perry's (1989) second work culture. Therefore, while Webster and Perry's (1989) finding can to a certain extent be validated by SMC Pneumatics, they have been disproved by respondents at Juken Nissho (Masterton). Despite this, the findings reflect that both Japanese-owned subsidiaries indicated a level of agreement towards Hofstede's masculinity dimension, while emphasising different levels of support towards intrinsic and extrinsic work values.

**Uncertainty Avoidance**

The majority of respondents from both participating subsidiaries tended to associate with Hofstede's dimension of uncertainty avoidance. There was however, a significant proportion of respondents from both SMC Pneumatics and Juken Nissho (Masterton) who believed that workplace change **should** happen slowly (SMC Pneumatics 31%, Juken Nissho Masterton, 46%), while indicating that stress and anxiety at work **was** appropriate (SMC Pneumatics 38%, Juken Nissho Masterton, 38%). This increases the possibility that both participating subsidiaries may avoid uncertainty, less than original findings indicated. The majority of respondents agreed towards reducing uncertainty by the adoption and implementation of written rules and procedures, thereby reducing the possibility of conflict at work.

According to Hofstede (1991) New Zealanders have a high tendency towards uncertainty; however, respondents from both participating subsidiaries illustrate otherwise. Japan, according to Phatak (1995), believes in the reduction of uncertainty through strict rules and procedures, a high degree of formalisation and a distinct intolerance towards behaviours and opinions that differ significantly from the norm. While respondents at both Japanese-owned subsidiaries indicated a high level of support regarding the implementation of rules and procedures in a bid to limit uncertainty, a high degree of formalisation as advocated by Phatak (1995) is not appropriate at SMC Pneumatics (NZ). The work ethic of New Zealanders is quite different from that of the Japanese (protestant work ethic versus Confucian teachings, individualism versus communaterism, innovation and initiative versus discipline and relationships by status).

Therefore, the adoption of Japanese formalisation would not work efficiently at SMC Pneumatics (NZ) due to differing work values and ethics.

While Japanese formalisation has not been adopted at SMC Pneumatics, formalisation at Juken Nissho (Masterton) tends to be higher than at SMC Pneumatics (NZ), due to the employment of Japanese managers. These managers have significant influence over decision making, production, and planning. Therefore, a distinct hierarchy is noticeable leading to increased levels of formalisation. Similar to SMC Pneumatics, the implementation of rules and procedures is supported by both employees and management at Juken Nissho (Masterton), to minimise conflict at work, emphasising a reduction of uncertainty.

**Power Distance**

Respondents from both participating subsidiaries indicated that equality should exist between workers and management, with worker access to management being non-restrictive. Inkson and Kolb (1998) argue that power distance is the degree to which organisational members distinguish themselves by rank and title. New Zealanders pride themselves on self sufficiency and the notion of a classless society, emphasising a tendency towards low power distance. New Zealanders on the whole tend not to abide by a strict rank and title hierarchy with less formal division between managers and workers, unlike the formal structures imposed on workers in Japan as remarked by Inkson and Kolb (1998) and Hofstede (1991).

A high proportion of workers at Juken Nissho (Masterton) indicated their agreement towards being dependent on their immediate supervisor, giving further support to Juken Nissho (Masterton) possessing a low power distance. Respondents at SMC Pneumatics (NZ) had a similar level of agreement regarding worker and management equality with non-restrictive management access. However only five respondents agreed on the importance of worker-supervisor dependence, indicating that SMC Pneumatics (NZ) may have a lesser degree of power distance between workers and management than Juken Nissho (Masterton).

## Long Term Orientation

Respondents at both participating subsidiaries indicated disagreement towards emphasising either short or long term goals. Respondents at SMC Pneumatics (NZ) indicated stronger disagreement (72%) towards emphasising short term rather than long-term goals, while Juken Nissho (Masterton) indicated relative disagreement (53%). However, 25 respondents at Juken Nissho (Masterton) indicated a neutral response. From this it could be assumed that SMC Pneumatics (NZ) focuses more attention on planning with a medium to long term focus, while Juken Nissho (Masterton), from the results available, tends to be more focused towards a short to medium term orientation. However, when the components of Hofstede's (1980) long-term dimension (rank and title relationships, persistence, perseverance, and importance relating to family) are applied to Juken Nissho (Masterton), a long-term orientation becomes apparent. Respondents at Juken Nissho (Masterton) indicated that the relationship between rank and title was not as strict as it is within organisations in Japan, persistence and perseverance from Juken Nissho's parent companies regarding long term profit can be discerned from management interviews. Further, duty to family is extremely high for respondents within both subsidiaries, indicating the importance of having a job that enables one to spend sufficient time with family. However, less dedication is assigned to work (refer individualism).

Therefore, one could tentatively conclude that even though only 53% of respondents indicated that Juken Nissho's focus was long term, the exact percentage subsidiary-wide could possibly be higher.

Similar to Juken Nissho (Masterton), SMC Pneumatics (Japan) indicated persistence and perseverance towards their New Zealand operations directing that profit should be invested back into New Zealand operations, until such a time as profit is sufficient to enable monies to be sent back to Japan. Further, minimum rank and status within New Zealand operations exists emphasising support towards Hofstede's long-term orientation dimension. Overall, both participating subsidiaries have indicated relative agreement towards Hofstede's long term orientation dimension. However, the exact level of agreement between SMC Pneumatics (NZ) and Juken Nissho (Masterton) differs.

**Individualism**

The majority of respondents from both participating Japanese-owned subsidiaries indicated a relatively high tendency towards Hofstede's individualism dimension. New Zealanders, according to Hofstede's (1980) findings, show relatively high individualistic tendencies with lower power distances, a point emphasised by both SMC Pneumatics (NZ) and Juken Nissho (Masterton). These cultural aspects are evident in the way that New Zealanders pride themselves on self sufficiency and the notion of the classless society.

While 55% of respondents at SMC Pneumatics (NZ) indicated that working for one's self was seen as more important than working for the company, a large proportion indicated that working for the company with sufficient dedication was also seen as an important work value. Individualism was, however, further emphasised by 83% of respondents remarking that a job should leave an individual with sufficient time for family and personal life. In addition, individualism was further emphasised by respondents indicating that considerable freedom must be given to their position within the company, having the ability to adopt an individualistic approach to work, where necessary.

Such a high level of individualism from SMC Pneumatics is not surprising considering that no Japanese managers or staff are employed within its New Zealand operations. SMC Pneumatics is controlled completely by locals, and the Japanese systems and techniques that have been implemented have been adapted to suit the local organisational environment.

While respondents from SMC Pneumatics (NZ) indicated high support towards individualism, Juken Nissho (Masterton) also indicated a high level of support despite being controlled by Japanese nationals. One would of assumed that Juken Nissho (Masterton) would have supported individualism to a lesser extent than SMC Pneumatics, if Japanese national culture played an important part in influencing individual work values. A lesser amount of respondents (59%), compared to those at SMC Pneumatics (72%), believe that considerable freedom should be given to adopt an

individualistic approach to work. Workers at Juken Nissho (Masterton) remarked on the importance of worker-supervisor dependence, therefore the importance of a work value which emphasised an individualistic approach over the importance of worker-supervisor dependence, would be contradictory.

Respondents employed at Juken Nissho (Masterton) indicated more importance to having a job that leaves sufficient time for family and/or personal life. While respondents were mainly of Maori and Pacific Island origin, it could be assumed their importance towards family and personal time is associated with their national culture. The majority of respondents at SMC Pneumatics (NZ) were mainly of Pakeha or European origin, where considerable importance is assigned to individual success and a desire to achieve (Webster's original proposition). Therefore, importance was assigned to having considerable freedom to adopt an approach appropriate to each individual worker, in a bid to increase an individual's commitment and suitability for promotion. These results indicate sufficient differences in employee work values between two distinct Japanese-owned subsidiaries.

### 5.2 - Japanese Production Systems

The proportion of respondents at both participating subsidiaries who indicated that selected production systems had been implemented at their workplace increased with years of employment. At SMC Pneumatics (NZ), for instance, 33 percent of respondents indicated that production systems had been implemented from Japan, with the majority of these respondents being employed with the company for one to seven years. Respondents at Juken Nissho (Masterton) responded in a similar manner, remarking that 63 percent believed that production systems had been implemented from Japan, with the majority of respondents employed for a similar period to that of SMC Pneumatics (NZ). This indicates that the longer one works for an organisation, the more knowledgeable one becomes regarding the production systems used. This claim is not substantial in itself, however, as workers employed for one year or less would still be learning the rules, procedures, and behaviour that encompasses an organisation's culture, in-depth knowledge of production systems, especially if they did not pertain to an individual's job, would not be known. However, when the introduction of Japanese management

techniques is examined with years of employment, this claim is further validated. Despite the fact that a large proportion of respondents employed at both participating subsidiaries indicated that they were unsure whether or not Japanese management techniques had been implemented, those respondents who did indicate a definite answer had been employed between one to seven years.

Further, nine respondents from SMC Pneumatics (NZ) remarked that Japanese production systems had resulted positively on their work, while previously only six respondents indicated that production systems had been implemented. These results indicate that respondents are possibly unaware of what production systems had been implemented within their individual sections. At Juken Nissho (Masterton) however, 42 out of 57 respondents commented that the introduction of Japanese production systems had a positive influence on their work.

**Just-in-Time inventory**

The lack of just-in-time (JIT) inventory, according to 11 respondents at SMC Pneumatics (NZ), had not resulted in an increase in long-term production. Further, an increase in subcontractor use did not result, possibly due to JIT not being implemented, as subcontractor use is an important component of just-in-time inventory.

Similar to SMC Pneumatics (NZ), Juken Nissho (Masterton) had not implemented just-in-time inventory, with the majority of respondents also indicating that no increased use of contractors resulted. Further, mirroring SMC Pneumatics, 44 of the 63 respondents who remarked that just-in-time had not been implemented also commented that no increased focus on long term production resulted. Respondents at both SMC Pneumatics (NZ) and Juken Nissho (Masterton) indicated a tendency towards Hofstede's long term orientation dimension, while valuing the importance of medium to long term planning. It could, therefore, be concluded that long term production at both subsidiaries was already well established prior to the decision not to implement just in time inventory.

SMC Pneumatics (NZ) holds a relatively large inventory of manufacturing components in stock, similar to the just in case manufacturing philosophy. SMC Pneumatics (NZ)

employs a variety of suppliers in New Zealand and a large proportion of pneumatic components are sourced from Japan, making the implementation of just-in-time inventory and production unlikely. Further, New Zealand business culture, according to Harper (1994), hampers the adoption of JIT due to inflexibility and a lack of group responsibility. Bayly (1991) argues that a lack of knowledge and understanding of the JIT concept also hinders its adoption. Hence, respondents at both participating subsidiaries indicated a lack of knowledge regarding Japanese production techniques, therefore knowledge and awareness of this management technique is limited. Respondents from SMC Pneumatics (NZ) previously indicated that while all respondents indicated the importance of having co-operative work colleagues, 72 percent also indicated the importance of adopting an individualistic approach to their job. Hence for just-in-time to be introduced at SMC Pneumatics, the individualistic work value held by many employees would need to be altered towards accepting more group responsibility as well as establishing closer support relationships with local suppliers. While the introduction of just-in-time inventory requires substantial changes in employees' work values, Nissan New Zealand, Toyota Thames, and Suzuki New Zealand are examples of Japanese-owned subsidiaries who have successfully adopted just in time inventory by implementing workplace reform.

**Total Quality Management**

Both participating subsidiaries have adopted total quality management (TQM). SMC Pneumatics adopted TQM under the ISO 9000 quality assurance programme to increase the level of quality demanded from customers. Their customers, particularly government departments, requested that if they (SMC Pneumatics) wanted to become an approved supplier, they were required to have a quality management system in place. Further, European importers strongly suggest a quality certification for manufactured goods, according to Dawson and Palmer (1993).

Since the introduction of TQM, group decision making has been retained, as quality was considered an organisational wide issue and all employees were required to be involved in increasing the level of quality in produced pneumatic goods. Further, Dawson et al. (1993) indicated the importance of group decision making as an essential and related

characteristic for the successful implementation of TQM. All respondents at SMC Pneumatics (NZ) remarked on the importance of having co-operative fellow workers while minimising conflict at work. By the introduction of TQM, a system that places the end accountability and responsibility for quality in the hands of each individual worker, conflict at work was reduced by empowering employees towards group decision making prior to the introduction of TQM.

Of the respondents who indicated that TQM had been implemented at SMC Pneumatics (NZ), 72 % remarked open communication had been influenced. It could be assumed that as respondents at SMC Pneumatics responded positively towards non-restrictive access to managers, an increased commitment to reducing conflict at work, would have reinforced the need for open communication employed under TQM. With thirteen percent of respondents indicating a reduction in group decision making, it is not surprising that such a low percentage of Juken Nissho's respondents believe that group decision making has decreased. A core component of TQM according to Harper (1994) is linking each individual to a common vision of their organisation, therefore by supporting group co-operation and decision-making, TQM has a higher probability of being successfully adopted.

Interestingly, only 63% of respondents from SMC Pneumatics remarked that an increased reliance on team members resulted from the introduction of TQM. One would have assumed that this percentage would have been higher, especially when one takes into consideration the fact that all respondents indicated that group decision making had been retained. However, when one takes into consideration that it is more important for SMC respondents to have considerable freedom to adopt an individual approach to work, rather than having co-operative fellow workers, it is plausible why such a low percentage resulted.

At Juken Nissho (Masterton), those respondents who indicated their support towards the implementation of TQM (52 respondents), only a small proportion (20 respondents) indicated that open communication had been influenced. As respondents previously indicated a high level of agreement towards non-restrictive management access, and general equality existing between workers and management, this small proportion is

somewhat surprising. Hence one could, therefore, assume that open communication has not been directly influenced by the adoption and implementation of total quality management at Juken Nissho (Masterton) Limited.

## Quality Circles

While the majority of respondents at both participating subsidiaries indicated that quality circles had not been implemented within their respective workplaces, a small proportion of respondents at Juken Nissho (Masterton) believed it had. Respondents further agreed that increased team-work had resulted since quality circles had been implemented. The advantages expressed by Whitehill (1991) associated with quality circles, namely improved communication, greater job satisfaction and improved morale, have not eventuated at Juken Nissho (Masterton). Management respondents indicated that although quality circles had been adopted at Juken Nissho (Masterton) to increase job satisfaction and improve morale, Japanese nationals influence considerable control over all decision making, production, and planning. Therefore, worker motivation and lack of commitment to such a system occurred due to a lack of 'buy-in' from employees. Further, it is no wonder that quality circles have been disbanded within Juken Nissho (Masterton) due to Japanese dictatorial decision making.

Palmer and Dawson (1993) remark that group problem solving techniques are an essential characteristic of TQM. However, as the quality circle concept of group problem solving has not been implemented at Juken Nissho (Masterton), it is expected that other group solving techniques are supported to increase the level of product quality.

## Kaizen

A relatively large proportion of SMC respondents (11 or 61 percent) believe that kaizen has not been adopted at their workplace. This is somewhat surprising as while TQM has been adopted, kaizen an essential component of total quality management has not. However, management respondents remarked that participative decision making is emphasised within SMC Pneumatics. This, however, is mainly dominated by managers.

Workers, according to management, have every opportunity to participate in meetings and make decisions; however, the influence from workers regarding management decisions is minimal. Further, for TQM to operate efficiently in any organisation, kaizen is required according to Harper (1994). It is surprising that SMC Pneumatics (NZ) has not adopted this system considering that the organisation's motto is 'always getting better'. Respondents indicated that TQM had been adopted under the ISO 9000 quality assurance programme, possibly indicating why kaizen and quality circles had not been implemented to the extent they would if ISO 9000 had not been adopted.

Similar to SMC Pneumatics (NZ), a relatively high proportion of respondents 48 (or 53 percent) employed at Juken Nissho (Masterton) remarked that kaizen had not been implemented, while 32 respondents commented that group decision making had been retained. However, as management respondents indicated, all decisions are made directly by Japanese nationals indicating a lack of group decision making. According to Campbell (1997), organisations require a total shift in organisational culture for kaizen to be effective. However, for a change in organisational culture, as discussed by Thomson (1994) and Chapman (1993), managers must unlock their workforce's motivation, skills, and intelligence by creating an environment of true participation and continuous learning. As Juken Nissho (Masterton) currently has a decision making style that is dictatorial, an environment of true participation can not evolve. The introduction of such a system at both SMC Pneumatics and Juken Nissho (Masterton) requires the alteration of work values and attitudes. Workplace reform at Juken Nissho (Masterton) can not evolve with the current dominance of Japanese nationals.

## 5.3 - Japanese management techniques

### In-house Trade Unions

While all respondents at SMC Pneumatics (NZ) indicated in-house trade unions had not been implemented, a relatively small proportion of workers at Juken Nissho (Masterton) indicated it had. These respondents indicated that the adoption of in-house trade unions increased levels of management at the mill, while also increasing group decision making. Management respondents at Juken Nissho (Masterton) indicated that trade

unions had been altered from the Japanese model to form worksite committees. These committees were adopted to alleviate union interference and to provide workers with a channel to voice their concerns, and ideas associated with their workplace. The Masterton mill does not employ industry union; however, employees are not banned from joining a union associated with their work. The introduction of the Employment Contracts Act (1991) according to Perry et al. (1995), has increased the freedom for Juken Nissho (Masterton) to organise their own employment relationships, rather than constantly replying on union bargaining.

A move from union based to enterprise based bargaining occurred, moving towards a high trust strategy as advocated by Boxall and Haynes (1992). Juken Nissho (Masterton), while moving towards such a strategy similar to that employed in Japan, minimises the external influence of trade unions, therefore reducing the possibility of work conflict. Further, by fostering a high trust strategy, respondents at Juken Nissho (Masterton) increase the possibility of management access as workers and managers are working towards a common goal, such as fostering a subsidiary-wide commitment to TQM and continuous improvement. Respondents previously indicated that TQM had been adopted. Kaizen, however, according to the majority of respondents, had not. Therefore, developing and fostering a high trust strategy is one possible alternative Juken Nissho (Masterton) can utilise to boost organisational continuous improvement.

**Lifelong and semi-permanent employment**

The majority of respondents employed at both participating subsidiaries commented that neither lifelong or semi-permanent employment had been adopted. Managers from both subsidiaries commented that lifelong employment in today's dynamic and rapidly changing business environment is not an economic reality. Those respondents employed at SMC Pneumatics (NZ) who indicated that lifelong employment (15) and semi-permanent employment (16) had not been implemented remarked that no long term production influence had been experienced, due to the lack of adoption of such techniques.

While the Japanese, according to Hasegawa (1986:12), consider lifelong employment to be the backbone of Japanese management, in that it "creates an atmosphere of co-operation and harmony, reducing restlessness and insecurity", they also believe that local adaptation must occur if their offshore operations are to adopt such techniques. Therefore, as Enderwick (1991) comments, this is further complicated by New Zealand being a relatively small manufacturer and exported nation, therefore small changes in both national and global markets can have a dramatic impact on employment policies in New Zealand.

Within Juken Nissho (Masterton), 87% of respondents indicate that lifelong and semi-permanent employment had not been adopted. As a large proportion of these respondents also indicated the importance of stability at work, it would seem that workers need work stability. However, both lifetime and semi-permanent employment at this stage are not seen as economic realities. Further, while Stone (1997) indicated younger generations in Japan challenging the future relevance of lifelong employment, these opinions have the possibility to influence offshore operations.

**Seniority Based Wage and Promotion System**

Respondents at both SMC Pneumatics (NZ) and Juken Nissho (Masterton) indicated strongly that the seniority based wage and promotion system had not been implemented. Managers from both participating subsidiaries commented that promotion is based on individual performance, rather than age or length of employment. Respondents also commented that an increase in individual accountability and responsibility resulted. This is supported by Rudman (1994), who comments that the majority of employees' are motivated by individual pay-for-performance schemes. Respondents at SMC Pneumatics have indicated the importance of adopting an individualistic approach to work. This, one could assume, also extends to the current individual pay for performance schemes. Therefore, the adoption of a promotion system that is based primarily on age, seniority or length of employment would not be popular due to current work values.

Respondents at Juken Nissho (Masterton) indicated that individual accountability and responsibility had not been influenced by the lack of adopting such a management technique. As previously discussed, respondents from Juken Nissho (Masterton) indicated a reliance on their supervisors at work. Therefore, the adoption of such a management technique due to differing work values would not be highly supported at Juken Nissho.

As lifelong employment has not been adopted by either participating subsidiary, it follows that seniority promotion would not have been adopted either as both are closely related. Chen (1995) remarks that the longer a person has been employed within a Japanese company, the more likely it is that he would be promoted based on his age and length of employment, rather than individual performance.

While promotion by the majority of organisations in New Zealand, according to Campbell -Hunt and Corbett (1996), is based on individual performance, there has been an increased interest shown towards alternative incentive plans including gainsharing, profit sharing and small group incentives. Despite this, it is unlikely that a promotion system based primarily on seniority will be introduced.

**Group Consultation and Decision-Making**

Workers from both participating subsidiaries indicated that group consultation and decision making had not been implemented, somewhat surprising due to TQM being adopted. However, all decisions made by both organisations either required the approval of the mill manager, or were decided by management, negating the need for worker participative decision making. Despite this, managers from both organisations are adamant that group consultation and decision making had been implemented, if only at a more senior level. Weekly, fortnightly and monthly meetings are scheduled at SMC Pneumatics (NZ) and the same was done at Juken Nissho (Masterton). However, both organisations have remarked that some decisions are made without consultation with workers, which can cause frustration and resentment.

The majority of managers at both subsidiaries believe that group decision making and consultation had been implemented, however, the majority of decisions (especially within Juken Nissho) made are without worker participation, it is not surprising that a lack of awareness or knowledge of implementation has resulted.

Further, the majority of respondents from both organisations agreed that an increase in informal and open communication had not resulted, due to the lack of adopting such a principle. This is, however, not surprising, especially if group decision-making, is conducted solely by management levels. Harper (1994) comments that " it is generally accepted that there is greater emphasis upon consultation during business decision-making in Japan". However, Chen (1995) comments that there is a tendency for Westerners to remark that all Japanese companies perform group decision making. However, certain decisions in all organisations, regardless of origin, require instant decisions, made by management.

To conclude, while group consultation and decision-making according to workers has not been adopted at SMC Pneumatics and Juken Nissho (Masterton), the work values held by respondents would tend to support the adoption of such a management technique. Non-restrictive access to management and equality existing between workers and management is desired. Emphasised further by group consultation and decision-making. In addition, the importance indicated by respondents towards co-operative fellow workers as well as minimsing conflict and resentment at work could possibily be sustained by the introduction of group consultation and decision-making.

# Chapter Six – Conclusions and Recommendations

## *6.1 - Conclusions*

Since the Fourth Labour Government began to deregulate the New Zealand economy, overseas organisations have expressed an interest in establishing operations in New Zealand. SMC Pneumatics (NZ) and Juken Nissho (Masterton) are two examples of such investment. As multinational organisations continued to invest in New Zealand, a culturally diverse workforce grew, increasing the variability of work values within organisations. This thesis has shown the influence adopted Japanese production systems and management techniques have had on the work values of New Zealand employees in two Japanese-owned subsidiaries. In addition, work value variability between respondents at both SMC Pneumatics (NZ) and Juken Nissho (Masterton) has been examined.

Respondents at SMC Pneumatics (NZ) and Juken Nissho (Masterton) agreed that a relatively high degree of masculinity existed within their workplace. SMC Pneumatics indicated a tendency towards emphasising intrinsic work values, including the need for personal recognition, while possessing an internal drive to succeed. In contrast, Juken Nissho (Masterton) focused its attention on emphasising the importance of extrinsic work values mainly those associated with career advancement opportunities, and the importance of competition. This was seen as a major motivator towards personal advancement and promotion within Juken Nissho (Masterton).

There was a tendency for both participating Japanese-owned subsidiaries towards avoiding uncertainty. Both SMC Pneumatics and Juken Nissho (Masterton) strongly agreed with the implementation of rules and procedures at work to limit the possibility of uncertainty as indicated by Phatak (1995). However, strict formalisation similar to that in Japan has not been adopted at SMC Pneumatics (NZ) or Juken Nissho (Masterton), as the work ethic of New Zealanders is significantly different from that of the Japanese. Still, formalisation tends to be higher at Juken Nissho (Masterton) due to the influence of Japanese nationals being employed.

Respondents at both participating subsidiaries also tended to agree that a low power distance existed between workers and management as indicated by Hofstede (1991). This is suggested by high levels of support given to the work values of non-restrictive management access and general equality existing between workers and managers. SMC Pneumatics (NZ) indicated less agreement towards workers being dependent on their supervisors, hence Juken Nissho (Masterton) tends to have a higher level of power distance than SMC Pneumatics (NZ). Both participating subsidiaries also agreed with Hofstede's long term orientation dimension, with SMC Pneumatics tending to emphasise planning with a medium to long term focus, while Juken Nissho (Masterton), from the responses gained, tended to focus more attention on short to medium term planning.

Finally, both Japanese-owned subsidiaries indicated a relatively high tendency towards Hofstede's dimension of individualism. Both SMC Pneumatics and Juken Nissho (Masterton) implied a high level of individualism, despite Japanese nationals being present at Juken Nissho (Masterton), suggesting that the influence of Japanese nationals on the individuality of New Zealand workers was minimal. Further, work values expressed by individual respondents indicate the important influence of national culture in the development of an individual's work values. Respondents from Juken Nissho (mainly Maori and Pacific Islanders), for instance, agreed on the importance of having a job that leaves sufficient time for family and personal life. Family and personal time is deeply associated with Maori and Pacific Island cultures. In contrast respondents from SMC Pneumatics (mainly Pakeha or European) indicated considerable importance on individual success emphasised by a desire to achieve. Therefore, significance was assigned to having considerable freedom to adopt an approach appropriate to each individual worker, to increase the possibility for future advancement. National culture accordingly influences the development and sustainment of work values. The importance assigned by respondents at SMC Pneumatics is again deeply influenced by national culture.

Existing employee work values at both SMC Pneumatics (NZ) and Juken Nissho (Masterton) were reinforced rather than altered by the introduction of Japanese production systems and management techniques. Co-operative fellow workers, the

importance of written rules and procedures, non-restrictive access to managers, as well as a reduction in inequality between workers and management have all been reinforced by the adoption of TQM, quality circles and in-house trade unions.

Two of the four Japanese production systems selected for investigation; TQM and quality circles have been implemented at both SMC Pneumatics (NZ) and Juken Nissho (Masterton). TQM did not influence group decision making negatively at SMC Pneumatics as quality was considered an organisational-wide issue. All employees at SMC Pneumatics (NZ) were strongly influenced to become involved in increasing the level of total quality. In addition, the importance of co-operative work colleagues was a necessary work value held by respondents at SMC Pneumatics (NZ), when TQM was implemented. Co-operation was, and still is, an important component in maintaining a commitment to increase organisational-wide quality. Further, as respondents indicated the importance of reducing conflict at work, management at SMC Pneumatics (NZ) considered it necessary not only to implement rules and procedures, but also to empower all employees to make a solid commitment towards the total quality philosophy. Similar to SMC Pneumatics (NZ), Juken Nissho (Masterton) also implemented TQM, resulting in an increased reliance on team members, fostering enhanced group co-operation. These two components were seen as essential to achieving a quality focused organisation.

While the majority of workers at both SMC Pneumatics and Juken Nissho (Masterton) indicated that quality circles had not been implemented, while all management respondents indicated that they had. The introduction of quality circles, according to management, increased the level of teamwork as well as resulting in an increase in co-operative work colleagues. This discrepancy between workers and management reveals that quality circles possibly are only used at higher management levels. While managers indicated that workers have every opportunity to participate in group decision making via quality circles, the results tend to indicate otherwise, especially at Juken Nissho (Masterton).

Further, while two Japanese production systems have been adopted at both SMC Pneumatics (NZ) and Juken Nissho (Masterton), only one *Japanese management*

*technique*, that of in-house trade unions, had been implemented at Juken Nissho (Masterton). In-house trade unions were introduced to minimise conflict at work while limiting the potential conflict of external trade unions. The fostering of a high trust strategy between workers and management, in a bid to reduce inequality and uncertainty was intended.

TQM, quality circles and in-house trade unions were all altered before their introduction at Juken Nissho (Masterton) and SMC Pneumatics. This was due to New Zealanders' possessing different work values to those of the Japanese. Local adaptation was reinforced by the encouragement, support and at times insistence from Japan, that such techniques and systems would not work successfully in New Zealand unless adaptation occurred.

In conclusion, while respondents from SMC Pneumatics (NZ) and Juken Nissho (Masterton) indicated differing levels of significance regarding employee work values, the introduction of TQM, quality circles and in-house trade unions have reinforced existing employee work values.

### *6.2 - Recommendations for further research*

When organisations establish manufacturing operations in a foreign country, its managers need to understand the work values held by members of its host country. Such an understanding facilities the design and selection of appropriate management techniques Pelled and Xin, 1997. As the Pacific Rim gains economic strength and organisations expand operations to establish offshore facilities, there will exist a strong need for information about adopted management techniques and production systems and the influence each has on the existing work values of employees. This research has begun to address such a need by examining the influence Japanese production systems and management techniques have on the work values of New Zealand employees.

However, the basis of this research must be expanded to determine if the conclusions reached are representative of all Japanese subsidiaries operating in New Zealand. By determining this, a stronger and more validated argument will develop.

While current research has focused on the work values of Japan and New Zealand, research pertaining to production and management techniques distinctive to other cultures must be conducted. Such empirical research will further enhance the contribution of this paper by assessing the validity of the theoretical framework used.

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# Appendix A

&lt;Managing Director&gt;
&lt;address&gt;

&lt;date&gt;


Dear Sir/Madam,

My name is Paul Evans and I am conducting research for the completion of my Master's degree in Business Studies within the Department of Management Systems, Massey University.

This letter extends an invitation to you and your organisation to participate in the following research. My intention is to study the influence Japanese management and production techniques have on the workplace values of New Zealand employees.

As organisations within the New Zealand Manufacturing Industry rely upon international markets and customers for financial success, it is vital that an organisation understands the influence that national cultural differences have upon the successful operations of an organisation. The minimisation of culture clash is crucial. Before an understanding of national cultural differences can develop, an understanding of cultural differences within an organisation itself is necessary, thus the need for this research.

I believe this research gives the opportunity for you as a company to increase your understanding of your organisational culture and employee work values as well as increasing the understanding of workplace diversity in New Zealand.

I am well aware of the importance of your time. It is hoped that I will be able to conduct 5 management interviews within the (organisation), **not** exceeding 1 hour each. Further, I ask that a 5 page employee survey be distributed to your employees to gain **their** individual work values.

Enclosed for your reference is an information sheet containing important details of the proposed research, and an outline documenting the potential benefits participating organisations may receive.

At this stage if you would like to ask any further questions or comments please do not hesitate to contact me at the Department of Management Systems by phone (06) 350-4200 (direct), fax (06) 350-5661 or email P.N.Evans@massey.ac.nz

I will be in touch in a few days to determine if you received this information and if you are willing to progress further with this research.

I look forward to talking with you in the near future

Thank-you

Paul Evans

# Appendix B

# Work Values and Japanese Management Influence Questionnaire

## Section A - Work values.

> This section contains a number of statements. Please tick **the** box which you believe best reflects your opinion. When answering, please answer from the basis of the job you currently do. Please note: it is important that you express **your** individual opinion and not those of the organisation you work for.

| Q. | Work Values | Strongly disagree (1) | Disagree (2) | Neutral (3) | Agree (4) | Strongly agree (5) |
|---|---|---|---|---|---|---|
| 1 | It is important to be dependent on your supervisor at work | | | | | |
| 2 | Equality in general, should exist between workers and management | | | | | |
| 3 | Access to managers should be non-restrictive | | | | | |
| 4 | Workplace change should happen slowly | | | | | |
| 5 | There is a place for stress and anxiety within this organisation | | | | | |
| 6 | Conflict at work should be minimised | | | | | |
| 7 | Written rules and procedures at work are necessary | | | | | |
| 8 | I work for myself first, then for the company | | | | | |
| 9 | A job should leave you with sufficient time for your personal and family life | | | | | |
| 10 | Personal recognition is important when a job has been well done | | | | | |
| 11 | It is important to have considerable freedom to adopt your own approach to the job | | | | | |
| 12 | Opportunities for career advancement are important to me | | | | | |
| 13 | It is important to be ambitious and have a drive to succeed | | | | | |
| 14 | Competition is vital for personal achievement and success | | | | | |
| 15 | It is important to have co-operative fellow workers | | | | | |
| 16 | Emphasis should be given to short term rather than long term goals | | | | | |
| 17 | Stability at work is more important than workplace change | | | | | |

## Section B - Japanese Production Systems and Management Principles

18.  **Have Japanese production systems been implemented within your organisation?**
     (Please tick the **most** appropriate box)

     [ ]  Yes, go to Q.19        [ ]  No, go to Q.20        [ ] Unsure, go to Q.20


19.  **Why do you believe Japanese production systems were introduced to your organisation?**
     (Please write your answer below).

     _____
     _____
     _____
     _____


20.  **Are you aware of any Japanese managers currently employed within your organisation?**
     (Please tick the **most** appropriate box)

     [ ] Yes - go to        [ ] To some extent        [ ] No - go to        [ ] Unsure
         Q. 21    go to Q. 21                          Q. 25                 go to Q. 23

21.  **Do you believe that the Japanese culture of these managers has had an influence on the way
     you conduct your work?** (Please tick the appropriate box)

     [ ] Yes - go to        [ ] To some extent        [ ] No - go to        [ ] Unsure
         Q. 22    go to Q. 22                          Q. 22                 go to Q.23

22.  **Please explain, why ?** (write your answer below).

     _____
     _____
     _____
     _____

23. **Please indicate which of the following Japanese Production Systems are used in your organisation and do these have a positive or negative influence on your work?**

| Japanese Production Systems | Positive (1) | Neutral (2) | Negative (3) |
|---|---|---|---|
| Just in time (JIT) inventory system | | | |
| Kaizen - constant improvement programme | | | |
| Kanban control system alerting to minimum stock levels | | | |
| Quality circles | | | |
| Statistical quality control | | | |
| Total Quality Management (TQM) | | | |
| Other, please explain : | | | |

24. **Please tick the following effects that Japanese production systems have in your organisation. Do you see these as positive or negative?**

| Ways of Working | Positive (1) | Negative (2) | Unsure (3) |
|---|---|---|---|
| Increased teamwork | | | |
| Tasks are general, rather than specific | | | |
| Increased levels of management | | | |
| Decreased group decision making | | | |
| More use of contractors | | | |
| Reduced power to employees | | | |
| Reliance on team members, not individuals | | | |
| Individual accountability and responsibility | | | |
| Long term production focus | | | |
| Open communication | | | |
| Informal communication | | | |
| Other, please explain: | | | |

25. **Does your organisation use Japanese human resource management principles?**
(Tick the **most** appropriate box)

[ ]  Yes, go to Q. 26   [ ]  No, go to Q.29   [ ]  Unsure, go to Q.29

26. **Why do you believe Japanese human resource management principles were introduced in your organisation?** ( Please write your answer below).

_____
_____
_____
_____
_____

27. **Please indicate which of the following Japanese Human Resource Management Principles are used in your organisation and do these have a positive or negative influence on your work?**

| Japanese Management Techniques | Positive (1) | Neutral (2) | Negative (3) |
|---|---|---|---|
| In-house trade unions | | | |
| Lifelong employment | | | |
| Semi-permanent employment | | | |
| Seniority-based wage and promotion system | | | |
| Group consultation and decision making | | | |
| Do not know | | | |
| Other, please explain:<br>_____<br>_____<br>_____ | | | |

28. **Was the decision to implement Japanese human resource management principles or production systems developed locally?**

[ ] Yes - Go to Q.       [ ] No - Go to Q.       [ ] Unsure - Go to Q.
29                          29                         29

29. **Did you receive training on Japanese production systems when you began work in this organisation?**

[ ] Yes - Go to Q.       [ ] No - Go to Q.       [ ] Unsure - Go to Q.
30                          30                         30

30. **How is most of your work conducted ?**

[ ] Individually          [ ] In pairs             [ ] In teams

## Section C - Respondent data

The following questions will be used to interpret previous answers. This information will be collected and analysed together. No individual will be identified by answers supplied and confidentiality will be assured.

31.    **What organisation do you work for ?** (please write your answer below).

_____

_____

32.    **What division within your organisation do you work in?** (Please write your answer below).

_____

_____

_____

33.    **How long have you been employed in this organisation?**

[ ]    Less than 1 year              [ ]    Greater than 1yr but less than 3
[ ]    Greater than 3yrs but less than 7    [ ]    Greater than 7yrs but less than 15
[ ]    15 years or longer

34.    **Are you a male or female ?**

[ ] Male                              [ ] Female

Thank you for taking the time to complete this questionnaire.

# Appendix C

## Management interview questions

### Information about the firm

What products does your organisation produce?

_____

_____

_____

_____


What industry does this organisation belong to?

_____

_____

_____

_____


When was this subsidiary established in New Zealand?

_____

_____

_____

_____


How many employees does your firm in New Zealand employ?

Part time  [ __ ]          Full time [ ___ ]          New Zealand [ ___ ]

Japanese [ ___ ]          Third Country Nation    [ ___ ]


What is your yearly turnover in $NZ?  [ _____ ]

## Japanese Management Techniques and Production Systems

Does your organisation follow Japanese human resource management principles? If so, could you please describe these.

_____

_____

_____

_____

_____

_____

Why were these principles implemented?

_____

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_____

Does your organisation use Japanese production systems? If so, could you please describe these.

_____

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_____

Why were these production systems implemented?

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_____

Were these systems altered to fit the local workplace culture in New Zealand? If so, how?

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_____

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_____

Was the implementation of these systems/principles externally imposed from your parent company in Japan? Why?

_____

_____

_____

_____

_____

_____

How many Japanese managers are employed in this subsidiary?

_____

_____

_____

What influences do they have over the management decisions made in New Zealand?

_____

_____

_____

_____

_____

_____

Does this subsidiary use participative decision making?

_____

_____

_____

Does your organisation use quality circles?

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_____

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_____

What, according to you are the positive and negative effects of using quality circles?

_____

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_____

Have there been any unexpected gains or problems in using Japanese production systems in your organisation?

_____

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_____

_____

_____

How does the relationship between the New Zealand subsidiary and the Japanese parent company affect New Zealand operations?

_____

_____

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_____

Do you believe the use of Japanese human resource management principles and production techniques has been a factor in your organisations success? Please explain.

_____
_____
_____
_____
_____
_____
_____

Does this subsidiary use formal or informal communication channels?

_____
_____
_____
_____
_____

What, according to you, are the reasons behind the New Zealand's admiration and/or cynicism towards the use of Japanese human resource management principles and production systems?

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_____
_____
_____
_____
_____
_____

Do you believe there is a future for the adoption of Japanese management and production systems in the wake of the latest Asian economic crisis?

_____
_____
_____
_____

Which of the following effects have been experienced in your organisation resulting from the use of Japanese production systems?

[ ]  Increased teamwork
[ ]  Tasks are general, rather than specific
[ ]  Increased levels of management
[ ]  Decreased group decision making
[ ]  More use of contractors
[ ]  Reduced power to employees
[ ]  Reliance on team members, not individuals
[ ]  Individual accountability and responsibility
[ ]  Long term production focus
[ ]  Open communication
[ ]  Informal communication
[ ]  Other, please explain :

_____
_____
_____
_____
_____

In general, do you regard these effects to have a positive or negative effect on the organisation?

_____
_____
_____
_____
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_____

What influence does Japanese culture have on the operation of your New Zealand company?

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Where do you see the organisation's future in the long term leading, while using Japanese production systems?

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Are your corporate critical success factors linked to the Japanese production systems used within your organisation? If so, how?

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What do you believe are the three most important factors to bear in mind when introducing Japanese management principles and production systems?

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Do you have any other comments on the above questions we have discussed?

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## <u>Conclusion</u>

Thank-you for your time. It has been most appreciated. Have you got any further points for discussion before we finish?