A Quantitative study of an Employee Satisfaction Index

(An investigation of a South African Company)

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January 2005

CONFIDENTIALITY CLAUSE

15 Januauary 2005

TO WHOM IT MAY CONCERN

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This research has not been previously accepted for any degree and is not being currently submitted in candidature for any degree.

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ACKNOWLEDGEMENTS

The road to this destination has been a long, arduous and challenging one with many hours of sacrifice from my family. There can be no words to describe the appreciation I have for the constant support and inspiration I have received from the following people:

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Thank you all for walking me to the checked flag.

ABSTRACT

Globalisation is occurring at a fast and accelerating rate. Over the past decade foreign direct investment has grown three times faster than world trade and four times faster than world output.

Over the past quarter century the number of countries operating without exchange controls affecting the import of goods and services has increased more than five fold. These developments have led many organizations to assume that the historical cultural differences which existed between the territories in which they operate are less marked, and less important than they once were.

As the markets for their goods and services becomes increasingly global, so too do the needs and aspirations of the employees who produce and deliver these goods and services.

Companies increasingly structure themselves around global business units rather than national organizations, and seek to enhance employee commitment to and identification with the goals and objectives of transnational units rather than the traditions and bonds of bounded country fiefdoms.

Technological innovation, new product markets and a diverse workforce have increased the need for companies to re-examine how their training practices contribute to learning.

The need for globalisation emanates from the quest of organisations for larger market share, low cost production and sourcing of skilled workforce. Ethical consideration and work practices must result in the greatest good for the largest number of people.

Employment practices must therefore respect the basic human rights of privacy, due process, consent and free speech. Finally managers must treat employees and customers equitably and fairly.

TABLE OF CONTENTS

CHA	PTER 1	– Introduc	tion to Re	esearch	
1.1	Introduction 1				
1.2	Backg	round			2
	1.2.1	Company Profile			2
		1.2.1.1	Market	Position	3
		1.2.1.2	Technol	ogy	3
		1,2,1,3	Quality		3
		1.2.1.4	Locatio	n	3
		1.2.1.5	Sales T	urnover	4
		1.2.1.6	Capacit	у	4
	1.2.2	Automot	ive Indus	try Analysis	5
		1.2.2.1	Politica	1	5
		1.2.2.2	Econon	nic	6
		1.2.2.3	Sociolo	gical	6
		1.2.2.4	Techno	logical / Environmental	6
	1.2.3	Market A	Analysis		7
		1.2.3.1	The Mo	otor Industry	7
		1.2.3.2	Market	Growth	9
		1.2.3.3	Market	life Cycle Forecast	9
		1.2.3.4	Market	Behavior	10
	1.2.4	Competi	tor Analy	rsis	10
		1.2.4.1	Compet	itor	10
		1.2.4.2	Compet	itor Position	11
		1.2.4.3	Market	Segmentation	11
	1.2.5	Business	Process		12
		1.2.5.1	INVOC	OM®	12
		1	.2.5.1.1	What is an INVOCOM®?	12
		1	.2.5.1.2	Goals of an INVOCOM®?	12
		1	.2.5.1.3	Ground Rules for INVOCOM®	13
		1	.2.5.1.4	Purpose and benefits of INVOCOM®	13
		1	.2.5.1.5	Application of the INVOCOM® methods	14
		1	.2.5.1.6	Generic Agenda	14
		1	.2.5.1.7	INVOCOM® Rules	15

15

1.2.5.1.8 INVOCOM® Agenda

	1.2.5.2 Performance Management	16
	1.2.5.3 Re-numeration and Reward Policy	18
	1.2.5.3.1 Grade of the Job	18
	1.2.5.3.2 Market Factors relating to job category	18
	1.2.5.3.3 Annual increases, salary adjustments	20
	1.2.5.3.4 Value Creation Incentive Scheme	20
13	Problem statement	23
1.4	Objectives of the Research	23
1.5	Motivation for the Research	24
1.6	Benefits of the Research	24
1.7	Scope of the Research	25
1.8	Hypothesis	25
	1.8.1 Hypothesis 1	25
	1.8.2 Hypothesis 2	25
	1.8.3 Hypothesis 3	25
1.9	Research Design and Methodology	26
	1.9.1 Design Strategy	26
	1.9.2 Sampling Design	26
	1.9.3 Data Analysis	27
1.10	Area of Limitations	27
1.11	Structureof the study	27
1.12	Conclusions	28

CHAPTER 2 - Theory and Literature Survey

2.1	Introduc	tion		29
	2.1.1	Satisfacti	on Theories	29
	2.1.2	Incentive	Theories	29
	2.1.3	Intrinsic '	Theories	29
2.2	Theories	of Motiva	tion	30
	2.2.1	Content 7	Theories	31
		2.2.1.1	Maslows Hierarhy of needs	31
		2.2.1.2	Hertzbergs' Hygiene-Motivation Theory	33
		2.2.1.2.1	Hygiene Factors	35
		2.2.1.2.2	Motivation Factors	35
		2.2.1.3	McGreggorTheory	35
		2.2.1.4	McClellands Theory	37
		2.2.1.5	Alderfer's ERG Theory	38
	2.2.2	Process 7	Theories	39
		2.2.2.1	Reinforcement Theory	39
		2.2.2.2	Expectancy Theory	39
		2.2.2.3	Equity Theory	40
		2.2.2.4	Goal setting Theory	40
		2.2.2.5	Management by objectives	41
2.3	Perfor	mance Ma	nagement	43
	2.3.1	Introduct	ion	43
	2.3.2	Definition	n	44
	2.3.3	Overview	of Performance Management	44
	2.3.4	Performa	nce Management Process	45
2.4	Conch	usions		47

СПА	PIEKS	- The investigation			
3.1	Introd	uction	48		
3.2	Emplo	yee Satisfaction Questionaire	49		
	3.2.1	Data of Workers in 2002	50		
	3.2.2	Data of Managers in 2002	51		
	3.2.3	Data of Workers in 2004	52		
	3.2.4	Data of Managers in 2004	53		
3.3	Concl	usion	54		
СНА	PTER 4	- The Evaluation			
4.1	Introd	uction	55		
4.2	Analy	rsis of Survey	55		
	4.2.1	Workers	55		
	4.2.2	Managers	59		
4.3	Sumn	nary of Survey	62		
	4.3.1	Managers 2002 and 2004	62		
	4.3.2	Workers 2002 and 2004	63		
	4.3.3	Managers vs Workers for 2002	64		
	4.4.4	Managers vs Workers for 2004	65		
4.4	Resul	ts of Survey	66		
	4.4.1	Workers 2002 vs 2004	66		
	4.4.2	Managers 2002 vs 2004	67		
	4.4.3	Managers / Workers Combined 2002 vs 2004	68		
4.5	Concl	lusion	69		
СНА	PTER 5	- Recommendations and Conclusion			
5.1	Introd	luction	70		
5.2	Recor	Recommendations			
	5.2.1	Communication	70		
	5.2.2	Compensation	71		
	5.2.3	Company Reputation	72		
	5.2.4	Growth, Training and Development	72		
	5.2.5	Management and Supervision	72		

	5.2.6	Job Satisfaction	72
		5.2.6.1 Employee Value Model - Advantages	72
		5.2.6.2 Employee Value Model – Benefits	73
	6.2.7	Working Environment	73
5.3	Concl	usions	74
REFE	RENCI	ES	76
LIST	OF FIG	GURES	
Figure	e 1.1	DBAS Projected Sales	4
Figure	e 1.2	DBAS Projected Market Growth	9
Figure	e 1.3	Projected unit build for Sa motor plants	9
Figure	e 1.4	Market Behaviour and DBAS Growth	10
Figure	e 1.5	Scope of Competitive rivalry	11
Figure	e 1.6	Breakdown of DBAS market share by product grouping	11
Figure	e 2.1	Motivation	30
Figure	e 2.2	Maslows Hierarhy of Needs	32
Figure	e 4.21	Results of Workers – 2002 vs 2004	65
Figure	e 4.22	Results of Managers- 2002 vs 2004	66
Figure	e 4.23	Results of Managers / Workers combined – 2002 vs 2004	67

LIST OF TABLES

Table 3.1	Employee Satisfaction Questionaire	48
Table 3.2	Data of Worker responses - 2002	49
Table 3.3	Data of Manager responses - 2002	50
Table 3.4	Data of Worker responses - 2004	51
Table 3.5	Data of Manager responses - 2004	52
Table 4.1	Analysis of Workers - Communication	54
Table 4.2	Analysis of Workers - Compensation	55
Table 4.3	Analysis of Workers - Company Reputation	55
Table 4.4	Analysis of Workers - Growth, Training and Development	55
Table 4.5	Analysis of Workers - Job Satisfaction	56
Table 4.6	Analysis of Workers - Management	56
Table 4.7	Analysis of Workers - Supervision	57
Table 4.8	Analysis of Workers - Work Environment	57
Table 4.9	Analysis of Managers - Communication	58
Table 4.10	Analysis of Managers - Compensation	58
Table 4.11	Analysis of Managers - Company Reputation	58
Table 4.12	Analysis of Managers - Growth, Training and Development	59
Table 4.13	Analysis of Managers - Job Satisfaction	59
Table 4.14	Analysis of Managers - Management	59
Table 4.15	Analysis of Managers - Supervision	60
Table 4.16	Analysis of Managers - Work Environment	60
Table 4.17	Summary of Managers- 2002 vs 2004	61
Table 4.18	Summary of Workers - 2002 vs 2004	62
Table 4.19	Summary of Managers vs Workers – 2002	63
Table 4.20	Summary of Managers vs Workers – 2004	64

CHAPTER 1 - INTRODUCTION

1.1 Introduction

Much of what we "know" about the world is based on intuition. We have opinions, biases, hunches, and misinformation that we use both in making statements about others and in deciding what we do. The following research is designed to provide management with some feedback regarding human behavior and attitudes in the organization.

Feedback on how employees feel about their jobs, work groups, supervisors, and the organization, can alert management to potential problems and employees intentions early so that action can be taken to prevent repercussions.

Three categories on early motivation theories were examined.

The first approach is satisfaction theories. The assumption here is that a satisfied worker is a productive worker. The second is incentive theories; the assumption of these theories is based on the principle of reinforcement, what might crudely be called the "carrot" approach. Individuals will work harder given specific reward or encouragement for good performance. The last is intrinsic theories. Man is not an animal, say these theorists. He will work best if given a worthwhile job and allowed to get on with it. The reward will come from the satisfaction in the work itself.

The motivation for this research is discussed, and the importance of high job satisfaction in organizations is emphasized. An investigation will be conducted to find out what technique to adopt to successfully motivate employees. A stratified sampling method will be used in the data collection, and a statistical software package will be used for data analysis.

The questionnaire will comprise of eight sections, the first section being a survey on communication. The second part prioritizes on the employee's satisfaction with compensation. The third section of the questionnaire deals with the employees rating of the company' reputation. The fourth on employee growth, training and development, fifth on job satisfaction, the sixth and seventh questions are on management and supervision and the final question on the work environment.

1.2 Background of the study

1.2.1 Company Profile

DuPont Barloworld Automotive Systems Pty Ltd (DBAS) is a joint venture company between DuPont Performance Coatings (DPC) head quartered in Wuppertal (Germany) and Barloworld Coatings headquartered in Johannesburg formed in 1998.

- DuPont is the largest automotive coatings company in the world
- Barloworld is an international brand management company with significant interests in coatings in South Africa, Sub Saharan Africa, Australia and China.

DBAS shareholding is as follows:

51% DuPont Performance Coatings

49% Barloworld Coatings

Vision

"To be the coatings partner of choice to the SA auto industry."

(Source : DBAS Start Plan July 2004)

Mission

"As a Partner to the SA automotive industry:

DBAS acknowledges that the South African automotive industry is a key driver of the South African economy. The car manufacturers drive the demand for new technology automotive coatings. We will meet or exceed global benchmarks in technology, technical service, quality and Reliability" (Source: DBAS Start Plan July 2004)

DBAS COMPANY HIGHLIGHTS

• 1998 April : DuPont and Barloworld enter into 51:49 JV. Specifically to

introduce Water Base (WB) coatings to South Africa.

• 1998 October: First WB coatings supplied to BMW SA (Single source).

1999 March : First WB Basecoats locally made in South Africa.

• 1999 May : Commissioning of Application Centre.

2000 March : DaimlerChrysler SA (DCSA) introduce WB Basecoats and

WB Primers. DBAS is single source supplier.

• 2000 June : Venture introduce WB coatings. DBAS is Main supplier

2000 October: Major investments in WB plant expansion.

• 2000 October: Local manufacture of Waterborne Primers.

2002 April : All DaimlerChrysler SA WB Basecoats locally manufactured.

2003 April : Conversion to Succed #80 lead free electro-coat at Toyota SA.

• 2004 March : Expansion of Application Centre facilities.

1.2.1.1 Market Position

DBAS is the leading supplier of Automotive OEM coatings in South Africa. It is the Technology and Market leader in South Africa. They are the only producers of waterborne OEM coatings in South Africa and supply all the waterborne OEM coatings required by BMW SA and DCSA who are the only OEM's using WB in South Africa at present.

1.2.1.2 Technology

Technology is fully supported by DuPont in Europe and DuPont Shinto in Japan. DuPont and DBAS have demonstrated very good capability in South Africa. Both BMW SA and DCSA WB introductions were highly praised by BMW AG and DC AG, the parent companies of BMW SA and DCSA.

1.2.1.3 Quality

To supply into these global companies, the quality requirements must match those as in Europe. To satisfy this requirement DBAS has the following quality accreditation.

SABS ISO 9002: 1994 - South African Quality Management System

• ML QS 9000 : 1998 - American Quality Management System

• VDA 6.1 - German automotive quality system

• ISO 9001 /2000 upgrade - International Quality Management System

• ISO 14001 - Environmental Management System

1.2.1.4 Location

DBAS has it's headquarters in Port Elizabeth where its main manufacturing plant is. At this plant the water-based basecoats, all the primers and other coloured topcoats are manufactured. It also has a satellite manufacturing facility in Durban , where the corrosion protection electro-coat primers are manufactured. The total workforce of DBAS total 255 with 27 people working at the Durban satellite facility. DBAS also has sales offices in the main regional areas where the motor plants are located viz. Pretoria , Durban and East London.

1.2.1.5 Sales Turnover

Sales Forecast 2004 - 2009

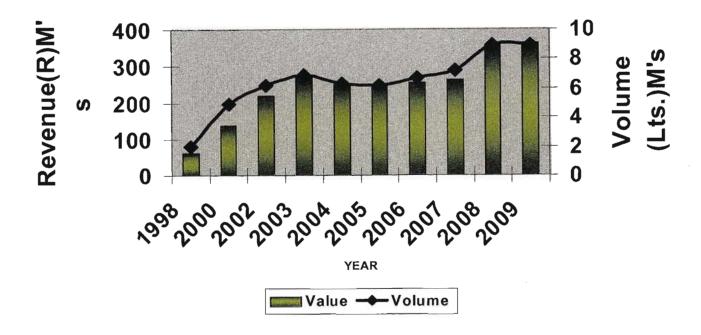


Figure 1.1 DBAS Projected Sales (Source: DBAS Strategic Plan July 2004)

As can be seen from the above table DBAS has shown tremendous growth both in turnover and volume over the past six years and they are forecasting a leveling off for the next three years before continuing significant growth in 2008 /2009. One of the reasons for this leveling off is that when most of the motor companies change models, production of the older models start falling as customers wait for the new models to be launched before purchasing. The other reason is that Toyota is planning a massive export program in late 2007 of their new Toyota Hilux replacement. It is therefore imperative that to meet these expected sales volumes that the appropriate employee value creation initiatives are in place.

1.2.1.6 Capacity

At their PE plant DBAS are currently meeting the requirements of BMW SA, DCSA and Venture utilising one shift only. They anticipate that VWSA and Toyota may convert to WB Coatings within the next 2 – 4 years and are confident that they will be able to meet all customer requirements through carefully planned shift patterns and modest expansion in capital equipment. Their Durban operation is running at maximum capacity with 3 shifts working 24 hours a day for 5 days every week. Plans are in place to double the production capacity at their Durban plant within the next 18 months.

1.2.2 Automotive Industry Analysis

As can be seen by the above, the automotive coatings industry is intimately interwoven into the motor manufacturing industry in South Africa (SA). This means an analysis of the motor manufacturing business is really an analysis of the automotive coatings industry.

The South African car market will not be able to sustain any car plant with limited production. With 400 000 units a year the SA car market is still relatively small compared to the 8 million cars that are produced in Europe (one years production in Europe is equivalent to 20 years production in SA.)

1.2.2.1 Political Environment

The SA economy changed dramatically since 1990. Sanctions were withdrawn and with it came the influx of foreign companies wanting to trade with South Africa. Prior to this the local companies were protected by the previous government from external competition, in the form of high import duties and surcharges.

Example:

		SOUTH AFRICA	JAPAN
Cost of Manufacture		R50 000	R30 000
Pre 1994	100% duty 20%surcharge		R75 000
1994	80% duty no surcharge		R54 000
1996	65% duty		R49 500
2004	35% duty		R40 000

As can be seen from the above exercise, production costs are cheaper in Japan mainly because of their economies of scales and productivity levels. The SA car manufacturers will not have the protectionism that they previously enjoyed by the Government in the form of import duties that were placed on competition from overseas suppliers.

Political stability – Since the 1994 elections the relationship between Labour and Business has improved with both these parties belonging together with Government in NEDLAC. Strikes in the motor industry have reduced to once in three years during the wage negotiations rather than every year as previously experienced.

Post 1990 even international coating companies invested in SA whereas before they were only prepared to work with local companies on a licencee basis.

1.2.2.2 Economical Environment

Foreign exchange rate increases and fluctuations have a severe effect on cost of imports.

Interest rates - The interest rate is relatively high compared to the developed world.

South Africa has one of the lowest energy costs in the world and this is a benefit to automotive industry. According to the World Bank Report 2000/2001 South Africa's income distribution is classified as being upper middle income. By actively ensuring localisation, coatings are produced locally with specific quality standards that will show a reduction in costs without sacrificing quality. Local content will remove the cost fluctuations caused by the exchange rates and also counter the high cost of coatings produced in Europe or Japan. Ultimately DBAS unit cost will be reduced offering affordable coatings to the motor manufacturers.

1.2.2.3 Sociological Environment

Impact to the environment is stressed upon and will continually be stressed upon. DBAS is seen as a reliable company and the future will see a responsible company. DBAS has adopted an Earth Charter, which will ensure that the environment will not suffer as companies grow. DBAS has also set objectives, which need to be met by 2005. These include, reduced energy consumption, reduced water consumption, reduced waste disposal to landfill, reduction of volatile organic compound emissions and elimination of the use of certain chemical substances.

1.2.2.4 Technological Environment

Since DBAS has been manufacturing in South Africa under licence to DPC most of the latest world class technology has been supplied to it.

Every new design is colour matched exactly to DPC's standards.

In the last three years the manufacturing facilities have been upgraded in terms of equipment, process and quality to bring it in line with DPC's world class manufacture.

DPC is a world leader in environmentally safe coatings. They are the pioneers in lead and tin free electro-deposition coatings which is the basis for the corrosion resistant coating for the automotive industry. They are also the lead suppliers of water-based topcoats including metallic basecoats to the European automotive industry.

1.2.3 Market Analysis

1.2.3.1 The Motor Industry

In South Africa the motor industry has gone through a complete metamorphosis in the last 10 years. From an industry that was on the brink of collapse this segment has gone to become an important contributor to the economy of our country.

The motor manufacturing plants are situated in 3 geographic regions.

Eastern Cape

Volkswagen South Africa in Uitenhage

General Motor Corporation manufacturing Opel and Isuzu in Port Elizabeth DaimlerChrysler SA manufacturing the Mercedes Benz C class and the Mitsubishi Colt Bakkies in East London

KwaZulu Natal

Toyota SA plant in Durban

Gauteng

BMW SA plant in Pretoria

Nissan SA manufacturing Nissan and Fiat under licence in Pretoria Ford Motor Company manufacturing Ford, Volvo and Landrover in Pretoria.

The German's were the first to show confidence in our ability to sustain this industry by using this as a base for exports.

- Volkswagen South Africa started the export program. In 1996 VWSA exported into China initially and then followed by shifting manufacture of the A4 golf for the global right hand drive market. More recently VWSA has secured the contract to manufacture the new Golf A5 into the Japanese market. This is an addition of 20 000 extra units. This will bring the total vehicle exports for VWSA up to 60 000 and with a local demand of 40 000. This gives VWSA a viable manufacturing operation.
- BMW SA invested in 1998, in a completely new world class manufacturing plant for the production of the 3 series for the right hand drive market. BMWSA initially started of with 65 units a day and slowly increased this to 145 units a day by introducing a second shift. From 2003 they are budgeting to manufacture 225 units a day (50 000 per annum).

- <u>DaimlerChrysler SA</u> invested in 2000, R1.5 billion to produce the Mercedes Benz C class right hand drive for the world market. Because of the high quality levels of the units produced in South Africa DaimlerChrysler is planning to move the production of the Left hand drive Mercedes Benz C class production from Brazil to SA. This will increase the present production from 250 units a day to 500 units a day which the East London plant is capable of handling on a continuous 3 shift system.
- TOYOTA SA was a wholly owned SA company until Toyota Motor Corporation (TMC) bought the 27.8% that was sold by Johnnic when it unbundled in 1998. TMC increased it's shareholding to 33.6 % in 2001 when Toyota SA bought out the minorities in 2001 and de-listed the company from the Johannesburg Stock Exchange. In July 2002 it bought out a controlling stake from the WESCO Group to increase its shareholding to 74,9%. Since it's takeover in South Africa TMC has announced that it will supply 20 000 new Toyota Corolla 558N for the Australian market out of South Africa. It has also confirmed that Toyota SA will manufacture part of the 450 000 International Multi-Purpose Vehicles (IMV) for the world market from November 2004. These projections will increase Toyota SA production from about 82 000 vehicles in 2002 to 180 000 vehicles in 2005
- <u>NISSAN SA</u> has since 1997 been taken over 100% by the Japanese. They will have to
 find export markets as well for their survival. Since Nissan Motor is now controlled by
 Renault France, there are plans to manufacture Renaults here in SA. Another project
 that is likely to get the nod is the relocation of supply of the Nissan Hardbody for the
 African market to SA.
- Ford Motor Corporation has bought back 100% of the company from Anglo American in 2000. At the present moment no export plans have been announced but since they have bought out Landrover from the BMW Group and VOLVO, the Swedish car manufacturer, they have transferred the local requirements of the 2 models to their plant in Pretoria.
- General Motors South Africa has bought out the 51 % owned by local directors of Delta Motor Corporation in January 2004. At present no new export initiatives have been announced.

1.2.3.2 Market Growth

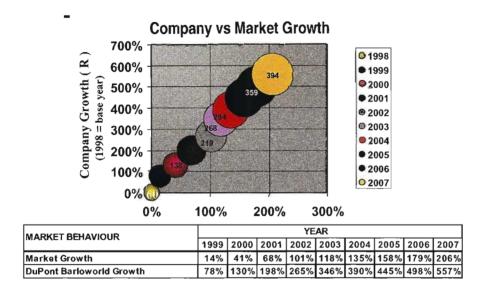


Figure 1.2 DBAS Projected Market Growth (Source: DBAS strategic plan July 2004)

1.2.3.3 Market Life Cycle Forecast

Various business models have been used by key role players and the predicted share of the automotive market by each of the motor manufacturers is shown below with an estimated market share of the DBAS Business.

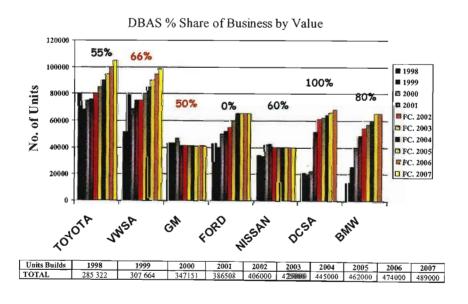


Figure 3 Projected unit builds for the SA motor plants (Source: DBAS Strategic Plan July 2004)

1.2.3.4 Market Behaviour

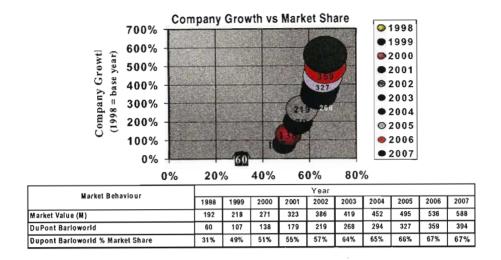


Figure 1.4 Market Behaviour and DBAS Growth (Source: DBAS Strategic Plan, July 2004)

1.2.4 Competitor Analysis

1.2.4.1 The Competitor – AECI Coatings

In 1996 BMW SA decided in principle to shift global production of the right hand drive 3 series vehicle into their South African manufacturing plant. Their manufacturing plant was upgraded to the same standards as in Germany with a capital expenditure of R1,5 billion. They also wanted the paint supply to be the same as in Germany and encouraged their paint suppliers to form joint ventures with global players.

Whilst Barloword Coatings formed their joint venture with DuPont, their only other competitor in this business AECI Coatings had a choice to enter into a joint venture with either PPG Automotive Coatings from United States of America or with BASF Automotive from Germany. AECI Coatings chose to form a joint venture with PPG with PPG taking a 20% stake in their company as PPG also has a limited presence in Europe.

The 3 German companies Volkswagen SA, BMW SA and DaimlerChrysler SA, already engaged in substantial exports at that stage, moved their paint business to DBAS, because DPC was already supplying their mother companies in Europe and were using the exact same paint as was required here in South Africa.

1.2.4.2 Competitor Position

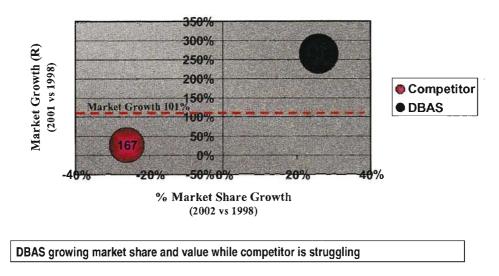


Figure 1.5 Scope of Competitive Rivalry (Source: DBAS Strategic Plan July 2004)

1.2.4.3 Market Segmentation in 2004

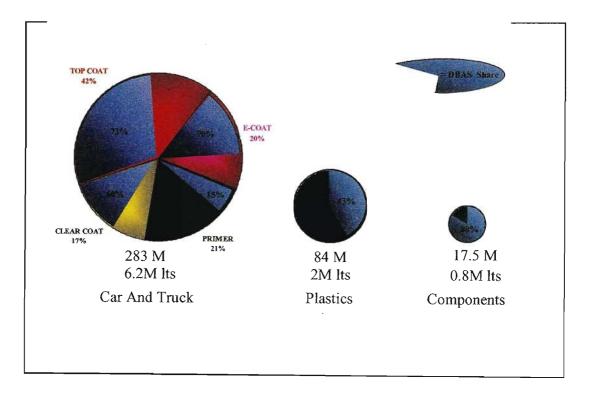


Figure 1.6 Breakdown of DBAS market share by product grouping (Source: DBAS Strategic Plan July 2004)

1.2.5 Business Process

As can be seen from the tremendous growth that DBAS has enjoyed over the past 6 years both in terms of increasing market share and profitability, processes were identified to ensure ongoing sustainability of this success. Barloworld's own philosophy of Value Based Management (VBM) was introduced into DBAS. VBM is a process whereby the company aims to double the value for its 4 stakeholders every 4 years (i.e. 2 X 4 X 4).

The four stakeholders being:

- Customers
- Employees
- Shareholders
- Suppliers

For this survey the focus would be only on the Employee part of the VBM process.

The following three major Human Resource Management (HRM) initiatives were introduced:

- INVOCOM® an employee communication methodology
- Performance Management
- Remuneration and Reward Policy

1.2.5.1 INVOCOM®

1.2.5.1.1 What is an INVOCOM®?

(INVOlvement, COMmunication) or

(COMmitment and INnovation)

is a methodology to get the best possible answer / solution to any problem through involvement of, and communication between, the relevant people who can contribute to solve that specific problem.

1.2.5.1.2 Goals of an INVOCOM®?

To share information and to improve operational performance through effective problem solving based on employee involvement and communication. Further to create a forum for teaching, coaching and education. The ultimate goal is to create a culture of commitment and ownership.

1.2.5.1.3. Ground rules for INVOCOM® application

The effective application of INVOCOM® is based on the following basic rules (which are the same rules that apply in a standard O.I.M. workshop):

- No taboo subjects
- Rational and not emotional approach
- Holistic perspective
- Systematic discussion
- Never to hurt, only to learn
- Objectivity of the facilitator

1.2.5.1.4 Purpose and benefits of the INVOCOM® method

The purpose is to mobilise available talent to get the best solution to any problem by involving the relevant people who can make a difference in solving that problem.

INVOCOMS® further contribute to excellence in problem solving and goal achievement through:

- supporting the ongoing application of understanding-based leadership
- opening up involvement and communication between different levels, different disciplines (departments) and within natural work teams
- enhances discussion, explanation, understanding and problem solving
- cutting out blockages and reduces filtering of information
- adds the personal touch
- serving as a vehicle to apply B-style management on a day to day basis throughout the organisation
- providing a vehicle for continuous improvement through problem solving at the lowest appropriate level
- increasing commitment and ownership
- speeding up development of people and can be used to evaluate competencies
- enhancing understanding-based information flow and feedback
- enhancing creativity, innovativeness, reaction time and flexibility

1.2.5.1.5 Application of the INVOCOM® method

The INVOCOM® methodology can be applied in a formal (permanent) structured way or on a task team basis (ad hoc or ongoing projects).

The focus of the permanent Structure falls on:

- Information flow and continuous improvement through the management process of goal setting, problem identification and problem solving, planning, monitoring and progress evaluation
- · Education, coaching and learning

Pre-requisites for the effective functioning of a permanent Involvement and

Communication Structures are:

- · Line Management's understanding, support, involvement and commitment
- Final structure to be designed and implemented by line management through key leader involvement
- Training of leaders and teams to effectively facilitate and utilise the structure
- Development of internal training and coaching capacity to sustain the implementation process
- The creation of a conducive organisational climate to implant the structure
- Focusing the involvement and communication within the structure on the critical success factors of the operational process and develop operational measurements to measure progress
- Regular audits to measure involvement and communication effectiveness and to recommend improvements or training where necessary

1.2.5.1.6 Generic Agenda

The agenda for INVOCOM® meetings at any level is the same except that it will differ in time and depth. The generic agenda is as follows:

- Review of the previous period
- Success and recognition
- Negative deviations and corrective plans
- Goals for next period and sharing of relevant information Obstacles that hinder goal achievement (machines, material, money, safety, people, etc.)
- Plan to overcome the identified obstacles

1.2.5.1.7 INVOCOM® RULES

The rules are very clear and are structures as follows:-

- Focusing the involvement and communication within the structure on the critical success factors of the operational process and develop operational measurements to measure progress.
- Regular audits to measure involvement and communication effectiveness and to recommend improvements or training where necessary.

1.2.5.1.8 INVOCOM® AGENDA

The agenda is also very structured and is set as follows:-

Performance Evaluation

Recognition for good performance

Identify obstacles to good performance

Within control of team – decide on action plan

Outside teams control – communicate to relevant authority

Goal Setting

Define goal/objective/target (use checklist for effective goal setting)

Identify obstacles that hinder goal achievement

Identify Obstacles

Analyse Obstacles

Planning for Specific Action

Identify obstacle action plans and decide on best

Obstacles within control: decide on action plan, including Who, Did What,

When and How, to achieve the goal

Obstacles outside control - communicate to relevant authority and ensure

feedback is given to team

1.2.5.2 Performance Management and Employee Development Policy

Whilst performance management of employees is obviously a day to day ongoing occurrence, Barloworld Plascon Automotive and its joint venture partner, Herberts Plascon, implement a formal performance management system as outlined below, utilising the forms and data base provided for this purpose.

On joining the organization each employee is given a job model/job description setting out the requirements of the job, and meets with the person to whom they report to agree on a scorecard for the ongoing monitoring of performance (daily / weekly / monthly) against the scorecard, as well as a scorecard for monitoring the employee's contribution to the company's Value Creation Incentive Scheme.

Twice a year, (i.e. once every 6 months) each employee meets formally with the person to whom they report, specifically to talk about and address performance relative to the scorecard and employee development issues.

These meetings are scheduled for April and October and address the following issues:

- Performance and achievement against the required job outputs over the previous 6 month period
- Setting and agreeing required job outputs for the next 6 month period
- Performance and achievement of their agreed Value Creation Incentive Scheme outputs over the previous 6 months period
- Setting and agreeing Value Creation Incentive Scheme outputs for the next 6 month period
- Identifying training needs in order to improve performance against the requirements of the current job and agreeing the relevant training for the next 6 month period

- Identifying possible career routing opportunities and monitoring the employee's
 development and progression on the employee's chosen career path as per an action
 plan. This includes training needs for the chosen career path and relevant training
 facilitated by the company
- Any other issues from the employee, such as:
 - expectations the employee has
 - feedback to the leader on the leader's style of management or
 - problem areas the employee is experiencing
- Any other issues from the Manager/Supervisor, such as:
 - expectations which the Manager/Supervisor has
 - complimenting the employee on overall performance or
 - feedback on the employee's progress on any aspects the manager/supervisor has previously highlighted regarding the employee's standard of performance.

1.2.5.3 Renumeration and Reward Policy

DBAS currently use the Paterson grading system as the basis for job evaluation within the Company. The relative salaries within the Division are then determined on the basis of:

- · Grade of job
- Market factors relating to a particular job category
- Annual increases, salary adjustments and ex gratia payments
- Value Creation Incentive Scheme

1.2.5.3.1 The grade of the job

Under the guidance of Barloworld Head Office, normative grade minimum salaries are determined using national remuneration surveys. DBAS use these as a guide and apply these minimum salaries for determining differential pay for acting and temporary positions up to the level of C Upper grades.

These normative grades are also used as a basis for determining vehicle benefit and tool of trade cars as applicable.

1.2.5.3.2 Market factors relating to a particular job category

DBAS continuously monitor available resources relating to salary trends to ensure employees are paid market-related salaries. The following are some of the resources used for this comparative basis:

- Newspapers
- Recruitment/ placement agency adverts/ briefs
- Information gained from discussions around competitor activities and the company's strategic approach to their practices and activities
- National salary surveys
- Group comparisons within Barloworld, where applicable

Using the above resources, wherever it is possible and practical the company identifies the range of salaries paid within the market for each job type, and in particular the median, the 25th percentile and the 75th percentile.

The following principles are then applied within the constraints of affordability, experience and performance as indicated below:

- In cases where employees are experienced, competent and performing as required (i.e. performing well) the company will endeavor to ensure they are paid at a rate of at least the market median (mid-point) for that job type.
- Where the performance is of a high standard, or where the skills are in short supply, the company may over a period of time increase the employee's remuneration to the 75th percentile, the top end of the market, or even more than the market in order to retain such excellent and / or scarce skills. This will particularly be the case in instances in which there is a significant element of specialisation by an employee beyond the normal requirements of the job function and this specialisation is of considerable value to the organisation.
- New employees with limited experience will generally be recruited at a minimum of the 25th percentile of the determined market range.
- New employees with required experience will be recruited at a rate in the region of the 50th percentile of the market range (based on the depth of experience and market availability the starting rate may be adjusted up or down as appropriate).
- Employees promoted from one grade to another, in cases where they have not yet acquired the competencies of the new position, will initially be remunerated at a rate of a minimum of the 25th percentile of the market range.
- Employees promoted from one grade to another, in cases where they are evidently fully competent to fulfill the requirements of the new position, may be remunerated at a rate in the region of the 50th percentile of the market range for the new position.
- All newly recruited or newly promoted personnel, provided they develop
 progressively to meet all the requirements of the new position, may receive
 increases over the next two to three year period, motivated by their Departmental
 Heads, to bring their remuneration up to the 50th percentile of the market range, or
 above, as and when their competency attainment and performance sufficiently
 warrants it.
- In all cases in which an employee's performance is sub-standard, annual increases will be withheld or minimized. In such cases the employee may be remunerated at a rate less than the 25th percentile of the grade.

1.2.5.3.3 Annual increases, salary adjustments and ex-gratia payments

The annual increase, which occurs in January of each year, is directly dependent on the employee's performance over the full period of the previous calendar year and is intended to maintain market alignment of salaries, given the level of performance.

In assessing performance the company uses all performance discussions which have been documented over the year, including:

- daily/ weekly/monthly feedback against the scorecards
- the formal performance discussions held in April and October
- any other formal meetings called and documented to recognize or address performance

In instances where employees performance during the past year has been unsatisfactory, and they have been counseled or disciplined appropriately (documented) they can expect to receive no increase, unless there is a clear indication of significant and sustained improvement prior to the time of the increase.

Alternatively, if deemed appropriate and motivated accordingly, unsatisfactory performers who have a clear indication of some improvement prior to the time of the annual increase may be given a small increase, but it will be significantly less than that applied for others who meet the required standards of performance.

All employees whose performance is on target and meet the required standard of performance can expect to receive the percentage increase which has been set by senior management.

In instances where an employee clearly goes beyond the call of duty or produces work of a consistently high standard, this is generally recognised and rewarded during the course of the year by means of various gestures of appreciation such as time in lieu, monetary awards, through the "Recognition for Exceptional Effort" Policy.

Where employees deliver work that is consistently above target and it is identified that their salaries should be increased relative to the market (i.e. to a higher percentile), based on the extent of the value they are adding to the company, they can expect that their salaries over time will be adjusted accordingly. These market-aligned adjustments relative to performance may take place either at the time of the annual increase or in some instances may occur as interim adjustments during the year. Employees however who are already on a high percentile and who continue to deliver work of a consistently high standard will reap the benefits of their sustained excellent performance through the company's Value Creation Incentive Scheme and the Recognition for Extra-ordinary Effort Policy.

1.2.5.3.4 Value Creation Incentive Scheme

The scheme is part of Barloworld's Value Based Management program. Its objective is to ensure all employees have optimum focus on what drives value within their business units and their specific functions.

The identification of value driving objectives, and paying an incentive bonus to encouraging employees to the attainment of those objectives, is aimed at increasing medium and long-term shareholder value and the global competitiveness of Barloworld Coatings Pty Limited in all their people, facilities, systems and processes.

The scheme is structured across three levels within DBAS to address the different line of sight responsibilities of those levels and to ensure the appropriate focus on short-term, medium-term and long-term decision-making,:

- A scheme for the administrative, operational, skilled & team leader category of employees
- A scheme for the specialist, management, professional & technical service category of employees
- A scheme for the Executive Team

This scheme will be in place for one financial year at a time. It may fall away or be amended in future years if it doesn't meet the above objectives.

The decision to have an incentive payment scheme for any particular financial year is at the discretion of the Board of Barloworld Coatings Pty Limited and its Remuneration Committee. This decision will be made annually in advance by the 30th September of each preceding year. With the exception of the Administrative, Operational, Skilled and Team Leader Categories in which the value driving objectives component will be paid out 6-monthly, all other incentive payments will only accrue on the 30th September of the year in question and will be paid out after the year-end Board Meeting when the Annual Financial Statements for the year have been approved.

In the event of employees leaving the Company before the end of the financial year the following will apply:

- In the case of employees who are transferred within the Barloworld Group or retire, that year's incentive entitlement will be divided by 12 and multiplied by the number of months completed to the transfer / retirement date. The achievement of value driving objectives will be measured on that date. The Barloworld Coatings and/or Divisional Results will be those for the year in total prorated for the number of months. Payments in this regard will also be made at the time set out in 2 above.
- In the event of employees resigning from the Company before the end of the financial year or being dismissed no incentive payment will be paid out.

In the event of a participant being promoted or transferred during the year involving a change of incentive category or division, the incentive for each of the periods of the year will be calculated on a pro rata basis. The results used for Barloworld Coatings or the Division will be those for the year in total, prorated for the number of months for each respective period. Value drivers will be set and their achievement will be measured separately for each of the periods.

It is evident from all the above initiatives that DBAS offers competitive compensation and benefits packages, invests in the development of managerial talent, promotes skill development and life-long learning efforts and encourages work / home life integration. They have many policies and programs that support each of these areas which are crucial to the long term sustainability of the success of their business.

1.3 Problem statement

As can be seen from the background study DBAS is experiencing exponential growth both in market share and profitability. To sustain this trend it is important to ensure that the staff is fully motivated and consequently productive at all times.

DBAS completed an employee satisfaction survey in 2002 and subsequently started the following processes

- INVOCOM, a communication process
- Remuneration Policy
- Performance Management

The effectiveness of these interventions is not known and it is expected that this research will give some indication on the level of motivation of both the hourly paid staff and management as a result of the introduction of these processes.

1.4 Objectives of the Research

The objective is to minimize differences and to find an appropriate motivation technique which can be adapted to suite the situation at DBAS.

Managers are concerned with the level of job satisfaction for at least the following reasons:

- There is clear evidence that dissatisfied employees skip work more often and are more likely to resign.
- Satisfaction on the job carries over to the employee's life outside the job. Job satisfaction is important for management, a satisfied work force translates into higher productivity due to fewer disruptions caused by absenteeism or good employees quitting, as well as into lower medical and life insurance costs.

Additionally, there are benefits for society in general. Satisfaction on the job carries over to the employee's off-the-job hours. So the goal of high job 'satisfaction for employees can be defended in terms of both rands and cents and social responsibility.

1.5 Motivation for the Research

The Employee Satisfaction Survey is a tool used to measure and focus on improving the overall efficiency of employees resulting in additional value for customers.

The main reasons for performing the Employee satisfaction Survey are:

- Focus on aspects within their businesses that create profitability and value for their customers
- Identify the organisation's need for improvement from the perspective of the employees
- Increase the level of employee motivation and empowerment
- · Support the strategic and operational decision making processes
- Identify strong and weak employee assets

1.6 Benefits of the Research

South African organizations are now on the brink of implementing major changes in the style of governance. There is no one - size - fits all approach to motivation.

The purpose of this internal survey of all staff at DBAS is to enable managers to keep in touch with employee feelings, views and perceptions about the company and to provide an overall measure of employee satisfaction. This is important since there is a very close link between customer and staff satisfaction

As part of a global employer, DBAS is striving to create a diverse and inclusive Company culture where their employees can maximize their potential. This helps them attract and retain talented employees and business partners.

1.7 Scope of the Research

The survey was confined to the Durban satellite operation.

The questionnaire was the same as the one used in the 2002 Employee Satisfaction Index completed in 2002. The survey consists of a series of questions covering the following

- Communication
- Compensation
- Company Reputation
- Growth Training and Development
- Job Satisfaction
- Management
- Supervisors
- Work Environment

1.8 Hypothesis

1.8.1 HYPOTHESIS ONE

The worker grade categories will show an improvement in the ESI with the introduction of the INVOCOM process.

1.8.2 HYPOTHESIS TWO

The managers will show negative trends on the ESI with the introduction of the INVOCOM process.

1.8.3 HYPOTHESIS THREE

The managers will show negative trends with regards to working environment due the high levels of stress during the survey period.

1.9 Research Design and Methodology

1.9.1 Design Strategy

It consists of a questionnaire and every employee is asked the same questions.

Results are consolidated on a company and on a department level allowing management to take necessary action to improve the employee satisfaction and motivation. Employee Satisfaction Surveys are typically conducted once a year. It allows management to have indepth understanding of employee's attitudes, opinions and beliefs. Having identified areas of improvement, you can then initiate improvement action plans.

The main steps of the Employee Satisfaction Survey are:

- Preparation- Define together what is the reason you want to perform a survey and what output is expected.
- Survey- Employees answer to the questionnaire.
- Analysis & reporting- The questionnaires are processed and the results are consolidated.
 A report is issued to the executives of the company. The results are thereafter disseminated to the entire staff of the company level and on a department level.
- Improvement plan- The highlight the major areas for improvement are highlighted and an improvement action plan is set up.
- Follow-up of the action plan
- New Employee Satisfaction Survey

1.9.2 Sampling Design

A 100% sampling plan was used where the company was divided into 10 divisions and one of the divisions was sampled fully. This survey was done with the Electro-coat Division based in Durban.

In the 2002 survey each of the divisions was split into two sets.

Set 1 included all the hourly paid workers called the skills, admin and operation staff (SAO) Set 2 included all the supervisors, managersnt professionals and technical staff (SMPT).

In the 2002 survey of the entire company where the sample size was 100%, the trend lines between SAO and the SMPT were very similar for each of the eight catergories surveyed. The SMPT line was approximately 0.5% higher that the SAO line.

The difference in the inter departmental trends were also very similar.

1.9.3 Data Analysis

The questionnaire data will be transferred onto a computer and analyzed using the SPSS statistical software package. A frequency and factor analysis was constructed to establish the extent to which the eight key factors and questioning information was useful to management. A discriminate analysis will be conducted to establish the differences in opinion SAO and SMPT groups. The results of the survey were used to aid in the interpretation of the statistical output from the questionnaire.

1.10 Limitations

This survey was completed only for one division of DBAS ie the Electro-coat division based in Durban. A full survey of the entire DBAS, as was done in the 2002 survey would have been ideal. Time constraints and the location of DBAS over a wide geographical area were limitations to a 100% survey of the entire company.

The other limitation was that the sample surveyed in 2004 was not the same as in 2002 as the number of Skill, Admin and Ops people were increased from 12 to 20 and the number of SMPT increased from 5 to 6.

1.11 Structure of the Study

Chapter One gives an introductory overview of the company and the main elements that make and factors that make up the environment under study.

Chapter Two gives a review of the literature. Issues relevant to this particular study are drawn from the literature review and commented on in respect to their possible relevance to expected findings in this study.

Chapter Three gives an overview of the investigation undertaken in the form of a questionnaire and the data collected.

Chapter Four presents the analysis, summary and results of the survey. This is presented in the form of statistical data obtained from the responses to the questionnaire.

Chapter Five concludes this research with recommendations on what needs to be done to ensure the success of the organization.

1.12 Conclusions

In concluding we have identified DBAS's company profile, their key success factors and their single competitor who is struggling whilst DBAS is enjoying exponential growth. The shareholding companies of DBAS firmly believe that the business is in an extended growth phase. This is substantiated by the growth figure.

DBAS has been the market leader for the 6th consecutive year even during tough economic conditions. It has a well-respected reputation in the market place. The application of the correct marketing mix will attract the necessary market and ensure growth in this sector. The features that are offered by DBAS will address the needs of the market as well as the pricing strategy that will be employed. The promotion and distribution will effectively reach the desired market and achieve the desired objective. The key issue is to race ahead of the competitors and remain ahead, by constantly addressing the needs of the desired market. This will be achieved by monitoring the competitors and adjusting before they react. The strategies employed will be monitored on a continuous basis to ensure that the desired outcomes are achieved. Any potential threats that could impact on the chosen strategies must be identified well in advance to make the necessary adjustments where applicable.

DBAS wants to achieve leadership and domination. This will assist in its overall leadership, as motor manufacturers are likely to remain with DBAS when they address their export programs. DBAS is confident that dominance in the market is well within its reach and will lead to further domination in the South African market.

In examining key success factors relating to skills, some of the areas that one would need to examine are, the available workforce and their expertise in the field, knowledge of quality control, their ability to develop innovative products and product improvements and the ability to take newly conceived products through to the market in the shortest possible time. There is a large pool of skilled labour available. Large numbers of staff are further trained at the DuPont facilities in Europe and Japan.

DBAS strongly believes that fully understanding the employee satisfaction matrix will be key in maintaining it's dominant role in the market place.

CHAPTER 2 - THEORY / LITERATURE SURVEY

2.1 Introduction

2.1.1 Satisfaction theories

The assumption here is that a satisfied worker is a productive worker. There is very little evidence that a satisfied worker actually works harder. However, there is strong support for the suggestion that a satisfied worker tends to stay in the same organization. There is also evidence that satisfaction correlates positively with mental health. This suggests that paying attention to conditions of work and worker morale will reduce turnover and absenteeism but will not necessarily increase individual productivity.

Under this heading can be grouped those theories that hold that people work best when they like their leader, or are satisfied with their work group. It has been suggested that where satisfaction does correlate with productivity, it may be the productivity that caused the satisfaction rather than the other way round.

2.1.2 Incentive theories

The assumption of these theories is based on the principle of reinforcement, what might crudely be called the "carrot" approach. Individuals will work harder given specific reward or encouragement for good performance. Incentive theories suggest that the individual will increase his efforts in order to obtain a desired reward. Although based on the general principle of reinforcement most of the studies in this area have concentrated on "pay" or "money" as a motivator. To some extent this concentration is justified in that money acts as a "stand in" for many other rewards such as status and independence.

2.1.3 Intrinsic Theories

Man is not an animal, say these theorists. He will work best if given a worthwhile job and allowed to get on with it. The reward will come from the satisfaction in the work itself. The assumption of the intrinsic theorists is that the higher-order needs are more prevalent in modem man than we give him credit for. In particular that an individual can gain a lot of satisfaction from the job itself, provided that it is his job, i.e. he has some degree of freedom in determining what his job is and how he will do it.

2.2 Theories of Motivation

"The term **motivation** derives from the latin word **movere** means 'to move'. In the present context motivation represents 'those psychological processes that cause the arousal, direction and persistence of voluntary actions that are goal directed.' Managers need to understand these psychological processes if they are to successfully guide employees towards accomplishing organizational objectives." (Kreitner, p.176)

At a simple level, it seems obvious that people do things, such as go to work, in order to get everything they want and to avoid anything they don't want.

Overall, the basic perspective on motivation looks something like this:

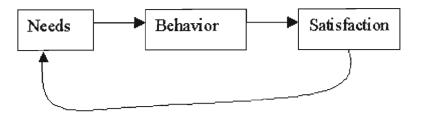


Figure 2.1 Stages in Motivation

In other words, you have certain needs or wants (these terms will be used interchangeably), and this causes you to do certain things (behavior), which satisfy those needs (satisfaction), and this can then change which needs/wants are primary (either intensifying certain ones, or allowing you to move on to other ones).

A variation on this model, particularly appropriate from an experimenter's or manager's point of view, would be to add a box labeled "reward" between "behavior" and "satisfaction". So that subjects (or employees), who have certain needs do certain things (behavior), which then get them rewards set up by the experimenter or manager (such as raises or bonuses), which satisfy the needs, and so on.

In summary,

- Motivation is different from behaviour.
- Behaviour is influenced by more than just motivation.
- Behaviour is different from performance
- Motivation is necessary but an insufficient contributor to job performance

There are two types of Motivational Theories

- Content theories focus on the importance of work itself, dealing with the specific needs that motivate and direct behavior
- Process theories_deal with the cognitive processes we use in making decisions and choices about our work

2.2.1 Content Theories

These are a set of theories

- Maslow's Hierarchy of needs Theory
- Hertzberg's Motivator hygiene (two factor) theory
- McGregor Theory
- McClelland's Achievement Motivation Theory
- Alderfer's ERG theory

Three major characteristics

- Want to assume responsibility for solving problems
- Take calculated risks and set moderate, attainable goals
- Need continuing recognition and feedback so they will know how well they are doing

2.2.1.1 Maslow Need Hierarchy Theory

Abraham Maslow carried out his investigations into human behavior between 1939 and 1943. Maslow suggested that there are five sets of goals which may be called basic needs.

These are

- Self-actualisation needs
- Esteem needs
- Belonging and Love need
- Safety needs
- Physiological need

He arranged these into a series of different levels or the order of importance of these basic needs. He postulates that needs are only motivators when they are unsatisfied. He further suggests that these needs work, roughly, in the kind of hierarchy implied by the listing above. The lower-order needs (physiological and safety) are dominant until satisfied, whereupon the higher -order needs come into operation.

Specific examples of these types are given below.

Self-actualization	Desire for self fulfillment
Esteem	Need for reputation
Love	The desire to love and be loved
Safety	Need to be safe from physical and psychological harm
physiological	Entails having enough food ,air and water to survive

Figure 2.2 Maslow's Hierarchy of Needs Theory

Source: Adapted from descriptions provided by A H Maslow, 'A Theory of Human Motivation', Psychological Review, July 1943, pp 370 -96

Man's basic needs are physiological, for example, hunger, thirst, sleep. When these are satisfied they are replaced by safety needs reflecting his desire for protection against danger or deprivation.

These in turn, when satisfied, are replaced by the need for love or belonging to, which are functions of man's gregariousness and his desire to belong to a group, to give and receive friendship and to associate happily with people.

When these needs have been satisfied, there is the esteem need, ie. The desire for self esteem and self respect, which are affected by a person's standing reputation, and his need for recognition and appreciation.

Finally, individuals have a need for self actualization or a desire for self fulfillment, which is an urge by individuals for self development, creativity and job satisfaction.

In the past, management reward systems have attempted to satisfy an individuals lower level needs for safety and physiological security, for protection against deprivation and the threat to a worker or his family. However, management reward systems are now, or should be endeavoring to satisfy the individual's higher level needs to esteem and self fulfillment.

2.2.1.2 Hertzberg- Motivation-Hygiene Theory

Frederick Hertzberg contributed to human relations and motivation two theories of motivation as follows;

- · Hygiene Theory
- Motivation

The first part of the motivation theory involves the hygiene theory and includes the job environment. The hygiene factors include

- · The company
- · Its policy and administration
- The kind of supervision which the people receive while on the job
- Working conditions
- Interpersonal relations
- · Salary status
- Security

These factors do lead to higher levels of satisfaction but without them there is dissatisfaction.

The second part of Hertzberg's motivation theory involves what people actually do on the job. The motivators are

- Achievement
- Recognition
- · Growth and development
- Interest in the job
- Responsibility

These factors result form internal generators in employees, yielding motivation rather than movement.

Both these approaches (hygiene and motivation) must be done simultaneously. Treat people as best you can so they have a minimum of dissatisfaction. Use people so they get achievement, recognition for achievement, interest, and responsibility and they can grow and advance in their work.

The working environment has an effect on individuals as follows:

- It will provide at least sufficient for his basic needs and often much more. For example, 50 years ago in the United Kingdom, food and shelter were person's basic needs. Today, most families will consider that the basic needs also include a car, television,
- It may or may not provide adequate security. Again, most individuals seek a secure
 job, there are others including some men on oil rigs, who seek high pay for a limited
 period but with limited security.
- It provides an individual with an identity. As a member of an organization, he carries out a specific function.
- It also gives the worker the comradeship, freedom from boredom, and an interest during his working life.
- It also provides self fulfillment for individual where consideration has been given to ensure that the job is creative and gives job satisfaction.
- It provides the individual with status. There is status in all jobs providing the job content is investigated to make the work more interesting.

Effects on Work Groups of Working Environment

Whilst the working environment will affect individuals, it will undoubtedly have a greater effect on working groups, since whilst an individual may have certain needs, he will not obtain those needs of the working group.

The working group is the instrument of society through which in large measure the individual acquires his attitudes opinions, goals and ideals; it is also one of the fundamental sources of discipline and social controls.

Therefore, the working environment has an effect on groups as follows:

- It will affect the morale of the group
- It will determine whether the group achieves the objective set by the organization
- · It will determine whether the degree of co-operation provided by the group
- It will motivate the group to give off their best
- It will determine whether the human relations within an organization are good or bad
- It will also affect the relations between management and the trade unions.

2.2.1.2.1 Hygiene factors.

These are factors whose absence motivates, but whose presence has no perceived effect. They are things that when you take them away, people become dissatisfied and act to get them back. A very good example is heroin to a heroin addict. Long term addicts do not shoot up to get high; they shoot up to stop being sick -- to get normal. Other examples include decent working conditions, security, pay, benefits (like health insurance), company policies, interpersonal relationships. In general, these are extrinsic items low in the Maslow/Alderfer hierarchy. Power involved a threat to reduce your well-being, causing dissatisfaction. Hence, power basically works by threatening to withhold hygiene factors. Influence was said to fundamentally be about promising improvements in well-being -- when you are influenced to do something, it is because you want to, not because you were threatened. Influence basically works by offering to provide motivators. (in Herzberg's terms).

2.2.1.2.2 Motivators.

These are factors whose presence motivates. Their absence does not cause any particular dissatisfaction, it just fails to motivate. Examples are all the things at the top of the Maslow hierarchy, and the intrinsic motivators.

So hygiene factors determine dissatisfaction, and motivators determine satisfaction. The two scales are independent, and you can be high on both.

2.2.1.3 McGregor theory

McGregor developed two theories of human behaviour at work: Theory X and Theory Y.

Theory X

- Workers are only motivated by one thing money!
- They are selfish, lazy and hate work.
- They need to be closely controlled and directed.

Theory Y

- Workers are motivated by many different factors apart from money.
- They enjoy their work.
- They will happily take on responsibility and make decisions for the business.

He did not imply that workers would be one type or the other. Rather, he saw the two theories as two extremes - with a whole spectrum of possible behaviors in between.

Theory X workers could be described as follows:

- Individuals who dislike work and avoid it where possible
- Individuals who lack ambition dislike responsibility and prefer to be led
- Individuals who desire security

The management implications for Theory X workers were that, to achieve organizational objectives, a business would need to impose a management system of coercion, control and punishment.

Theory Y workers were characterized by McGregor as:

- Consider effort at work as just like rest or play
- Ordinary people who do not dislike work. Depending on the working conditions,
 work could be considered a source of satisfaction or punishment
- Individuals who seek responsibility (if they are motivated)

The management implications for Theory X workers are that, to achieve organizational objectives, rewards of varying kinds are likely to be the most popular motivator. The challenge for management with Theory Y workers is to create a working environment (or culture) where workers can show and develop their creativity.

McGregor sees these two theories as quite separate attitudes. Theory Y is difficult to put into practice on the shop floor in large mass production operations. But it can be used initially in the managing of managers and professionals.

McGregor also sees Theory Y as conducive to participative problem solving.

It is the part of the manager's job to exercise authority, and there are cases in which this is the only method of achieving the desired results because subordinates do not agree that the ends are desirable.

However, in situations where it is possible to obtain commitment to objectives, it is better to explain the matter fully so that employees grasp the purpose of an action. They will then

exert self direction and control to do better work – quite possibly by better methods – than if they had simply been carrying out an order which they did not fully understand.

The situation in which employees can be consulted is one where the individuals are emotionally mature, and positively motivated towards their work; where the work is sufficiently responsible to allow for flexibility and where the employee can see his own position in the management hierarchy. If these conditions are present, managers will find that the participative approach to problem solving leads to much improved results compared with the alternative approach of handing out authoritarian orders.

Once management becomes persuaded that it is estimating the potential of its human resources, and accepts the knowledge given by social science researchers and displayed in theory Y assumptions, then it can invest time, money and effort in developing improved applications of the theory.

McGregor realizes that some of the theories he put forward are unrealizable in practice, but warns managers to put into operation the basic assumption that:- Staff will contribute more to the organization if they are treated as responsible and valued employees.

2.2.1.4 McClelland's Theory

- Need for Achievement -The drive to excel, to achieve in relation to a set of standards, to strive to succeed
- Need for Power The need to make others behave in a way that they would not have behaved otherwise
- Need for Affiliation The desire for friendly and close interpersonal relationships
- Need to have influence & control over others.

Achievement Motivation

Over the years behavioral scientists have observed that some people have intense need to achieve; others, perhaps the majority, do not seem to be as concerned about achievement. This phenomenon has fascinated David C. McClelland. For over twenty years he and his associates at Harvard University studied this urge to achieve.

McClelland's research led him to believe that the need for achievement is a distinct human motive that can be distinguished from other Needs. More important the achievement motive can be insolated and assessed in any group.

McClelland illustrates some of these characteristics in describing laboratory experiment Participants were asked to throw rings over a peg from any distance they chose. Most people tended to throw at random now close now far away but individuals with a high need for achievement seemed carefully to measure where they were most likely to get a sense of mastery-not too close to make the task ridiculously easy or too far away to make it impossible. They set moderately difficult but potentially achievable goals.

2.2.1.5 Alderfer's ERG theory

Alderfer classifies needs into three categories, also ordered hierarchically:

- growth needs (development of competence and realization of potential)
- relatedness needs (satisfactory relations with others)
- existence needs (physical well-being)

This is very similar to Maslow - can be seen as just collapsing into three tiers. But maybe a bit more rational. For example, in Alderfer's model, sex does not need to be in the bottom category as it is in Maslow's model, since it is not crucial to (the individual's) existence. So by moving sex, this theory does not predict that people have to have sex before they can think about going to school, like Maslow's theory does. Alderfer believed that as you start satisfying higher needs, they become more intense (e.g., the power you get the more you want power), like an addiction.

Not everyone is motivated by the same things. It depends where you are in the hierarchy.

The needs hierarchy probably mirrors the organizational hierarchy to a certain extent: top managers are more likely to motivate by self-actualization/growth needs than existence needs.

(Source: Kreitner, R., Kinicki, A., Buelens, M., Organisational behaviour, 2nd Edition. New York. McGraw Hill. Chapter Seven)

2.2.2. Process Theories

2.2.2.1 Reinforcement Theory

E.L. Thornddike's Law of Effect (Noe, Human Resource Management,3rd Edition, Page 422) states that a response followed by a reward is more likely to recur in the future. The implication for compensation management is that high employee performance followed by a monetary reward will make future high performance more likely. By the same token, high performance not followed by a reward will make it less likely in future. The theory emphasizes the importance of a person's actual experience.

Behaviors are functions of consequences that they produce and if a behavior is followed by a pleasant experience it will be repeated. In order to change behaviors the consequences must also be changed.

Types of Reinforcement

- Positive Reinforcement rewards
- Punishment Application of a negative outcome
- Negative Reinforcement- removal of negative outcomes when behaviors is performed
- Extinction-absence of reinforcement (removal of positive reinforcement)
- Drawbacks

Types of Rewards

- Satisfaction employees attitude about work situations
- Extrinsic external rewards such as money, fringe benefits, job security
- Intrinsic internal satisfaction outcomes from doing work

2.2.2.2 Expectancy Theory

The strength of a tendency to act in a certain way depends on the strength of an expectation that the act will be followed by a given outcome and on the attractiveness of that outcome to the individual.

The theory focuses on three relationships:

- Effort-performance relationship or the probability perceived by the individual that exerting a given amount of effort will lead to performance.
- Performance-reward relationship or the degree to which the individual believes that performing at a particular level will lead to the attainment of a desired outcome.

 Rewards-personal goals relationship or the degree to which organizational rewards satisfy an individual personal goals or needs and the attractiveness of those potential rewards for the individual.

Types of Alternative Pay systems

- Gainsharing: company an employees share in the profits gained from productivity savings.
- Profit Sharing: opportunity to buy corporate stock or receive bonus based on corporate profits
- Incentives: These are items listed above. Primarily tied to recognition
 Pay for skills: acquired skills become basis for pay in addition to work done.
 Employee is viewed as an asset of company

2.2.2.3 Equity Theory

Individuals try to find a balance between their inputs and outputs relative referent other. However, a referent other is not always present.

Elements of Equity Theory

• Outcome / input ratio

Inputs - what employee contributes (eg. Skills)

Outcomes – what employees receive (eg. Pay)

Comparison other

Person / people we compare ratio with

Not easily identifiable

• Equity Evaluation

Compare outcome / input rate with comparison other

Results of Inequity

Equity - I am being treated fairly

Under rewarded - Will look to increase rewards or decrease inputs to match rewards

2.2.2.4 Goal-Setting Theory

The theory that specific and difficult goals lead to higher performance. Goals tell an employee what needs to be done and how much effort will need to be expended.

Specific goals increase performance; difficult goals, when accepted, result in higher performance than do easy goals; and feedback leads to higher performance than does non-feedback. Specific hard goals produce a higher level of output than does the generalized goal. The specificity of the goal itself acts as an internal stimulus.

(Source: Kreitner, R., Kinicki, A., Buelens, M., Organisational behaviour, 2nd Edition. New York. McGraw Hill. Chapter Eight)

2.2.2.5 Management by Objectives (MBO)

The original concept came from the accounting firm of Booz, Allen and Hamiltonand was called a 'Managers Letter' (Noe, Human Resource Management, 3rd Edition, Page 292) The process consisted of having all the subordinate managers write a letter to their superiors, detailing what their performance goals were for the coming year and how they planned to achieve them.

In the MBO system, the top management team first defines the company's strategic goals for the coming year, These goals are passed on to the next layer of management, and these managers define the goals they must achieve for the company to reach its goal. This goal setting process cascades down the organization so that all the managers are setting goals that help the company achieve its goal. These goals are used as the standards by which an individual's performance is evaluated.

MBO systems have three common components

- t hey require specific, difficult, objective goals
- the goals are normally set with managers and workers participation
- managers give objective feedback throughout the rating period to monitor progress towards reaching these goals

Research on MBO has revealed two important findings regarding it's effectiveness. (McCauley, Measures of Leadership, pp 535- 545) Of 70 studies examined, 68 showed

productivity gains, while only 2 showed productivity losses, suggesting that MBO usually increases productivity.

Also productivity gains tend to be highest when there is substantial commitment to the MBO programme from top management; 56 % when commitment was high, 33% when commitment was moderate and 65 when commitment was low.

MBO can have a very positive effect on an organizations performance. Considering the process through which goals are set (involvement of staff in setting objectives), it is likely that the MBO systems effectively link individual employee performance with the organisation's strategic goals.

It is all too easy for managers to fail to outline, and agree with their employees, what it is that everyone is trying to achieve. MBO substitutes for good intentions a process that requires rather precise written description of objectives (for the period ahead) and time-lines for their monitoring and achievement. The process requires that the manager and the employee agree to what the employee will attempt to achieve in the period ahead, and (very important) that the employee accept and buy into the objectives (otherwise commitment will be lacking).

For example, whatever else a manager and employee may discuss and agree in their regular discussions, let us suppose that they feel that it will be sensible to introduce a key performance indicator to show the development of sales revenue in a part of the firm. Then the manager and the employee need to discuss what is being planned, what the time-schedule is and what the indicator might or might not be. Thereafter the two of them should liaise to ensure that the objective is being attended to and will be delivered on time.

Organisations have scarce resources and so it is incumbent on the managers to consider the level of resourcing but also to consider whether the objectives that are jointly agreed within the firm are the right ones and represent the best allocation of effort. Also, reliable Management information systems are needed to establish relevant objectives and monitor their "reach ratio" in an objective way.

2.3 Performance Management

"Performance management is a joint process that involves both the supervisor and the employee, who identify common goals, which correlate to the higher goals of the institution. This process results in the establishment of written performance expectations later used as measures for feedback and performance evaluation."

(Source: Rogers Davis, Assistant Vice Chancellor, Human Resources, University of California, San Diego From "Choosing Performance Management: a Holistic Approach," *CUPA Journal*, Summer 1995)

2.3.1 Introduction

You are involved in performance management when you:

- establish specific job assignments
- write job descriptions and assign responsibility for strategic initiatives develop and apply performance standards
- discuss job performance with the employee and provide feedback on strengths and improvements needed
- conduct an annual performance evaluation
- plan for improved performance and employee development goals.

You will learn how to work collaboratively with your employees to:

- identify and describe the employee's essential job functions in support of the mission of the organization
- identify and define strategic initiatives appropriate to the employee's essential functions which support the goals of the organization
- develop realistic and appropriate performance standards
- give and receive helpful behavioral feedback about performance
- write and deliver constructive performance evaluations
- plan education and development opportunities to sustain, improve or build on current performance.

2.3.2 Definitions

Performance Management: An ongoing communication process that involves both the performance manager and the employee in:

- identifying and describing essential job functions and relating them to the mission and goals of the organization
- · developing realistic and appropriate performance standards
- giving and receiving feedback about performance
- writing and communicating constructive performance appraisals
- planning education and development opportunities to sustain, improve or build on employee work performance.

Employee: The person whose performance is managed.

Performance Standards: Standards of performance are written statements describing how well a job should be performed.

Performance Appraisal: Performance appraisal is a process of assessing, summarizing, and developing the work performance of an employee.

Designated Supervisor: A performance manager who is officially recognized as a supervisor by the company and who is therefore not represented by a collective bargaining unit.

2.3.3 Overview of Performance Management

The evolution of the concept of *performance management* as a new Human Resource Management model reflects a change of emphasis in organizations away from command-and-control toward a facilitation model of leadership. This change has been accompanied by a recognition of the importance to the employee and the institution of relating work performance to the strategic or long-term and overarching mission of the organization as a whole. Employees' goals and objectives are derived from their department's ,which in turn support the mission and goals of the company.

The performance management process provides an opportunity for the employee and performance manager to discuss development goals and jointly create a plan for achieving those goals. Development plans should contribute to organizational goals and the

professional growth of the employee. The planning process must also involve consideration of the emerging company environment.

For performance managers, the changing environment offers many new challenges and opportunities. Performance managers and their employees are increasingly being asked to become generalists who step outside of traditional narrowly-defined job descriptions in support of team objectives and goals. These changes are resulting in the development of new approaches to human resource management.

Continuous learning is a prerequisite to successful job performance and organizational effectiveness. Employees must be able to *learn work*, developing effective technical and people skills in order to assume new responsibilities, and keep pace with and anticipate the changing nature of work and the workplace.

For performance managers and employees alike, responding to these changes requires the ability to learn, adapt to change, solve problems creatively, and communicate effectively in diverse groups. In addition, employees must take personal and proactive responsibility for their careers to ensure future employability and advancement.

The realities of the contemporary workplace will continue to challenge existing paradigms and should be considered in managing the performance of employees in a dynamic working environment.

2.3.4 Performance Management Process

The performance management process begins with analysis and description of the job. The performance manager identifies essential functions in the job description and the strategic mission and goals of the department or organizational unit. Standards of minimum acceptable performance are developed for the position with the employee. Additionally, standards for performance which exceeds expectations may be set to encourage the employee to strive for even better results.

Throughout the appraisal period (typically one year), the performance manager observes and provides behavioral feedback on the performance of the employee, focusing on helping the employee to achieve successful performance. At the end of the appraisal period, and in

collaboration with the employee, the performance manager prepares, writes, delivers and then produces a final copy of the written performance appraisal.

At any point in the process, the employee and performance manager may identify needs and create a plan for employee education, training or development in job- or career-related areas.

The issues related to performance management of teams and team members arise out of the variety of reporting relationships and degree of independent responsibility that teams exercise, as well as the need to reinforce team values and efforts without undercutting individual responsibility. Adaptations of the performance management process with teams in mind may be made which are consistent with University policy and procedures.

(Source: Rogers Davis, Assistant Vice Chancellor, Human Resources, University of California, San Diego From "Choosing Performance Management: a Holistic Approach," *CUPA Journal*, Summer 1995)

2.4 Conclusion

DBAS is a joint venture between a German and a South African company. Initially the South African management controlled this company fully. Since 2003 there has been a closer relationship with the German parent company. One of their senior managers has joined the board of DBAS and is resident in South Africa. Business decisions affecting DBAS are now beginning to be made in Germany for implementation in South Africa.

Companies that enter global markets must recognise that these markets are not simply mirror images of their home countries and may differ along a number of dimensions that influence the attractiveness of direct foreign investment in each country. These differences determine the economic viability of building an operation in a foreign location and they have a particularly strong impact on HRM in that operation.

Cultural differences can affect the communications and co-ordination processes in organizations. If a country's culture is vastly different from that of a parent organization, then the chances of conflicts, communications problems and morale problems are highly likely.

Expatriate managers must be trained to identify these cultural differences and they must be flexible enough to adapt their styles to those of the host country. This requires an extensive selection effort to identify individuals who are capable of adapting to the new environments and an extensive training program to ensure that the cultural shock is not devastating.

CHAPTER 3 - The Investigation

3.1 Introduction

The main reason for selection the Durban operation was that a full sample of one of the divisions would give a good indication of the entire company. The other reason was that since the Durban operation is away from the main plant, the survey would reveal the worst case scenario. The reasons for this being that the support structures for the implementation of the three initiatives discussed earlier will normally be slightly weaker than at the main operational centre.

The very same questionnaire that was used in the 2002 survey was reused in this evaluation. Since the Durban operation works on a three shift system there is a Shift INVOCOM® that takes place at each of the shift handovers. This INVOCOM® process was used to complete the survey. All the questionnaires were handed to the employees during the INVOCOM® meeting and confidentially was assured so that the responses could be filled as honestly as possible. This was done to avoid and fear of intimidation from the employee.

The questionnaires were divided for the Workers and Managers groupings.

The questionnaire consisted of 35 questions for the workers and 38 questions for the Managers group. The were eight catergories evaluated but each catergory had questions in random order in the questionnaire.

The categories and questions were grouped as follows

Communication	Q1	Q13	Q14	Q31				
Compensation	Q5	Q7	Q19	Q27	Q39			
Company	Q16							
Growth Training	Q24	Q33	Q34	Q40				
Job Satisfaction	Q3	Q10	Q18	Q23	Q29	Q35		
Management	Q22	Q25	Q28	Q30	Q32	Q41		
Supervision	Q4	Q8	Q9	Q12	Q15	Q17	Q21	Q26
Work Environment	Q2	Q6	Q11	Q20				

3.2 Employee Satisfaction Questionaire

TABLE 3.1 Employee Satisfaction Questionaire

1	2	3	4	5
Unsatisfactory	Barely Satisfactory	Satisfactory	Good	Very Good

COMMUNICATION	Q1 Q13 Q14 Q31	The way I am kept informed on the progress in my job is When I do a job well the recognition I receive is When changes are necessary which affect me or my job, the amount of information I receive is My understanding of how my job fits in with the company as a whole is
COMPENSATION	Q5 Q7 Q19 Q27	My salary, compared with people in other companies who have responsibilities similar to mine is As compared with other companies in this area, I would say my employee benefits are The way my our benefit programs meet my overall needs is I would say the understanding of my benefits is
COMPANY	Q16	My company's reputation in the community is
GROWTH TRAINING DEVELOPMENT	Q24 Q33 Q34	The chances of my learning and growing within my current job are The opportunity for growth and development I have in this company is The degree to which I have been trained or am being trained to perform my job is
JOB SATISFACTION	Q3 Q10 Q18 Q23 Q29 Q35	As long as I perform my job in a satisfactory manner, the job security I feel is The degree to which I feel I am on the right job is The way my job makes full use of my skills and abilities is I would rate my morale as Most of the time, I would say my work load is If a friend asked me about getting a job here, I'd say this place is
MANAGEMENT	Q22 Q25 Q28 Q30 Q32	I would say the way management treats employees is The way management communicates company goals and objectives is The confidence and respect I have in management is The way management creates and supports a safe work environment is The degree to which I feel free and unafraid to voice my opinion with management
SUPERVISION	Q4 Q8 Q9 Q12 Q15 Q17 Q21 Q26	The way my immediate supervisor deals fairly without showing favoritism is The degree to which my immediate supervisor administers rules and discipline consistently is When talking to my immediate supervisor, the freedom I feel in saying what's on my mind is My immediate supervisor's willingness to listen/assist me when I have Questions /problems is The way my immediate supervisor follows through on things is The clarity of instructions received from my immediate supervisor is My immediate supervisor's technical knowledge and ability are The way my immediate supervisor is available when needed is
WORK ENVIRONMENT	Q2 Q6 Q11 Q20	The physical working conditions in my department/area is In my opinion the morale among employees is Cooperation among employees is The tools, equipment and supplies I get to perform my job are

3.2.1 Survey of workers in 2002

TABLE 3.2 Data of Workers responses - 2002

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	1	2	_3	4	5	6	7	8	9	10	11	12
Q1	4	4	3	3	3	3	3	2	1	3	4	2
Q13	4	4	0	3	4	2	1	1	1	2	5	3
Q14	4	4	0	3	2	1	1	2	1	4	5	2
Q31	3	3	0	5	4	2	0	0	2	3	3	3
Q5	5	4	0	3	2	3	1	3	3	3	4	3
Q7	3	3	5	0	3	3	1	2	3	3	3	3
Q19	3	4	0	0	3	1	1	2	3	3	3	2
Q27	4	4	0	3	3	2	0	3	3	2	4	3
Q16	4	3	0	3	2	1	0	3	3	4	5	3
Q24	5	4	0	4	3	4	4	3	2	1	4	2
Q33	5	5	0	5	3	1	1	1	2	2	4	1
Q34	3	5	0	4	3	1	1	3	3	1	3	3
QO+												
Q3	5	5	3	4	3	1	3	3	2	3	3	4
Q10	5	5	0	3	2	1	3	2		4	4	4
Q18	3	5	0	5	4	1	1	3	2	3	4	2
Q23	5	4	3	0	4	5	3	2	3	2	4	4
Q29	3	5	0	3	2	2	4	1	2	4	3	
Q35	4	3	0	4	4	3	3	1	2	3	3	2
QUU	1 4		0		4	<u> </u>	<u> </u>				<u> </u>	
Q22	4	5		4								
Q25	3	4	0	5	4 5	2 4	1 0	1 3	1	4 4	3	2
Q28	0	3	0	4	3	5	3	1	2	3	3	5 4
Q30	5	5	0	4	4	3	3	3	2	3	3	4
Q32	5	5	0	3	3	1	1	1	1	1	4	2
QUZ											-	
Q4	3	5	0	5	3	3	0	1	2	2		2
Q4 Q8	3	4	0	5	3	1	1	1	2		4 3	4
Q9	5	4	0	5	2	1	1	1	1	2	4	2
Q12	3	5	0	5	3	3	1	2	1	4	3	2
Q15	4	5	0	5	3	1	2	2	2	3	4	3
Q17	5	4	0	5	3	1	0	1	2	2	4	1
Q21	3	5	0	5	4	1	4	3	2	3	4	3
Q26	3	4	0	5	4	4	0	4	2	3	3	3
								<u> </u>		Ť	<u> </u>	
Q2	3	4	3	3	3	1	0	3	2	2	3	4
Q6	3	4	5	3	4	4	1	4	3	3	3	3
Q11	4	4	0	3	4	5	4	4	2	4	3	2
Q20	2	4	0	4	3	3	4	4	1	2	2	2

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3.2.2 Survey of Managers in 2002

TABLE 3.3 Data of Managers responses - 2002

		_			_
	1	2	_3_	4	5
0.1	_				
Q1	4	4	3	4	1
Q13 Q14	3	3 3	2	4	1
Q14	3		2	3	1
Q31	3	4	_4	4	5
Q5 Q7 Q19	1	3	2 4 3 4	3	1
Q7	3	4 4 4	4	4 4 4	4 2 3
Q19	3	4	3	4	2
Q27	3				
Q39	3	3	4	4	1
Q16	3	4	4	4	5
Q24	3	3	4	5	2
Q33	3	3	4	4	1
Q33 Q34	3	3	4 4 4	4 4	1
Q40	1	3	4	4	1
Q3	3	4	4	4	4
Q10	3	4	4 4 4		3
Q18	3	4	4	4 4	2
Q23	3	4	3	4	3
Q29	3	4	4	4	2
Q23 Q29 Q35	4	3	3	4	1
		-			
Q22	4	3	3	4	2
Q22 Q25	3	4	4	4	2 4
Q28	3	4	4	4	3 5
Q30	3	4	4 4 4	4 4 4	5
Q32	3	3	2	4	1
Q41	2	٠3	4	3	1
Q4	3	3	4	4	1
Q8	3	3		3	2
Q9	3	3	4	3	1
Q12	3	3	4	4 4	1
Q15	3	3	4	4	4
Q17	3 3	3	4	4	2 1 1 4 2 4
Q21	3	3	2 4 4 4 4 4	4	4
Q26	3	3	4	4	4
	_				
Q2	3	4	2 2 4 4	3 4 4	3 5 2
Q6	3	3 4	2	4	5
Q11	3	4	4	4	2
Q20	3	3	4	3	4



3.2.3 Survey of Workers in 2004

TABLE 3.4 Data of Worker Responses - 2004

Q1 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 16 18 19 20 Q1 1 1 2 2 4 1 3 3 3 4 4 4 3 3 2 3 4 4 4 2 3 3 2 2 5 5 4 Q14 1 1 1 3 3 3 3 4 4 4 2 3 3 2 4 4 2 3 3 2 4 1 2 3 3 4		Ι.,			T .	T_					40	144	40	40		45	40	47	40	10	20
Q13 3 3 2 4 1 3 3 3 4 4 4 2 3 3 2 2 5 5 Q31 3 3 2 3 4 3 4 1 2 3 3 2 4 3 4 4 3 4 4 3 4 4 3 4 4 4 3 4 4 4 3 4 4 4 3 4 4 4 3 4 4 4 3 4 <td></td> <td>1</td> <td>2</td> <td>3</td> <td>4</td> <td>5</td> <td>6</td> <td>7</td> <td>8</td> <td>9</td> <td>10</td> <td>11</td> <td>12</td> <td>13</td> <td>14</td> <td>15</td> <td>16</td> <td>17</td> <td>18</td> <td>19</td> <td>20</td>		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20
Q13 3 3 2 4 1 3 3 3 4 4 4 2 3 3 2 2 5 5 Q31 1 1 1 4 3 3 2 3 4 3 4 4 2 3 3 2 4 4 2 3 3 2 4 4 2 3 3 2 4 4 2 3 3 2 4 4 2 3 3 2 4 1 2 3 3 2 4 1 2 3 3 4 4 4 3 4 4 4 4 3 4 <td></td> <td></td> <td>·</td> <td></td> <td>Ι.</td> <td>Τ.</td> <td></td> <td></td> <td>Τ_</td> <td></td> <td>I -</td> <td>Ι.</td> <td>1.</td> <td></td> <td></td> <td>l _</td> <td></td> <td></td> <td></td> <td></td> <td></td>			·		Ι.	Τ.			Τ_		I -	Ι.	1.			l _					
Q14 1 1 1 4 3 3 3 2 3 4 3 4 4 3 5 4 3 2 4 4 2 3 5 4 Q5 3 1 1 2 2 3 3 1 4 4 5 4 1 2 3 3 4 4 4 4 2 3 3 4		-	_	_	_	_	+	_	+	_			-								_
Q31 3 3 4 4 3 5 4 3 2 4 4 2 3 5 4 Q5 3 1 1 2 2 3 3 1 4 4 5 4 1 2 3 3 2 4 1 2 2 3 3 4 4 4 3 4 2 3 3 4 4 4 4 2 3 3 4 4 4 4 2 3 3 4 4 4 4 2 3 3 4	Q13	3	3	2	4	1	3	3	3	3	4_	3	4	4	2	3		2	2	5	
Q5 3 1 1 2 2 3 3 1 4 4 5 4 1 2 3 3 4 4 4 5 4 1 2 3 3 4 4 4 3 4 2 3 3 4 4 4 3 4 2 3 3 4 4 4 3 4 2 3 3 4 4 4 3 3 4 4 4 3 3 4 4 4 3 3 4 4 4 3 3 4 4 4 3 3 4 4 4 4 3 5 5 4 2 5 5 5 5 5 Q24 3 1 1 4 3 3 2 4 4 4 5 3 2 4 3 4	Q14	1	1	1	4	3	3	3	2	3	4	3	4	1	2	3	3	3	2	4	3
Q7 2 4 3 3 3 3 4	Q31	3	3	4	4	3	3	3	4	4	3	5	4	3	2	4	4	2	3	5	4
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Q35 2 1 3 3 3 3 2 4 4 3 5 3 3 3 2 4 5 2 3 4 2 2 3 5 5 4 3 5 3 5 3 5 3 4 4 4 4 5 2 5 4 3 5 3 5 3 4 4 4 5 2 3 4 3 5 5 2 3 4 3 3 3 3 4 4 4 5 2 3 4 4 5 5 2 3 4 4 5 5 2 3 4 4 5 5 2 3 4 4 4 3	Q23	3	4_	3	4	4	3	3	4_	3	4	5	4	3	3	4	4	2	3	4	3
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<u> Q2U 1 1 5 3 3 3 3 2 4 3 5 3 3 3 3 4 2 1 4 2 </u>	1 1																-		2	5	5
	Q20	1	1	5	3	3	3	3	2	4	3	5	3	3	3	3	4	2	1	4	2

3.2.4 Survey of Managers in 2004

TABLE 3.5 Data of Managers Responses- 2004

		•				
	1	2	3	4	5	6
Q1	3	3	3	4	4	4
Q13 Q14	2	4	3			4
Q14	2	3	2	4	3	4
Q31	2 3	3 3	3 2 3	4	3	4 4
ασ.	+ -			-	_	
OF	-	3	2	3	4	4
Q5	3	5	3		4	4
010	3		3	4	2	4
Q5 Q7 Q19 Q27	3 2 3 3	3	3	4	3 3 3	4
Q27	3		3	4	3	
Q39	3	3	3	2	3	4
			1			
Q16	3	4	4	4	4	4
Q24	4	4	3	4	3	4
Q33	3	3	3	4	3	4
Q33 Q34	3	3	3	4	3	4
Q40	4	3	3	3	3	4
Q3	4	4	2	4	5	4
Q10				4		_
Q18	3	3	3 3 3	3	2 4 4	4
Q23	3	3	3	4	1	4
Q29	2	3 3 3 3	3	3	4	4
Q35	3 3 2 3	4	3	4	3	4
0,00	╫					<u> </u>
000	 _			14	1	T 4 -
Q22	1	3	3	4	1	4
Q25	12	3	2	3 4	3 4 2	4
Q28 Q30	2	3	4	3	4	4
	2 2 2 3 3	3	3	3	3	4
Q32		3	3	1	_	4
Q41	3	3_	3	3	3	4
	<u> </u>	_				
Q4	2	3	3	4	3	4
Q8	3	3	3	4	4	4
Q9	3	2 4 4	3	4	3	4
Q12	4	4	3	4	4	4
Q15	2		3	4	3	4
Q17	3 4 2 3 5	3	3	4	3	4
Q21		3	3 3 3 4 2	4	3 4 3 3 3	4
Q26	4	3	2	4	4	4
Q2	1	3	3	3	3	4
Q6	2	4	3	3	2	4
Q11	4	4	3	4	2	4
						النب

Q20 1 3 3 4 1 4

3.3 Conclusion

The research attempts to distinguish the motivating factors for the Durban operation and attempts to answer the following issues under investigation:

- Behaviour and attitudes toward work expectations and personal goals.
- Organizational commitment.
- What motivates the employees?
- How do employees feel about sharing the corporate mission?
- Do employees prefer continued learning?
- What staff feels about controlling their professional agendas?
- Do employees feel that they have had an influence on decisions relating to their jobs?
- Value priority.
- Bureaucratic orientation.

All the results were collected on a spread sheet. The corresponding survey results from the previous survey (2002) were also obtained.

These spread sheets were sent to an outside person for collating using the SPSS programme.

CHAPTER 4- EVALUATION

4.1 Introduction

The chapter describes the analysis, summary and results of the employee satisfaction index survey when compared with the secondary data obtained from a similar survey completed in 2002. The data obtained and the secondary data was compiled on Microsoft Exel spreadsheet and sent to an outside consultant for analysis and summary.

4.2 Analysis of Survey

Non-parametric tests (Mann-Whitney t- test) were conducted because of the small sample size. Tables 4.1 to 4.16 provide the frequency & percentage distribution for each individual question. For example, Table 1a shows that at least 30% selected option 3 (Satisfactory) for questions 1, 13, 14 and 31

4.2.1 Analysis of Workers Responses

Table 4.1 Analysis of Workers - Communication

		0		1		2		3		4		5	
		Count	%										
2002	Q1	0	0.0	1	8.3	2	16.7	6	50.0	3	25.0	0	0.0
	Q13	1	8.3	3	25.0	2	16.7	2	16.7	3	25.0	1	8.3
	Q14	1	8.3	3	25.0	3	25.0	1	8.3	3	25.0	1	8.3
	Q31	3	25.0	0	0.0	2	16.7	5	41.7	1	8.3	1	8.3
2004	Q1			1	5.0	4	20.0	6	30.0	7	35.0	2	10.0
	Q13			1	5.0	4	20.0	9	45.0	4	20.0	2	10.0
	Q14			4	20.0	3	15.0	9	45.0	4	20.0	0	0.0
	Q31			0	0.0	2	10.0	8	40.0	8	40.0	2	10.0

Table 4.2 Analysis of Workers - Compensation

		0		1		2		3		4		5	
		Count	%	Count	%								
2002	Q5	1	8.3	1	8.3	1	8.3	6	50.0	2	16.7	1	8.3
	Q7	1	8.3	1	8.3	1	8.3	8	66.7	0	0.0	1	8.3
	Q19	2	16.7	2	16.7	2	16.7	5	41.7	1	8.3	0	0.0
	Q27	2	16.7	0	0.0	2	16.7	5	41.7	3	25.0	0	0.0
2004	Q5			5	25.0	5	25.0	5	25.0	4	20.0	1	5.0
	Q7			0	0.0	2	10.0	9	45.0	9	45.0	0	0.0
	Q19			0	0.0	4	20.0	9	45.0	6	30.0	1	5.0
	Q27			0	0.0	4	20.0	7	35.0	8	40.0	1	5.0

Table 4.3 Analysis of Workers - Company Reputation

		0		1		2		3		4		5	
		Count	%	Count	%	Count	%	Count	%	Count	%	Count	%
2002	Q16	2	16.7	1	8.3	1	8.3	5	41.7	2	16.7	1	8.3
2004	Q16			0	0.0	1	5.0	5	25.0	9	45.0	5	25.0

Table 4.4 Analysis of Workers - Growth, Training and Development

		0		1		2		3		4		5	
		Count	%	Count	%	Count	%	Count	%	Count	%	Count	%
2002	Q24	1	8.3	1	8.3	2	16.7	2	16.7	5	41.7	1	8.3
	Q33	1	8.3	4	33.3	2	16.7	1	8.3	1	8.3	3	25.0
	Q34	1	8.3	3	25.0	0	0.0	6	50.0	1	8.3	1	8.3
												_	
2004	Q24			2	10.0	4	20.0	5	25.0	5	25.0	4	20.0
	Q33			1	5.3	5	26.3	7	36.8	5	26.3	1	5.3
	Q34			1	5.0	4	20.0	4	20.0	8	40.0	3	15.0

Table 4.5 Analysis of Workers - Job Satisfaction

		0		1		2		3		4	_	5	
		Count	%	Count	%	Count	%	Count	%	Count	%	Count	%
2002	Q3	0	0.0	1	8.3	1	8.3	6	50.0	2	16.7	2	16.7
	Q10	1	8.3	1	8.3	3	25.0	2	16.7	3	25.0	2	16.7
	Q18	1	8.3	2	16.7	2	16.7	3	25.0	2	16.7	2	16.7
	Q23	1	8.3	0	0.0	2	16.7	3	25.0	4	33.3	2	16.7
	Q29	1	8.3	1	8.3	4	33.3	3	25.0	2	16.7	1	8.3
	Q35	1	8.3	1	8.3	2	16.7	5	41.7	3	25.0	0	0.0
2004	Q3			0	0.0	3	15.0	9	45.0	7	35.0	1	5.0
	Q10			2	10.0	3	15.0	8	40.0	5	25.0	2	10.0
	Q18			0	0.0	6	30.0	8	40.0	6	30.0	0	0.0
	Q23			0	0.0	1	5.0	9	45.0	9	45.0	1	5.0
	Q29			0	0.0	4	20.0	11	55.0	5	25.0	0	0.0
	Q35			1	5.0	3	15.0	10	50.0	5	25.0	1	5.0

Table 4.6 Analysis of Workers - Management

		0		1		2		3		4		5	
		Count	%										
2002	Q22	1	8.3	3	25.0	2	16.7	1	8.3	4	33.3	1	8.3
	Q25	2	16.7	0	0.0	1	8.3	3	25.0	3	25.0	3	25.0
	Q28	2	16.7	1	8.3	1	8.3	5	41.7	2	16.7	1	8.3
	Q30	1	8.3	0	0.0	1	8.3	5	41.7	3	25.0	2	16.7
	Q32	1	8.3	5	41.7	1	8.3	2	16.7	1	8.3	2	16.7
2004	Q22			1	5.0	4	20.0	8	40.0	5	25.0	2	10.0
	Q25			1	5.0	2	10.0	4	20.0	7	35.0	6	30.0
	Q28			0	0.0	1	5.0	9	45.0	7	35.0	3	15.0
	Q30			1	5.0	0	0.0	6	30.0	7	35.0	6	30.0
	Q32			0	0.0	5	25.0	7	35.0	8	40.0	0	0.0

Table 4.7 Analysis of Workers - Supervision

		0		1	-	2		3		4		5	
		Count	%										
2002	Q4	2	16.7	1	8.3	3	25.0	3	25.0	1	8.3	2	16.7
	Q8	1	8.3	3	25.0	2	16.7	3	25.0	2	16.7	1	8.3
	Q9	1	8.3	4	33.3	3	25.0	0	0.0	2	16.7	2	16.7
	Q12	1	8.3	2	16.7	2	16.7	4	33.3	1	8.3	2	16.7
	Q15	1	8.3	1	8.3	3	25.0	3	25.0	2	16.7	2	16.7
	Q17	2	16.7	3	25.0	2	16.7	1	8.3	2	16.7	2	16.7
	Q21	1	8.3	1	8.3	1	8.3	4	33.3	3	25.0	2	16.7
	Q26	2	16.7	0	0.0	1	8.3	4	33.3	4	33.3	1	8.3
2004	Q4			1	5.0	3	15.0	11	55.0	4	20.0	1	5.0
	Q8			3	15.0	2	10.0	7	35.0	8	40.0	0	0.0
	Q9			1	5.0	2	10.0	10	50.0	5	25.0	2	10.0
	Q12			1	5.0	3	15.0	6	30.0	6	30.0	4	20.0
	Q15			2	10.0	3	15.0	10	50.0	4	20.0	1	5.0
	Q17			1	5.0	3	15.0	8	40.0	5	25.0	3	15.0
	Q21			2	10.0	4	20.0	6	30.0	4	20.0	4	20.0
	Q26		_	0	0.0	3	15.0	88	40.0	9	45.0	0	0.0

Table 4.8 Analysis of Workers - Work Environment

		0		1		2		3		4	_	5	
		Count	%	Count	%	Count	%	Count	%	Count	%	Count	%
2002	Q2	1	8.3	1	8.3	2	16.7	6	50.0	2	16.7	0	0.0
	Q6	0	0.0	1	8.3	0	0.0	6	50.0	4	33.3	1	8.3
	Q11	1	8.3	0	0.0	2	16.7	2	16.7	6	50.0	1	8.3
	Q20	1	8.3	1	8.3	4	33.3	2	16.7	4	33.3	0	0.0
2004	Q2			1	5.0	5	25.0	9	45.0	5	25.0	0	0.0
	Q6			1	5.0	3	15.0	7	35.0	7	35.0	2	10.0
	Q11			1	5.0	2	10.0	6	30.0	7	35.0	4	20.0
	Q20			3	15.0	3	15.0	9	45.0	3	15.0	2	10.0

4.2.2 Analysis of Managers Responses

Table 4.9 Analysis of Managers - Communication

_		1		2		3		4		5	
		Count	%								
2002	Q1	1	20.0	0	0.0	1	20.0	3	60.0	0	0.0
	Q13	1	20.0	1	20.0	2	40.0	1	20.0	0	0.0
	Q14	1	20.0	1	20.0	3	60.0	0	0.0	0	0.0
	Q31	0	0.0	0	0.0	1	20.0	3	60.0	1	20.0
2004	Q1	0	0.0	0	0.0	3	50.0	3	50.0	0	0.0
	Q13	0	0.0	1	16.7	1	16.7	4	66.7	0	0.0
	Q14	0	0.0	2	33.3	2	33.3	2	33.3	0	0.0
	Q31	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0

Table 4.10 Analysis of Managers - Compensation

		1		2		3		4		5	
		Count	%								
2002	Q5	2	40.0	1	20.0	2	40.0	0	0.0	0	0.0
	Q7	0	0.0	0	0.0	1	20.0	4	80.0	0	0.0
	Q19	0	0.0	1	20.0	2	40.0	2	40.0	0	0.0
	Q27	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
	Q39	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
									_		
2004	Q5	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0
	Q7	0	0.0	0	0.0	2	33.3	3	50.0	1	16.7
	Q19	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q27	0	0.0	0	0.0	3	50.0	3	50.0	0	0.0
	Q39	0	0.0	1	16.7	4	66.7	1	16.7	0	0.0

Table 4.11 Analysis of Managers – Company Reputation

		1		2		3		4		5	
		Count	%	Count	%	Count	%	Count	%	Count	%
2002	Q16	0	0.0	0	0.0	1	20.0	3	60.0	1	20.0
2004	Q16	0	0.0	0	0.0	1	16.7	5	83.3		

Table 4.12 Analysis of Managers - Growth, Training and Development

		1		2		3		4		5	
		Count	%								
2002	Q24	0	0.0	1	20.0	2	40.0	1	20.0	1	20.0
	Q33	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
	Q34	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
	Q40	2	40.0	0	0.0	1	20.0	2	40.0	0	0.0
2004	Q24	0	0.0	0	0.0	2	33.3	4	66.7	0	0.0
	Q33	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0
	Q34	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0
	Q40	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0

Table 4.13 Analysis of Managers - Job Satisfaction

		1	_	2		3		4		5	
		Count	%								
2002	Q3	0	0.0	0	0.0	1	20.0	4	80.0	0	0.0
	Q10	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
	Q18	0	0.0	1	20.0	1	20.0	3	60.0	0	0.0
	Q23	0	0.0	0	0.0	3	60.0	2	40.0	0	0.0
	Q29	0	0.0	1	20.0	1	20.0	3	60.0	0	0.0
	Q35	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
2004	Q3	0	0.0	1	16.7	0	0.0	4	66.7	1	16.7
	Q10	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q18	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0
	Q23	0	0.0	0	0.0	3	50.0	3	50.0	0	0.0
	Q29	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q35	0	0.0	0	0.0	2	33.3	4	66.7	0	0.0

Table 4.14 Analysis of Managers - Management

		1		2		3	-	4		5	
		Count	%								
2002	Q22	0	0.0	1	20.0	2	40.0	2	40.0	0	0.0
	Q25	0	0.0	0	0.0	1	20.0	4	80.0	0	0.0
	Q28	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
	Q30	0	0.0	0	0.0	1	20.0	3	60.0	1	20.0
	Q32	1	20.0	1	20.0	2	40.0	1	20.0	0	0.0
	Q41	1	20.0	1	20.0	2	40.0	1	20.0	0	0.0
2004	Q22	1	16.7	1	16.7	2	33.3	2	33.3	0	0.0
	Q25	0	0.0	2	33.3	3	50.0	1	16.7	0	0.0
	Q28	0	0.0	1	16.7	2	33.3	3	50.0	0	0.0
	Q30	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q32	0	0.0	0	0.0	5	83.3	1	16.7	0	0.0
	Q41	0	0.0	0	0.0	5	83.3	1	16.7	0	0.0

Table 4.15 Analysis of Managers - Supervision

		1		2		3		4		5	
		Count	%								
2002	Q4	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
	Q8	0	0.0	2	40.0	3	60.0	0	0.0	0	0.0
	Q9	1	20.0	0	0.0	3	60.0	1	20.0	0	0.0
	Q12	1	20.0	0	0.0	2	40.0	2	40.0	0	0.0
l	Q15	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
	Q17	0	0.0	1	20.0	2	40.0	2	40.0	0	0.0
	Q21	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
	Q26	0	0.0	0	0.0	2	40.0	3	60.0	0	0.0
2004	Q4	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q8	0	0.0	0	0.0	3	50.0	3	50.0	0	0.0
	Q9	0	0.0	1	16.7	3	50.0	2	33.3	0	0.0
	Q12	0	0.0	0	0.0	1	16.7	5	83.3	0	0.0
	Q15	0	0.0	1	16.7	2	33.3	3	50.0	0	0.0
	Q17	0	0.0	0	0.0	4	66.7	2	33.3	0	0.0
	Q21	0	0.0	0	0.0	2	33.3	3	50.0	1	16.7
	Q26	0	0.0	1	16.7	1	16.7	4	66.7	0	0.0

Table 4.16 Analysis of Managers - Work Environment

		1		2		3		4		5	
		Count	%								
2002	Q2	0	0.0	1	20.0	3	60.0	1	20.0	0	0.0
1	Q6	0	0.0	1	20.0	2	40.0	1	20.0	1	20.0
	Q11	0	0.0	1	20.0	1	20.0	3	60.0	0	0.0
	Q20	0	0.0	0	0.0	3	60.0	2	40.0	0	0.0
2004	Q2	1	16.7	0	0.0	4	66.7	1	16.7	0	0.0
	Q6	0	0.0	2	33.3	2	33.3	2	33.3	0	0.0
	Q11	0	0.0	0	0.0	2	33.3	4	66.7	0	0.0
	Q20	2	33.3	0	0.0	2	33.3	2	33.3	0	0.0

4.3 Summary of Survey

Non-parametric t-tests, in particular the Mann-whitney test was conducted to compare the dimensions of company, compensation, between the categories of the independent variable. The results of the Mann-whitney test provide a report of the descriptive stats for each category. The mean is the average. The std deviation indicates the spread. Values close to zero indicate very small deviation from the mean. Then a table of test statistics follows.

4.3.1 Managers

This table gives the descriptive stats for Managers separately for 2002, 2004 and then total.

Table 4.17 Summary of Managers – 2002 vs 2004

R	an	a	rt	а

Year		Communication	Compensation	Сотрапу	Growth/Training	Job Satisfaction	Management	Supervision	Working Environment
2002	Minimum	2.0	2.2	3.0	1.3	2.5	2.7	2.4	3.0
l	Maximum	3.8	3.8	5.0	4.3	4.0	3.8	3.8	3.5
l	Mean	3.050	3.120	4.000	3.000	3.433	3.300	3.175	3.300
	Median	3.250	3.400	4.000	3.000	3.667	3.500	3.000	3.500
	Std. Deviation	.6937	.6870	.7071	1.2119	.6078	.4625	.5836	.2739
	N	5	5	5	5	5	5	5	5
2004	Minimum	2.5	2.8	3.0	3.0	3.0	2.5	3.0	2.0
	Maximum	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
	Mean	3.333	3.367	3.833	3.417	3.444	3.083	3.458	3.042
	Median	3.375	3.400	4.000	3.375	3.500	3.000	3.313	3.250
	Std. Deviation	.6258	.4274	.4082	.4082	.4037	.5349	.4378	.7813
	N	6	6	6	6	6	6	6	6
Total	Minimum	2.0	2.2	3.0	1.3	2.5	2.5	2.4	2.0
	Maximum	4.0	4.0	5.0	4.3	4.0	4.0	4.0	4.0
	Mean	3.205	3.255	3.909	3.227	3.439	3.182	3.330	3.159
	Median	3.250	3.400	4.000	3.250	3.667	3.000	3.250	3.500
	Std. Deviation	.6405	.5447	.5394	.8475	.4788	.4913	.5040	.5945
	N	11	11	11	11	11	11	11	11

a. Group = Managers

Test Statistics b,c

	Z	р
Communication	645	.519
Compensation	462	.644
Company	466	.641
Growth/Training	462	.644
Job Satisfaction	278	.781
Management	833	.405
Supervision	-1.111	.267
Working Environment	387	.699

b. Grouping Variable: Year

c. Group = Managers

4.3.2 Workers

This table shows the p values obtained when comparing the dimensions between years for the worker category. The p value >1 for each dimension indicating that there is no significant differences between the years 2003 and 2004 for the workers

Table 4.18 Summary of Workers - 2002 vs 2004

Report^a

Year		Communication	Compensation	Company	Growth/Training	Job Satisfaction	Management	Supervision	Working Environment
2002	Minimum	.8	.8	.0	.0	1.0	.0	.0	2.0
1	Maximum	4.3	3.8	5.0	4.7	4.5	4.4	5.0	4.0
l	Mean	2.542	2.542	2.583	2.667	2.903	2.767	2.635	2.938
l	Median	2.750	2.750	3.000	2.333	3.083	3.100	2.563	2.875
l	Std. Deviation	1.2053	.9643	1.5643	1.3853	.9652	1.2673	1.4287	.6495
	N	12	12	12	12	12	12	12	12
2004	Minimum	2.0	2.0	2.0	1.7	2.2	2.4	1.1	1.5
	Maximum	4.8	4.0	5.0	5.0	4.3	4.6	4.5	4.5
1	Mean	3.125	3.100	3.900	3.242	3.175	3.500	3.188	3.162
	Median	3.125	3.000	4.000	3.333	3.333	3.700	3.313	3.250
	Std. Deviation	.7716	.6304	.8522	.9904	.5393	.6505	.7838	.7402
	N	20	20	20	20	20	20	20	20
Total	Minimum	.8	.8	.0	.0	1.0	.0	.0	1.5
	Maximum	4.8	4.0	5.0	5.0	4.5	4.6	5.0	4.5
	Mean	2.906	2.891	3.406	3.026	3.073	3.225	2.980	3.078
	Median	3.000	3.000	4.000	3.000	3.167	3.400	3.063	3.125
	Std. Deviation	.9812	.8056	1.3164	1.1671	.7258	.9795	1.0837	.7055
	N	32	32	32	32	32	32	32	32

a. Group = Workers

Test Statisticsb,c

	7	
	Z	р
Communication	-1.231	.218
Compensation	-1.647	.100
Company	-2.573	.010
Growth/Training	-1.136	.256
Job Satisfaction	-1.018	.309
Management	-1.526	.127
Supervision	-1.325	.185
Working Environment	766	.444

b. Grouping Variable: Year

c. Group = Workers

4.3.3 Managers vs Workers for 2002

Table 10 shows the p values obtained when comparing the dimensions between Managers and Worker categories for 2002.

Table 4.19 Summary of Managers vs Workers - 2002

Report^a

Group		Communication	Compensation	Company	Growth/Training	Job Satisfaction	Management	Supervision	Working Environment
Managers	Minimum	2.0	2.2	3.0	1.3	2.5	2.7	2.4	3.0
	Maximum	3.8	3.8	5.0	4.3	4.0	3.8	3.8	3.5
	Mean	3.050	3.120	4.000	3.000	3.433	3.300	3.175	3.300
	Median	3.250	3.400	4.000	3.000	3.667	3.500	3.000	3.500
	Std. Deviation	.6937	.6870	.7071	1.2119	.6078	.4625	.5836	.2739
	N	5	5	5	5	5	5	5	5
Workers	Minimum	.8	.8	.0	.0	1.0	.0	.0	2.0
	Maximum	4.3	3.8	5.0	4.7	4.5	4.4	5.0	4.0
	Mean	2.542	2.542	2.583	2.667	2.903	2.767	2.635	2.938
	Median	2.750	2.750	3.000	2.333	3.083	3.100	2.563	2.875
	Std. Deviation	1.2053	.9643	1.5643	1.3853	.9652	1.2673	1.4287	.6495
	N	12	12	12	12	12	12	12	12
Total	Minimum	.8	.8	.0	.0	1.0	.0	.0	2.0
	Maximum	4.3	3.8	5.0	4.7	4.5	4.4	5.0	4.0
	Mean	2.691	2.712	3.000	2.765	3.059	2.924	2.794	3.044
	Median	3.000	2.750	3.000	2.500	3.167	3.200	3.000	3.000
	Std. Deviation	1.0844	.9116	1.5000	1.3081	.8916	1.1047	1.2460	.5812
	N	17	17	17	17	17	17	17	17

a. Year = 2002

Test Statisticsb,c

	Z	р
Communication	690	.490
Compensation	952	.341
Company	-1.967	.049
Growth/Training	371	.711
Job Satisfaction	-1.220	.222
Management	741	.459
Supervision	951	.342
Working Environment	-1.227	.220

b. Grouping Variable: Group

c. Year = 2002

4.3.4 Managers vs Workers for 2004

The following table shows the p values obtained when comparing the dimensions between Managers and Workers for 2004.

Table 4.20 Summary of Managers vs Workers - 2004

Report^a

Group		Communication	Compensation	Company	Growth/Training	Job Satisfaction	Management	Supervision	Working Environment
Managers	Minimum	2.5	2.8	3.0	3.0	3.0	2.5	3.0	2.0
	Maximum	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0
1	Mean	3.333	3.367	3.833	3.417	3.444	3.083	3.458	3.042
	Median	3.375	3.400	4.000	3.375	3.500	3.000	3.313	3.250
	Std. Deviation	.6258	.4274	.4082	.4082	.4037	.5349	.4378	.7813
	N	6	6	6	6	6	6	6	6
Workers	Minimum	2.0	2.0	2.0	1.7	2.2	2.4	1.1	1.5
	Maximum	4.8	4.0	5.0	5.0	4.3	4.6	4.5	4.5
	Mean	3.125	3.100	3.900	3.242	3.175	3.500	3.188	3.162
	Median	3.125	3.000	4.000	3.333	3.333	3.700	3.313	3.250
	Std. Deviation	.7716	.6304	.8522	.9904	.5393	.6505	.7838	.7402
	N	20	20	20	20	20	20	20	20
Total	Minimum	2.0	2.0	2.0	1.7	2.2	2.4	1.1	1.5
	Maximum	4.8	4.0	5.0	5.0	4.3	4.6	4.5	4.5
	Mean	3.173	3.162	3.885	3.282	3.237	3.404	3.250	3.135
	Median	3.250	3.125	4.000	3.333	3.333	3.367	3.313	3.250
	Std. Deviation	.7341	.5930	.7656	.8857	.5168	.6410	.7202	.7356
	N	26	26	26	26	26	26	26	26

a. Year = 2004

Test Statisticsb,c

	Z	р
Communication	767	.443
Compensation	922	.356
Company	268	.789
Growth/Training	275	.783
Job Satisfaction	-1.170	.242
Management	-1.286	.198
Supervision	795	.427
Working Environment	307	.759

b. Grouping Variable: Group

c. Year = 2004

4.4 Results of the survey

From the above Summary of the results in Tables 4.17 to 4.20 it is evident that there has been a overall improvement in the employee satisfaction index at DBAS.

4.41 Workers

The improvement in the company reputation question from 2.583 to 3.9 is very encouraging. The increase in the communication questions from 2.542 to 3.125 and the other increase in compensation . growth , training and development, management and supervision are also significant. The question relating to job satisfaction and work environment, although an improvement on 2002, did not show the same level of increase in values. Graphical representation of the workers category for 2002 and 2004 shows clearly that the 2004 survey shows improvement on all questions.

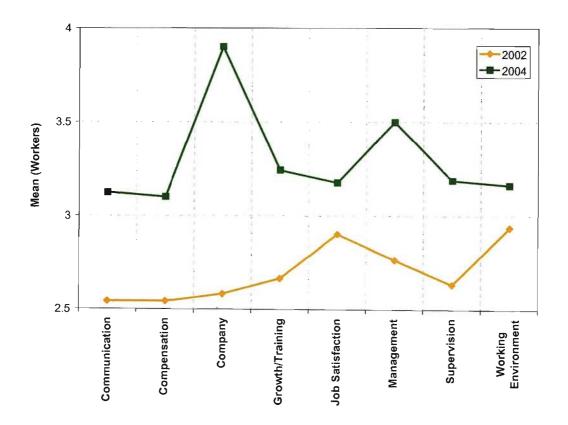
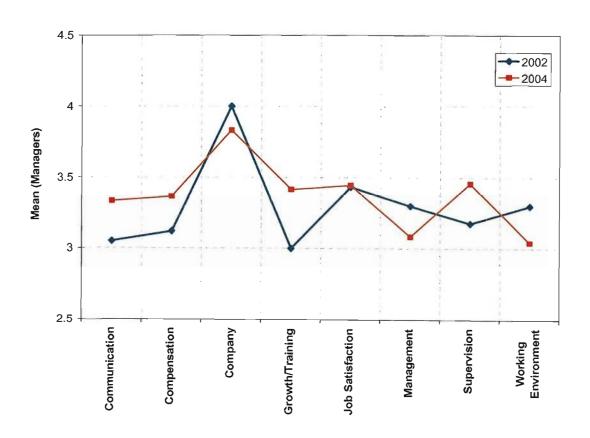


Figure 4.1 Results for Workers 2002 vs 2004

4.42 Managers

There are three areas that showed lower values. These were company reputation, management and working environment. Job satisfaction remained the same as in the 2002 survey. The other categories of communication, compensation, growth, training and development showed better values than the 2002 survey but the change was not as high as the change in the worker responses.

Graphical representation of the Managers category for 2002 and 2004 shows that the 2004 survey shows a drop in company, management and work environment.



Figire 4.2 Results of Managers - 2002 vs 2004

4.4.3 Managers / Workers Combined

The improvement in the company reputation question These trends also were evident when the Worker and Manager categories were merged.

Graphical representation of the Worker category for 2002 and 2004 shows clearly that the 2004 survey shows improvement on all question

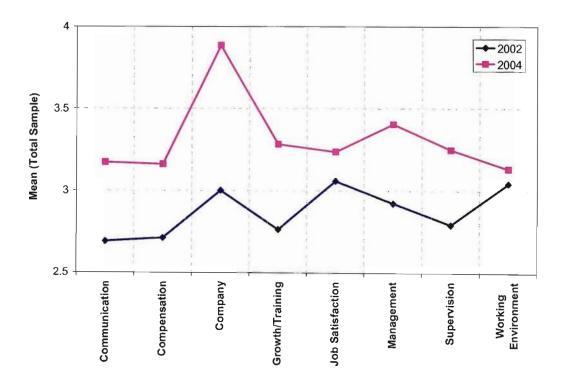


Figure 4.3 Results of Managers / Workers combined - 2002 vs 2004

4.5 Conclusions

In this Chapter the results of the survey undertaken have been described, analyzed and summarized making use of the SPSS statistical software package.

Secondary data obtained from a survey done in 2002 was used as the baseline for this comparison. The same questionnaire was used, as was used in the 2002 survey.

Starting with a survey of the Durban operation with regards to Communication, Compensation, Company Reputation, Employee Growth, Training and Development, Job Satisfaction, Management, Supervision and the Working Environment, the data obtained is transformed across a range of categories that include both the Workers and Managers.

The quantitative data is presented along with statistical test used to validate the statistical significance of the data presented. The statistical tests were performed by an outside consultant, as the writers knowledge on statistics was insufficient to interpret the data collected.

This chapter together with the secondary data from the 2002 survey and literature from Chapter 2 will form the foundation for the recommendations that follow in Chapter 5.

CHAPTER 5 – RECOMMENDATIONS

5.1 Introduction

This chapter discusses the results of the survey and to check the hypotheses from Chapter 1. Particular attention is paid to the difference in the results for the Workers and the Managers and to make recommendations on how these differences firstly could be eliminated.

From the evaluation of the survey two key concern areas are highlighted. These are Job Satisfaction and Working Environment. Specific recommendations on how these two factors can be improved must be sought.

The other area of concern is the drop in values for the Managers with regards to Company Reputation must be addressed.

5.2 Recommendations

Firstly, since this survey was conducted only on a satellite facility, the Durban Electro-coat Division, the next step must be to run the survey on the entire DBAS company. The new survey could be checked against this survey for sampling efficiency. This survey must be done within the first quarter of 2005. The reason for this urgency is the disturbing responses from the Mangers. As hypothesized in HYPOTHESIS THREE this could be from the high levels of work stress. If confirmed in the new survey then professional assistance must be sought to eliminate this.

5.2.1 Communication

As can be seen from the group of communications questions, there is an improvement on the levels of communication both for the worker and Manager category.

This, in my opinion, is due to the introduction of the INVOCOM® process. This, therefore, proves Hypothesis One. Whilst the scoring for communication has increased there is still a significant amount of effort that needs to be made. This question on the survey moved from barely satisfactory to satisfactory. The task now will be to get it to good.

Improve communication system within the work environment and find means of monitoring effectiveness.

Leaders communicating change is key for success

Communicate through your front line leadership. People like information from those they work around everyday. Immediate supervisors are generally more influential than anyone else. By going around immediate supervisors you reduce their managerial effectiveness. Coach immediate supervisors on likely questions; use handy reference cards.

• Maintain a consistent message

In stressful times, ambiguity creates massive problems therefore consistency of message themes is critical. If you need to vary the message for different audiences and times, vary the stories and examples. Don't vary the theme

• Communicate even when in doubt

People want information even if it is incomplete

People can handle probabilistic information

- People listen to and remember information they consider personally relevant
 What is relevant to management isn't always relevant to lower-level personnel
 Find what is relevant and communicate that. Learn to translate-turn corporate messages into ones that are directly relevant.
- Face-to-face communication is key

The only highly effective mode of communication is face-to-face interaction Technology doesn't help very much. Spend time, not money

Create consequences for good and poor communication

Do a transmission test-did the message get through. And let managers know the results

5.2.2 Compensation

The scoring is an improvement on the 2002 survey. Like communication, this scoring needs to be raised to a level that is good instead of satis factory. DBAS has a process for realignment of salaries to the Deloitte and Touche South African Salary Survey. DBAS is to ensure that all its workers and Managers are at or over the 50% quartile in this survey.

5.2.3 Company Reputation

This question scored the highest. It also shows from the ealier part of the study that the competitor is weak whilst DBAS is showing tremendous growth.

DBAS has a weak competitor in AECI Paints and this company should be given a chance to survive. If this company is completely removed then it will open up the market for BASF to enter. BASF being a stronger company will erode into DBAS's profitability and market share in relatively short space of time.

5.2.4 Growth, Training and Development

This question showed an improvement but still needs to be improved. Ensure continued competence of staff by regular training sessions at customer's operations and at DPC's training centers worldwide. This will also give them a greater level of self-confidence.

5.2.5 Management and Supervision

There was an overall improvement in the scoring of these two question which really could be grouped together. The response from the Managers was a negative score compared to the 2002 survey. As mentioned earlier this trend must be rechecked in the complete survey of DBAS. It was expected that the Durban Managers would be experiencing this high level of stress, hence the negative value. It is recommended that for the Durban operation, the stress levels be reduced firstly by increasing the production capacity and secondly by increasing the staffing.

5.2.6 Job Satisfaction

This area also needs attention. It scored higher that 2002 but the trend line was negative. To improve job satis faction it is recommende that DBAS implements the following - Employee Value Model.

Use the organization and employee value model. Regular assessments must be done to benchmark the progress against the business unit objectives and standards. These objectives will form part of performance assessments done by management.

5.2.6.1 Employee Value Model - Advantages

- Use the value creation model that intergrates the people and the financial aspects of the business.
- The model ensures that people value creation is recognised as a critical element.

- The model creates a common language and approach in all business units and countries.
- The model makes it easier to learn from each other and duplicate successes.
- Everything we do about people will be in line with the model and be focused on creating value for all stakeholders.
- The value of the business is determined by CFROI, growth and margin. The
 model logically translates the vision firstly into a business proposition and
 model, then structure and culture, then processes and system and finally
 value drivers.
- The model provides the framework for empowerment. It offers employees clear purpose and roles that will develop knowledge, skills and attributes in a focused way.
- It provides clear objectives that can be linked to the concept of reward for performance.

5.2.6.2 Employee Value Creation - benefits

In order to feel that they are receiving value, employees want:

- Clear purpose and direction: "I want to understand the bigger picture. I want to know where the business is going and where I fit in. This gives me stability and purpose."
- Alignment: "I don't want to be frustrated or feel that I am wasting my time when I
 do my job. I want to know my role supports the company's direction."
- Inspiring climate: "I want to be respected and treated with dignity. I want to be treated fairly and be part of a disciplined, professional outfit or team."
- Sustainable competence and intellectual capital:

5.2.7 Working Environment

As can be seen from the Workers and Managers responses, the working environment is an area of concern. The survey of the whole of DBAS needs to be completed to check if this phenomenon is only at their Durban operation. This can be explained by the tremendous growth that DBAS has had to the loss of business at the competitor. The competitor had to retrench more than 60 % of their workforce and also to bring in completely new management. This has not yet helped. Therefore it is imperative that DBAS institutes an urgent process to increase production capacity and capability at it's Durban plant.

5.3 Conclusions

As can be seen from the theme of this paper, it is imperative that the employees :-

- are fully motivated at all times
- have clear purpose and direction
- must be rewarded appropriately

The combination of these three will make the company satisfy one of the four key stakeholders, namely the employees.

As a scientist's work is to synthesise the general theory of relativity with the particle theory of quantum mechanics, so do global companies truggle to resolve the competing demands of the centripetal and centrifugal forces which combine to forge their fates and fortunes.

Modern multinationals are premised on a paradox. To grow they must standardize their operations and offerings across frontiers. To prosper they must exploit the richness and variety of cultures and viewpoints which exist in each of the territories they inhabit. These opposing imperatives of Globalization on the one hand, and Diversity on the other, are the twin Management mantras of the beginning of the 21st Century.

Managing diversity and multi cultural preparations are the two training issues that are relevant given a company's need to capitalise on a diverse workforce and global markets.

Globally, corporations have reinvented their work culture through socialisation, re-orientation, development of high performance work systems, and alignment of job analysis and job design in an effort to overcome strong resistance.

The challenges facing corporations in South Africa are diverse in nature. However the South Africans do not display a strong individualistic behaviour as their German counterparts and as such are typically more receptive to work practices that foster team work and multi-skilling

The policy of Affirmative action and encouragement of trade union activity has fostered a more open and transparent relationship in many organisations. Work place forums and accessibility to financial information of the company has further helped to overcome the high levels of mistrust that was prevalent prior to the first democratic elections in 1994.

Relative to the past there exists now a better level of understanding between the workforce and management. Nevertheless issues pertaining to lack of trust, disparity in wealth, insufficient insight into cultural differences and sporadic disregard for the mechanisms to conflict resolution could scuttle the process. On the whole, if the framework for Human Resources Management is properly followed through, flexibility due to cultural differences is provided for, and the South African employees are provided international training then many conflict situations can be avoided.

Qualified and motivated employees are a company's most important resource and worth investing in. Only on this basis can the business challenges of the future and the active adjustment to the change of the markets be dealt with successfully. Talk of the significance of human and knowledge capital becomes an empty phrase, however, if the dialogue with the employees breaks off or is not actively carried out. Well known results include motivation problems, idle potential, internal resignations, a bad work climate or increased fluctuation rates. You cannot create efficient business processes with dissatisfied or only "resignedly satisfied" employees. Employee orientation is therefore a vital company competence and requirement for sustainable identification and employee loyalty.

It is important to know the demands, desires and criticisms employees have very well, and to start a serious dialogue about development possibilities at an early stage.

REFERENCES

Ansoff, H. I. 1983. Advances in Strategic Management. New York: Harper & Row.

Cooper, D.R., Schindler, P.S. 2003. Business Research Methods. 8th ed. Boston: Mc Graw Hill.

Ford, E. M. 1992. Motivating Humans. London: Sage Publications, Inc.

Ghauri, P., Gronhaug, K. 2002. Research Methods In Business Studies. 2nd ed. London: Prentice Hall Europe.

Kotler, P. 2000. Marketing Management. 10th ed. London: Prentice Hall International.

Kreitner, R., Kinicki, A. & Buelens, M. 2002. Organizational Behaviour. 2nd ed. New York: Mc Graw Hill.

Lynch, R. 2000. Corporate Strategy. 2nd ed. Hampshire: Pitman Publishing.

Miner, B. J. 1993. Role Motivation Theories. London: Routledge.

Robbins, S.P. 1994. Organisational Behaviour Concepts, Controversies, and Applications. 6th ed. London: Prentice Hall International.

Welman, J.C., Kruger S.J. 2001. Research Methodology. 2nd ed, Cape Town: Oxford University Press.

Porter, Michael E. 1980. Competitive Strategy: Techniques for Analysing Industries and Competitors. New York: Free Press

Thompson, A Strickland, A.J.2001. Crafting and Executing Strategy, Twelfth Edition, McGraw-Hill

INVOCOM® is a trademark of OIM (Operational ImprovementManagement)

The 7 Habits of Highly Effective People by Stephen Covey. Published by Simon & Schuster, New York in 1989.

The Business of Listening by Diane Bone. Published by Crisp Publications of Los Altos, CA in 1988.

"Choosing Performance Management: A Holistic Approach," CUPA Journal, Summer 1995, v.46, no.2, pp.13 -18 by Rogers Davis, Assistant Vice Chancellor, Human Resources, UCSD.

Coaching and Counseling by Marianne Minor. Published by Crisp Publications of Los Altos, CA in 1989.

Cross-Functional Teams: Working with Allies, Enemies & Other Strangers by Glenn M. Parker. Published by Jossey-Bass Publishers of San Francisco in 1994.

The Empowered Manager by Peter Block. Published by Jossey-Bass Publishers in San Francisco in 1987.

Maximum Performance Management: How to manage and compensate people to meet world competition 2nd ed. by Joseph H. Boyett, Ph.D. et al. Published by Glenbridge Publishing Ltd. of Lakewood, Colorado in 1993.

Measurement of Work Performance: Methods, Theory and Application by Frank J. Landy and James L. Farr. Published by Academic Press of New York in 1983.

C.D. McCauley and M.M. Lombardo, "Benchmarks :An Instrument for Diagnosing Managerial Strengths and Weakness" in Measures and Leadership:pp535-545

Internet articles

http://www.google.com

http://www.accel-team.com

http://www.businessball.com

http://www.projectalevel

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