Evaluation of Strategic Change at Dow Agrochemicals (KwaZulu Natal)

By

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TO WHOM IT MAY CONCERN

RE: CONFIDENTIALITY CLAUSE

Due to strategic importance of this research it would be appreciated if the contents remain confidential and not be circulated for a period of FIVE years.

Sincerely
P. Chetty

[Signature]
DECLARATION

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

Signed...........................................

Date...........................................

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Dedicated to Vennila, Jadene Carmen and Kiara Jenilee.
ABSTRACT

Every organization has to undergo change at some time or another. To achieve successful change, the management of the organization have to follow a well-structured and organized process. This change process poses a challenge to management to ensure that all its complexities are effectively handled.

In light of this, the dissertation on hand is an evaluation of the change process at Dow Agrochemicals (KwaZulu Natal) and the impact it has on the organization's strategic objectives. The method chosen for this study was exploratory using a case study and an extensive literature survey. The technique used for this exploration was qualitative. The strategies and techniques for effective change management have been explored through the literature survey, and the information for the case study was obtained from interviews, questionnaires, documentation and observation. The empirical survey has been compared to the literature survey to evaluate the change process in the organization.

Although there were pitfalls in the change process, it was found that the overall management of the change process was done well.

Recommendations are presented which are intended to improve the change initiative in order to survive in a competitive environment. Lastly, the areas for future research on this subject have been outlined.
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CHAPTER ONE: INTRODUCTION

1.1 Introduction

Dow Agrochemicals (KwaZulu Natal), a major producer of insecticides and herbicides was formed in 1983. A leading multinational company acquired it in December 1997. The multinational company undertook this acquisition because it foresaw great potential in this subsidiary to compete in the global market and create value to the shareholders [Dow Agrochemicals (KwaZulu Natal) Strategy Presentations and Communication Session Minutes].

In order to align Dow Agrochemicals (KwaZulu Natal) with the parent multinational, it had to implement the parent's advanced technology and work processes. This resulted in the plants being modified in 1999 to get the safety to parent company's standard and training provided to all employees to get them up to speed with parent company's standard and work processes. But this wasn't adequate for the employees to adapt to the change in environment [Dow Agrochemicals (KwaZulu Natal) Strategy Presentations and Communication Session Minutes].

This led to Dow Agrochemicals (KwaZulu Natal) embarking on the change process in 2001, the intention being to align Dow Agrochemicals (KwaZulu Natal) with the rest of the parent company and to achieve its strategic objectives.

The framework that will be used in this study will be that of evaluation of the change process against a recommended change model as outlined by Balogun (1999). This is necessary to determine whether the change process is effectively implemented.

The value of this study is to enable Dow Agrochemicals (KwaZulu Natal) to take corrective action for any flaws during the change process and for making any necessary adjustments to ensure that the change initiatives are effective. It is envisioned that by evaluating the change process and taking the necessary
corrective actions this would have a positive impact on the company’s journey to achieving its strategic objectives.

1.2 Background
Dow Agrochemicals (KwaZulu Natal) is a subsidiary of a leading multinational chemical company, which is responsible for the manufacture of agricultural chemicals. Dow Agrochemicals (KwaZulu Natal) was founded in 1983. It was later acquired by a leading national chemical in 1992 and then acquired by the multinational company in December 1997 and named Dow Agrochemicals (KwaZulu Natal).

Belonging to one of the leading chemical manufacturers in the world Dow Agrochemicals (KwaZulu Natal) had to align itself to compete amongst the global leaders in Agrochemicals Market. In order to achieve this it had to adopt Parent company’s modern technology, very high safety and quality standards and Parent company’s work processes. But this was not adequate. Dow Agrochemicals (KwaZulu Natal) also had to undergo Organizational Change in order to become a global player and survive in the long run. It is not the strongest of the species that survives nor the most intelligent but rather the most responsive to change” (Charles Darwin).

It was in 2001 when Dow Agrochemicals (KwaZulu Natal) started its ‘change’ journey.

1.2.1 What is change management?
According to Robbins and De Cenzo (1998), change management entails redefining the organizational strategy, mission, and objectives and determines the future success or failure of the organization. External changes in the environment necessitate internal changes for the organization to survive and gain a competitive advantage over competition. It is not enough to survive but more important to retain the competitive advantage. The internal changes may be reactionary to the internal environmental changes or be proactive in setting the scene in anticipation
of changes in the external environment. However, stakeholders will always resist changes. The resistance comes from the fear of the unknown, fear that they will lose something of value and the natural tendency to stay within the comfort zone. Hence any changes to the status quo must be approached with caution.

1.2.2 Then nature of organizational change

As per Balogun (1999:3), organizational change has three main components i.e.

- **Change context** – which is the ‘why’ of change. The change context consists of:
  - **Outer context** – This refers to the political, economic, social and competitive environment in which the organization operates.
  - **Inner context** – This refers to the culture, structure and capabilities of the organization, and also includes the political context.

- **Change content** – which is the ‘what’ of change. This refers to, for example, choices that need to be made about an organizations product range, the markets in which it competes and how it should be structured. Any of these may need to change because of changes in the organizations context.

- **Change process** – which is the ‘how’ of change i.e. the things done to deliver change.

According to Balogun (1999:4), although in an organization many things can change e.g. products and technology, organizational change refers to the change in people in that organization i.e. the change in the way they behave. People have minds of their own and can decide to react in any way that suits them. Managing change and achieving change in individuals is therefore a challenging undertaking for any manager.

In addition, (Balogun, 1999:4) states that because change involves people and people react in different and sometimes unpredictable ways, change is more than the development of a plan. A failure to appreciate this can lead to two fatal flaws
within many change plans that are otherwise very impressive in their detail and scheduling i.e.

- The assumption that employee reactions to the plans can be controlled, and
- No provision within the plan for managing the process of change

When considering change in an organization it is prudent to place special emphasis on its culture.

1.2.3 Dealing with organizational culture

Hesselbein (1999) says that in times of great change, organizational culture gets special attention. But changing the culture of an organization requires a transformation of the organization itself -- its purpose, its focus on customers and results. Culture does not change because we desire to change it. Culture changes when the organization is transformed; the culture reflects the realities of people working together every day.

1.2.4 Managing the change process and barriers to change

Nichols (2000) says that a very useful framework for thinking about the change process is problem solving. Managing change is seen as a matter of moving from one state to another, specifically, from the problem state to the solved state.

According to Ambrosini (1998), the change process must be managed correctly. Change that is implemented too slowly or too quickly can damage the organization. The correct speed for change should be determined based on the culture of the organization and the size of the step change required. Ambrosini (1998) further adds that there are many barriers to change, including:

- Defending the status quo: ‘Our business is different’
- Lack of credible team: delegated or inadequate resources
- ‘Culture’ change only. No focus on results
- Changing business priorities and unclear objectives
1.2.5 Change implementation

According to Carnall (1986), before embarking on change, management must identify changes that should be implemented and how these changes should be implemented successfully. Once management has defined the scope and the parameters of changes, it must communicate the intended changes to the stakeholders. Communication ensures stakeholder involvement, participation and buy-in. It changes the attitudes towards change and contributes to a shared vision for the future of the organization.

1.2.6 Managing transition

Balogun (1999:209) characterizes the transition as an emergent process full of surprises, with unpredictable and uncertain outcomes. Words like ‘frustrating’, ‘chaotic’ and ‘difficult’ are often used by managers to describe their experiences.

Managers can drop interventions in at the top of the organization, but the resulting outcomes, in terms of the changes in behaviours and attitudes it produces, can be surprising and disappointing. Outcomes achieved are not always as intended. Change is about managing individual expectations and interpretations, not just structures and systems. Change agents need to work to align the interpretations of individuals with their change vision, by the use of not just verbal and written communication, but also the necessary levers and mechanisms of the change process.

1.2.7 Leading change: Why transformation efforts fail

Kotter (1996) has developed two general lessons regarding leading change:

1. The change process takes a long time and must go through a series of phases. Skipping steps only creates an illusion of speed, never lasting results.

2. Critical mistakes in any of the phases can have devastating effects.

Kotter (1996) identifies eight steps to achieving lasting change:
1. Establish a great enough sense of urgency (The case for change)
   - Over 50% of companies he has seen fail in step one
   - Leaders underestimate the amount of energy to do this phase
   - Leadership and top executives are the key to this; it cannot be delegated to staff
   - Bad results (pain) are often a blessing; leaders will manufacture crises if needed

2. Create a powerful guiding coalition: if not powerful enough, initial successes will be stymied by resisting forces

3. Create a Vision, that can be explained in 3-5 minutes and get people excited: often this takes between 3-12 months to develop by the guiding coalition

4. Over communicate the Vision:
   - Use every opportunity and vehicle possible to communicate the vision
   - It is very difficult to do this if there are job losses; successful visions include new opportunities and a commitment to treat those laid off well.

5. Remove obstacles to the New Vision: this includes anything from structure to the reward system, including resisting managers and leaders.

6. Systematically plan for and create short-term wins: people, especially those you are accountable to, want to see some tangible wins in the first 12-24 months. Short term wins build momentum with those below the guiding coalition and buys time with those above or the board of directors.

7. Avoid declaring victory too soon, often resistors will cooperate with change agents until it seems safe to return to their old behaviours and ways of doing business.

8. Anchor the changes in the corporate culture and develop the next generation of top management, who will "walk the talk."

From this literature review it can be seen that implementing change effectively is a rather complex process.
1.3 Motivation

Dow Agrochemicals (KwaZulu Natal), in striving to gain competitive advantage globally has embarked on the change process. This change process can be seen as problem solving. Managing change is seen as a matter of moving from one state to another, specifically, from the problem state to the solved state. Diagnosis or problem analysis is generally acknowledged as essential. Goals are set and achieved at various levels and in various areas or functions. Ends and means are discussed and related to one another. Careful planning is accompanied by efforts to obtain buy-in, support, and commitment. The net effect is a transition from one state to another, in a planned, orderly fashion.

According to Kotter (1996), changing a culture, structures and processes is risky and can even produce negative results, which are proved by many studies. Two third of major change initiatives are not successful. Change has therefore carefully to be planned and the change process has to be managed and overviewed. This will ensure that the outcome of the change initiative is positive.

In order to ascertain whether this change initiative is positive at Dow Agrochemicals (KwaZulu Natal) it would be worthwhile to evaluate the change process at Dow Agrochemicals (KwaZulu Natal) and the impact it has on the company's strategic objectives.

1.4 Value

The value of this study is to enable Dow Agrochemicals (KwaZulu Natal) to take corrective action for any flaws during the change process and for making any necessary adjustments to ensure that the change initiatives are effective. It is envisioned that by evaluating the change process and taking the necessary corrective actions this would have a positive impact on the company's journey to achieving its strategic objectives.
On achieving its strategic objectives Dow Agrochemicals (KwaZulu Natal) will be more profitable and gain competitive advantage and will facilitate the accomplishment of its:

- **Vision**: A global competitive organization that relies on continuous learning and leveraging to satisfy the needs of its stakeholders.

- **Mission**: To provide leadership in the development of an empowered organization enhancing the individual and team performance

- **Objectives**:
  
  Safety – 2005 target for Canelands < 1 Recordable Incident per year compared to 8 in 2000

  Quality and Service – 2005 target must be
  - produce in spec product first time every time
  - deliver to customer on time every time
  - supply without customer complaint every time

  Cost – 2005 target must be
  - Reduce planned unit production cost by 20%
  - Produce at or below planned cost
  - 2005 target - < 5% unplanned downtime compared to 30-40%

1.5 Problem statement

Achieving successful change in any organization is very difficult and often fails. The change process at Dow Agrochemicals (KwaZulu Natal) will be evaluated to determine whether it is appropriate (suitable and acceptable) for the organization, taking into account the nature of the organization.

Problem statement reads as follows:
Is strategic change at Dow Agrochemicals (KwaZulu Natal) successfully being achieved and what impact does the change have on attaining the company’s strategic objectives?

1.6 Objectives
The objectives are:

- Evaluation of the change process at Dow Agrochemicals (KwaZulu Natal).

- The impact of the change process on attaining the company’s strategic objectives. Some of the company’s strategic objectives are:

  Safety – 2005 target for Canelands < 1 Recordable Incident per year compared to 8 in 2000

  Quality and Service – 2005 target must be
  - produce in spec product first time every time
  - deliver to customer on time every time
  - supply without customer complaint every time

  Cost – 2005 target must be
  - Reduce planned unit production cost by 20%
  - Produce at or below planned cost
  - 2005 target - < 5% unplanned downtime compared to 30-40%

In so doing it is hoped to discover any flaws in the change process so that appropriate recommendations can be made to management.

1.7 Research methodology
This study utilized qualitative research where the case study method was used to conduct research on Dow Agrochemicals (KwaZulu Natal) approach to change management. Information was gathered using the following:
Interviewing (conversational) – will be conducted on a one to one basis with managers. Interview questions are in Appendix 2.

Questionnaires – will be sent to employees via e-mail. The questionnaire is in Appendix 1.

Participant observation – will be conducted to perceive first hand what participants in the setting experience.

Data collation – Data will be collated in the areas of safety, quality and service, production and cost. This will be available from the company’s monthly, quarterly and annual reports. This will be secondary data.

1.8 Limitations

The following limitations will be placed on this study:

- The study will be limited to Dow Agrochemicals (KwaZulu Natal) on KwaZulu Natal’s North Coast and will not focus on the other sites in Southern Africa.
- The study will be limited to the years 2001 to 2004.
- The divulging of information and data may be limited to those that are not sensitive to the company.

1.9 Structure of the research

The dissertation consists, besides the introduction, of six additional chapters:

- Chapter two - contains a literature review that will deal with various concepts in the research areas of Organizational Change Management and the company’s strategic objectives. The theories/models on Organizational Change management will be discussed. One of these models will be used for the study.

- Chapter three - This chapter gives an overview on the methodology and techniques that were used to research the dissertation topic. The method chosen for this study is exploratory using a case study. The technique used for this exploration is qualitative, using both primary research (fieldwork) and secondary research.
Chapter four - A detailed review of the case study is provided here. This includes the history of the organization, what products/services it provides, the operations, the company situation before change, the company's strategic objectives and the change process.

Chapter five - This chapter presents the results on the feedback received from the interviews and questionnaires, and also from observation. The chapter will be categorized into the main factors considered in the change process.

Chapter six - The results obtained through qualitative research are presented and described here. An evaluation of the information in chapter four against the "model" chosen in chapter two will be carried out. An indication of what the company has done "well" and what they are "not" doing in order to be a successful company is presented here.

Chapter seven - A summary of the main findings and principle features of the dissertation is provided. Moreover, recommendations will be made to the company for the way forward, and recommendations for future research are given.

1.10 Summary
This chapter provides an introduction for the dissertation that evaluates strategic change at Dow Agrochemicals (KwaZulu Natal) and the impact it has on attaining the company's strategic objectives. Due to the fact that many change processes in organizations fail, the intent is to check that the implementation of the change process is effective, and to take the necessary steps to correct any deviations where possible thereby adding value and ensuring that the process is in line with the company's strategic objectives. In addition this chapter also outlines the methodology, limitations and the structure of the dissertation.
CHAPTER 2: LITERATURE REVIEW

2.1 Introduction

The literature review is divided into the various sections pertaining to the change process.

2.2 Meaning of change management

As defined by Whitley (1995:34), change is the negotiation or renegotiation of shared meaning about what is to be valued, believed in and aimed for. Hiatt (2003) also defined change management as the process, tools and techniques to manage the people side of business outcome and to realize that business changes effectively within the social infrastructure of the workplace. In an organizational context, change consists of the renewal of parts of the whole organizational culture, structure, processes and relationships with the outside environment. Managing change, as stated by Felkins (1993:5) is a continuous process of group learning, negotiation and coordination to increase competence, reduce conflict, align resources and reach organizational objectives for quality, productivity and service within a responsive and effective system.

Robbins and De Cenzo (1998) state that change management entails redefining the organizational strategy, mission, and objectives and determines the future success or failure of the organization. External changes in the environment necessitate internal changes for the organization to survive and gain a competitive advantage over competition. It is not enough to survive but more important to retain the competitive advantage.

According to Feldman (2002:1), change management is simply the art of managing change rather than allow it to manage the organization. Without good change management an organization will be in trouble. The changes will very likely need reversing on a regular basis, and the organization will experience downtime and unreliable operations.
2.3 The need for change

Chang (1997:17) states that the first step in managing a successful change is to clarify the need for change i.e. to discover all the answers you can provide to the question “why change?” If your only answer to that question is “because upper management said so,” you need to re-examine the issue.

According to Simpson (1995), an analysis of the current situation is the point of departure for any change that is being planned or contemplated. It is important that senior management is very clear on the present status of the organization. It is therefore a useful exercise for management to review the purpose of their organizations existence to ensure currency and validity before any change is undertaken.

Keuning (1998:350) refers to this step as “breaking the quasi-balance”, i.e. the need for change. The quasi-balance is broken when the impulse has such intensity that it cannot be ignored. Now the first phase of a conscious and planned change process starts up, namely, the experience of the impulses and the consideration of what has to be done next since it has become obvious that change has to start taking place.

In light of the above the analysis of the current situation at Dow Agrochemicals (KwaZulu Natal) will be undertaken to determine the need for change.

2.4 Types of change

There are different types of change. The types of change are outlined as follows:

2.4.1 Planned/proactive change

Planned change reflects a proactive planning mode. It is designed and implemented in an orderly and timely fashion in anticipation of future events. It is often used when change in the organization is to be extensive and lengthy. As such, it requires a greater commitment of time and resources as well as additional
expertise in formulating and implementing the change (Smit and Cronje, 1992:238).

Stewart (1996:21) suggests that in planned change we must be able to measure and/or observe the difference between a present, future or past state. Therefore, planned change concerns factors that are measurable or observable, without which planned organization change is inconceivable. The kinds of factors at the organizational level that we are interested in are therefore things such as size, performance, structure, policies, procedures, culture and management style. Some of these are easier to observe or measure than others, for example size and performance, as opposed to culture, and management style. However, if we are to deal seriously with managing organizational change we must know what the present state is, what we want it to be, how progress will be monitored, and how we will know when change has been achieved.

Planned change is always preferable to unplanned change. Planned change can also be very effective when only modest change in organizational activities is required. The key to effective planned change is that managers must be able to anticipate the type of change that will be necessary. If an organization experiences difficulties, it will often be obliged to make profound changes, even though it may not wish to. Similarly, some of the forces for change such as technological innovation necessitate profound reactions.

2.4.2 Unplanned/reactive change

Pendlebury et al., (1998:12) refer to unplanned change as superficial change. According to them, superficial changes, which play an essential role in business, must never be regarded as secondary changes or changes of lesser importance. These changes might affect any aspect of the business - strategy, structure, culture, and management style and usually concern systems that are the perfect solution for businesses which need to develop continuously in order to respond to a fluid environment.
In addition, increasing globalization of markets exposes businesses to more and more frequent competition. In this respect, Pendlebury et al., (1998:12) adds that a business which is not a clear leader in its market must continually respond to its competitors' assaults by developing its products, improving its logistics, reducing delivery times or revising prices. This is a characteristic of the profit making business environment. Although only superficial but requiring great effort to achieve, these changes must be accommodated since they are essential for the survival of the organization.

Siegal et al., (1996) states that rapid change is a pervasive part of our lives as human beings. Therefore it is not surprising that change is a fact of life within human systems as well. Recent developments in the global economy have catapulted this fact to the forefront of management concerns too well.

2.4.3 Incremental/evolutionary change

Incremental or evolutionary change consists of an ongoing process of moderate but linked steps, none of which is particularly significant in itself, but which taken together, result in sufficient adaptation to changed business conditions or modifications to strategy to enable the organization to remain effective (Sadler, 1996:55).

The starting point of such an approach usually involves a combination of satisfaction with past success and a realization that the world is changing and that only by a continuous process of change in organizations can future success be assured. This process is thus seen as one which has no time limits so it will go on as long as the organization exists but, provided nothing happens to create a big sense of crisis, it need never be traumatic.

According to Roach and Bednar (1997:672) long periods of small incremental change are often interrupted by brief periods of discontinuous, radical change. Organizations are more inertial and adaptable as they evolve through stages of
convergence, in which only incremental change takes place than reorientation, during which fundamental change occurs.

2.4.4 Transformational/radical change

Sadler (1996:56) states that transformational or radical change, by contrast, is extremely traumatic. It is seen as necessary either in response to a severe crisis in the organization's affairs or a fundamental change in purpose or strategy and involves challenging all the assumptions underlying existing organization arrangements. It results in changes so profound that after the event the organization is scarcely recognizable compared with its previous condition.

Sadler (1996:57) continues by mentioning that such a transformation takes years to work through - at least three and perhaps as many as seven and cannot take place without significant and painful changes in organizational culture. It is, however, limited in time. Once the transformation is complete the organization can either revert to a process of continuous incremental change or, exhausted by the turmoil of radical change, it may sink into a period of inertia and stagnation which in the end will necessitate a further bout of transformation.

Newman (1998) in turn points out that top management plays a critical role in radical organizational change. Radical change cannot occur without the organization's having sufficient understanding of the new conceptual destination, its having the skills and competencies required to function in that new destination, and its having the ability to manage how to get to that destination.

According to theories of organizational change, new top management facilitates radical change, especially if new managers are from outside the firm (Romanelli and Tushman, 1994). Top managers generally are more exposed to and aware of changes in their business environment than existing employees. Such new managers may therefore perceive the need for change more readily and may perceive opportunities and threats in the environment differently from old
managers and thus bring new competencies and mind sets to bear (Ancona, 1996).

The above theory with regards to the types of change would thus be appropriate to determine the type of change that is undertaken by Dow Agrochemicals (KwaZulu Natal).

2.5 The change context
Balogun (1999:56) states that successful change, by its very nature, depends heavily on context and circumstances. The change context features that must be considered are outlined below:

2.5.1 Time
Time is to do with how long an organization has to achieve change. Is the organization in crisis or is it concerned with long-term strategic development? Time can also be affected by stakeholder attitudes, such as, are stakeholders like the stockmarket expecting short-term results from change. How much time an organization has to deliver change should have been determined by the strategic analysis.

2.5.2 Scope
Scope is the required outcome of the change, varying from realignment through to more radical change aimed at transformation of an organization. Scope is also affected by whether the whole organization needs to change, or just one division or department of it. There are two aspects to scope – the dept of the change required in an organization and the physical spread of change across the organization. The scope is one of the key determinants of just how much change is necessary, the type of change and also impacts on the design choices.

2.5.3 Preservation
Preservation is the extent to which it is essential to maintain continuity in certain practices or preserve specific assets, either because they constitute invaluable
resources, or they contribute towards a valued stability or identity within an organization. A key criterion for a change agent to consider is the extent to which there is a need to preserve the status quo within an organization. It is important that all resources that contribute to an organization’s competitive advantage are retained during the change process, but it is particularly important that the change process does not lead to the loss of the resources that are unique and difficult to imitate e.g. the know-how or tacit knowledge of particular staff.

2.5.4 Diversity
Diversity is to do with the degree of diversity that exists among the staff group(s) affected by change. Change may affect groups or divisions with different subcultures, different national cultures. Staff may also differ in the way they identify with the organization – through their team, job, department, division or the whole organization. Professional groups may identify more with their profession than their employing organization. Having identified the levels of diversity or uniformity within an organization, the change agent may consider addressing these as part of the change process.

2.5.5 Capability
Capability assesses how good the organization is at managing change. Aspects that require consideration include the location of change expertise within the organization, how much change the organization and its staff have experienced in the past, and the degree of expertise for handling change at an individual, managerial or departmental level. It is important to question whether an organization possesses the necessary skills and abilities to manage change before embarking on change design and implementation. Also an organization may possess the ability to manage change incrementally or an ability to manage big-bang change.

2.5.6 Capacity
Capacity considers how much resource the organization can invest in the proposed change both in terms of cash and staff, and how much time managers
have to devote to change. It is necessary to consider what key resources are limited in any specific change scenario. These can, in part, be assessed through the use of a resource audit.

2.5.7 Readiness
Readiness for change is to do with how aware staff is of the need for change and how willing and motivated they are towards the change. Readiness is also to do with how much support there is generally for the change, and how much understanding there is of the scope of change needed. Staff can be aware at a rational level of the need for change but be unprepared at an emotional level to embrace change at a personal level.

2.5.8 Power
Power examines where power is vested within an organization. It is to do with the identification of the major stakeholders (within and outside the organization) and individuals or departments which hold power in the organization. Other issues include whose support must be canvassed and how much self-discretion the change unit possesses. Power, or lack of it, can influence the choice of change path taken. Where a business division may badly need transformational change, they can be prevented from embarking upon such a route because other more powerful divisions, or the group's centre, block their actions. Equally a powerful parent can be a strong facilitator of change.

Having outlined the change context features, it can be seen that these features need to be assessed and thereby used to judge what change approach to take.

2.6 Designing the transition: The implementation path
At the heart of change management lays the change problem, that is, some future state to be realized, some current state to be left behind, and some structured, organized process for getting from the one to the other. To arrive at the future state some sort of vision or strategic intent of the desired future organizational state must be developed upfront.
2.6.1 Defining the change vision

According to Balogun (1999:137) a vision is usually a qualitative expression of the desired future state. There are various descriptions of what constitutes a good vision, but generally three aspects are mentioned. A vision encapsulates what the organization is trying to achieve; a rationale for the changes to be undertaken; and a picture of what the future organization will 'look like', which incorporates something about the values of the new organization and what is expected of employees. In addition, visions need to appeal to the majority of an organization's stakeholders, and comprise realistic and attainable goals.

The change vision may thus be regarded as the initial vision that both prompts and justifies change. This vision will therefore continue to guide and act as a reference point throughout the change process. It is not concerned with the details of the process, which will be dealt with in due course, but touches on every aspect of change: its causes, the ultimate objective and the broad outline of the action to be taken (Pendlebury et al., 1998:42).

Along with an explanation of the reasons for change, it is important that management articulate a vision for the future. A picture of what the company will look like in the post-change period will help employees to better understand the purpose of the inevitable disruption to their working lives and to minimize resistance (Simpson, 1995).

Defining the change vision is a force to reckon with when engaging in the process of change. Vision provides direction and focus for the activities necessary to accomplish the change and should always be regarded as the reference point throughout the process as it clarifies the objective of change and shows what the organization will ultimately look like.

Thus the above theoretical views will be applied when evaluating the vision definition of Dow Agrochemicals (KwaZulu Natal).
2.6.2 Barriers to change

Balogun (1999:140) says that once the future state of the organization is understood it is possible to diagnose the barriers to change. The major barriers to change are resistance and organizational culture.

2.6.2.1 Resistance to change

With the introduction of new organizational values, employees' resistance will obviously occur. But in the absence of effective change management such resistance can cripple the change process of the organization. As stated by Open University (T205 case file-4.2000: 170), the major reasons that lead to resistance against change include the following:

- Change can create anxiety around crucial areas such as job security.
- Change often upsets familiar surroundings and patterns of relationships that the employees feel comfortable about.
- In practical terms, change may result in all sorts of unforeseen complications that the employees may have to deal with.
- Change may demand skills, which the employees do not have.

Robbins (2001: 545-548) state that at individual level the resistance is driven by habit, security, economic factors, fear of the unknown and selective information processing: and at organizational/group level the resistance is driven by structural inertia (disinterest), limited focus of change, group inertia, threat to expertise, threat to established power relationships and threat to established resources allocation. In this regard Simpson (1995) adds that management must be totally honest in its assessment of how a proposed change will affect all members of the workforce.

2.6.2.2 Organizational culture

According to Balogun (1999:140) existing organizational cultures provide some of the strongest barriers to the implementation of change. Also Smit and Cronje (1992:247) state that allied to the role of a positive leadership style as a catalyst in
the change process is the need to work on ensuring that the organization’s culture is compatible with the proposed change as well. Organizational culture reflects group norms, beliefs, values, and informal activities all of which impact on the micro-environment of the organization in one way or another.

In this regard, Simpson (1995) adds that it is also useful for management to undertake an assessment of the probable success of planned change efforts. The results of a well-designed survey or diagnostic tool can provide management with unfiltered information about their organization’s culture, characteristics and staff attitudes. These elements are directly related to the receptivity and ability of the organization to implement change successfully. The information gathered will pinpoint obstacles to planned change and thus allow management to adapt their implementation strategy to avoid or minimize the impact of these barriers.

In addition to maintaining the focus people need to accomplish change initiatives while change leaders should constantly strive to keep their people motivated. This begins with understanding that change is accomplished a step at a time. Without frequent recognition of small gains and accomplishments, individuals and teams can get discouraged and lose their motivation. They need a sense that progress is being made and a feeling that their efforts are appreciated (Antrim, 1998:107).

According to Andrews (1994), management must maintain high expectations when facilitating change. They must not let periods of rapid change lower their expectations. The bar of excellence must be kept high. He adds that management must believe in their associates and expect them to achieve greatness and be specific when they explain the standards they expect their associates to adhere to. No room for confusion regarding what good performance looks like, must be left. Management must reconnect people to the organization and get everyone involved.
2.6.3 Designing the transition state: the organizational level

Once the design of the future state has been completed, and it is known what barriers to change have to be overcome, it is then necessary to design an implementation path to deliver the future state. This involves thinking which levers and mechanisms to deploy and in what order. The consideration of barriers to change should have led to some decisions about old structures, systems and ways of behaving that need to be dismantled or discouraged, and the levers and mechanisms that can be deployed to achieve this and facilitate change.

To provide more shape to the way the identified levers and mechanisms should be sequenced, and what additional levers and mechanisms may be needed, Balogun (1999:144) subdivides the transition state itself into three other phases i.e. unfreeze, move and sustain. Each of these are outlined by Balogun (1999:144) as follows:

- **Unfreezing** – is about making people within an organization ready for change by making them aware of the need for change and dissatisfied with the existing ways of working. It is about creating the readiness for change from senior managers downwards as already discussed in the change context features in this chapter.

- **Moving** – is the implementation of the needed changes through the selected range of levers and mechanisms.

- **Sustaining** – involves embedding the changes throughout the organization to ensure members do not relapse into old patterns of behaviour.

These phases embody the need to instil the new behaviours and attitudes throughout the organization and signal the end to major change, whilst avoiding the implication that there will be no more change and that the organization will become static.

Thus an evaluation of the transition design at Dow Agrochemicals (KwaZulu Natal) would determine whether the phases are in keeping with the above theory or not.
2.6.4 Facilitating personal transitions: the individual level

As per Balogun (1999:153) organizations only change if the individuals within that organization change. Strategic change has to be driven down throughout the organization. Change management is viewed as something that is 'done' to people. Employees of the organization are treated as passive onlookers who will comply with the directives and objectives issued from the top.

Therefore, to achieve change, a change agent needs to understand how individuals change. Change leaders also need to recognize that they have two parallel tasks to manage: first, leading the organization through change, and second, leading the individual organizational members through the change (Figure 2.1). This is why change capability (already mentioned in this chapter) is so important because part of change capability is having to lead staff through change. Individual transition is a psychological process that research shows all individuals go through. Individuals will experience feelings of loss and come to terms with life afterwards. This takes time, although varying degrees of time for different individuals.

<table>
<thead>
<tr>
<th>Organizational path</th>
<th>Individual path</th>
</tr>
</thead>
<tbody>
<tr>
<td>unfreeze</td>
<td>letting go of past</td>
</tr>
<tr>
<td>move</td>
<td>adapting to change</td>
</tr>
<tr>
<td>sustain</td>
<td>moving forward</td>
</tr>
</tbody>
</table>

**Figure 2.1:** Dual leadership responsibilities – managing the organizational and individual change paths [Balogun (1999:153)].

According to Balogun (1999:153) two concepts can be used to explain how individuals pass through change – the change equation and the transition curve.
2.6.4.1 The change equation

The change equation, shown in Figure 2.2, states that there are three components that need to be present for individuals to be prepared to undertake change:

- The individual needs to feel that the problems and pain that change will cause are outweighed by the need to change.
- There needs to be dissatisfaction with the existing status quo.
- The proposed changes have to be seen as a viable way of resolving current problems, and the proposed features have to be seen to be achievable.

\[ C = (A + B + D) > x \]

Where:

- \( C = \text{Change} \)
- \( A = \text{Level of dissatisfaction with status quo} \)
- \( B = \text{Desirability of proposed change} \)
- \( D = \text{Practicality (risk of disruption) of change} \)
- \( X = \text{Personal cost of change} \)

Figure 2.2: The change equation
(Source: Adapted from R. Beckhard and R.T. Harris, Organizational Transitions: Managing Complex Change, 2nd edn, 1987, Addison Wesley).

The 'cost' is more to do with the individual emotional pain and effort associated with change. It is acknowledged that change, be it personal or organizational, can be a painful and difficult process for everyone. This equation is particularly helpful when considering unfreezing. Unfreezing individuals is about getting individuals to recognize that change is necessary, and that they have to let go of the past, but also that the proposed changes are desirable in the sense that they will solve the problems the organization is facing, and that they are achievable.
2.6.4.2 The transition curve

According to Balogun (1999:159), the transition curve shows the process individuals go through during the change, and is depicted in Figure 2.3. The transition curve suggests that individuals undergoing change pass through seven stages. The concept of the transition curve can be combined with the ‘unfreeze’, ‘move’ and ‘sustain’ model as shown in Figure 3, to help remind designers of what change interventions in these phases are trying to achieve for the individual recipients.

**Figure 2.3: The transition curve**
Thus an evaluation of the transition design at Dow Agrochemicals (KwaZulu Natal) would determine whether the phases are in keeping with the above theory (unfreeze, move and sustain) or not.

2.7 Designing the transition: levers and mechanisms

2.7.1 Communication during change

One of the biggest barriers to change is internal resistance caused by uncertainty and inadequate information. If employees do not understand what is happening resistance can be expected (Simpson, 1995).

Communication is an essential ingredient in managing change. Effective change leaders need to understand the many different means by which they are communicating with their staff, so that they can be conscious of what they may be communicating both intentionally and unintentionally, but also so that they can utilize the different communication mechanisms to help get their messages across.

According to Balogun (1999:176) the types of communication needed during a transition can be mapped against the unfreeze, move and sustain model mentioned earlier in this chapter:

- In the early days of change, communication should be timed to achieve a readiness for change as part of unfreezing.
- As change progresses towards the move phase, the communication should start to focus more on giving individuals the information and support they need to undertake the changes being asked of them, and also on reducing the uncertainty and ambiguity individuals will be experiencing as they attempt to understand ‘what does this all mean to me?’
- Update information on the progress of change and what is to happen next is required throughout the change process, but more so as the momentum of change picks up.

An important proviso to remember is that the planned communication will never be enough.
It is important to understand the various groups affected by the proposed change in order to customize and determine the communication method. Newsletters, focus groups, bulletin boards, intranet pages and lunch-time seminars are all effective ways of communicating to different groups in an organization. Managers should know how information flows through the organization and which communication methods will be most effective (Coulter, 1998:11). Since everyone needs to know the facts and how the planned change will affect one, an active, thorough and on-going communication plan is essential to dispel rumours and to minimize uncertainty. A comprehensive communication plan should include matters such as:

- responsibilities of individuals to effect change
- means to be used to disseminate information
- frequency and methods of status reports
- what methods of communication will be used for each audience, i.e. senior management, middle management, employees, clients, and suppliers (Simpson, 1995).

The most important elements are communicating a clear vision of the change and to keep all employees fully informed of any progress. This is critical because any gaps in the communication process will be filled by the employees through the grapevine. In examining connection between poor communication, widespread uncertainty and the prevalence of rumours, DiFonzo and Bordia (1998) state that rampant rumours are associated with unsuccessful change communication efforts which have such a large impact on culture, climate and timing that organizations need to recognize the importance of grapevine information and to monitor it. Organizational rumours create stress, thus lowering productivity because employees may feel powerless and confused about how their jobs will be modified, and perhaps, worst of all, valuable people, anticipating that they might be downsized, begin a job search.
In addition, management fulfils a moral obligation by providing adequate explanations and articulating clearly the reasons for its actions. Providing explanations to employees in a sensitive and complete manner proves to call for a positive perception of the intended change.

2.7.2 Managing resistance
Heller (1998:38) holds that change will always meet with some resistance. Management can, however, to a large extent pre-empt resistance by anticipating and understanding people’s reservations, taking steps to accommodate some objections in their plan, and gather evidence to counter others. To make change less painful, management must try to see change from the employees’ points of view and anticipate their fears.

Resistance to changes follows some definable patterns. One typical reaction is denial, which protects the individual from having to deal with the change. If the change will not occur, there is no need to deal with it. Passive resistance, another common reaction, often takes the form of anxiety and subtle efforts to slow the pace of change. An individual exhibiting passive resistance will agree on the surface with the need to change, but be unsupportive of it behind the scenes. Active resistance, on the other hand, can show itself as open disagreement with the proposed change. In these cases, people actively lobby against the project and encourage others to do the same (Hirschfield, 1999).

Folger and Skarlicki (1999) refer to active resistance as resentment-based resistance. This involves reactions by disgruntled employees regarding the perceived unfairness of the intended changes. When employees experience external change, they frequently feel as though it has been “done to them”. Resentment-based resistance behaviours, which can range from subtle acts of non-cooperation to industrial sabotage are often seen by the perpetrators as subjectively justifiable - a way to “get even” for perceived mistreatment and a way for employees to exercise their power to restore perceived injustice.
Resistance can undermine the implementation of a system if it is not properly countered with responses that acknowledge and validate the feelings that drive it. By adopting proactive change management strategies throughout the various stages of a project, managers can implement change, reducing resistance to it while simultaneously promoting communication and involvement at the same time (Hirschfield, 1999).

Employee resistance can be a significant deterrent to effective organizational change (Cummings and Worley, 1997) because the latter can generate scepticism and resistance in employees, making it sometimes difficult or even impossible to implement organizational improvements. It is thus important to bear in mind that the way in which people are treated and how the change is implemented can have considerable influence on employees' resistance to change (Folger and Skarlicki, 1999).

Before change is implemented, managers involved must first explain to employees what is going to happen. It is important to explain in advance that changes may be radical and painful at times since knowing about changes in advance can help a person prepare, thus lessening the shock. Management must also recognize that many people will find a way to resist change and must prepare themselves for this challenge as well.

2.7.2.1 Overcoming resistance to change

Robbins (2001: 548-549) has suggested the following tools that can be applied to overcome the resistance to organizational change:

- Education and communication – continuous training and coaching need to be provided to the employees and the managers, and communicating the intention of the change process using different occasions has to be applied to change their attitudes.

- Participation - it is to encourage employees participate in every step of the change.
• Facilitation and support – the major role that can be played on leading the change process is merely facilitation and providing support for the intended and unintended problems that would happen.
• Negotiation – there has to be negotiations and compromise with the managers and employees to develop an optimal system that changes the organization while satisfying the employees.
• Manipulation and cooptation – modifications and manipulations has to be made on some changes that are found to be premature and conflicting.
• Coercion/Compulsion – compulsion (force) can be applied using disciplinary rules for some sensitive and unreasonable resistances.

2.7.3 Human resource management systems
Balogun (1999:196) says, human resource management (HRM) policies and processes are one influence on individual and group behaviours within an organization. They can be used both to move the organization through change and also to reinforce and sustain the newly formed organization once the change is over. The main components of a human resource system include recruitment and selection, appraisal, reward and development.

Furthermore Clarke (1994:40) states that understanding people, both as a source of inertia and a source of leverage for change, means understanding what your organization has and needs in the way of skills-mix. The people resource you need to achieve your strategy for change can unfortunately not be put in place overnight. Whatever management does - retraining, declaring redundant, re-skilling or recruitment, will take time, and therefore needs to be built into the change process at an early stage.

2.7.4 Culture change
Clarke (1994:41) views organizational culture as an important point to consider when implementing change. In the business of making change, corporate culture is a two-edged sword. Culture is the organizational equivalent of the fingerprint, the unique identification of every business in terms of its history, assumptions, values,
and behaviours. Without a good understanding of the traditions which underlie a particular business it is all too easy to propose changes which go completely against the grain and will therefore be rejected by the body of the organization. On the other hand a large number of organizations are quite consciously using culture change as a positive weapon for change. A strong culture can be regarded as the internal branding, which stamps the same value on the staff as the organization promotes in its public relations to the external marketplace.

Building a culture that is appropriate to a dynamic and changing marketplace is one of the new challenges facing an organization. In organizations that have a strong culture, “the way we do things around here”, is clearly articulated, passionately communicated and understood by even the newest recruit. Organizations are being transformed out of all recognition. Part of this transformation lies in trying to realign internal behaviours with external requirements.

2.7.5 Training and development

Change may involve staff acquiring new skills, new knowledge, new working practices, or new behaviours, attitudes or values. Development and training is the mechanism used to help achieve this. Training seeks a specific outcome in terms of skills or behaviours. Development may include experiential learning, which can encompass outdoor development courses, or it can be classroom based. Education is even broader in its aim, seeking to open a delegate’s or student’s mind to new ways of thinking. The key to success is to choose the right delivery channel for the type of change design chosen, and the level of people who are the recipients of the learning process. Senior management react less well to training and better to education, whereas staff requiring new skills need training (Balogun, 1999:203).

There are many mechanisms for delivering development and training i.e. off-site interventions, general management programmes, in-house training and in-house
2.7.6 Structure as a lever for change

According to Clarke (1994:32), structure is much more than an organization chart. Organization charts indicate the formal reporting relationships, but they do not show how things actually work, who is influential, where the power lies or how the politics can be used to make change happen.

Thornhill et al., (2000:32) view organizational structure as one of the human resources domains. It affects the way in which people at work are organized and their work co-ordinated, the nature of the relationships they develop, their feelings about these aspects and the way in which they carry out their work. Thornhill et al (2000:36) add that organizational structure may either act to facilitate or inhibit the fulfillment of the goals of the organization.

Structure is the most important and powerful influence there is within the organization. If the question of structure is not dealt with, management will not be able to change the organization fundamentally. With an understanding of the structural principles management can redesign their organizations so that change will finally succeed. Where an organization's structure proves to be deficient, this may act to impair the intended outcomes of change as well as the overall goals of the organization.

Drucker (1996:202) holds that a relationship exists between organizational structure and the ability of an organization to produce results and to grow - structure follows strategy and growth demands the right structure. He continues by saying that the right structure does not guarantee results, but the wrong structure aborts results and smothers even the best-directed efforts. Above all, structure has to be such that it highlights the results that are truly meaningful, i.e. the results that are relevant to the idea of the business, its excellence, its priorities and its opportunities.
Having discussed the theory with regards to ‘levers and mechanisms’ during the ‘designing the transition’ phase, the evaluation of communication during change, resistance management, human resource management systems, culture change, training and development, and structure at Dow Agrochemicals (KwaZulu Natal) will be undertaken against this theory.

2.8 Managing the transition: monitoring and resourcing

Balogun (1999:209) characterizes the transition as an emergent process full of surprises, with unpredictable and uncertain outcomes. Words like ‘frustrating’, ‘chaotic’ and ‘difficult’ are often used by managers to describe their experiences.

Managers can drop interventions in at the top of the organization, but the resulting outcomes, in terms of the changes in behaviours and attitudes it produces, can be surprising and disappointing. Outcomes achieved are not always as intended. Change is about managing individual expectations and interpretations, not just structures and systems. Change agents need to work to align the interpretations of individuals with their change vision, by the use of not just verbal and written communication, but also the levers and mechanisms already discussed in this chapter.

The nature of the implementation process also has implications for its management, one of which is that some type of specific transition management is needed to resolve problems as they arise, and keep the change process on track. It also involves recognizing that the very nature of change, and the way individuals react to change, makes misinterpretations and unexpected outcomes not only likely to happen, but very probable. It is therefore necessary to attempt to monitor change progress from the recipients’ perspective.

The following are key to effective transition management:

- Monitoring progress
- Change agency
2.8.1 Monitoring progress

According to Balogun (1999:213), transition management is about ensuring that what is planned happens, but also about detecting and managing the unexpected. However, monitoring progress is about responding to people issues and understanding how recipients of change are reacting. This requires communication with people.

Various techniques can be used to monitor and evaluate the progress of implementation, such as focus groups and workshops, management by walking about and open door policies, team briefing, question and answer sessions, and staff suggestion schemes.

Context-sensitivity is an issue for monitoring mechanisms. To be open about the way they are feeling, and what they see as the obstructions to change, those on the receiving end of the changes may initially need to be afforded some degree of anonymity before they will speak openly. For people to give feedback there also needs to be visible action on feedback, or staff will feel their managers are not seriously interested in their opinions, so why bother.

2.8.2 Change agency

Balogun (1999:216) states that change agents play an important role in achieving effective transition management. Their skills include the ability to analyse the change context, to judge the key contextual features of the change context and therefore design an appropriate change approach, to take action to achieve implementation, to handle complexity, to be sensitive about the impact of change, and to be aware of the potential impact of one's own preferences on the design choices made. Change agents also require good influencing skills because of the political nature of their role. However, change implementation is a complicated and
difficult task. Transition management once change gets underway involves coordination of all the planned activities, but also the management and resolution of any unexpected problems.

Whoever is leading the change process may also take responsibility for transition management. However, the more fundamental the transition, the more time-consuming transition management is as a task. Therefore, the bigger and more complex the change, the more likely it is that a transition management team will be needed to support the main change agent(s). The sole responsibility of this team must be transition management. This team of additional change agents will need to be a powerful group and, therefore, either accepted by the organizational power structure or given backing by the chief executive for what they do.

The individuals within the transition management team will also need to be well trained. They will need to:

- Understand the business
- Understand and buy-in to change vision and goals
- Understand the mechanisms, tools and techniques of change management
- Have good people skills, be sensitive to people issues, and be well respected within the organization

2.8.3 Middle managers

As stated in Balogun (1999:218), middle managers were traditionally viewed as change implementers i.e. the people in the organization responsible for taking the change plan and making it happen by translating it into actions. Middle managers tasks were more to do with monitoring and control. Middle managers were also often characterized as resistant to change, providing powerful obstructions to changes that counter their own self-interests.

However, most managers fulfil a complex and demanding role in change. They have to:
• Undertake personal changes themselves.
• Implement the needed changes in their departments or teams.
• Help and lead their staff through personal change.
• Keep the business going.

Thus, for much of the time managers are simultaneously change recipients and change implementers. They fulfil a role more accurately described by the term 'change relayers' since they are responsible for absorbing change and passing it on. In effect, each manager of a team has to be a change agent in her or his own right. Managers’ need verbal communication skills, team building skills, coaching and counselling skills, and negotiating skills.

The traditional role often given to middle managers, one primarily to do with putting new working practices in place, is expanded by the need to spend an extensive amount of time furthering both their own understanding of change and that of their staff. If the demands of the ‘relayer’ role on managers are not recognized by the designers of the change process, the outcome will be that this unanticipated role places an overhead on the time of middle managers when they themselves are having to undergo a lot of change. This can lead to a lack of time for important, although less tangible, change-related activities such as communication with staff, team building, counselling and coaching.

2.8.4 Recipients

Change recipients are those individuals on the receiving end of change, those that must adopt and adapt to change. The issues about recipients and change, and how managers need to help both their staff and themselves through the transition curve, have been discussed earlier in this chapter.

Having discussed the theory with regards to 'managing the transition' phase, the evaluation of change implementation and monitoring progress at Dow Agrochemicals (KwaZulu Natal) will be undertaken against this theory.
2.9 Summary

The literature begins with a background on the meaning of change management. Different authors portray change management in different ways. For the purpose of this study management of change means the managing of alterations of activities in an organization with the aim to facilitate and guarantee the success of change efforts, and the intended business benefits for an organization in transition.

The need for change then follows. Chang (1997:17) states that the first step in managing a successful change is to clarify the need for change i.e. to discover all the answers you can provide to the question “why change?” As outlined in the literature there are many reasons why organizations want to change.

Depending on the reasons for change, the change context and the urgency for change, an organization can choose the type of change it wants to adopt. The different types of change are planned (proactive), unplanned (reactive), evolutionary (incremental) and transformational (radical). Each of these is discussed in the literature.

Balogun (1999:56) states that successful change, by its very nature, depends heavily on context and circumstances. The change context features that must be considered upfront are time, scope, preservation, diversity, capability, capacity, readiness for change and power. A brief discussion of each of these is done in the literature.

Thereafter, the design of the implementation is outlined, which includes defining the vision, barriers to change, designing the transition state at the organizational level and facilitating personal transitions. Each of these is discussed in some detail, together with views from different authors.

Also crucial is the different levers and mechanisms that must be considered when designing the transition. These are communication during change, managing resistance and politics, human resource management systems, culture change,
training and development, and organizational structure. These are also discussed in detail, together with the views from different authors.

Managing the transition is also key to a successful change programme. The important aspects in effective transition management are monitoring progress, and role management by the change agency, middle managers and change recipients. The literature provides a discussion on each of these.

Chapter three follows with the research methodology.
CHAPTER 3: RESEARCH METHODOLOGY

3.1 Introduction
This chapter gives an overview on the methodology and techniques that were used to research the dissertation topic. Both, primary research and secondary research have been carried out to achieve the aims of the dissertation.

3.2 Research design
This study utilized qualitative research where the case study method was used to conduct research on Dow Agrochemicals' (KwaZulu Natal) approach to change management. The Dow Agrochemicals (KwaZulu Natal) site was used as a unit of study.

3.3 Sampling
The sample frame consisted of the 234 employees at the Dow Agrochemicals (KwaZulu Natal) site. The sample size was 20 employees, consisting of production operators, maintenance technicians, laboratory technicians and logistics personnel. The sample type was non-probability sampling and the sampling method was purposive sampling. From the two major types of purposive sampling i.e. judgement and quota sampling, the one chosen for this research study was judgement sampling. According to Cooper and Schindler (2003: 201) judgement sampling occurs when a researcher selects sample members to conform to some criteria. In this case personnel selected where those that have been undergoing the change process. This included senior managers, middle managers and employees. White (2000:65) states that in judgemental sampling the researcher picks up the sample they think will deliver the best information in order to satisfy the research objectives in question.

3.4 Qualitative design
To evaluate the change management process at Dow Agrochemicals (KwaZulu Natal) it was crucial to augment the knowledge on the:
- company situation before change
- planning, designing and implementation activities of the change process,
- desired change outcomes
- company's strategic objectives

To achieve this, an exploratory study was conducted using the case study method.

The case study highlights the parent company's required standards, the company situation before and after change with respect to the required standards, and the change process undertaken. Information was collated from the various stakeholders thereby highlighting the benefits and limitations introduced by the change implementation.

3.4.1 Sources of information

3.4.1.1 Documentation
Information for the parent company's required standards were obtained from the company intranet. The balance of the information in the case study was gathered from the company profile, past company records, departmental reports, meetings and presentations. The presentations were done by the change steering team and each of the vision element teams at the beginning of the change initiative and thereafter on an ongoing basis as the change process unfolded.

3.4.1.2 Interviews
Interviews (conversational) were conducted on a one to one basis with senior and middle managers. The interviews were semi-structured, consisting of open-ended questions, and questions that required short precise answers. The interview questions are shown in Appendix 2. Although a set pattern of questions was followed the interview took on a conversation style. The aim was to probe the respondents' opinions on certain issues pertaining to each of the constructs of change and change management.
3.4.1.3 Questionnaires
A survey of employees' perceptions on the subject of change within Dow Agrochemicals (KwaZulu Natal) was considered a practical means of gathering the necessary data. This survey was undertaken in the form of questionnaires. The objective of performing the survey was to gain a wider general picture of how the company itself perceived the issues pertaining to each of the constructs of change and change management, rather than relying on the writer's preconceptions.

3.4.1.4 Observation
Observation of the behaviours of employees, managers and change leadership in the change environment has also been done to augment the researchers knowledge on the change process.

3.4.2 Measuring instruments
The study was conducted using the survey method in the form of a questionnaire compiled by the researcher. This approach was chosen for the evaluation, as it was totally anonymous thus avoiding intimidation and allowing employees the freedom to express themselves.

3.4.2.1 Questionnaire design
A questionnaire consisting of 30 questions that closely matched the constructs being evaluated in this study was used. The rating scale chosen for this study is the 5-point Likert scale, which ranged from strongly agree to strongly disagree. The questions required the respondents to grade their responses on this scale. The objective of the study was outlined on the cover page. Participants had to fill in details concerning home language, age, educational qualifications and length of service with company. The questions included in the questionnaire are shown in Appendix 1.

3.4.2.2 Questionnaire administration
The questionnaire was pilot tested with a small sample of five employees. The questions were then revised and adjusted so that they were easily understood.
The final instrument was then administered during working hours in the main control room. Each participant was made aware that the questionnaire was for research purposes only and it was stressed that anonymity would be maintained. Questions were explained to those employees that needed more clarity. Co-workers helped those participants that needed the questions to be translated to Zulu. After completion the questionnaires were then personally collected and analyzed.

3.4.2.3 Interviews
As mentioned earlier, interview questions were used to deal with each of the constructs i.e. planning of the change, communication, designing of the transition, resistance to change, and managing and leading change. The questions posed are shown in Appendix 2.

3.5 Evaluation of the measurement tool
Cooper and Schindler (2003:231) state that the following three major criteria are used for evaluating a measurement tool: validity, reliability and practicality.

3.5.1 Validity
Validity refers to the extent to which a test measures what we actually wish to measure. The forms of validity are:

- External validity – of research findings refers to the data’s ability to be generalized across persons, settings and times.

- Internal validity – is the ability of the research instrument to measure what it is purported to measure.

- Content validity – of a measuring instrument is the extent to which it provides adequate coverage of the investigative questions guiding the study.
• Criterion-related validity — reflects the success of measures used for prediction or estimation.

• Construct validity — refers to operational measures for the concepts making up the construct.

3.5.2 Reliability
Reliability has to do with the accuracy and precision of a measurement procedure. A measure is reliable to the degree that the data collection procedure supplies consistent results when repeated.

3.5.3 Practicality
Practicality is concerned with a wide range of factors of economy, convenience and interpretability.

To increase the construct validity of the case study research, data that focused on the constructs under investigation was collected from all stakeholders and the case study was reviewed by some of the stakeholders. Internal validity is not of significant importance for an exploratory study as compared to a causal study. The external validity for a case study research will involve testing theory and obtaining replication of the findings. This can be determined, as the change process would be taking place on the other Dow Agrochemicals sites in Southern Africa.

3.6 Summary
This chapter has outlined the techniques used for the research methodology.

Chapter four follows with the case study on Dow Agrochemicals (KwaZulu Natal).
CHAPTER 4: CASE STUDY

4.1 Introduction
This chapter presents an overview of Dow Agrochemicals (KwaZulu Natal). The company's current situation is discussed, with the shortcomings against the parent company's required standards being highlighted. To eliminate these shortcomings and become fully compliant with the required standards, it is necessary that Dow Agrochemicals (KwaZulu Natal) undergo strategic organizational change. The change model adopted is outlined together with the change management framework to achieve the desired future state. The company's key vision elements, strategic objectives and strategic plans are also outlined.

4.2 History of the organization
Dow Agrochemicals (KwaZulu Natal), the head office for DA South Africa, is situated on the North Coast of Durban. It started off as a company with one operation unit in September 1983, and a second plant started to produce products in August 1987 (www.dow.com).

The company merged with a well-known National company, Sentrachem Pty (Ltd), in March 1990 and effective September 1994 became 100 percent owned by the National Company. The third operation unit started to produce in December 1994. At the end of 1997 Dow Chemicals, which is one of the leading global chemical companies, acquired Sentrachem Pty (Ltd). Dow Agrochemicals (South Africa) was one of the divisions retained while the non-core divisions of the parent National Company were divested (www.dow.com).

Dow Chemicals is a global science and technology based company that develops and manufactures a portfolio of chemicals, plastics and agricultural products and services for customers in 162 countries around the world. With annual sales of more than $19 billion, it conducts its operations through 14 global businesses employing 39,200 people. The company has 123 manufacturing sites in 32
countries and supplies more than 2,400 products grouped within the operating segments (www.dow.com)

4.2.1 Products/services provided
The Agrochemicals division of Dow Chemicals is a global leader in the agriculture industry, which develops, manufactures and markets products for crop production, weed, insect and plant disease management, and industrial and commercial pest management. Products manufactured presently at Dow Agrochemicals (KwaZulu Natal) are insecticides, herbicides and various herbicide formulations.

Product Applications - Disease control, insect control, seeds, traits, urban pest management, value-added grains, weed control

4.2.2 Dow Agrochemicals global performance
As per Dow's 1999 public report that is available online (www.dow.com), Agricultural Products sales decreased 3 percent to $2.3 billion in 1999, compared with $2.4 billion in 1998 and $2.1 billion in 1997. Compared with 1998, sales volume was flat, and prices fell 3 percent. Sales volume in 1998 grew 13 percent, while prices declined 3 percent versus 1997.

In 1999, global agrochemical industry sales declined approximately 6 percent and competitive pressure increased as industry participants sought to maintain position. The business' ability to maintain sales in 1999 at levels above the industry average was attributable to the quality of DAs' broad product portfolio, which crosses many businesses, applications and geographies, combined with continued growth from new product launches. Some recently launched herbicides, along with a new fungicide, continued to gain market acceptance. Sales of these new products increased substantially versus 1998.

4.4 The parent multinational's environment standards
As per Dow's 1999 public report that is available online (www.dow.com), the parent multinational, in 1996, publicly announced its voluntary global Environment,
Health and Safety (E,H&S) goals for 2005, consistent with the company's decade-long commitment to Responsible Care. Its E,H&S 2005 goals were ambitious performance targets to measure progress toward sustainable development, including targets to reduce chemical emissions, waste and wastewater by 50 percent. Equally aggressive were its E,H&S 2005 goals to reduce leaks, spills, fires, explosions, work-related injuries and transportation incidents by 90 percent.

In addition to these voluntary commitments, the global operations are subject to stringent laws and government regulations related to environmental protection and remediation. The company's environmental responsibilities and potential liabilities receive direct and ongoing scrutiny by management to ensure compliance with these laws and regulations. Its Environmental Management Standard (EMS) clearly defines the overall environmental systems, performance objectives and design requirements needed to minimize the long-term cost of environmental protection, and to comply with these laws and regulations. It is the company's stated E,H&S policy that all global operations and products meet the EMS or their country's laws and regulations, whichever is more stringent. In 1999, the company further enhanced the effectiveness of its EMS by integrating it into a company-wide Management System for E,H&S, Operations and Quality, including implementation of a new global E,H&S Work Process to improve E,H&S performance and to ensure ongoing compliance worldwide.

In sites in Europe and the United States, the company also received third-party verification of its compliance with Responsible Care and with outside specifications such as ISO-14001. To date, five European sites have been ISO-14001 certified. In March 1999, three U.S. manufacturing sites and the global headquarters voluntarily participated in a third-party Responsible Care Management Systems Verification (MSV) to ensure that the company has the processes and programs in place to reach the highest standards of EH&S excellence worldwide.

It is the Dow's policy to adhere to a waste management hierarchy that minimizes the impact of wastes and emissions on the environment. First, the company works
to eliminate or minimize the generation of waste and emissions at the source through research, process design, plant operations and maintenance. Second, it finds ways to reuse and recycle materials. Finally, unusable or non-recyclable hazardous waste is treated before disposal to eliminate or reduce the hazardous nature and volume of the waste. Treatment may include destruction by chemical, physical, biological or thermal (incineration) means. Disposal of waste materials in landfills is considered only after all other options have been thoroughly evaluated. The company has specific requirements for wastes that are transferred to non-company facilities. Wastes that are recycled, treated or recovered for energy off-site represent less than two percent of the total amount of wastes reported as part of the Pollution Prevention Act.

The company accrues the costs of site remediation for its facilities based on current law and existing technologies. In the case of a landfill, it recognizes the costs over the useful life of the facility. The nature of such remediation includes the cleanup of soil contamination and the closure of landfills and other waste management facilities.

4.4 Dow Agrochemicals (KwaZulu Natal) situation before change

The company’s global specialists performed an audit after the acquisition and the shortcomings were highlighted as follows:

4.4.1 E, H and S performance

4.4.1.1 Safety

As at year 2000 the company recorded 8 incidents for the year with regards to injury and frequent spillage of chemicals i.e. loss of primary containment (LOPC).

4.4.1.2 Environment

The following did not comply with environmental standards:

- Emissions – There were frequent gas leaks from equipment due to manual operations of the plant, process non-conformance, installation of gaskets
that did not match the required specifications and inefficient scrubbing of gases.

- Effluent to river – Occasionally water effluent that was disposed to the nearby river contained chemicals that were above the minimum required specifications.

- Waste disposal – Products that were produced and were off-specification were contained in drums and stacked for re-processing or disposal at a later stage. Many of these drums corroded over time and the chemical spilled onto the ground thus causing an environmental hazard. Some of these chemicals had to be disposed of in dedicated land filled sites due to the fact that the chemicals were not biodegradable.

There was no waste reduction and prevention programme (WRAP) in place.

4.4.1.3 Compliance

- LPP compliance – Although there were local loss prevention guidelines, the site did not comply fully with global and regulatory guidelines.

- PPE – Personnel wore personal protective equipment but there was no consistency in terms of compliance and there were some personnel that did not comply at all times.

- Emergency equipment – Emergency equipment were available but was not adequate to meet global standards.

4.4.2 Customer focus

4.4.2.1 Quality - The company produced products that were positioned amongst those of the highest quality globally but only achieved 85% first pass prime in year 2000 i.e. for all the products produced during the year only 85% passed the quality check first time. The other 15% contained those that had to be re-analysed or failed outright.
4.4.2.2 Reliability – In the year 2000 the company attained 80% order fulfillment. The balance of 20% were delivered late due to process, delivery or some other problem.

4.4.2.3 Responsiveness – There were also customer complaints with regards to customer needs not being fully met.

4.4.3 Cost reduction
4.4.3.1 Cost – The plants experienced unplanned downtime of approximately 30 to 40%. This was due to manual operation, poor maintenance, equipment failures and process problems. This resulted in an increase in production cost as compared to the planned production cost.

4.4.3.2 Efficiency – Although the products were of a high quality there were still fluctuations in the product yields, which resulted in yield variances. There was still plenty of room for process improvement, which could reduce this variance.

4.4.3.3 Productivity – The unplanned downtime resulted in the target volumes not being met. This resulted in variance between the planned and actual production volumes being high.

4.4.4 People focus
4.4.4.1 Required skills – Approximately 80% of the personnel were not appropriately recruited for the positions. Most of these employees do not possess matric certificates or formal tertiary qualifications. Some of these are Zulu speaking who cannot understand or speak English satisfactorily. The company had a training and development programme in place but this was not adequate to get all the employees to the required skills level to perform their jobs optimally.

4.4.4.2 Best Practices – The operations personnel performed their jobs as gained through experience and by instructions from their supervisors. Their were existing operating procedures but these procedures were not followed because they
became obsolete due to them not being updated whenever there were changes/modifications to the process. There were no formal procedures for operating discipline, problem elimination and best practices to be followed.

4.4.4.3 Communication – Communication was either verbal or written via the logbook. There was no formal communication process whenever there were process, safety, maintenance or other pertinent issues.

4.4.4.4 Joint Ownership – Each shift in operations were a team whose objective was to achieve certain specified targets, but there was no team spirit amongst the employees. Certain employees only concerned themselves with their own needs. This contributed to the department’s targets not being achieved.

4.4.4.5 Individual Accountability – Employees did not possess the culture of individual accountability. Whenever there was a problem it was not easy to pinpoint who caused the problem. As a result certain individuals did not bother about performing optimally because they knew it was not easy to trace back to them whenever there was a problem. Employees also stayed away from work unnecessarily thus having a negative impact on production.

4.4.4.6 Doing it right the first time every time - For all the products produced during the year only 85% passed the quality check first time. The other 15% contained those that had to be re-analysed or failed outright. At certain times the equipment that underwent maintenance failed immediately or a short while later. The above two are examples of the fact that certain employees did not adopt the culture of ‘do it right the first time’.

4.5 Change at Dow Agrochemicals (KwaZulu Natal)
Belonging to one of the leading chemical manufacturers in the world Dow Agrochemicals (KwaZulu Natal) had to align itself to the standards of the parent company in order to compete amongst the global leaders in Agrochemicals. To achieve this it had to adopt the parent company’s modern technology, very high
safety and quality standards and work processes. But this was not adequate. Dow Agrochemicals (KwaZulu Natal) also had to undergo Organizational Change in order to become a global player and survive in the long run. “It is not the strongest of the species that survives nor the most intelligent but rather the most responsive to change” (Charles Darwin).

It was in 2001 when Dow Agrochemicals (KwaZulu Natal) started its ‘change’ journey.

4.6 Nature of the change process in the organization

The change initiative at Dow Agrochemicals (KwaZulu Natal) is a planned or purposeful change, which is intentionally designed to achieve definite objectives i.e.:

- To help the organization improve its ability to adapt to changes in its environment.
- To change its employees behaviour and enhance effectiveness.
- To help it grow consistently.
- To help it increase its social responsibility and contribute to economic development of the country.

To achieve this there was a need to introduce work teams, empower employees and stimulate innovation. The change process emphasizes on formulating an organized and structured organization through effective change management in order to minimize and eliminate confusion and conflict in the organization. It has been concerned with creating a clear sense of mission, building a team, maintaining a flat organizational team structure, and keeping the communication barriers low, widely spaced, and easily handled in order to avoid long hierarchy. In addition, it is chosen to rely on informal reporting requirements and selecting people with relevant skills and high energy level. The change process emphasizes on setting flexible priorities and treating everyone as a temporary measure.
4.7 Key success factors

Consensus with stakeholders is a critical success factor for success in any restructuring programme. The labour movement is one such stakeholder whose co-operation has been critical to the success of Dow Agrochemicals' (KwaZulu Natal) change process and indeed the achievement of its long-term strategic objectives.

The labour restructuring was negotiated with the relevant trade unions that represented the employees. The restructuring process had at its core the need to safeguard job security, training, the teaching of multiple skills, implementation of transformation, affirmative action and respect for labour standards.

Dow Agrochemicals (KwaZulu Natal) had a vision which strived towards making the company internationally competitive. This necessitated a transformation in the way Dow Agrochemicals (KwaZulu Natal) presented itself. Dow Agrochemicals (KwaZulu Natal) hoped to gain from the transfer of skills from the parent company and also achieve a new business culture, among others, thus Dow Agrochemicals (KwaZulu Natal) had to have the requisite framework in place to achieve these gains. Dow Agrochemicals (KwaZulu Natal) had to become customer focused. It needed to develop goals, which gave the highest priority to meeting and exceeding customer expectations, and to devote management attention to activities that continuously demonstrated its commitment to the workforce. Also, in order for the transformation to occur, Dow Agrochemicals (KwaZulu Natal) had to be employee-oriented by increasing its focus on training and development.

Furthermore, to achieve success in the change process the following was necessary:

- Desire to leave status quo
- Clarity of future state
- Path to the future state
To bring this to reality Dow Agrochemicals (KwaZulu Natal) had to adopt a model of change and an appropriate change management framework that depicts the path to the future state.

4.8 The model of change

Dow Agrochemicals (KwaZulu Natal) has adopted a model of change to help leaders to identify what aspects of organizational performance *must* be considered for implementing change, fundamentally and simultaneously, in order for each aspect represented in the model to work together. If one aspect of change is not addressed, complete and sustainable change simply won't happen. Each aspect of the model, listed below, represents a critical area of consideration for implementing large-scale sustainable change.

- **Vision, values and strategy** - is central to everything that is done. They define what all are working toward and are aiming for.

- **Processes** - focus people on changing the way work is done. Reengineering work processes and designing the steps for how work gets done are fundamental to implementing change.

- **Culture** - of the organization, i.e., how the people work together, how they operate and what rules they play by, *all* have a significant impact on their ability to change.

- **Organization** - focuses the people on the structure supporting the changes. How jobs are redesigned with the appropriate competencies and how they are formed into both organizational and team structures are also fundamental to the successful change initiative. The enablers of change, outlined by the Information Technology and Human Resource Policy aspects, support changes to the work processes and culture.
• **Information technology and systems** - enables critical information to be available for everyone.

• **Human resource policies** - underpin the new culture and align the selection, deployment, development and reward system to reinforce the desired changes.

Cascading activities based on this model of change from the vision provide a basis for the comprehensive model of sustaining change in the organization.

**4.9 The path to the future state**

To build and leverage its capability to manage change, Dow Agrochemicals (KwaZulu Natal) adopted a change management framework (see Fig. 4.1) that guided change leaders through a disciplined approach to change. This framework for change has been used to manage the transition.
This framework depicts three phases with the key Change Management activities for each phase of a change project. The phases are:

- Planning and Analysis,
- Design/Testing, and
- Implementation.

Activities (in shaded blocks) are selected for each phase for managing change. These activities are integrated with the "what" of the change being implemented.
Three activities in a change project transcend all the phases i.e. building the project team, managing stakeholder expectations, and communications. When these three activities are carried out along with the activities in the “Planning & Analysis” phase, the change project becomes focused and well positioned to move the organization to the future state.

When the three activities are conducted and/or reviewed in the “Design/Testing” phase and the “Implementation” phase of the project, (along with the activities in these phases), the focus is on the organizational alignment requirements for the change project.

The activities in the shaded blocks, which are assigned to a phase, are based upon the issues which typically are addressed in shaping the path of a change project.

For each activity, leaders had to ensure that an appropriate amount of attention was being given to change management issues. The actions taken in each activity are as follows:

4.9.1 Activities spanning all phases
The three activities spanning all phases are:

- Building of the project team and establishing an ongoing plan to develop team members.
- Identification of key stakeholders impacted by change and creation of a plan to gain their support.
- Designing a communications strategy and plan based on the specific needs and concerns of the key stakeholders.

4.9.2 Planning and analysis phase activities
Planning and analysis phase activities focus on creating a clear vision and understanding the organization's readiness to change as well as the degree of
disruption which will result because of the intended change. The following are the aims of the planning an analysis phase.

- Developing a clearly articulated vision statement and compelling reasons for moving toward that future state.
- Understanding of the organization's readiness for changes and the degree of disruption that must be anticipated and planned for.
- Identification of leaders throughout the organization to lead the changes.

### 4.9.3 Design/testing phase activities

During the design/testing phase activities, focus is on defining the future state environment and aligning organizational elements to support the change. Actions taken are:

- Development of performance measures that support the future state strategies, processes and/or technologies.
- Clearly defining roles, skill requirements, and performance expectations in the future state.
- Identifying the skill gap and developing a performance-based training strategy to develop leaders, coaches, and individuals who are empowered and skilled to perform their future state roles.
- Identifying ways to leverage and, if necessary, adapt the existing culture to realize that vision.
- Aligning of reward systems to motivate individuals and teams to behave in ways that support the future state environment.
- Developing an organization and work structure that supports the future state environment.
- Establishing human resource planning (recruitment, selection/placement, development, and termination/ outplacement) strategies and aligning them with the changes.
4.9.4 Implementation phase activities

In the Implementation Phase, activities focus on measuring results, rewarding individuals associated with the change, and ensuring that a continuous improvement process is established. Actions taken are:

- Having clear performance measures to evaluate the success of the implementation.
- Measurement of the results of the implementation.
- Recognizing and rewarding project leaders, team members and stakeholders.
- Definition of continuous improvement process by project sponsors, leaders, coaches, and teams.

The above phase activities serve to aid the change leader design a change management plan. The framework also serves as an index for capturing best practice tools, techniques and examples from change projects both inside and outside the company. Together, leaders have a flexible tool that can be used to craft a change approach that is appropriate to the situation.

4.10 Resistance to change

Management took full responsibility to drive the change process. Senior management attempted to communicate the importance of the change to the employees, as effectively as possible. In spite of this the employees reflected resistance to change, due to following reasons:

- Fear of the unknown, fear of failure, concerns about ability to develop needed skills, or a low ability to cope with change.
- Fear of loosing their jobs i.e. thinking that they might not be able to cope with the new system.
- Fear of loosing their status and promotional prospects and fear of being separated from long-standing colleagues.
- Fear of loosing special benefits that they enjoyed in the old system.
- Fear of getting additional workload.
• Fear of accountability and responsibility included in their official job descriptions.

During the analysis and design phase of the change process some employees and managers tried to block out and object to the controlling mechanisms introduced in the new system (referred to as block resistance). Others also complained about additional work and responsibility that would be included in the new system. Some of the employees pretended to accept the change during the analysis and design phases but showed reverse resistance i.e. they were only superficially enthusiastic and supportive to the change.

4.11 The company’s strategic objectives

Dow Agrochemicals (KwaZulu Natal) has set strategic objectives, which it desired to achieve by year 2005. Achieving this would align it with the required standards of the parent company. The company was confident that a successful change programme would, to a great extent, bring it closer to achieving these objectives. For each of the key elements, strategic objectives were developed, and for each strategic objective, strategic plans were outlined. The key elements, strategic objectives and strategic plans are shown in Table 4.1 (Table 4.1 has been developed by the researcher).
Table 4.1: Strategic objectives and plans (Table 4.1 developed by researcher)

<table>
<thead>
<tr>
<th>Key Elements</th>
<th>Aspect</th>
<th>Strategic Objectives</th>
<th>Strategic Plans</th>
</tr>
</thead>
</table>
| E, H and S           | Safety       | 2005 target < 1 Recordable Incident per year | • Formalize Site Safety Program  
| performance          |              |                           | • Behavioural Safety Program in Place  
|                      |              |                           | • Initiate Global LOPC Program  
|                      |              |                           | • Implement E, H&S Global Work Process  |
|                      | Environment  | Achieve 50% reduction in waste generation per unit production by 2005 | • Target 15% reduction per year through 2003  
|                      |              |                           | • Process variation & root cause elimination focus  
|                      |              |                           | • Initiate Global WRAP Program  |
|                      | Compliance   | Demonstrated compliance with all parent company & regulatory guidelines/permits by 2003 | • License to operate current & verified  
|                      |              |                           | • Parent company mandatory practices verified by internal audit  |
| Customer focus       | Quality      | Achieve 100% compliance with specification for all products by 2005 | • Complete specification data available to plants  
|                      |              |                           | • Accountability for compliance with specification established  |
|                      | Reliability  | Achieve 100% on time delivery to customers by 2003 | • Defined on time delivery measure in place  
|                      |              |                           | • Logical Supply Teams leading day to day product supply chain  
|                      |              |                           | • Use Plant notice boards to communicate performance  |
|                      | Responsiveness | Reduce customer complaints to 1 per million units packed by 2005 | • LST focal point role in understanding and meeting customer needs  
|                      |              |                           | • Packaging Instruction data available to plants  
|                      |              |                           | • Use Plant notice boards to communicate performance  |
| Cost reduction       | Cost         | Reduce Site controllable cost by 25% by 2005 | • Reduce maintenance spending in line with RAB by 2005  
|                      |              |                           | • Reduce labour costs in line with manning targets by integration & multiskilling  
|                      |              |                           | • Measurement monthly & review quarterly via SAP/Business Objects reporting  |
|                      | Efficiency   | Reduce product variable cost by 10% by 2005 | • Raw material & product measurement  
|                      |              |                           | • Updated process optimization plans via TICA process  
|                      |              |                           | • Measurement & review monthly via SAP/Business Objects reporting  |
|                      | Productivity | Minimize Volume           | • Increase asset mechanical  |
The strategic plans outlined in Table 4.1 are key to successfully manage the improvement process.

4.12 Summary

The chapter briefly highlights the background of Dow Agrochemicals (KwaZulu Natal) from its roots in 1983 up until the present. Dow Agrochemicals is essentially a global leader in the agricultural industry. Products manufactured presently at Dow Agrochemicals (KwaZulu Natal) are insecticides, herbicides and various herbicide formulations.
Following the background is a brief description of Dow’s global performance for the years 1997, 1998 and 1999.

This is followed by the parent company’s commitment to responsible care. Dow’s priority is safety. The parent company’s focus on E, H & S and its 2005 goals are highlighted.

In order to get Dow Agrochemicals (KwaZulu Natal) to the Dow’s standards and requirements the global specialists performed an audit on Dow Agrochemicals (KwaZulu Natal), and shortcomings were highlighted and grouped into the following key elements i.e. E, H and S performance, Customer focus, Cost reduction and People focus.

Achievement of the required standards would only be possible if the company underwent change. The change initiative at Dow Agrochemicals (KwaZulu Natal) is a planned or purposeful change, which is intentionally designed to achieve definite objectives.

To achieve success in the change process the following was necessary:

- Desire to leave status quo
- Clarity of future state
- Path to the future state

To bring this to reality Dow Agrochemicals (KwaZulu Natal) adopted a model of change and an appropriate change management framework that depicts the path to the future state.

Dow Agrochemicals (KwaZulu Natal) adopted a model of change to help leaders to identify what aspects of organizational performance must be considered for implementing change and thereby gain clarity of the desired future state. The key aspects of this model are vision, values and strategy, processes, culture,
organization, information technology and systems, and human resource policies.

To build and leverage its capability to manage change, it adopted a change management framework that guided change leaders through a disciplined approach to change. This framework consists of three phases with the key change Management activities for each phase of a change project. The phases are Planning and Analysis, Design/Testing, and Implementation. The activities assigned to a phase, are based upon the issues typically addressed in shaping the path of a change project.

The main barriers to change discussed are resistance to change and organizational culture.

The organizations strategic objectives are outlined together with the strategic objectives, for each key element.

Chapter five follows with the results of the feedback from the questionnaires.
CHAPTER 5: RESULTS

5.1 Introduction
This chapter presents the results from the questionnaires administered.

5.2 Response rate
All of the 20 questionnaires sent out were received, resulting in a 100% response rate.

5.3 Descriptive statistics on feedback from questionnaires
Information used on the analysis to follow was based on data obtained from the Likert Scale. The coding is as follows:

5 : Strongly agree
4 : Agree
3 : Unsure
2 : Disagree
1 : Strongly Disagree

5.3.1 Analysis of data
The data is scored as above and the mean value and standard deviation computed for each question in the questionnaire. The mean value and standard deviation (s) are tabulated in Table 5.1 (table developed by researcher).

Table 5.1: Descriptive statistics on feedback from questionnaire

<table>
<thead>
<tr>
<th>Planning the change</th>
<th>N</th>
<th>Mean</th>
<th>Std Deviation(s)</th>
</tr>
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<tbody>
<tr>
<td>I have been involved in the planning of the change.</td>
<td>20</td>
<td>2.65</td>
<td>1.424</td>
</tr>
<tr>
<td>Sufficient time was spent on planning the change strategy.</td>
<td>20</td>
<td>3.05</td>
<td>1.099</td>
</tr>
<tr>
<td>Management convinced staff of the need for change.</td>
<td>20</td>
<td>3.9</td>
<td>0.912</td>
</tr>
<tr>
<td>Management created awareness to staff that change is accomplished one step at a time.</td>
<td>20</td>
<td>3.0</td>
<td>4.401</td>
</tr>
<tr>
<td>Management defined the change vision when managing change.</td>
<td>20</td>
<td>4.4</td>
<td>3.548</td>
</tr>
<tr>
<td>The vision helps employees to understand the inevitable change.</td>
<td>20</td>
<td>3.25</td>
<td>1.552</td>
</tr>
</tbody>
</table>
### Communication

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Std Deviation(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>The purpose of the change was clearly communicated.</td>
<td>20</td>
<td>3.6</td>
<td>1.273</td>
</tr>
<tr>
<td>The future vision was clearly communicated by the leaders of the change.</td>
<td>20</td>
<td>4.45</td>
<td>0.510</td>
</tr>
<tr>
<td>The communication of the change events was done timeously</td>
<td>20</td>
<td>3.35</td>
<td>1.182</td>
</tr>
<tr>
<td>Communication is essential in managing change.</td>
<td>20</td>
<td>4.9</td>
<td>0.308</td>
</tr>
</tbody>
</table>

### Designing the implementation

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Std Deviation(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Individual performance measures are aligned with rewards.</td>
<td>20</td>
<td>3.1</td>
<td>1.294</td>
</tr>
<tr>
<td>Performance measures are closely and visibly tied to the vision.</td>
<td>20</td>
<td>3.7</td>
<td>1.081</td>
</tr>
<tr>
<td>Jobs have been redesigned with clearly defined roles and responsibilities.</td>
<td>20</td>
<td>4.45</td>
<td>2.408</td>
</tr>
<tr>
<td>Competency tests have been conducted with all employees to determine the skills gap.</td>
<td>20</td>
<td>4.65</td>
<td>0.489</td>
</tr>
<tr>
<td>Training and development plans have been developed to bring employees to the required competency levels.</td>
<td>20</td>
<td>4.3</td>
<td>0.470</td>
</tr>
<tr>
<td>The organization invests in staff training.</td>
<td>20</td>
<td>4.25</td>
<td>0.444</td>
</tr>
<tr>
<td>Individuals are made available to attend training sessions.</td>
<td>20</td>
<td>3.35</td>
<td>1.182</td>
</tr>
<tr>
<td>The organization has developed new ways of doing things.</td>
<td>20</td>
<td>4.55</td>
<td>0.510</td>
</tr>
<tr>
<td>The change has fostered a team-based environment.</td>
<td>20</td>
<td>3.95</td>
<td>0.945</td>
</tr>
<tr>
<td>Individuals and teams are encouraged to voice their ideas and make decisions.</td>
<td>20</td>
<td>4.00</td>
<td>0.973</td>
</tr>
<tr>
<td>The new flat structure makes it easier to communicate with middle and senior management.</td>
<td>20</td>
<td>4.5</td>
<td>0.946</td>
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</tbody>
</table>
Resistance to change

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Std Deviation(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>All the employees in the organization are</td>
<td>20</td>
<td>2.95</td>
<td>1.234</td>
</tr>
<tr>
<td>committed to making the change initiatives</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>successful.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The change implemented has positively</td>
<td>20</td>
<td>3.9</td>
<td>0.912</td>
</tr>
<tr>
<td>impacted on the working culture in the</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>organization.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Vision helps employees to minimize</td>
<td>20</td>
<td>3.4</td>
<td>1.465</td>
</tr>
<tr>
<td>resistance to change.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Managing and leading Change

<table>
<thead>
<tr>
<th></th>
<th>N</th>
<th>Mean</th>
<th>Std Deviation(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>There are sufficient skilled leaders to see</td>
<td>20</td>
<td>3.2</td>
<td>1.152</td>
</tr>
<tr>
<td>the change through</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>There is effective management of the new</td>
<td>20</td>
<td>3.15</td>
<td>1.089</td>
</tr>
<tr>
<td>systems that have been implemented as a</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>result of the change.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Middle managers motivate the employees to</td>
<td>20</td>
<td>2.95</td>
<td>1.099</td>
</tr>
<tr>
<td>making the change initiatives successful.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Teams/individuals are rewarded during the</td>
<td>20</td>
<td>2.55</td>
<td>0.999</td>
</tr>
<tr>
<td>change implementation.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>People most affected by the proposed change</td>
<td>20</td>
<td>4.65</td>
<td>0.489</td>
</tr>
<tr>
<td>should be among those involved in bringing</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>it about.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Management involved employees in the change</td>
<td>20</td>
<td>3.5</td>
<td>0.889</td>
</tr>
<tr>
<td>process.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

From the above table it can be seen that the mean values ranged between disagree and strongly agree.

With regards to planning the change:

The following had mean values between agree and strongly agree:

- Management defined the change vision when managing change.

The following had mean values between unsure and agree:

- Sufficient time was spent on planning the change strategy.
- Management convinced staff of the need for change.
• The vision helps employees to understand the inevitable change.

The following had mean values of unsure:

• Management created awareness to staff that change is accomplished one step at a time.

The following had mean values between disagree and unsure:

• I have been involved in the planning of the change.

With regards to **communication**:

The following had mean values between agree and strongly agree:

• The future vision was clearly communicated by the leaders of the change.
• Communication is essential in managing change.

The following had mean values between unsure and agree:

• The purpose of the change was clearly communicated.
• The communication of the change events was done timeously.

With regards to **designing the implementation**:

The following had mean values between agree and strongly agree:

• Jobs have been redesigned with clearly defined roles and responsibilities.
• Competency tests have been conducted with all employees to determine the skills gap.
• Training and development plans have been developed to bring employees to the required competency levels.
• The organization invests in staff training.
• The organization has developed new ways of doing things.
• The new flat structure makes it easier to communicate with middle and senior management.
The following had mean value equal to agree:

- Individuals and teams are encouraged to voice their ideas and make decisions.

The following had mean values between unsure and agree:

- Individual performance measures are aligned with rewards.
- Performance measures are closely and visibly tied to the vision.
- Individuals are made available to attend training sessions.
- The change has fostered a team-based environment.

With regards to resistance to change:

The following had mean values between unsure and agree:

The change implemented has positively impacted on the working culture in the organization.

Vision helps employees to minimize resistance to change.

The following had mean values between disagree and unsure:

All the employees in the organization are committed to making the change initiatives successful.

With regards to managing and leading change:

The following had mean values between agree and strongly agree:

- People most affected by the proposed change should be among those involved in bringing it about.

The following had mean values between unsure and agree:

- There are sufficient skilled leaders to see the change through
- There is effective management of the new systems that have been implemented as a result of the change.
- Management involved employees in the change process.
The following had mean values between disagree and unsure:

- Middle managers motivate the employees to making the change initiatives successful.
- Teams/individuals are rewarded during the change implementation.

5.7 Summary
This chapter presents the results from the questionnaire feedback. The results are based on the main change management constructs i.e. planning of the change, communication, designing the transition, resistance to change, and managing and leading change.

Chapter six follows with the evaluation of the change process.
CHAPTER 6: DISCUSSION OF RESULTS AND EVALUATION OF THE CHANGE PROCESS

6.1 Introduction

Outlined hereunder is a discussion of the results and an evaluation of the change process at Dow Agrochemicals (KwaZulu Natal) and the impact it has on attaining the company’s strategic objectives.

The model of change and the change management framework were integrated so that the company could reach the desired future state as planned. The value creation of each of the change management activities towards the change process is outlined under the three phases of planning and analysis, design/testing and implementation.

6.2 Planning and analysis

The planning and analysis phase kicked off with the establishment of the project team. At Dow Agrochemicals (KwaZulu Natal) a steering committee was formed which consisted of people within the organization from senior management, middle management, employees from the floor and union members. One person from senior management was the change leader. The key function of the steering team was to develop a common goal, define roles and responsibilities, establish trust and develop synergistic working relationships that foster high performance and to manage the change process. The team members were given the necessary training required to attain the relevant skill set, were made aware of the concepts of effective change implementation, were made aware of the project vision and objectives and level of commitment to making the project a success. These created a team that understood and supported the project, and had the skills to execute required activities during the planning and analysis phase. [Dow Agrochemicals (KwaZulu Natal) Strategy Presentations and Communication Session Minutes]
From this point onwards reference will be made to the mean values from Table 5.1 in chapter 5 for the discussion to follow.

The mean for ‘employees being involved in the planning of the change’ is 2.65. This fell between disagree and unsure. This shows that the change leaders did not get most of the employees involved in the planning process, which in turn would have a negative impact on the success of future change activities. Those that agreed that they were involved in the planning were members of the change steering and design teams. Some middle managers responded quite negatively during the interviews with regards to participating in the planning. However they mentioned that they were involved at a later stage (design stage) when the change leaders needed them for certain change activities. But the middle managers and employees that were members of the change steering team positively responded that they were involved extensively in the planning process.

‘The need for change’ had a mean of 3.9, which fell between unsure and agree, but more closer to agree. This implies that overall the people were convinced to a certain extent that there was a need for change but were still doubtful. This response could be attributed to the fact that the majority was not involved in the planning process.

‘Sufficient time was spent on planning the change strategy’ had a mean of 3.05, which fell between unsure and agree, but closer to unsure. This shows that the time spent on the planning phase was inadequate. During the initial planning of the change process the employees were not aware that the organization was going to undergo change. They heard through the grapevine that changes were going to take place but did not even know what these changes were. They did not even know what the change process was all about. All they thought about was the organization going through restructuring, certain departments being shut down and jobs being lost. It was only during a certain stage of the planning phase did management start communicating to employees about what change was all about and the need for change. At this stage the employees already had decreased morale.
'Management created awareness to staff that change is accomplished one step at a time' had a mean of 3.0, which implies that the employees were unsure, thus showing that management did not effectively create such an awareness. Although the need for change was communicated and the vision defined the employees were not made aware of the different steps of the change process and that change is accomplished one step at a time. During the planning stage employees did not know what to expect next in the process. The only thing that lingered in their minds was the impending retrenchment.

'Management defined the change vision when managing change' had a mean of 4.4 while the vision helps employees to understand the inevitable change had a mean of 3.25. The purpose of vision articulation is to gain full clarity and understanding of the desired future state. A week-long workshop was held with the ‘steering’ and ‘design’ teams which consisted of a series of activities which resulted in the documentation of a clear, easily understood picture of the future organization. This picture included macro processes, organizational maps as well as an outline of the path for implementing the future organization, processes and systems.

Project leaders and team members gained a clear understanding of and could ‘articulate the project vision’, the compelling reason for moving toward that future state, and the high-level path to successful implementation.

**Vision statement:** A global competitive organization that relies on continuous learning and leveraging to satisfy the needs of its stakeholders.

The vision has further been broken down into key elements as follows:

- E, H and S performance
- Customer focus
- Cost reduction
- People focus
Each of the key elements consisted of a team called the vision element team and each team had a leader who was also a member of the steering team. Each key element was in turn broken down into strategic objectives and further into strategic plans.

Each vision element team made presentations to all employees, which resulted in the following:

- Clear articulation of the vision to all appropriate levels (e.g. organization, team, individual).
- Effective communication of the vision by project leaders and team members.
- Emphasis on their support of the vision by project leaders and team members.

From the above:

- The perception is that the strengths of the planning process are that management convinced staff of the need for change and effectively defined the change vision.
- The weaknesses were that management did not spend sufficient time on the planning strategy and did not create awareness that change was accomplished one step at a time. It faired very weak when it came to employee involvement in the change planning.

6.3 Communication

'The purpose of the change was clearly communicated' had a mean of 3.6 (between unsure and agree but closer to agree). The respondents from the interviews mentioned that the communication of these was done via dedicated meetings with all employees. All the plants were put on hold whilst two operations employees per department remained on the plant to monitor it whilst it was on hold. Interview respondents mentioned that the change leaders and the leader for Dow Agrochemicals Southern Africa did presentations on the purpose of the
change and the change vision. Due to the fact that the majority of the workforce was Zulu speaking, a translator was made available to continuously translate from English to Zulu. At the end of the session employees were given the opportunity to ask questions. The leaders responded to these questions immediately.

Interview respondents also mentioned that communication methods increased as the change process got to the design and implementation phases. This in itself is shown from the fact that the mean for ‘the future vision was clearly communicated by the leaders of the change’ was 4.45 (between agree and strongly agree). The key vision elements were printed on T-shirts and these T-shirts handed to employees at one of the communication sessions. Whenever employees wore their T-shirts others could read the vision elements. This was a method of communicating the vision and constantly reminding employees of the vision. ‘The communication of the change events was done timeously’ had a mean of 3.35 (between unsure and agree). In the interviews the middle managers stated that the change leaders did not adequately address certain concerns of the employees. This is vital because it could lead to uneasiness and distrust. Although the employees did not receive answers within the required time frame, they eventually did receive them. There were times when change events were communicated too late. Employees received information on certain events through the grapevine but some of the information was inaccurate and portrayed a negative picture of the events to follow, thus decreasing employee morale and increasing resistance.

‘Communication is essential in managing change’ had a mean of 4.9, which can be taken as strongly agree. This is evident that almost all of the questionnaire respondents strongly agreed that is essential in managing change. It is an ongoing process that addressed stakeholder concerns. They needed to constantly be made aware of the change vision, and to keep all employees fully informed of any progress. Communication needed to be done frequently via meetings with all employees, workshops, newsletters, memos and e-mails. Effective communication is necessary to maintain and improve the desired behaviours.
With regards to communication above it is perceived that:

- Communication of the vision was done very effectively. Communication is essential in managing change also stood out strongly.
- The communication of the purpose of the change was done well but there was room for improvement to get it to be very effective.
- Timeous communication of the change events did not fair too well and needed plenty of improvement.

6.4 Designing the transition

6.4.1 Develop performance measures

'The performance measures were closely and visibly tied to the vision had a mean of 3.7 (between unsure and agree but closer to agree). Organizational, team and individual performance measures were developed that supported new business processes, technology and structure. There was a performance management system in place to measure individual performance of all employees and managers. Each of the vision elements was broken down into smaller tasks as mentioned in the case study. Each employee was assigned set tasks in his performance management plan for the year. An employee's performance was measured on the extent to which each of his tasks was completed. Departmental performance measures were done using asset utilization reports that showed daily, weekly and monthly activities. These reports were stored electronically on the organization's server and all relevant stakeholders had immediate access to them from their computers in the office.

6.4.2 Align rewards

'Individual performance measures were aligned with rewards' had a mean of 3.1 (between unsure and agree but closer to unsure). This was also evident from the interviews with middle management. There was a performance management system in place to measure individual performance of all employees and managers and to reward them accordingly on an annual basis. Performance reviews were supposed to have taken place on a quarterly basis. All middle managers stated
that this was not happening, saying that it only took place on an annual basis. Interview responses from senior managers stated that there were rewards aligned to the individual performance measures. Individuals would be rewarded accordingly only if they performed beyond their expectations. They would be rewarded accordingly with an additional increase in their salary over and above the negotiated standard annual increase. From this it was clear that the employees were not aware of the reward criteria. It is also evident from the middle managers response that the quarterly performance reviews were not implemented. There was a need to fully implement the performance management system and to clearly communicate the functionality of the system and the reward criteria to all employees and middle managers.

6.4.3 Design jobs

'Jobs have been redesigned with clearly defined roles and responsibilities had a mean of 4.45 (between agree and strongly agree). The interview respondents mentioned that jobs have been redesigned with clearly defined roles and responsibilities. Middle and senior managers added that employees from the floor were also involved in the redesigning of the new jobs and that their input was invaluable. Furthermore they emphasized that job design was closely linked with performance measures, skill development systems, rewards, and HR policies.

6.4.4 Develop skills

'Competency tests have been conducted with all employees to determine the skills gap' had a mean of 4.65 (close to strongly agree). 'The organization invests in staff training' had a mean of 4.25 (between agree and strongly agree but closer to agree) while 'training and development plans have been developed to bring employees to the required competency levels' had a mean of 4.3 (between agree and strongly agree but closer to agree). But 'individuals are made available to attend training sessions' had a mean of 3.35 (between unsure and agree). Responses from middle managers were that although competency tests were carried out to determine the skills gap and that training and development plans were put in place to close the gap, production pressures stifled them from making
the individuals available for the planned training sessions. Arrangements had to be made for certain individuals to attend training sessions at a later date and this lead to those individuals becoming disappointed and having a decrease in morale. Senior managers’ response from the interviews was that employee training and development should be given high priority. It seems as though there should be proper planning in scheduling of training and development sessions between senior managers and middle managers, taking into account the production and other operations-related pressures, so that this does not negatively impact on the employees’ morale. Provision was also made for Adult Basic Education (ABET) training sessions to be held on site during certain days of the week. Employees were allocated to these sessions and it was imperative that they attended all these sessions to bring themselves to the required competency standards and due to the fact that the company invested in this training.

6.4.5 Align culture

‘The organization has developed new ways of doing things’ had a mean of 4.55 (between agree and strongly agree). The old ways of doing things had to be a thing of the past e.g. employees did not follow operating procedures strictly. Some of them did what they felt was the correct way of doing things. The change brought about new work processes that included new procedures being developed and inserted into dedicated files (both electronic and hard copies). These procedures needed to be strictly followed and any deviations from these had to be documented into specific deviation forms and justified.

‘The change has fostered a team-based environment had a mean of 3.95 (between unsure and agree but very close to agree) while ‘individuals are given the opportunity to voice their ideas and make decisions’ had a mean of 4.00 (agree). Responses from the interviews with middle and senior managers also indicated this. They added that the fact that employees were given this opportunity instilled a feeling of ownership and accountability. This new working culture, together with the new work processes was desirable to achieve the organizations objectives. But there were still some employees that didn’t want to work
harmoniously in a team. They felt comfortable working independently at their own pace and, at times disrupted the overall objectives of the team. This was not healthy for the new changed environment. These individuals had to receive extra coaching and motivation to adapt to the team-based environment.

6.4.6 Align structure

'The new flat structure makes it easier to communicate with middle and senior management' had a mean of 4.5 (between agree and strongly agree). The response from middle and senior managers was that everyone was a member of a team and there were no communication barriers as compared to the old bureaucratic structure that was characterized by many hierarchical levels. The senior managers added that the employees were free to voice any concerns directly to them. However, some of the middle managers felt that senior managers should not give certain production related instructions directly to the employees on the floor without first making them aware of such instructions to be given. This can easily be rectified by increased communication from the senior manager to the middle manager.

With regards to designing the implementation:

The following stood out strongly and can be deemed to be very effective.

- Jobs have been redesigned with clearly defined roles and responsibilities.
- Competency tests have been conducted with all employees to determine the skills gap.
- Training and development plans have been developed to bring employees to the required competency levels.
- The organization invests in staff training.
- The organization has developed new ways of doing things.
- The new flat structure makes it easier to communicate with middle and senior management.

The following was done well but there was still room for improvement:
• Individuals and teams are encouraged to voice their ideas and make decisions.
• Performance measures are closely and visibly tied to the vision.
• The change has fostered a team-based environment.

The following stood out to be weak:
• Individual performance measures are aligned with rewards.
• Individuals are made available to attend training sessions.

Having done the above evaluation the following correlation can be observed between the change process at Dow Agrochemicals (KwaZulu Natal) and the literature review.

• The ‘design/test phase’ can be likened to the ‘designing the transition: the implementation path’ and ‘designing the transition: levers and mechanisms’ in the literature review.

• The ‘planning and analysis’ and ‘design/test’ phases can be associated with the ‘unfreeze’ state as depicted in the literature review [Figure 2.1: Dual leadership responsibilities – managing the organizational and individual change paths (Balogan, 1999:153)].

Thus at the organizational level and individual level the following is evident:
• In the unfreeze state Dow Agrochemicals (KwaZulu Natal) has successfully made people within the organization ready for change by making them aware of the need for change and dissatisfied with the existing ways of working; and at the individual level the individuals have successfully let go of the past.

In light of this it can be said that at this stage, Dow Agrochemicals (KwaZulu Natal) has achieved its change outcomes at the organizational level as well as the individual level as depicted in Figure 2.1.
From the above it can be seen that, although there were certain shortfalls in the planning and design phases, the change leadership has effectively utilized and aligned the different levers and mechanisms to ensure a smooth transition process.

6.5 Resistance to change

‘All the employees in the organization are committed to making the change initiatives successful’ had a mean of 2.95 (between disagree and unsure but very close to unsure) Personal observation of the employees during the change process also portrayed a feeling of resistance. This resistance can be attributed to the fact that the employees feared the unknown and also felt insecure thinking that they may loose their jobs as a result of the change process. To worsen matters the company handed out letters to all middle managers and shop floor employees stating that their jobs would no longer exist and that they would have to apply for the new posts that replaced the old ones. These new posts were formally advertised internally with specific qualifications and experience. These new posts also had different names allocated to them. The process entailed completing application forms, being short listed and attending interviews. Most of them knew that they did not possess a matric or tertiary qualification to back them up for the new jobs that were designed for the future organization. They feared the unknown and had a feeling of insecurity. Most of the middle managers also fell into this bracket and resisted the change. But those employees and middle managers that possessed tertiary qualifications did not resist change because they felt that the change process would create better opportunities for them to progress in their careers.

These concerns were addressed in one of the communication sessions and feedback was given to employees. The change leaders did a presentation to all employees which stated that for each individual to reach the specified competency level dedicated training and development programmes would be undertaken. This would increase skills and furthermore improve relationship building amongst employees. This, together with further motivation from the change leadership
team, minimized resistance from both middle managers and employees. But it was a really difficult task to get increased commitment from the employees. Continuous communication sessions, motivation and union involvement were required to increase commitment and maintain it at that level. It was especially important to get high commitment from middle managers because they had to play the role of change relayers. They had to themselves absorb the change and then pass it on to their subordinates.

'The change implemented has positively impacted on the working culture in the organization' had a mean of 3.9 (between unsure and agree but very close to agree). Although there was resistance to change employees slowly started adapting to the change, especially after they were appointed to the new jobs. Continuous communication sessions, motivation, coaching and painting a positive picture of their future in the organization increased commitment levels and brought the employees closer to the desired behaviours. They got to grips with working in teams and taking accountability. Waiting for supervisor's instructions was a thing of the past for the majority. But there were still those that found it difficult to adapt.

'The vision helps employees to minimize resistance to change' had a mean of 3.4 (between unsure and agree but closer to unsure). This shows that the vision did not help minimize resistance in certain employees. These employees strongly resisted the change. They felt that the vision was there for the organization's benefit and not for the individual employees who had to suffer the brunt of restructuring.

6.6 Managing and leading the change
6.6.1 Implement change
'There were sufficient skilled leaders to see the change through' had a mean of 3.2 (between unsure and agree but closer to agree). This perception could be attributed to the fact that implementation was dedicated to middle management in each department. Knowing that these middle managers had a change relayer role
to play, some could have been performing the implementation effectively while others were not as effective. From the interviews some middle managers mentioned that the workload was heavy due to the fact that they had to keep the production levels as required and at the same time play a role in implementing the new systems while other middle managers also resisted change because their jobs were on the line, as mentioned in resistance to change above.

'Middle managers motivated the employees to make the change initiative successful' had a mean of 2.95 (between disagree and unsure but closer to unsure). This is evident from the roles played by middle managers as mentioned in the previous paragraph. They seemed to be pressurised by their normal operational duties and the fact that they themselves had to cope with the effects of the change on themselves.

'People most affected by the proposed change should be among those involved in bringing it about' had a mean of 4.65 (between agree and strongly agree but more closer to strongly agree) while 'management involved employees in the change process' had a mean of 3.5 (between unsure and agree). These figures imply that less people were actually involved in the change process. From theory involvement of all employees in the change process from planning to implementation would definitely see the change outcomes being achieved with minimum disruptions.

6.6.2 Measure results

The following activities were conducted to evaluate the performance of the organization (leaders, coaches, teams and individuals) in executing the implementation and delivering target processes, behaviours, and business results.

- Implementation of a measurement system involving relevant stakeholders.
- Verification of business case expectations.
- Development of a method to capture key learnings from implementation.
The monthly and quarterly departmental reports were used to measure performance on the departmental level and results from the performance management system were used to assess the achievement of change outcomes. The result was a concise and visible scorecard, linked to the original project charter, vision and performance measures.

### 6.6.3 Reward teams and individuals

'Teams/individuals are rewarded during the change implementation' had a mean of 2.55 (between disagree and unsure). Interview feedback mentioned that there were no short-term rewards to motivate them. Short-term rewards were imperative in order to elicit the desired behaviours effectively to speed up the objectives of the change initiative. From the survey responses it is evident that there were no short-term rewards for teams and individuals for their contributions to change. Although there were reward criteria set for long-term rewards, which were linked to performance in the future state, this was not communicated to the employees. This was a big shortfall, which, if not addressed urgently could have drastic effects on successfully implementing future change activities. This could lead to management encountering difficulties in maintaining the behaviours achieved thus far and people reverting to their old behaviours.

### 6.6.4 Maintain and improve

This consisted of on-going activities to identify performance gaps, develop and execute improvement plans, and measure results. Documentation of implementation status and a continuous improvement plan was developed, which consisted of visible performance targets and mechanisms to support the actions required to achieve those targets. This plan had assigned responsibilities and was given appropriate management visibility.

The interview feedback from senior managers stated that there were adequate continuous improvement plans to maintain the future state and at the same time identify gaps and improve. These improvement plans had assigned responsibilities. Unfortunately there was a lack of resources to implement some of
the improvement plans due to some of the key resources in middle management level taking voluntary retrenchment. Some of these key resources had to be re-hired, at higher costs to the company, on a consulting basis to take on some of the responsibilities. From this it is evident that the organization has lost some people with specialist skills, which it couldn’t easily replace.

With regards to managing and leading change:

- Emphasis needed to be placed on skilled leaders and management of the new systems. There were not adequate skilled leaders to carry out the implementation and hence manage the new systems.
- More emphasis needed to be placed on rewards and motivation by middle managers to make the change initiatives successful.

Having completed the above evaluation the following correlation can be observed between the change process at Dow Agrochemicals (KwaZulu Natal) and the literature review.

- The ‘implementation phase’ and ‘managing the transition’ can be associated with the ‘managing the transition: monitoring and resourcing’ as outlined by Balogun (1999) in the literature review.
- The ‘implementation’ phase can be associated with “move” and the ‘maintain and improve’ activity can be associated with “sustain”, as depicted in the literature review [Figure 2.1: Dual leadership responsibilities ~ managing the organizational and individual change paths (Balogan, 1999:153)].

Thus at the organizational level and individual level the following is evident:

- In the “move” state Dow Agrochemicals (KwaZulu Natal) has successfully implemented the needed changes through the selected range of levers and mechanisms; and parallel to this the individuals have successfully adapted to change.
- In the “sustain” state Dow Agrochemicals (KwaZulu Natal) is doing well in embedding the changes throughout the organization to ensure members do not relapse into old patterns of behaviour; and parallel to this the individuals were successfully moving forward.

In light of this it can be said that Dow Agrochemicals (KwaZulu Natal) has achieved its change outcomes at the **organizational level** as well as the **individual level** as depicted in Figure 2.1.

From the evaluation it is evident that there were certain activities (mentioned above) that needed improvement to bring the organization to the future state.
6.7 Impact of the change initiative on attaining the organization's strategic objectives

The company's strategic objectives were developed from the change vision. Each key vision element was broken down into strategic objectives and further into strategic plans by each of the vision element teams, as mentioned under 'vision articulation' in this chapter. These were presented to all employees at a presentation on the company's strategic objectives and plans. During the implementation phase the various departments did quarterly and annual performance reports. These reports were used as a measure to monitor the progress of the company in attaining the strategic objectives. All the relevant data for this research was collated from the various departmental reports, presentations and meetings with departmental managers.

The key vision elements, key aspects of each element, strategic objectives and data on the strategic objectives for the years 2003 and 2004 are tabulated in table 6.1, which has been developed by the researcher.

From the data shown for the years 2003 and 2004 it is clear that there is achievement of certain objectives while some are close to being achieved and others can only be achieved after 2005. Although certain objectives can only be achieved after 2005, there is clear indication from the data that the change initiative had a positive impact on the achievement of the strategic objectives.
Table 6.1: Data on strategic objectives (base year is 2000)
(Table 6.1 developed by researcher. Data obtained from company monthly, quarterly and annual reports)

<table>
<thead>
<tr>
<th>Key Elements</th>
<th>Aspect</th>
<th>Strategic Objectives</th>
<th>2003</th>
<th>2004</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>E, H and S</strong></td>
<td><strong>Performance</strong></td>
<td><strong>Safety</strong> 2005 target &lt; 1 Recordable Incident per year</td>
<td>5</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Environment</strong> Achieve 50% reduction in waste generation per unit production by 2005</td>
<td>15%</td>
<td>25%</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Compliance</strong> Demonstrated compliance with all parent company &amp; regulatory guidelines/permits by 2003</td>
<td>73%</td>
<td>81%</td>
</tr>
<tr>
<td><strong>Customer</strong></td>
<td><strong>Focus</strong></td>
<td><strong>Quality</strong> Achieve 100% compliance with specification for all products by 2005</td>
<td>89%</td>
<td>96%</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Reliability</strong> Achieve 100% on time delivery to customers by 2003</td>
<td>97%</td>
<td>97%</td>
</tr>
<tr>
<td><strong>Cost</strong></td>
<td><strong>Reduction</strong></td>
<td><strong>Cost</strong> Reduce Site controllable cost by 25% by 2005</td>
<td>8%</td>
<td>17%</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Efficiency</strong> Reduce product variable cost by 10% by 2005</td>
<td>5%</td>
<td>7%</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Productivity</strong> Minimize Volume variance by achieving 90% asset capability by 2005</td>
<td>76%</td>
<td>81%</td>
</tr>
<tr>
<td><strong>People</strong></td>
<td><strong>Focus</strong></td>
<td><strong>Best practices</strong> Implement Global Work Process by end 2003</td>
<td>Fully achieved</td>
<td>Fully achieved</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Required skills</strong> Workforce trained to Multi-Craft Operator proficiency level by end 2003</td>
<td>Fully achieved</td>
<td>Fully achieved</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Motivated teams</strong> Achieve 100% of workforce at empowerment stage 2 by end 2003</td>
<td>Fully achieved</td>
<td>N/A</td>
</tr>
<tr>
<td></td>
<td></td>
<td><strong>Communication</strong> Communication strategy in place to inform people through change process</td>
<td>Fully achieved</td>
<td>Fully achieved</td>
</tr>
</tbody>
</table>
6.8 Summary
At the heart of change management lays the change problem, that is, some future state to be realized, some current state to be left behind, and some structured, organized process for getting from the one to the other.

This chapter outlines the structured, organized process followed by Dow Agrochemicals (KwaZulu Natal) and the appropriate levers and mechanisms used during the transition. This process is evaluated against the model (structure) used in the literature review (Balogun: 1999). The process consists of three phases i.e. planning and analysis, designing/testing and implementation. Each phase in turn consisted of the key change management activities as follows:

- Planning and analysis – consisted of articulate vision, establish change readiness and develop change leadership.
- Design/Testing – consisted of develop performance measures, design jobs, develop skills, align culture, align rewards, align structure and develop HR policies.
- Implementation – consisted of implement change, measure results, reward teams/individual and maintain and improve.

The three activities spanning all the phases are building the team, managing stakeholder expectations, and communications.

Each of the key change management activities are discussed as undertaken by the organization and evaluated against the model (structure) used in the literature review.

The three phases of the transition path can be associated with the three phases on the organizational level. The ‘planning and analysis’ and the ‘design/testing’ phases can be associated with "unfreeze", the ‘implementation’ phase can be associated with “move” and “maintain and improve” activity can be associated with “sustain” as depicted in the literature review [Figure 2.1: Dual leadership...
responsibilities – managing the organizational and individual change paths (Balogan, 1999:153)].

Following the evaluation is a tabulation of the key vision elements, key aspects in each element, strategic objectives and data on the strategic objectives for the years 2003 and 2004. The impact of the change initiative on the organization’s strategic objectives is then discussed.

Chapter seven follows with the conclusion, recommendations for improving the organization and recommendations for further research.
CHAPTER 7: CONCLUSION AND RECOMMENDATIONS

7.1 Conclusion
Change management, which is the process, tools and techniques to manage the people side of business outcome and to realize that business changes effectively within the social infrastructure of the workplace change, consists of renewal of parts of the whole organizational culture, structure, processes and relationships with the outside environment. The possible forces of change can be a nature of workforce, technology, economic shocks, competition, social trends and world politics. Therefore change can take place in different forms that include ‘changing structure and systems’, which is changing all formal and informal organizational and political structures, all systems, including HR systems, all processes and procedures, and all roles, responsibilities and relationships. ‘Changing individuals’ is about changing their skills, values, attitudes and behaviours. The changes have to be supportive of the overall organizational changes desired. ‘Changing organizational climate’ is about changing the way people relate to each other in an organization, and the management style. It includes changes to how conflict is managed, how decisions are made, how staff are managed and treated, and how open people are with each other.

From the above the following conclusions about the change process at Dow Agrochemicals (KwaZulu Natal) are noted:

- At Dow Agrochemicals (KwaZulu Natal) all of the above forms of change were necessary to align it to the parent multinational and become competitive in the global arena.

- Due to Dow Agrochemicals (KwaZulu Natal) being acquired by the parent multinational, a top-down approach to change was adopted in which the direction, control and initiation of the changes came from the strategic apex of the organization. The plans developed were achieved with the collaboration of senior managers, and part of the selling of the plans was achieved via employee participation in workshops (Balogan, 1999:28). 

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• The change path adopted was ‘transformational’, since it underwent fundamental change in purpose or strategy and involved challenging all the taken-for-granted assumptions and “the way of doing things around here”. It resulted in changes so profound that after the event the organization is scarcely recognizable compared with its previous condition (Sadler, 1996:56).

• Although there were shortfalls in the change process, it is evident from the evaluation that the change leaders have successfully driven the change process through the ‘planning and analysis’, ‘design/test’ and ‘implementation’ stages to achieve most of the desired change outcomes. But there are activities in the implementation phase that need improvement in order to successfully take the organization to the future state and maintain it at that level.

• From the data shown for the years 2003 and 2004 in table 6.1 it is clear that there is achievement of certain objectives while some are close to being achieved and others can only be achieved after 2005. Although certain objectives can only be achieved after 2005, there is clear indication from the data that the change initiative had a positive impact on the achievement of the strategic objectives.

• An environment was created that fostered team-based working. Teams became responsible for business processes, and concentrated on error reduction, cycle time reduction, waste reduction, incident reduction, and customer satisfaction improvements for these processes. Better empowerment and performance improvement were also achieved.

• The literature review in chapter two has explained that not addressing people related issues like resistance is named in most cases for implementation failure. Organizational Change Management that has its
roots in the science of psychology aims to gain acceptance for changes by the affected people. The Change Management concepts, methods and tools vary. Basic elements however are:

- A vision to align the organization
- Gain stakeholder support
- Develop leadership team
- Communicating why the changes are necessary
- Involving affected people actively in the change process (participation)
- Provide people with the skills to actively support the change process
- Identify the relevant levers and mechanisms to manage the transition
- Have the necessary measurement and monitoring systems to sustain the future state.

### 7.2 Recommendations

The findings of this study have important implications for management in organizations such as Dow Agrochemicals (KwaZulu Natal). The recommendations, which arise from the research findings, are as follows:

- Change leaders must involve middle managers and shop floor employees at a very early stage of the planning process. At this stage they must explain and reinforce to all why the change is supposed to happen, discuss the business reasons for the change by highlighting priority for the business, as well as the costs or risks of not changing. Sufficient time must also be spent on planning the change strategy and awareness must be created that change is accomplished one step at a time.

- Middle managers play the role of change relayers. To avoid middle managers becoming overloaded due to operational pressures and at the same time implementing the new systems, it is recommended that a dedicated team that includes middle managers be involved in the implementation of the new systems for a certain period of time.
• During change communication is an indispensable tool. Communication should not only occur among top management, as is usually the case but should flow from top management down to employees in the lowest rank. It is vital that communication of change events occurs timeously to avoid creating the feeling of uneasiness and mistrust amongst employees.

• The scheduling of the planned training and development was ineffective. This resulted in certain employees not being made available to attend the scheduled training and development sessions. This lead to a decrease in the employees' morale. Thus it is imperative that the scheduling of the planned training and development sessions be managed effectively.

• Performance appraisal is infrequent and there is insufficient attention to reward and recognition. The importance of performance appraisal in encouraging creativity and change is being overlooked. There is potential for linking such appraisal to short-term rewards and recognition in general.

7.3 Recommendations for future research
All organizations must, at some stage, undergo change to remain competitive. Thus it is crucial that the change initiative be effectively managed to attain success. This study was limited to managing change in a chemical organization, which is essentially a production environment. It is therefore important that this study be conducted in environments such as financial institutions, consulting firms, educational institutions, health care institutions and public services.

This study used the change model (structure) as outlined in Balogun (1999), and an evaluation of the organizations change process was done against this model. It may be useful if this study is extended, by developing a change model and undertaking the evaluation against this developed model, which can then be tested in other economic spheres/organizations such as financial institutions, consulting firms, educational institutions, health care institutions and public services.
REFERENCES


12. Dow Agrochemicals (KwaZulu Natal): Monthly, Quarterly and Annual reports


APPENDICES
APPENDIX 1
RESEARCH QUESTIONNAIRE

Dear Respondent

The following is a research questionnaire, which would aid my collecting data for my research towards my MBA dissertation. DA (KZN) is presently undergoing the change programme, which began in 2001. This questionnaire aims to measure people’s perceptions of the change.

It would be appreciated if you could spare some of your time in participating by completing this questionnaire. Please take note that you do not need to provide your name or company number, as this questionnaire is totally anonymous.

Instructions
The questionnaire is composed of five sections, each containing questions. As you read each question, place an X (using a pen) on the number that best reflects your view. Please complete the section below before you start answering the questions.

Home language: __________
Highest educational qualification: __________
Number of years employed by company: __________
Are you a member of the change design/steering team? Yes/No (cross the applicable)
PLANNING THE CHANGE

1. I have been involved in the planning of the change.

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

2. Sufficient time was spent on planning the change strategy

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

3. Management convinced staff of the need for change

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

4. Management created awareness to staff that change is accomplished one step at a time.

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

5. Management defined the change vision when managing change.

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

6. The vision helps employees to understand the inevitable change.

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

COMMUNICATION

7. The purpose of the change was clearly communicated.

   1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree
8. The future vision was clearly communicated by the leaders of the change.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

9. The communication of the change events was done timeously.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

10. Communication is essential in managing change.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

DESIGNING THE IMPLEMENTATION

11. Individual performance measures are aligned with rewards.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

12. Performance measures are closely and visibly tied to the vision.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

13. Jobs have been redesigned with clearly defined roles and responsibilities.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

14. Competency tests have been conducted with all employees to determine the skills gap.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

15. Training and development plans have been developed to bring employees to the required competency levels.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree
16. The organization invests in staff training.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

17. Individuals are made available to attend training sessions.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

18. The organization has developed new ways of doing things.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

19. The change has fostered a team-based environment.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree

20. Individuals and teams are encouraged to voice their ideas and make decisions.

1 strongly agree 2 agree 3 unsure 4 disagree 5 strongly disagree

21. The new flat structure makes it easier to communicate with middle and senior management.

1 strongly agree 2 agree 3 unsure 4 disagree 5 strongly disagree

**RESISTANCE TO CHANGE**

22. All the employees in the organization are committed to making the change initiatives successful.

1 strongly disagree 2 disagree 3 unsure 4 agree 5 strongly agree
23. The change implemented has positively impacted on the working culture in the organization.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

24. Vision helps employees to minimize resistance to change.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

**MANAGING AND LEADING CHANGE**

25. There are sufficient skilled leaders to see the change through.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

26. There is effective management of the news systems that have been implemented as a result of the change.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

27. Middle managers motivate the employees to making the change initiatives successful.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

28. Teams/individuals are rewarded during the change implementation.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree

29. People most affected by the proposed change should be among those involved in bringing it about.

1 2 3 4 5
strongly disagree disagree unsure agree strongly agree
30. Management involved employees in the change process.

1  strongly disagree  2  disagree  3  unsure  4  agree  5  strongly agree

THANK YOU!
APPENDIX 2
INTERVIEW QUESTIONS

Planning
1. Was sufficient time spent on the planning process and were you involved in the planning? Explain
2. Did management convince staff of the need for change and made them aware that it was accomplished one step at a time? Explain
3. Was the vision clearly defined? Explain

Communication
4. Was the purpose of the change, the change events and the future vision clearly communicated? Explain

Designing the implementation
5. Were individual performance measures visibly tied to the vision and aligned with rewards? Explain
6. Have jobs been redesigned with clearly defined roles and responsibilities? Explain
7. What has been done to determine the skills gap and to develop skills to the required standards?
8. Has the change fostered a team-based environment? Are individuals /teams encouraged to voice their ideas and make decisions? Explain
9. Is the change in organizational structure more conducive to the working environment? Explain
10. Have HR policies changed? Explain

Resistance to change
11. Was there resistance to change? Explain

Managing and leading Change
12. Was there effective management of the new systems that have been implemented as a result of the change? Explain
13. Were teams/individuals appropriately rewarded during the change implementation? Explain