

CHAPTER 1

OUTCOME-BASED EDUCATION: Origins, Development and Impact on the Management of N.S.W. Public Schools

This research study on Outcome-Based Education (O.B.E.) was undertaken between June 1994 and November 1995. The collection of data associated with this research was completed in March 1995, before a Labour Government displaced the Liberal/ National Coalition in the state of New South Wales (N.S.W.), Australia.

Context for this Research Study

This research study was undertaken within the context of a restructured, state-based approach to public schooling. In April 1988, the Liberal/ National Coalition Government commissioned a Management Review of the structure and nature of the state's public school system. The strategic briefing paper, titled "Schools Renewal", recommended "significant devolution" of certain educational management functions to public schools in N.S.W. For example, schools were to be given "much greater control over their own resources" (Scott, 1989:7). The recommendations were largely adopted, resulting in perceived freedoms for educators to pursue local level initiatives. The subsequent release in 1989 of the "White Paper on Curriculum Reform in N.S.W. Schools" titled "Excellence and Equity" by Terry Metherall, the Minister for Education and Youth Affairs at the time, provided part of the framework for changes to

curriculum provision in the N.S.W. school system. It is in this document that one of the first references to "outcomes", used in a generic sense, can be found in the N.S.W. public school system. Metherall, in describing the educational issues that were regularly debated, included a reference to "how curriculum requirements should be specified; for example, by time spent, by content or by outcome" (Metherall, 1989:13). The new N.S.W. Board of Studies was directed by Metherall (1989:14) to:

systematically rework its course requirements... The Board will define its course requirements in terms of objectives, content and expected outcomes for students of various ages and levels of ability. In the interim, indicative time allocations will be specified as a guide for schools.

Here, the use of the term "outcome" is an interpretation of school learning in an "input, output" mode. This view can be supported with reference to the visual models provided in the Appendix of "School-Centred Education", the N.S.W. Education Portfolio Management Review Report (Scott, 1990:263-264). This interpretation is considerably different from O.B.E. models originating in the United States of America (U.S.A.), and is one of the areas investigated in this research study. The Board of Studies interpretation of "outcomes" was subsequently set by the N.S.W. Education Reform Act of 1990 in section 14(3) and communicated to teachers in the "Curriculum Outcomes" (p.4) document of November, 1991. This document stated that the 1990 Education Reform Act required an syllabus developed or endorsed by the Board for a particular course of study:

to indicate the aims, objectives and desired outcomes in terms of knowledge and skills that should be acquired by children at various levels of achievement by the end of specified stages in the course, and any practical experience that children should acquire by the end of such a stage.

The documents encouraged extensive changes in some N.S.W. schools. Some of the knowledge base to inform action at the school level was provided by the D.S.E. However, some educators pursued training in areas not officially mandated by the

D.S.E., and these are the educators this research study sought to locate as "key actors" using O.B.E. ideas directly gleaned from U.S.A. sources.

Expected Outcomes of this Study

The expected outcomes of the research were that the study

***will provide a comprehensive and critical review of literature on Outcome-Based Education (O.B.E.).**

***will detail and analyse phone interviews of key actors involved in O.B.E. change processes within the New South Wales Department of School Education (N.S.W. D.S.E.).**

***will survey current processes which facilitate or hinder comprehensive O.B.E. implementation in N.S.W. public schools.**

Area of Investigation

O.B.E. is a specific area of development, inquiry and strategic experimentation in education. Strategic planning models based on O.B.E. paradigms or frameworks, originally developed in the U.S.A., have been exerting extensive influence on some aspects of N.S.W. public school management. Some components of D.S.E. systems planning and the N.S.W. Board of Studies curriculum development approach can be similarly compared with O.B.E. ideas derived from American models.

Studies of the determinants of educational outcomes have identified a multiplicity of variables linked to social, political, economic and historical context factors (Bridge et al., 1979). The generalised use of the term "outcome" in the business and education sectors to describe the end result of programs or policies reflects the parameters of earlier approaches (Deming, 1982; Biggs and Collis, 1982). However, O.B.E. ideas can be traced to more strategic educational origins than a focus on generic outcomes might suggest. Some of the origins of O.B.E. can be located in educational research in America in the 1960's and 1970's (Carroll, 1963; Bloom, 1968; Block, 1971). During

the late 1980's, however, O.B.E. models began to add corporate sector quality concepts to educational contexts.

School systems in the U.S.A. and Australia have been challenged by interest groups to assert greater accountability for the quality of the end-product (the organization or the student). In order to achieve quality outcomes, management styles within the public school system in N.S.W. had been encouraged to acquire a systems and client-centred "outcomes" focus. This strategic shift to an "outcomes specified" system was symbolic of the philosophic change taking place on a wider political and economic scale. The nature of technological, social, political, economic and environmental changes affecting the U.S.A. and Australia influenced the direction and nature of systems planning in education.

Restructuring of education systems can be seen to have occurred to equip students with qualities in at least three areas. The qualities seen as essential at a national level in Australia were the knowledge, skills, attitudes and values needed to operate competently in a globally-based, technologically advanced economy. Accordingly, contemporary corporate management strategies were applied in educational contexts, encouraged by the nature of policy developed at a state level. For example, Quality Assurance procedures, lead-style management approaches and collaborative decision making strategies involving the stake-holders in N.S.W. educative contexts can be seen to be directly related to business practices.

Corporate approaches to mission and vision setting had also been used in educational contexts in the N.S.W. public school system. A delineation of expected system, school exit outcomes and student learning outcomes were common practices in numerous schools in the U.S.A. The N.S.W. D.S.E., reflected this strategic reorientation of education processes towards a focus on "outcomes".

Administrative Significance of the Study

Before March 1995, the nature of O.B.E. in the N.S.W. state-based education system was described as "outcomes in a standards framework" by educators located in Senior Executive Service positions within the D.S.E. The N.S.W. D.S.E. approach to dealing with the shifts and reorientation of policy towards an outcomes mode reflected varied interpretations at systems, regional, cluster of school, individual school and classroom levels.

With an analysis of the origins and development of O.B.E. ideas developed in the U.S.A. over the last twenty -five years, a more comprehensive understanding of the implications of strategic planning in a school system focusing on "outcomes" can be developed. O.B.E. ideas have rapidly impacted on schools throughout the U.S.A. (King and Varnon, 1993) and N.S.W. through the dispersion of O.B.E. ideas in a variety of ways. The modes of this dispersion and use of O.B.E. ideas in N.S.W. public schools is a specific focus of this research study.

Visiting consultants during the period 1992-1995 have included Al. Mamary presenting aspects of the Outcomes-Driven Developmental Model (ODDM, pronounced "oh-dum"), William Spady of the High Success Program on Outcome-Based Education (H.S.P.-O.B.E.), and Alan Rowe (H.S.P.- O.B.E.). The impact of O.B.E. ideas made available to N.S.W. public school educators by these consultants will be investigated in this research study. This study has significance for policy-makers defining educational outcomes, educators who implement system expectations and O.B.E. theory and practice.

Definition of O.B.E. Terms and Use of Language in this Research

O.B.E. models use extensive jargon in descriptions of educational practice. Some O.B.E. practitioners in the U.S.A. have derived their ideas from a diversity of sources. These diverse ideas have then been synthesized into conceptual models or paradigms.

An example of one approach, Spady's (pre-1991) conceptual model of O.B.E. interpreted in visual form by this researcher from written descriptions in available literature, is provided in Appendix 5.

This research study has referred to and used some of the jargon used by O.B.E. practitioners in the U.S.A. for a specific purpose. The language used by N.S.W. educators in public schools can be seen to reveal a synthesis of O.B.E. specific language with more familiar language that had been used in the N.S.W. school system. This synthesis of terms is referred to more extensively in the comparative analysis of research data in Chapter 6 of this study. In Appendix 4, an interpretation of O.B.E. terminology developed by this researcher has been provided, in a manner which explains the meaning of O.B.E. in a mode that relates to the N.S.W. public school context.

There is no one fixed definition of O.B.E., as various consultants based in the U.S.A. have used different definitions at different times. For example, Spady and Mitchell (1991) described the Johnson City Schools' District, in New York State, U.S.A. as being "transitional" in the nature of the district's curriculum exit outcomes for learners. However, the style of leadership in the Johnson City Schools' District, as described by Vickery (1988,1990) and Alessi (1991), reveals "value-added" and "transformative" leadership practices when using Sergiovanni's (1992) criteria.

Straightforward definitions of O.B.E. have been provided by Rowe (1994) for "traditional", "transitional" and "transformational" O.B.E., derived from Spady's High Success Program on O.B.E. (H.S.P.-O.B.E.) materials. Rowe (1994:4) stated that the development of an Outcome-Based approach to schooling could be examined in three different ways. These are

Traditional O.B.E.: Curriculum is content driven and emphasizes discrete facts, skills, and concepts. The traditional model relies heavily on curriculum alignment and techniques such as mastery learning.

Transitional O.B.E.: In transitional O.B.E. approaches, student competencies play a key role. Transitional Outcome Based approaches try to develop life role experiences for their students and are generally more relevant for students.

Transformational O.B.E.: An organization in this form of O.B.E. is context driven, placing high importance on, not only what the student is learning for the future, but where learning actually occurs. In this view, students perform in real- life contexts. All three emphasize a system view of quality performance and continuous improvement.

The N.S.W. D.S.E. approach to O.B.E. can be seen to contain some components of a "traditional" approach, with system emphasis on quality teaching and learning outcomes. The N.S.W. Board of Studies, with a focus on curriculum outcomes in syllabi produced for schools, also can be seen to have taken a "traditional" approach to O.B.E.

Nature of the Problems Addressed in this Research Study

O.B.E. can be viewed as a critical social science experiment in educative contexts, that has yet to be studied in a comprehensive manner. Long- term tracking of students who have been through O.B.E. schooling processes have yet to be undertaken. Some short term studies have been conducted within school districts in the U.S.A. (Vickery, 1985). Apparent, however, was the rapid growth of interest in O.B.E. approaches to management, teaching, learning and the welfare of the school community in both the U.S.A. and N.S.W. before 1995.

One problem to be investigated in this research study is training provision in the N.S.W. D.S.E. for educators to be able to effectively deal with an "outcomes" approach to management of schools, curriculum and students. An approach that has been taken in some O.B.E. school districts in the U.S.A. is the comprehensive training of staff in the philosophy, origins and practice of O.B.E. before changes are imposed in schools (Brandt, 1994; Cowling, 1993; Mamary, 1991). Teacher Training and Development in the N.S.W. public school system was the responsibility of the D.S.E. as the providers of policy, annual priorities and financial resources. It was therefore appropriate to

investigate the effects of O.B.E. ideas in N.S.W. public schools, including the nature of teacher re-training to cater for implementation.

Another problem investigated by this researcher was the difference in the interpretation of an "outcomes" approach between the N.S.W. D.S.E., the N.S.W. Board of Studies and some N.S.W. educators up to March 1995. This researcher was interested in investigating how N.S.W. educators were adapting the administrative components of the American models to suit the N.S.W. context. One element of O.B.E. not officially mandated at a state level in N.S.W., yet in use by some public school educators, was a "futures-driven" negotiation of expected student exit outcomes within the local school community.

School managers have a crucial role to play in establishing the corporate conditions for successful O.B.E. implementation. Without adequate O.B.E. training, the task of classroom teachers in implementing curriculum requirements with an outcomes focus may prove to be extraordinarily difficult.

Research Questions

The following research questions were deemed to be significant by this researcher, and constituted the central focus of the study.

Research Question 1: "How are Outcome-Based Education strategies being implemented in N.S.W. public schools?"

Research Question 2: "How does the organization of O.B.E. change processes in N.S.W. differ from the strategies devised originally in the U.S.A.?"

Research Question 3: "What are the effects on regions, cluster of schools, school managers and teaching staff of O.B.E. policy approaches determined at a state level?"

Research Question 4: "What is the nature of current training provision for school managers and teachers in being able to effectively deal with the application of O.B.E. ideas within school, cluster and regional contexts?"

Research Design and Data Collection

A qualitative-oriented research approach was used to collect data to answer the four research questions. The use of two methods of data collection, incorporating interviews and a questionnaire, facilitated the comparative analysis of research findings presented in Chapter 6. A visual diagram of this research study's design can be found in Chapter 3 (p.67).

Since 1991, certain O.B.E. ideas had influenced the nature of educational administration practice in N.S.W. public schools. For example, "exit outcomes" had been used to integrate or "align" management, teaching, learning and student welfare practices in some schools. N.S.W. public school educators using O.B.E. ideas, or "key actors", were located in various regional positions, clusters of schools as Directors or schools in a range of executive or teacher positions. These educators were identified from O.B.E. network, conference and training course lists in the possession of this researcher. Permission to access the "key actors" was sought from the N.S.W. D.S.E. Quality Assurance Directorate (Appendix 1).

Limitations of the Study

A number of limitations have influenced the conduct of this research study. Potential bias on the part of this researcher towards the "modus operandi" of the social theorists and educational practitioners using O.B.E. paradigms constituted a significant challenge in maintaining objectivity throughout the design and conduct of this research study. For this reason, a formal interview and questionnaire approach were chosen as the means to collect data, in order to minimise potential researcher bias.

Some difficulties occurred in gaining permission to include copies of key documents in the appendices of this research project. For example, a request by a senior D.S.E. employee to avoid the inclusion of a policy brief, which informed the nature of curriculum provision in N.S.W. public schools after 1991, was honoured by this researcher.

The scope of this study was further limited with the lack of response to the questionnaire from educators located in city, regional or Director of Schools positions. A possible clash with substantial workloads at the start of a new school year for educators in senior executive positions may have occurred. School-based educators tended to respond more readily to reminder letters. These circumstances are more fully discussed in Chapter 5. Some difficulty in drawing generalizations with confidence about research findings was experienced as a consequence. This researcher had initially proposed to analyse data in a "stratified" manner to investigate possible differences in O.B.E. interpretation between regional, cluster and schools levels. The interview technique was more successful in obtaining the desired "stratification" of opinion.

The time frame of the study was limited to November and December of 1994 for the formal interviews, and the start of the new school year for questionnaire distribution. The reasons for this action are more fully described in Chapters 4 and 5. This researcher could see potential problems if data collection continued after the rumoured state election in March, 1995. The time frame for return of questionnaire responses was deliberately limited to two weeks after distribution in February, 1995. This researcher considered that changed contextual conditions for education in N.S.W. after a change of government could influence the nature of the responses. If the time frame for the questionnaire had been extended to maximise the number of returns, comparative analysis between interview and questionnaire data could have been rendered invalid.

Organization of the Thesis

This research study is reported as follows. In chapter 2, a review of literature related to O.B.E. is presented, in order to provide a conceptual framework revealing the origins and development of O.B.E. ideas in the U.S.A. and Australia. The design of this research study, informed by this literature and developed in order to answer these four dominant questions, is described in Chapter 3. The methods of data collection, through interviews conducted and a questionnaire distributed amongst "key actors", are also explained in Chapter 3.

The interviews conducted with some "key actors", identified as using O.B.E. ideas, are analysed in Chapter 4 of this research study, to gain a broad perspective of the issues involved in O.B.E. implementation in N.S.W. public schools. The questionnaire data from N.S.W. public school educators is analysed in Chapter 5, in a manner similar to the interview data in the previous chapter. Through comparative analysis of interview and questionnaire information, a clarification of the themes and findings emerging from the data is made in Chapter 6. A number of recommendations for educational policy and practice have also been made on the basis of research findings identified earlier. Suggestions for future research are also made in this chapter.

CHAPTER 2

LITERATURE REVIEW

In this chapter, the origins and elements of an Outcome-Based Education (O.B.E.) in the United States of America (U.S.A.) have been identified. Some literature on the contextual conditions for use of O.B.E. ideas in N.S.W. public schools is also reviewed.

Section 1 of the literature review traces and assesses the impact of ideas about "quality" in business and educational contexts. Section 1 also compares British and Japanese management practices, as both approaches have had an impact on the nature of quality management interpretations in the N.S.W. public school system. Applications of business practices in educational contexts is also discussed, as corporate management approaches appear to have significantly influenced the manner in which educators have used O.B.E. ideas. In Section 2, selected literature on accountability in education, such as Quality Assurance (Q.A.) practices, are discussed. Section 2 then considers the context for the incorporation of O.B.E. ideas in Australia, and in particular the use of O.B.E. ideas in N.S.W. public schools. Section 3 deals comprehensively with the ideas of Carroll, Block, Bloom, Spady, Glasser, and Mamary, which are being used by some "key actors" in N.S.W. public schools.

The literature review is presented in a chronological manner as far as possible, in order to provide a conceptual framework revealing the origins, context and development of O.B.E. The continually expanding parameters of O.B.E. paradigms, as the various models are transformed through theory, additional knowledge and practice, presented a challenge for this researcher in the identification of the source of some

O.B.E. ideas. The chronological structure of the literature review has informed this researcher in the design of the interview and questionnaire, and assisted in forming a conceptual framework that informed the triangulated nature of the data analysis.

Some O.B.E. models challenge prevalent beliefs about management, teaching and learning in school contexts. For example, the Outcomes-Driven Developmental Model (ODDM) created in the Johnson City Schools District in New York State, U.S.A., incorporates a specific interpretation of psychology in the management of relationships in the workplace. The ODDM "lead management" approach was partially inspired by Glasser's Control Theory, Reality Therapy and Quality Management (C.T./R.T./Q.M.) concepts (Glasser, 1961, 1965, 1969, 1983, 1986, 1990, 1991). Glasser's ideas have contributed to the development of transformational approaches to the management of people in educational contexts, through the use of specific forms of communication. Research by Carroll (1963), Bloom (1968, 1971, 1974, 1976, 1984), and Block (1971, 1974, 1985, 1989), in fields related to Mastery Learning, achievement variables and flexible use of learning time added to the body of knowledge that became incorporated in O.B.E. models in the U.S.A. At a later stage, different O.B.E. models were influenced by corporate quality concepts. However, Deming's role in the development of quality concepts is considered first in this literature review, in order to establish the sources of some ideas affecting the context of O.B.E. in the U.S.A. and Australia.

Section 1: Quality Concepts and O.B.E.

This section of the literature review will trace and assess the impact of ideas about "quality", which have been incorporated in some O.B.E. models since the early 1990's. Section 1 will also compare British and Japanese management practices, making reference to the influences on some Australian practices in business and educational contexts. Apparent is a synthesis of these approaches in documents related to the concept of quality schools in Australia. Accordingly, elements of the British approach to management and quality control concepts originating in Japan can be seen as providing some of the contextual conditions for the use of O.B.E. ideas in some N.S.W. public schools.

Influence of Total Quality Management

It is apparent that current O.B.E. models have incorporated elements from Deming's Quality Control approach to corporate management in educational contexts (Glasser, 1990; Hoglund, 1991; Holt, 1993a and 1993b; Rowe, 1994). As such, there is no suggestion here that corporate quality control or business principles were the precursors of O.B.E., but rather that educators have incorporated some ideas about quality into current school practices.

The literature dealing with Deming's Quality Control approach to corporate management also includes his own published text (1982), life and consultancy experiences as described by Walton (1986), and publications documenting the belated and subsequent adoption of Deming's style Total Quality Management strategies applied in North American business contexts (Gabor, 1990).

Deming's original publication, "Out of the Crisis", overviews the principles used to lead Japanese industry toward quality and productivity in management of businesses. Deming uses the terms "transformation", "value-added", "focus on outcome", "quality circles", "quality control", "performance evaluation" and "team-work" in these publications. These terms indicate possible sources of some of the ideas subsequently built into some O.B.E. concepts, contemporary quality assurance processes and "value-added, lead-management" practices by proponents such as Sergiovanni (1992).

However, the specific influences of business management approaches in educational contexts can be difficult to identify. Overt references to Deming's influence did occur in the ODDM model towards the end of the 1980's, as acknowledged by Mamary in training courses materials (September, 1993; Sydney Australia). References to the impact of Deming's ideas in education are also made by Glasser (1990) and Høglund (1991). Glasser has recently further expanded the field of reference for his Control Theory and Reality Therapy (C.T./R.T.) training courses, dealing with successful communication approaches to management in all contexts, to include extensive reference to Quality Management (Q.M.). These training courses are now being identified by C.T./R.T./Q.M. This is one of the forms of training in O.B.E.-related management strategies being used by some N.S.W. public school educators.

Deming acknowledges the quality control ideas of Walter A. Shewart, which exerted the initial influence on Japanese engineers during General MacArthur's occupation of Japan after World War Two (1982: 2-3). The origin of quality concepts now used in the corporate sector are based on Deming's Management Method and quality control developed originally in Japan after World War Two. The Japanese initiated Quality Control (Q.C.) functions as a means of raising the standard of products developed by Japanese business and to transform global attitudes about Japanese products. The competitiveness of the global marketplace was a major factor in the Japanese search for a solution in producing low-cost quality products. The application of quality monitoring as a means of evaluating, documenting, reporting and making recommendations for a business or organization is reflective of an economic context in which government

agencies are intent on rationalising resources, in order to ensure cost- effectiveness as well as quality outcomes.

The focus on quality outcomes, established by Deming, had a profound effect on Japanese business. Central to the apparent success of Deming's ideas was the provision of a clarity of focus for Japanese business. For Deming, the responsibility for transformation of the organization lay firmly with management. According to him:

The job of management is not supervision, but leadership. Management must work on sources of improvement, the intent of quality of product and of service, and on the translation of the intent into design and actual product. The required transformation of Western style of management requires that managers be leaders. Focus on outcome (management by numbers, M.B.O., work standards, meet specifications, zero defects, appraisal of performance) must be abolished, leadership put in place. (Deming, 1982:54).

Deming uses the term "outcome" here in a generic sense. The term should not be confused with the subsequent development of O.B.E. as models for strategic school transformation. This possible interchangeability of the term "outcome" can be confusing for educational practitioners, as the term is also used to describe the current focus of curriculum in N.S.W. ("learning outcomes" to be achieved) and is in common generic use. A great deal of confusion exists amongst educational practitioners in N.S.W. as to the difference between *curriculum outcomes*, which tend to fit the idea of an "input/output" approach to educational management, and *transformational* approaches to O.B.E. curriculum. Spady (1992:3) has pointed out that some educators refer to everything that has anything to do with learning outcomes as "Outcome Based". Spady has emphasised that policy-makers need to differentiate between "outcomes" written about existing curricula instead of designing curricula that facilitate intended "outcomes".

There is a possible contradiction between Deming's use of the term "outcome" and the intent of O.B.E. practitioners and consultants. This circumstance needs to be more fully explored. According to Deming, leadership is crucial for management.

To manage, one must lead. To lead, one must understand the work that he and his people are responsible for... It is easier for an incoming manager to short circuit his need for learning and his responsibilities, and instead focus on the far end, to manage the outcome- get reports on quality, on failures... Focus on the outcome is not an effective way to improve a process or an activity. (1982:76)

Here an "outcome" is used in a traditional "input, output" view of production. Tyler's work is one of the first educational contexts which uses the term "outcomes".

If an educational program is to be planned and if efforts for continued improvement are to be made, it is very necessary to have some conception of the goals that are being aimed at. These educational outcomes become the criteria by which materials are selected, content is outlined, instructional procedures are developed ...(and) any statement of the outcomes of the school should be a statement of the changes to take place in students. (1949:4,44)

The intention of O.B.E. approaches are quite different to an "input- output" notion, and can be more closely compared with Tyler's interpretation of "outcomes". Tyler's ideas "offer a solid foundation" for O.B.E. philosophies and purposes, according to Gusky (1991:7).

Deming's ideas are used by managers in a wide range of business and educational contexts. His strategies are resulting in extensive re-design of management approaches in the private and public sector. Exemplifying such development are the Quality Assurance processes and cycles of evaluation which are in their infancy in the Australian business and educational contexts. Total Quality Management (T.Q.M.) approaches in the business sector and Total Quality in Education (T.Q.E.) planning processes being trialled in some schools will need long-term study for authoritative comments about the effectiveness of these approaches to be made.

British Compared with Japanese Management Approaches

Comparisons need be made between traditional Western- style production systems and the Japanese approach that developed into T.Q.M. Both of these approaches can be seen to directly relate to the changing management styles found in some N.S.W. public

schools. The original British approach to monitoring goods and services, with the subsequent development of inspection as a component of education systems, has been to document results in a detailed manner after the production process through rigid inspection systems (Blakemore, 1989:2). Australian management practices, including management processes in the N.S.W. D.S.E. until the mid 1980's, can be said to have reflected this bureaucratic, centralised approach.

The difference between the Japanese approach and the British approach can be exemplified by an opinion expressed by Peter Higgins (Sprouster, 1984:150) in reference to business practices, that the:

biggest challenge which we are now facing is to incorporate T.Q.C. within our existing management structure in such a way that it becomes an integral part of our operation and not a functional addition to it.

The Japanese T.Q.M. approach to management concentrates on ensuring that the process used to produce goods and services is efficient and reduces waste of resources, not with simply reworking or trying to correct a faulty product at the end of the line. Originally inspired by Deming and Juran, T.Q.M. was then developed further by Japanese business. As Deming (Sprouster, 1984:91) has stated:

Quality cannot be inspected in it must be built in... As quality goes up, so does productivity; as productivity goes up, costs come down... Good quality does not necessarily mean high quality. It means a predictable degree of uniformity and dependability at a low cost with a quality suited to the market.

The implications for the structure of business and educational organizations are extensive within a T.Q.M. approach. High degrees of training and personnel involvement in operative teams, scientific methods and application of data collection, and statistical analysis, are used to build quality into management processes. Initially, an extensive commitment to the organization's purpose, and the inclusion of employee participation in the organization's structure are fostered in order to alter the long chains of command that exist in traditionally organized companies. (Blakemore, 1989:3).

Although the Japanese began the transformation process of business practices, Deming's original application of statistics in business and Juran's ideas on management practices were the catalysts for the transformation occurring in business and educational strategic planning to achieve quality outcomes. Robson (1983:21) has observed that Western management practices have been increasingly challenged to:

look at quality control in the context of the general managerial task..(and that).. the specialist department had a key role in assisting the process, but the ownership of any quality drive had to be invested in line management.

This kind of statement can be interpreted as applicable to educational contexts, and beliefs about "ownership", "quality" and appropriate management styles can be found in O.B.E. approaches in some N.S.W. public schools.

Educational Applications

The Deming, Juran and Japanese approach to T.Q.M. appears to have profoundly influenced research about the quality of the management, teaching and learning outcomes of some schools systems in countries such as the U.S.A. and Australia. Two dominant sources of influence are apparent in the available literature to support this observation. Glasser's "The Quality School" (1990) demonstrated the nexus between Deming's corporate quality control concepts and educational practice, particularly in the idea of students, parents and school staff as quality school partners. Secondly, a number of educators have applied quality concepts directly to educational settings. These educational applications have become known as Total Quality Education (T.Q.E.) in both the U.S.A. and Australia (Paine et al., 1992; Schmoker and Wilson, 1993). Some T.Q.E. approaches have been created without direct reference to the separate but related O.B.E. developments (Paine et al., 1992). Another example of a T.Q.E. approach is Høglund's (1991) approach which combines elements of Glasser's C.T./R.T./Q.M. approach to managing people and Deming's business management ideas.

Hoglund equates quality schools with effective leadership. He also considers that a "quality school" possesses a mission agreed upon by staff and "lead- management" should be practised. Hoglund (1991:20) explained his views further:

Deming's theory of management rests on 14 basic points... Although these... were derived from the business world, they have direct applicability to the field of education. As more... school districts are introduced to Glasser's 'Quality Education Program', it is important that Deming's 14 points be translated into educational terms so that teachers and administrators can better assimilate the concepts.

Although some educators consider business principles in an educational context an anathema, the business sector has significantly influenced education since the beginning of the Twentieth Century (Crenin, 1988; Collins, 1994). Attitudinal barriers to "quality" have been discussed by Freeston (1992), and the applicability of business principles in educational contexts has been discussed by Brandt (1992). Commenting on the extent of the influence of business principles, Bonstingl (1992:4) observed that:

This movement is spawning a new American revolution, as 'quality' becomes our watchword in every aspect of life. T.Q.M. principles and practices are revitalising business practices, government agencies, hospitals, social organizations, home life and our own world of education.

Paine et al. (1992) overviewed the components of T.Q.M. in an Australian school. This description of the development of a T.Q.E. approach omitted references to sources of the ideas, when these strategies had been in use in some schools in the U.S.A. for almost a decade. As is the case for T.Q.E. approaches, the organization of T.Q.E. management strategies are closely linked to Deming's four beliefs, 14 points of competitive business practice, team decision-making, customer focus and statistical quality control. The principles of quality leadership are also outlined, with seven broad principles of quality leadership being recognized (Paine et al., 1992:42-43). The use of Deming-style Quality Circle team decision-making is described as a Lissner Loop, and it is in this section of the book that the writers briefly acknowledge an indebtedness to Japanese and American school precursors of Quality Circles.

When Paine and his associates had written this book, O.B.E. ideas applied to educational contexts were being initiated by some N.S.W. public school educators, but were not being referred to at Lisarow at that stage. In the U.S.A., some educators were making strong distinctions between O.B.E. and T.Q.M. approaches. Some writers like Holt were very critical about O.B.E.:

O.B.E. falls into the Deming category of rearview driving. This warmed-over mish-mash of the Tyler rationale, Benjamin Bloom's mastery learning, and competency-based education quite explicitly puts the natural learning process into reverse... Behind the high-stepping O.B.E. jargon of transformational outcomes, learning paradigms, and empowerment lurk behaviouristic methods that are totally at odds with the Deming quest for quality. (Holt, 1993a:384)

However, Holt appears to be ill-informed, as T.Q.M. ideas have been combined with O.B.E. ideas to develop quality school management approaches in a number of schools in the U.S.A. and N.S.W., Australia. For example, the Outcomes-Driven Developmental Model (ODDM) contains elements selected from a diverse range of sources, including Bloom, Bock and Deming, in the creation of what Glasser (1990) considers the best example of a quality school. The use of Glasser's anti-behaviouristic strategies, C.T./R.T./Q.M., in the ODDM model reveals Holt's opinion incomplete knowledge about O.B.E. In addition, The Community College School District in Cedar Rapids, Iowa, also combined elements from T.Q.M. and O.B.E (Rowe, 1994).

An investigation of the relatedness between T.Q.M. and leadership in educational contexts undertaken by Hough (1993:4) observed :

There appears to be a clear evolutionary relationship between societal, economic, industrialised managerial attitudes when patterns of change are viewed on a global perspective... Our Western management thinking has become increasingly aware of the ideas and practices of the 'quality movement', as our societies have become increasingly focused on the greater productivity and achievements of the 'total quality' practices of other countries.

In this part of the literature review, the convergence of ideas about quality in business and educational contexts have been explained. The origins and use of the term "outcome" in both business and educational contexts have been explained. Use of

T.Q.M. and T.Q.E. ideas appear to have grown through demands for accountability in the use of corporate and public resources. The "quality movement" identified by Hough (1993), influenced demands for accountability and National policies for education in the U.S.A. and Australia (Chira, 1991; Beazley, 1992; Kemp, 1992).

T.Q.M. and T.Q.E. ideas have been incorporated in some O.B.E. approaches, and prompted the use of O.B.E. ideas in N.S.W. public schools. In Section 2, the contextual conditions for acceptance and use of O.B.E. ideas are further investigated.

Section 2. Accountability in Education and Educational Restructuring

This section reviews selected literature on accountability in education, and Quality Assurance practices. The context for the incorporation of O.B.E. ideas in Australia, and in particular, the use of O.B.E. ideas in N.S.W. public schools is also considered in this section.

Accountability for Schooling Outcomes.

Government policy development to ensure the accountability of schooling outcomes reflects the influence of corporate approaches to quality control and assurance. Development associated with Deming-style corporate quality approaches, with statistical tracking of schooling outcomes, are entrenched in Government policies at the national level in Britain, the U.S.A. and Australia. At the national level, the debates on appropriate National Standards are associated with the competitiveness of the international economic climate. The corporate concern for gathering information from education systems and schools to obtain both quantifiable and qualitative data on

management, teaching and learning outcomes appears to be a dominant concern in all three countries.

More recently, Deming clarified his attitudes on the application of business concepts in educational contexts and commented :

We go overboard on words. Society should be the beneficiary. We don't have customers in education. Don't forget your horse sense. (Holt, 1993b:329)

This statement seems to be contradictory to earlier claims by Glasser that Deming had been noted as saying that there is nothing that he teaches that "could not be applied in any country and work as well in a school as in a factory" (Glasser, 1991:59). However, Glasser has recognized that Deming's ideas can be divided into two parts, which perhaps comprise the essential nature of Deming's approach to quality management: i) the psychology of how to manage workers, and ii) the statistical methods that workers need to use to achieve quality. The importance of the psychological base to quality management can be demonstrated through Deming's claim (Holt, 1993b:330) that the:

research shows that the climate of an organization influences an individual's contribution far more than the individual himself... The way people work together is what produces excellence.

The importance of intrinsic worker motivation in the workplace, as compared with a dependence on extrinsic techniques, such as performance measures, is a central part of Deming's ideas about quality management. Holt goes on to discuss Deming's dislike of grading, rating, and testing. Holt also rejects proposals for improving schooling by formulating higher standards and enforcing them with performance assessment. For example, the Bush Administration's 1991 education strategy, "America 2000", is for Deming a "horrible example of numerical goals, tests, rewards, but no method" (Holt,1993;329).

This recent stance by Deming appears contradictory to his long-term advice to use statistical methods as a way to improve quality in the workplace. The contrast between Deming's recent criticisms for the use of performance measures and the setting of standards to be achieved in education, exemplified through developments in America, Australia and Britain at a national level to improve schooling, are substantial. The rhetoric associated with National Curriculum developments in Australia and the U.S.A. can be seen to be reflective of international competition in the business sector. As Chira (1991:3-4) reported in the New York Times:

Making America an educational as well as a military superpower will mean confronting several crises: the glaring failure of the worst students, the tolerance of mediocrity, and a national heritage of anti-intellectualism... Every American adult should be skilled and literate... The demands of international competition, however, are bound to force higher standards, greater selectivity and more clear-cut awards for academic achievement.

The quality concepts implemented in business and industry can be seen to have contributed to the national, politically-based agendas in education and National Standards debates. National debates about standards in education have resulted in a plethora of reports. Examples include the Coleman Report of 1966 (Spady, 1992:12) and the Scans Report of 1992 in the U.S.A., and the Finn (1991), Mayer (1992) and Carmichael (1992) reports in Australia. The essential desired qualities possessed by school graduates in terms of knowledge, skills (or competencies), values and attitudes (or orientations) had developed as focal issues. Education systems are being held accountable for the quality of those entering the workforce. In a climate of economic restraint and a shrinking public purse, contemporary organizational philosophies and the preferred lead-management styles propounded are seen as being inextricably linked with quality assurance strategies.

Accordingly, legislation action and national reports are focusing on the competencies and key performance indicators of quality to be used in order to evaluate the skills of the workforce, assure the quality of organizations in the public arena and judge the performance of education systems (Ross et al., 1990:708-9).

The increasing use of O.B.E. management strategies as a means to foster improved student outcomes in the schooling process, and the incorporation of quality management concepts in educational contexts, has occurred during this period of debate about National Standards in Australia and the U.S.A. A greater focus on the generic outcomes of the schooling process appears to have prompted educators to search for, and implement, various means of facilitating quality schools. Indeed, the very basis for the development of exit outcomes in schools can be seen to be related to a recognition that there are certain qualities in school graduates desired by the community. The "community" or "stake-holders" could be interest groups including parents, the business and industry sector, or groups dealing in the political sphere. The expectations for schooling are being redefined, restructured and readjusted as a variety of pressures for reform are being brought to bear on education processes.

The Context for O.B.E. in Australia

In any exploration of the contextual factors leading to the use of O.B.E. in the N.S.W. public school system, the national and state "climates" for education need to be overviewed. First, this overview is needed to understand the processes facilitating or hindering educators using O.B.E. approaches in practical situations.

School effectiveness programs were conducted in both the U.S.A. and Australia during the 1980's, reflecting the growing awareness in business, industry and politics of the need for effective school management. During the 1990's the development of quality school programs, sponsored at national levels, have occurred in both Australia and the U.S.A. In the international context, an international report "Schools and Quality" (1989) in Chapman et al. (1991) exemplifies the nature of these developments. Literature about successful schools (Ramsey et al., 1987) and school improvement (King and Saphier, 1985; Wagner, 1993) reveal the inter-relatedness of early programs to school quality. For example, the "Effective Schools Project" began in Australia in 1992, emphasised the importance of school "climate", and the concept of students as "the centrepiece of an

effective school" (Banks et al., 1991:12). In the N.S.W. public school system, the "Effective Schools Development Program" of the late 1980's preceded this national project.

The Australian context for changes in approach to education is one in which there has been a recognition in political and business circles that Australia needs to develop a more competitive economy, with efficient use of resources and the development of national and global perspectives in strategic planning. The Honorable Kim Beazley, the Australian Federal Minister of Employment, Education and Training in 1992, highlighted national concerns for Australia to build a well-developed skills base through the promotion of wider educational participation and the need to monitor the quality of educational outcomes. Beazley emphasised the Victorian Education Ministries' leading role in:

improving its educational accountability mechanisms through the collection of data on student outcomes. High quality data is essential to provide true educational accountability and to monitor students' educational performance... Better quality information is needed at all levels for making decisions on resource allocation, as well as to monitor the educational progress of specific groups.

A national perspective to curriculum development in Australia has resulted from Federal Government policy statements such as that expressed by Beazley. Australia's national curriculum developments were initiated through the "Hobart Declaration on Schooling" of 1989. The Commonwealth, State and Territory Ministers for Education established ten "common and agreed national goals for schooling" and provided a structure for co-operation between the national, state and territory governments of Australia. (N.S.W. Board of Studies Bulletin, 1993:4). The Finn (1991), Mayer (1992) and Carmichael (1992) reports resulted from these national endeavours, dealing with "key competencies" and training issues. These "key competencies" and training issues seen in these reports are comparable to the specification of essential skills and competencies that have occurred in the U.S.A. in the Scans Report (1992), New Zealand and the United Kingdom. A visual model of similarities between these reports

was published in a N.S.W. D.S.E. document, "The Future Role of the School Certificate" (1993:27).

Jessup (1991:128) identified the assumptions and contextual reasons why the outcomes of education and training in the United Kingdom have been specified. These assumptions suggests outcomes can be pre-determined and stated. Jessup's views are comparable to American Competency-Based Education (C.B.E.) concepts, as described by Spady (1977). However, the British approach was designed to be driven from a nationally-determined point of view, whereas the American approach originally emphasised state- determined "outcome (competency) demonstrations" as a condition for student promotion or graduation (Spady, 1977:16-17). Spady's view of outcomes at the time was similar to the generic British and Australian interpretations of "outcomes" developed at a later date. For example, Jessup (1991:129) said:

Educational outcomes are by definition more generic and diffuse. We have plenty of experience of what basic educational outcomes are needed, at least in the core areas... If the outcomes are defined in a progressive framework such as the National Curriculum, students can be encouraged to progress as far as they are able.

Within this statement is embodied the educational intent of "curriculum outcomes" also determined at a national or state level in Australia. Australian national moves towards a student learning outcomes approach have been explained by Boston (1992d:30) who said:

Australia is now moving towards an outcomes(sic)-based education system, in common with many other developed countries. This means an emphasis on what students are expected to achieve, It is a change from emphasising the experiences students might have or the time they have spent working in a course or subject. The moves towards an outcomes basis is associated with a call for more explicit specification of what should be valued and reported on in schools.

The Australian National Curriculum, from the stance taken in Boston's statement, appears to have been developed without close reference to the associated strategic planning components of the American O.B.E. models. The American O.B.E. models

incorporate management, philosophical, welfare, teaching and learning strategies which align all of the planning components within a school or system of schools. The approach taken in the N.S.W. D.S.E. by the Ministry of Education and the Board of Studies to March 1993, can be said to reflect a curriculum position which is different in strategic intent to the American O.B.E. models.

With the use of O.B.E. ideas some educators in N.S.W. schools have attempted to synthesize and implement components of State-determined curriculum policies, elements of American O.B.E. models and, in some cases, specific outcomes suited to local contexts (Rowe, 1994). Some individual schools or clusters of schools in N.S.W. had been attempting to achieve an alignment of the specified curriculum learning outcomes attached to syllabuses by the Board of Studies with local strategic priorities, such as school vision statements or negotiated learner exit outcomes (Hirst, 1994). It is apparent that some N.S.W. schools had attempted to create a synthesis of a State-determined framework for the implementation of syllabus outcomes, with components of American O.B.E. models. This approach to "outcomes" involves wider strategic planning in a school than a focus simply on generic curriculum outcomes.

Educators in N.S.W. have been challenged to synthesize a broad range of relatively recent changes in management, teaching and learning strategies to achieve "enhanced student learning outcomes" (Boston, 1992c:10). Some educators have apparently met this challenge by personally sourcing O.B.E. ideas directly from American O.B.E. models. Quality Assurance procedures within the D.S.E., instituted for political and public accountability purposes, also contributed to the contextual conditions for O.B.E. innovation.

The Assurance of Quality

School restructuring with the devolution of some responsibilities for educational outcomes to schools and associated agencies, such as the Board of Studies, occurred in N.S.W. with the advent of Liberal/National Party Government in the late 1980's. In

April 1988, a "far- ranging review of management practices" was commissioned by the N.S.W. Minister for Education and Youth Affairs at the time, Terry Metherell. Headed by Brian Scott, the management review was completed in 1990, recommending the development of a more responsive state school system. The effect of changes in management policy initiated by N.S.W. Government legislation resulted in a process of restructuring of the D.S.E. In a move designed to improve system and student outcomes on a continuous improvement basis, the restructuring contained some elements compatible with T.Q.M. ideals. Quality Assurance (Q.A.) processes can be seen as part of a cycle of ongoing system and school monitoring. Ken Boston (1992b:3), the N.S.W. Director-General of Education, emphasised:

There must be review and monitoring processes at all levels in the system... In a publicly owned and funded education system, it is not sufficient just to make sure and be sure. It is also necessary to provide others with assurance.

The systems' level concern with measuring and reporting of student learning and school outcomes is a reflection of widespread contemporary concerns, in common with the business sector, to be accountable for the use of public resources. The Schools' Renewal External Council of Review's second annual report emphasised:

The continued success of the implementation of School's Renewal in 1992 would depend to a large extent on the Department's ability to base its planning and priority setting increasingly on the outcome data aggregated from schools. (Scott, 1992:3)

The devolution and certain changes which took place in the N.S.W. D.S.E., after 1988, can be attributed partially to policy decisions which recognized the international growth of quality education concepts and the shift in organizational cultures from a provider-centred to a client-centred, marketing stance (Parkes and Thompson, 1989:106). This approach has similarities to T.Q.M. quality controls, which involve monitoring and accounting for client-centred outcomes. A British report, "Management For A Purpose" by the Good Management Practice Group of 1987, suggested:

Good management practice within efficiency and effectiveness enforces the principles of: a) a conjunction of responsibility and authority; b) the devolution of responsibility; c) the location of accountability (and) d) decision making and accountability to occur within a reasonable time span. (Parkes et al., 1989:115)

The management practices in this British report reveals ideas similar to the N.S.W. D.S.E. approach to "assuring quality" within the public school system. In addition, the original structure of the N.S.W. school system also had British precursors. The language used within the system reflected a synthesis of British ideas about management and planning, corporate concepts of quality originating in the U.S.A. and Japan, Canadian educational applications of business "benchmarking", blended with N.S.W. tradition and innovation in policy and practice.

An example of the kinds of management ideas reflected in the N.S.W. public school system can be found in the work of Hargreaves and Hopkins (1991). One statement in this publication that has particular relevance to this research study relates to "tensions" between tradition and innovation that can be experienced in schools. Some schools in the N.S.W. public school system have individually determined to select elements of O.B.E. models, and incorporate these approaches into existing practices. A tension seems to exist between accountability to the state system and local desires to pursue innovation. As stated by Hargreaves and Hopkins (1991:86):

If a school ... leans too heavily towards development, it becomes so concerned with innovation that it becomes unstable by neglect of continuity; if a school... leans too heavily towards maintenance, it is so concerned with preserving the status quo that it cannot respond to the need for change. Schools which have a mixed profile ... understand that they cannot innovate to the point where they damage the maintenance system, but also that the maintenance system may inhibit the process of innovation.

This approach is similar to the stance taken by Boston (1992c:9) following Murphy (1989). Murphy observed:

A dynamic, ever-changing system of decentralisation and centralisation balances the benefits of local administrative autonomy with the pursuit of unified goals, and blends local leadership with central leadership in a system that helps each level to understand its responsibilities, limitations and prerogatives.

School management practices in N.S.W. reflect wider changes in management approaches in the business and political sectors for most of the twentieth century. Within Western business during the 1960's, for example, Management by Objectives (M.B.O.) was being advocated and popularised as a means of achieving effective "outputs" (Robson, 1983:5). Western business interests tended to implement management by objectives with great rapidity, without preparing the ground for effective inclusion by training personnel in a superficial manner to manage this approach. Lack of training and commitment on the part of managers and the workers to successfully manage the change apparently resulted in this strategy's lack of widespread acceptance (Robson, 1983).

Education in N.S.W. tended to reflect the M.B.O. approach until the late 1980's, and can still be seen as a common form of practice in some N.S.W. public schools in the mid-1990's. An example of some M.B.O. approaches to management remaining in the N.S.W. school system is the retention of "aims and objectives" in the Key Learning Area (K.L.A.) syllabi in tandem with "outcome" statements. However, the inclusion of syllabus outcomes in the N.S.W. approach to curriculum has ensured accountable learning outcomes are being clearly specified. Teaching and learning in N.S.W. public schools is expected to increasingly become oriented towards an outcomes focus as the starting point for classroom practices. From the observations of this researcher, training and development initiatives for teachers reveal a gradual and intentional shift from management by objectives to an outcomes focus between 1991 and 1995.

Quality Assurance in N.S.W. Public Schools

The quest for quality schooling outcomes in the N.S.W. D.S.E. resulted in the introduction of Q.A. procedures late in 1992. The rhetoric surrounding the introduction of Q.A. functions can assist in analysing the degree of relatedness between Deming corporate quality ideas, contemporary quality school developments in the public school system and O.B.E. concepts.

The Q.A. processes established in the South Australian and N.S.W. education departments reflect monitoring models established overseas in association with the restructuring of large organizations. In Australia, a "substantial re-organization and re-orientation of public sector organizations... has been underway for some time and continues unabated" (Cuttance, 1990:5).

In the N.S.W. public school system, management processes to build school climates conducive to achieving quality teaching and learning outcomes can be seen to have been moving towards the Deming idea of "building in" quality. Some Q.A. review practices in public schools monitor the "outputs" at the end of the schooling process. This approach is closely associated with the traditional British mode of assuring quality through inspection at the end of the line of management (Robson, 1983; Sprouster, 1984). However, the "Best Practice" statements dealing with "Teaching and Learning", "Governance and Management", and "Leadership and Culture" by the N.S.W. D.S.E. Quality Assurance (Q.A.) Directorate indicated a developing interest in "building in" quality to the system.

The development of Q.A. processes within the N.S.W. public school system can be traced through publications by the Assistant Director- General (Q.A.), Peter Cuttance (1990, 1992, 1995). The paper "Building High Performance School Systems" is particularly relevant to this research study. Cuttance reviews the development of quality ideas from a global perspective, relating developments to the Australian context. Cuttance (1995:5) observed:

While the strategies of T.Q.M. may be highly relevant at particular stages of the life-cycle of a school, other strategies which have grown out of the extensive experience of change and development in the educational literature should not be lightly rejected. The lexicography of industrial processes, for a start, is unlikely to appeal to staff in schools and must therefore be a primary focus of T.Q.M. adaptation if the approach is to be of use to schools. The knowledge gained from the last two decades of school effectiveness research and the emerging emphasis on outcomes(sic)-based education provide perspectives that are highly relevant to school development at each stage of the life-cycle.

It is informative to compare the similarities and differences to the ideas of "building-in" quality and "reviewing" quality. Educators attempting to apply O.B.E. ideas in N.S.W. schools were working in a context that enabled individual schools to determine certain outcomes to suit the local context, and were also accountable at a state level for the quality of their efforts.

Sergiovanni and Corbally described potential difficulties for "loose" organizations in the "battle for quality". Sergiovanni and Corbally's early ideas about the nature of organizations, included statements such as:

Quality control in tightly structured organizations can be achieved by monitoring performance closely, by specifying in detail what routines will be followed, and by developing specific operational plans. (1984:ix)

However, Boston (1992c:8) stated that the "loose-tight" properties expounded by Peters and Waterman are characteristic of the restructuring of schools in N.S.W., and are:

not a cause for concern... It would be my contention that the N.S.W. education system is exhibiting simultaneously elements of centralisation, decentralization, participation, delegation and organizational devolution.

However, the implication here is suggestive that the emphasis on quality accountability rests with individual line agencies, inferring that perhaps line-management, rather than lead-management approaches, remain in place as the most common form of managerial practice. Sergiovanni's (1992:22) more recent statements suggest that monitoring teacher performance and school performance:

substitutes for true accountability, but only processes that are subsumed under accountability... In value-added leadership, monitoring is transcended in favour of true accountability.

The inference here is that T.Q.M. in the Japanese manner may not be achievable in a system where traditional line-management practices remain as the most common form of management.

The use and development of O.B.E. ideas in some N.S.W. public schools needs to be understood within this context of management practices undergoing repeated adjustment. A possible influence on the manner in which O.B.E. ideas may be used in some N.S.W. public schools are shifts in attitudes towards leadership styles in both business and educational contexts.

Leadership Styles and the Context for O.B.E.

Concepts of a congruence between business and educational leadership have been both criticised and enthusiastically adopted in educational contexts. Criticism of the idea of congruence between business and educational practices have tended to focus their criticisms at the learning outcomes and values level (Towers, 1992; Kaplan, 1994; McDonough, 1994).

An O.B.E. approach to school practice has been described as having "traditional", "transitional" or "transformational" qualities, which deal with the nature of leadership in schools as well as curriculum outcomes (Spady, 1993). Spady has commented extensively on the relatedness between the available literature. In relation to the impact of quality management and organizational excellence ideas in American business and educational administration during the 1980's, Spady (1986:46) has noted the:

dissimilarity of assumptions and thinking between documents related to corporate excellence and those relating to education. The differences were with the assumptions made about the organizational structuring and operations that would bring that quality of outcomes about. However, I also observed at the same time the strong similarities between the Peters and Waterman work and the best of educational practice with which I was familiar.

Statements such as the Spady statement form the crucial links between understanding the nature of "transformational" O.B.E. approaches to whole-school planning, and the difference of a "traditional" approach to O.B.E., which tends to deal only with curriculum outcomes. This traditional approach can be exemplified by the N.S.W. Board of Studies inclusion of general learning outcomes to be achieved in syllabus documents.

To Spady's list of leadership styles can be added the idea of "transactional" leadership, as described by Sergiovanni. The work of Burns (1978, in Sergiovanni, 1992) had a substantial influence on shaping the ideas of leadership theorists, with Burns identifying "transactional" and "transformational" as the two kinds of leadership. Sergiovanni (1992:31) explained:

In transactional leadership, leaders and followers exchange needs and services in order to accomplish independent objectives... In transformational leadership, by contrast, leaders and followers are united in pursuit of higher-level goals that are common to both.

Sergiovanni appears not to make reference directly to Deming's ideas on statistical control and quality management, but the qualities of leadership inferred are comparable in nature. Likewise, the transformational qualities for O.B.E. school leadership discussed in the available literature are comparable to Sergiovanni's concepts of leadership. Developing Burns' ideas further, Sergiovanni described "value-added leadership", which he sees as being highly effective. Sergiovanni (1992:41) explains that "value-added" leadership reveals the following characteristics:

1. It provides the necessary latitude that enhances choices in an otherwise bureaucratic and political world of demands and constraints.
2. It is aligned with a realistic view of how schools and other enterprises actually work, thus its practices are practical.
3. It is based on a theory of human rationality that enhances both individual and organizational intelligence and performance.
4. It responds to higher-order psychological and spiritual needs that lead to extraordinary commitment, performance, and satisfaction.

Spady's ideas on leadership styles and Sergiovanni's approach show some similarity in the use of "alignment", "higher -order" considerations and the idea of "transformational" leadership. Sergiovanni's (1992) ideas on fulfilling workplace "psychological needs" are also similar to Glasser's Quality Management (Q.M.).

Section 2 of the literature review has investigated international and national efforts to improve the quality of education systems, resulting in a growing interest in O.B.E. ideas. Restructuring in the N.S.W. D.S.E. and the development of Quality Assurance processes to both "build in" and monitor educational outcomes set part of the contextual conditions for O.B.E. The development of ideas about "transactional" and "transformative" school leadership also contributed to educators exploring ways to achieve quality educational outcomes.

Section 3. Origins of O.B.E. in Educational Research and Psychology

A wide range of ideas from educational research and alternative psychology have been incorporated into O.B.E. models. The dominant sources of these ideas will be explained in Section 3, with apparent links to the N.S.W. D.S.E. context being indicated.

Origins of O.B.E. in Psychology

Some O.B.E. practitioners make use of the communication and management theories of Glasser, in addition to the literature reviewed on leadership styles (Vickery, 1988; Glasser, 1990; Mamary, 1993). Early influences on Glasser's ideas are not explained in most of his books, but a passing brief reference has been found to the work of Powers in the area of Control Theory (Glasser, 1991:60).

Origins of Control Theory.

Some educators object to theories or techniques from other forms of human endeavour, such as business contexts, impacting on or being used in educational contexts. However, such influences can be seen to have occurred in post-modern times. In order to assess the impact and potential usefulness of these ideas, an investigation of the origins of the ideas can be most informative in guiding action and practice in educational contexts.

Originally a concept applied to engineering contexts, Control Theory (C.T.) was subsequently interpreted and developed for use in counselling, then in instructional settings, and more recently in a quality management context. Glasser (source unidentified) explains C.T. as a:

new theory of how we function as human beings,... which explains clearly why we should change to the management psychology that Deming recommends... The knowledge of how to apply control theory to the lives of human beings is less than 20 years old... I have expanded and clarified his (William Powers) theoretical ideas to the point where it is now easy to use it in both one's life and work. I have also trained over 100 people who teach this theory all over the world, so it is readily available to any school or business that wants to learn it.

The literature distributed by Glasser's Institute for Control Theory, Reality Therapy and Quality Management (C.T./R.T./Q.M.) claims that all behaviour is our best attempt at a particular point of time to control ourselves, as we constantly try to satisfy our basic needs as human beings. Reality Therapy (R.T.), described as a method of counselling, is used to assist people in gaining more effective control over their everyday interactions. Glasser and Harrington worked together in 1954 to develop R.T., initially used in a reform school, then in other school contexts, and more recently in business contexts.

The use of William Power's original C.T. ideas can be seen as divergent to mainstream, traditional approaches to psychology, in which the stimulus- response approach to behaviourism had remained a basic assumption underlying most of the experiments conducted since the early stages of the 20th. Century. The common

difficulty some educators have in adjusting to an outcomes approach to educational planning can also be traced to the nature of their original teacher training during the 1940's to 1980's, when the dominant form of psychology underpinning teacher training in Australia tended to emphasise behavioural objectives and the importance of environmental causes for particular behaviours, such as the nature of the family circumstances and incumbent social practices.

C.T. as developed by Powers (1973; 1990), and further by Glasser, (1983, 1986) challenges the assumptions of traditional approaches to psychology, based on "scientific methods" of "cause and effect". Powers (1973) noted that the irregularities or perversities occurring during experiments, termed "variations", were assumed by psychologists to be a stimulus- response basis to behaviour. Powers was concerned that traditional psychology did not appear to consider:

that something inside the organism might be responsible for purposive behaviour. All behaviour is purposive all of the time, and the purposes are selected by the brain, not by the environment. (Powers, 1973:8)

Powers considers the generalizations that have occurred as an end result of most observations of behaviour to be inadequate. As an alternative, model- building to study behavioural theory and the internal causes of behaviour was suggested by Powers (1973:10-14). Central to Powers theory is the belief that "The organism is an environmental control system, not a reflex machine" (1990:2). This central idea is a formative influence on Glasser's subsequent use of C.T. (1983, 1986).

Another profound influence upon Glasser's mid- career work (1983 to 1986) can be seen to be Power's idea of reference levels (1973:45-47), with higher-level changing the conditions for lower-level functions in the brain. Remarkable convergence can be seen to exist between this idea and the later use of the idea of "higher-order competencies" and "higher -order exit outcomes" (Spady, 1991) planning by some O.B.E. practitioners, though the source of these ideas, and indeed the origin of most O.B.E. model components, are rarely clarified in the available literature. Considerable convergence

has also occurred between the philosophic intent of some O.B.E. approaches, such as the Outcome Driven Developmental Model (ODDM), and Powers ideas through Glasser's work. Both the ODDM model and Glasser can be seen to reject the idea of "behaviourism" as the cause for human motivation or action. For example, Powers stated (1973:ix) that:

Behaviourism... treats input as cause and output as effect and all that lies in between as having properties but no purposes. The humanists have denied this picture on intuitive and humanistic grounds, claiming that no machine can experience its inputs as well as respond to them, or conceptualize its own existence.

Subsequent use of Glasser's ideas by educators in establishing quality school management approaches reveals a need to understand the origins and purposes of C.T. The relationship between internalised human motivation to adopt certain types of behaviours and subsequent educational practices in the workplace, has direct applicability to the use of O.B.E. ideas in schools. The adoption of certain management styles, or behavioural responses to change processes initiated within the workplace, has a strong relationship to the effectiveness of educational change. The choice of change management strategies within schools may be linked with the individual's preparedness to "risk-take", the nature of the person's position within the D.S.E., and the characteristics of the particular context in which the individual operates.

In an education system, whether centrally controlled or with some devolution of decision-making to the school level, the extent of educational innovation is affected by many factors. For example, perceptions vary about the degree of freedom to initiate change of existing "paradigms" or initiation of new "frameworks". Powers work in the area of C.T. provides an explanation of educator "mind-set" when dealing with O.B.E. ideas. Powers (1973:260) has explained:

The history of civilization is a history of people attempting to control people ...the implication of our model is that (other approaches) of controlling people (are) probably the main cause of problems that control is supposed to cure ...People who want to control other people seldom admit they want to.

ODDM practitioners, such as Mamary, emphasise the importance of dealing initially with the areas of belief and expansion of the existing knowledge base before attempting major change to existing educational practice. Reactions to change in school systems can perhaps be explained through C.T. Powers (1973:264-5) explains that the rigorous theory of control systems had its first beginnings in the 1930's, and can show:

clearly how our methods of teaching principles and systems concepts... are themselves the roots of violence (and that) our principles and system concepts are incompatible with human nature... The behaviour of an animate object- an organism- is governed by internal reference signals (and) the behaviour of an organism can be influenced (if) organized around control of perceptions... Human beings feel intrinsic error (and) anything we do to each other that involves the creation of intrinsic error will result in reorganization.

Motivation for some educators, who have sought O.B.E. training or pursued O.B.E. agendas within their work contexts, have acted either as a result of "intuitive understandings" about the components of change that may work within those contexts, or as a result of the development of a knowledge base about O.B.E. An assessment of the contextual conditions within the N.S.W. D.S.E. that may have supported or restricted the incorporation of O.B.E. ideas into current practices needs to consider these ideas.

Powers, in partnership with R. J. Robertson, further clarified his philosophical viewpoint by explaining the influence Thomas Kuhn had in his "conception that scientific progress consists of periodic revolutions in thought called paradigm shifts", and sees these shifts occurring when "scholars who have a sense (however dim) that current theories are no longer adequate to extend the frontiers of their science" (Powers et al., 1990:1). This viewpoint can be seen to be particularly relevant to the mode of operation of O.B.E. consultants. Alternative paradigms have been made available to some N.S.W. public schools educators through training courses conducted by Spady (H.S.P.-O.B.E.) and Mamary (ODDM). These courses focus on a systems approach to facilitating O.B.E. change, suggesting that beliefs about educational management, teaching and learning be initially dealt with in schools.

Glasser's Control Theory, Reality Therapy and Quality Management.

Educators applying O.B.E. strategies in their schools have had varying degrees of contact or training in Glasser- style management and counselling techniques. This circumstance is important to consider in any research dealing with O.B.E. in educational contexts. The effects of the Glasser training approach is therefore also important in understanding the development and application of some O.B.E. models in the U.S.A. and Australia.

Glasser's C.T./R.T./Q.M. training techniques, include a "Basic Week", which assists educators in setting the environment and building the trust that is considered by Glasser to be the underlying factor to quality management. Through involvement in workshops, participants learn how to develop "a warm, safe, trusting environment", in which the "client" is ready to disclose during the counselling process. Questioning techniques are practiced during role plays, so that workshop participants gain experience and confidence in working through the process of Reality Therapy. The two dominant components of Reality Therapy, setting the environment and working through the processes that lead to change, underpin Glasser's approach. These conditions can lead to quality management, and can be compared with Spady's ideas of school organization setting the conditions for success.

Just as Power's C.T. approach was derived from the confluence of several lines of thinking, including 'systems theory' and a claimed radical interpretation of psychology, likewise Glasser's approach to C.T./R.T./Q.M. reveals the convergence of modes of thinking from a variety of sources. From this researcher's point of view, such "consultancy packages" can be regularly updated to cater for the shifting demands of the "educational marketplace", and become "eclectic" in nature.

Glasser's ideas impacted on student management procedures used in some N.S.W. public schools during the 1980's, through programs such as the Ten Steps to Discipline Program. These early contacts preceded any contact with O.B.E. ideas in N.S.W. public schools. The development of Glasser's ideas can be traced through his publications such

as "Mental Health or Mental Illness" (1961), "Reality Therapy" (1965), "Schools Without Failure" (1969), "Control Theory" (1983), "Control Theory in the Classroom" (1986), and "The Quality School" (1990). Reflected in the chronological nature of this list of Glasser's publications is the development of an increasing focus on a convergence of ideas from a variety of sources. An integrated approach is being applied in both business and educational contexts in Glasser's training courses. This integration can be seen as reflective of Glasser's own career path, with initial training as a chemical engineer in his late teens, a change of career to practicing psychologist in his early 20's, experience as a psychiatrist in programs for delinquent adolescents, and subsequently as a consultant in schools to develop student management programs.

By the late 1960's, Glasser (1969:4-5) was challenging established educational beliefs about failure and success through statements such as:

Blaming their failure on upon their homes, their communities, their culture, their background, their race or their poverty is a dead end for two reasons:1) it removes personal responsibility for failure, and 2) it does not recognize that school success is potentially open to all young people... if the built-in barriers to success are removed from all schools, many of the detrimental conditions can be overcome.

Glasser suggests that change is slow to occur because his strategies are a profound break with long-established tradition within education, and a similar problem can be seen to exist with the acceptance of management practice adjustment or change at a whole school or systems level in the inclusion of strategies to improve the quality of delivery of educational services. Another important element in Glasser's early writing (1969:50) is that:

schools usually do not teach a relevant curriculum; when they do, they fail to teach the child how he can relate this learning to his life outside of school.

This approach appears in various forms in O.B.E. models. These ideas have been conceptualised in visual models and ideas presented by Spady (1988, 1992) and Rowe

(1994). Essentially, these ideas can be seen to focus on establishing authentic contexts for learning related to life in the workplace.

A nexus has also occurred between O.B.E. and corporate concepts of quality (Glasser, 1990; Hoglund, 1991; Rowe, 1994). Glasser incorporated quality management concepts with ideas about psychology and education. Glasser (1990:89) stated that:

Just as there is nothing wrong with American workers, there is nothing wrong with our students. Deming is right; it is the way we manage them that must be changed.

Glasser propounded that workers, including teachers and students, will not achieve quality or productivity unless there is quality in what they are asked to do. Glasser by 1990 was relating quality schools extensively to Deming's corporate management strategies. Deming inferred that a manager is responsible for consistency of purpose and continuity in a quality organization. Deming stated (1982:5) that "Quality begins with the intent, which is fixed by management." Glasser (1990:31) has interpreted Deming's corporate concepts in educational terms.

It is our responsibility as a society to manage our schools so that all students get a quality education... the administrators, much more than the teachers, are responsible for improving the system.

The congruence occurring between Deming's and Glasser's approach to quality management, are ideas that have been used by some O.B.E. practitioners in the U.S.A. and N.S.W. For example, the Johnson City School District in New York State has received widespread recognition for the dramatic improvements in operational and student outcomes in the development of the ODDM model (Spady, 1986; Vickery, 1988; Glasser, 1990). These improvements in quality were achieved through collaborative processes such as teamwork, in which available research was synthesized into models considered exemplary by many educators. The research utilised by the Johnson City educators (Mamary, 1993) included Deming's work, Glasser's approach towards the management of people, as well as a wide range of educational research work dealing with learning processes.

Origins of O.B.E. in Educational Research

Underlying the development and continual expansion of O.B.E. paradigms is a reliance on educational research. This includes research on management, teaching, and the nature and maximization of learning to foster student success. Prominent O.B.E. consultants in the U.S.A. who have provided consultancy services in Australia, William Spady (1992) and Al. Mamary (1993 and 1994), refer extensively to the source of their ideas. The literature reviewed on O.B.E. in the remainder of this chapter deals largely with Spady's and Mamary's ideas, as the "key actors" selected for participation in this research study attended training courses conducted in N.S.W., Australia by these two O.B.E. consultants

In order to understand the implications which O.B.E. models have for existing educational practices, it is necessary to review some of the origins of O.B.E. ideas. O.B.E. challenges prevailing and traditional beliefs about management, teaching and learning. Provision of the O.B.E. knowledge base is necessary for educators to objectively assess the relative merits of O.B.E. models and components.

For the purposes of this research, a comprehensive review of the dominant early influences only on the development of O.B.E. has been undertaken. Constant additions to the teaching, learning and assessment dimensions of O.B.E. are continually occurring. The O.B.E. models are therefore continually being adapted and expanded to changing educational contextual conditions. The parameters of this research study have been restricted to identifying and studying some dominant original O.B.E. component inclusions in America and N.S.W. up to March 1995.

Dominant Precursors of O.B.E.

The dominant influences on O.B.E. as acknowledged by Spady and Mamary are Carroll, Bloom and Block. Some of the components of the H.S.P. -O.B.E. (Spady, 1992) can be directly traced to the work of these educational researchers. Links between Mastery

Learning (M.L.) and O.B.E. can be traced to Tyler's 1949 text, the "Basic Principles of Curriculum and Instruction". Further, King and Evans (1991:73) stated that:

Tyler noted the importance of the objective for systematically planning educational experiences, stating that a well-written objective should identify both the behaviour to be developed in the student and the area of content or of life in which the behaviour is to be applied.

The foundations upon which M.L. and O.B.E. were subsequently built included the taxonomies of objectives for the cognitive and affective domains of learning developed by Bloom and his research student colleagues at the University of Chicago, as well as the Mager's work on behavioural objectives (King and Tyler, 1991:73). Surprisingly, O.B.E. later included Glasser's approach to psychology into O.B.E. models, and this approach was diametrically opposed to the behavioural objectives approach in its basic premises.

The influence of Carroll in the development of M.L strategies, underpinning most O.B.E. approaches to school learning, is acknowledged by Bloom. Explaining the origins of M.L. approaches, Bloom (1974:685) said:

Other approaches to Mastery Learning were developed, some before Carroll's model was published, that were based on the idea that individuals differ in their learning rates and some attempt to individualize the learning rate with a fixed set of learning materials would enable most students to achieve the criterion of mastery for each learning unit in a course sequence.

Subsequent educators, however, relied heavily on Carroll's original 1963 paper as the embodiment of most of the challenges facing modern education that needed to be addressed. Carroll (in Bloom, 1968:50) proposed that:

If students are normally distributed with respect to aptitude for some subject and all students are given the same instruction(in terms of amount and quality of instruction and learning time allowed), the achievement measured at the subject's completion will be normally distributed... Conversely, if the students are normally distributed with respect to aptitude, but the kind and quality of instruction and learning time allowed are made appropriate to the characteristics and needs of each learner, the majority of students will achieve subject mastery.

Encapsulated in this statement are the challenges to the beliefs of a complete generation of educators, particularly in systems that have traditionally recognized norm-referenced modes of student assessment as the means to gauging student achievement, and the teaching methods that focused on whole-group strategies rather than individual need. The quality of teaching and learning has been defined in terms of school results, a situation apparently still endemic in the N.S.W. D.S.E. at the Years 11 and 12 level with the use of Higher School Certificate (H.S.C.) scaling processes and the Tertiary Entrance Rank (T.E.R.).

Carroll defined the variables for aptitude, and one of these variables was the amount of time required by the learner to attain mastery of a learning task. A great deal of the components found in Spady's 1988 conceptual O.B.E. models can be traced directly to Carroll's 1963 article. Indeed, this article challenged educators to test the very assumptions on which statements were based, and stimulated the direction for considerable further research.

Bloom was one of the educators who met the challenge. He suggested that if Carroll was correct, then learning mastery is theoretically available to all. Investigations of the teaching and learning practices to find the methods for helping each student, an activity that appears to have gained momentum in the 1980's and 1990's, has stemmed from such challenges. For example, Bloom (1968:53) stated that research activities conducted at the University of Chicago found that:

small-group study sessions consisting of two or three students are very effective in helping students overcome their learning difficulties in a co-operative rather than a competitive learning situation.

Bloom identified five preceding variables to learning success, including aptitudes for particular kinds of learning, quality of instruction, ability to understand instruction and the use of alternative methods and ability to understand the nature of the task to be performed. Perseverance increased by increasing the frequency of reward and the evidence of learning success. Most students could achieve mastery if allowed to spend

the necessary amount of time on a learning task. However, all of these elements can be found in Carroll's work (1963).

An additional source of influence on the subsequent development of O.B.E. was a study at the University of Chicago of the preconditions for success in learning. Although by the 1980's O.B.E. educators were specifying the use of stated exit outcomes "driving" planning and instruction in schools, in the 1960's and 1970's Bloom was using the widely-accepted terms "objectives" and "content" to describe the elements of the teaching-learning process. Bloom was also viewing "outcomes" in a traditional sense as an "output" of the process of teaching, and in educational publications of this period of time, the term "outcomes" appears to be used almost synonymously with the term "objectives".

More recently, distinctions are being made between learning outcomes, and the more transformational use of exit outcomes that tend to be "futures-oriented" in their nature by O.B.E. educators such as Mamary and Spady. In addition, Bloom also refers to behavioural objectives in relation to learning. In contrast, later O.B.E. practitioners, such as Mamary, rejected the concept of behavioural objectives through the use of Glasser's psychological base as the explanation for learner motivation. If one of the variables for student learning success is the quality of instruction (Carroll, 1963:729), then it can be argued that teacher mode of communication or conditions in the school in which teacher and student inter-relate have a great bearing on student achievement.

A large proportion of educators in N.S.W. might strongly relate to Bloom's (1971:130) observation that:

In both curriculum making and teaching, there is the act of breaking a subject and a set of behavioural objectives into a series of tasks and activities. If done properly, it will result in the student's developing the cognitive and affective characteristics which are the intended outcomes of the education process... To each anything is to have the final model to be attained while concentrating on one step at a time in the movement toward the goal.

In one sense, the use of language in relation to educational models in the difference between the terms "objective" and "outcome" can be seen as semantic. However, O.B.E.

management strategies have been related to the effectiveness of instructional processes. Accordingly, the implied and explicit intentions in the use of language by O.B.E. practitioners is important to understand.

In an approach further developed later by Spady (1988), Bloom challenged teachers to clarify the expectations transmitted to students, stressed that all schools should attempt to provide all students with successful learning experiences, that the "normal curve" is not sacred and reflects a random process, and that our educational efforts may be said to be unsuccessful to the extent that student achievement is "normally" distributed. By the late 1980's, some O.B.E. practitioners such as Spady were directly challenging the notion of "normal distribution", and introducing the idea of a "J" curve to symbolise the notion of all students achieving success.

The indivisible links between M.L., Learning for Mastery (L.F.M.) and O.B.E. were comprehensively reported by Block, Efthim and Burns in "Building Effective Mastery Learning Schools". Barber (in Block et al., 1989:15) explained that:

O.B.E. means an approach to reform within the total school system; that is, the umbrella under which all the practices of school operation will occur. The center pole supporting the umbrella represents mastery learning ideas... Mastery learning provides us with the support and the processes needed to begin total O.B.E. reform in our schools.

Block et al. also overview "Essential Operational Components of O.B.E.", developed by educators within the Network for Outcome-Based Schools (NO-BS) in the early 1980's. A 1986 version of this (p.14) describes the curriculum support, instructional support, assessment support, grouping (students), management support and information management support required in O.B.E. schools. This research study explores four areas related to these parameters, specifically the management, teaching, learning (including references to assessment) and student welfare implications of O.B.E. ideas utilised in N.S.W. public schools. As Block and his associates clearly identify, the acceptance of O.B.E. ideas by educators is closely linked with beliefs, individually-held or group-endorsed. The beliefs held by educators about approaches to learning, including M.L., need to be considered in the context of on-going debates about

excellence, equity, economy concerns and educator motivation. To this list, devised by Block in 1989, this researcher proposes that "quality" be added as a belief consideration. This component has been incorporated in M.L. approaches, such as those used by the Johnson City Schools in New York State, since the Block et al. book was published.

Development of Spady's Approach to O.B.E.

A conjunction of ideas from the corporate, psychological, educational research and practice sectors has occurred in the development of the particular approach to educational management and delivery known as O.B.E. The two pre-dominant forms of O.B.E. by the late 1980's, early 1990's in the U.S.A. were the High Success Program-O.B.E. (H.S.P.-O.B.E.) and the Johnson City ODDM approaches. Both models continue to add further components, as quality management shifts of philosophy occur in business, and business practices influence innovations in school management practices. Through consultative activities from a considerable number of O.B.E. practitioners in the U.S.A. by 1993, 42 states in the USA were mandating different degrees of O.B.E. strategies to improve schooling (King et al., 1993:16-19).

A considerable number of the elements that were used by Spady, in his Prevalent Practice Paradigm and O.B.E. models in use during the late 1980's, can be found in Carroll's original 1963 paper, "A Model of School Learning". Amongst the terms that Spady used from the Carroll paper (or subsequently through Bloom's use of the terms) are "success", "demonstration of performance", "opportunity" (time allowed for learning) and "quality of instruction". Here the origins of Spady's slogans of "All Students Can Learn and Succeed", "Success Breeds Success" and "Schools Control the Conditions for Success" can be perceived. Spady has also conceptualized and simplified O.B.E. strategic planning components in a visual form. (Spady, 1988: 1992)

Spady reviewed the rapid development of Competency Based Education (C.B.E.) in twenty states in the U.S.A., and expressed concerns about the nature of C.B.E.

This unco-ordinated movement is rapidly transforming into a bandwagon that promises to be the Great American Educational Fad of the 1970's. And like most self-respecting fads in American education over the past few decades, this C.B.E. bandwagon cannot be accused of having put its conceptual house in order before launching on its uncharted parade route and accumulating a vast and lively following. (Spady, 1977:9)

Spady (1977:10) also called for

1)... greater conceptual clarity to the meaning of C.B.E. than is current at present, 2) ... a framework against which the multiplicity of state-wide endeavours can be examined and identified, and 3)... a set of elements whose political, sociological, and educational implications need to be carefully scrutinized.

Spady's analysis of C.B.E. was then conducted using six elements he considered critical, these being "outcomes", "time", "instruction", "measurement", "certification" and "program adaptability". In terms that appear very similar to educational endeavours in Australia in the early 1990's, Spady stated that the "certification structure of a (C.B.E.) system defines the standards and framework for assessing, recording and crediting". However, he insists that the definition of competencies be extended to ensure the "concept of life-roles and their attendant activities (become) the prime movers in framing outcome goals, designing curricula, providing instruction, and measuring student performance" (Spady, 1977:10). In this latter statement, some of the other initial ideas underlying Spady's H.S.P.-O.B.E. model can be found. Spady refers to Carroll and Block, and makes an analogy between M.L. and C.B.E. as both having the "outcome goal" as their primary concern.

Spady and Mitchell's "Organizational Contexts for Implementing Outcome-Based Education" is particularly informative in regard to the philosophical and functional basis upon which O.B.E. was built. They identified:

four outcome domains which serve to create alternative outcome-based education programs (that) are not isolated in themselves. In various combinations they help resolve four fundamental social problems faced by every society and institution:

norm or standard setting, the creation of individual engagement, societal maintenance, and the stimulation of productive capacity. (1978a:11)

The subsequent evolution of different approaches to O.B.E. can perhaps be linked to the inherent nature of these four alternative bases of education. One interesting analogy can be made between ODDM, which has a twenty five year old history of evolution, and the "Development Based Model". Although a multiplicity of ideas gleaned from educational research has resulted in the ever-increasing expansion of ODDM, a central emphasis on the psychological base (Glasser), maximisation of student engagement in the learning process, and the stressing of instructional techniques in order to facilitate enhanced student learning outcomes can be compared with elements in the Mitchell and Spady overview.

The N.S.W. D.S.E. use of some O.B.E. ideas between 1991 and March 1995 can be analysed through reference to the Spady and Mitchell (1978) article. It can be argued that the state-wide attempt to satisfy a multitude of demands for the improved quality of education in N.S.W. has resulted in the creation of a blend of the four different approaches to O.B.E. In the Mitchell and Spady table, Competency-Based Education (incorporating "certification", "standards", "utility of outcomes", and "quality of outcomes") can be found in the "outcomes in a standards framework" approach being developed by the D.S.E. and the Board of Studies under the Liberal- National Party coalition government before March 1995.

Spady (1978b:17-18) foreshadowed further implication of what later became called O.B.E. through statements such as:

C.B.E. implies a major shift from time as the primary 'base' of operations to outcomes (or competencies) as that base, and from vague- referenced standards of accomplishment to more specific criterion- referenced ones... An outcome-based approach to schooling- which is what C.B.E. represents- would reverse the relationships between time and standards.

In "The Concept and Implications of Competency-Based Education", in a manner still relevant to the debates surrounding current versions of O.B.E., Spady (1978b:22) warned that:

C.B.E. does, indeed, ask both educators and the public to give up decades of habits and assumptions regarding the structures and methods of schooling, just at the time when accountability looks cheaper and safer than any other version of school reform.

In February, 1980 a meeting of fifty participants from at least ten American states formed the Network for Outcome-Based Schools (NO-BS). (Spady, 1982:127) The first Australian Outcome Based Education network was established in October, 1992 by the Australian Curriculum Studies Association (ACSA). This network was formed after the 1992 visit to Australia of Spady, largely sponsored by ACSA. Australia's second O.B.E. related network, representing the ODDM model, was set up by Mamary in September, 1993 under the auspices of "Partners for Learning" based in New York State, U.S.A.

N.O.-B.S. developed four philosophical premises underlying outcome-based school practices, which were designed to challenge existing notions of educator's attitudes and beliefs about teaching and learning. Also challenged were the strategic assumptions underlying organizational structures and practices.

Some other essential elements of Spady's later H.S.P.-O.B.E. consultancy materials, in the possession of this researcher, can be found in journal articles such as "The Emerging Paradigm of Organizational Excellence: Success Through Planned Adaptability" written for the Peabody Journal in 1986. Through an analysis of the Peters and Waterman eight themes for organizational excellence and innovative elements in the Johnson City Schools and New Caanen (Connecticut) Maths model, Spady (1986:62) recommended that organizations move towards a "goal and outcomes" approach to operating, and a:

movement away from tradition-bound organizational structures and procedures that have not been adaptive to the needs of the school's heterogeneous clientele. It is a paradigm that focuses on clear organizational direction and purpose.

Noted in reviewing the literature is the disappearance of the term "goal" attached to the term "outcomes" by the late 1980's. By this time, Spady (1988:7) was advocating three "key operational principles" in the application of O.B.E. ideas in school contexts.

These were:

- 1) Clarity of Focus
- 2) Expanded opportunity and instructional support
- 3) High expectations for learning success

He also developed five criteria for reform. These were listed in O.B.E. training course notes (1991) in possession of this researcher.

- 1) Better Outcomes for All Students
- 2) Better Opportunities for All to Succeed
- 3) Better Organization of Curriculum and Delivery
- 4) Better Use of Time and Resources
- 5) Expanded Role Definitions and Performance of Staff and Students.

All of these ideas can be traced back to educational research, particularly that conducted by Carroll, Block and Bloom. What Spady did achieve was the conceptualization of a wide variety of seemingly disparate ideas into practical models, presented in visual, spoken and written forms to educators. This approach clearly demonstrated the strategic implications of O.B.E., including the differences between "traditional" practices (Prevalent Practice Paradigm) and the O.B.E. paradigm (Spady, 1988:4-8). Spady's definition of O.B.E. had been refined by this time. For example, he stated that "O.B.E., therefore, is not a program, but a way of designing, delivering and documenting instruction in terms of its intended goals and outcomes" (Spady, 1988:5). The visual models presented in this paper, and Spady's seminars, challenged the existing beliefs and practices of educators. Spady (1988:4) also said that "by designing our educational system to achieve clearly defined exit outcomes, we will free ourselves from the traditional rigidity of schools and increase the likelihood that all students will learn".

During the three years between Autumn 1986 and Winter 1989, Spady worked with teachers and administrators as Director of the H.S.P.-O.B.E., using strategic concepts to "transform" schools, using "future:-driven" exit outcomes as the basis for management and curriculum design. Spady (1989:15) emphasised that the development of his consultancy approach was in response to being:

constantly challenged to find new and insightful ways of communicating the essential message of O.B.E. that allow educators, local policy-makers, parents and students to see new possibilities (rather) than simply problems in this unfamiliar and sometimes strange approach to schooling.

Spady's argument in this paper is focused on stressing that O.B.E. by 1989 was more than the components (Competency Testing, Basic Skills, Behavioural Objectives, Accountability and M.L.) usually associated at that time with O.B.E. He warned that to strongly associate O.B.E. with any one of these approaches to education could lead to a serious misunderstanding of O.B.E.'s ultimate intent and potential (Spady, 1989:16). However, this view needs to be evaluated by considering the ODDM model successes in M.L.

By 1991, Spady was identifying three circumstances in educational restructuring in the U.S.A. that had contributed to the rapidly expanding use of O.B.E. ideas in the U.S.A., but could be seen as examples of practices in "Traditional" O.B.E. or "Transitional" O.B.E. These were the apparent shift to a refocus on student learning, regional and state policy-making bodies demanding improved student outcomes as the basis for school restructuring efforts and the need to find a more appropriate paradigm for the post-modern environment in which educators were operating (Spady and Marshall, 1991:67). O.B.E. approaches to student learning improvements that had developed during the 1980's through a variety of approaches included M.L., O.B.I. (the Glendale Team) and the practices developed within the ODDM (Johnson City Schools District, New York State). Spady and Marshall by 1991 were stressing the need for real-life learning demonstrations to be facilitated in the classroom, in a quest to develop a transformational approach to student learning experiences. They were stressing that

most O.B.E. classroom practices of the time could be seen to be Curriculum Based Objectives (C.B.O.) in their nature, rather than "outcome-based" in a "transformational" sense by incorporating "life-role, futures-oriented performances" as a component part of classroom practice. An analogy between this perception, and the implementation of an "outcomes within a standards framework" in N.S.W. public schools in N.S.W., Australia before the state election in March 1991, will be investigated in greater depth within this thesis.

The importance of Spady's consultative group's work in facilitating the rapid acceptance of O.B.E. approaches to organizing components of schooling such as strategic planning or curriculum in the west and mid-western states of the U.S.A. between the late 1980's and 1995 cannot be under-estimated. An influence on preliminary experiments in some N.S.W. public schools in the area of O.B.E. occurred through the dispersion of Spady's ideas in journals such as "Educational Leadership". Spady's visits to Canberra, Sydney, Melbourne and Brisbane during 1992 resulted in the further exposure of Australian educators to O.B.E. ideas.

This visit to Australia occurred during a period of time when Australian school systems were under a great deal of political and public pressure to restructure and respond more effectively to the needs of the workplace and perceived future conditions. In an article written for the Canberra Times (1992) about Spady's visit, Jim Cumming (ACSA Executive Officer), wrote:

The need to transform traditional approaches to educating and training young people has emerged as a major challenge for the 1990's. The demand for fundamental reform by politicians, business representatives, expert committees, administrators, teachers- even students themselves- has now reached a crescendo that is shaking the very foundations of educational institutions generally, but schools in particular.

During the same period of time, Boston (1992d:30) was openly stating that:

Australia is now moving towards an outcomes- based education system in common with many other developed countries. This means an emphasis on what students are expected to achieve. It is a change from emphasising the experiences student might

have or the time they have spent working in a course or subject, This move towards an outcomes basis is associated with the call for more explicit specification of what should be valued and reported on in schools.

It is of importance to note here is that outcomes(sic) -based education does not necessarily mean the same thing by intent or practices as O.B.E., in the sense of ODDM or the H.S.P.-O.B.E. Implied is a purely curriculum focus, as was the case with the D.S.E.'s Curriculum Branch and the Board of Studies at the time. Documents which support this observation exist, but this researcher could not obtain permission to refer directly to the particular document

The materials Spady presented to Australian educators in 1992 were recorded in an ACSA publication of 1993 titled "Outcome-Based Education". This publication reveals the significant and rapid development of O.B.E. ideas between the period 1988 and late 1992, a view supported by a telephone conversation this researcher conducted with Spady in September, 1992. In this conversation, Spady stated that the 1992 consultancy materials were much further advanced than the materials obtained by this researcher during staff development activities at Parkrose Senior High School in Portland, Oregon, U.S.A. in 1991.

However, in comparing the earlier unpublished set of Parkrose School District, Portland, Oregon teacher development materials (in possession of this researcher), with Spady's 1992 consultancy materials, useful visual models such as the "O.B.E. Pyramid" (1992:3) can be found in common. This researcher's version of the pyramid, completed in an O.B.E. training course in 1991, is included in Appendix 5.

The models and concepts Spady had developed further by 1992 dealt with "culminating role performances and enabling competencies", "fundamental life- role performances", and "universal dimensions/ spheres of living". Spady's 1992 telephone comment, the 1988- 1991 consultancy materials in the possession of this researcher and the materials in the ACSA publication support the observation that O.B.E. paradigms are expanding rapidly. As well as expanding rapidly, the O.B.E. paradigms are eclectic in their nature, and are attempting a synthesis of the perceived "best available

information", based on research data, knowledge or current practices gleaned from a large number of American tertiary institutions and schools, the corporate sector or educational researchers.

While on tour in Australia in 1992, Spady was interviewed on two occasions on A.B.C. Radio for "Education Report:" on the 3rd of September and the 1st of October. Spady attributed two main events, the Coleman Report of 1966 and Carroll's 1963 report to being crucial in the development of O.B.E. Spady considered that the Coleman Report challenged existing beliefs in education and Carroll challenged teacher beliefs about expectations of students, student achievement based on intelligence levels, and schooling traditions of fixed time for student learning. Spady further suggests that:

what we want students to learn becomes the constant, becomes the fixed factor and how much time that might take becomes the variable."

Spady also attributes the development of O.B.E. to Benjamin Bloom's work with his graduate students over a period of 15 years from the late '60s to the early and middle'80s. Bloom and his students combined research efforts investigated what the learning potentials for students might be under different organizational conditions and the possibilities to achieve greater outcomes for students. (Spady interview, Sept. 3rd. 1992, ABC)

In Spady's opinion, schools are a self- defeating experience if "selecting and sorting mechanisms" are used in a traditional mode. Spady emphasised that "learning success is influenced by the ground rules and conditions educators set up", an opinion based on his consultancy experiences in American schools and some educational research. He interpreted "traditional" O.B.E. as the measurement of curriculum outcomes, and the organization of student learning through the use of a conventional, calendar driven way of organizing the time students spend in schools. As an alternative, Spady proposed learning for students organized around "role-performance" types of outcomes for students.

Spady suggested in the 1992 radio interviews that an alternative to "traditional" O.B.E. was to start with a set of expectations for students, and then to build the framework for student learning from the expected student exit outcomes. In doing so, traditional modes of measuring student achievement are challenged, and dramatically improved patterns of learning success in students are facilitated.

Spady also commented briefly on Australian policy-makers' concept of competencies. Competencies were a component put on an equal level with outcomes in Spady's "Prevalent Practice" and "O.B.E. Paradigm" (1988:5). Spady observed two areas relating to the Australian interpretation of competencies in the curriculum.

Most of the policy initiatives are emanating out of a concern for outcomes that relate to either the curriculum itself, as it is now constituted, or specifically to the arena of employment and employment type skills. Our work is broader than both of those... transformational O.B.E. is not focused on curriculum outcomes; that is, outcomes about the subject areas, but really is focused more on broad, role-performance capabilities of young people, and their ability to do complex things in real settings, in real situations relating to life (Spady, Oct. 8th interview, 1992. A.B.C. Radio)

Spady was concerned that the Carmichael approach to competencies did not automatically relate to "curriculum based outcomes" or the "compartmentalizing of content in traditional subjects in schools". He also expressed concern about educational policy-making, stating that:

the people who attended seminars were not the biggest policy-makers...(There) are government-level policy-makers who are out of reach to the educators who attended... very capable people who are interested, but who are not sure how to get "them" to listen to this kind of thinking (Spady, Oct. 8th, 1992. ABC Radio)

Spady's development of "traditional", "transitional" and "transformational" approaches to O.B.E. have been further developed by other H.S.P.-O.B.E. consultants, such as Al. Rowe. Rowe had incorporated Deming's quality concepts with H.S.P.-O.B.E. approaches implemented in the College Community Schools, Cedar Rapids, Iowa (Rowe, 1994). Deming's corporate ideas of quality have been incorporated in the other major O.B.E. model, ODDM, in a different manner through the use of Glasser's C.T./R.T./Q.M. ideas.

The Outcomes-Driven Developmental Model

The Outcomes-Driven Developmental Model (ODDM) was developed in the Johnson City Schools' District in New York State, U.S.A. over a 25 year period. The model has gleaned the "best available knowledge", as stated by Mamary at the 1993 ODDM training course held in Sydney (Unpublished notes in possession of this researcher). The model now incorporates a breadth of components, negotiated and developed in the Johnson City Schools that deal with collaborative modes of decision-making, C.T./R.T/Q.M. modes of communication, team-work, the development of a common vision, a common set of beliefs, a shared knowledge base, a common set of school and classroom practices, and endeavours to align all of these components for the direct benefit for students. Some of Deming's Quality Management approaches have been incorporated into ODDM through the inclusion of Glasser's approach to managing people.

Early articles about the Johnson City efforts included Champlin (1982) and Mamary and Rowe (1985), both dealing with aspects of M.L., and emphasising the strength of the instructional practices focus underlying the ODDM model. A comparison of the components of M.L. at Johnson City in 1985 through this article, and "Mastery Learning Three" as described by Mamary at training courses during 1993 show the degree of development, and increasingly student-oriented nature of instructional practices. In a validation study conducted in 1985 in the Johnson City Schools, Vickery described the initial stages of the ODDM model, where teachers between 1971 and 1978 implemented a M.L. approach to instruction across all grade levels. This paper is in an unpublished form, and available from the author. Vickery said:

In my research in the Johnson City Schools in the past year, several things have become apparent. First, student achievement is truly extraordinary and statistical analyses of test scores have established that. Second, the staff of educators is exceptional, not because they are brighter or better educated or more talented, but because they really do believe that they can enable most students to achieve at a very high level, because they are constantly improving in relevant ways through an excellent staff development program, and because they pull together more than most

educators through the use of a common instructional process designed to bring that belief to reality. And third, the administrative leadership at the district office level is first and foremost instructional leadership, committed to aligning all the facets of the district's operations in the pursuit of a common set of student outcomes. It is this last factor which has led to the development of ODDM.

Vickery described in detail the statistics used to justify these statements, and staff practices that facilitated success in student learning outcomes. He observed that staff shared a common language, derived from training in Bloom's work in M.L., related instructional strategies, Glasser's work in R.T., and Johnson and Johnson's co-operative learning groups approach. The manner in which staff development occurred was another factor which Vickery attributed to the success of the model, as was the style of leadership encouraged, which Vickery (1985:10) describes as "transformative". Smith (1992:8) emphasised the implementation dimension that the Johnson City schools have contributed to an understanding of O.B.E. approaches, demonstrating the strength of systemic change and the use of alignment strategies.

Some of the most informative articles and materials about ODDM are in an unpublished form, and only available through training programs conducted by Mamary. However, a number of articles have been published in the "Quality Outcomes Driven Education", "Outcomes" and "Educational Leadership" journals. For example, Brandt (1994) interviewed Mamary for "Educational Leadership" journal, in which the remarkable standardised test scores of the school district are attributed to the degree of team-work practiced and the climate established within the learning environment.

The achievement of the Johnson City Schools in raising both the standards achieved within the organization and the learning achievement of students "in a community historically beset by low academic expectations" was further described by Vickery (1988:52). In this article, Vickery (1988:54) describes briefly the responsibility placed on students to become self-directed learners.

Students know that if they assume responsibility for their part of the teaching-learning process, then they will receive additional time and instructional help. When students do not achieve- because of lack of effort, poor attendance, or a discipline problem- a district- wide policy based on William Glasser's Reality Therapy is uniformly applied to help them take responsibility for their own behaviour.

Vickery also provided some of the information about alignment strategies used within ODDM to ensure consensus occurred in the development and impact of the stated mission, the administrative, community and teacher support, and the implementation of "desired student exit behaviours" impacting on classroom instruction (Vickery,1990). The student exit behaviours, which were presented during Mamary's ODDM training courses in Australia (1992, 1993) in a visual manner, have been categorised into five areas. The five areas include self-esteem as a learner, thinking skills, self-direction as a learner, concern for others and the process skills of problem solving, communication, decision- making, accountability and group process.

Lawrence A. Rowe, who was the Assistant Superintendent for Instruction K-12 at Johnson City, emphasised in an unpublished 1991 article (in the possession of this researcher) the non- coercive mode of initiating change and ensuring the alignment of administration, teaching and learning within schools. The ODDM approach emphasises what this researcher calls "user- friendly" processes. These processes identify the needs of the organization, using Glasser's C.T./R.T/Q.M. techniques to reach consensus and ensure the success of the school improvement efforts. All administrators and teachers in the Johnson City Schools are trained in C.T./R.T. These approaches were being used as early as 1986 (Alessi et al.) in an unpublished article, "Staff Development as Part of the Whole".

ODDM deals comprehensively with the beliefs held by school and administrative staff about the nature of learning. Comprehensive, on-going teacher development provided a remarkable degree of support to teachers in the inclusion of the practices in the classroom. Alessi (1991) described the strategies used by the Johnson City lead-managers, Champlin and Mamary, to build the ODDM belief system and organizational practices over an extended period of time. "Transformational" lead- management

practices, reinforced with a comprehensive research base, psychological base, and philosophical base provided for teaching staff, underlie the management and teaching practices in the school district. Mamary (1991) described fourteen principles of quality education from an O.B.E. point of view, and detailed the comprehensiveness of the ODDM model.

Vickery's comments about the model were further made available to a wider audience in 1990 in a published article titled "ODDM: A Workable Model for Total School Improvement". This article focused dominantly on the concept of alignment of school functions, and the administrative, community and teacher support necessary to achieve the Johnson City Schools' specifically stated, desired learning outcomes.

It is informative to trace the development of the visual models of ODDM developed by the Johnson City Schools as a collegial effort through the leadership of Mamary. Between 1985 and 1987, for example, the slight simplification of some elements in the District's mission took place. In Vickery's 1985 paper, the stated Johnson City mission was "All Students Will Learn Well What Schools Want Them To Learn", and by 1987, as shown in Vickery's 1990 article, the mission stated that "All Students Will Learn Well". (Vickery, 1990:68) In summation, Vickery (p.70) claims:

ODDM offers the school district a framework for operating as a fully functioning organization- one capable of evaluating innovations and adopting appropriate ones rapidly and effectively.

Section 3 has reviewed the sources of ODDM, H.S.P.-O.B.E. and Glasser ideas made accessible to Australian educators. The use of these ideas in N.S.W. public schools will be investigated in the interview and questionnaire aspects of this study.

Conclusion

The literature reviewed revealed that O.B.E. models in the U.S.A. offer alternatives to "traditional" educational practices. O.B.E. models have been continually expanded in response to educational research, an integration of ideas from the corporate, sociological, psychological and educational sectors, and the application and refinement of theory in practice. As such, O.B.E. can be seen as eclectic in nature, undergoing continual modification to suit particular contextual conditions. The significant O.B.E. components in the U.S.A., identified by this researcher through this literature review, are:

- a) Lead-management practices, along Spady's continuum of "traditional", "transitional" or "transformational" approaches to education;
- b) Quality management ideas adapted to educational contexts from the corporate sector. A conjunction of ideas has occurred between Deming's concept of quality in the corporate sector and Glasse's C.T./ R.T./ Q.M concepts;
- c) Reflection on traditional beliefs and quality practices in management, teaching, learning and welfare in schools to inform decisions made by the "stake-holders";
- d) Continual expansion of the "knowledge base" for the whole school community. In other words, a O.B.E. learning community becomes the norm;
- e) Student exit outcomes, based on expected learner qualities (ODDM) and/ or futures conditions (Spady and the H.S.P. -O.B.E.), are determined and inform the nature of curriculum outcomes used in schools;

f) Curriculum approaches in educational contexts are "driven" by the nature of the exit outcomes negotiated with the "stake -holders" of education. This can occur at a local level in an autonomous manner, at a state level through mandate or potentially at the national level;

g) Alignment or linking of all the planning functions in educational contexts occurs, incorporating management, teaching, learning, assessment and student welfare practices.

The nature of the questions asked in this research study, in interviews conducted and questionnaires distributed, have been informed by these common components of O.B.E. models identified by this researcher. The analysis of the interviews in Chapter 4 and questionnaires in Chapter 5 was assisted by this literature review, and informed research findings about the use of O.B.E. in the N.S.W. D.S.E. context. The literature review further informed comparative analysis of interview and questionnaire data, with recommendations made for the use of O.B.E. ideas in the Australian context in the final chapter of this research study.