Facilitating Self-Directed Learning:  
The Nurse Educators’ Perspective

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Dedication

This thesis is dedicated to the loving memory of my father.
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I would like to extend my sincere appreciation to the following people:

The fourteen nurse educators who shared their perspectives so willingly and openly.

The two community colleges who kindly agreed to participate in this study.

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My friend, Michael, who started me on my search for the "red thread."

And last, but not least, my family, who supported me through this experience; "it was the best of times, it was the worst of times."
Abstract

The concept of self-directed learning was examined from the nurse educators' perspective. One structured interview, lasting between one and one-and-a half hours, was conducted with each of 14 nurse educators in two community college continuing education programs in nursing. One community college program encourages self-directed learning; the other encourages self-study and active participation in the teaching/learning process. All 14 interviews were tape-recorded and transcribed verbatim. Verbatim transcripts were analyzed for themes, patterns, and relationships utilizing analyst-constructed typologies. Six prerequisites or necessary conditions for facilitating self-directed learning in a community college continuing education program in nursing were identified. The crucial issue in facilitating self-directed learning was found to be the issue of teacher-control.
"Teaching is more difficult than learning because what teaching calls for is this: to let learn . . . ."

Martin Heidegger

"Education is suffering from narration sickness."

Paulo Freire

"It is the business of the teacher to arouse curiosity, not to satisfy it."

H.W. Cushing
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Chapter One

The Problem

I am writing these poems
From inside a lion,
And it's rather dark in here.
So please excuse the handwriting
Which may not be too clear.
But this afternoon by the lion's cage
I'm afraid I got too near.
And I'm writing these lines
From inside a lion,
And it's rather dark in here.

Shel Silverstein
It's Dark in Here

Preface

Writing a thesis is a challenge. When confusion abounds, this challenge becomes daunting. As a novice researcher, I worked my way through a maze of conflicting views about educational research, qualitative research, and the subject of this study, self-directed learning. It is within this context of confusion that the research problem is presented.
Introduction

This study is an examination of the concept of self-directed learning from the perspective of nurse educators in community college continuing education programs in nursing.

Background of the Problem

Nurses and other professionals have been urged to become self-directed and lifelong learners. Adult educators have been encouraged to facilitate self-directed learning. But there is little agreement about what it means to be a self-directed learner or what is involved in facilitating self-directed learning. Caffarella and O'Donnell (1988) claimed that educators cannot be sure that self-directed learning is good, that it is adults' preferred way of learning, or that adults either want or need help with it. The concept of self-directed learning is complex, confusing, and controversial.

Statement of the Problem Situation

What are the prerequisites or necessary conditions for facilitating self-directed learning in a community college continuing education program in nursing?

Purpose of the Study

The purpose of the study was to identify the prerequisites or conditions that must be present so that nurse educators can
facilitate self-directed learning in a community college continuing education program in nursing.

Research Questions
1. What are nurse educators' attitudes toward and understanding of the concept of self-directed learning?
2. What are nurse educators' attitudes toward and understanding of the process of facilitating self-directed learning?
3. What techniques do nurse educators use to facilitate self-directed learning?

Researcher's Assumptions
1. Self-directed learning should be encouraged in continuing nursing education.
2. To become a self-directed learner is a desirable and achievable goal for nurses.
3. Self-directed learning changes the role of the nurse educator from teacher to facilitator of personal and professional growth.

Rationale
Self-directed learning has been suggested as an approach to adult and continuing education (Kidd, 1973; Brundage & MacKeracher, 1980; Knowles, 1980; Cross, 1981; Wedemeyer, 1981; Darkenwald & Merriam, 1982; Apps, 1985; Mezirow, 1985a; Smith, 1985; Brookfield, 1986; Boud & Griffin, 1987). The acceptance and
importance of self-directed learning in continuing nursing education has been demonstrated; what is required is research on the behaviour of nurse educators as facilitators of self-directed learning (Clark, 1986). Research on self-directed learning at the level of practice has also been recommended by Kidd (1981).

Gerstner (1988) claimed that the role of the facilitator of self-directed learning is a crucial one. Despite this, she did not offer suggestions on how self-directed learning can be facilitated and she did not include the role of the facilitator among her recommendations for further research. The collaborative method (learners and the teacher share responsibility for planning, implementing, and evaluating learning) has been suggested as an appropriate approach for facilitating self-directed learning. But there is still no clear picture of how and when educators decide to use this method and with what effect (Pratt, 1988).

The importance of the facilitator's role has been corroborated by Hindle (1980) and Ziv (1980). The findings of Hindle's (1980) study, an investigation of significant learning experiences and self-directed learning among graduate nurses in a community college continuing education program in nursing, suggest that learners' self-directed efforts require assistance and structure. Ziv's (1980) study of the self-directed learning program at McMaster University School of Nursing highlighted the
difficulty of the role of the tutor and the high value students place on the tutor-student relationship.

According to Brockett and Darkenwald (1987), most research in adult learning has emphasized the role of the learner rather than the role of the teacher or facilitator, despite evidence that the teacher of adults can make a difference. The authors noted, however, that there may be inconsistencies between what many teachers believe and what they practice (corroborated by Schön, 1983, 1987; Brookfield, 1988a).

Brookfield (1984) stressed the need for research on the quality of self-directed learning. He claimed, "there is no theory of adult learning, much less a theory of self-directed learning" (Brookfield, 1985a, p. 62). "Despite its long history in nursing, the concept of self-directed learning is poorly understood; thus it offers a fertile area for further research" (Oddi, 1988, p. 180).

Importance of the Study

This study should increase our understanding of how to facilitate self-directed learning in continuing nursing education. It may also provide insight into what constitutes an effective adult educator in a community college setting. "Research focused on discovery, insight, and understanding from the perspectives of those being studied offers the greatest promise of making
significant contributions to the knowledge base and practice of education" (Merriam, 1988, p. 3).

Limitations of the Study
Reference may be made to the following issues but the study will not examine any of these issues in depth:
1. Self-directed learning from the perspective of the student or college.
2. How nursing content lends itself to self-directed learning.
3. How self-directed learning makes nurses better practitioners.

What is Educational Research?
"When we speak of research, we speak of a family of methods which share the characteristics of disciplined inquiry" (Shulman, 1981, p. 5). According to Shulman, disciplined inquiry is conducted and reported in such a way that the argument (of the research) can be painstakingly examined.

The primary purpose of research is to develop knowledge. To develop knowledge, educational researchers use different approaches. The research approach must match the research problem and researchers must be very clear about what they want to investigate. Because of the nature of education, Soltis (1984) urged researchers to study teaching empirically (quantitatively), interpretively (qualitatively), and normatively (critically). Educational researchers need to be concerned with how much was
learned, what meanings were grasped, and whether what was learned was desirable.

Educational researchers also need to understand the relationship between research and practice. Educational research must inform educational practice (Eisner, 1984; Stenhouse, 1984; Howe & Eisenhart, 1990). The need for research arises from the practice of teaching (Whitney, 1987). For Legge (1979), Long, Hiemstra and Associates (1980), Hopkins (1982), Schön (1983), and Garrison (1985), research is an activity of practitioners. Others go even further. Only theories that come from practice will apply to practice (Hunt, 1987). And Hammond (1989) claimed that the newer approaches to educational research (i.e., action research and participatory research) are the most likely to result in meaningful and permanent changes in practice.

Conflicting Views in Educational Research

There are two ways of thinking among educational researchers (Howe & Eisenhart, 1990). To one group of researchers, the research approach is based on epistemological grounds (the view held by Lincoln & Guba, 1985; Smith & Heshusias, 1986). For Smith (1983), the qualitative and quantitative approaches to research are more than alternative research methods; these approaches answer differently the epistemological question "what counts as knowledge?" That researchers have ignored this fundamental difference concerned Smith and Heshusias (1986). They argued that
the qualitative and quantitative approaches can be mixed but one should not conclude from this that the two perspectives are either compatible or complementary.

To the other group of researchers, the research approach is based on methodological grounds. Researchers focus on the particulars of various research methodologies rather than on epistemology.

A number of researchers have rejected the argument put forth by Smith and Heshusias (1986). The qualitative and quantitative approaches to research are often seen as complementary (Eisner, 1981; Owens, 1982; Arnold & Sherwen, 1986; Firestone, 1987). For some researchers, only the qualitative approach is valid (Howe & Eisenhart, 1990). But even this approach has been criticized for not going far enough. We need to go beyond anthropological inquiry and construct "our own unique conceptual apparatus and research methods" (Eisner, 1984, p. 451).

In a discussion of personal construct psychology and education, Pope and Keen (1981) suggested a return to the emphasis Kelly (1955) himself placed upon behaviour. To understand the perspectives of learners and teachers requires a monitoring of what learners and teachers do in addition to what they think and how they feel.

Candy (1988) reframed research into self-direction in adult education. "What is required is a broader and more inclusive perspective than any one participant, or group of participants,
may be able to bring to bear" (Candy, 1988, p. 283). We must look not only at individuals' perceptions but also at the factors that shape these perceptions. Research methods must emphasize the uniqueness of each individual's structure of meanings while recognizing the shared nature of human understanding. He urged the adoption of a constructivist perspective.

Confusion in Qualitative Research

Numerous terms have been used to describe qualitative research including "naturalistic," "postpositivistic," "ethnographic," "phenomenological," "subjective," "case study," "hermeneutic," and "humanistic" (Lincoln & Guba, 1985). According to Fetterman (1988), a multitude of qualitative approaches exist. Jacob (1987, 1988) agreed. She has urged researchers to consider qualitative research as a variety of approaches based on different traditions.

The term ethnography is not synonymous with qualitative research. Cultural perspective is the distinguishing feature of ethnography (Johnson & Johnson-Lee, 1988). To understand a culture, one must consider the social meanings behind events and not just the events themselves. "The purpose of ethnographic research is to describe and interpret cultural behaviour. . . . Cultural interpretation . . . is the essence of the ethnographic endeavour" (Wolcott, 1985, p. 190).
The term ethnography is also not synonymous with case study research (and case study research is not to be confused with qualitative research). In addition, there is little agreement on what constitutes case study research. Case studies examine a specific phenomenon and can be explanatory, exploratory, or descriptive. The essential characteristic of the case study, however, is its use of multiple sources of evidence (e.g., documents, artifacts, interviews, and observations) (Yin, 1984).

This loose language can be found with other terminology used in qualitative research. Merriam (1988) made a distinction between purposive and theoretical sampling. Purposive sampling is used before the data are gathered; theoretical sampling is used while the data are being collected (i.e., it is used for generating theory). (Actually, data are produced by human researchers; data are not out there waiting to be gathered or collected [Hammond, 1989].) Glaser and Strauss (1967) and Patton (1980) used the term theoretical sampling; Lincoln and Guba (1985) used both terms interchangeably.

The confusion continues with standards for qualitative research (Howe & Eisenhart, 1990). The credibility of qualitative research is enhanced through triangulation of the data. Mathison (1988), however, presented an alternative perspective of triangulation. She encouraged researchers to consider inconsistencies and contradictions in the data as well as convergence of evidence, the assumed goal of triangulation. To
construct plausible explanations, all three outcomes must be considered.

In defending the work of Jacob (1988), Lincoln (1989) stated, ". . . it is still not clear . . . what is meant by the omnibus term 'qualitative research,' although it is clear that different persons engage in it with radically different assumptions . . ." (Lincoln, 1989, p. 238).

Summary

When I began this research study, I did not have a clear understanding of qualitative research. I thought that by focusing on the nurse educators' perspective (i.e., the emic/insider's perspective) I was doing ethnography. And since the case study is considered the appropriate vehicle for reporting ethnography, I assumed I was doing a case study. But two questions puzzled me. In ethnography, the researcher has to provide an adequate context for the study, something I was not doing. Furthermore, my data analysis appeared to be superficial, to lack depth.

I struggled to come to grips with these two problems. It was Merriam (1988) who helped me to understand that using ethnographic techniques, such as the ethnographic interview, does not mean that one is doing ethnography. Upon further reflection it became obvious to me that not only was I not doing ethnography, but I was also not conducting an ethnographic interview. I realized that what I was attempting to do was to conduct a qualitative interview
with nurse educators and to do a qualitative analysis of their perspective on facilitating self-directed learning.

Something else became clear. Despite the confusion surrounding educational research, there has been a paradigm shift. There is now greater concern for meaningfulness in the research process and greater regard for qualitative methods.
Chapter Two

Review of Related Literature

Towards a Definition of Self-Directed Learning

"Adult self-directed learning remains weakly conceptualized, ill-defined, inadequately studied and tentatively comprehended" (Long, 1988, p. 1).

Long (1988) had problems with both self-directed and learning. He preferred self-direction in learning to self-
directed learning because it reflects the fact that for most people, self-direction in learning is a matter of degree. Self-direction in learning was also preferred by Cheren (1983) and Candy (1988) but was rejected by Gerstner (1988). She recommended learner self-directedness instead because it focuses on the learner, allowing the learner to choose the degree of self-direction, as well as suggesting the range of options available to the learner.

Long (1988) contemplated replacing self-directed learning with self-directed inquiry although he recognized that to omit the term learning would be controversial. Self-directed inquiry considers the nonlinear characteristics of learning, suggests that the learner is in control of the learning activity, and takes into account the external procedures involved in learning as well as the internal process that is part of learning.

Some of the confusion surrounding self-directed learning lies in the fact that self-direction in adult education refers not to one single phenomenon but to three different phenomena: self-direction as a personal attribute (personal autonomy), self-direction as self-teaching outside formal instructional settings (autodidaxy), and self-direction as a way of organizing instruction within formal instructional settings (learner-control) (Candy, 1988).

Self-direction has a situational dimension (Candy, 1988; Gerstner, 1988; Pratt, 1988). This suggests that self-direction
may not be a general trait of adulthood, a possible contradiction of Knowles' (1980) assumption about adults' self-concept. Self-direction has been conceived as a basic part of helping people to enhance and expand their learning skills (Cheren, 1983). It could be said that enhancing and expanding one's learning skills are a basic part of self-direction.

Knowles (1980) talked about self-directed learning methods and techniques. To the American Nurses Association, self-directed learning is an activity, one in which the learner takes the initiative and responsibility for the learning process (Toebe, Armstrong, & Watson, 1987). In Hegge's (1985) model for continuing nursing education through self-directed learning, the self-directed learning process consists of the following: assessing the learner, setting and resources; planning the learning experience; and evaluating the learner and the learning experience. But for Kasworm (1983) and Oddi (1987), self-directed learning is more than setting goals, developing strategies, choosing resources, and evaluating results. Self-directed learning has a psychological dimension. Oddi (1987) linked self-directed learning with the learner's personality; Kasworm (1983) linked self-directed learning and lifespan development.

Self-directed learning is an attitude that reflects our values and views about learning and adults (Hiemstra, 1982). Self-directed learning has been defined within the context of a democratic society. Learners have freedom to choose what is to be
learned, how and when it is to be learned, and how to evaluate their progress (Della-Dora & Blanchard, 1979; corroborated by Rogers, 1983). Self-directed learning has been seen as part of the process of becoming self-actualized (Rogers, 1983; Knox, 1986). Mezirow (1981) saw learner self-directedness as both the goal and the means of adult education. But for Mezirow (1978), it was perspective transformation that was crucial for adult learning. This is the process of becoming aware, through critical reflectivity, of the cultural and psychological assumptions that influence thinking and behaviour and taking action to overcome them. Freire (1970) called this new level of awareness conscientization. It is developed through praxis and directed at the structures of society to be transformed.

Brookfield (1988a) expressed concern about using self-directed learning to refer to an internal change of consciousness. He recognized that his earlier definition of self-directed learning, "when the techniques of self-direction are married to a critical scrutiny of existing values, beliefs, and social forms . . ." (Brookfield, 1985a, p. 63), neglected skill and content learning that often have little or nothing to do with critical consciousness. Caffarella and O'Donnell (1987) argued that a change in internal consciousness does not have to occur for self-directed learning to take place.

"Even though there is a growing body of literature about self-directed learning . . . it is still not a secure, nor a
thoroughly developed educational idea" (Griffin, 1985, p. 4519). Nevertheless, it is possible, when considering these various perspectives, to identify some salient features of self-directed learning. The learner has some control over his/her learning within or outside formal instructional settings. Self-directed learning has both a psychological dimension and a situational dimension that influence the learner's degree of self-direction. And this degree of self-direction is reflected in the learner's acquisition of self-directed learning skills or values leading to personal or social change.

Self-Directed Learning in Adult Education

"There is no universally acceptable definition of adult education" (Darkenwald & Merriam, 1982, p. 8). According to Eduard Lindeman, the "father" of adult education, ". . . adult education is designed to meet the changing needs of adults in a changing society; its definition will always remain somewhat fluid" (Stewart, 1987, p. 13).

What is clear are Lindeman's (1926) assumptions for the practice of adult education. Education is life (i.e., it is part of life rather than preparation for life). It follows, then, that adult education revolves around nonvocational ideals; the individual and the development of learning skills are more important than the job and the development of job skills. If education is life, then the learner's experience is the most
valuable resource. Subject matter, therefore, comes from the learner's experience; concern is with situations, not subjects. Process, then, takes precedence over content.

When one looks at Knowles' (1980) andragogical model, one can see Lindeman's influence. Andragogy is based on four assumptions for the practice of adult education: (a) as adults mature, they move from dependency to a self-directed personality; (b) experience is a rich resource for learning; (c) readiness to learn is oriented to real-life tasks or problems; and (d) concern is with the immediate application of knowledge. The andragogical process consists of methods and techniques for involving the learner in self-directed inquiry (Knowles, 1980). Self-directed learning lies at the heart of andragogy. The fact that adult education is concerned with helping people live more successfully (Darkenwald & Merriam, 1982) implies the necessity of lifelong learning and the need for people to become self-directed learners.

The usefulness of andragogy as a set of guiding principles for adult education has been questioned. Andragogy is neither unique to adults nor superior to pedagogy (Cross, 1981). It has been called "an incomplete theory of curriculum" (Jarvis, 1984, p. 38). Andragogy fails to recognize adults' intellectual abilities and learning orientation (Lam, 1985). For Davenport and Davenport (1984, 1987), selecting learning approaches has more to do with factors such as learning style, content, and goal of instruction than it does with age. Furthermore, "identifying our research
base and practice efforts with a concept [self-directed learning] which is still inadequately defined, conceptually suspect and poorly researched, may do us [adult educators] a great deal of harm" (Brookfield, 1988a, p. 12).

It has been argued that the concept of self-directed learning with its emphasis on equality (exemplified in the teacher/student relationship), freedom (freedom of choice and freedom from control), independence, and personal responsibility reflects Western values (Boyd & Apps, 1980; Brookfield, 1986; Gerstner, 1988). It has also been suggested that self-directed learning is a middle-class phenomenon (Boyd & Apps, 1980).

A word about the exclusion of vocational education from adult education is in order. By excluding vocational education from adult education, Lindeman did not intend to denigrate vocational education (Stewart, 1987). Lindeman felt that adult education has to go beyond vocational education. But he urged that vocational education, like all adult education, centre around the expressed needs of the learner. This notion is particularly relevant to this thesis because there still seems to be a need for health educators to view themselves as adult educators (Cranton & Kompf, 1989).

Self-Directed Learning in Continuing Nursing Education

Continuing nursing education has been defined as "any planned learning experience, undertaken by graduates of basic diploma and
baccalaureate nursing programs, which contributes to the fulfillment of personal and professional goals and leads to the enhancement of nursing practice, nursing education, nursing administration and nursing research" (Registered Nurses Association of Ontario, 1987, p. 1). A variety of educational opportunities are included in continuing nursing education (e.g., workshops, conferences, seminars, formal academic study, and self-directed learning activities). Registered nurses' associations in several provinces advocate voluntary participation in continuing nursing education. Nurses are seen as self-directed learners who are committed to lifelong learning and to individual responsibility for learning.

When one talks about self-directed learning in continuing nursing education, one is often talking about self-directed learning projects. This term was developed by Tough (1968, 1978, 1981) to describe adults' deliberate efforts to learn. It is synonymous with autodidaxy, defined by Candy (1988) as self-teaching outside formal instructional settings. Weir (1984), for example, investigated the processes and factors involved in the planning and conducting of job-related self-directed learning projects by practising nurses considered to be self-directed learners. Falconer (1980) examined the relationship between learning-oriented adults (determined by Boshier's Education Participation Scale) and their self-directed learning efforts.
Weir (1984) recommended that self-directed learning among nurses be recognized and that greater effort be made to prepare and assist self-directed learners. But Weir (1984) made no distinction between self-directed learning outside a formal instructional setting and self-directed learning within a formal instructional setting. My research findings will suggest that nurses in a formal instructional setting require assistance with self-directed learning. The desirability of assisting nurses with their self-directed learning projects, however, is open to question.

Nurse educators need to be very clear about what they mean by self-directed learning and what they see as the role of self-directed learning in continuing nursing education. Educators might be wise to keep in mind that "... learning ... is most meaningful when there is maximum 'personalization' of the experience. The learner learns best when in control of the learning process" (Registered Nurses Association of Ontario, 1987, p. 4).

**Autonomy**

The term *self-direction* is often used synonymously with autonomy and independence. When one raises concerns about the assumptions underlying andragogy, one is raising concerns about the notions of autonomy and self-direction in learning within formal instructional settings.
It is a mistake to assume that children are dependent learners and adults independent learners (Tennant, 1986). We cannot assume that all adults are independent learners (Candy, 1987). It may be that an educational goal—that we encourage learners' independence—has become confused with the educational truism that all adults are self-directed learners (Brookfield, 1988a). Tennant (1986) criticized Knowles (1980) for assuming that adults have the capacity to be self-directed (corroborated by Gerstner, 1988). He was bothered by the extent to which Knowles' andragogical model is guided by an adult's need or ability to be self-directing. Joblin (1988), on the other hand, claimed that adults have the capacity and the need to be self-directed. He saw children and youth, however, to be as self-directed as adults (corroborated by Day & Baskett, 1982; Brookfield, 1986).

Is it possible that Knowles (1980) has been misunderstood? Knowles' (1980) assumption that as adults mature they move from dependency to a self-directed personality implies that adults have the capacity to be self-directing. He also noted adults' "deep psychological need to be generally self-directing . . ." (Knowles, 1980, p. 43). What we seem to forget is the "movement" or transition from dependency to self-direction and that adults need help to be self-directing. Knowles (1980) acknowledged adults' need and capacity to be self-directing; he was not claiming that all adults are independent learners.
Rather than allow for different learning styles, learner-control (i.e., giving learners in formal instructional settings greater control over their learning) benefits those who can handle it but is detrimental to those who cannot (Candy, 1987). Once again, does this ignore the need to assist adults in their transition to self-direction? Brockett and Hiemstra (1985) cautioned us to avoid the pitfall of viewing self-directed learning as the best way to learn. "Perhaps it is more appropriate to think of self-directed learning as an ideal mode of learning for certain individuals and for certain situations" (Brockett & Hiemstra, 1985, p. 32). Pedagogy and andragogy are both appropriate, at different times and for different purposes, with children, adolescents, and adults (Brookfield, 1986; corroborated by Thompson, 1989).

Candy (1988) claimed we cannot be sure if increasing learner-control increases motivation for all students in all circumstances. He noted that in exam-oriented situations, for example, adults often prefer direction (corroborated by Thompson, 1989). This raises as many questions and concerns about evaluation as it does about learner-control.

It is assumed that learner-control recognizes the equality of adult learners and educators and that it models a changed power relationship (Candy, 1987). While the uniqueness of the adult learner is respected, it is the educator who has the subject matter expertise and the responsibility to use it (Candy, 1987).
The teacher has an obligation to try to ensure that certain things are learned (Powell, 1988). Chéné (1983) noted that shifting power to the learner conceals the fact that the teacher-learner relationship is one of power. Learners have to test their knowledge against the teacher/facilitator. "Pedagogically, their relationship is necessarily asymmetrical and the persuasive power of the teacher is an essential element in the development of learning" (Chéné, 1983, p. 44).

Self-directed learning does not mean that learners are wholly in control of their learning (Chéné, 1983; Brookfield, 1986). Self-direction in learning means achieving greater control in making decisions about one's learning (Cheren, 1983). The autonomous learner can learn independently but may decide that another mode is more appropriate (Higgs, 1988; corroborated by Chéné, 1983; Brookfield, 1985b; Pratt, 1988). While learner-control enhances one's competence as an autonomous learner, it does not always lead to personal autonomy (Candy, 1988).

According to Boud (1988):

What is important . . . is the attitude of teachers towards their students. It is not any technique or teaching method which is primarily needed but an attitude of acceptance and appreciation of views, desires and frames of reference of learners. Perhaps the single central quality which fosters autonomy is the quality of the relationship between teachers and learners which develops through this acceptance. (p. 39)
But "a person does not become autonomous in any final or absolute sense" (Candy, 1988, p. 47); autonomy has both a personal and a situational dimension (Candy, 1988; Gerstner, 1988). The concerns that have been expressed about the assumptions underlying andragogy relate to situational autonomy (Candy, 1988) or autonomy from institutional constraints (Gerstner, 1988). In other words, there is some independence from external direction.

Both of these authors talked about another kind of autonomy. For Gerstner (1988), it was a "state of internal cognitive and emotional freedom. . . . the individual must not be dependent on someone else for the validation or approval of their [sic] learning" (Gerstner, 1988, p. 128). She noted that this does not exclude dialogue with others in the process of learning. It is not clear if Gerstner was referring to autodidaxy since independence from others for the validation of learning is not possible within a formal instructional setting. But she went on to say that in the final analysis, meaning and significance for the learner must be freely understood through critical cognition. Gerstner seems to be agreeing with Hiemstra (1985) that critical reflection appears to be the key in an adult's creation of meaning and ultimately in self-direction.

Gerstner's concept sounds similar to epistemological autonomy, Candy's (1988) term for this other kind of autonomy. He defined it as the relationship between the learner and the thing learned. It refers to the meaning the learner ascribes to the
learning situation, the content being learned, and to his/her autonomy in learning. Epistemological autonomy, he said, must be understood if we are to appreciate what it means to be an autonomous learner.

Self-Directed Learning Readiness

Guglielmino (Guglielmino & Guglielmino, 1977-82) defined self-directed learning readiness as a set of attitudes, abilities, and personality characteristics that are needed for self-direction in learning. Guglielmino's Self-Directed Learning Readiness Scale is used extensively in a number of ways, including as a screening device for programs involving self-directed study and as an evaluation tool for educational programs designed to increase self-directed learning.

Brockett (1985) has reminded us that Guglielmino's scale measures perceived readiness, not actual self-directed learning behaviour. He found the scale to be inappropriate for adults with only a few years of schooling (i.e., the scale seems oriented to people with formal education). He suggested that further research try to determine "for what segments of the adult population and in what situations" (Brockett, 1985, p. 23) the scale is most appropriate. Field (1989), on the other hand, recommended that the scale no longer be used. He found the scale to be structurally unsound and not a valid measure of self-directed learning readiness.
Guglielmino's scale has been used in numerous studies. Savoie (1979) administered the scale to 152 nurses. She found self-directed learning readiness to be one of the variables that contributed most significantly to learner success in continuing nursing education courses that require a degree of learner self-direction. She defined self-directed learning readiness as an individual's concept of himself/herself as an independent learner and a love of learning.

The impact of learning contracts in higher education on adults' readiness and competencies for self-directed learning was investigated by Caffarella and Caffarella (1986). The Self-Directed Learning Competencies Self-Appraisal Form, developed by these authors, and Guglielmino's scale were administered at the beginning and end of the school term by six professors to their graduate students in adult education courses utilizing learning contracts. Caffarella and Caffarella (1986) concluded that contracts have little impact on developing self-directed learning readiness but have some impact on developing self-directed learning competencies.

As the authors indicated, the high pretest and posttest scores on Guglielmino's scale may have accounted, at least in part, for the lack of significant change in readiness scores. To suggest that there can be a change in competencies without a change in readiness is a contradiction (Field, 1989). Furthermore, Caffarella and Caffarella (1986) did not state
whether participants were told that Guglielmino's scale gathers
data on learning preferences and attitudes towards learning (i.e.,
it is important that participants not be aware that the scale
measures self-directed learning readiness). Because participants
also received the Self-Directed Learning Competencies Self-
Appraisal Form, it is likely they were aware of the researchers'
interest in self-directed learning readiness.

Adults vary in their readiness (and their desire and ability)
to be self-directed (Pratt, 1988; corroborated by Day & Baskett,
1982). Not all learners are comfortable or feel they can benefit
from an increase in learner-control (Candy, 1988). For Griffin
(1985), nonreadiness should be seen not as a deficiency but as an
indication of a preference for another way of learning. But self-
directed learning readiness is not some generic attribute; it is
subject- and context-specific (Candy, 1988; corroborated by
Joblin, 1988). How meaningful, then, are measurements of self-
directed learning readiness?

Perhaps if there were greater recognition of the transition
to self-direction, there would be less concern about self-directed
learning readiness. In learning for self-direction in the
classroom, learners undergo a personal transition, a shift in
their perspectives about teaching, learning, and themselves as
learners (Taylor, 1986). Taylor (1987) described a common
pattern, an inherent order in the experience of learning for self-
direction. It is a description of perspective transformation.
As learners go from a state of equilibrium to one of disorientation, they experience disconfirmation, a major discrepancy between expectations and experience. They proceed to name the problem, to identify this new learning situation, and to establish contact with their peers. What follows is an exploration phase in which learners gather both insight and confidence. As a result of reflecting on their experience, learners undergo a reorientation to learning and teaching that they share and test out with others.

Learning for self-direction is more than the acquisition of skills and procedures. It involves the learner's whole being (Taylor, 1987; corroborated by Boud, 1986). Teachers also experience a shift in their perspectives about learning, teaching, and themselves as teachers. Self-directed learning requires learners, teachers, and institutions themselves to explore and resolve their fears around self-directed learning issues (Ricard, 1982). It is through perspective transformation that one becomes ready for self-directed learning.

Autodidaxy

In his studies of adults' deliberate efforts to learn, Tough (1968, 1978, 1981) found that the typical adult conducted five learning projects in one year, that the project took a minimum of seven hours over a six-month period, and that the average project lasted 100 hours. Self-directed learning projects were undertaken
primarily for personal development with the intention of using acquired knowledge and skills. The learner handled most of the planning for the learning project with help from both resource people and written material. Tough found that adults greatly underestimated their own learning. He suggested that educators help learners improve their self-planned learning by encouraging them to become aware of how they learn and to develop a range of learning skills.

Caffarella and O'Donnell (1988) argued that educators cannot claim with certainty that adults either want or need help in self-directed learning. Unlike Tough, Spear (1988) found no evidence of detailed preplanning in self-directed learning projects. Nevertheless, learning projects proceeded logically and deliberately. He saw the organizing circumstance (i.e., the circumstances in the environment) as being responsible for structuring a self-directed learning project. Tough's work has been criticized for its middle-class sampling and lack of attention to the quality of learning, the social context in which the learning occurred, and the implications of the findings for social and political change (Brookfield, 1986). Gerstner (1988) cited Tough's bias toward a teaching model.

Danis and Tremblay (1988) analyzed descriptions of the learning experiences of ten self-taught adults. They examined established adult learning principles by comparing them with adult learning principles suggested by the autodidacts' descriptions.
The five men and five women who were the subjects of this study had been engaged in long-term self-directed projects for a minimum of four years, were recognized as experts in their field, had less than 15 years of formal schooling, and had acquired their knowledge and skills through self-directed learning projects.

Their research supports the principle that learning is an evolving lifelong process that engages the learner's whole being. In the process of learning, self-taught adults became more aware of themselves as learners, developed rules and principles about their learning, and utilized reflection and action—alternately or simultaneously—in their learning.

A number of established adult learning principles were not supported by the autodidacts' experience. For self-taught adults, being perceived as self-directed was not important. Self-taught adults also did not consider themselves dependent when they sought help. Their fields of interest were often unrelated to their social roles. The more knowledge or skills they acquired, the more assistance they sought from experts in their field. Their increased competence and recognition motivated them to learn. They were also inspired by pleasure, challenge, and curiosity. They did not undertake a learning activity to meet unmet needs (i.e., for personal growth and development). Autodidactic learners created their own learning environment in which the sharing of interests and skills, rather than warmth and support, was of primary importance.
One can also see differences between how these autodidacts learned and how adult education practice is organized. Self-taught adults proceeded in a heuristic manner, seizing upon opportunities that presented themselves (this may corroborate Spear’s [1988] organizing circumstance). They could not state their learning goals (i.e., they did not discover their learning needs until they had mastered certain knowledge or skills). And they were not concerned with the immediate application of their learning.

One cannot assume that the characteristics of self-taught adults revealed in this study are characteristic of adult learning in general (Danis & Tremblay, 1988). But surely the autodidact must be considered the ultimate autonomous learner. What can adult educators learn from autodidaxy? And what are the implications of autodidaxy for facilitating self-directed learning in formal instructional settings?

Facilitating Self-Directed Learning

"While the literature often suggests that adult educators should develop or enhance self-direction in learning, the process has remained elusive" (Gerstner, 1988, p. 131). This is not surprising since there is no commonly agreed-upon definition of self-directed learning (Schuttenberg & Tracy, 1987). There are as many perspectives on facilitating self-directed learning as there are conceptions of self-directed learning.
Schuttenberg and Tracy (1987) developed a model for fostering self-directed learning that takes into account the various degrees of self-directed learning (i.e., the developmental nature of self-directed learning). The educator who sees self-directed learning as a set of skills to be mastered (Knowles, 1980; Cheren, 1983) assumes a directive role. Those who see self-directed learning as a process (Griffin, 1978-79; Brokeret & Hiemstra, 1985; Griffith, 1987; Brookfield, 1988b) act as coach, encouraging collaboration between learner and facilitator and interdependence among learners. When self-directed learning is associated with personal or societal change (Freire, 1970; Apps, 1985; Mezirow, 1985b; Brookfield, 1989), the educator becomes a colleague, facilitating critical reflection of values and assumptions and encouraging alternate ways of thinking and acting.

One can immediately see the overlap between roles (e.g., Knowles [1980] stressed process as well as skills). The authors proposed that these roles be used sequentially, that teaching strategies be adapted to the level of and desire for learner self-directedness. Adult learners must possess self-directed learning skills before they can benefit from collaborative processes, and they must be able to work collaboratively before they can change their values and shift their perspectives.

This sequential model sounds strikingly similar to the domains of adult learning described by Mezirow (1981) and identified by the German philosopher Habermas. Each domain, the
technical (learning to perform tasks), the practical (learning for interpersonal understanding), and the emancipatory (learning to bring about perspective transformation), requires a different approach for facilitating learning. Although Mezirow (1981) saw the emancipatory domain as the “most distinctively adult domain of learning” (Mezirow, 1981, p. 6), he recognized the need to facilitate learning in all three domains. But Mezirow (1985b) saw critical reflectivity playing a role in all the domains of learning. Furthermore, he saw the self-directed learner as one who is able to function in each.

Braxton-Brown and Keenan (1990) proposed a new conceptual framework for andragogy in continuing education practice—the four R’s of andragogy—that they claim will be more useful than Knowles’ (1980) model in unlocking learners’ self-directedness. It is based on respectful relationships, responsive facilitation, reality-based learning experience, and reflection. These ideas are not new and are supported in the adult education literature.

Much importance is given to utilizing learners’ experience. But one must be very clear about what this means. “The belief that all genuine education comes through experience does not mean that all experiences are genuinely or equally educative” (Dewey, 1938, p. 25). Furthermore, learning from experience really means learning from reflecting on experience (Usher, 1985; corroborated by Dewey, 1933; Houle, 1980; Boud, Keogh, & Walker, 1985). Usher (1985) argued that before students can reflect on experience, they
must be helped to develop a conception of learning and knowledge in which personal experience is seen as valid, as having potential for learning (corroborated by Griffin, 1978-79).

An unexpected finding of Nielson's (1989) study on the use of andragogical principles in a continuing nursing education program was that nurses saw themselves differently at the end of the program. They considered this personal transformation to be the most valuable outcome of the program. Nielson suggested that by involving nurses in self-reflective learning, continuing education programs would move closer to becoming educational (versus training) endeavours (corroborated by Marsick, 1988). In the process, nurses would move closer to becoming self-directed learners.

Learning how to learn also contributes to greater autonomy in learning (Smith, 1983b; corroborated by Griffin, 1978-79; Cheren, 1983; Freedman, 1985). Learners need to be able to learn in all three modes of learning (self-directed, collaborative, and institutional) so they can feel comfortable in any learning situation (Smith, 1983a). In addition, learners need to understand how they learn and their preferences for learning (Griffin, 1978-79; Smith, 1985). According to Griffin (1978-79), to be self-directed, one has to make choices, and to make choices, one needs options; we have to provide those options for learning (corroborated by Blanchard, 1979; Cheren, 1983). We also have to
help learners develop the skills to make critical judgments about those options (Chéné, 1983).

But whatever we do, the focus is on learning and the starting point is with the learner. In a sense, the starting point is also with the educator. Educators must be committed to self-directed learning (Hiemstra, 1980), be moving toward becoming self-directed learners themselves (Della-Dora & Blanchard, 1979), and be exemplars or role models for self-directed learning (Boud & Prosser, 1980; Griffin, 1985). The educators' needs for authority, visibility, and a sense of personal significance are not well met by the self-directed learning format; learners are more ready for self-directed learning than educators are to give it to them (Harrison, 1977; corroborated by Boyd & Apps, 1980). Griffin (1978-79) summed it up best: "Facilitating self-directed learning just won't work unless it grows out of a deep valuing and respect for learners and their ultimate wisdom and capacity to make healthy decisions for their own lives" (Griffin, 1978-79, p. 40).

Facilitating self-directed learning is not a technique; it is a value, a way of being. When one adopts this attitude, there is no longer the need to control the learning process. This may be the lesson to be learned from autodidaxy. According to Candy (1988):

Perhaps the greatest single service performed by Tough and his followers has been to promote the notion that adults are
authors of their own destiny, and to emphasize the need for educators to respect the integrity and personhood of their clients. (p. 110)

Adult educators are urged to focus on process, not content (Knowles, 1980; Tompkins & McGraw, 1988). But educators must be careful not to shift their control from the content to the learning process (Griffin, 1978-79; Usher, 1985; Tennant, 1986). Chené (1983) noted the paradox of providing guidelines and strategies to assist autonomous learners and of developing criteria to evaluate autonomous learning. Griffin (1978-79) and Tennant (1986) warned that behavioural objectives and learning contracts may simply be another means of educator-control. And yet learners must know what is expected of them (Griffin, 1985; Kuramoto & Wyman, 1986). Hiemstra (1982) offered this advice:

We need to be careful that we don’t professionalize ourselves into an elite group of learning facilitators where an "andragogical" or self-directed learning approach becomes just another slick way of controlling people. In other words, it will take real commitment and frequently, some real institutional changes to move toward giving the learner considerable control over the learning. (p. 26)
Summary

A review of the literature illustrates the complexity of self-directed learning and its lack of conceptual clarity. Questions have been raised about self-directed learning and andragogy as the raison d'être of adult education. Self-direction as self-teaching outside formal instructional settings (autodidaxy) has been distinguished from self-direction as a way of organizing instruction within formal instructional settings (learner-control). Both are concerned with control over the learning process. This is the major theme that emerged from the literature. To assume greater control over their learning, learners must learn to reflect on their experience and on the process of learning. To enable learners to assume greater control over their learning, educators must learn to relinquish much of that control.
Chapter Three

Methodology

I shall be telling this with a sigh
Somewhere ages and ages hence:
Two roads diverged in a wood, and I--
I took the one less traveled by,
And that has made all the difference.

Robert Frost
Excerpt from The Road Not Taken

The Nature of Qualitative Research

Qualitative research is concerned with discovering meaning (Field & Morse, 1985). In essence, all research is concerned with discovering meaning. "Where there is no mental struggle on the part of the researcher to force the facts to reveal their meaning, there is no research" (Leedy, 1980, p. 51). The assumption in qualitative research is that "meaning is embedded in people's experiences and mediated through the investigator's own perceptions" (Merriam, 1988, p. 19).

According to Lincoln and Guba (1985), the qualitative researcher adopts the following axioms: realities are multiple, constructed and holistic; knower and known are interactive and inseparable; only time- and context-bound working hypotheses are possible; all entities are in a state of mutual, simultaneous
shaping so that it is impossible to distinguish cause from effect; and inquiry is value-bound.

When realities are seen as holistic, they can only be understood in relation to their context. Qualitative research is therefore conducted in the natural setting. To discover meaning requires a human instrument who can interact with informants. Participants in a qualitative study are neither respondents nor subjects; they are informants who inform me and teach me and help me to understand their view of the world [verstehen] (Spradley, 1979). Through inductive data analysis, the qualitative researcher discovers patterns, themes, and relationships that give meaning to the data. These patterns, themes, and relationships come from informants; they are not imposed on the data by the researcher. Furthermore, the meaning of these patterns, themes, and relationships must be negotiated between researcher and informant to ensure that the researcher's reconstructions of reality reflect the informant's construction of reality.

Looking for relationships among the data also reflects the axiom of mutual shaping. The qualitative researcher is interested in "what is shaped by what," not in "what causes what" (cause and effect). Concern, therefore, is not with prediction and control and not with generalization. The qualitative researcher presents his or her perspective; findings are time- and context-bound and can be applied to similar settings only tentatively at best.
"Not knowing what is not known" is the approach to qualitative research (Lincoln & Guba, 1985). It is not possible to design a qualitative study before the study is undertaken. Patton (1980) suggested that the researcher can decide in advance what variables are important and what relationships among those variables are expected but he cautioned that the important dimensions must be allowed to emerge from the data. By utilizing theoretical sampling (i.e., sampling that is guided by the emerging theory) the researcher continuously generates information, extending its breadth and depth until working hypotheses can be developed.

Inquiry cannot be value-free (Lincoln & Guba, 1985). The qualitative researcher examines and makes explicit his/her values, assumptions, and biases and those of the context under study. Tacit knowledge, feelings, and impressions are built upon and incorporated into the data and the qualitative researcher remains open to new ways of perceiving while immersed in the data (Griffith, 1979).

Methodological Assumptions

1. Educational research must be relevant to practice.
2. Research into the practice of teaching must acknowledge and utilize practitioners' experience.
Methodological Limitations

"In selecting a research design, something is gained and something is sacrificed. One can only weigh the design's benefits against its limitations and select accordingly" (Merriam, 1988, p. 35).

As explained in Establishing Trustworthiness later on in this chapter, it was not possible to utilize multiple methods of investigation. This is a weakness of the study. Data were collected through one structured interview with each of 14 nurse educators. The study would have been strengthened if interview data could have been analyzed in conjunction with observational data on the behaviour of nurse educators as facilitators of self-directed learning.

While conducting this study, the importance of examining teaching within the context of the teaching/learning process became apparent. In other words, any consideration of teaching requires some consideration of learning. The inclusion of data on the students' perspective of self-directed learning would also have enhanced the study.

Emergence of the Research Problem and Research Design

My initial intention was to explore the following questions:
1. What are nurse educators' attitudes toward and understanding of the concept of self-directed learning?
2. What are nurse educators' attitudes toward and understanding of the process of facilitating self-directed learning?
3. What techniques do nurse educators use to facilitate self-directed learning?

4. What part, if any, does critical reflection play in the process of facilitating self-directed learning?

5. Do nurse educators and their students share the same understanding of self-directed learning?

One structured interview was to be conducted on a one-to-one basis with 10 nurse educators in one community college continuing education program in nursing. The interview questions were to be designed to produce data on the first four questions. Based on the interview data, a questionnaire was to be developed and administered to a statistically viable sample of these educators' students. The questionnaire was to provide data on Question 5.

The interview questions (see Appendix A) were influenced by a number of ideas in the literature, in addition to those referred to in the Rationale (see Chapter One). For example, reflection is part of self-directed learning (Boud et al., 1985; Hiemstra, 1985; Brookfield, 1986; Boud & Griffin, 1987; Danis & Tremblay, 1988). Learning requires engagement between the learner, the task/subject matter, the teacher, and the environment (Kidd, 1973). And in autonomous learning, these elements must be consistent with each other (Higgs, 1988). Despite the concerns raised by Guglielmino's Self-Directed Learning Readiness Scale (Guglielmino & Guglielmino, 1977-82), I was interested in the concept of student readiness for self-directed learning. (My ideas about self-directed learning
readiness changed as a result of conducting this research study.) And because I thought, at that point, I was conducting an ethnographic interview, Spradley (1979) was used as a reference.

A community college approached me and expressed interest in participating in my research study. I sent them a copy of my thesis proposal and I met with them to answer any questions they might have. When the proposal was approved by the college, I asked the college to provide me with the names of nurse educators from their continuing education program in nursing who were familiar with the concept of self-directed learning (purposive sampling). I indicated that I wanted to interview 10 educators. The college provided me with the names of 13 educators from different clinical areas; seven agreed to participate in the study. Nurse educators were given a verbal explanation of the study. Each was sent a follow-up letter confirming the time and date of the interview and each received a thank-you note following the interview. See Appendix B for Preamble: Guided Interview With Informants and Appendix C for Educator Consent Form.

During the interviews, it became clear that it would be difficult to examine critical reflection, given that the focus of the continuing education program is clinical nursing. Some of the educators interviewed are not currently involved in the continuing education program so it was not feasible to administer a questionnaire to their students. (If it had been possible, it may
have been more desirable to have conducted a qualitative interview with each of them.)

The interviews also raised other questions that required consideration:
1. While educators indicated that self-directed learning means that students assume more responsibility for learning, it was not clear what was meant by "assume more responsibility for learning." There seemed to be a discrepancy between educators' definition of self-directed learning and the activities they use to encourage self-directed learning. Could this discrepancy be an example of what Schön (1983, 1987) referred to as incongruence between theories-in-use and espoused theories of practice?
2. What is unique about self-directed learning? Some of the requirements for self-directed learning just seemed to be necessary for learning (e.g., structure and resources, educator as role model, knowledge of teaching and learning principles).
3. There seemed to be a paradox. Program constraints make self-directed learning difficult; they also make it necessary for students to be self-directed. Is self-directed learning encouraged out of necessity or is it really encouraged because it is believed to be the best way to learn, adults' preferred way of learning?
4. Experience as a self-directed learner influenced educators to encourage self-directed learning in their students. If we want
educators to encourage self-directed learning, how necessary is this experience? And what is significant about this experience?

5. Is it appropriate for adult educators to encourage self-directed learning when: (a) they do not know if students are ready for self-directed learning, (b) they know students have a negative perception of it, and (c) many aspects of their program are not conducive to self-directed learning? Has, as Brookfield (1988a) claimed, an educational goal—that we should encourage learners’ independence—become confused with the educational truism that all adults are self-directed learners?

6. Is there a connection between one’s personality and one’s ability to be self-directed?

7. Required content caused anxiety in both educators and students. What are the implications of this for encouraging self-directed learning?

But the major question remained to be answered: What are the prerequisites or necessary conditions for facilitating self-directed learning in a community college continuing education program in nursing? I decided, therefore, to interview seven nurse educators from a different community college continuing education program in nursing, who have expertise in self-directed learning (theoretical sampling). I wanted to gain insight into this research problem and check out some of the questions raised by the first set of interviews. The research problem and the research design had emerged.
The interview questions (see Appendix A) were revised to reflect the guidelines for qualitative interviewing outlined by Patton (1980). Questions 3 and 4 should have presupposed that educators encourage self-directed learning and Question 15 should have presupposed that educators encourage reflection. A definition of other kinds of learning was required in Question 6. Questions 8 and 11 should each have been two questions. Question 9, a dichotomous question, should not have been asked. And Questions 11, 13, and 16 had to be revised because they were leading questions that imposed interpretation on the situation. See Appendix D for revised interview questions. The same Preamble: Guided Interview With Informants was used with Group II nurse educators (see Appendix B). A new informed consent form, based on the suggestions of Lincoln and Guba (1985), was also developed (see Appendix E).

A second community college was contacted and highlights of my research study were sent to them. I explained that I wanted to interview seven nurse educators who are currently involved in the college's continuing education program in nursing and who have expertise in self-directed learning. Once the college agreed to participate in the study, I contacted the educators from the list the college had provided. Once again, the educators work in different clinical specialities. The interviews were conducted the following week. Educators were given a copy of the informed
Methods Used in Data Analysis

Introduction.

Data are based on one structured interview, lasting between one and one-and-a-half hours, with each of 14 nurse educators in two community college continuing education programs in nursing. It is important to recognize that the first group of seven educators (Group I) teach in a program that encourages self-study and active participation in the teaching/learning process. The program does not claim to be a self-directed learning program. The second group of seven educators (Group II) teach in a program designed to encourage self-directed learning. All 14 interviews were tape-recorded and transcribed verbatim.

The constant comparative method.

Data from the interviews conducted with educators from Group I were first analyzed using the constant comparative method (Lincoln & Guba, 1985) that involved the following two steps:

1. Unitizing

Data were processed to reveal incidents or units of information. Each of the 350 units found was put on a 3" x 5" index card and catalogued, for easy reference, with the educator’s/informant’s initials, the initials of the college, and
the number of the question to which the unit of information referred.

2. **Categorizing**

Units of information were compared to each other and units that felt or looked alike (tacit judgement) were placed in a provisional category. When there were six units in such a category, a provisional statement was written to capture the properties that seemed to be inherent in this category. Additional units of information were placed in this category only if they contained these properties.

Categories were exposed to constant criticism to ensure that they were internally homogenous and externally heterogeneous. Most provisional statements and categories required several revisions. Categorizing resulted in 13 provisional categories (see Appendix F). Each category reveals a relationship (e.g., X is used to do Y).

Four cards were discarded because they did not meet the criteria for a unit of information (heuristic and the smallest piece of information that can stand on its own). Six cards were placed in a miscellaneous category because they did not fit any of the 13 categories.

**Analyst-constructed typologies.**

The constant comparative method provided a structure for analyzing data from Group I but it did not result in a sense of
the data. There are limitations to how much can be learned from what people say (Patton, 1980). Nevertheless, I decided, in an effort to determine the significance of the data from Group II, that I would subject data from Group II to analyst-constructed typologies (Patton, 1980) as well as the constant comparative method. It was the identification of themes through analyst-constructed typologies that revealed the meaning of the data. Consequently, I decided not to use the constant comparative method to analyze data from Group II and to subject the data from Group I to analyst-constructed typologies.

By examining recurring themes in the data from Group I and Group II, a pattern began to emerge and it became possible to develop categories. Two categories were established following constant criticism to ensure internal homogeneity and external heterogeneity.

Establishing Trustworthiness
1. Two member checks were done. "The ultimate, single most important criterion [to establish validity of qualitative findings] must be whether those who have been the subject of the investigation feel that what is reported reflects the educational reality that they themselves experienced" (Hammond, 1989, p. 114). (a) A summary of the analysis of data from Group I, based on the constant comparative method, was sent to each of the seven educators in Group I. Five educators responded and their comments
were incorporated into the analysis (see Appendix F). The educators also responded to the questions raised by the interviews (see Appendix G).

(b) A summary of the analysis of data from Groups I and II, based on analyst-constructed typologies, was sent to each of the seven educators in Group II. Six educators responded and their comments were incorporated into the analysis (see Appendix H).

2. Triangulation is a state of mind (Miles & Huberman, 1984); a conscientious effort was made to triangulate the data. Group II provided a different source of data (and fit Mathison's [1988] view of triangulation). It was not possible to utilize multiple methods. The first community college did not allow me to observe any teaching; to observe informants also requires training that I did not have. The second community college could not provide me with any documents related to the development, implementation, or evaluation of the self-directed learning approach in their program. I did, however, obtain articles from the Faculty of Health Sciences, McMaster University, about its school of medicine. It seemed to me that such information was relevant since McMaster has used self-directed learning in its medical program since 1969. I reviewed these articles after I completed the data analysis. To my utter delight, I found my research findings to be consistent with the McMaster philosophy (see
Appendix I). Obviously, it was not feasible to utilize different investigators.

3. I kept a personal journal to record insights, questions, and concerns about myself as analyst and the methodology used for data collection and analysis (see Appendix J). Peshkin (1988) argued that researchers must systematically seek out their subjectivity while their research is in progress so that they can be aware of how their subjectivity may be shaping their inquiry.

4. Audit Trail

Triangulation and the personal journal dovetail with the audit process (Lincoln & Guba, 1985). Since the personal journal is an essential part of the audit trail, highlights of the journal have been included. There are a number of other documents, however, that have not been included but are available for review:
(a) a list of all contacts made during the study;
(b) correspondence with nurse educators and nurse administrators at both community colleges;
(c) my thesis proposal and highlights of my research study sent to the community colleges;
(d) raw notes from analyst-constructed typologies;
(e) summary of data analyses sent to educators for member checks;
(f) verbatim transcripts of interviews; and
(g) index cards from Group I data analysis using the constant comparative method.

Summary

The investigator is the single most important component in qualitative research (Merriam, 1988). The emergent design depended upon my ability to "let myself go free" (as Walt Whitman advised Eduard Lindeman). I had to be sensitive to what I was experiencing and open to new ways of thinking. I had to trust my judgement. But I also had to be rigorous so the methodology could stand up to scrutiny.
Introduction

"There are no formal, universal rules to follow in analyzing, interpreting, and evaluating qualitative data" (Patton, 1980, p. 268).

This chapter consists of verbatim quotes from nurse educators. These quotes illustrate the themes identified in the
data through analyst-constructed typologies. The themes are in bold-face italics so they will be easily recognizable.

To both groups of educators, self-directed learning meant taking responsibility for your own learning. While the two groups agreed on a definition of self-directed learning, they differed in their understanding of self-directed learning and in their approach to facilitating it. Since educators from Group II teach in a self-directed learning program, one might expect that an analysis of data from this group would reveal the necessary conditions for facilitating self-directed learning. The analysis of data from Group II, therefore, precedes the analysis of data from Group I.

Data Analysis: Group II

Category 1.

Learner-centred emerged as the major theme in the data from Group II. All the recurring themes were learner-centred and all concerned self-directed learning as a way of teaching. Self-directed learning is a way of teaching is Category 1.

Self-directed learning was seen as a philosophy, an attitude, a learner-centred approach to teaching. Educators described self-directed learning as "a different way of thinking," "a whole underlying thing that you kind of do," "a very exciting way of teaching," "a great system for learning," "we live self-directed learning; we don't get tired of it."
There were requirements (i.e., knowledge, skills, and attitudes) that educators had to possess to be able to facilitate self-directed learning. In a learner-centred approach to teaching, the teacher had to give up some control to enable students to assume responsibility for their learning.

- I certainly spend a lot of time trying to make students aware of other resources besides the teacher ... to help them to see that the faculty member is really only one of many resources ... and in many cases, a limited resource.

- They often will say, well what do you think? And I’ll often say well, I think you’ve come up with better ideas than I have or if I have an idea or suggestion, I’ll give them my suggestion too but say that it is only one of the many possible solutions.

- I often say, I don’t know ... to give them a sense too that ... you don’t have to have all the answers at your fingertips.

- You often end up negotiating with the students ... I will give this as a laid on demonstration but in return ... you have to learn all of this.

Giving up some control was not easy.

- I think the hardest part is the ability to sit back, get an easy chair and let the student go to it and you know, you can see them [sic] floundering ... and you know the answer and
you say . . . why don't I just say the answer and get on with it?

I find . . . consciously trying to encourage the students to become responsible for their learning takes much more of my energy . . . I like to talk . . . so that I have to be restraining myself.

It's a problem I have. I have an overwhelming need to tell people things sometimes.

. . . all of a sudden . . . you didn't teach anymore, you facilitated . . . well what does that mean? Can I still teach them? You felt like tucking them in a closet somewhere and teaching them something.

To give up any control, teachers had to examine their perception of the teacher's role.

The teacher . . . has to change his or her way of looking at their [sic] importance in this whole process . . .

You as a teacher . . . and this is most difficult for teachers to accept . . . are not responsible for the students' learning; you are responsible for your teaching.

I'm not here to tell you; you tell me what you know, I'll tell you what I think about it. I'm . . . the one that stirs it up . . . the instigator.

The teacher has to see themselves [sic] as a facilitator rather than the almighty or the all powerful person.
I treat my students as colleagues.

I think your role becomes very different . . . sometimes it is the facilitator and sometimes you will be a learner along with the group.

To give up any control required teachers to have faith in their students.

I think you have to trust that they're going to get it, get the answer . . . just to let go, instead of giving it to them . . . you have to trust that they will find the answer down there in the library . . .

I feel that because I am working with adults, adults who are already members of the profession, that the personal learning that they have done but not realized they have done, probably is more valuable than what I as one individual have to give them . . .

. . . the other thing I learned in an awful hurry through experience was that students would often give you the content area . . . they'd have the content; you just had to put it into the right slots and show them how they could use this knowledge.

To facilitate self-directed learning demanded a commitment to self-directed learning. Teachers had to be committed to it.
I think you yourself have to... feel very positive... that this is going to work... 'cause I think you have to give your heart and soul to it.

Believe in what you're doing... believe in the student and... believe that they [sic] will learn if they find it's meaningful.

... you have to be very optimistic of self-learning... if you loved lecturing and you can't let go, it's going to show...

Faculty... who will really sort of stand firm and say I can't possibly teach you everything, yes you can learn it but I can't teach it.

And the institution had to be committed to it.

I have learned from my chairman... and it is coming, you know, much from the top down...

... you... have to have... administration that will agree with this... you need support from whoever [sic] your hierarchy might be that this is... not just a trendy, fly-by-night thing...

... I think we're trying within the program... philosophically to make it... wholly self-directed in the sense that right from the initial contact... your decisions are your decisions.
they [students] are not required to come to these classes; if they've read through all the material and they understand it, they're not required to attend these...

I think we'd have a hard time if you [sic] didn't have a good support group behind you... I don't think you could run it... you just wouldn't have the resources available to do it.

To facilitate self-directed learning, the educator needed certain knowledge.

... a clear definition of what you meant by self-directed learning... I know that term means different things to different people...

Until I get comfortable with the content, I can't put the process in.

... in self-directed [sic] I think the process becomes more important than you being the giver of the content... but you also have to know... what's important to the group or to the individual.

You have to have a good knowledge of what outcomes you want... you have to know... what you want the students to know and what they want to know.

I think you'd have to know some theories of learning... I think you'd have to have some idea of your audience, you know, who your learners were... and maybe, therefore,
getting into some of the principles of adult learning, adult education.

You have to know what sort of resources are out there too ... what learning opportunities are within the institution or community.

The facilitator of self-directed learning needed certain skills and personal attributes.

You have to have some command of group dynamics and how to draw on people and their resources.

You've got to be able to think on your feet . . .

You need to ... be able to explain the same point in maybe 12 different ways, to find the one way that's going to help clarify it for the particular student you're working with ... and the patience of Job because you've just explained it to student A and student B asks you the same question but from a different point of view. ... you need to be able to explain things from a whole to the small parts ... and then to take all the parts and build them up to the whole. ... It's very difficult ... for one person to do that. It's like explaining why an apple's not an orange, at the same time telling why they're the same.

Your interpersonal skills of being able to help students ... to be able to make them feel that you are approaching them as individuals.
there's one thing that I really want to say you have to have and that's respect for the student and . . . you have to show it somehow . . .

I think it takes a certain kind of person . . . someone who's very easy going, maybe someone who's very flexible which is the way I am . . . I bend a lot.

Educators used a *variety of techniques* to facilitate self-directed learning.

I would be making sure, number one, that the students have a clear understanding of what their expectations are and I usually would do that almost a week ahead . . .

The class has a package that they buy that has objectives and questions at the end . . . the class is designed to be a tutorial where we discuss problems with difficult questions or things that people wanted to discuss.

The expectation is the students have come prepared with their objectives, having done some research. My tendency is then to try and primarily do . . . application, clarifying if they have any difficulty with any specific objectives; helping the group share their information . . . perhaps I use myself . . . to facilitate the group interchanging with one another.

. . . showing people how to acquire that information and then bringing them back to be able to . . . self-test so they could assess where they were . . .
I use a lot of questioning, putting things back to the student. Our students do expect to have classes and I'm no longer comfortable with a lecture approach.

I have students and they come in and say, this is what I want to learn and this is how I'm going to learn it and ... they draw up the contract.

Teachers appreciated the transition to self-direction.

... students will always come to me, can I do this, what does this mean, and I say, I'm not here to answer, you have to go and ... they hate me when I say that but at the end they really like that part.

... they [students] weren't used to this looseness, this unstructured [sic], and they felt very uncomfortable with it at first but ... they grow with it ...

... it was difficult ... for them to view teachers more as peers than as superiors ... but then they realized that they were sort of ... partners in the learning and they felt much more comfortable in letting people know what they didn't know ...

... they've come a long way ... I mean simple things like ... they would call us all Mrs. and now they're comfortable with a first-name basis; they're comfortable with saying I don't agree with the fact that you said that I was not very
good when I did this; I think that these were very good points.

Students needed to be oriented to self-directed learning.

... we probably spent time convincing them, of showing them, number one, what it really meant ... and then showing them ways that they were already doing that ... they always were self-directed.

I think you have to sell it to the students ... that they are really going to benefit from this and sometimes allow them to ventilate ... I think sometimes they have to have a down-time ... and maybe give them that sort of opportunity.

... educate the learner ... if you don't have a learner that understands what they're [sic] doing then you're lost.

... time is spent explaining to them our philosophy of what it means to be in a self-directed program, helping them begin to realize that the teacher will not be giving them everything, trying to help them change their focus from a teacher-centred program.

Teachers had to work with students to change students' perceptions of the teacher's role.

... the teacher was the ultimate authority and you could never question ... a challenge to the authority of a teacher is uncomfortable for them.
... he or she knew all the answers therefore this was a good teacher. This was not a good teacher because they [sic] often said to me ... why don't you look in these areas and I'll look in these areas and we'll look at it next week.

I don't do my own evaluation; that's your job, you're my teacher, you tell me ...

These are people who've been so accustomed to being told what to do and when to do it ... I'm here and I've paid my money and teach me.

If you don't lecture, you weren't going to learn anything.

But a word of caution:

As an instructor, I have to be careful not to feed into it too much, into sort of their perception of what the teacher should be doing ...

... the teacher ... really wanted this self-learning and the students talked her out of it. So she ended up lecturing for six hours a day ... the students loved that.

Teachers had to provide students with direction.

I think when we first brought it in here it was envisioned that students would do all this and they would have all the answers and ... just come for facilitation; it didn't work that way; they were like lost little lambs ...

... sometimes they're a little hesitant to start so I
might guide, you know, start them off with how did people find . . .

- I am also a teacher and . . . there are certain things that are very difficult to understand in nursing . . . I still believe there are certain parts I must teach . . .

- . . . you monitor them and you watch them really carefully and if they’re floundering, then you pull them back in a little bit more into a formalized structure and work with them some more and then . . . let them start branching out a little bit . . .

- I call it a buddy system . . . I’m going to let you swim but I’m there if you’re going to sink . . . you just grab onto me and I’ll keep you afloat but you’re going to have to do all the swimming . . . I’m there to grab onto if you’re drowning.

Some direction came from the student.

- . . . if they can’t learn it on their own, I actually try and give them as much as they tell me they need . . .

- . . . students say this is the problem that I have, help me, facilitate me [sic] to learn.

"Help me to learn." This seemed to be the essence of self-directed learning. For students to be responsible for their own learning, they needed to learn how to learn. This meant
understanding their learning style and becoming comfortable with learning and with being lifelong learners.

- I am trying to help our students . . . to identify what they need to learn . . . to identify how they can learn that in the most efficient manner . . . to learn to use resources appropriate to what they need to learn . . . we want to give you the tools to take with you to be able to continue to learn . . .

- . . . we’ve talked about . . . the stages in learning . . . you can recognize information . . . but it’s another step to actually use the information . . . it’s nice to be able to . . . discuss it, which is another step which we try to incorporate in the classroom . . .

- . . . if you’re going to encourage students to be self-directed, you have to be able to provide them with resources . . . other than the teacher . . . you need to be willing to spend some time in teaching them how to use those.

- . . . when the students come out at the end of our course . . . hopefully they’ve learned how to learn . . . hopefully we’ve taught the student in our program to go out and to continue learning.

Just as students needed to learn how to learn, so did teachers need to learn how to teach. And learning to facilitate self-directed learning took time.
I find that new teachers are not as comfortable; they tend to want to have a little more control so that they can manage what goes on in the class.

... you'll find with an inexperienced teacher ... she doesn't want to miss anything and yet she cannot decide what's important, what's trivial ... they [sic] tend not to do as much self-learning ... they'll do a lot of lecturing because they're just personally paranoid that they're going to forget something very important.

Teachers learned to facilitate self-directed learning by teaching and reflecting on their teaching, often with their peers. The focus of such reflection was the learner and how the learner learns best.

... the teachers ... were very aware of the need to make a change. ... they were saying, I can't teach all of this content ... if I can't teach it ... how can the students possibly be learning it ... 

... we'd gone through various methods of teaching ... getting into more and more ... identifying people with experiential learning that didn't have to start at point A.

... we'd talk about how are we going to do this ... what's not working ... the educators were educating themselves at the same time ...
I think you have to have somebody to help you work with these concepts and ideas to really implement them well . . . experience is a good teacher or working with people who have done it.

By teaching and reflecting on their teaching, teachers developed a tacit way of knowing.

A lot of the faculty because they'd been around here for so long, almost can use some of their innate ability to . . . "map" [cognitive mapping] students . . .

I really didn't even know it was self-directed until recently . . . it was just my most comfortable way of teaching.

Category 2.

Learner-centred and related themes applied to the students' learning as well as to the educators' facilitation of learning. Self-directed learning is a way of learning is Category 2.

Learning . . . is learning . . . teaching is teaching; I guess I separate teaching from learning . . . and I look at them as . . . the teaching/learning process. . . . I like . . . "taking responsibility for your own learning" better than "self-directed learning" . . . you are responsible for your own learning . . .

I just see self-directed [sic] as more of a process . . . the end-product is still learning.
... process is content or content is process or something to that effect, and I’ve always believed that... that the very process of learning something or doing something... gets the content covered...

... we... had been involved in doing some cognitive mapping of students to look at how students learn best... and seeing that students learned best through different methods... more and more we... realized that people can do a lot of things on their own; they do not need to have somebody regurgitating what they’ve already found out.

... learning is really always self-learning because I can sit in a lecture and somebody can be up there teaching but... it’s not until I’m motivated to learn... that I’m going to learn anything... you either learn or you’re taught and... if you’re taught, you don’t necessarily learn.

Students varied in their readiness for self-directed learning.

... most of them are ready; some of them are never ready.

... we had one particular lady who kept saying... that she should have gone to another college because they lecture, you know... we have students who say I’ve never learned so much.
Students may have been more ready for self-directed learning than some educators acknowledged.

- I think sometimes we don't give them [students] credit for even assessing whether they are ready for it or not.

- I've been starting to say to them what would you like to learn . . . so that we have a melding here of what I think they should know versus what they would like to know . . . it's amazing . . . 99 times out of 100 it's basically what's going to be in the program anyway.

Students' readiness for self-directed learning was not an issue for educators.

- I just assume that they are [ready].

- I can tell . . . sometimes I can't tell . . . but I still don't take that as an indication that they aren't doing it or that they aren't ready . . .

- The interesting thing . . . is that by the time they finish the program they're much more ready [for self-directed learning] because they've established some self-esteem . . . they suddenly discover . . . I can learn, I am capable.

- I guess in some ways people are never ready . . . and everybody is always ready.

*Self-directed learning worked.*
the students started to achieve and were happy . . .
you started seeing what the student was able to transfer from
one area to the other and also how they [sic] didn't like
going back to the other system . . .

. . . when you actually get down and you see the quality of
what they produce at the end . . . they develop a lot of
self-esteem once they see that they are responsible learners.

. . . more learning will occur when the individual has had
more control over what it is and how it is . . . that they
are going to learn . . .

. . . this very quiet, timid student . . . out of the blue
would say, but why are we doing this? . . . I smile . . .
success.

Problems with self-directed learning.
Although self-directed learning worked, both teachers and
students encountered problems with it. Students were very
demanding of themselves, particularly when it concerned the
evaluation of learning.

I am comfortable with small changes; working with adults, I
find they are not.

. . . they come and they beg you to be able to rewrite the
exam . . . because they have to do better . . .

I hate grades . . . in a self-directed program . . . I hate
grades as a method of learning [sic].
... I really try to focus away from the marks part of it, with varying degrees of success...

It's very hard because... although we're trying to get them to do this... they go to their "grad" buddy and ask them a thousand questions 'cause they just want to pass.

And there was the issue of accountability.

... we always end up having to... prove that the student learned something... to our powers to be... there has to be some kind of a measurable standard.

Students' responsibilities off campus affected their ability to be self-directed.

... they have to have an environment at home... that allows them to work at home or come to school and do their work... if... they have to work or... they've got children at home that make demands on their time... that's where I sometimes find my people fall down in terms of being able to be at all self-directing.

Students required reading and comprehension skills.

... we found out we had the reading level of kids in Grade 8...
... unfortunately, the best supplier of answers is still books, nursing books; if they were not good readers, it was a great chore for them.

In addition, students needed to hear nursing and medical terminology.

... these nurses couldn't say it and they couldn't say it because they hadn't heard it ... and you know, if you'd had a class on gall bladder disease, this word would have come up hundreds of times.

Class size affected self-directed learning.

... with a smaller group it's sometimes easier because you can have a more personal approach with each student ...

... that's my one criticism of my own course; it is too big. What happens is that you get half of the class who ... really participate and ... I participate but I'm not picking up the periphery whereas if it was [sic] a small group ... everybody's got to participate.

The clinical experience posed potential problems for self-directed learning. As one educator remarked, "I can't say that I could 'self-direct' them a lot on the unit."

Clinical resources ... within a self-directed program are difficult to obtain.
I wanted to see them do it [procedure] but I also wanted to make sure that the patient was safe.

Sometimes I think that [sic] must be very difficult when one teacher does theory and the other does clinical. . . . Sometimes if you perceive a student as weak in their [sic] objectives and their [sic] posttests . . . you can see it on clinical; it just reinforces it for you . . . it must be very difficult for two different people to do that.

Inconsistencies in the data.

Giving up much control of the learning process and having faith in students may have been harder to do than educators realized. Some educators may also have been less committed to self-directed learning than they claimed.

I usually sit on the desk at the front of the room . . .

I put my foot down and I still have my foot down . . .

It's all very idealistic to say go down to the library for three hours and research something . . . they might be "goofing off" down there too . . .

. . . the first five or six weeks of the course we tend to have straightforward lectures.

I'm just accepting on faith that it's a good way to learn because it reflects my basic philosophy although I probably could be quite comfortable in just "doling out" specific information too.
Self-directed learning saved time because students were aware of the program's expectations and they did not have to relearn what they already knew. But self-directed learning, and all learning, takes time, and there were limits, due to institutional constraints, to the amount of time available for learning.

... they [students] are going to be full-time plus overtime in terms of the time it's going to take them to learn ... and it does take time.

... they're supposed to have their own time frame for learning ... do this at your own pace, well, they can't.

... time lines are maybe not so important ... they're important to the institution but I don't think learning occurs in 15-week blocks or 7-week blocks ... I think we need to be able to allow people the time.

And was the concept of self-directed learning really understood? Educators and students did not always recognize the integral part that direction plays in self-directed learning.

... we [educators] had ... classes on what is self-directed learning ... I think they were looking at a "pure animal" and I don't think that's what came out of it; it's very difficult for that to come out of it ... we call it self-directed learning but it isn't always; we give them a lot of direction ...
... I also still tend to go back a little bit to my traditional ... when I see students floundering ...

... because we put a label on it, it became very frightening for them [students] ... all they saw was that they were going to sit and not have anybody giving them direction and that was their fear ... it was going to be helter-skelter.

Data Analysis: Group I

Similarities and differences.

An analysis of the data from Group I revealed both similarities and differences with Group II. Teacher-directed was the major theme that emerged from the data from Group I. Self-directed learning was described as a way of teaching but it was seen as an option available to teachers rather than a philosophical approach to teaching.

... I think it's very valuable; it isn't for every student ... the educator has ... to know when it's appropriate and ... for whom it's appropriate.

I have to define ... what role self-directed learning has to play in whatever it is I'm supposed to be teaching. ... it ... becomes a tool ... as ... interactive video, computer-assisted instruction are [sic] available and are integrated into the program, self-directed learning is going to become even more important.
... we talked about it, we looked at it, how can we facilitate it despite the fact that we had content to get across . . . the professional development area was excellent in terms of looking at self-directed learning techniques.

Teachers were committed to self-directed learning.

... being a role model; you practise what you preach . . .

I know how important it is to be self-directed . . . I will push people in that direction . . .

If I can teach the students where to look for information that they can find out themselves . . . it helps them . . . have a sense of control over their lives.

And I think the best thing that I could do is just facilitate it as much as possible.

Teachers indicated that self-directed learning suits the adult learner.

I think the adult learner is pretty well a self-directed learner . . . they [sic] usually set the pace, they know the time frame they want to do it in.

As far as self-directed learning [sic], the adult student is definitely a lot more ready for it, a lot more eager, and a lot more motivated . . .

I think that the assumption was, with continuing ed', with adults, you should encourage self-directed learning and you
should expect it and that adult students needed it and would enjoy it and I think they did.

You're always learning . . . and I think the longer you're out of formal education, the more self-directed or the more . . . that sort of learning you do.

Educators described themselves as facilitators of learning. This included encouraging lifelong learning.

... the way I like to teach is as a facilitator, as opposed to I'm the teacher who knows everything and I spew. If I don't know something, I have no problem admitting . . . it . . . I like to draw on the expertise of the individuals in the group . . .

We share resources, we work together; I'm not the expert, we're all experts, we all bring things with us; I just may happen to have more resources.

Often, the individuals have the answers themselves but just need to be guided and helped to "connect" to the answer but if I give them the answer, they're not going to remember . . . so I will often reflect things back to the student.

As an educator . . . to impress upon the students . . . you never stop learning and don't think that you know everything at the end of this course and I hope that I haven't turned them off learning.
Nevertheless, teaching was primarily didactic. The focus was on covering required content.

- ... to a degree there is a component of ... I have the information, you need the information, I impart that information to you, you learn it quick [sic] or you don't survive.

- ... there's a certain outline that's set up and as a result, there's a certain amount of content that has to be covered within a period of time.

- ... they were given a fairly large package and we would always assign homework from that package ... some days were lighter than other days and some days you could take them right through to the very end and other days were just jam-packed.

- ... some of them [courses] lent themselves more towards being self-directed ... some of them were just straight theory and unfortunately, sometimes the only way to get theory across is with a didactic type of approach.

Teachers maintained a degree of control even while encouraging students to assume responsibility for their learning.

- What I developed was a package which they had to work through on their own using sort of the library I had and picking out whatever resources they wanted to, to come up with the answers.
I want each of you to pick a drug that you know nothing about and that you know you should know something about or that you’re going to be working with and you want to investigate that drug upwards, downwards, and sideways and I want you to use your pharmacist, I want you to use the libraries, articles, journals . . .

. . . we used to encourage them to do a self-directed project. And they had to work in a group and they had to present it to the class which they hated.

. . . we had them teach one of the classes; they could choose which topic.

If you want to sit in the back and you want to read charts . . . I will let you do that. But if you want to see everything and anything, you have to ask me and I will find the resource for you and we’ll go through it together.

On the one hand, teachers exhibited faith in their students.

The way that it was self-directed was that they had a manual and they had the demonstration classes and they were expected to take their manual and to deal with that material on their own . . . if they needed assistance . . . they could come and ask for remediation.

The student is expected to direct her learning needs. She was supposed to identify areas that she wanted experience in.
I asked them . . . what do you wish to do . . . what do you want to see, what do you want to participate in . . . you're here to search out your own experiences . . .

. . . the expectation that they will have looked . . . at this material . . . I . . . try to avoid . . . teaching what I've already expected them to do.

On the other hand, there seemed to be little faith in students. Teachers seemed to feel responsible for both teaching and learning.

I would rather teach everything rather than just this much . . . I always feel as if I'm cheating somebody who's a novice. . . . If I don't teach everything, it's not that they won't be able to function but it means it will take them longer before they're ready to function . . .

I think if you would ask the other teachers in the same group, they would say well, we are expecting them to know and how can we be sure that they know everything unless we stand up there and lecture about it?

. . . I keep thinking, is it because I'm not getting this across, is it my fault . . . you can't help but sort of think . . . if I had done this differently . . .

. . . sometimes they [students] feel that their past experience should qualify them as having known an awful lot so then, if you are giving them this material which . . . is
very different from what they already know . . . they
sometimes resent . . . that you’re not treating them as an
adult.

. . . so by the end of the time I have sat in on all the
groups so that I make sure the information is valid and
correct and they didn’t forget anything.

In any case, teachers demonstrated sensitivity to students’
needs.

The student would come in and initially we’d talk for a few
minutes socially, more or less, just to sort of settle
everybody down . . . we tried to keep things as relaxed as
possible and to make the students feel as comfortable as
possible . . .

In the afternoon, I would try to see if we could lighten up
material . . . because six hours of sitting is a long time to
absorb new material.

I had made up a learning package of instruments . . . it was
set up in a way that they could test each other at lunch time
or at home . . . anything to help.

The requirements (i.e., the knowledge, skills, and attitudes)
that educators needed to facilitate self-directed learning sounded
familiar.
You have to have some sort of knowledge... what self-directed learning is, what it involves, and also what resources would be necessary to help someone to be able to take advantage of that method of learning.

You need some knowledge regarding teaching... and learning principles to start with.

... everybody learns differently... you have to... figure out... how they learn best...

... good communication skills... you have to be quite confident... to get self-directed learning going... is harder.

... there has to be a good relationship... there has to be a person, not a machine, that somehow or other liaises with that student and the material... rapport; you have to be on the same wave length.

... you have to be comfortable with yourself as an individual... one of my greatest assets is that I can say I don’t know.

Educators recognized the transition to self-direction. They understood that students require help to assume responsibility for their learning and to learn how to learn.

... students... have the ability to do it; what they need to be shown is how to go about it.
... it was how do I do it, how do I research this, how do I go about facilitating my own learning ... they needed help ... you'd be amazed ... they wouldn't know how to work in the library.

... terminal objectives are very important; you have to provide the individual with what the end goal is, what the end picture's supposed to look like.

And I also find that they're more inclined to need direction initially in any kind of program no matter what their level is and what their age is, what their maturity, what their experiences; they need to know what's expected of them in very concrete terms and then ... they take off.

Since Group I's program was not designed to encourage self-directed learning, it would have been unreasonable to expect that students had been oriented to self-directed learning. Teachers appreciated the need, however, for such an orientation.

... [students] almost have to have a course in self-directed learning in order to know what the expectations [are] ...

... do I take 15 hours of my 30-hour course to teach them what self-directed learning is all about because I think in a sense it is not fair to drop people in?
Any orientation would have had to deal with students’ perceptions about teaching and learning. These perceptions were similar to those expressed earlier.

- It was difficult on the students . . . they would say . . . well you never said that in class, thinking that was the only mode of learning . . .

- . . . the individual makeup of the class is probably more dead against doing anything; they just want to sit there and give it to me and don’t "hassle" me with any of this other stuff . . .

- I would like students to be an awful lot more self-directed but the students’ perception of it stops me . . . they will see it as the teacher doesn’t do her job well; she just wants to "dump" this, to do it on our own; she’s paid to teach this, she can’t be bothered.

Self-directed learning was seen as an effective way of learning.

- The best way to learn is to do it yourself. . . . I had a couple of professors at university who are just devoted self-directed learners and I would complain . . . but at the end of it, when I handed something in, I really knew it, and that was because I had researched it, I had spent hours in the stacks, but I felt really good . . .
... you have more freedom, you have more time ... it
gives you a greater feeling of self-worth ... I found it
much more satisfying ... it is more stressful ... you
really have to be prepared all the time ... there's a
constant expectation of commitment to your peers as well
... not only in being prepared but in this whole
sensitivity to ... what their needs are ... you become a
teacher and a learner at the same time.

But self-directed learning was seen as an effective way of
learning (and teaching) only when there was sufficient time. Time
continued to be a problem with self-directed learning.

It honestly is the best way to learn ... when you have the
time to really use it ... you can stretch it.

What I like to do and what the organization that I work for
allows me to do in terms of time are two different things
... most things ... are not structured to be self-
directed because to be self-directed takes more time.

Our courses were relatively short-length ... if it were a
one-day-per-week course you could do more with it in terms of
self-directed learning because they had the time to work on
it ... if it's like a Monday-to-Friday course, it's
difficult.
If students had appreciated their strengths, time might have been less of a problem.

- They bring with them knowledge and strengths that they somehow think aren't applicable . . .

- I'm always "harping" on . . . my students . . . recognize your strong points . . . you have time now to look at what you're not good at.

Once again, educators did not know if students were ready for *self-directed learning* and students may have been more ready than educators admitted.

- . . . I've never thought about that; I've always thought of it from the other end down—is the college ready for self-directed learning as opposed to are the students ready.

- It's difficult [to know students' readiness for self-directed learning] when you're with them a short time . . . it's difficult when you have a large number of students.

- The student might not have the insight into her learning need, certainly initially, but most of them did have and then they would ask for those kinds of experiences . . .

- . . . it's really incredible how closely they come to approximating what I have . . . I usually throw mine up on the overhead and theirs would be on . . . the board and there's [sic] very few things that they do not cover.
Educators voiced the same concerns about self-directed learning that were raised earlier, concerns that affected both teachers and students. The complexity of students' lives off campus, exams and marks, and the clinical setting all made self-directed learning difficult.

Educators indicated that they, too, learned to facilitate self-directed learning by teaching and reflecting on their teaching. The focus of this reflection, however, did not seem to be the learner or how the learner learns best.

- We looked at our exams constantly; we had workshops to help us upgrade ourselves in the aspects of exam-making questions [sic] or exam grading. We looked at our approaches in the lab, how are we testing the students; we came up with new tools all the time of how to evaluate them. We were very critical of ourselves.

- I also think I learned, as time went on, how do I get them to do this so that it is successful . . . it was sometimes learned through mistakes. We would discuss it as a team at the end of the year, you know, when we were looking at curriculum changes.

**Summary**

One educator described her professor as a master facilitator of self-directed learning.
I mean, this guy ... I worked my "buns" off ... and I would have to say that most everybody did and if that guy communicated more than six sentences in two weeks ... I mean, he sat there; he might say the odd word, you know ... he was a master. ... I learned so much. ... he was very well prepared in terms of exactly ... laying out the course; there was no doubt about what you did every week ... he was a very caring person. ... maybe it's the ability to keep people on edge. ... although you were scared ... but if you got into difficulty he would encourage you ... he would stimulate you ... he would take issue perhaps with what you said but was able to do it in a very non-threatening type of way. ... I can't explain ... it's like a magical sort of thing to me ... I look at these people and I think, what is it that they do and what is it that they know that is bringing this to such a successful learning experience.

A qualitative analysis presents multiple truths rather than any single truth. Furthermore, a qualitative analysis provides a perspective only, on the realities under study. Nevertheless, this data analysis may have revealed what the master knows and what the master does.

The master facilitator was learner-centred. The focus was the learner and how the learner learns best. Self-directed.
learning was more than a technique; it was a rationale for practice to which the faculty and institution were committed. Self-directed learning was a learner-centred approach to teaching that enabled students to take responsibility for their learning. The master gave up much control of the learning process, had faith in students, and guided them during their transition to self-direction. Self-directed learning was also a way of learning; the heart of self-directed learning was learning how to learn.
Chapter Five

Summary and Conclusions

God says to me with kind of a smile,
"Hey how would you like to be God awhile
And steer the world?"
"Okay," says I, "I’ll give it a try.
Where do I set?
How much do I get?
What time is lunch?
When can I quit?"
"Gimme back that wheel," says God,
"I don’t think you’re quite ready yet."

Shel Silverstein
God’s Wheel

Research Findings

1. According to the data, to facilitate self-directed learning in a community college continuing education program in nursing, the following conditions, which are interrelated, must be present:

   (a) a clear understanding by students, faculty, and the institution, of the concept of self-directed learning,
   (b) institutional commitment to self-directed learning,
   (c) faculty commitment to self-directed learning,
(d) faith on the part of faculty and the institution, in students' ability to be self-directed,
(e) faculty guidance for students in their transition to self-direction, and
(f) the ability of faculty to relinquish considerable control of the learning process.

2. The crucial issue in facilitating self-directed learning is the issue of teacher-control.

3. There is evidence of incongruency between educators' espoused theories of practice and their theories-in-use.

4. Educators' teaching experience can be a valuable and valid source of knowledge.

Discussion of Research Findings

These findings are not new; they are supported in the adult education literature. And yet it was only by conducting this research study and by reflecting on this experience that the findings became meaningful for me. The research findings suggest that the process of enhancing self-direction in learning within formal instructional settings may not be as elusive as Gerstner (1988) has attested. Conditions that are necessary for facilitating self-directed learning have been identified. The difficulty lies in getting institutions and faculty to put these conditions into practice.
To facilitate self-directed learning requires a clear understanding by students, faculty, and the institution, of the concept of self-directed learning. There does not appear to be a clear understanding of this concept. To nurse educators in Group I, self-directed learning is a methodology, an option available to teachers. Nurse educators in Group II view self-directed learning as a way of being, a philosophical approach to teaching.

Self-directed learning must be recognized as more than a tool. Competent practice requires professionals to adopt the notion of personal responsibility for their own learning. This calls for perspective transformation (i.e., a different view of knowledge, of learning, and of the teaching/learning transaction) (Brundage, 1988). As Brundage (1988) explained, knowledge comes from being a reflective practitioner (Schön, 1983, 1987), from the personal integration of information; learning is meaning making (Mezirow, 1981, 1985b); and the teaching/learning process is one of collaborative dialogue.

According to Gerstner (1988), "an undue emphasis on self-directed learning fails to recognize both the individual and societal reality of interdependence which exists in modern contemporary society" (Gerstner, 1988, p. 171). But self-directed learning does not mean independent learning. For Griffin (1978-79), the goal of self-directed learning is interdependence. As a matter of fact, she stated it would be a great mistake to make independence the goal for learners. This is another lesson to be
learned from autodidaxy. Autodidacts seek help from experts in their field and they create their own learning environment for sharing their interests and skills. McMaster University’s medical program is an exemplar of interdependence in self-directed learning in a formal instructional setting (see Appendix I).

Apparently, Gerstner (1988) is unfamiliar with the McMaster program. She claimed it would be ill-advised, from a personal and societal point of view, to rely primarily on self-directed learning to study medicine. She thought the process would be inefficient and that application of the medical sciences requires an understanding of and adherence to established knowledge. For what subject matter, then, is self-directed learning best suited? How can medical students (and for that matter, all students) prepare themselves to meet the changes in established knowledge? Does self-directed learning mean that no objectives or direction are provided? Is the calibre of self-directed learning less than that of other-directed learning? Implicit in any understanding of self-directed learning must be an appreciation for the significance and value of having learners assume greater control over their learning.

**To facilitate self-directed learning requires institutional commitment to self-directed learning.** Self-directed learning is a different way of thinking. Consequently, an orientation to the concept of self-directed learning must be provided for faculty and
students. Both need to examine their perceptions about their roles and responsibilities and their views about teaching and learning. A variety of appropriate resources must be available and accessible and students must be helped to use these resources.

An institution committed to self-directed learning is an institution committed to the learner. The focus is on learning; everything revolves around the learner and helping the learner to learn. There is faith in students' ability to be self-directed. Not all classes need to be mandatory and classes are available to assist students with the application and clarification of knowledge. Classes are not designed for the presentation of information.

In a self-directed learning program, including the one in this research study, the evaluation of learning poses problems for students and faculty. It is the most political of all the educational processes and the one area where issues of power are most at stake (Heron, 1988). With formal assessment, adults are prevented from taking responsibility for their own learning (Usher, 1985). But even an evaluation system that incorporates peer and self-evaluation (e.g., McMaster University's medical program) comes under criticism. Clearly, the evaluation of learning needs more attention from institutions committed to facilitating self-directed learning.
To facilitate self-directed learning requires faculty commitment to self-directed learning. Faculty commitment to self-directed learning is necessary because in many respects, self-directed learning is more demanding and time-consuming than teacher-directed learning. But perhaps, most importantly, commitment is essential because the adult educator sees his/her responsibility as empowering students to be effective learners, to take charge of their education (Freedman, 1985). Educators' most potent influence is through their role as exemplar (Boud & Prosser, 1980). Originally, I thought that educators had to experience being a self-directed learner themselves in order to become committed to self-directed learning and a role model for it. My research findings indicate that personal experience with self-directed learning is not necessary for educators' commitment to self-directed learning. What is necessary is institutional commitment and support.

To facilitate self-directed learning, the faculty and institution must have faith in students' ability to be self-directed. To have faith in students' ability to be self-directed is to have faith in students' ability to exercise some freedom about what and how to learn. In discussing Knowles' and Maslow's view of freedom, Podeschi and Pearson (1986) pointed out that for Maslow, learners' desire for freedom and self-actualization must coexist with their need for safety. The authors claimed that this
need for safety is not part of Knowles' view of freedom. While faith in students' ability to be self-directed is essential, it is not enough. To facilitate self-directed learning, the educator must balance the learner's need for structure with the learner's need for growth.

Faith in students' ability to be self-directed is also a prerequisite of empowering learners. But one cannot, as Freedman (1985) claimed, empower anyone else. One can only create the conditions that will enable people to become empowered. This is the challenge for the facilitator of self-directed learning.

To facilitate self-directed learning requires faculty guidance for students in their transition to self-direction. Educators must be sensitive to the fact that the transition to self-direction is a major reorientation for learners that takes time. It took one of the educators in this study three years, as a self-directed learner, to appreciate the value of self-directed learning and become committed to it. Not only does it take several years to internalize the assumptions underlying learner-control, but there is a tendency for learners to backslide when encouragement for self-direction is withdrawn (Candy, 1988).

To guide learners in their transition to self-direction, faculty require the following: a clear understanding of the concept of self-directed learning, expertise in their content area so they can concentrate on process and decide on outcomes,
knowledge of available resources, and facilitation and group
dynamics skills. **Most important of all, however, is the**
**educator's ability to relinquish considerable control of the**
**learning process.**

The research findings indicate that the ability to give up any control is often rationalized. Educators from Group I claimed, "there's too much content to cover," "students aren't ready for it," "there isn't enough time." In addition, students are often more comfortable with the didactic approach, particularly in a certificate or degree-granting program, and they often pressure teachers to teach. Griffin (1978-79) had this warning:

> The temptation is immense to take back the control you put in their hands and say, "I will save you; I will plan the rest of the course for you." Of course their response would be ... "See, we knew you really didn't mean it when you said we were to be self-directing." We must watch carefully how we do respond at that point, which inevitably comes. (p. 41)

**The crucial issue in facilitating self-directed learning is the issue of teacher-control.** All of the suggestions for facilitating self-directed learning (see Chapter Two) help learners assume greater control over some aspect of their learning. But we have seen how hard it can be for educators to give up much control. And it is this inability to relinquish
considerable control of the learning process that makes facilitating self-directed learning so difficult. It also results in incongruency between educators' espoused theories of practice and their theories-in-use.

Educators have been urged to examine their theories-in-use so they can eliminate discrepancies between theories-in-use and espoused theories of practice (Schön, 1983, 1987). As the research findings illustrate, it is easier to espouse self-directed learning than to implement it. Educators in Groups I and II define self-directed learning as taking responsibility for your own learning. They recognize the necessity of encouraging self-directed learning, particularly with the adult learner.

While educators from Group II share control of the learning process with their students, they admit that giving up control can be difficult. Nurse educators from Group I maintain control, even of those activities they describe as encouraging self-directed learning. Achieving congruency between intentions and actions is problematic in the clinical setting with its emphasis on skills, procedures, and patient safety. This finding was corroborated in Stanko's (1981) analysis of the clinical experience of diploma nursing students:

In theory, the program appears to stress self-direction. Instructors certainly emphasized to the students that they were responsible for attaining required information. This appears, however, to be a double message. Students are told
to be independent, to be self-directed in their learning but never make a mistake. (p. 119)

*Educators' teaching experience can be a valuable and valid source of knowledge.* I have come to appreciate the legitimacy of experiential knowledge. The nurse educators I interviewed who have self-directed learning expertise provided me with the same information on facilitating self-directed learning that I obtained from the literature. "That practitioners have brought out these models [of theorists] . . . in every class I have taught affirms my belief in the primacy of practice and in the necessity of beginning with practitioners' experienced knowledge" (Hunt, 1987, p. 74).

As a result of my interviews with nurse educators, my thinking about self-directed learning has changed. The educators in this study helped me to understand that self-directed learning readiness is not an issue. At first I wondered how educators can encourage self-directed learning without knowing if their students are ready for it. When educators adopt the view that self-directed learning means taking responsibility for your own learning and that this involves helping students in their transition to self-direction, then self-directed learning readiness is not a concern. Furthermore, it is understood that students will require greater assistance in the initial stages of self-directed learning and with certain subject matter.
I was convinced that program constraints make self-directed learning difficult. From the second group of educators I learned that it was not program constraints I should be thinking about; it was that self-directed learning requires institutional support. I also spent so much time thinking about the uniqueness of self-directed learning that I lost sight of the fact that self-directed learning is simply another aspect of learning. I wonder if Gerstner (1988) has not done the same. Are not the capacities she identified as being necessary for self-directed learning (e.g., cognitive dissonance, decision-making, persistence, reflectivity) necessary for all learning? What makes these capacities unique to self-directed learning?

**Implications for Practice**

Adult educators have been urged to develop a rationale for their practice (Brookfield, 1988b). Self-directed learning is a rationale for practice; it is a way of steering the teaching/learning world. With its focus on helping learners to assume greater control of their learning, self-directed learning should be part of all education in formal instructional settings. Self-directed learning is not unique to adult education but it is a crucial part of adult education.

The heart of self-directed learning is learning how to learn. From the discussion of autodidaxy, we saw that self-taught adults become aware of how they learn, develop rules for their learning,
and use reflection and action in their learning. This is what it means to learn how to learn. It is another important lesson of autodidaxy. Nurse educators must help their students learn how to learn.

In continuing nursing education, educators are often hired on a part-time basis and for their clinical, rather than their teaching expertise. Williams' (1985) study suggested that adult educators learn on the job without adequate understanding of their students or teaching strategies. Health professions training needs to be accepted as adult education (Cranton & Kompf, 1989). Learning for professional practice has to go beyond the acquisition of knowledge and skills to involve the development of the person (Brundage, 1988). This means helping learners to develop a "consciousness of themselves as learners" (Brundage, 1988, p. 37). It is an essential part of learning how to learn and it requires nurse educators to involve their students in self-reflective learning.

For the student, engaging in self-directed learning can be difficult. Every effort must be made to reduce students' anxiety about self-directed learning. Institutions must ensure that students are oriented to self-directed learning and that they have the necessary reading and comprehension skills. The program must be organized so that sufficient time is provided for learning. In addition, class size must be conducive to the exchange of learning.
And finally, are we, as educators, ready to steer the world? Are we ready to ask the right kinds of questions, questions that will inform our educational practice?

**Recommendations for Further Research**

Adult education research questions must have practical application and universality, and they must contribute to a deeper understanding of the field (Rachal, 1986). How does Gerstner’s (1988) recommendation for research on the influence of brain physiology on the capacity for learner self-directedness meet Rachal’s (1986) criteria? How does this fit with Gerstner’s (1988) claim that it is questionable whether self-directed learning can be adequately understood through quantitative measures? As I stated in Chapter One, there is now greater concern for meaningfulness in the research process and greater regard for qualitative methods. It is to qualitative kinds of research that we must turn for greater understanding of self-directed learning.

1. Further research is required on the process of facilitating self-directed learning. This research study provides data on the prerequisites or necessary conditions for facilitating self-directed learning in a community college continuing education program in nursing; it does not examine the process of facilitating self-directed learning in this type of instructional
setting. What strategies do nurse educators actually use to facilitate self-directed learning and with what effect? How can self-directed learning be facilitated with different adult learners and in different learning situations? Observational data on the behaviour of nurse educators as facilitators of self-directed learning, in conjunction with interview data on the perspectives of both learners and educators, would increase our understanding of the facilitation process.

2. Research into the needs and problems that nurse educators encounter in facilitating self-directed learning should be conducted. Specifically, how can self-directed learning be facilitated most effectively in the clinical setting? How should learning be evaluated in a self-directed learning program?

3. Since the crucial issue in facilitating self-directed learning is the issue of teacher-control, further research on the factors that influence teacher-control would be useful. For example, what are nurse educators' values and assumptions about teaching and learning and how do they affect the degree of control that educators exercise over the learning process?

4. How can learning theories contribute to our understanding of self-directed learning? For example, according to Bandura's (1977) concept of self-efficacy, whether or not individuals try a
particular action depends upon their beliefs about their own effectiveness. Bandura distinguished efficacy expectations from outcome expectations (i.e., people's estimates that a given behaviour will produce certain outcomes). People cognitively process all kinds of information about their capabilities which to a large extent, determines their behaviour. What can research into self-directed learners' thinking processes tell us about learners' resistance to self-directed learning?

5. Increasing attention is being paid to the role of reflection in learning, including self-directed learning. Reflection is important in learning, change, and growth (Boyd & Fales, 1983). Meaning, which can only be discovered through personal reflection, may be the ultimate goal of learning (Barer-Stein, 1987). Schön (1983, 1987) has advocated an epistemology of practice based on reflection-in-action. Further research is needed into the role of reflection in self-directed learning. Might such research also provide insight into the education/training dilemma or into ways to incorporate self-directed learning in clinical teaching?

6. Studies on autodidacty can teach us a lot about autonomy in learning. We have already learned that autodidacts use reflection and action in their learning, that they are interdependent learners, and authors of their own destiny, all of which have implications for facilitating self-directed learning. What are
the implications for facilitating self-directed learning, of other characteristics of autodidaxy (e.g., that learning proceeds heuristically)?

7. The findings of this study are time- and context-bound and can therefore not be generalized. Would these findings be replicated in similar studies in other community college continuing education programs in nursing or in diploma nursing programs?

"If the subject matter of the field is the process of adult education, then the actual behaviour of students, teachers and administrators and their interpretations of their experience are of central importance for developing theory and upgrading practice" (Long, Hiemstra & Associates, 1980, p. 69).
Facilitating Self-Directed Learning: A Metaphor

L = Learner

1. Clear understanding of self-directed learning
2. Institutional commitment
3. Faculty commitment
4. Faith in students
5. Guidance in transition to self-direction
6. Relinquish considerable control of learning process
When I heard the learn'd astronomer,
When the proofs, the figures, were ranged in columns before me,
When I was shown the charts and diagrams, to add, divide,
     and measure them,
When I sitting heard the astronomer where he lectured with
     much applause in the lecture-room,
How soon unaccountable I became tired and sick,
Till rising and gliding out I wander'd off by myself,
In the mystical moist night-air, and from time to time,
Look'd up in perfect silence at the stars.

Walt Whitman

When I Heard the Learn'd Astronomer
References


Boud and V. Griffin (Eds.), Appreciating adults learning: From the learners’ perspective (pp. 159-178). London: Kogan Page.


*Dissertation Abstracts International, 49*(1), 27A.


Developing student autonomy in learning (2nd ed.) (pp. 77-90). 
London: Kogan Page.

1, Syracuse University, NY. (ERIC Document Reproduction 
Service No. ED 198 304)

Some implications for practice. Occasional Paper No. 2, 
Syracuse University, NY. (ERIC Document Reproduction Service 
No. 262 259)

implications for facilitators. Occasional Paper No. 3, 
Syracuse University, NY. (ERIC Document Reproduction Service 
No. ED 262 260)

Higgs, J. (1988). Planning learning experiences to promote 
autonomous learning. In D. Boud (Ed.), Developing student 
autonomy in learning (2nd ed.) (pp. 40-58). London: Kogan 
Page.

Hindle, J. (1980). Significant learning experiences and self- 
directed learning of graduate nurses in a continuing education 
program in Ontario. Unpublished master's thesis, OISE, 
Toronto.

Delta Kappan, 64(4), 274-275.


McMaster University. (No date available). *The small group tutorial*. Hamilton: M.D. Program, Faculty of Health Sciences, McMaster University.


H.B. Long and Associates (Eds.), *Self-directed learning: Application and theory* (pp. 199-221). Athens, GA: University of Georgia.


Appendix A

Interview Questions

1. I'd like to get a sense of what you do as an educator, both in the classroom and the clinical area. First of all, what do you do in a typical class?

2. What do you do in a typical clinical experience?

3. Let's look at what you said you do in the classroom. Can you think of other things you do? And are there classroom activities you do that encourage self-directed learning?

4. Let's look at what you said you do in the clinical area. Can you think of other things you do? And are there clinical activities you do that encourage self-directed learning?

5. Help me to understand what you mean by self-directed learning.

6. What do you think the difference is between self-directed learning and other kinds of learning?

7. How did you come to your understanding of self-directed learning?

8. What knowledge and skills do you find you need, as a nurse educator, to be able to encourage self-directed learning?

9. Do you feel you have the knowledge and skills you need?

10. How do you know if your students are ready for self-directed learning?

11. I can't help but wonder how your ability to encourage self-directed learning is affected by your specialized subject matter
and specialized clinical environment. Can you tell me how your subject matter and clinical environment affect your teaching?

12. For you as an educator, what’s the most important thing for bringing about self-directed learning?

13. Do you think nursing education should encourage self-directed learning?

14. I’m wondering if you take time to think about or reflect on what you do as a nurse educator.

15. Are there activities that you do in the clinical area that help students to think about or reflect on their nursing experiences?

16. I’d like to end by asking you if you see a connection between the student’s ability to reflect on his/her experiences and the student’s ability to be self-directed.
Appendix B

Preamble: Guided Interview With Informants

Thanks so much for taking time to talk with me about self-directed learning. It's a concept that's been accepted in nursing education for a long time but still seems to be poorly understood. I'm interested in learning about your perspective of self-directed learning--how you understand it, how you feel about it, and what you do to encourage it. You're the expert; you're teaching me.

Before we start, I want to clarify a couple of things:
1. First of all, I'd like to review the consent form with you and ask you to sign it. You'll notice (and remember from our telephone conversation) that this study is part of the requirements for my M.Ed. degree; it hasn't been commissioned by your college and it's not an evaluation of your program.
2. The interview is being tape-recorded so that I can transcribe the interview verbatim. In this way, I don't miss important information. It also provides me with quotations which are a very important part of the thesis. Quotations are anonymous and your name will not appear in the study. Please try to ignore the tape recorder if you can.
3. I'll also be taking a few notes while you're talking. I may want to ask you about something or follow up on something.
4. As you know, I'm trying to understand and "capture" your perspective. It's therefore crucial that I share my findings and interpretations with you and that you let me know if you agree
with these findings and interpretations. Also, if I find, while I'm transcribing the interview, that there's something I don't understand, can I call you?

5. I want to reiterate that what you say is confidential and that your anonymity will be protected.

6. And lastly, I hope you'll think of this interview as a conversation. There's a focus to it but I hope you'll feel comfortable to say what you want about self-directed learning and to share anecdotes of your experiences with self-directed learning. There are no "right" or "wrong" answers. If there's a question you don't want to answer, that's O.K. Are there any questions you'd like to ask me?
Appendix C

Educator Consent Form

I, __________________________, consent to participate in a study about self-directed learning in a community college continuing education program in nursing.

I understand that I will be interviewed by Millie Bilsky, the researcher, for approximately one hour, either at the community college, my other place of employment (if a part-time faculty member), or my home, whichever I prefer.

I understand that the interview will be tape-recorded which will help Millie to recall our conversation.

I understand that Millie will share her perceptions and observations of the interview with me in writing. I understand that I will be required to let Millie know if I agree with her perceptions and observations. In the event that I disagree, I understand that Millie and I will come to an agreement before Millie includes this information in the study.

I understand that my decision to participate in the study is voluntary. In addition, I understand that I may refuse to answer any interview question if I wish and that I am free to withdraw from the study at any time.

I understand that all information will be kept confidential and that at no time will my name or other identifying characteristics appear on the recorded tape or in the study.
I understand that should any problem(s) arise during the interview, that Millie will request my permission to discuss the problem(s) with an appropriate person.

Date ____________________  Signature ____________________
1. I'm really interested to know what you do as a nurse educator. So first of all, I'd like you to transport me into your classroom. What would I see you doing in a typical class?

2. And what would I see you doing, in your class, to encourage self-directed learning?

3. Of course, I'm also interested to know what you do as a nurse educator in the clinical area. Now I'd like you to transport me into your clinical area. What would I see you doing in a typical clinical experience?

4. And what would I see you doing, in the clinical area, to encourage self-directed learning?

5. Before we continue talking about self-directed learning, I want to make sure that I understand what you mean by that term. Help me to understand what you mean by self-directed learning.

6. How did you come to your understanding of self-directed learning? How did it develop?

7. How did you learn to encourage self-directed learning?

8. You've had a lot of experience with self-directed learning. I'd like to learn from your experience about how the educator facilitates self-directed learning, about the "conditions" that are necessary for encouraging self-directed learning. Tell me what you think I need to think about; what are the issues I need to consider?
9. If I were a nurse educator and I wanted to encourage self-directed learning, what knowledge would I have to have?

10. What skills would I have to have?

11. And if I asked you, "what's the most important thing for me as an educator to bring about self-directed learning?" what would you tell me?

12. I'd like to turn our attention now to the student. How do you know if your students are "ready" for self-directed learning?

13. How "ready" are they?

14. Now I'd like you to think about a number of different things that may affect your ability to encourage self-directed learning. I'm thinking, for example, of your subject matter/the content you have to teach, of your clinical environment, and even the college in which you work. Can you think of other things?

15. Can you elaborate on these things?

16. This next question is more "general" than the others but I think it's an important one. I'd like you to describe for me, very briefly, your philosophy of education. (Possible probes:
- how you see your role as a teacher
- your beliefs about how adults learn
- is self-directed learning the "best" way to learn?)

17. I want to end our interview by sharing with you a couple of questions that came up as a result of my interviews with other nurse educators. I'd like your help to answer these questions.
(a) What does the term self-directed learning really mean? There was a contradiction between the activities educators described as encouraging self-directed learning and educators’ definition of self-directed learning. I wonder if you can help me understand this contradiction.

(Possible probe: what’s unique about self-directed learning as compared to "just" learning?)

(b) Is self-directed learning always encouraged because it’s believed to be a "good" way to learn or is it ever encouraged out of necessity, for example, students have to be more self-directed because the teachers can’t cover all the content in such a short period of time?

(c) The educators who were interviewed had all been self-directed learners themselves in college. Their experience as self-directed learners influenced them to encourage self-directed learning in their students. If we want educators to encourage self-directed learning, how necessary is this experience? And what is significant about this experience?
Appendix E

Informed Consent Form

Title of Study: Facilitating Self-Directed Learning in a Community College Continuing Education Program in Nursing

Researcher: Millie Bilsky (613) 232-7024
275 Nelson Street, Ottawa, Ontario, K1N 7R9

This study is being conducted as part of the requirements for an M.Ed. degree from Brock University. At least one interview, lasting approximately one hour, will be conducted with each nurse educator/informant. Each interview will be tape-recorded. These tapes are for the sole use of the researcher and will not be shared with anyone. The M.Ed. thesis, however, will contain anonymous quotations from these tapes. While there may be no direct benefits to participants of this study, it is expected that the study will increase understanding about facilitating self-directed learning in a community college continuing education program in nursing.

THIS IS TO CERTIFY THAT I, ________________________________

HEREBY agree to participate in the above-named study.
I understand that the researcher will share her findings and interpretations with me in writing and that I will be required to let the researcher know, in writing, if I agree with these findings and interpretations. In the event that I disagree, I understand that the researcher and I will come to an agreement before the information is included in the study.

I hereby give permission to be interviewed, for the interview to be tape-recorded, and for anonymous quotations to be used in the study. I understand that all information will be kept confidential and that at no time will my name appear in the study.

I understand that my decision to participate in the study is voluntary. In addition, I understand that I may refuse to answer any interview questions and that I am free to withdraw from the study at any time. I have been given the opportunity to ask questions and all my questions have been answered to my satisfaction.

_________________________  _________________________
Nurse Educator/Informant    Researcher

Date: ______________________
Appendix F

Provisional Categories and Group I Member Check

1. **Didactic teaching is used in the classroom to present required content.** Even though various strategies are used in the classroom, teaching is primarily traditional/didactic. In using various teaching strategies, educators demonstrate a sensitivity to students’ needs. The strategies are also concerned with ensuring that the required content is covered and that students understand the content.

2. **Required content causes anxiety in educators and students.** Some educators are concerned about not covering all the content and students are concerned about not getting all the content. Students seem to feel more comfortable with traditional/didactic teaching.

   **Member check:** Course content/volume is unrealistic and measurable course objectives are unavailable.

3. **Educators indicate that they encourage self-directed learning.** They suggest two types of activities as activities that encourage self-directed learning: a) Activities that provide students with information/resources (e.g., optional readings) and b) Activities that require students to research information (e.g., drug study).
4. There are a number of program constraints that make self-directed learning difficult:

- Self-directed learning takes time.

**Member check:** All learning takes time; self-directed learning takes more time than traditional methods; with self-directed learning, the expectation is that time is required beyond classroom hours.

- The program is structured in a way that is not conducive to self-directed learning (e.g., much content to cover in a short time, exams and marks, large numbers of students).

**Member check:** The program imposes traditional/didactic teaching values.

- Students have a negative perception of self-directed learning (perhaps because of a., b., and c.):

a. Students are unfamiliar with self-directed learning and with facilitating their own learning in classroom settings.

b. Students have difficulty accessing the group for group assignments and are afraid of presenting their work to their peers.

**Member check:** This is not unique to self-directed learning.

c. Complexity of students' lives (work, home, school).

- Student differences (e.g., motivation, ability, way of learning); self-directed learning may also be influenced by personality.
- Nature of learning a skill does not lend itself to self-directed learning.
- Difficult to encourage self-directed learning with certain subject matter and in certain clinical environments.

Member check: The problem is the time frame allowed for learning, not the content, skill, etc.

5. Program constraints make it necessary for students to be self-directed. While program constraints make self-directed learning difficult, they also make it necessary for the educator to encourage self-directed learning in students (e.g., educator may be in the clinical area infrequently, too much content to cover in class).

6. Self-directed learning requires structure and resources. This is necessary both in the classroom and the clinical environment. Also, an educator (i.e., a person and not a machine) is needed to provide that structure.

Member check: Self-directed learning requires a baseline from which to "grow" rather than structure and resources; there is a need for terminal objectives.

7. Experience as a self-directed learner influences the educator to encourage self-directed learning.
8. The educator as a self-directed learner (role model) facilitates self-directed learning. The educator as role model recognizes students' expertise and utilizes their experiences.


   Member check: Institutional commitment to self-directed learning is essential.

10. To encourage self-directed learning requires knowledge of teaching and learning principles, including self-directed learning. Educators do not know, however, if their students are ready for self-directed learning.

   Member check: Educators do not know if their students are ready for any learning; not knowing students' readiness for self-directed learning should not be an issue if the teacher and institution make their philosophy and expectations clear to students; teachers should be able to facilitate the self-directed learning process with those students who may have more difficulty with it.

11. Educators encourage self-directed learning because of certain beliefs about teaching and learning (e.g., self-directed learning is the best way to learn, self-directed learning suits the adult learner, the need for lifelong learning).
12. **Reflection is part of teaching, including learning how to teach.**

13. **Reflection is part of learning, including self-directed learning.**
Appendix G

Group I Response to Questions Raised by Interviews

There was agreement that to understand the research problem of this study, one needed to consider the relationship between the learner, the task/subject matter, the teacher, and the environment. One educator indicated that not one of these "factors" can be "out of whack" with the others.

Question 1

To assume responsibility for learning, students must be able to identify what they need to know. Providing information and resources is also essential for self-directed learning, however, the student must be motivated to use these resources.

Question 2

Educators agreed that what is required for self-directed learning is also required for learning. One educator noted that teachers often don't have knowledge of teaching and learning principles. Another reiterated that students must want to be self-directed, they must have defined their goal, and they must have the maturity to be able to discipline themselves to learn independently.

Question 3

Self-directed learning (SDL) is encouraged out of necessity. According to one educator, SDL is "open to failure" when this is the case.
Question 4

There was agreement that experience as a self-directed learner influences the educator to encourage SDL. The experience of SDL gives one a greater sense of accomplishment and "ownership" of the learning. The self-satisfaction, excitement, and enthusiasm of "discovery type learning" motivates the educator to pass this on to his/her students so they can experience the same rewards. The independence one has as an independent learner (note reference again to independent learning) fosters a lifelong approach to gaining and processing information.

Question 5

There was no consensus among educators. It was suggested that while educators should not encourage SDL without knowing if students are ready for it, educators "had to start somewhere." It was also suggested that the student's readiness for SDL is crucial and that the student should actually seek out the SDL experience.

Question 6

The freedom offered by SDL is probably appreciated more by mature, independent individuals.

Question 7

Mastery learning was suggested as the appropriate method for acquiring content and that therefore it shouldn't matter whether or not the method for learning is self-directed. One educator wondered if the self-directed approach to learning wouldn't also generate anxiety in educators and students. Another outlined
several implications for encouraging SDL including: reexamine the volume of content and time frame given for learning, define SDL in terms that are meaningful to students, encourage ways of learning other than traditional/didactic learning (e.g., "experimental/accidental" learning).
Appendix H

Group II Member Check

For the most part, the six educators simply indicated their agreement with the summary of the data analysis sent to them. Four educators made the following comments:

1. I loved the way you described how the teacher had to give up control and examine her perception of the teacher’s role. Not everyone recognizes the difficulties for student, teacher, and institution in accomplishing this task. Perhaps it seems self-evident to you, but I think it is central and perhaps responsible for the successful use of this approach to teaching.

2. I haven’t added much to your notes--just some emphatic yeses!*
*Teachers must appreciate the transition to self-direction.
*Learning how to learn is the essence of SDL (corroborated by another educator).
- The educator felt that her quote (which I had included in the analysis) reflected concern for patient safety and not lack of faith in students. The quote was therefore deleted from the thesis.

3. Not only do students need to learn how to learn but they need to learn how they learn (corroborated by another educator).
I strongly agree that the clinical experience poses potential problems for SDL (corroborated by another educator).

4. "SDL as a way of teaching" implies directing/controlling. SDL as a way of educating/facilitating learning?

- I strongly agree with:
  · need for faculty and institutional commitment
  · need to have faith in students
  · the key is to be learner-centred; the focus is the learner.

- Concern was expressed with the following three quotes:
  a. "I usually sit on the desk at the front of the room . . ."
  b. "I put my foot down and I still have my foot down . . ." The educator asked if the facilitators' style really mattered.
  
  Note: The educator from whom the quotes were taken made no comment on the quotes.
  
  c. "It's all very idealistic to say go down to the library for three hours and research something . . . they might be goofing off down there . . ."

The educator indicated that maybe this is the student's choice, i.e., their direction that day is to relax now and work later.

Note: The educator from whom the quote was taken made no comment on the quote.
Appendix I

Highlights of M.D. Program, Faculty of Health Sciences, McMaster University

1. The main feature of the program is a problem-based learning approach. By analyzing health-care problems, students acquire and apply medical knowledge (Branda, 1986a). They also develop problem-solving/critical thinking skills (Branda, 1986b).

2. Other features of the program include:
   A. Self-directed learning (SDL), i.e., students are primarily responsible for their own learning. Students must:
      (a) recognize personal educational needs
      (b) develop a plan for learning
      (c) select and use appropriate resources
      (d) evaluate their learning progress.
   B. The small group tutorial. Students contribute to the learning of the group and evaluate group members’ educational progress.

3. The development of critical thinking skills is crucial in SDL (Branda, 1986b).

4. Lifelong learning is considered a necessity and a challenge; the program strives to develop SDL as a lifelong habit. Students are helped to learn how to learn so they can be lifelong learners.

5. SDL implies that the faculty provide a structure to facilitate and guide the learning process.
6. Students are used to didactic teaching and "may suffer the culture shock of transition to a less teacher-dependent form of education" (Walton & Matthews, 1987, p. 543).

7. Students need to be oriented to the rationale underlying problem-based learning and trained to develop the necessary skills (Walton & Matthews, 1987).

8. Students have to be helped to use resources.

9. Problem-based learning is part of a whole curricular approach; it is not a method in its own right. It represents a particular interpretation of the teaching-learning process which is very different from the one implicit in the didactic method (Walton & Matthews, 1987).

10. Problem-based learning requires clear and agreed-upon objectives.

11. Program objectives are student-centred (Branda, 1986a).


   It should be a principal objective to put students into the driver's seat, with appropriate protection for the patient, as a valid way of helping to motivate them and to allow a sense of responsibility to grow. Such a sense is not fostered by listening to members of staff lecturing at them. (p. 549)

13. Another goal is the acquisition of skills that include reflection and deliberation. In problem-based learning, students
are encouraged and helped to become "reflective practitioners" (Walton & Matthews, 1987).

14. Problem-based learning does not imply that other teaching methods are discarded. Lectures, seminars, demonstrations, etc. can be integrated into the curriculum.

15. There is excitement in learning, discovering, and solving problems.

16. It is a bonus if teachers and students are both learning.

17. Teachers need time to develop understanding of the teaching skills required; their role has to change from lecturer to facilitator of learning. Workshops for tutors are essential.

18. The tutor requires certain knowledge, skills, and personal attributes (Branda, 1987) including:

1. Knowledge of:

   (a) learning resources
   (b) principles and methods of evaluation
   (c) steps involved in promoting problem-based learning, problem-solving, and critical thinking
   (d) rationale and techniques of SDL
   (e) group dynamics.

2. Skills in:

   (a) facilitatory teaching (e.g., challenging students, referring students to resources, avoiding lectures unless this is justified and agreed-upon)

   (b) promoting group problem-solving and critical thinking
(c) promoting efficient group function (e.g., serve as a role-model)
(d) promoting individual learning
(e) student evaluation and coordinating the evaluation of students.

3. An acceptance of:
(a) the problem-based approach
(b) the SDL approach
(c) the small group tutorial.

19. Extensive subject-mater knowledge can be a valuable asset for the tutor as long as the tutor understands his/her role is a facilitator and not a supplier of information. The tutor also has to be able to say I don’t know but let’s check it out or get a resource person to help us (McMaster University).

20. Concern is often expressed about the greater time needed to "cover the subject"; those who use a problem-based learning approach have found no need to increase the amount of teaching time (Walton & Matthews, 1987).

21. Faculty identified problem-based learning, tutorials, and SDL as major program strengths and evaluation of student performance as a weakness; graduates value the problem-based, SDL methods but are critical of the evaluation system (Woodward, 1989). The problem of evaluation is corroborated by Hamilton (1976); Neufeld, Woodward, & MacLeod (1989).
Appendix J

Highlights of Personal Journal

August 3, 1990

- After reading Lincoln and Guba, I feel I have a better understanding of naturalistic inquiry; at least I can proceed with the data analysis. For me, other authors are unclear, non-specific, and contradictory.

- I feel Lincoln and Guba should be required reading for students doing qualitative research for the first time.

- Thought all along that what I was doing was useless, that my questions were "garbage." Not aware until reading Lincoln and Guba that one starts off from a position of "I don't know what I don't know."

- While I'm still not sure I'm in a position of "I don't know what I don't know," I have a "hunch" from the interviews that experience as a self-directed learner, that incorporating self-directed learning (SDL) as being of value, are important in enabling nurse educators to encourage SDL. The problem I seem to be investigating is "what conditions are necessary so that nurse educators are able to encourage SDL?"

- Still confused about method of interviewing and triangulation. Lincoln and Guba advocate that interview notes be hand-written. I'm not comfortable with that; I'd prefer to tape-record and note highlights while I'm listening to respondents, and
to use probes. I expect to "check out" my hunches with a comparable group of nurse educators and to ask them "what do I need to know/look at?" My questions will change in a number of ways: check hunches; be more specific; fewer in number; include question on educators' philosophy of education. I also think my research questions are wrong or inaccurate. I'm not asking about attitudes and perceptions; I'm dealing with nurse educators' understanding of the concept of SDL and the process of facilitating SDL and where this understanding came from. I may be dealing with reflection but not with critical reflection.

- Re: triangulation. Is it sufficient to interview other sources, i.e., nurse educators from another community college, or do I need to triangulate by different sources and different methods (e.g., should I look at documents on SDL)?

- I'm concerned about the need to understand the context. What information must I provide to "get a handle" on context?

- Other confusion is around theory behind the study. It has been suggested to use the most powerful one; I seem to go along with Lincoln and Guba who assert this may not be necessary with grounded theory (theory "grounded" in the data).

- Have decided to use Lincoln and Guba's method of constant comparison (adapted from Glaser & Strauss) for processing the data; seems clearer than what has been advocated by Glaser and Strauss, even Patton.
From interviews:

1. I haven't made connection re: reflection clear and must give this more thought.

2. Seems inappropriate to see if perceptions (really understanding) of SDL held by nurse educators are (are not) congruent with perceptions (understanding) of SDL held by their students. Some of the educators hadn't taught at the college for a few years so it would be difficult to locate their particular students. Time lag will be too great; most importantly, I think the focus should remain on the nurse educators and their values and experiences.

3. Struck by the fact that educators are unaware of or have given no thought to student readiness for SDL.

4. Apparent lack of "formal" attempt to encourage SDL (i.e., techniques designed to encourage SDL).

5. Reflection seems to refer to assessment/evaluation.

6. Struck by students' negative reaction to SDL.

7. Need to consider external pressures on students which make SDL difficult.

8. Apparent agreement that structure plays an important part in SDL.

How analogous is my situation (i.e., doing a qualitative study) with SDL? Only now that I have structure can I proceed with the inquiry. Also, if you think of it, I began this inquiry because of my experience with a SDL course. Despite the problems
with the course, it was a profound learning experience. And yet I never "made the connection"; it never occurred to me that experience with SDL may have something to do with encouraging it as an educator. Only by chance, when the educators spoke of their experiences as self-directed learners, did it occur to me that experience as a self-directed learner may be salient; only then did I think back to my own experience.

- I wonder about relationships, connections that I need to look at re: SDL. I thought I had defined relationships (in thesis proposal). How arrogant I am! Teachers' values, experience never entered my mind.
- What is the relationship of SDL to other adult learning principles?
- I need to change the consent form to be more inclusive (e.g., include permission to quote respondents; provide respondents with a copy of signed consent).

August 4, 1990

- I've just begun the unitizing process. I can see that there is information I could have "picked up on" (i.e., clarified with respondents) that I didn't. I must be more attentive (and perhaps less nervous) and jot down anything that needs a probe, that must be explained. I'm so struck by the fact that the unitizing process makes me look at the data far more carefully. When I had attempted to make sense of the data, prior to reading Lincoln and
Guba, I "skipped over" much information I'm now including in the unitizing process.

- As I go through the unitizing process, it seems to me that maybe the information is not all garbage.

August 6, 1990

- As I "cut and paste," I'm getting to be more confident and creative (i.e., I don't feel I have to follow Lincoln and Guba's suggestions "to the letter").
- It's so obvious as I unitize the data that I asked too many questions and that I didn't clarify/probe enough (e.g., when P. spoke of criteria for perceptions, I didn't ask what criteria, what [if any] relationship there is between these criteria and SDL; when P. said she gave the college ideas for modulizing a program, I didn't ask what ideas).

August 13, 1990

- For some reason, while cutting and pasting, I thought it important that I don't "mix" qualitative and quantitative research in this study. I want to try to develop some expertise in qualitative research.

August 14, 1990

- In unitizing data from S's interview, it's apparent that I talked too much, that I was too anxious to "help" S when she was
searching for words. I will try to say less, to feel more comfortable with silences.

August 21, 1990
- As I begin to categorize the information, I'm struck by the overlap between categories. I know categories must be internally homogeneous and externally heterogeneous. I also realize my units of information are too big.

August 27, 1990
- I can't help but think I'm "weaving" a tapestry. I'm looking for the "red thread" that holds this fabric together and all the other "little" threads that support it.
- I'm struck by the number of cards piling up in the "program constraints" category.
- Reflection doesn't seem to be this "big deal" I thought it was; it seems to be inherent in learning.
- As I check categories, I keep thinking about the issue of bringing about behaviour change, the educator as role model, Bandura's criteria for effecting behaviour change.

August 28, 1990
- I'm reviewing the categories. I find that information I thought was important isn't necessarily important (e.g., educators' sensitivity to student needs in the classroom). This
review also necessitates a revision of rules. I can also see that some categories can be subsumed into other categories.

- Could experience as a self-directed learner be the red thread?
- As I go through this process, questions arise:

  1. When asked about activities they use to encourage SDL, educators included activities that provide students with information/resources; only two educators referred to activities that required students to research information. How does this "fit" with educators' understanding of the concept of SDL? Seems to me that these activities "just" encourage learning, not SDL.

  2. There seems to be a paradox: constraints make SDL difficult; constraints force students to be self-directed.

  3. Does the educator have to experience SDL in order to encourage it?

  4. Is there something unique about the experience of SDL? In all cases, educators' experience with SDL was positive. But G didn't appreciate her SDL experience until much later and educators indicated students dislike SDL. Maybe the experience of SDL is positive only under the right conditions (e.g., structure, time, etc.). Also, what made educators' SDL experience so positive?

  5. How does someone learn to teach?

  6. To be a role model for SDL, does the educator have to have experienced SDL?
7. Where did belief that the adult learner is most suited to SDL come from? From the adult education literature? Incredible that educators encourage SDL (or think they are) without knowing if students are ready for SDL and knowing students' negative perception of SDL.

8. Reflection seems to be a natural part of teaching; it may also be a natural part of learning.

9. What is the influence of one's personality on SDL?

10. Is SDL encouraged because it is believed to be the best way to learn or is it encouraged out of necessity?

11. Are student differences a program constraint or a good reason for encouraging SDL?

August 29, 1990

- It's very hard now to categorize without relating any new category with existing categories; it seems natural to look for relationships among categories.

- I'm back to Bandura. What brought about the behaviour change in the educators and what would bring about behaviour change in the students?

- It isn't enough to say that experience as a self-directed learner encourages the educator to facilitate SDL; must come to grips with what it is about that experience.

- Reminded of Schön and incongruence between espoused theories and theories-in-use.
I think the experience of doing qualitative research is similar to the experience of SDL. Besides structure, it gives more freedom; takes more time and energy; and because it's such a creative process, is more rewarding and satisfying.

It seems like everything is coming together. After 8-10 categories, other categories relate to existing categories.

I'm also forced to think about my own philosophy of education, my own beliefs about teaching and learning.

It's hard for me to live with the uncertainty of SDL and qualitative research.

August 30, 1990

I must be concerned that I haven't "chopped up" the information so much that I've developed meanings out of context (e.g., I'm struggling with the fact that some educators expressed anxiety about their teaching). Initially I thought that having to cover required content did that; then I thought that this anxiety came from the fact that educators had little or no formal preparation or experience in teaching but J didn't react the way S.C. and S.M. did; then I wondered if this reaction is because these educators teach part-time. Member checks are essential!

September 1, 1990

Something in today's Globe and Mail applies to qualitative research. It concerns the Oka crisis, the need to understand
native people and their desire for self-government. "To grasp this we must be prepared to encounter the rich tapestry of values, practices, customs, myths and traditions which are native life. Only then can we really accept them as genuine 'other'." (Donald G. Lenihan, Department of Philosophy, University of Ottawa.) We need to understand how others (e.g., nurse educators) experience a situation; we need to encounter the rich tapestry that is their experience. We also need to see the red thread that holds the tapestry together.

- I'm surprised to find that the issue of reflection has come from the data; it is not given in response to my questions. This says something about how to ask questions.

- Perhaps the starting point, the red thread, is myself. Reflection is suddenly important here. Remember Houle--"Experience may be a good teacher, but reflection about experience is a better one." For me, things have to "percolate," the cards have to "sit there" while I reflect on them. I should relate this, my own experience of learning, to my research.

- What is unique about SDL? SDL requires structure and resources; doesn't all learning? Educator as role model facilitates SDL; doesn't educator as role model facilitate learning? To encourage SDL requires knowledge of teaching and learning principles and sensitivity to students' needs; isn't this the case with all learning?
I keep being reminded of Goethe's quote:

"One only sees what one looks for
One only looks for what one knows."

I need to be receptive to what might be out there; approach is "tell me what's important" rather than looking for what I think is important. And isn't this what teaching is all about; recognition of students' strengths, openness to what students have to say. It's like what Boud said about fostering autonomy--"what is important is the attitude of teachers towards their students... the single central quality which fosters autonomy is the quality of the relationship between teachers and learners..."

Is this the "magic formula" S referred to?

Now I don't know what my red thread is! Is it the quality of the teacher/student relationship?

September 2, 1990

- Struck by the fact that comfort level, confidence, seem to play an important role in SDL (i.e., the need to feel comfortable about oneself before one is able to reflect and therefore be self-directed).

- Seems that educators don't think of reflection (i.e., they do reflect but they're not conscious of it and they don't consciously see the need to encourage reflection for self-direction).

- Now that categories are complete, I think, only six cards don't belong. Categories seem to confirm my thoughts on SDL.
included in my paper on SDL but they provide additional data (e.g., influence of experience as a self-directed learner, large number of program constraints, anxiety of educators and students). Concerned that because my interview questions were based on my ideas outlined in my paper that I "prejudiced" the data. It seems important to approach other educators with "I don't know what I don't know" to get other perspectives.

September 3, 1990
- I'm wondering about educators' lack of understanding of students' readiness for SDL and yet they encourage it anyway.

September 5, 1990
- I'm very "uptight" today. As I try to write up the data analysis, I feel it's a bore. I want to write it up so it's interesting. I looked through a qualitative study Hania loaned me (No One Way of Being - A Study of the Practical Knowledge of Elementary Arts Teachers, 1988, Ministry of Education). I'm more upset because it makes me realize my knowledge of qualitative research is very poor. The authors explained why they used a qualitative approach. I feel confused about what I'm doing, specifically, is it a case study (I think it is) but how does grounded theory fit in? Am I trying to do too much? That study took two years, had numerous participants and several investigators, and it was designed to generate grounded theory. I
think much of my trouble lies in the fact that I didn't understand qualitative research before I started. I'm still not clear.

- I have to leave the writing up of the data analysis. Things are not "gelling." I'm having trouble dealing with all this uncertainty.

- I'm reviewing Brundage & MacKeracher's *Adult Learning Principles and Their Application to Program Planning*; maybe that will help. I'm concerned about how the data relates to adult education. A couple of things strike me:

  1. What we should work toward is interdependence.
  2. Problem for adult teacher is not how to motivate learning but how to avoid setting up obstacles to de-motivate learning.
  3. Vertical and horizontal interaction are important in learning.
  4. No consensus on learning how to learn; basic processes are of self-reflection and self-direction.
  5. Those capable of self-reflection and self-direction are more productive learners than those who are not. Also, effective learning requires not only self-reflection and self-direction but input from external sources. This type of learning can therefore be described as interdependent.
  6. The relationship between teaching and learning is not all that clear . . . most teaching behaviour is unrelated to learner outcomes. The best predictor we have is proposed by Lewin--
the environment. The teacher must be considered an influential part of a learner's environment.

7. According to Hunt and Sullivan, educational planning should begin with the learner, not objectives or teaching methods.

8. Adults learn best when not under stress or under severe time constraints.

9. Adults learn best when involved in developing learning objectives for themselves that are congruent with their current and idealized self-concept.

10. The learner reacts to all experience as he perceives it, not as the teacher presents it.

11. The self-seen-as-learner role appears to be an essential component in learning how to learn.

12. Role learning is carried out.

13. Adults enter learning activities with self-concept (description of themselves) and self-esteem (feelings about themselves).

- I want to find out more about nurse educators' understandings of the adult learner, how adult learners conceptualize themselves.

September 6, 1990

- Watched PBS program Learning in America. Discussed and demonstrated what made these elementary schools work (schools with discipline problems, poor test scores, etc.); can be applied to SDL.
Highlights:

1. Fostered cooperative learning in groups; belief that kids can learn from each other, teach each other.

2. You "set fire" inside the students; we want you to learn and to learn how to learn.

3. Principal interacted with kids, empowered staff and kids; parents, teachers, and principal involved in decision-making.

4. Teachers share with each other re: what they do in the classroom.

5. Learning is self-paced; want them to learn that learning goes on throughout life and to love learning.

6. Welcoming spirit in the school; feel the school spirit.

7. Teachers must be respected; they are the key to successful kids.

September 8, 1990
- Seems important to ask nurse educators about their preparation for teaching as well as their teaching background. I believe most are hired because of their content expertise. Need to ask nurse educators about their values, beliefs, practices (i.e., the "fabric" of their experience).
September 9, 1990
- My findings are specific to the learner in the continuing education program; I wonder if my findings would differ with other learners.

September 11, 1990
- Just realized need to clarify finding that required content caused anxiety in educators. I think anxiety occurred in educators who are part-time and have little/no formal preparation in teaching.

September 14, 1990
- Reading Field and Morse. Authors indicated the most common problem is using qualitative methods/inductive research design when a considerable amount is known about the topic (i.e., force reality to fit own conceptual framework). Did I do this? I'm starting all over again to question myself re: what I've done. Still concerned about context, triangulation. Is the use of the constant comparative method for developing grounded theory? I need to go further with the categories--make statement re: relationships among categories, possible explanations of causes of phenomenon, tentative hypotheses to direct future data collection.
September 15, 1990

- An anonymous quote from Field and Morse captures how I feel:
  I have not succeeded in answering my problem. The answers I
  have found serve to raise a whole new set of new questions.
  In some ways I feel I am as confused as ever, but I believe I
  am confused at a higher level and about more important
  things.

- Will redo my original questions; I’m very critical of these
  questions. The only questions I consider good are Questions 1, 2,
  5, 7, 10, 12, and 14. Question 3 - I should have presupposed
  educators encourage SDL, therefore question should have been "what
do you do in the classroom to encourage SDL?" Same with Question
  4--question should have been "what do you do in the clinical area
to encourage SDL?" Question 6 is not clear; need to define "other
  kinds of learning." Question 8 should have been two questions.
  Question 9 is a dichotomous question and I was uncomfortable
  asking it. Question 11 imposes interpretation on the situation;
it is also too complicated and should have been two questions.
  Question 13 is a leading question. With Question 15 I should have
  presupposed educators encourage reflection and asked "what
  activities do you do that help students to think about their
  nursing (clinical) experiences?" Question 16 is a leading
  question and imposes interpretation on the situation. I’ll also
  review my "role" as per taped interviews so I know what things not
to do next time. I think it is important to interview another
group of nurse educators from another community college continuing education program in nursing, who have expertise in SDL.

September 17, 1990

- I think ethnography has an important lesson to teach us all --humility. As educators, we need to see things from the "other's perspective," whether the student, college, etc.

- I redid the interview questions; I'm trying to develop mastery of the ethnographic interview. Patton is very helpful. I'm also reading Spradley.

- From Spradley, I recognize the need to take notes during interviews and to expand on these notes following the interview.

- I've asked two educators to give me feedback on my revised questions.

- I'm going "nuts" (I'm thinking of Macbeth--"full of sound and fury, signifying nothing" and Dickens--"it was the best of times; it was the worst of times"). Reading Spradley scares me. I did not analyze the data correctly; my questions were poor which yielded poor data. I suddenly have no faith in my data or my analysis.
September 18, 1990

- Trying to compare Spradley’s method of data analysis with Lincoln and Guba’s. I find Lincoln and Guba’s simpler; I hope it’s not more superficial. Have I done what Spradley calls "shallow-domain analysis"?
- Thesis is focusing now on "Facilitating SDL: The Nurse Educators’ Perspective."

September 24, 1990

- Reviewing notes on qualitative research in an attempt to consolidate my thinking.
- Still confused with Glaser and Strauss and Lincoln and Guba and using constant comparative method only to generate data versus Spradley and the need to go into greater depth.
- Still confused re: reading literature (i.e., how much reading to do prior versus after collecting and analyzing the data).
- Thinking about SDL and the possible need to focus on the self, not in terms of autonomy but in terms of experience, feelings, etc. We seem to be neglecting this affective domain (i.e., students’ reactions to SDL and educators’ subjective experience). Could title for thesis be "The Neglected Self: Facilitating SDL in a Community College Continuing Education Program in Nursing"?
September 28, 1990
- Received comments on my data analysis from Patricia yesterday. Comments were very helpful. Perhaps major theme relates to nurses' understanding of SDL and how they define it. The "neglected self" could also relate to lack of student autonomy/control/opportunity to make decisions about their learning.

October 6, 1990
- Reading Dewey and struck by the application to education/training dilemma in continuing nursing education program: "When preparation is made the controlling end, then the potentialities of the present are sacrificed to a suppositious future. When this happens, the actual preparation for the future is missed or distorted."

October 10, 1990
- Most "discombobulated."
- Reading Merriam on case study research. I finally think I understand what I'm doing. Merriam has explained some of the "loose" thinking/writing in qualitative research (e.g., just because one uses ethnographic techniques such as interviewing, does not mean that one is doing an ethnographic study). Merriam has answered my questions re: depth of analysis and need to explain context. I think I've missed Step 3 in constant
comparative method (i.e., similar categories are reduced to a small number of highly conceptual categories, hypotheses are proposed, and data are checked for their fit into the overall framework).

October 14, 1990
- I’m now reading to help me understand findings from first set of interviews.
- Things seem to be "jiving" (e.g., article by Nielson captures what I feel is relevant to educators' experience of SDL).
- Another way of describing the analysis would be to relate findings to adult education.

October 15, 1990
- When I decided to read Dewey, it was because of need to increase my understanding of experience in education. Now I’m reading about Eduard Lindeman; I didn’t know he was influenced by Dewey. Things are "jiving."
- Lindeman writes in advice to teachers--"begin with the self as learner and participator." Relate to Hunt? Still jiving?

October 18, 1990
- Began reading Hunt; suggests we think in terms of reciprocal relationships.
- Reminds me of my claim re: need to consider importance of teacher/student relationship (reciprocity) in Ray's class in applied behavioural analysis (i.e., this may be an important variable in effecting behaviour change).

- Taylor talks about the affective component in students' transition to self-direction; perhaps this affective component should be considered in teachers' experience with SDL and their subsequent desire to "use" SDL with students.

- Hunt's work fits in with qualitative approach to research. Participant is the expert/informant. To Hunt, practitioners are colleagues, made to feel that Hunt can learn a great deal from them. Learning of their implicit theories in this climate yields much richer "information."

- I feel the need to relook/think of preliminary data analysis. I'm thinking of Hunt's (Kelly's) "hardening of the categories." Need to be more creative and insightful in designating and understanding categories.

- More consistencies between qualitative research and Hunt (i.e., primacy of experience, writing in 1st person singular that reflects "I'm not the expert; this is what I think").

- See and incorporate Hunt's suggestions re: how to be your own best researcher.
October 19, 1990
- I'm now much more critical of what I read. Is this the purpose of a Master's program (i.e., to become a critical thinker)? I also think I'm coming to the saturation point in my reading; it either sounds familiar or I've read it before.
- I'm still thinking of the "neglected self"—we neglect asking teachers about their experience (i.e., we neglect to recognize their expertise); we neglect "beginning with ourselves" (Hunt); we neglect the learner; we neglect the affective component of SDL.

October 20, 1990
- Now reading Volume 26, New Directions for Continuing Education. It reinforces for me the education/training dilemma. What is the essential purpose of adult education? Is it to explore experience? This cannot be the purpose of certificate programs in nursing. Just thought about how this question relates to my earlier quest for "expertise" in subject matter; perhaps the purpose is to be able to learn how to learn.
- I'm also reminded of my initial confusion re: this and therefore difficulty with the research proposal and first set of interview questions.
- There is the possibility of incorporating "liberating education" in continuing nursing education program (e.g., with occupational health nursing can establish links with wider social, political context).
October 25, 1990
- Checked KWOC for Canadian theses related to SDL. Began reviewing theses (there are only a few) at the National Library.
- Checked Doctoral Research on Canada and Canadians, 1884-1983. Two studies sound interesting; they deal with the learners' perspective about learning in a learner-centred situation so I think I'll not read them; I must stop reading unless it deals directly with the thesis.
- I began to read Candy's doctoral dissertation. He exemplifies, for me, what critical thinking is all about; can see how he looks for common themes in the literature, cites problems with what some authors are saying, and summarizes succinctly at the end of each chapter. Candy mentions a finding--that people had to "muddle through" and sort out information on their own to become self-directed--is that why "Brock" let me "muddle through"?

October 26, 1990
- Candy notes the long time it takes to internalize assumptions of being a self-directed learner; relates to G's experience (that's exactly what happened).
- I'm concerned about the way I've interpreted my "findings"/categories; my paper seems very superficial.
- I must check Hunt's book re: Kelly and personal construct theory.
Completed checking The Canadian Education Index, OISE Theses, and Master's Theses for related material.

October 27, 1990

- I think I've come "full circle." My reading seems to confirm my research findings to date: 1) to facilitate SDL, the educator must also be a self-directed learner; 2) there is a need to acknowledge and use teachers' wealth of experience.
- I feel better at last. It's a feeling that things are now whole and there is a thread, some consistency in what I'm saying.

October 30, 1990

- I'm reading Learning and Experience in Formal Education. I've just reviewed my interview questions (done weeks ago, before reading Candy, Hunt, etc.) and to my astonishment, they are what is referred to in Chapter 2 as second-order perspective (i.e., the experiential viewpoint). It's all "full circle."
- Chapter 2--did interviews with adult educators to get their interpretations of the concept of experience; looked for qualitatively different categories. I'll review my own (which I suspect are too superficial and descriptive, as mentioned earlier).
November 1, 1990

- Certainly evident that there is consistency between the concept of SDL and qualitative research. Both respect the expertise of the informant, believe that informants are the active creators of meaning, etc.

- Another rationale for thesis title "The Neglected Self"—the need for educators to begin with themselves by assessing their values re: SDL and their own self-directedness.

November 7, 1990

- Second community college called today; will interview nurse educators next week. Hurray!

November 11, 1990

- More on the consistency/wholeness/gestalt of this thesis. Just as there is an emergent design in a qualitative study, so is SDL an "emergent design" (metaphorically speaking).

- I agree with Weiser (in Boud & Griffin’s *Appreciating Adults Learning*) who sees the process of conducting research for a thesis as a unique opportunity to experience a growth of consciousness. Reason and Marshall (in Boud & Griffin) also describe research as a personal process, that research contributes to the researcher’s personal development. They say "all inquirers need to explore how distress and psychological defences that they are unaware of distort their inquiry."
- There is also consistency re: issue of control. In qualitative research, the informant is the expert; there is shared control between informant and researcher. The reflective practitioner (Schön) shares control with the client; the facilitator of SDL shares control with the learner. Schön talks about research as an activity of practitioners and claims that reflective research requires a partnership of practitioner-researchers and researcher-practitioners.

November 14, 15, 16, 1990
- Comments on interviews with second group of nurse educators:
  - Note differences between comments made by two groups.

  Perhaps because second community college has a philosophy of SDL, there seems to be no contradiction between the activities educators describe as encouraging SDL and their definition of SDL.

  - My questions are better; there is no confusion; they are open-ended and people are encouraged to talk. Question 8—which I thought was essential—seems to be too hard (don't need the last part of the question). Also, questions should be worded as simply as possible (e.g., instead of saying "your philosophy of education," say "the rationale for your practice").

  - Surprised that not all educators agreed upon the need to have experience as a self-directed learner in order to encourage SDL. The fact that SDL is the philosophy of the school seems crucial; it's important to experience SDL but this experience
could come from teaching at the school; it seems crucial for educators to believe in SDL—perhaps this is what Candy refers to when he says there's a need to be self-directed yourself or moving in that direction.

November 25, 1990

- Went to a concert tonight. Out of the blue, I had this horrible, sinking feeling that the constant comparative method was unnecessary, that I didn't need it to identify themes, etc. For example, I could see the contradiction between the activities educators described as encouraging SDL and their definition of SDL without using this method. Is this method to be used in ethnography or when you have much more data (i.e., data from numerous sources, not just interview questions)? I feel like screaming!

November 26, 1990

- Now I think that not only is design/methodology faulty but so is the question. I'm starting to panic.

November 27, 1990

- As I'm transcribing the interviews, I'm struck by the fact that I may not be asking the right questions. I don't know what the right questions are but I can't help but think I'm still in the "old school of thinking"—knowledge, skills, attitudes; why do
I (we) feel we must categorize SDL; can't I just appreciate that SDL and all learning is a complex process with more questions than answers? SDL seems to me to be a philosophy about teaching and learning, a way of looking at students (learner-centred), and a way of looking at the role of the teacher. I'm struck by the respect for the learner and just how learner-centred SDL is and how important it is to have institutional support for SDL and to orient the students to it. For me, one of the most important things that has come out of this research is the significance of "using" practitioners, of learning from the "people in the trenches." It's as Hunt said (and he quotes Kelly): "If you want to know what's wrong with the client, ask him."

November 28, 1990

- I'm still very concerned with my research design (i.e., if I'm concerned with meaning, how are my research questions and methodology [constant comparative method] going to yield meaning)? After I use the constant comparative method on the second set of interviews, I will then use it with both sets of interviews to try and see themes, etc. Perhaps I can simply look for themes etc. (i.e., don't use the constant comparative method). I'm becoming convinced that my research problem "stinks" and that's why I'm having so much trouble getting meaning. Looking on the bright side--talking with informants was useful; I could clarify things they said that I didn't understand.
November 29, 1990

- I'm still worried that what I've done isn't research. Can my interviews reveal meaning and if so, how? I'm reviewing Leedy: "For a problem to be researchable, it must imply interpretation of the data leading to a discovery of fact." Also, "each word of the problem should be expressive, sharp, indispensable, definitive . . ." Note Leedy's checklist for evaluating the problem, subproblems. My problem seems to be an exercise in gathering data; seems to indicate that all I will have is a list of items; the problem has no identifiable word within it which indicates the need for interpretation of the data; researching the problem because it needs to be done, not because I seek to discover the basic truth underlying the practical application.

November 30, 1990

- After a night's sleep, I think I can "salvage" what I have. When I used the constant comparative method, I was unable to get at meaning in the data. It seems to me that I need to do more to look for relationships and themes; perhaps I can do this just by reviewing the transcripts again and searching for themes. I must try to understand relationships and major themes.
December 1, 1990

- I believe I can discover meaning from interpreting the data. I have reworded my research problem so that it implies interpretation of the data leading to a discovery of fact: "How can SDL be facilitated in a community college continuing education program in nursing?"

- Lincoln and Guba state that the research problem is more than a question, that it is a state of affairs resulting from the interaction of two or more factors and that the researcher tries to "resolve" the problem. I have not identified, in the research problem, any particular factors although I am looking at the interaction of a number of factors that influence the facilitation of SDL in a community college continuing education program in nursing.

- I've just begun to unitize the data but I'm also putting themes in the margins. I'm also looking to see which themes appear most often.

- I've started to reread my analysis/the provisional categories of my first set of interviews. I missed a lot; perhaps when you're first learning to analyze data, you can only concentrate on so much at one time (e.g., I did not pick up on the need to orient students to SDL; that program constraints may not be constraints after all; the issue of teacher-control; focus was on the content, not process or the learner; educators seem to feel learner is not capable of making learning decisions, etc.).
December 2, 1990

- I can't help but wonder if I've asked the "right" questions. What are the right questions anyway?
- AHA! I think the red thread/the "centre" thread holding all this together is the learner; SDL is a learner-centred approach to teaching. I think I've solved the puzzle; I feel an overwhelming sense of relief and accomplishment. Everything revolves around the learner--think of the solar system--it's a system of related themes all revolving around the learner.
- Perhaps I thought experience was so crucial for being able to facilitate SDL because as a learner, I was in control of my learning and it was this experience that was for me so energizing and such a turning point. But it was more than experiencing being in control of learning; it was also realizing that I learned much more and much better.
- I think I was mistaken initially re: thinking that SDL isn't always possible due to certain subject matter, clinical environment, etc. If you have SDL as your philosophy/raison d'etre, then this is not the way one looks at things; one considers the limitations, but still tries to encourage SDL within those limitations.
December 3, 1990
- I've just briefly looked at my notes on various readings on adult education; they all call for a learner-centred approach. I've read all this before and yet this concept did not impress me. I see that one really learns by doing.

December 4, 1990
- It's not enough to understand/be able to define SDL as the "student accepts more responsibility for learning." Unless the program/school is truly learner-centred, one cannot facilitate SDL.
- It seems to me that the learner-centred approach to teaching is no different than the "patient-centred" approach or the "customer-centred" approach; they all lead to excellence. Think of In Search of Excellence. Why is something so simple, so elusive?

December 5, 1990
- As I analyze the data for themes, it becomes clearer that my hunch is correct re: learner-centred approach to teaching and that all the themes are related with "learner-centredness" as the core.
- Maybe I didn't "see the light" before because in the literature everything is "chopped up"/looked at separately; I never saw SDL as a learner-centred approach to teaching or as a
way of thinking (it was there; I missed it). I see SDL as being appropriate for children as well.

December 6, 1990
- When I originally wrote that the educator who promotes SDL makes learning fun, Patricia commented: “what does fun have to do with SDL?” Thanks to the second group of educators, I see SDL as part of the learning; I no longer see SDL as unique.

December 8, 1990
- I have decided it is unnecessary to use the constant comparative method with data from Group II. Identifying themes has enabled me to find meaning in the data. I’m now going through the data from Group I to see if themes are consistent, if there is new/additional information. It seems to me that the constant comparative method gave me structure so I could begin to find meaning but it led to a superficial analysis.

December 9, 1990
- The difference between the two programs is that one is learner-centred and the other is teacher-centred. Both are concerned with content; each gets the content across differently.
December 12, 1990
- I'm beginning to write up the analysis. I'm struck by how the process of doing research makes you look at things differently.
- The second data analysis seems to be done so much better than the first; there are only two categories, not 13, and they are internally homogeneous and externally heterogeneous.
- How profound! It's taken many months and what have I come up with? SDL is a way of teaching and SDL is a way of learning. Perhaps one really can't separate the teaching/learning process; must think of one in terms of the other.

December 14, 1990
- A productive day. As I write up the analysis, the concept of SDL becomes clearer to me.
- Analysis seems to confirm what Smith has been saying re: learning how to learn; I think this is the essence of SDL.

December 15, 1990
- Is SDL a combination of the humanistic and behaviouristic philosophies? Teachers are responsible for planned outcome and students need to know what's expected of them (behaviouristic), yet teachers also need to "let go"/have faith in their students that they will learn (humanistic).
December 16, 1990
- How do you help educators to "let go" so they can facilitate SDL? It's a process they have to go through; reading a book or attending a one-day workshop hardly seems appropriate.

December 18, 1990
- I'm just thinking that doing this thesis and perhaps the M.Ed. degree has enabled me to "learn how to learn."
- I think I've "done it."