Self-Directed Learning

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Most adults spend a considerable time acquiring information and learning new skills. The rapidity of change, the continuous creation of new knowledge, and an ever-widening access to information make such acquisitions necessary. Much of this learning takes place at the learner's initiative, even if available through formal settings. A common label given to such activity is self-directed learning. In essence, self-directed learning is seen as any study form in which individuals have primary responsibility for planning, implementing, and even evaluating the effort. Most people, when asked, will proclaim a preference for assuming such responsibility whenever possible.

Research, scholarship, and interest in self-directed learning has literally exploded around the world in recent years. Few topics, if any, have received more attention by adult educators than self-directed learning. Related books, articles, monographs, conferences, and symposia abound. In addition, numerous new programs, practices, and resources for facilitating self-directed learning have been created. These include such features as learning contracts, self-help books, support groups, open-university programs, electronic networking, and computer-assisted learning. This article extracts some meaning from all this information.

1. What is Self-Directed Learning?

Several things are known about self-directed learning: (a) individual learners can become empowered to take increasingly more responsibility for various decisions associated with the learning endeavor; (b) self-direction is best viewed as a continuum or characteristic that exists to some degree in every person and learning situation; (c) self-direction does not necessarily mean all learning will take place in isolation from others; (d) self-directed learners appear able to transfer learning, in terms of both knowledge and study skill, from one situation to another; (e) self-directed study can involve various activities and resources, such as self-guided reading, participation in study groups, internships, electronic dialogues, and reflective writing activities; (f) effective roles for teachers in self-directed learning are possible, such as dialogue with learners, securing resources, evaluating outcomes, and promoting critical thinking; (g) some educational institutions are finding ways to support self-directed study through open-learning programs, individualized study options, non-traditional course offerings, and other innovative programs.

This latter component, educational institutions developing innovative responses to self-directed learning preferences, has spawned several unique programming efforts. For example, establishment of the Open University in England in 1969 generated similar efforts around the world. St. Francis Xavier University (Antigonish, Nova Scotia), Teacher College (Columbia University, New York City), Syracuse University's Adult Education Program (Syracuse, New York), and the Ontario Institute for Studies in

Education (Toronto, Canada) have incorporated self-directed learning principles into various of their adult education efforts. These latter two (Syracuse University and Ontario Institute) have assimilated some computer-mediated instruction into their programs.

Brookfield (1986), a British adult educator now residing in the United States, describes other higher education efforts where individualized, self-directed learning opportunities exist, including locations in Germany, Denmark, and Eastern Europe. Brockett and Hiemstra (1991) describe several self-directed efforts in China, Indonesia, Japan, Norway, Russia, Saudi Arabia, Sweden, and Tanzania. Knowles and Associates (1984) describe various self-directed learning efforts in various government, industry, health, religion, and military settings.

1.1 History of Self-Directed Learning

Self-directed learning has existed even from classical antiquity. For example, self-study played an important part in the lives of such Greek philosophers as Socrates, Plato, and Aristotle. Other historical examples of self-directed learners included Alexander the Great, Caesar, Erasmus, and Descartes. Social conditions in Colonial America and a corresponding lack of formal educational institutions necessitated that many people learn on their own.

Early scholarly efforts to understand self-directed learning took place some 150 years ago in the United States. Craik (1840) documented and celebrated the self-education efforts of several people. About this same time in Great Britain, Smiles (1859) published a book entitled Self-Help, that applauded the value of personal development.

However, it is during the last three decades that self-directed learning has become a major research area. Groundwork was laid through the observations of Houle (1961) (University of Chicago, Illinois). He interviewed 22 adult learners and classified them into three categories based on reasons for participation in learning: (a) goal-oriented, who participate mainly to achieve some end goal; (b) activity-oriented, who participate for social or fellowship reasons; (c) learning-oriented, who perceive of learning as an end in itself. It is this latter group that resembles the self-directed learner identified in subsequent research.

The first attempt to better understand learning-oriented individuals was made by Tough, A Canadian researcher and one of Houle's doctoral students. His dissertation effort to analyze self-directed teaching activities and subsequent research with additional subjects resulted in a book, The Adult's Learning Projects (1979). This work has stimulated many similar studies with various populations in various locations.

In parallel scholarship during this same time period, Knowles popularized in North America the term, andragogy, with corresponding adult instructional processes. His 1975 publication, Self-directed Learning, provided foundational definitions and assumptions that guided much subsequent research: (a) self-directed learning assumes that humans grow in capacity and need to be self-directing; (b) learners'

experiences are rich resources for learning; (c) individuals learn what is required to perform their evolving life tasks; (d) an adult's natural orientation is task or problem-centered learning; (e) self-directed learners are motivated by various internal incentives, such as need for self-esteem, curiosity, desire to achieve, and satisfaction of accomplishment.

Another important research effort was Guglielmino's (1977) dissertation. She developed the Self-Directed Learning Readiness Scale (SDLRS), an instrument subsequently used by many researchers to measure self-directed readiness or to compare various self-directed learning aspects with numerous characteristics. Spear and Mocker's (1984) work on organizing circumstances showed how important it is to understand a learner's environmental circumstances in promoting self-directed learning.

Establishment of an annual International Symposium on Self-Directed Learning in 1987 by Long and his colleagues completes this historical picture. The Symposia have spawned many publications, research projects, and theory building efforts by researchers throughout the world.

1.2 Competing Concepts

As with the development of many new ideas, self-directed learning has created some confusion in that many related concepts are often used interchangeably or in similar ways. Examples include self-directed learning, self-planned learning, learning projects, self-education, self-teaching, autonomous learning, autodidaxy, independent study, and open learning. Yet these terms typically offer varied, though sometimes subtly different, emphases. To illustrate some of these differences, six competing terms will be examined. Section 1.4 provides a conceptual model and corresponding definition of self-directed learning.

(a) Self-planned learning and learning projects - Tough's (1979) research on people engaged in learning projects involved obtaining information on "a series of related episodes, adding up to at least seven hours" where "more than half of the person's total motivation is to gain and retain certain fairly clear knowledge and skill, or to produce some other lasting change" (p. 7). Tough used the seven-hour parameter because he felt it approximated a typical working day and separated brief learning activities from more major endeavors. Actually, he and many others have found that most learning projects far exceed the seven-hour minimum. Nearly 100 learning project surveys with various groups in ten countries have confirmed that approximately 90 percent of adults conduct at least one intentional learning project annually. A typical adult spends about 500 hours a year in such learning with approximately 70 percent planned by the learner. This self-planning predominance spawned considerable research on self-directed learning.

(b) Autonomous learning - autonomy often is associated with independence of thought, individualized decision-making, and critical intelligence. Gibbs (1979) notes this concept "is probably the most familiar, for it is part of an individualistic, anti-authoritarian ideology . . . deep-rooted in Western capitalistic democracies" (p. 121). Chene (1983), another Canadian researcher, suggests autonomy stands for psychological and methodological learning dimensions. Boud (1988) provides several ideas

on developing student autonomy. Candy (1991), an Australian adult educator, suggests that continuous learning is a process in which adults manifest personality attributes of personal autonomy in self-managing learning efforts. He also profiles various autonomous learner characteristics (pp. 459-66).

(c) Autodidaxy - Candy (1991) urges that self-direction be differentiated as a goal for learner control of decision-making from an educational method in which teachers use processes for promoting self-direction. He proposes autodidaxy as a term for referring to self-instruction which takes place outside of formal institutional settings.

(d) Self-education - self-directed learning can be called something else from country to country or culture to culture. For example, in Russia it is known as self-education:

The role of self-education naturally increases in adults, for the potential possibilities of the personality are extremely great, and the formed world outlook . . . will make it possible to develop one's abilities more successfully, systematically and comprehensively. This is especially true since life does not stand still and society is developing scientifically and technically. Anyone who does not engage in self-education, voluntarily or not, lags behind the demands of the time. (Ruvinsky 1986 p. 31)

Ruvinsky also describes several Russians who engage in self-education.

(e) Open learning - individualized study often is associated with external degree, open learning, or non-traditional programs where most learning takes place outside formal classrooms. One of the most widely known is England's Open University, started in 1969, and emulated now in many countries. Currently, development of many distance education efforts using computer-assisted learning is necessitating new research and understanding regarding how technology can enhance self-directed learning.

1.3 Synthesizing Relevant Research

There have been many overviews of self-directed learning research. Brockett and Hiemstra (1991), Caffarella and O'Donnell (1987), Candy (1991), and Merriam and Caffarella (1991) are some important sources to read.

Confessore and Confessore (1992) conducted a three-iteration delphi study involving 22 self-directed learning experts from several countries. Consensus was reached in several areas, such as the most important self-directed learning research findings, research trends, practical applications, and published works.

Based on such literature and research, five major findings can be extracted: (a) several instruments for measuring some self-directed learning aspect have been developed; (b) self-directed learning readiness has been associated with a various performance, psychological, and social variables; (c) a majority of self-directed learning research efforts have been qualitative in nature; (d) practice implications and techniques for facilitating self-directed learning are being devised; (e) a coherent self-directed learning

theory is still not available.

1.4 Towards a Theory of Self-Directed Learning

Some of the confusion still existing and the fact consensus views regarding self-directed learning just becoming available are some reasons a coherent theory is not available. Candy (1991) outlines some useful dimensions of a theory and cautions about the often unrecognized dichotomy that exists between self-directed learning as a process and as a goal. Long (1989) also urges any self-directed learning theory building be examined in terms of sociological, pedagogical, and psychological dimensions.

Brockett and Hiemstra (1991) synthesized many aspects of knowledge about the topic and conceptualized the PRO (Personal Responsibility Orientation) model. This model recognizes both differences and similarities between self-directed learning as an instructional method and learner self-direction as a set of personality characteristics. Personal responsibility refers to individuals assuming ownership for their own thoughts and actions. This does not necessarily mean control over all personal life circumstances or environmental conditions, but it does mean people can control how they respond to situations.

In terms of learning, it is the ability or willingness of individuals to take control that determines any potential for self-direction. This means that learners have choices about the directions they pursue. Along with this goes responsibility for accepting any consequences of one's thoughts and actions as a learner.

Brockett and Hiemstra (1991) view the term self-directed learning (see Figure 1) as an instructional process centering on such activities as assessing needs, securing learning resources, implementing learning activities, and evaluating learning. Hiemstra and Sisco (1990) refer to this as individualizing instruction, a process focusing on characteristics of the teaching-learning transaction. In essence, this aspect of self-direction centers on those factors external to the individual.

While much early research and seminal thinking (see section 1.1) focused on this process orientation, more recent research has related to better understanding various personal or personality characteristics of successful self-directed learners. Self-concept, readiness for self-direction, the role of experience, and learning styles have been some of the characteristics. This emphasis on a learner's personal characteristics or internal factors is shown in Figure 1 as learner self-direction. In essence, learner self-direction refers to those individual characteristics that lead to taking primary responsibility for personal learning.

Consequently, self-direction in learning is a term recognizing both external factors that facilitate a learner taking primary responsibility, and internal factors that predispose an adult accepting responsibility for learning-related thoughts and actions. At the same time there is a strong connection between self-directed learning and learner self-direction. Both internal and external aspects of self-direction can be viewed on a continuum and optimal learning conditions exist when a learner's level of

self-direction is balanced with the extent to which self-directed learning opportunities are possible.

The PRO model's final component is represented by a circle that encompasses all other elements. While the individual's personality characteristics and the teaching and learning process are starting points for understanding self-direction, the social context provides an arena in which the learning activity or results are created. To fully understand self-directed learning activity, the interface existing between individual learners, any facilitator or learning resource, and appropriate social dimensions must be recognized. Thus, Brockett and Hiemstra recommend that self-direction in learning be used as an umbrella definition recognizing those external factors facilitating adults taking primary responsibility for learning and those internal factors or personality characteristics that incline one toward accepting such responsibility.

2. Usefulness of Self-Directed Learning Approaches

Formal education and schooling remain highly valued in most societies, and many educators, employers, policy-makers, and average citizens find it difficult to place high value on what is learned on your own or outside the formal system. However, adult educators have shown how non-traditional programs, distance education, and self-directed learning efforts can meet many challenges associated with keeping current on constantly changing knowledge. Self-directed learning researchers have challenged the assumption that adult learning can take place only in the presence of accredited teachers. In addition, because people can carry out self-directed learning outside of training organizations or formal schools, many administrators are beginning to look toward such learning as a means for stretching scarce education dollars.

Several researchers also have demonstrated that giving some learning responsibility back to learners in many instances is more beneficial than other approaches. For example, in the workplace employees with busy schedules can learn necessary skills at their own convenience through self-study. Some technical staff in organizations who must constantly upgrade their knowledge can access new information through an individualized resource center.

Perhaps most important of all, self-directed learning works! Many adults succeed as self-directed learners when they could not if personal responsibility for learning decisions were not possible. Some will even thrive in ways never thought possible when they learn how to take personal responsibility. In many respects, future learners will need to become very self-directed throughout their lives just to cope with the enormity of information available to them.

3. Self-Directed Learning Controversies

There have been several associated controversies. Many sources shown in the bibliography discuss them. Three of the most prominent in the literature will be discussed in this section.

(a) Brookfield (1988) provided several critical reflections on self-directed learning. For example, he suggested the over-identification of adult education researchers and practitioners with self-directed

learning is unwise because of its inadequate theoretical base. He also suggested that research on self-directed learning up to 1988 had been carried out mainly with middle-class, white subjects. Another concern was his perception that research on self-directed learning had been primarily quantitative in nature.

Comment. As discussed elsewhere in this article there continues to be a need for more adequate theory pertaining to self-directed learning. Brockett and Hiemstra (1991) and others have been working toward that end. Groups traditionally viewed as hard-to-reach or outside the middle-class mainstream actually have been studied more widely than suggested by Brookfield. Regarding his concern about excessive use of quantitative research, Long and others associated with the annual International Symposium on Self-Directed Learning (see the bibliography) have discovered that the majority of research efforts actually have been qualitative in nature.

(b) Another major controversy has centered on Guglielmino's (1977) SDLRS, an instrument used by many self-directed learning researchers. It has been criticized as difficult to use with certain groups, without appropriate validation, and both conceptually and methodologically flawed (Field, 1989).

Comment. Guglielmino, Long, and McCune (1989) refuted the criticisms in a subsequent publication. The instrument appears to have some limitations in terms of with whom and how it is used, but if employed appropriately appears to be appropriate in helping to better understand aspects of self-directed learning. However, additional instruments are needed for future quantitative research.

(c) Candy (1991) suggests that research on self-directed learning has been stalemated in recent years because of the absence of a consistent theoretical base, continued confusion over the term's meaning, and the use of inappropriate research paradigms.

Comment. Candy's criticisms seem consistent with what others have reported and should prompt new thinking and research.

4. Emerging Trends and Issues

A number of trends are emerging from the research on self-directed learning. Confessore and Confessore's (1992) delphi study also obtained consensus views on several trends.

(a) One trend is research on the feasibility of self-directed learning meeting some job-related training needs in industry (Ravid, 1987). For example, during the 1992 International Symposium, nine out of thirty-five concurrent sessions dealt with self-directed learning in the workplace.

(b) Another trend is efforts to better understand the role of technology in self-directed learning (Brockett and Hiemstra, 1991). In the 1992 International Symposium, eight of thirty-five sessions dealt with self-directed learning and technology or distance education.

(c) A third trend described here relates to researchers' focus on enhancing self-directed learning by better understanding environmental factors (Spear and Mocker, 1984). For example, Hiemstra (1991) and his colleagues describe various ways physical, social, and psychological aspects of the learning environment can be affected.

4.1 Future Research Issues

Even though several research trends are observable, there still remain much needed research.

(a) Additional research is required to test conceptual ideas like the PRO model (Brockett and Hiemstra, 1991), and other emerging ideas to ensure the evolvement of a theory of self-directed learning.

(b) Ways need to be found whereby organizations and educators can facilitate self-directed learning and enhance critical thinking skills without impinging on the value of self-directed or spontaneous learning. For example, Smith and Associates (1990) describe how learners can be helped to learn, ask critical questions, and reflect on what they are learning.

(c) It is important that better ways of incorporating computer technology and electronic communication into self-directed learning be determined as more distance education programs are created.

(d) Future research is needed on such issues as expanding the repertoire of design and methodology for studying self-directed learning, how competencies necessary for effective self-directed learning are developed, and how the quality of self-directed learning resources can be measured.

(e) Ways of measuring and maintaining quality in self-directed learning need to be determined.

(f) The most appropriate roles for educators and educational organizations in relation to self-directed learning need to be found.

(g) Finally, ways for learners and others to evaluate the value and effectiveness of self-directed learning need to be developed.

See also: Adult Learning; Autonomous Learning; Distance Education; Independent study; Open Learning

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<u>Suggested Further Reading</u>

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