

Winter 2007

Dislocated Worker Training and Education Perceptions: The Effect of Tailored Information, Self-Concept, and Role Salience on Self-Reported Deterrents to Education Participation

Lisa A. Row
Old Dominion University

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**DISLOCATED WORKER TRAINING AND EDUCATION
PERCEPTIONS: THE EFFECT OF TAILORED INFORMATION,
SELF-CONCEPT, AND ROLE SALIENCE ON SELF-REPORTED
DETERRENTS TO EDUCATION PARTICIPATION**

by

Lisa A. Row
B.S. December 1983, University of Florida
M.A. August 1998, Troy State University
M.A. June 2003, U.S. Naval War College

A Dissertation Submitted to the Faculty of
Old Dominion University in Partial Fulfillment of the
Requirement for the Degree of

DOCTOR OF PHILOSOPHY

EDUCATION

OLD DOMINION UNIVERSITY
December 2007

Approved by:

John M. Ritz (Director)

Philip A. Reed (Member)

Molly H. Duggan (Member)

ABSTRACT

DISLOCATED WORKER TRAINING AND EDUCATION PERCEPTIONS: THE EFFECT OF TAILORED INFORMATION, SELF-CONCEPT, AND ROLE SALIENCE ON SELF-REPORTED DETERRENTS TO EDUCATION PARTICIPATION

Lisa A. Row

Old Dominion University, 2007

Director: Dr. John M. Ritz

This study investigated whether selected information would change dislocated workers' deterrents to education participation. The study also explored whether information presentation method altered the participants' perceived deterrents. Finally, the study explored whether self-concept or role salience as a student moderated information reception.

The population included North Carolina workers pending job dislocation from three manufacturing plants. The final analysis included results from 194 workers. Participants were randomly assigned to groups using a roster having random group assignments and case numbers.

A three-group, quasi-experimental design explored changes in education deterrents. Three instruments provided data: the Adult Learning Questionnaire, Tennessee Self-Concept Scale, Second Edition, and Salience Inventory. Treatment materials included eight brochures written below a 5th-grade reading level, and a video presenting the same information. Topics included job loss grief, employment barriers, job search assistance, income support, upgrading skills, health care, transportation, and

childcare.

Data from two Adult Learning Questionnaire administrations were used for factor analysis. Factor analysis results were compared to evaluate hypothesis H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions of deterrents to education participation. The factor structure changed from pretest to posttest and hypothesis H₁ was accepted.

Data from the Tennessee Self-Concept Scale, Second Edition, and Salience Inventory was used for comparisons of group differences. These tests evaluated the second and third hypotheses: H₂: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of self-concept is held constant; and H₃: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of salience as a student is held constant. The analyses of covariance were not significant, and Hypotheses H₂ and H₃ were rejected.

This study identified education deterrent factors reported by dislocated workers. Further, this study replicated other studies with a population reporting lower educational attainment and family income. Additionally, the study provided a prototype of materials designed expressly for low-literate dislocated workers.

I dedicate this work to all those in my life's journey who shared their love of learning,
and who encouraged me to think deeply and to sample broadly.

My first teachers were my parents, James Row and the late Shirley Row.
They laid the foundation for my successes.

My mainstay during this adventure was my husband, Jim.
He patiently endured my angst over data collection challenges and confusing statistics,
and then recharged my determination with his confidence in me.

My remarkable sons, Daniel and Ryan, reminded me daily of what was truly important,
and they pulled me back from the siren song of dissertation obsession.

To all of these contributors in my lifelong learning adventure,
I credit you with a share of this amazing achievement.
You have my enduring gratitude.
Thank You.

ACKNOWLEDGMENTS

The journey to this Ph.D. followed a winding and often solitary path. Its trace extended far back in time, and along the way, a host of people provided encouragement and illumination to ease my passage. I extend my sincere appreciation to the following people who enabled my efforts on this lifelong adventure.

Dr. John Ritz, my Dissertation Committee Chair, academic advisor, and mentor provided sound guidance from the start of this program. His down-to-earth manner and tireless concern kept me focused when I tried to procrastinate. I am most grateful for his recommendations and assistance in securing fellowships for two years of my program.

Dr. Philip Reed, an esteemed professor and committee member, provided a sounding board from the outset of my studies. He helped me narrow my topic from a lifetime project to something achievable in a year. Moreover, he helped me consider professional avenues to explore after graduation that could benefit more people, faster.

Dr. Molly Duggan, committee member, served as a mentor who spoke the language of job dislocation. She also held me to rigorous standards of evidence and presentation, which resulted in a higher quality document.

Numerous professionals helped me to complete this study. Dr. Sujata Moorti and Dr. Garrett McAuliffe allowed me to audit their respective classes: “Women’s Ways of Knowing” and “Social/Cultural Issues in Counseling.” These classes help me to produce more inclusive treatment materials. Classmates and friends agreed to serve as briefers for my video: Rick Keiser, Katrina Owens, Saul Godinez, Johnny Moye, and Maurice Frazier. Stuart Gordon created the video. Joseph Pernice of Princeton Disc worked

tirelessly to debug the first master and expedited production. Myra Beatty of the North Carolina Commission on Workforce Development introduced me to officials who could help me find dislocation events. Russell Doles of the Governor's Rapid Response Team was always responsive in my endless requests for information about scheduled layoff and plant closing events. Teresa Johnson, Paulette Stokes, and Debbie Davis permitted me to recruit workers during their rapid response interventions. Several community college officials assisted me with their insights and perspectives on dislocated workers, and with use of their facilities: Jeanie Moore, Sarah Surratt, and Carmen Eldridge. Finally, I especially thank the dedicated Human Resources Managers at the dislocation sites: Amy Johnson and Karen McBennett. These two professionals helped me recruit participants, while simultaneously coordinating dislocation services for their coworkers and grappling with their own job loss worries.

I would never have reached this level of education without a lot of encouragement in my early years. My parents made it clear that they expected me to go to college. Instead, I got expelled from high school, earned a GED, and enlisted in the Marine Corps. I offer many thanks and much love to my parents, Jim and Shirley, who set high expectations, and kept believing in me after my initial missteps. I wish my Mother could be here to see this. Also, I have a big "Ooh-Rah!" for those officers and civilian staff who pushed me to pursue a college and commissioning program, especially Lance Mueller and Crystal O'Hagan. If not for that Bachelor's degree that opened so many more doors, I would not be writing this dissertation today.

Last, but most meaningfully, I am grateful to Jim and my sons, Daniel, and Ryan, whose sacrifice of my time and attention afforded me the energy to succeed.

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CHAPTER I

INTRODUCTION

The federal government has provided a variety of services for dislocated workers through the states' workforce development systems. In order to identify those workers who are likely to exhaust unemployment insurance benefits, the federal government required states to profile workers filing unemployment insurance claims. This profiling identified workers who faced structural barriers to reemployment and who may have needed extra services to gain satisfactory employment. Services available to such workers included training and education funding when job search assistance and counseling services proved inadequate. Training and education opportunities have improved reemployment options and wages for unemployed workers (Jacobson, LaLonde, & Sullivan, 2002; King, 2004). However, few workers took advantage of available training funds (Government Accountability Office [GAO], 2005; Gordus, 1984; Leigh, 1989; Office of Technology Assessment [OTA], 1986).

Past research evaluated the benefits of training programs for dislocated workers. Several early studies found little long-term reemployment or economic benefit from training participation; however, these studies suffered from low training participation rates (Leigh, 1989) and from service-provider selection of who could participate in training rather than worker self-selection (Leigh, 1989, 1990). Those studies did not elaborate on reasons why non-participants declined education and training or reasons why service providers excluded some workers. Subsequent studies found evidence of improved outcomes for workers who participate in training and education programs (Jacobson, et al., 2002; King, 2004; OTA, 1986). In a discussion about the growing

education levels of American workers, Seitchik and Zornitsky (1989) observed that increased educational standards “can cause a glut of unemployed workers who are unqualified for new, growing jobs and unable to readily obtain reemployment” (p. 21). These workers required training to meet new expectations of prospective employers.

A notable gap in previous studies concerned the reasons why dislocated workers failed to participate in training programs. Further, despite profiling efforts to identify workers who needed extra services (Corson, Decker, Dunstan, & Gordon, 1989; Corson & Dynarski, 1990) and authorization to expedite such workers’ enrollment in training (Barnow & King, 2005), researchers have neglected to investigate why profiled workers failed to enroll in training. This study sought to investigate deterrents that prevented workers who are awaiting layoff from participating in available training programs.

Background to the Problem

Encouraging participation in activities that support reemployment must be an important consideration for locales experiencing high rates of unemployment. Some communities have suffered from widespread unemployment that researchers have labeled as the “social costs of displacement” (OTA, 1986, p. 125). Therefore, successful reemployment of dislocated workers can reduce the deleterious economic effects of unemployment for both individuals and communities. North Carolina contained a number of communities affected by unemployment; it was among the 21 states that had unemployment rates above the national average in 2006 (Department of Labor [DOL], 2006). The state participated in a number of recent studies to investigate challenges with worker dislocation (Aheron, 2004; Estes, Lawrence, & Schweke, 2002; Luger, Gorham, & Kropp, 1999; Schweke, 2004; Watt, 2002). Due to its apparent interest in improving

the plight of dislocated workers and its geographic proximity, North Carolina was chosen as the venue for this study.

North Carolina Worker Dislocation

In 2007, the North Carolina economy continued to dislocate a large number of workers. The numbers of unemployed workers declined since a high monthly average in 2002 of nearly 278,000. Yet the monthly average in 2007 remained above 200,000 unemployed persons as of September 2007 (Employment Security Commission of North Carolina [ESC], n.d.). In 2006, North Carolina ranked 33rd among U.S. states based on its unemployment rate, where the first position has the lowest rate. North Carolina shared the 19th highest unemployment rate (DOL, 2006). From 1995 through 2000, North Carolina enjoyed a lower unemployment rate than the national average, but then the economic situation reversed in 2001 (ESC, n.d.). For the latest six years, from 2001 to 2006, the North Carolina unemployment rate equaled or exceeded the national rate as shown in Table 1 (ESC, n.d.).

Table 1

Annual Average Unemployment Rate for North Carolina and the United States

| Year | '95 | '96 | '97 | '98 | '99 | '00 | '01 | '02 | '03 | '04 | '05 | '06 |
|------|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| NC | 4.4 | 4.4 | 3.9 | 3.5 | 3.3 | 3.7 | 5.6 | 6.6 | 6.4 | 5.5 | 5.2 | 4.8 |
| USA | 5.6 | 5.4 | 4.9 | 4.5 | 4.2 | 4.0 | 4.7 | 5.8 | 6.0 | 5.5 | 5.1 | 4.6 |

These unemployment increases occurred through agricultural decline in tobacco farming, as well as manufacturing decline in several traditional industries: furniture, apparel, and textiles (Aheron, 2004). Many workers displaced from these occupations lacked the basic skills needed to find employment in the emerging service and knowledge-based occupations (Estes, et al., 2002). Consequently, workers dislocated from declining occupations often needed training to reenter the job market successfully (Crews-Klein, Beacham, & Moga, 2002).

Despite this need for retraining, few dislocated workers participated in federally funded training opportunities (Eberts, O'Leary, & Wander, 2002; GAO, 2005; Gordus, 1984; Leigh, 1989; OTA, 1986). Recently, the Government Accountability Office reported that national-level dislocated worker funding under the Workforce Investment Act for Program Year 2003 exceeded \$681 million, yet the states used only an estimated \$332 million for training or less than half of the available funds (GAO, 2005). Despite the fact that the average number of unemployed persons exceeded nine million during Program Year 2003 (*Labor Force Statistics from the Current Population Survey*), this money supported training for only about 416,000 dislocated workers nationwide or less than five percent of dislocated workers (GAO, 2005). These low participation rates were historically consistent. Information from the 1960's and 1970's revealed that retraining associated with plant closings ranged from 6% to 16%, despite the existence of multiple federal programs supporting retraining (Gordus, 1984).

North Carolina's results were similar to national-level performance. During Program Year 2003, the federal government allotted over \$43.3 million for North Carolina dislocated workers (GAO, 2005). North Carolina spent \$24.2 million of those

funds for 12,736 dislocated workers, although the total funds used solely for training were not specified (N.C. Commerce, 2004). Thus, the state spent only an estimated 56% of its funds to provide services for six percent of its dislocated workers. Consistent with the dismal national figures for training participation, the rate of North Carolina dislocated worker enrollment in training programs was only seven to eight percent (Watt, 2002). Reasons for such low participation remained unclear; however, one theoretical model shed light on factors that influence participation decisions.

Theoretical Foundation

The theoretical model chosen for this study was Cross' (1981) Chain of Response model. Cross combined elements from a variety of models, yet retained a parsimonious model structure with practical utility for research. Additionally, the model provided an iterative flow, noting the likelihood that individuals move between stages. Diagrammed in Figure 1, this model provided a theoretical foundation with factors that could serve as variables to predict perceived deterrents to education participation.

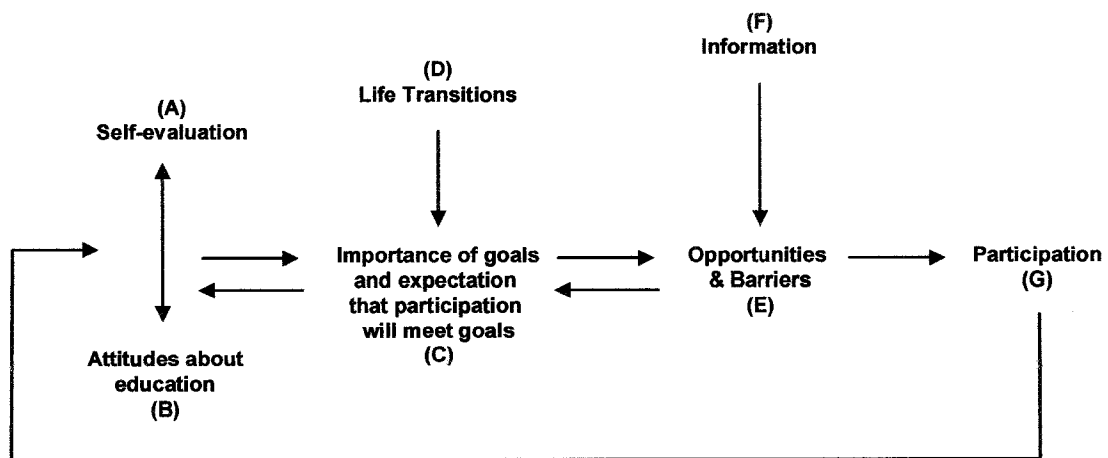


Figure 1. Chain of Response Model (Cross, 1981, p. 124)

The Chain of Response model assumed that an individual's choice to participate in learning resulted from a chain of responses. The decision was not an isolated event, but was made when the individual evaluated the environment. In the case of dislocated workers, the layoff event became a Life Transition (Stage D). Dislocated workers then created new goals and estimated whether they needed training and education to meet these Goals (Stage C). In order to make this estimate, the workers needed Information (Stage F) to understand the Opportunities and Barriers (Stage E) for education participation. After learning about opportunities and barriers, these workers might have revisited Stages A and B with respect to their perceptions about education and their own abilities.

Cross (1981) stressed the need for researchers to consider the early stages of the Chain of Response model when evaluating participation or avoidance decisions.

Most efforts to attract adults to learning activities start at point E ...trying to reduce the negative forces (barriers) or enhance the positive ones (new opportunities). For people who get to point E with their positive forces intact, such actions may well encourage participation. The elimination of external barriers, however, will do nothing for the individual whose weak positive forces for participation were wiped out by the strength of negative forces encountered before he reached point E (Cross, 1981, p. 129).

This study explored that proposition by accounting for Self-Evaluation (Stage A) and Attitudes about Education (Stage B) when estimating the effect of Information (Stage F) on an individual's perceptions of Barriers (Stage E).

Information about structural barriers to reemployment and available services for

dislocated workers was intended to clarify deterrents to education participation. Informing dislocated workers about structural barriers to reemployment was presumed to stimulate realistic appraisal of their goals and alter their perceptions of training and education participation to attain those goals (Stage C). Informing dislocated workers about available services (Stage F) was expected to improve their assessment of opportunities and barriers to education participation (Stage E). An individual who lacked information about opportunities that support education participation may have overestimated the magnitude of a barrier or perceived barriers that did not exist. However, a poor self-concept (Stage A) or negative attitudes about education (Stage B) may have moderated the appraisal of information, resulting in less effectiveness.

Both the dislocated workers and the service providers require an accurate understanding of an individual's true deterrents in order to design interventions that reduce those deterrents and support education participation. Therefore, sampling participants' self-reported deterrents before and after they received information (Stage F) was expected to reveal changes in their perceptions of barriers (Stage E). After becoming aware of structural barriers to reemployment, respondents may have perceived education participation as less daunting than originally assumed. Similarly, after receiving information about services available to mitigate deterrents to education participation, study respondents may have perceived deterrents differently. If tailored information proved valuable in clarifying deterrents and stimulating education participation, such information would become a potential intervention for dislocated workers facing structural barriers to reemployment.

Statement of the Problem

The problem of this study was to determine whether dislocated worker supporting-services information alternatives would change dislocated workers' self-reported deterrents to education participation. Two sub-problems related to information presentation and worker reception were studied. The first sub-problem was to determine whether certain information presentation formats stimulated greater change in perceptions of education deterrents than other formats. The second sub-problem was to discern whether specific personal characteristics exerted a moderating effect on worker information reception.

Hypotheses

This quasi-experimental study evaluated the effect of two information treatments on clarifying deterrents to education participation. It considered self-concept and role salience as potential moderating variables. The study was guided by the following hypotheses.

H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions of deterrents to education participation.

H₂: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of self-concept is held constant.

H₃: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning

Questionnaire than either the written-information or the no-information groups when the effect of salience as a student is held constant.

Significance of the Study

Evaluations of dislocated worker services suffered from a noted lack of experimental research. The few known studies focused solely on outcomes from job search assistance and training programs for those dislocated workers who chose to participate (King, 2004). Thus, no identified research has focused on factors that influenced dislocated workers' choices to use services, especially their participation in training and education. Understanding factors that influenced dislocated workers' use of services could benefit several constituencies: researchers, service providers, educators, and most importantly, dislocated workers. Theoretical significances for this study included investigating proposed relationships between variables, extending deterrence research with a different population, and producing a potential pilot study. Practical significances included creating materials suited for low-literate dislocated workers and improving understanding of dislocated worker education deterrents.

Theoretical Contributions

First, this study tested the theory that guided its design. The study investigated the relationship between dislocated worker information, self-concept, role salience, and deterrents to education participation. These relationships were proposed by Cross' (1981) Chain of Response model. Information from this study can benefit future research to produce a predictive model of education participation or deterrence.

Second, using a different population, this study supplemented findings of previous researchers (Darkenwald & Valentine, 1985; Kowalik, 1989; Martindale & Drake, 1989).

The other studies were characterized by a more educated sample, with a higher percentage of participants reporting some college or a degree and very few reporting no high school diploma. Deterrent typologies, derived from demographic characteristics like education level, can provide clues for service providers about an individual's potential retraining deterrents. A typology could suggest which individuals are likely to avoid retraining services, complementing the Worker Profiling and Reemployment Services model that identified individuals who would likely exhaust unemployment insurance benefits (Black, Smith, Plesca, & Shannon, 2003). The typology could identify workers who need remedial education so they can be quickly directed to appropriate services. In this way, the study extended results of previous deterrence research.

Third, this study could act as a pilot study for a larger research effort that reduces threats to population validity. Because this study used a few events from the manufacturing sector, results may not generalize to other groups. However, study findings suggested future research directions to further assess the predictive power of self-concept. In addition to theoretical contributions, this research provided practical contributions for service providers.

Practical Contributions

The greatest practical contribution of this study was the creation of information materials designed specifically for low-literate and low-English proficient workers. These materials could serve as a prototype for local service providers to emulate when preparing their own materials. Existing materials are predominantly produced as print media, which have limited value for low-literate or low-English proficient users.

Another practical contribution of this study was the factor structure reported. This

structure provides a basis for service providers to use when evaluating clients for retraining services. Clearly, this structure needs more research with an expanded population of dislocated workers to improve its external validity. However, in the absence of any model to use for assessing dislocated worker deterrent factors, the current results provide a straw model for service providers, including local educators.

Limitations

This study presented several limitations relating to participants and methodology. Limitations included selection, attrition, testing, diffusion, and subject effects.

Selection

Selection posed the first limitation to this study. The selection limitation had several elements: potential seasonal variation, sampling method, and volunteer participants. By sampling from only a few events, the samples could not account for potential permutations due to industry type or seasonal fluctuations in dislocated worker characteristics. Only a timeframe covering a full year and considering a wide variety of occupational groups could have achieved that broad coverage. Consequently, the workers dislocated in the study events could not reflect the entire annual population of dislocated workers. A second potential selection limitation emerged with all-volunteer participants who may have systematically differed from non-volunteers. This limitation posed a potential threat to external validity because the researcher could not generalize results beyond the sampled events or to study non-volunteers.

Attrition

Attrition posed another threat to this study. The researcher did not replace participants who declined to participate, therefore producing groups with uneven

participant numbers. Additionally, the researcher could not replace participants who failed to report for the posttest. This resulted in unequal group sizes, as attrition was uneven between groups.

Testing

Pretesting was a third limitation for this study. Completion of the Adult Learning Questionnaire pretest may have sensitized participants to be more alert to education-related information in the treatments than would have occurred without the pretest. Because study participants in the treatment groups might have focused more keenly on education-related information within the treatment, a testing effect could artificially magnify changes observed in the posttest. Similarly, completion of the Adult Learning Questionnaire may have caused all participants to reflect on nonparticipation reasons during the interval between the pretest and posttest. This reflection may have created changes in pretest and posttest factor structures instead of the treatment.

Diffusion of Treatment

Diffusion of treatment presented a fourth limitation for this study. Treatment group members could have physically shared materials with control group members and/or discussed information with them. Sharing of treatment materials could artificially dilute treatment effects, as the control group members' posttest responses may have changed from what would have been reported without exposure to treatment materials.

Subjects

Subject effects presented a fifth limitation of this proposal. The dislocated workers could have possessed some demand characteristics such as anger or suspicion related to the impending layoff event. A demand characteristic could manifest itself as

greater negativity in responses that potentially altered research results. A more likely subject effect is social desirability bias. Participants may have responded to items in study instruments using answers that they believed were more socially acceptable than their true personal beliefs. Social desirability could have masked participants' true beliefs and altered research results. Additionally, the length of the instruments might have caused response burden in some participants. Thus, participants may have answered questions hastily or elected to drop from the study before completing the pretest. Response burden might have reduced the Session 1 completion rate (63%).

Assumptions

Several assumptions framed this study. These assumptions represented circumstances that needed to hold true for the study to achieve its intended result. These assumptions include the instruments used and the sample drawn for the study.

First, the researcher assumed that the instruments used in this study would serve as satisfactory proxies for constructs in the Chain of Response model. Because Cross did not recommend instruments to measure model constructs, the researcher had to select instruments that most closely matched the Chain of Response model constructs. The researcher used three criteria to identify instruments that could serve as satisfactory proxies for model constructs: the instrument measured the construct described by Cross, it was statistically adequate (reliable and valid), and it was readable by less literate adults.

The Adult Learning Questionnaire was the instrument used to measure the dependent variable in hypothesis H₁, deterrents to education participation. The researcher assumed its adequacy based on its intended function and its statistical adequacy as described by the instrument's authors (Darkenwald & Valentine, 1985). This instrument's

readability level was a 6.4 grade level as measured by the Flesch-Kinkaid Grade Level score, computed using Microsoft Office Word 2003. This score evaluates text against a United States public school grade level. The score is computed using the formula $(.39 \times \text{ASL}) + (11.8 \times \text{ASW}) - 15.59$, where ASL is the average sentence length and ASW is the average number of syllables per word (Microsoft Office Word 2003, Help Function: Readability Scores).

The instrument used to measure the covariate of self-concept in hypotheses H₂ was the Tennessee Self-Concept Scale, Second Edition. This instrument was deemed satisfactory to measure the Chain of Response model self-evaluation construct because it included an academic-work subscale, had statistical adequacy, and purported to have a readability level at the third-grade (Fitts & Warren, 1996).

The instrument used to measure the covariate of salience as a student in hypotheses H₃ was the Salience Inventory. This instrument was deemed satisfactory to measure the Chain of Response model construct of attitudes about education because the instrument measured three aspects of a respondent's role as a student: participation, commitment, and value expectations (Nevill & Super, 1986). The instrument also possessed statistical adequacy (Osberg, 1992). Its readability level was at the 10.1 grade level as measured by the Flesch-Kinkaid Grade Level score, computed using Microsoft Office Word 2003.

Should any of these instruments fail to adequately represent the constructs identified by Cross in the Chain of Response model, this study would not contribute to evaluating the model's adequacy. If the instrument used to measure deterrents to education participation proved unstable over successive administrations, then the analysis

based on this instrument could suffer from Type I error. The analysis would indicate a change in deterrent factor structure that was not true (false positive).

If the instruments used to measure self-concept and role salience as a student proved inadequate to measure the intended constructs, then the resulting analyses could suffer from Type II error. In this case, self-concept or salience as a student would be predictors of education participation, but the instruments would not be sensitive enough to detect the construct (false negative).

Second, the researcher assumed that some individuals in the sample would experience difficulty reading printed media, whether due to low literacy or low English proficiency. Swanson (2003) estimated North Carolina high school graduation rates between 56% and 60%. Other studies found dislocations concentrated in occupations typically having lower education levels such as manufacturing (Fallick, 1996; OTA, 1986). This assumption of low-literate study participants was the basis for predictions in hypotheses H₂ and H₃ that combined verbal and written information would lower total deterrent scores. Several medical studies reported better outcomes from participants exposed to combined verbal and written materials (Bauman, 1997; Johnson, et al., 2003). Other studies revealed that written and web-based information were less valuable to low-literate persons (Barents Group, LLC, 1999; Coyne, Halvorson, Riley, & Schneider, 1994). Without representation of low literate or low English-proficient individuals in the sample, the evaluation of group differences may not be significant. This would occur because individuals with higher literacy would benefit as much from the written materials as from the video, thereby equalizing the effect of the two treatments. The video would be most useful, and presumably demonstrate more effect, with a less-

literate sample for whom print media was difficult to process. Thus, if the assumption of low-literate study participants did not hold true, the analyses of group differences could suffer from a Type II error where the treatment was effective within the population but was not detectable due to an unrepresentative literacy level in the sample.

Procedures

Using a quasi-experimental three-group, pretest-posttest design, the researcher presented two treatment groups with information about job loss grief, employment barriers, and services available for dislocated workers. Information presentation used one of two formats: video plus brochures or brochures alone. A pretest included three instruments designed to measure deterrents to education participation, self-concept, and role salience. The researcher also collected demographic information during the pretest. The posttest included the instrument measuring deterrents to education participation and an information value survey for the two treatment groups. The control group completed the pretest and posttest, but received no treatment materials. Subsequent analyses looked for changes between pretest and posttest deterrent factor structures, as well as effects of self-concept and role salience on deterrent score changes from pretest to posttest.

Definition of Terms

The following definitions explain key terms used to design this study. All definitions originated in relevant literature or in federal legislation.

Dislocated Worker

Federal law defined dislocated workers as individuals who lost their jobs due to layoff or facility closure; who were self employed (including farming, ranching, or fishing) but became unemployed due to general economic conditions or natural disaster;

or who were displaced homemakers (Government Printing Office [GPO], 2002).

Mass-Layoff Event

Federal law defined a mass layoff event as a reduction in force meeting several criteria. First, it is not the result of a plant closing, which the law addresses separately. Second, the mass layoff results in an employment loss at the single site of employment during any 30-day period that affects a minimum of 33%, and at least 50, active, fulltime employees (GPO, 2006).

Plant Closing

Federal law defined plant closings as the permanent or temporary shutdown of a single site of employment meeting several criteria. The shutdown must result in an employment loss during a 30-day timeframe, and it must affect 50 or more fulltime employees (GPO, 2006).

Structural Barriers to Reemployment

Structural barriers to reemployment were defined as characteristics associated with an unemployed worker that hinder reemployment for that individual. Examples of structural barriers included increased age, lower levels of education, less geographic mobility, gender, relatively higher wages in the layoff position, obsolete skills, and concentration in declining employment areas (Estes, et al., 2002; Fallick, 1996; Gordus, 1984).

Deterrents to Education Participation

Deterrents to education participation were defined as dynamic environmental, psychological, and social forces that work in combination with other forces to affect participation decisions (Valentine & Darkenwald, 1990). Researchers grouped deterrents

into four general categories: situational, institutional, informational, and dispositional (Silva, Cahalan, & Lacierno-Paquet, 1998).

Self-Concept

Hattie (1992) defined self-concept as “a set of beliefs, and relationships between these beliefs, that we have about ourselves” (p. 97). Hattie (1992) characterized self-concept as a polymorphous construct related to cognitive appraisals that people make about themselves. The Tennessee Self-Concept Inventory (Fitts & Warren, 1996) provided an operational definition of self-concept using six domains: physical, moral, personal, family, social, and academic-work.

Role Salience

Nevill and Super (1986) defined role salience as the relative importance an individual places in five major life roles. Researchers use measures of behavior, attitudes, and knowledge (Ferreira-Marques & Miranda, 1995). The Salience Inventory (Nevill & Super, 1986) provided an operational definition of role salience for five life roles: work, study, home and family, community activity, and leisure.

Summary

Unemployment in North Carolina remained high and posed economic challenges to individuals and communities since the 2001 economic recession. While programs existed to provide services for dislocated workers, few individuals took advantage of training and education funding. However, dislocated workers facing structural barriers to reemployment represent a specific subgroup that could benefit from training and education opportunities to improve their reemployment options. Using Cross' (1981) Chain of Response model as a theoretical framework, this study sought to improve

understanding of deterrents to education participation for dislocated workers and to evaluate the effect of information on clarifying those deterrents. Findings could benefit a variety of stakeholders including service providers, educators, and especially, dislocated workers impacted by mass layoff events or plant closings.

This study sought to determine whether information about dislocated worker supporting services would change dislocated workers' self-reported deterrents to education participation. The study further addressed two sub-problems relating to the effect of information presentation format and recipient characteristics.

Chapter II presents literature pertinent to this study. Sections on education participation, deterrents to education participation, self-concept, and role salience review literature for the dependent variable (deterrents to education participation) and the covariates (self-concept and salience as a student). The review of literature on structural barriers to reemployment describes ways that they inhibited reemployment and identified commonalities with deterrents to education participation. A section on information presentation reviews literature pertinent to the independent variables (treatments) developed for the study. The two treatments included a written plus verbal information condition (Treatment A) and a written information-only information condition (Treatment B). Chapter III explains the methods and procedures including the population, research variables, treatment materials, instrument design, field procedures, and statistical analysis. In Chapter IV, the researcher presents the findings, while in Chapter V the researcher discusses results and offers recommendations for future research.

CHAPTER II

REVIEW OF LITERATURE

Sections in this chapter outline key literature about educational attainment, structural barriers to reemployment, education participation, deterrents to education participation, information presentation, self-concept, and role salience. The first section on educational attainment presents evidence regarding the importance of education for occupational success. The next section on structural barriers to reemployment provides a context in which to consider dislocated workers' needs for training and education participation. The education participation literature provides the theoretical framework guiding this study including the Chain of Response model. The next section reviews contrasting literature about deterrents to education participation and applies these findings to dislocated workers in particular. This section relates to the dependent variable used in this study. The next section reviews information presentation literature as the treatments used for this study consisted of information. These treatments comprised the independent variables. Finally, the last two sections present findings related to variables that acted as covariates in this study: self-concept and role salience.

Educational Attainment

Literature about educational attainment supported a presumption of this study that increased educational attainment could provide reemployment benefits for dislocated workers. Through the history of the United States, higher education shifted from being just a privilege for elite citizens to an opportunity ostensibly open to all citizens. Researchers traced the progression of higher education opportunity within the United States through three major periods: Aristocracy, Meritocracy, and Egalitarianism (Barna,

Haws, & Knefelkamp, 1978). Recently, education proponents suggested that lifelong learning was no longer an option; rather, it was a requirement for the new economy (Babb, 2000; NC Commission on Workforce Development, 2000). Increased educational attainment has been associated with greater worker productivity, wage earnings, and employment stability (Decker, Rice, & Moore, 1997).

Despite the perception that higher education was available to all, and in spite of the well defined economic benefits that accrued from educational attainment, many citizens did not capitalize on educational opportunities. The college completion rate of 27% in 1994 was only slightly higher than the rate in 1972 (Decker, et al., 1997). Yet during this same period, college enrollment of recent high school graduates increased from 49% to 62% (Decker, et al.). In 2003, 57% of adults reported completing some college, but only 28% of adults earned bachelors degrees. Thus while more young adults entered higher education, not many more completed programs.

Even more disturbing than low postsecondary completion rates was the continued high rate of non-high school completion. In 1976, only 85% of the United States' young adults graduated from high school, and sixteen years later, in 2003, the graduation rate increased by only 2% (U.S. Department of Education [DOE], 2005). In 2003, 3.5 million adults, aged 16-25, lacked a high school diploma and were not enrolled in school (Bridgeland, Dilulio, & Morison, 2006). Estimates of North Carolina graduation rates in 2000 ranged from 55.6% to 60.3% (Swanson, 2003). The North Carolina public-school-only averaged graduation rate for 2002-2003 was 70.1% (Seastrom, Hoffman, Chapman, & Stillwell, 2005).

The negative effect of non-high school graduation on both earnings and

unemployment was unequivocal (OTA, 1986). For males aged 25-34 years in 1993, median earnings of a college graduate were more than 50% higher than a high school graduate, and more than twice as high as a non-high school graduate (Decker, et al., 1997). Bridgeland, et al. (2006) reported that high school dropouts earn an average of \$9,200 less per year than high school graduates, and dropouts are twice as likely as graduates to earn incomes below the poverty line. Data also revealed that unemployment among non-high school graduates was higher nearly every year from 1960 through 1994 (Decker, et al.). High school dropouts in 2004 were more than three times likely to be unemployed than their peers who graduated from high school (Bridgeland, et al.). In addition, Seitchik and Zornitsky (1989) estimated that attainment of a high school diploma could improve an individual's reemployment probability by 13 percentage points.

Despite the recognized value of education for employment and earnings, previous statistics revealed that many adults avoided participating in educational activities. Weaknesses in the educational attainment literature include a lack of information about educational attainment and education attitudes among dislocated workers. This study sought to contribute such information for a sample of workers facing impending job loss. Besides informing the educational attainment literature, such information also serves as a measure of potential economic difficulty facing dislocated workers. As shown in the next section, lower educational attainment acts as one of the structural barriers that impede reemployment.

Employment Barriers

This study presumed that many dislocated workers face employment barriers, and that educational attainment could mitigate some of those barriers as noted in the previous section. Employment barriers include characteristics associated with an unemployed worker that hinder reemployment for that individual. Federal legislation governing the Workforce Investment Act contained references to structural barriers to reemployment such as defunct skills, including displaced homemakers and the self-employed, as well as widespread local dislocation due to economic conditions (GPO, 1998). In addition, the legislation mentioned exhaustion of unemployment insurance, which may occur because of structural barriers to reemployment (GPO, 1998; Black, Smith, Plesca, & Shannon, 2003). Benefits exhaustion could drive a dislocated worker to apply for welfare and extend the person's dependence on government income support. One goal for service providers was preventing exhaustion of unemployment insurance benefits (Black, et al.).

In order to identify workers who are likely to exhaust benefits before they successfully find another job, the federal government required states to profile workers filing for unemployment insurance (Corson, Decker, Dunstan, & Gordon, 1989; Corson & Dynarski, 1990). The Worker Profiling and Reemployment Services (WPRS) system used a statistical model to identify those workers who faced multiple barriers to reemployment, and the model predicted who would likely exhaust unemployment insurance (Black, et al., 2003). The prescribed WPRS model used five predictors: education, job tenure, aggregate industry-level employment changes, occupation, and local unemployment (Black, et al.). However, researchers who evaluated the model's predictive ability recommended using 15 predictors to improve the model's power. These

predictors are education, occupation, tenure and tenure squared, employment status and/or enrollment in school at the time a claim is filed, region, client economic status (welfare receipt, food stamp receipt, public transportation need, and eligibility for training funds), past unemployment insurance (claims and benefit exhaustion), and wages during the last year of employment (Black, et al.). Several of these predictors represented potential structural barriers to reemployment such as education, occupation, and tenure.

Service providers using the WPRS profiling system were then to direct workers facing employment barriers to those services intended to improve reemployment success. Although those services did not explicitly include training, workers profiled as likely to exhaust benefits were significantly more likely to be referred to education and training than others (Dickinson, Kreutzer, & Decker, 1997). The U.S. Department of Labor, Employment Training Administration, authorized service providers using Workforce Investment Act funds to “move customers quickly through the first two tiers into training if that is the appropriate service” (Barnow & King, 2005, p. 37). The Workforce Investment Act provided a three-tier approach: core services, intensive services, and training services (GPO, 1998). Thus, service providers were empowered to expedite the movement of profiled workers into the highest service level.

A number of other researchers (Corson, et al., 1989; Corson & Dynarski, 1990; Estes, Lawrence, & Schweke, 2002; Fallick, 1996; Gordus, 1984; Howland, 1988; OTA, 1986; Seitchik & Zornitsky, 1989) identified structural barriers that impeded reemployment for dislocated workers: increased age, lower education levels, less geographic mobility, gender, relatively higher wages in the layoff position, obsolete skills, and concentration in declining employment areas. Evidence suggested that

dislocations concentrated in occupations where workers had lower education levels, especially the manufacturing occupations (Fallick, 1996; OTA, 1986). Some of these barriers matched those used in the profiling model, such as education, occupation, job tenure, aggregate unemployment, and local unemployment, while others differed.

Employment barriers often occurred together and therefore posed multiple, complex challenges to dislocated workers. An example illustrated this situation. When the Pillowtex Textile facility in Kannapolis, North Carolina, declared bankruptcy in July 2003 between 40-50% of approximately 4800 workers dislocated were non-high school graduates, approximately 500 were non-English speaking, and 70% indicated they were unwilling to relocate (Beatty, Longman, & Tran, 2004). The average worker's age was 46 and average tenure was 17 years (Beatty, et al.). Each of these characteristics was a structural barrier to reemployment. About 1500 workers elected to participate in training (Beatty, et al.). This 31% rate of dislocated workers who entered training was much higher than normal dislocated worker training rates of less than 10% (GAO, 2005; Gordus, 1984; OTA, 1986). However, another 69% of the dislocated workers chose not to participate in training and education.

The community response to the Pillowtex closure was lauded as a success. The North Carolina Department of Commerce reported that the Pillowtex response was "being used as a national model on how to coordinate local, state, and federal resources in mass-layoff situations" (N.C. Commerce, 2005, p. 5). The U.S. Department of Labor chose the Rowan-Cabarrus Community College as winner of an Employment and Training Administration Award for the category: Recognizing Special Populations in the Workforce (DOL, 2005). Yet nearly nine months after the cessation of operations at

Pillowtex only 10% of the dislocated workers had reentered the workforce. By late March 2004 only an estimated 500 workers had returned to work, and another 431 had dropped from the workforce entirely (Beatty, et al., 2004). Undoubtedly, employment barriers played a significant role in this low reemployment rate and the large number of discouraged workers who stopped seeking employment altogether.

Training and education that assisted individuals to overcome employment barriers improved reemployment and earning outcomes (OTA, 1986). One report noted that attainment of a high school diploma improved an individual's reemployment probability by 13% (Seitchik & Zornitsky, 1989). Another study estimated that "significantly reducing a displaced worker's losses would require about the equivalent of two years of college education" (Jacobson, LaLonde, & Sullivan, 1993, p. 170). Thus, training and education participation appeared to be a beneficial activity for dislocated workers.

The literature clearly identifies that employment barriers exist for dislocated workers, and several sources produced similar lists of barriers. However, the literature stops short of addressing how to help dislocated workers overcome these barriers, particularly the need faced by many to improve their educational attainment. This study attempted to inform this gap by first examining workers' attitudes toward education. The study also investigated whether presenting workers with information about employment barriers and services available after dislocation could change these attitudes.

Literature on education participation research further informed this study. It showed findings regarding why some adults elected to participate in training and education, while others declined such opportunities. It also provided the theoretical model for this study.

Education Participation

Participation researchers considered both internal and external factors influencing adults. In an early effort to understand participation, Houle (1961) proposed a typology of learners as goal oriented, learning oriented, or activity oriented (in Boshier & Collins, 1985). Since that initial effort to discern basic adult learning motivations, research in adult education participation burgeoned. Cookson (1986) described participation as one of the central elements in understanding adult education. Other researchers created models to explain participation: Rubenson's Recruitment Paradigm, Cross' Chain-of-Response Model, and Darkenwald and Merriam's Psychosocial Interaction Model (Kerka, 1986). These models differed in the number and types of factors that they considered. In addition to theoretical models, some researchers developed specialized instruments to support participation research such as the Education Participation Scale (Boshier, 1991).

Early researchers focused on both participation and barriers influencing nonparticipation (Apt, 1978; Cross, 1981). But subsequent research bifurcated into mutually exclusive approaches to understanding adult education involvement as either participation or nonparticipation. Participation literature considered participant decisionmaking (Henry & Basile, 1994) as well as motivations (Fujita-Starck, 1996; Ziegahn, 1992). Nonparticipation literature addressed deterrents (Darkenwald & Valentine, 1985; Kerka, 1986; Martindale & Drake, 1989; Scanlan & Darkenwald, 1984; Valentine & Darkenwald, 1990) and nonparticipation reasons (Beder, 1990; Garrison, 1988). Supplementary research also investigated these topics with special populations such as older adults (Darkenwald & Novak, 1997; Tikkanen, 1998), women (Blais,

Duquette, & Painchaud, 1989; Joyappa, 1996), educationally disadvantaged or low literate adults (Kerka, 1988; Ziegahn, 1992), and minorities (Kerka, 1993; Sparks, 1998). The universe of dislocated workers contained all of these special populations.

One concern with all of this participation research was its diversity. The populations studied were very different, and consequently the participation construct lacked strong theoretical grounding. Tikkanen (1998) expressed concern about the absence of models for participation prediction and a potentially “endless number of different subpopulations” (p. 17). Consequently, discerning a central participation or avoidance construct remained difficult.

Work emerged frequently as a motive for adult education (Merriam & Caffarella, 1999). In Houle’s (1961) goal orientation, learners sought education to accomplish specific objectives, while Boshier’s (1971) professional advancement factor related directly to job-oriented goals (Boshier & Collins, 1985; Merriam & Caffarella, 1999). Much research supported this work-related motivation for adult education participation. Researchers discovered participation differences based on occupation (Apt, 1978; Frazis, Gittleman, Horrigan, & Joyce, 1998) and desired improvement (Apt, 1978). Some education participants cited more employment-associated reasons than the education non-participants (Ziegahn, 1992). Similarly, some study respondents reported greater ambivalence towards formal education when they did not perceive a vocational relationship (Henry & Basile, 1994).

Age was another factor that potentially affected work-related education (Apt, 1978; Tikkanen, 1998). Data reflected that participation tended to occur in the first half of a person’s career, and then decreased with age – with observable drops around ages 50

and 60 (Tikkanen, 1998). However, in consideration of today's extended life spans, critical shortages of workers, and growing uncertainty regarding social programs' abilities to support an aging population, older workers might desire to work longer (Babb, 2000). Consequently, motives for work-related education, even among older adults, may prove increasing important for dislocated workers.

Within Cross' Chain of Response model, changes in work such as job dislocation represent a life transition that potentially stimulates a need for education participation. In addition, literature reported that work-related needs stimulated education participation for many adults. Yet the literature on dislocated workers contradicts these findings. In fact, the literature noted that many dislocated workers chose not to participate in training and education opportunities, even with financial support. The researcher explored this conflict in the literature. Treatment materials clearly identified for treatment group participants their potential need for work-related training and education to overcome reemployment barriers. Then the study examined whether this education stimulus information, combined with information about services available to dislocated workers could provoke any changes in education attitudes.

The information about services available to dislocated workers was conceptualized as information that could support education participation by overcoming commonly identified barriers. These barriers, also known as deterrents to education participation, acted as the dependent variable. The next section presents literature pertinent to this opposing aspect of education attitudes.

Deterrents to Education Participation

Deterrents comprised a large part of adult education non-participation research.

Although participation research provided valuable insight into reasons why adults participated in education, this research orientation failed to predict who would participate or not participate (Scanlan & Darkenwald, 1984). Consequently, since research with education participants failed to uncover a strong predictive model of which adults would participate in education, researchers turned to non-participants to search for a theory that could predict who would not attend and to discover why.

Valentine and Darkenwald (1990) described deterrents as dynamic environmental, psychological, and social forces that work in combination with other forces to affect the participation decision. Examples from their study included environmental forces like time constraints or cost, psychological forces such as lack of confidence or interest, and social forces like family responsibilities or lack of social support (Valentine & Darkenwald, 1990). Some older literature, including Cross' (1981) Chain of Response model, identified these deterrents as barriers or obstacles. However, the term deterrent more accurately represented the changeable nature of forces that discouraged participation, while barriers connoted a more permanent obstacle.

Measuring adult education deterrents produced complex outcomes, as deterrence was perceived to be a multidimensional construct (Scanlan & Darkenwald, 1984). An instrument, the Deterrents to Participation Scale, was developed to support theory-building for adult education nonparticipation. Scanlan and Darkenwald (1984) initially devised this instrument for use with health care workers, and therefore it suffered from weak external validity. Following that study, other researchers developed another form of the instrument for use with general populations.

The new instrument, Adult Learning Questionnaire, yielded a six-factor solution

to adult education deterrence (Darkenwald & Valentine, 1985). The six factors included lack of confidence, lack of course relevance, time constraints, low personal priority, cost, and personal problems (Darkenwald & Valentine, 1985). However, this study used predominantly middle-class, well educated participants. Subsequently, this instrument was used in research with U. S. Air Force enlisted personnel (Martindale & Drake, 1989), with professional women (Blais, et al., 1989), and with college alumni (Kowalik, 1989). All studies reported reliability above $r = +.80$ for this instrument; however, factor structures differed slightly between studies.

In a comprehensive review of adult education participation research, the reviewers observed that researchers identified four principal barriers or deterrent categories in adult education non-participation (Silva, Cahalan, & Lacierno-Paquet, 1998). Researchers labeled the first two identified barriers as situational and institutional deterrents (Apt, 1978; Cross, 1981; Kerka, 1989; Scanlan & Darkenwald, 1984; Silva, et al.). Dispositional deterrents provided a third discrete category (Apt, 1978; Cross, 1981; Kerka; Martindale & Drake, 1989; Scanlan & Darkenwald, 1984; Silva, et al.). Finally, informational barriers became a fourth deterrent category (Scanlan & Darkenwald, 1984; Silva, et al.). Each deterrent category considered different personal or environmental issues as noted in the following sections.

Situational Deterrents

Cross (1981) defined situational deterrents as elements that rise from a person's particular life situation in a given period such as lack of time, money, childcare, and transportation. One could include computer and internet access in a modern list, as these tools broadened access to education in the 21st century. Distance education also mitigated

other situational deterrents such as time, transportation, or childcare for individuals having computer and internet access.

Thus far, a preponderance of research indicated that primary deterrents are situational, with the two most frequently reported items being time and cost (Beder, 1990; Blais, et al., 1989; Buron, Orr, & Patrabansh, 1999; Darkenwald & Valentine, 1985; Kerka, 1995; Lohman, 2000; Martindale & Drake, 1989; OTA, 1986; Scanlan & Darkenwald, 1984). One study performed a cluster analysis of respondents based on their deterrents. The study revealed that time did not distinguish between clusters, but time did have the highest mean as a deterrent, thereby indicating that time constraints acted as “profound deterrents for the population as a whole” (Valentine & Darkenwald, 1990, p. 35).

Situational deterrents also affected dislocated workers. Consistent with previous research on deterrents, dislocated workers routinely reported time and money as deterrents to their participation in training (OTA, 1986; Schweke, 2004; Watt, 2002). Compounding these deterrents, dislocation also resulted in a loss of money for childcare that impeded training participation for adults with young children (Luger, Gorham, & Kropp, 1999). For some dislocated workers, inadequate transportation also acted as a participation deterrent (Luger, et al.). While distance learning could mitigate some of these deterrents, dislocated workers who have low literacy or low English proficiency might be prevented from participating in distance learning.

Institutional Deterrents

Cross (1981) characterized institutional deterrents as qualities related to the education institution or program that either preclude or discourage working adults from

participation. These deterrents included items such as scheduling, location, uninteresting or irrelevant courses, procedures, or lack of information. Institutional deterrents have been reported for both formal and informal training environments (Lohman, 2000). Some researchers separated lack of information into its own deterrent category, and this study followed that design.

Institutional barriers affected dislocated workers in several ways, including a lack of short-term training programs and rigid course starting dates that permitted enrollment only at the start of a semester (Estes, et al., 2002; Luger, et al., 1999; Schweke, 2004; Watt, 2002). A related problem involved the requirement to wait to start training programs, because income support was inadequate to last for the entire training period (Aheron, 2004). Yet another problem emerged in institutional reliance on traditional degree programs (Watt, 2002). Finally, inadequate throughput capacity in high growth occupations presented another institutional problem; for example, community colleges reported often having a waiting list for health service programs (Aheron, 2004).

Informational Deterrents

Inadequate information about training and education opportunities also deterred education participation for some adults. The Office of Technology Assessment (1986) reported that people often do not know what training they need for new job opportunities. Cross (1978) observed that respondents to needs assessment surveys did not often identify lack of information as a barrier, but when asked if they would like more information, 70-85% responded affirmatively. In her meta-analysis, Cross (1978) also found that information was one of six major recommendation categories that emerged from 44 reports and studies. The second recommendation within the information category

dealt with information dissemination about learning opportunities.

Individuals who had not actually contacted education institutions, visited their web pages, or received mailed literature would lack awareness of training and education opportunities. Beyond the awareness of specific programs, these individuals could also lack understanding of available services that facilitate participation, such as financial aid or childcare. Therefore, these issues might have subsequently appeared on a survey of deterrents as situational or institutional barriers to participation. Cross (1978) further discovered that potential learners having low levels of educational attainment also had less awareness about where to go to learn about educational opportunities.

Information-push experiments were conducted to boost adult participation. A federally funded demonstration in 1995 sought to encourage mature, incumbent workers to invest in additional education and training. This study used an information treatment consisting of a mailed brochure to publicize educational opportunities and venues where potential learners could get more information (Buron, et al., 1999). Recommendations from that study included combining information with mitigation solutions for other deterrents to participation, as information alone proved insufficient.

A lack of quality information deterred dislocated workers in North Carolina (Schweke, 2004). This information dilemma proved easily understandable considering Aheron's observation that in North Carolina, ten government agents offered dislocated worker services, including training and education (2004). Further, besides simply understanding who could help them, dislocated workers faced another dilemma in understanding eligibility criteria for various programs (Aheron, 2004). Conversely, timely and tailored information proved very successful in both a Mississippi and a

Michigan mass-layoff event (Schweke, 2004). Therefore, information comprised an important consideration among deterrents to education participation.

Dispositional Deterrents

Cross (1981) defined dispositional deterrents as being related a person's conceptions of himself as a learner. She cited age and low prior educational attainment as examples. Cross also noted problems with collecting evidence of dispositional deterrents. First, she observed that social desirability bias could influence respondents to choose alternative options over dispositional deterrents. Additionally, she noted that many surveys of education participation excluded persons who indicated that they were not interested, thus any information about deterrents to participation beyond lack of interest were lost. In some cases, even the number of respondents reporting a lack of interest may have been unreported.

Deterrence researchers often reported that dispositional deterrents had little influence for predicting education participation or avoidance (Apt, 1978; Blais, et al., 1989; Darkenwald & Valentine, 1985; Martindale & Drake, 1989; Scanlan & Darkenwald, 1984; Valentine & Darkenwald, 1990). In those cases, the reported means for associated variables were typically low when compared to variables loading on other factors such as time (situational deterrent). Thus, the researchers concluded that the dispositional deterrents were less important to respondents than the variables that received higher mean values. However, clear factors for lack of confidence and lack of interest or low personal priorities, which were dispositional deterrents, emerged from prior research (Kowalik, 1989; Martindale & Drake, 1989). In other studies, when queried about reasons that they did not participate in education, respondents included

dispositional deterrents among the self-reported items (Beder, 1990; Lohman, 2000).

As noted by Cross, one potential reason why situational deterrents received higher endorsement could lay in their socially acceptable nature. Dispositional deterrents could have conceivably acted as more of an inhibitor than previous studies reflected, but social desirability bias may have reduced reporting of these deterrents. Study participants may have been unwilling to emphasize dispositional barriers when offered alternatives having less perceived stigma. For example, individuals having low literacy have become adept at hiding their limitations (Davis, Williams, Marin, Parker, & Glass, 2002; Doak, Doak, Friedell, & Meade, 1998; Parikh, Parker, Nurss, Baker, & Williams, 1996). Typically, such obscuration is thought to occur because illiteracy carries a stigma and makes people feel inadequate, afraid, and low in self-esteem (Parikh, et al.). Therefore, Garrison noted that some people might provide “ego sustaining rationalizations” for not participating in education (Garrison, 1988, p. 200). Other researchers proposed that respondents may have feigned interest in education in order to avoid appearing disinterested (Silva, et al., 1998).

A number of survey respondents appeared to suffer from lack of confidence. When Valentine and Darkenwald (1990) constructed a typology of potential learners, the second largest cluster (27%) was characterized by a lack of confidence – despite low means on factor variables associated with lack of confidence. Lack of confidence may relate to age; increased age correlated negatively with training and education participation (Frazis, et al., 1998; Hight, 1998; OTA, 1986). Another factor that may have manifested as lack of confidence was low educational attainment (OTA, 1986).

Several researchers theorized that social desirability bias may have reduced

reported dispositional deterrents (Cross, 1981; Martindale & Drake, 1989). One research study explicitly investigated the effect of social desirability bias on deterrents to education participation (Kowalik, 1989). In that study, the researcher found a significant correlation between a measure of social desirability bias and five of eight deterrent factors. During subsequent analysis, Kowalik (1989) concluded that the proportion of shared variance between the social desirability measure and each correlated factor was too small to contaminate the deterrent factor structure derived from the survey. Despite discounting the social desirability effect for his sample, Kowalik (1989) suggested in his discussion that social desirability bias might differentially affect less educated or affluent populations. A related, important limitation of this study was the population consisting solely of college alumni.

Previous researchers have argued for greater effort in the area of dispositional aspects of non-participation (Beder, 1990; Martindale & Drake, 1989). Beder (1990) observed that perceiving non-participants simply as participants who are deterred was problematic. He recommended further research into attitudes people have toward education and non-participation. Martindale and Drake (1989) concluded their study with potential implications of the social desirability phenomenon and suggested adding another instrument to measure academic self-concept simultaneously with deterrents. Additionally, Silva, et al. (1998) proposed that the National Center for Education Statistics should strongly consider addressing more non-situational barriers that affected adult participation in education within subsequent versions of the National Household Education Survey for Adult Education.

With respect to dislocated workers, dispositional deterrents may have been a

factor in educational nonparticipation. Lack of interest was a major barrier reported for dislocated workers (Watt, 2002). Low educational attainment decreased participation in training programs, particularly lack of a high school diploma (Estes, et al., 2002) or need for basic skills improvement (Schweke, 2004; Watt, 2002). In addition, increased age negatively affected dislocated workers participation rates. Workers over age 55 participated in training at lower levels than other age groups (Estes, et al.; Frazis, et al., 1998).

Deterrence literature groups deterrents into four principal categories: situational, institutional, informational, and dispositional. Yet research using factor analysis derived six or eight deterrent factors (Scanlan & Darkenwald, 1984; Darkenwald & Valentine, 1985; Martindale & Drake, 1989; Kowalik, 1989). This discrepancy between deterrent categories and factors is an unexplained gap in the literature that creates challenges for service providers who wish to increase participation by mitigating deterrents.

The literature noted that many dislocated workers chose not to participate in training and education opportunities. It also identified nonparticipation reasons from each of the four deterrence categories. However, no study focused specifically on reasons why North Carolina's dislocated workers do not participate in education.

Cross (1981) identified information as a tool to learn about opportunities and to mitigate barriers to education participation. However, for dislocated workers having low educational attainment, the information presentation format would be as important as the information itself. The information presentation methods comprised independent variables in this study, and literature in the next section informed their design.

Information Presentation

Several researchers identified information presentation as an important element to assist dislocated workers (Estes, et al., 2002; Schweke, 2004; Watt, 2002). The first consideration was simply to ensure that dislocated workers gained access to information they needed. Dislocated workers have been characterized as being unfamiliar with services available to help them (Estes, et al.). In a study of rural dislocated workers, each concern within the communication category addressed a lack of understanding or a need for more information about available services and options (Aheron, 2004). Of five promising practices for dislocated workers, two involved improving understanding of job opportunities and improving appreciation of education and training (Schweke, 2004). The same study noted that the state could help by providing clearer information to affected individuals and agencies on ways to respond to dislocations (Schweke, 2004, p. 63). Ensuring access to information proved to be a necessary, but not sufficient, service to help dislocated workers.

Besides access, dislocated workers needed information that they could understand. Information addressing services for dislocated workers proved very complex, because programs fell under the jurisdiction of numerous government agencies. At the federal level, the Departments of Agriculture, Education, Health and Human Services, Housing and Urban Development, Labor, and the Social Security Administration oversee programs for dislocated workers (Aheron, 2004). The federal government attempted to mitigate some confusion about services when it mandated that states establish one-stop centers to provide information to unemployed citizens (GPO, 1998).

Despite this effort to consolidate information about services, confusion remained.

Comments from a study by the Economic and Social Research Institute, a non-profit organization, illustrated the information burden experienced by dislocated workers. The report stated,

This confusion is exacerbated both by the limited education of many workers and the situation facing workers shortly after job loss. While they cope with the shock and financial difficulties of unemployment, they are bombarded by myriad messages about options and benefits such as unemployment insurance, pension rights, job search assistance, job training, stress management strategies, SCHIP coverage for children, etc. (Dorn, 2004, p. 16).

Additionally, rural dislocated workers observed that many times staff members were poorly informed and/or could not explain the program and service options to them, preventing recipients from making an informed decision in a timely manner (Aheron, 2004). Yet, because of the time-limited availability of income support, dislocated workers needed information about services that mitigate deterrents to education participation as early as possible. The foregoing observations about dislocated worker confusion emphasized the need to reduce complexity wherever possible. They also highlighted the importance of timeliness, reinforcing the need for information dissemination to take place early in the dislocation process (Watt, 2002).

Efforts to promote comprehension could have reduced some of the observed confusion. Study participants have asked that service providers present all information in a clear and accurate way (Aheron, 2004). Accordingly, researchers recommended producing material at appropriate reading and comprehension levels (Aheron; Bauman,

1997). They recommended including options and alternatives, as well as supplemental information about how the alternatives work together (Aheron). Further, Goodnow (1982) proposed that relating information about educational opportunities to reemployment opportunities could arouse the motivational orientation of dislocated workers.

A special concern noted by researchers included dislocated workers having low literacy or low English proficiency (Aheron, 2004; Bauman, 1997). Little research addressed the effect of low literacy or lower educational attainment on services used by dislocated workers. However, ample research existed within the health service field to inform this study.

Several studies discovered that written materials and web-based information offered less value for low literate individuals (Barents Group LLC, 1999; Coyne, Halvorson, Riley, & Schneider, 1994). Several studies noted that Internet formats were unsuitable for individuals possessing low literacy skills because the average reading levels they sampled were too high (Berland, et al., 2001; Davis, et al., 2002). Researchers working with Medicare beneficiaries noted a trend where few low-literate beneficiaries preferred the internet (Barents Group LLC). Yet print media and web-based resources comprised the primary means used to disseminate information (National Cancer Institute, 2003). Cross noted that print media better serves well educated people, while less educated people prefer more personal information exchange (1978). Researchers substantiated that observation while investigating Medicare recipients' communication mode preferences. The researchers noted that an overwhelming number of beneficiaries with low educational attainment preferred face-to-face information, and that about half of

low-literate beneficiaries preferred this mode (Barents Group LLC).

While a logical alternative to written information is spoken information, researchers in the medical field discovered that patients recall as little as 50% of what physicians tell them (Schillinger, et al., 2003). Several researchers observed that effective use of verbal information presentation required the service provider to solicit restatements of information from recipients, and then to clarify any misunderstood information (Doak, et al., 1998; Schillinger, et al.). Research also revealed that individuals with low literacy process verbal information differently; they listen slowly and take words literally (Doak, et al.).

Studies in the medical field revealed that combined verbal and written methods achieved better results than just verbal presentation (Bauman, 1997; Johnson, Sandford, & Tyndall, 2003; Savas & Evcik, 2001). Knowledge and satisfaction increased when both verbal and written information were provided upon patient discharge (Johnson, et al.). Similarly, a combination of verbal and written information improved patients' knowledge over written or verbal information alone, and written information alone improved knowledge more than verbal information alone (Savas & Evcik).

Research revealed that verbal information presentation did not need to be interactive using a face-to-face construct as in a physician-patient context. Medicare researchers observed that use of non-written materials like audiotapes and videotapes was useful because individuals did not need help to use it and could reuse the media as needed (Barents Group LLC, 1999, p. 25). In a different setting, use of audio-visual media proved far superior to audio-only information to explain judicial self-defense instructions for legal novices (Brewer, Harvey, & Semmler, 2004). Similarly, use of multimedia in an

educational context produced significantly improved comprehension over both written material and narration accompanied by overhead slides (Andres & Petersen, 2002). An interactive multimedia program, accompanied by a booklet and a printed summary, significantly reduced the decisional conflict scores and increased self-decisionmaking within two different patient groups: male patients diagnosed with benign prostatic hyperotrophy (Murray, et al., 2001a) and female patients considering hormone replacement therapy (Murray, et al., 2001b).

Survey evidence further revealed that recipients have different preferences for information receipt (Barents Group LLC, 1999; Communication Canada, 2003). The Canadian government created a special document designed to enhance communication between government service providers and their constituents. This document cited findings from a literacy survey regarding the respondents' preferred means of receiving government information. The majority, 66%, preferred written information, 22% preferred verbal information, and 10% preferred both (Communication Canada). Of those respondents who preferred written information, 41% stated their reason as wanting more time to read, while 27% believed written material was easier to understand (Communication Canada). Of those who preferred verbal information, 40% believed that verbal material was easier to understand, 9% reported problems with reading, and 8% wanted the opportunity to ask questions (Communication Canada). The preferences reflected in this report may have related to the literacy level of respondents. Both the request for more reading time and the reported ease of understanding verbal material could indicate reading difficulties within the sample.

Results of literacy surveys within the United States revealed the extent to which

low literacy or low educational attainment existed in the general population. Estimates from the National Assessment of Adult Literacy projected that 14% of US adults (30 million) possess “below basic” prose literacy, 12% of US adults (26 million) possess “below basic” document literacy, and 22% of US adults (48 million) possess “below basic” quantitative literacy (DOE, 2006). These characterizations indicated that the individuals had “no more than the most simple and concrete literacy skills” in the respective area (DOE, 2006, p. 3). Prose literacy referred to an individual’s ability “to search, comprehend, and use information from continuous texts;” document literacy referred to an individual’s ability to perform the same tasks with non-continuous texts in various formats; and quantitative literacy referred to the ability “to identify and perform computations... using numbers embedded in printed materials” (DOE, 2006, p. 2). Nearly half of these individuals were in the labor force, and 35% of them were full time workers (DOE, 2006). Thus, the likelihood of encountering low-literate dislocated workers in a mass-layoff event appeared to be a highly likely occurrence, necessitating information presentation alternatives that account for low literacy considerations.

The dislocated worker literature clearly identified needs for accessible and understandable information to inform dislocated workers about available services. It further addressed the complexity of information about services due to the number of agencies that provide services. Yet the literature failed to identify ways to collate information from these myriad, disparate agencies. It also did not address how to tailor and format information to reach special sub-groups such as low-literate or low English proficient dislocated workers. Another gap exists in assessing the utility of different information sources (internet, print media, or counseling) for sub-groups of dislocated

workers. Some ways to address these concerns emerged from literature in the medical field; however, they must be modified to fit the dislocated worker milieu.

Cross (1981) conceptualized that adults perceived information about educational opportunities differently based on personal characteristics. She asserted that individuals having low self-confidence or unfavorable attitudes toward education would not find relevance in information about new opportunities. Consequently, this study considered the effect of self-concept and role salience as a student as potential moderating variables. The next two sections review literature on these constructs.

Self-Concept

Many self-terms appeared in research literature. In his meta-analysis, Hattie (1992) uncovered 15 unique self-terms within achievement and performance literature. After self-concept, the next most popular terms were self-esteem and self-concept of ability (Hattie, 1992). Hattie (1992) found 62 different measures of self-concept within 128 achievement studies and 93 measures within 91 self-concept change studies.

According to Hattie (1992), self-concept was defined as “merely a set of beliefs, and relationships between these beliefs, that we have about ourselves” (p. 97). Accordingly, he characterized self-concept as a polymorphous construct related to cognitive appraisals people make about themselves. A variety of theorists described self-concept as hierarchical, multifaceted, latent, unique for each person, and able to guide behavior (Bong & Skaalvik, 2003; Byrne, 1984; Hattie, 1992). Self-concept has been conceived as having domain-specific components that are formed from both cognitive and affective perceptions (Bong & Skaalvik; Choi, 2005). For example, the Tennessee Self-Concept Scale identified six components subordinate to the general self-concept

measure: physical, moral, personal, family, social, and academic-work (Fitts & Warren, 1996). Researchers reported that the more precisely self-concept or self-efficacy measures focused on the specific task (predictor), the greater their ability to predict performance (Bong & Skaalvik; Choi).

If, as researchers asserted, self-concept guided behavior (Bong & Skaalvik, 2003; Hattie, 1992), then self-concept could guide an individual's choice to either avoid or participate in training or education. Self-concept linked cognitions and motivations (Markus & Nurius, 1986). Markus and Nurius further suggested that self-concept included a domain of positive or negative "possible selves" that may "function as incentives for future behavior (i.e., they are selves to be approached or avoided)" (p. 954). This finding suggested that a person having a poor academic self-concept could envision a negative possible self in a training situation, and therefore avoid such situations.

Similarly, Lawrence (2000) described self-concept as an overarching construct that included a current self-image and an ideal self. The discrepancy between a person's current self-image and ideal self was the self-esteem. Lawrence then suggested that self-concept formed through experiences, and the formed self-concept then determined future experiences that a person chose to have. Thus, poor prior experiences with education could have reduced a person's academic self-esteem or academic self-concept, and thereby deterred future participation. Cross' (1981) Chain of Response model reflected this perspective as well, proposing an iterative relationship between prior participation, self-evaluation, and attitudes about education that inform subsequent decisions to participate. In research with adult education dropouts, Garrison (1988) also

conceptualized self-concept as a potential constraint to education participation.

Despite the fact that Cross' Chain of Response model was widely referenced in research studies, a review of the literature failed to uncover any research specifically evaluating the role of self-concept in predicting education participation or avoidance. The manual for the Tennessee Self-Concept Scale, Second Edition (TSCS) included a list of nearly 400 studies performed using this scale, and none appeared to address education participation or avoidance (Fitts & Warren, 1996). Self-concept research often addressed academic achievement, but it rarely explored the antecedents to achievement of choosing to participate.

In one qualitative study of blue-collar male workers, Davis-Harrison (1996) found that non-participation behavior resulted from an interaction of low academic esteem and high work esteem. She stated, "because education came to symbolize frustration and failure...they redirected their strategies for success toward the workplace" (Davis-Harrison, p. 88). She further noted that the high work esteem permitted the participants to form an overall favorable self-concept. A meta-analysis of psychological and physical well-being during unemployment noted that unemployed persons' work-role centrality had a significant negative relationship with mental health and life satisfaction during unemployment (McKee-Ryan, Kinicki, Song, & Wanberg, 2005).

With respect to the relationship of self-concept and worker dislocation, several studies examined the impact of unemployment on self-concept. A study of job losers (dislocated workers) found that unemployed persons perceived a poorer self-evaluation, and longer unemployment resulted in poorer self-affection (Sheeran & McCarthy, 1990). A subsequent study found that early in a job loss, a person's self-evaluation was affected

by negative reactions by others; however, if unemployment became prolonged, diminished self-affection also emerged (Sheeran & Abraham, 1994). Small sample sizes limited both studies.

Although theoretical conceptions of self-concept suggested that it may influence education participation decisions, this area constituted a gap in the extensive self-concept research literature. Research regarding unemployed workers presented evidence of deleterious effects on self-concept from prolonged unemployment, especially when workers were highly vested in the work role. Thus, self-concept also related to perceptions of oneself within life roles such as the worker role. The next section addresses the role salience construct.

Role Salience

Researchers conceptualized role salience as the relative importance of a person's life roles when compared to each other (Nevill & Super, 1986). The life roles developed for the Work Importance Study included work, study, home and family, community activity, and leisure (Ferriera-Marques & Miranda, 1995). For the purpose of that study, researchers defined salience as "importance or prominence as shown by behavior, attitudes, and knowledge" (Ferriera-Marques & Miranda, p. 65).

For the United States, the role rated highest in salience was the work role, in both behavioral and affective measures; the second most important role was home and family (Ferriera-Marques & Miranda, 1995). However, subsequent research revealed stereotypical gender-linked aspects in ratings of worker (male) and homemaker (female) roles (Niles & Goodnough, 1996). Women consistently placed more importance on home and family, while men reported both lower participation and values expectations in this

area; however, men reported higher role salience as workers (Niles & Goodnough).

The exception to the gender-related role salience of work emerged in reports from professional women. In this case, the professional women placed more importance on work participation than on home and family participation. Researchers noted that professional women might be at risk for role conflict because of their higher levels of commitment and participation to work (Niles & Goodnough, 1996).

One model of role strain assessed impacts of multiple roles for non-traditional women college students. Role strain included three dimensions: role conflict, role overload, and role contagion. Role conflicts occurred when respondents perceived demands as incompatible, yet believed that they needed to perform tasks concurrently. Role overload, as the name suggested, occurred when a person perceived the available time as inadequate, and role contagion manifested in a tendency to think about other roles while engaged in activities for a different role (Home, 1997). This model of role strain suggested a variety of potential deterrents to education participation that respondents might report, depending on the individual's salience in the student role.

Cross (1981) proposed that a life transition could affect a person's decision to participate in education. Job dislocation constitutes a major life transition for a person who is highly invested in the work role, and therefore dislocation could stimulate a decision to participate in education. Education participation researchers identified work as a frequent reason for education participation (Merriam & Caffarella, 1999; Houle, 1961; Boshier & Collins, 1985; Ziegahn, 1992; Henry & Basile, 1994). However, a gap exists in understanding how job dislocation acts as a stimulus for education participation, and whether that stimulus is sufficient to overcome low role salience as a student.

Summary

Many people, including representatives of the United Nations (International Labor Office, 2004) and the U.S. Department of Labor (DeRocco, 2005), identified modern society as a learning society, requiring continual change and adaptation by workers to keep pace. Evidence revealed a clear link between educational attainment, employability, and wages. Yet a number of adults have not participated in structured educational opportunities (DOE, 2004). Dislocated workers who face certain structural barriers to reemployment could benefit from training and education participation. Yet many dislocated workers fail to take advantage of educational opportunities available after job loss (Eberts, O'Leary, & Wander, 2002; GAO, 2005; Gordus, 1984; Leigh, 1989; OTA, 1986). A clear need exists to understand why the members of this group who need more education fail to seek it. Only with this understanding can policy makers and educators tailor services for those with the greatest need. Unfortunately, the existing education participation and deterrent literature fails to inform this knowledge gap.

Education researchers initially focused on education participation studies, but those efforts failed to predict who would participate or avoid education (Cross, 1981). Seeking better predictive models, researchers next investigated why some adults failed to participate in education (Cross; Scanlan & Darkenwald, 1984). They perceived this group as deterred and proposed four categories of deterrents: situational, institutional, informational, and dispositional (Cross; Silva, et al., 1998). Subsequent factor analysis research identified six and eight deterrent factors (Scanlan & Darkenwald; Darkenwald & Valentine, 1985; Martindale & Drake, 1989; Kowalik, 1989). These deterrent studies produced interesting results about deterrence factors, but they focused on well-educated

populations. Deterrent factor research has not focused on less-educated populations. Yet many dislocated workers are not well educated, instead, they lack the basic skills needed to work in service and knowledge-based occupations (Estes, et al., 2002). Understanding deterrence factors for less-educated populations is essential to mitigate those deterrents and increase education participation for dislocated workers who need retraining.

Cross' (1981) Chain of Response model suggested several possible reasons for disinterest in education, including lack of information. Dislocated workers have cited a lack of understandable information as a problem in taking advantage of available services (Aheron, 2004; Estes, et al., 2002; Schweke, 2004). Researchers studying dislocated workers cited low-literacy levels and low English proficiency as areas of special concern (Aheron; Bauman, 1997). The lower educational levels of many dislocated workers create a situation in which service providers must tailor information for users of all literacy levels.

Although research with dislocated workers failed to address ways that information presentation should accommodate these groups, research in the other fields informed this issue. Medical researchers discovered that combined written and verbal methods achieve better results (Bauman, 1997; Johnson, et al., 2003). Other researchers discovered that verbal methods could include audio-visual media in lieu of person-to-person communication (Andres & Petersen, 2002; Brewer, et al., 2004; Johnson, et al.; Murray et al., 2001a; Murray et al., 2001b). Beyond information presentation, Cross (1981) further observed that personal characteristics could influence how a recipient perceived educational opportunities.

In the Chain of Response model, Cross (1981) suggested that poor self-confidence

and/or a negative attitude about education could influence how individuals perceive education participation. Despite extensive research in the self-concept construct, no studies addressed the function of self-concept as a predictor of education participation or avoidance. Further, self-concept research with dislocated workers was very limited and typically focused on the effects of unemployment on self-concept.

This study sought to inform several of these research gaps. First, the study gathered data to identify deterrents to education participation for a group of workers facing imminent dislocation. This understanding could benefit service providers whose job is to match dislocated workers to education programs. Additionally, these deterrence results would amplify the existing literature by providing a deterrent factor structure for a less-educated sample. Second, the study designed materials for dislocated workers to improve information presentation for recipients of all literacy levels. The researcher collated and simplified information from a host of agencies, and then formatted it in both print and audio-visual formats. These materials could fill the need to provide dislocated workers with essential information that is accessible at all literacy levels. Finally, the study was designed to explore elements of Cross' Chain of Response model pertaining to the effect of self-concept and attitudes about education. Results from this portion of the study could further inform efforts to create a predictive model of education participation.

The next chapter describes how the study design sought to accomplish these ends. It describes in detail the methods and procedures used in the study. Subsequent chapters present the findings and conclusions.

CHAPTER III

METHODS AND PROCEDURES

This chapter describes the method and procedures used for the study. Sections describe the population, research variables, treatment materials, instrument design, field procedures, and statistical analysis. The research problem investigated was to determine whether supporting-services information would change dislocated workers' self-reported deterrents to educational participation. Two sub-problems addressed the impact of different information presentation formats and personal characteristics on information reception.

Population

The population of this study included North Carolina workers displaced in one mass-layoff event and two plant closings. The sampling strategy used purposeful selection of mass layoff events and plant closings during the data collection phase. These events were drawn from a state-provided list of events for which the employer had filed a Worker Adjustment and Retraining Notification (WARN).

The purposeful selection criteria included the number of employees being dislocated in a single event and the industry in which the layoff occurred. In order to perform factor analyses, the researcher wanted 340 participants to produce the recommended ten-to-one ratio of participants to instrument items (Meyers, Gamst, & Guarino, 2006). The preferred industry for this study was manufacturing because that industry historically produced the bulk of mass-layoff events (DOL, n.d.). Based on the events scheduled during the data collection phase, those events best meeting the stated criteria were selected as the experimental events, with priority given to events having the

largest number of employees being dislocated.

Data Collection Event One

The first event selected was a mass-layoff event at a truck manufacturing plant where nearly 25% of the workforce (1,178 workers), was slated for permanent layoff. The plant manager was unwilling to permit the researcher to conduct the study on-site. However, the local Job Link Career Center manager agreed to permit the researcher to solicit participants during a scheduled job fair at the local community college. The community college Vice President for Continuing Education authorized use of community college facilities for the study. Because the number of workers being dislocated was so large, the researcher opted to proceed with data collection efforts.

The researcher used newspaper advertisement and flyers posted at the job fair to solicit participants. This data collection event took place in March 2007. An estimated 70 workers attended the job fair, but only five volunteered for the study and completed Session 1 pretest materials. Two of those participants returned for Session 2 the following week and completed posttest materials (40%). Local informants suggested that the affected workers did not perceive the layoff to be permanent, and therefore were uninterested in the job fair or other services available. Based on this outcome, the researcher decided to focus on plant closings and to avoid mass-layoff events. (In April 2007, this same employer filed another WARN notice for a permanent layoff of 3,125 workers.)

Data Collection Event Two

The second event selected was a closing at a plant that produced underwear. The entire workforce, 610 workers, was projected to be dislocated when the plant moved to

the Dominican Republic. The Department of Labor designated this closure as trade-affected, which entitled the workers to even greater benefits from the Trade Adjustment Assistance legislation. The plant manager had already moved to a new position at the corporate headquarters. The Human Resources Manager permitted the researcher to perform the study on-site in the cafeteria. The local Job Link Center rapid response coordinator permitted the researcher to observe the orientation briefs to the workers.

The researcher distributed flyers to each worker at the rapid response orientation brief in late April 2007. Data collection took place in May 2007. The researcher used posters, flyers, e-mail from the Human Resources Manager, and word-of-mouth to recruit participants during Session 1. Session 1 lasted four days in order to reach all shifts in the plant. During this period, 131 workers volunteered for the study (22%). Of those, 92 completed Session 1 pretest materials (70%). Five days later the researcher returned for Session 2, which lasted two days. During this session, 72 participants completed the posttest (55% of original volunteers; 78% of Session 1 completers). While collecting Session 2 data, workers at this plant informed the researcher of another large impending plant closing from a different manufacturer, which became data collection event three.

Data Collection Event Three

The third event selected was a closing at another textile plant that produced socks. The entire workforce, 517 workers, was projected to be dislocated when the plant moved to Honduras. The Department of Labor designated this closure as trade-affected, which entitled the workers to even greater benefits from the Trade Adjustment Assistance legislation. The Human Resources Manager who was coordinating closure events for workers arranged for the researcher to collect data on-site in break rooms at each of the

two physical plants. The state rapid response coordinator permitted the researcher to distribute recruiting flyers and to brief supervisors about the research study during the initial rapid response brief in early June 2007.

Data collection started within a week after the supervisors' brief. The researcher used posters, flyers, e-mail from the Human Resources Manager, and word-of-mouth to recruit participants during Session 1. Session 1 lasted four days, with two days spent in each plant. During this period, 227 workers volunteered for the study (44%). Of those original volunteers, 138 completed Session 1 pretest materials (61%). Three days later the researcher returned for Session 2, which lasted two days. During this session, 122 participants completed the posttest (54% of original volunteers; 88% of Session 1 completers).

Participant Grouping

Simple random assignment was the chosen method for participant grouping. The researcher used a random number generator to generate 1,000 five-digit case numbers between 10000 and 99999 to improve participant confidentiality. Next, the researcher used a computer to assign 34 cases randomly to three groups. Ten repetitions of this procedure yielded 1,000 random group assignments. Then the first 500 case numbers with random group assignments were placed onto a roster. As volunteers signed the roster, they randomly received both a case number and a group assignment.

This quasi-experimental design used three treatment levels. Two of the three groups were treatment groups and participated in the pretest, treatment, and posttest. The third group served as the control group and participated in the pretest and posttest, but received no treatment. The researcher offered prospective participants an incentive of a

raffle chance for a \$100 VISA debit card. One card was raffled at each textile plant.

Research Variables

This study used three independent variables, one dependent variable, and two covariates. The independent variables were the three treatment levels: video plus brochures, brochures-only, and control. The dependent variable was the total deterrent score obtained from the posttest factors on the Adult Learning Questionnaire. The covariates were the total score on the self-concept measure and the score for role salience as a student on the salience measure. The researcher operationally defined each of these research variables using associated materials or instruments in the following sections on Treatment Materials and Instrument Design.

Treatment Materials

The three independent variables included Treatment A, Treatment B, and no treatment. Treatment A included combined presentation of written and verbal information as described below. Treatment B was comprised of only the written information described below. The control group received neither information presentation.

Verbal Information Format (Video)

The verbal information, presented in video format, contained material intended to focus the attention of dislocated workers on impending changes and available services. During the introduction, a speaker introduced the eight topics presented in the brochures and encouraged the listener to be open to assistance. The first topic addressed job loss grief that workers might experience. This segment was followed by a segment on employment barriers. This portion of the brief focused attention on the impending life transition (Cross' Stage D) to stimulate a self-evaluation relative to employment barriers

(Cross' Stage A). Speakers subsequently provided information about dislocated worker supporting services, many of which could mitigate deterrents to education participation (Cross' Stage F). These topics included job search assistance, income support, upgrading skills, health care, transportation, and childcare.

The video format supported use by participants having low literacy. The presentation principally showed briefers reading the brochure text, interspersed with an occasional presentation slide containing text. Briefers represented both genders and a variety of ethnicities. The master video was recorded in a studio having a teleprompter, which permitted briefers to face the camera while reading. The researcher wrote the script below a 5th-grade reading level as measured by the Flesch-Kincaid Grade Level score, computed using Microsoft Office Word 2003. This score evaluates text against a United States public school grade level. The score is computed using the formula $(.39 \times \text{ASL}) + (11.8 \times \text{ASW}) - 15.59$, where ASL is the average sentence length and ASW is the average number of syllables per word (Microsoft Office Word 2003, Help Function: Readability Scores). Essentially, to achieve a lower grade level the text must use short words and sentences. The video script was included as Appendix A.

Written Information Format

The written information (brochures) addressed the same eight topics as the video: job loss grief, employment barriers, job search assistance, income support, upgrading skills, health care, transportation, and childcare. The numerous and complex services available for dislocated workers would be difficult to recall without a written reference.

The brochures provided print information that participants could review at their convenience. Each brochure used four pages: a front cover containing a topic outline, two

interior pages that elaborated the outline, and a back cover containing resources for additional information. The brochures were printed on 11x17 inch paper using a center fold to create the four sections. Font size for text was a minimum of 16 points to improve readability for low-literate individuals. Each brochure used a distinct paper color so that users could easily differentiate the topics. Of particular concern for the written brief was the level of writing, due to the likelihood of participants with low educational attainment and low literacy. The researcher wrote the brochures below a 5th-grade reading level as measured by the Flesch-Kincaid Grade Level score, computed using Microsoft Office Word 2003. These brochures were included as Appendix B.

Instrument Design

Three instruments provided data relative to the research variables: the Adult Learning Questionnaire (1985), the Tennessee Self-Concept Scale, Second Edition (1996), and the Salience Inventory (1985). Two other measures were created for the study: a Demographic Questionnaire and Information Value Survey.

Tennessee Self-Concept Scale, Second Edition (TSCS:2)

The Tennessee Self-Concept Scale, Second Edition was an 82-item measure of self-concept that provided fifteen subscale scores (Fitts & Warren, 1996). The scales were organized into the following categories: Validity, Summary, Self-Concept Scales, and Supplementary Scores (Mental Measurements Yearbook 13, 1997). The self-concept subscales included physical, moral, personal, family, social, and academic-work (Mental Measurements Yearbook 13). Items within these scales measured the respondent's identity, satisfaction, and behavior. An adult could reportedly complete this measure in 10-20 minutes. The adult form was purportedly usable by those with a third-grade

reading level, and respondents rated each item on a five-point scale from always true to always false (Fitts & Warren). This instrument also included a short form of 20 items which correlated strongly ($r = +.90$) with the full instrument (Hattie, 1997). However, the short form only provided a full self-concept score (Fitts & Warren). In this study, the researcher also wanted the Academic-Work subscale scores for potential follow-up tests; therefore, the entire instrument was used. Representative items from the Academic-Work subscale are included in Appendix C.

Reliability estimated with Cronbach's alpha yielded coefficients ranging from .73 to .93 for the subscales and the total self-concept score (Brown, 1997). Brown noted that test-retest reliabilities differed, ranging from .47 (Inconsistent Responding) to .82 (Total Self-Concept). The six principal subscale reliabilities ranged from .70 to .80 (Fitts & Warren, 1996). Fitts and Warren reported that the developers validated content through both expert judges and a facet design study. Brown reported adequate evidence of construct validity supported by a principal components analysis. Fitts & Warren reported that concurrent validity was demonstrated from correlations with other psychological measures: Self-Rating Positive Affect Scale ($r = .68$), Coopersmith Self-Esteem Inventory ($r = .75$), Minnesota Multiphasic Personality Inventory (multiple subscale correlations), and the Self-Description Questionnaire III ($r = .71$ for Total scores). Fitts and Warren also provided evidence of discriminant validity for the TSCS:2.

Saliency Inventory (SI)

The Saliency Inventory was a 170-item measure of behavioral and affective dimensions of life-role saliency that provided 15 subscale scores (Nevill & Super, 1986). The instrument measured behavior with one scale (participation) and affect with two

scales (commitment and value expectations) for five life activities: study, work, home and family, leisure, and community service. Each scale contained 10 or 14 items that solicited a four-point Likert-type response: 1. never or rarely/little or none; 2. sometimes/some; 3. often/quite a lot; 4. almost always or always/a great deal (Nevill & Super). Each item was introduced using a stem such as “What opportunities do you see now and in the future to _____?” (Ferreira-Marques & Miranda, 1995, pp. 71-72). A respondent replied to the stem, using the four-point scale, for each of five roles: student, worker, homemaker, “leisurite”, and citizen. Thus, scores ranged from 10 to 40 for the Participation and Commitment scales, and from 14 to 56 for the Value Expectation scale. The inventory required approximately 30-45 minutes to complete. Nevill (1995) observed that the Value Expectation scale provided a better measure of the affective dimension and advised that researchers could omit the commitment scale if time or response burden was a concern.

Reliability estimated with Cronbach’s alpha produced coefficients in the .80’s and .90’s, while test-retest reliability was much more modest (Osberg, 1992). Other researchers replicated these findings with coefficient alpha estimates ranging from .81 to .95 (Duarte, 1995) and from .80 to .92 (Niles, Anderson, & Goodnough, 1998). Test-retest reliability for roles within the Participation scale ranged from .59 to .83, while the Commitment scale ranged from .60 to .77, and the Value Expectation scale ranged from .37 to .67 (Osberg).

Researchers strengthened content validity using extensive development procedures during the Work Importance Study; these included expert review and field trials (Ferreira-Marques & Miranda, 1995). Construct validity was reportedly modest

(Osberg, 1992). Concurrent validity assessment was not reported, presumably because the Saliency Inventory was created to overcome weaknesses in a previous instrument and to fill a gap in role-saliency measurement (Sverko & Vizek-Vidovic, 1995). In fact, one of the authors, Super (1995) stated, "There were no existing measures of the saliency of the major life roles" (p. xviii). A subsequent study provided evidence of construct validity by finding small correlations between scales on three measures used in career development: Adult Career Concerns Inventory, the Values Scale, and the Saliency Inventory. These findings suggested that each instrument measured a unique construct. Although this study omitted the Value Expectations scale, a principal components analysis derived factors for the Commitment and Participation scales that corresponded to the five roles, providing evidence of concurrent validity (Duarte, 1995). A copy of the Saliency Inventory is included at Appendix D.

Adult Learning Questionnaire (ALQ)

The ALQ was a 34-item measure of deterrents to education participation (Darkenwald & Valentine, 1985). This instrument was used to derive a "Deterrents to Education Scale - General." When administering the ALQ, researchers first provided respondents with a definition of adult education. Researchers then gave respondents a framing question that delineated the time span to consider and encouraged respondents to think diligently about their desire to participate in education and the importance of reasons listed on the scale for choosing not to participate (Darkenwald & Valentine). Respondents chose a response on a five-point scale from (1) not important to (5) very important.

Reliability estimated using Cronbach's alpha was .86 (Darkenwald & Valentine,

1985; Martindale & Drake, 1989) and .83 (Kowalik, 1989). Content validity was established through a rigorous procedure to develop and test the instrument. Steps included developing the items using information obtained from interviews with a diverse group of adults, performing item analysis on the prototype instrument, pilot-testing the prototype with another diverse group, and soliciting critical comments. Darkenwald and Valentine demonstrated construct validity through principal components analysis that yielded a six-factor solution, and which accounted for 54% of the variance. Martindale and Drake selected an eight-factor solution to account for 55% of variance, where four factors aligned well with Darkenwald and Valentine, two differed slightly, and two new factors emerged. Kowalik also selected an eight-factor solution with only one slightly different factor when compared to results of the Martindale and Drake study. A copy of the Adult Learning Questionnaire is included at Appendix E.

Demographic Questionnaire

The demographic questionnaire sought information that literature identified as employment barriers or deterrents to education participation. These items could act as situational deterrents or could compound institutional or dispositional deterrents. Items included gender, age, occupation, educational attainment, life roles, ethnicity, income level, transportation access, and computer/internet access. The researcher used items from the demographic questionnaire to describe the sample and to compare demographic characteristics with deterrent factors. The demographic questionnaire was included as Appendix F.

Information Value Survey

The Information Value Survey asked participants if the video or written material

seemed useful. This measure was used only to stimulate the treatment group members to review the materials. This survey contained a Likert-scale for rating the organization, comprehensibility, and value of the material. It provided space for open-ended comments to improve face validity and provide ideas for future research. The Information Value Survey was included as Appendix G.

Field Procedures

This research used a three-group randomized design to explore the differences in deterrents to education participation resulting from two treatments (see Table 2).

Table 2

Three-Group Randomized Design

| Group | Pretest | Treatment | Posttest |
|---------|---------|-----------|----------|
| Group A | X | A | X |
| Group B | X | B | X |
| Group C | X | | X |

Treatment A provided each participant with a video and brochures that contained identical information. Treatment B provided each participant with only the brochures. The control group received neither the video nor the brochures until after the posttest.

Pretest

Before the pretest, the researcher explained the research purpose, procedures, incentives, and right to withdraw at any time without penalty. The researcher provided time for questions and provided contact information for questions that could arise later. Anyone who wished to withdraw at any time was asked to return study materials and

reminded that participation was strictly voluntary.

Next, the researcher asked each volunteer to sign the participant roster and then issued the pretest packet. The pretest packet contained three instruments (Tennessee Self-Concept Scale, Second Edition, Salience Inventory, and Adult Learning Questionnaire) and a demographic questionnaire. The materials section of this chapter describes these instruments and the questionnaire. The researcher had previously coded each packet, instrument, and questionnaire with a unique identifier that corresponded to a case number on the participant roster. Further, the participant case numbers had been randomly assigned to a treatment level (Treatment A, Treatment B, or Control) before data collection began. Thus, each participant was randomly assigned to a group upon signing the participant roster.

Release of confidential information posed a potential risk, as the researcher used personal identifying information (names only) to match pretest and posttest instruments. To minimize this risk, the researcher coded all instruments with five digit identifying numbers that corresponded to case numbers on the participant roster. The case numbers were randomly listed on the roster. Data files contained only the unique numeric identifier for each case. The researcher reported only aggregated data to protect individual participant confidentiality.

Treatment

Upon return of the pretest materials, the researcher gave each participant a reminder paper containing the case identification number, and the posttest date and times. This reminder paper also advised participants not to solicit information (control group) or to share information (treatment groups). The researcher verbally reviewed this

information with each participant and informed everyone that each participant would get all of the information materials after Session 2.

Individuals in Treatment Groups A and B then received an envelope containing respective treatment materials (video plus brochures, or brochures alone). The researcher asked treatment group participants to read the brochures before Session 2 so that they could provide feedback about their value. Additionally, participants in Treatment Group A were asked to watch two video segments on-site: employment barriers and upgrading skills. The researcher used portable DVD players for this purpose. These two segments required 15 minutes, and then participants were asked to watch the other segments at home. They were advised that Session 2 would contain a questionnaire asking about the value of the brochures and DVD.

Posttest

Less than one week following the treatment, the researcher administered the posttest to all three groups. The posttest included one instrument measuring deterrents to education participation and the information value survey (for treatment groups). Upon return of posttest materials, participants received a raffle ticket for a \$100 VISA debit card. Additionally, the control group members received packets containing the video and brochures, while the Treatment Group B (brochures only) group members received the DVD. The researcher left 100 additional packets with handouts and video disks with each plant for anyone who did not participate in the research.

Although delaying the posttest until after layoff could have provided time for dislocated workers to better realize the challenges associated with layoff, this wait may have been extensive – as long as six months for some participants. Such a long interval

could have introduced other threats such as maturation or could have exacerbated the diffusion threat. The few days between pretest and posttest provided time for respondents to consider the information, estimate their own employment barriers, and reevaluate their deterrents to education accordingly.

The researcher distributed 363 Session 1 pretest packets and received back 235 pretest packets (65%). Of those participants who returned for Session 2, 196 returned completed posttest instruments for a 53% completion rate of both sessions. The researcher made no effort to ascertain why individuals did not return packets as this would have been logistically impractical. Prior to analysis, the researcher removed two cases from the 196 completed packets. In one case, the researcher observed someone other than the participant completing the participant's posttest instrument. In the second case, a participant failed to complete both instruments used as covariate measures. This resulted in 194 (99%) usable instruments.

Statistical Analysis

Several forms of analysis supported this research study. These included factor analyses and comparisons of group differences. Reliability analyses were also performed for all variables and derived scale scores. All data analysis was performed using the Statistical Package for Social Sciences (SPSS) Graduate Pack 14.0 for Windows software.

Factor Analyses

The first analytic requirement was to identify the deterrent factors reported by this sample. Although previous studies performed factor analysis, demographics of the samples in those studies were very different from the demographics of the sample in this

study. This sample reported much lower educational attainment and lower family income than participants in previous studies. Therefore, factor analysis provided an opportunity to identify any changes in the factor structure emerging from a different population. Once all data were collected, cleaned, and screened, the researcher used a principal components analysis with varimax rotation to identify an initial solution. Subsequent analyses used a maximum likelihood extraction method with varimax rotation to produce several factor structures. The researcher selected the most parsimonious and interpretable factor solution for both the pretest and posttest. These analyses supplemented previous research performed using the ALQ instrument. The researcher used the factor score coefficient, of each item loaded to the respective factors, to calculate factor scores for subsequent analysis. Additionally, comparison of factor structures for the pretest and posttest provided evidence regarding hypothesis H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions of deterrents to education participation.

Factor Score Computation

The second analytic requirement was to derive factor scores for each respondent. The researcher multiplied each ALQ item response value by the factor score coefficient for that item and summed the values for all items loading onto each factor. This produced a factor score for each separate factor. The researcher then summed those factor scores to derive an overall deterrent score for each respondent on the pretest and posttest. These deterrent scores provided data for comparison of group differences.

Comparison of Group Differences

Comparison of groups following the posttest looked for significant differences

between all three groups on deterrent factor scores using Analysis of Covariance (ANCOVA). The goal of ANCOVA was to control for the effect of self-concept and role salience as a student in comparing deterrent total posttest scores. The independent variables were the three treatment levels (video plus brochures, brochures-only, and control). The covariate was the total self-concept score for one analysis and the role salience score as a student for another analysis. The dependent variable was the posttest deterrent total score. If significant differences emerged from comparison of the posttest deterrent total scores, then further analysis was planned to determine if this difference related mainly to only one factor, or some combination of factors.

The first analysis sought information related to hypothesis H₂: Verbal information combined with written information will produce a significantly lower posttest deterrent score than either written information alone or no information when the effect of self-concept is held constant. This hypothesis investigated Stage A of Cross' (1981) Chain of Response model using a self-concept measure as a proxy for Cross' "self evaluation" construct. This analysis sought to cancel any moderating effect of self-concept when observing whether the treatment succeeded in reducing deterrents to education participation.

The second analysis investigated hypothesis H₃: Verbal information combined with written information will produce a significantly lower posttest deterrent score than either written information alone or no information when the effect of salience as a student is held constant. This hypothesis investigated Stage B of Cross' (1981) Chain of Response model using a salience measure in the student role as a proxy for Cross' "attitude about education" construct. This analysis sought to cancel any moderating effect

of salience as a student when observing whether the treatment succeeded in reducing deterrents to education participation.

Summary

This chapter opened with a description of the study population and sample. Next, it outlined the research variables and described the treatment materials. The fourth section reviewed instrument design, while the fifth section explained field procedures. Finally, the last section identified the statistical analyses used in the study.

Chapter IV reports the findings from these analyses. Information from the demographic survey is used to describe study participants. The data analyses are then presented in the order of hypotheses.

CHAPTER IV

FINDINGS

This study was conducted from April through June 2007 at three sites in North Carolina. The primary problem of this study was to investigate whether dislocated worker supporting-services information would change dislocated workers' self-reported deterrents to education participation. The study also explored whether information presentation method, written format versus combined written and verbal format, altered the participants' perceived deterrents. Finally, the study explored whether self-concept or role salience as a student exerted a moderating effect on information reception.

Following this introduction is an overview of participants, including their demographic characteristics. Next, the findings appear in order of the three hypotheses evaluated during this study. Each analysis section reviews statistical procedures used and analysis outcomes.

Overview

The population for this study included workers facing job dislocation from three manufacturing plants in North Carolina. One plant manufactured trucks, another produced underwear, and the third made socks. The number of affected employees at each site ranged from 517 to 1178 workers.

The final analysis included 194 participants: Treatment Group A (video plus brochures) contained 71 participants (37%), Treatment Group B (brochures only) contained 66 participants (34%), and Treatment Group C (control) contained 57 participants (29%). Of those, one participant had an incomplete Tennessee Self-Concept Scale, Second Edition, and five participants had incomplete Salience Inventories.

However, because these participants completed the pretest and posttest, as well as one covariate instrument, their cases remained in the data set. The researcher used listwise deletion to exclude cases having incomplete covariate measures.

Data collected for this study included demographic information and responses to three instruments: Adult Learning Questionnaire (ALQ), Tennessee Self-Concept Scale, Second Edition (TSCS:2), and Salience Inventory (SI). The demographic questionnaire used a forced-choice format to gather information about gender, age, ethnicity, and educational attainment. The three instruments were all scored using a Likert scale with a maximum item value of four (SI) or five (ALQ and TSCS:2). The Adult Learning Questionnaire, which has 34 items, was administered twice, once as a pretest and again as a posttest. The Tennessee Self-Concept Scale, Second Edition, which has 82 items, and the Salience Inventory, which has 170 items, were administered in the pretest. In sum, each participant was asked to respond to a minimum of 333 items. All responses were processed into scale scores for statistical analysis, except for demographic information.

Demographic Characteristics

Women comprised nearly two thirds of the sample (64.4%). A majority of the sample (61.5%) reported ages between 35 and 54 years old. Most participants reported their ethnicity as White/Caucasian (62%) or Black/African American (23%). Educationally, most participants reported high school completion (71%), while 33 participants (17%) reported having no high school diploma. Only 9% of participants reported having some college or a degree. Most participants reported annual family income below \$45,000. Demographic characteristics of participants are shown in Table 3.

Table 3

Demographic Characteristics of Participants (n = 194)

| Demographic characteristic | Frequency | Percentage |
|---------------------------------|-----------|------------|
| Gender | | |
| Men | 69 | 35.6% |
| Women | 125 | 64.4% |
| Age | | |
| 18-24 | 9 | 4.6% |
| 25-34 | 24 | 12.4% |
| 35-44 | 58 | 30.1% |
| 45-54 | 61 | 31.4% |
| 55-64 | 37 | 19.1% |
| 65 or older | 4 | 2.1% |
| Ethnicity | | |
| Black/African American | 44 | 22.7% |
| Hispanic | 19 | 9.8% |
| Asian | 5 | 2.6% |
| American Indian/Native American | 4 | 2.1% |
| White/Caucasian | 120 | 61.9% |
| Other | 1 | .5% |

Table 3 (continued)

Demographic Characteristics of Participants (n = 194)

| Demographic characteristic | Frequency | Percentage |
|----------------------------|-----------|------------|
| Educational Attainment | | |
| Non-High School Graduate | 33 | 17.0% |
| High School Graduate | 138 | 71.1% |
| Some College | 2 | 1.0% |
| College Degree | 15 | 8.0% |
| Family Income | | |
| Less than \$15,000 | 25 | 12.9% |
| \$15,000 - \$30,000 | 109 | 56.2% |
| \$30,000 - \$45,000 | 46 | 23.7% |
| \$45,000 - \$60,000 | 8 | 4.1% |
| Greater than \$60,000 | 2 | 1.0% |

Reliability Analyses

During data screening, the researcher evaluated each instrument for reliability. Two internal consistency estimates of reliability were performed for the Adult Learning Questionnaire: one for the pretest and one for the posttest. These estimates were performed using the total deterrent scores obtained for each measure. The pretest coefficient alpha was .95 ($n = 168$), and the posttest coefficient alpha was .96 ($n = 174$). Additionally, the researcher performed an estimate of test-retest reliability for the Adult

Learning Questionnaire using the control group pretest and posttest total deterrent scores ($n = 57$). This estimate yielded an adequate test-retest reliability, $r = .76$, $p < .01$.

Because previous studies using the Adult Learning Questionnaire were one-time surveys, this estimate was unavailable in the literature. An internal consistency estimate of reliability performed for the Tennessee Self-Concept Scale, Second Edition yielded a coefficient alpha of $.76$ ($n = 193$). An internal consistency estimate of reliability performed for the Salience Inventory yielded a coefficient alpha of $.99$ ($n = 124$).

Hypothesis One: Factor Analysis Comparison

The dimensionality of the 34 items from the Adult Learning Questionnaire was first analyzed using a principal components analysis to derive an initial, unrotated solution. The Kaiser-Meyer-Olkin measure of sampling adequacy was $.91$ for the pretest and $.92$ for the posttest, indicating that the present data were suitable for principal components analysis. Similarly, Bartlett's test of sphericity was significant ($p < .001$), indicating sufficient correlation between the variables to proceed with the analysis.

Subsequent analyses used maximum likelihood factor analysis with varimax rotation to derive solutions for prescribed numbers of factors. Three criteria were used to determine the number of factors to rotate: previous research indicating that the instrument yielded multiple factors, the Kaiser-Guttman retention criterion of eigenvalues over 1.0, and the interpretability of the factor solutions. The researcher performed maximum likelihood factor analyses to extract multiple solutions for both the pretest and posttest in order to evaluate Hypothesis H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions to deterrents to education participation. For both analyses, variables with loadings of $.40$

and higher were retained. Researchers in two previous deterrent factor studies used this cutoff, and it was the recommended cutoff for studies having less than 200 cases (Meyers, et al., 2006).

The rationale used in naming these factors was guided by the previous research using the Adult Learning Questionnaire. The researcher endeavored to use the same factor names, where those names suited the loaded variables, to aid in comparing factor solutions with past research. The highest-loaded items on each factor were given precedence in naming the factor, although the breadth of items was also considered.

Pretest Deterrent Factor Structure

For the pretest, the unrotated initial solution revealed eight components that exceeded an eigenvalue of 1.0. Subsequently, a principal components factor analysis with varimax rotation replicated this finding; however, nine variables were double or triple-loaded onto factors. Seeking a solution with fewer double-loaded variables, the researcher extracted solutions having from three to eight factors using the maximum likelihood method. While the eight-component solution accounted for the most variance, it contained eight double-loaded variables and five unloaded variables, which made interpretation difficult. Other extracted solutions were less interpretable.

The six-component solution, accounting for 51% of the total variance, provided the clearest extraction. Communalities ranged from .42 to .71. As shown in Table 4, Cronbach's coefficient alpha ranged from .77 to .89 among the six factors, indicating good subscale reliability.

Table 4
Pretest Distribution and Reliability of Factors

| Factor | Items | <i>M</i> | <i>SD</i> | α |
|------------------------------------|-------|----------|-----------|----------|
| Total Pretest Deterrent Scale | 34 | 73.68 | 28.49 | .95 |
| 1. Lack of Confidence | 9 | 20.64 | 9.43 | .89 |
| 2. Poor Life Fit | 8 | 19.73 | 8.47 | .87 |
| 3. Lack of Incentive | 6 | 10.66 | 5.31 | .80 |
| 4. Negative Course Characteristics | 4 | 7.98 | 4.38 | .82 |
| 5. Lack of Course Relevance | 3 | 6.66 | 3.56 | .76 |
| 6. Cost | 2 | 6.16 | 2.90 | .77 |

The six-component solution permitted clear interpretation for each factor. Four variables double-loaded onto two different factors. Five variables failed to load on any factor as they did not meet the .40 load cutoff. The accepted six-component solution accounted for 50.69% of the variance in deterrent total score for the pretest.

Factor 1: Lack of Confidence (eigenvalue = 3.83) accounted for 11.3% of the variance and had nine items. The variables having the highest loads clearly indicate a confidence concern: not confident in learning ability, felt I couldn't compete with younger students, and felt I was too old to take the course. Even items having lower load values exhibit doubts about participant abilities: didn't meet requirements, didn't think I would be able to finish, felt unprepared for the course, and don't enjoy studying. Two ambiguous variables also loaded on this factor: didn't know about courses available and

not interested in taking courses. Together the preponderance of variables presented a clear factor that described dispositional deterrents related to low self-confidence.

Factor 2: Poor Life Fit (eigenvalue = 3.25) accounted for 9.6% of the variance and had eight items. The variables loading onto this factor reflect broad challenges with education participation. The highest loaded variables discuss a lack of convenience in courses: inconvenient time and inconvenient location. Other variables expand this perspective of courses not fitting in participants' lives: time required to finish, course was not on the right level, courses did not seem interesting, and transportation problems. In combination, these situational deterrents depict a general outline of education not suiting participants' lifestyles.

Factor 3: Lack of Incentive (eigenvalue = 3.08) accounted for 9.1% of the variance and had six items. Most of the items loading on this factor addressed the idea that education participation offered little or no reward. The two highest loading variables concerned extrinsic stimuli: friends did not encourage participation and family did not encourage participation. Others items referenced the low relative priority given to education: wasn't willing to give up leisure time and courses did not seem useful or practical. The final items addressed familial concerns that hindered participation: family problems and trouble arranging childcare. This factor included a combination of dispositional and situational variables that portrayed education as not offering enough inducement for participants to surmount these concerns.

Factor 4: Negative Course Characteristics (eigenvalue = 2.78) accounted for 8.2% of the variance and had four items. The first three items clearly addressed course characteristics: courses were of poor quality, were too general, and did not seem

interesting. The final item noted that the course was offered in an unsafe area. Thus, all variables were institutional deterrents that reflected negatively on educational offerings considered.

Factor 5: Lack of Course Relevance (eigenvalue = 2.45) accounted for 7.2% of the variance and had four items. All four items indicated that courses were not appropriate for participants: course would not meet needs, course was not on the right level, education would not help in my job, and I felt unprepared for the course. This factor differs from the previous factor because the courses may be acceptable but they do are not relevant for the participant, whereas the previous factor reflected negatively on the courses themselves.

Factor 6: Cost (eigenvalue = 1.84) accounted for 5.4% of the variance and had two items. Both items were directly related to money: couldn't afford the registration or course fees and couldn't afford miscellaneous expenses. These variables were two of the three variables in the instrument that directly addressed money. The final monetary variable did not meet the .40 load cutoff value required for this study but it was the next highest loaded variable on this factor. This factor was very clearly defined and it matched factors extracted in previous studies. Therefore, the Cost factor was retained even though it only had two loaded variables.

Table 5 depicts the pretest deterrent factor structure with loaded items, means, and scale ranks. Of note is that two variables related to cost had the highest item means ($M > 3.00$). Three variables associated with time had the next highest item means ($M \geq 2.78$). And, the next two ranked variables concerned confidence issues ($M \geq 2.51$). Variables having the highest means did not load on factors accounting for the most variance.

Table 5

Pretest Deterrent Factor Structure

| Variable | Load | M | Rank |
|--|------|------|---------|
| Pretest Factor 1: Lack of Confidence | | | |
| Because I was not confident of my learning ability. | .67 | 2.54 | 6 |
| Because I felt I couldn't compete with younger students. | .66 | 1.98 | 23 |
| Because I felt I was too old to take the course. | .59 | 2.24 | (tie)16 |
| Because I don't enjoy studying. | .57 | 2.23 | 17 |
| Because I didn't meet the requirements for the course. | .56 | 2.32 | 13 |
| Because I didn't think I would be able to finish the course. | .50 | 2.39 | 11 |
| Because I felt unprepared for the course. | .48 | 2.51 | 7 |
| Because I didn't know about courses available for adults. | .46 | 2.43 | 10 |
| Because I'm not that interested in taking courses. | .45 | 2.14 | 19 |
| Pretest Factor 2: Poor Life Fit | | | |
| Because the course was scheduled at an inconvenient time. | .68 | 2.78 | 5 |
| Because the course was offered at an inconvenient location. | .60 | 2.47 | 9 |
| Because of the amount of time required to finish the course. | .54 | 2.84 | 3 |
| Because I didn't know about courses available for adults. | .53 | 2.43 | 10 |
| Because I didn't have time for the studying required. | .53 | 2.81 | 4 |
| Because the course was not on the right level for me. | .45 | 2.28 | 14 |
| Because the courses available did not seem interesting. | .41 | 2.24 | (tie)16 |
| Because of transportation problems. | .40 | 1.88 | 26 |

Table 5 (continued).

Pretest Deterrent Factor Structure

| Variable | Load | <i>M</i> | Rank |
|---|------|----------|---------|
| Pretest Factor 3: Lack of Incentive | | | |
| Because my friends did not encourage my participation. | .64 | 1.58 | 33 |
| Because my family did not encourage participation. | .61 | 1.82 | 28 |
| Because the available courses did not seem useful or practical. | .50 | 2.05 | 21 |
| Because of family problems. | .47 | 1.93 | 24 |
| Because I wasn't willing to give up my leisure time. | .47 | 1.66 | 31 |
| Because I had trouble arranging for childcare. | .40 | 1.64 | 32 |
| Pretest Factor 4: Negative Course Characteristics | | | |
| Because the courses available were of poor quality. | .71 | 1.92 | 25 |
| Because I wanted to learn something specific, but the course was too general. | .65 | 2.04 | 22 |
| Because the courses available did not seem interesting. | .58 | 2.24 | (tie)16 |
| Because the course was offered in an unsafe area. | .47 | 1.84 | 27 |
| Pretest Factor 5: Lack of Course Relevance | | | |
| Because I didn't think the course would meet my needs. | .65 | 2.13 | 20 |
| Because the course was not on the right level for me. | .49 | 2.28 | 14 |
| Because education would not help me in my job. | .45 | 2.25 | 15 |
| Because I felt unprepared for the course. | .42 | 2.51 | 7 |

Table 5 (continued).

Pretest Deterrent Factor Structure

| Variable | Load | <i>M</i> | Rank |
|---|------|----------|------|
| Pretest Factor 6: Cost | | | |
| Because I couldn't afford the registration or course fees. | .76 | 3.13 | 1 |
| Because I couldn't afford miscellaneous expenses like travel, books, etc. | .70 | 3.03 | 2 |

The six-factor solution accepted here is equal in factor number to solutions accepted by the instrument developers (Scanlan & Darkenwald, 1984; Darkenwald & Valentine, 1985). Subsequent researchers accepted eight-factor solutions (Martindale & Drake, 1989; Kowalik, 1989). However, the six-factor solution derived from this analysis differs in interpretation from past studies. This pretest solution extracted two new factors that did not appear in previous research: Poor Life Fit and Lack of Incentive.

Posttest Deterrent Factor Structure

For the posttest, the unrotated initial solution revealed seven components exceeded an eigenvalue of 1.0. Subsequently, a principal components factor analysis with varimax rotation replicated this finding, with six variables double-loaded onto factors. However, the final factor was uninterpretable. Seeking a more interpretable solution, the researcher extracted solutions having from three to seven factors using the maximum likelihood method. The five-component solution, accounting for 55% of the total variance, provided the clearest extraction. Communalities ranged from .49 to .78. While the six and seven component solutions accounted for more variance, the five-component

solution had the clearest interpretation. As shown in Table 6, Cronbach's coefficient alpha ranged from .82 to .92 among the five factors, indicating good subscale reliability.

Table 6

Posttest Distribution and Reliability of Factors

| Factor | Items | <i>M</i> | <i>SD</i> | α |
|------------------------------------|-------|----------|-----------|----------|
| Total Posttest Deterrent Scale | 34 | 71.22 | 28.63 | .96 |
| 1. Negative Course Characteristics | 10 | 21.35 | 10.25 | .92 |
| 2. Lack of Incentive | 10 | 18.64 | 8.38 | .87 |
| 3. Lack of Confidence | 7 | 15.06 | 6.97 | .88 |
| 4. Time Constraints | 4 | 10.23 | 4.51 | .82 |
| 5. Cost | 3 | 8.49 | 4.08 | .84 |

The five-component solution included three double-loaded variables and three unloaded variables. The accepted five-component solution accounted for 55% of the variance in deterrent total score for the posttest. This solution provided the basis for determining participant factor scores used as the dependent variable in subsequent analyses.

Factor 1: Negative Course Characteristics (eigenvalue = 4.87) accounted for 14.3% of the variance and had ten items. Three variables loaded onto this factor were identical to those loaded on the pretest factor of the same name: courses were of poor quality, did not seem interesting, and were offered in an unsafe area. Five new variables

that loaded onto this factor in the posttest also addressed negative perceptions of courses: would not meet needs, not on the right level, not useful or practical, would not help in the job, and offered at an inconvenient location. The remaining two items were less related to course characteristics, and more related to participant characteristics: didn't know about courses and didn't meet requirements for course. But, even these two items carry a negative connotation regarding participants' perceived fit with educational opportunities. The new variables strengthened interpretation of the Lack of Confidence factor.

Factor 2: Lack of Incentive (eigenvalue = 4.35) accounted for 12.8% of the variance and had ten items. Five of these variables were identical to those on the pretest factor having the same name: friends did not encourage participation, family did not encourage participation, wasn't willing to give up leisure time, family problems, and trouble arranging childcare. One new variable addressed the issue of education offering inadequate reward: course would not meet needs. Another new variable added to familial concerns: participation would take time away from family. Two other new variables addressed intrinsic disincentives: prefer to learn on my own and not interested in taking courses. The final variable just met the .40 load criterion and was ambiguous: didn't think I could attend regularly. These newly loaded variables depicted education as lacking inducement, strengthening the previous Lack of Incentive interpretation.

Factor 3: Lack of Confidence (eigenvalue = 4.08) accounted for 12% of the variance and had seven items. All seven variables loaded to this factor were also loaded on the pretest: not confident of learning ability, too old, couldn't compete with younger students, felt unprepared, unable to finish, don't enjoy studying, and didn't meet course requirements. This factor became clearer on the posttest because the two ambiguous

items from the pretest were missing. All seven items reflect a discomfort with education that emanates from dispositional sources.

Factor 4: Time Constraints (eigenvalue = 2.88) accounted for 8.5% of the variance and had four items. This factor was new to the posttest. Three variables directly concerned time: course scheduled at an inconvenient time, time required to finish the course, and didn't have time for studying. The fourth variable indirectly related to time: course was offered in an inconvenient location. All four variables loaded in the pretest to the Poor Life Fit factor, in combination with other variables. On the posttest, time is clearly the central issue for this factor.

Factor 5: Cost (eigenvalue = 2.49) accounted for 7.3% of the variance and had three items. Two variables loaded on this factor matched those on the pretest: couldn't afford the registration or course fees and couldn't afford miscellaneous expenses. The other money-related variable in the instrument, that failed to load on the pretest, did load on this factor in the posttest: employer would not provide financial assistance or reimbursement. Thus, all three loaded variables specifically focus on monetary concerns.

Table 7 depicts the posttest deterrent factor structure with loaded items, means, and scale ranks. Three of the five highest-ranking variables were associated with cost ($M \geq 2.93$). Four of the next five variables were associated with time ($M \geq 2.54$). The next two ranked variables concerned confidence issues ($M \geq 2.34$). Thus, as in the pretest, items having higher mean scores represented three of the factors, but not the factors that accounted for the most variance.

Table 7

Posttest Deterrent Factor Structure

| Variable | Load | Mean | Rank |
|---|------|------|---------|
| Posttest Factor 1: Negative Course Characteristics | | | |
| Because the available courses did not seem useful or practical. | .77 | 2.01 | (tie)20 |
| Because the courses available were of poor quality. | .70 | 1.89 | 21 |
| Because I didn't know about courses available for adults. | .65 | 2.31 | 10 |
| Because I didn't think the course would meet my needs. | .64 | 2.16 | 16 |
| Because the course was not on the right level for me. | .62 | 2.14 | 17 |
| Because the courses available did not seem interesting. | .54 | 2.30 | (tie)11 |
| Because the course was offered in an unsafe area. | .52 | 1.81 | 23 |
| Because I didn't meet the requirements for the course. | .50 | 2.21 | 13 |
| Because education would not help me in my job. | .44 | 2.19 | 14 |
| Because the course was offered at an inconvenient location. | .42 | 2.49 | 7 |
| Posttest Factor 2: Lack of Incentive | | | |
| Because my friends did not encourage my participation. | .64 | 1.51 | 30 |
| Because I wasn't willing to give up my leisure time. | .60 | 1.70 | 28 |
| Because of family problems. | .59 | 1.74 | 26 |
| Because my family did not encourage participation. | .58 | 1.76 | 25 |
| Because I prefer to learn on my own. | .55 | 1.72 | 27 |
| Because I'm not that interesting in taking courses. | .54 | 2.01 | (tie)20 |
| Because I had trouble arranging for childcare. | .49 | 1.59 | (tie)29 |

Table 7 (Continued).

Posttest Deterrent Factor Structure

| Variable | Load Value | Item Mean | Scale Rank |
|---|------------|-----------|------------|
| Because participation would take away from time with my family. | .48 | 2.18 | 15 |
| Because I didn't think the course would meet my needs. | .42 | 2.16 | 16 |
| Because I didn't think I could attend regularly. | .40 | 2.30 | (tie)11 |
| Posttest Factor 3: Lack of Confidence | | | |
| Because I was not confident of my learning ability. | .70 | 2.34 | 9 |
| Because I felt I was too old to take the course. | .70 | 2.04 | (tie)18 |
| Because I felt I couldn't compete with younger students. | .68 | 1.88 | 22 |
| Because I felt unprepared for the course. | .63 | 2.35 | 8 |
| Because I didn't think I would be able to finish the course. | .51 | 2.27 | 12 |
| Because I don't enjoy studying. | .51 | 2.04 | (tie)18 |
| Because I didn't meet the requirements for the course. | .40 | 2.21 | 13 |
| Posttest Factor 4: Time Constraints | | | |
| Because the course was scheduled at an inconvenient time. | .75 | 2.59 | 4 |
| Because of the amount of time required to finish the course. | .73 | 2.66 | 3 |
| Because I didn't have time for the studying required. | .50 | 2.54 | 6 |
| Because the course was offered at an inconvenient location. | .47 | 2.49 | 7 |

Table 7 (Continued).

Posttest Deterrent Factor Structure

| Variable | Load Value | Item Mean | Scale Rank |
|--|------------|-----------|------------|
| Posttest Factor 5: Cost | | | |
| Because I couldn't afford the registration or course fees. | .83 | 2.93 | 2 |
| Because I couldn't afford miscellaneous expenses like travel, books, etc. | .72 | 2.96 | 1 |
| Because my employer would not provide financial assistance or reimbursement. | .48 | 2.57 | 5 |

The same ten items, ranked by item mean scores, emerged as the top ten variables for both the pretest and posttest. The positions of most items were different, although no item moved more than three positions higher or lower on the posttest. All of the posttest means for the top ten scale items were lower than the means reported in the pretest except two: employer would not provide financial assistance and course was offered in an inconvenient location.

The posttest five-component solution is smaller than solutions accepted by previous researchers. The instrument developers accepted six-component solutions (Scanlan & Darkenwald, 1984; Darkenwald & Valentine, 1985). Subsequent researchers accepted eight-component solutions (Martindale & Drake, 1989; Kowalik, 1989).

However, the posttest factor interpretation is closer to previous researchers' solutions

than the pretest factor interpretation is.

Deterrent Factor Structure Comparison

Several differences were noted between the pretest and posttest deterrent factor structures. The first difference appeared in the number of factors extracted and their positions within the accepted solutions. Even the initial solution yielded different results, with the pretest extracting eight factors and the posttest extracting seven factors. The pretest solution accepted as most interpretable contained six factors, while the most interpretable posttest solution had five factors. The order of extraction for three common factors also differed from pretest to posttest. On the pretest, Lack of Confidence was the first factor extracted but on the posttest, it was the third factor extracted. The factor, Lack of Incentive, appeared in the third position for the pretest and the second position for the posttest. The factor, Negative Course Characteristics, was extracted fourth on the pretest, but first on the posttest.

The second difference in the factor structures emerged in factor interpretation. The pretest and posttest both contained four factors that were interpreted the same way: Lack of Confidence, Lack of Incentive, Negative Course Characteristics, and Cost. The pretest contained two unique factors that did not reappear on the posttest: Poor Life Fit and Lack of Course Relevance. The posttest contained one unique factor that was not present on the pretest: Time Constraints. These differences were evident in rejected solutions as well as the accepted solutions.

The third observed difference was in variance explained by each solution and the common factors comprising it. The total variance explained was nearly 51% for the pretest and 55% for the posttest. The factors also explained different amounts of variance

from the pretest to the posttest. Lack of Confidence accounted for a similar amount of variance over two factor analyses: 11.26% of the pretest variance and 12.01% of the posttest variance. The factor, Lack of Incentive, accounted for less variance on the pretest (9.07%) than on the posttest (12.78%). The factor, Negative Course Characteristics, accounted for 8.18% of the pretest variance, but then increased to account for 14.33% of the posttest variance. The factor, Cost, accounted for 5.40% of the pretest variance and 7.33% of the posttest variance. Table 8 shows a side-by-side comparison of the extracted factors and their respective variances.

Table 8

Factor Comparison: Pretest and Posttest Deterrent Scales

| Pretest | | Posttest | |
|---------------------------------------|----------|---------------------------------------|----------|
| Factor | Variance | Factor | Variance |
| 1. Lack of Confidence | 11.26 | 1. Negative Course Characteristics | 14.33 |
| 2. Poor Life Fit | 9.56 | 2. Lack of Incentive | 12.78 |
| 3. Lack of Incentive | 9.07 | 3. Lack of Confidence | 12.01 |
| 4. Negative Course Characteristics | 8.18 | 4. Time Constraints | 8.46 |
| 5. Lack of Course Relevance | 7.22 | 5. Cost | 7.33 |
| 6. Cost | 5.40 | | |

Analysis of Treatment Effects

Comparisons of groups following the posttest looked for significant differences between all three groups on the Adult Learning Questionnaire posttest. The first analysis looked for group differences using ALQ total raw scores and the total deterrent factor scores using Analysis of Covariance (ANCOVA). Independent variables were the three treatment levels (video plus brochures, brochures only, and no-information). The dependent variable initially was the ALQ posttest total raw score and then was the posttest deterrent total score. The covariate for the initial analysis was the ALQ pretest total raw score and the pretest deterrent total scores, respectively.

Data Screening

Prior to performing the ANCOVA, the researcher screened the total raw scores from both the pretest and posttest of the Adult Learning Questionnaire. Pretest ALQ total raw scores exhibited both skewness (.55) and kurtosis (-.53). Efforts to correct skewness and kurtosis through both square root and log10 transformation proved unsuccessful. While transformation reduced skewness to an acceptable level, it increased kurtosis to -.94 (square root) and -1.08 (log10). All transformations failed the Shapiro-Wilk test of normality. Consequently, the researcher elected to use the original pretest ALQ total raw scores for subsequent analyses. Posttest ALQ total raw scores also exhibited skewness (.61). Efforts to correct skewness through both square root and log10 transformation proved unsuccessful. Although transformation reduced skewness to an acceptable level, it increased kurtosis to -.81 (square root) and -1.01 (log10). All transformations failed the Shapiro-Wilk test of normality. Consequently, the researcher elected to use the original posttest ALQ total raw scores for subsequent analyses.

The researcher also screened the total scale scores from both the pretest and posttest of the Adult Learning Questionnaire after weighting them with results from the factor analyses (total deterrent scores). Pretest total deterrent scores exhibited both skewness (.51) and kurtosis (-.65). Efforts to correct skewness and kurtosis through both square root and log10 transformation proved unsuccessful. While transformation reduced skewness to an acceptable level, it increased kurtosis to -1.01 (square root) and -1.12 (log10). All transformations failed the Shapiro-Wilk test of normality. Consequently, the researcher elected to use the original pretest total deterrent scores for subsequent analyses. Posttest total deterrent scores also exhibited both skewness (.52) and kurtosis (-.53). Efforts to correct skewness and kurtosis through both square root and log10 transformation proved unsuccessful. Although transformation reduced skewness to an acceptable level, it increased kurtosis to -.92 (square root) and -1.02 (log10). All transformations failed the Shapiro-Wilk test of normality. Consequently, the researcher elected to use the original posttest total deterrent scores for subsequent analyses.

During data screening, the scale score for salience as a student exhibited kurtosis beyond an acceptable level (-.70). In this case, transformation improved the value. The squared value was reduced to -.46, within acceptable levels. Future analyses used the transformed variable for salience as a student.

Pretest Score as a Covariate

A one-way analysis of covariance was conducted using the Adult Learning Questionnaire total raw scores. This analysis explored whether the treatments exerted an effect on the posttest raw scores. The independent variable, group, included three levels: control, written information, and combined written and verbal information. The

dependent variable was the ALQ posttest total raw score and the covariate was the ALQ pretest total raw score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, $F(2, 188) = 1.65$, $MSE = 424.29$, $p = .20$, partial $\eta^2 = .02$. The ANCOVA was not significant, $F(2, 190) = .31$, $MSE = 427.19$, $p = .74$.

Another ANCOVA was performed using a scale score instead of the raw score. The scale score weighted each participant's total ALQ score based on the factor analysis loads from each test item. This one-way analysis of covariance was conducted using the deterrent total scale scores. This analysis explored whether the treatments exerted an effect on the deterrent scores derived from the factor analysis. The independent variable, group, included three levels: control, written information, and combined written and verbal information. The dependent variable was the posttest total deterrent score and the covariate was the pretest total deterrent score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, $F(2, 188) = 1.27$, $MSE = 152.87$, $p = .28$, partial $\eta^2 = .01$. The ANCOVA was not significant, $F(2, 190) = .36$, $MSE = 153.31$, $p = .70$.

Hypothesis Two: Group Differences for Self-Concept

Self-Concept as a Covariate

A one-way analysis of covariance was conducted to evaluate whether self-concept exerted a moderating effect on the Adult Learning Questionnaire posttest scores. The independent variable, group, included three levels: control, written information, and

combined written and verbal information. The dependent variable was the ALQ posttest total raw score and the covariate was the total self-concept score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, $F(2, 183) = .23$, $MSE = 67.05$, $p = .80$, partial $\eta^2 = .00$. The ANCOVA was not significant, $F(2, 189) = .35$, $MSE = 95.001$, $p = .71$.

Another ANCOVA was performed using a scale score instead of the raw score. The scale score weighted each participant's total ALQ score based on the factor analysis loads from each posttest item. This one-way analysis of covariance evaluated whether self-concept exerted a moderating effect on the posttest deterrent scale score. The independent variable, group, included three levels: control, written information, and combined written and verbal information. The dependent variable was the posttest total deterrent score and the covariate was the total self-concept score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, $F(2, 187) = .30$, $MSE = 779.85$, $p = .75$, partial $\eta^2 = .00$. The ANCOVA was not significant, $F(2, 189) = .40$, $MSE = 774.04$, $p = .67$.

Two ANCOVA's were performed to evaluate Hypothesis H₂: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or no-information groups when the effect of self-concept is held constant. The first ANCOVA used raw instrument scores and the second used scale scores derived from the factor analysis. Both ANCOVA's were not significant.

Hypothesis Three: Group Differences for Salience as a Student

Salience as a Student as a Covariate

A one-way analysis of covariance was conducted to evaluate whether salience as a student exerted a moderating effect on the Adult Learning Questionnaire posttest scores. The independent variable, group, included three levels: control, written information, and combined written and verbal information. The dependent variable was the ALQ posttest total raw score and the covariate was the transformed salience as a student score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, $F(2,183) = .43$, $MSE = 819.10$, $p = .65$, partial $\eta^2 = .01$. The ANCOVA was not significant, $F(1,185) = 1.12$, $MSE = 814.05$, $p = .33$.

As a follow-on test, another ANCOVA was performed using a scale score instead of the raw score. The scale score weighted each participant's total ALQ score based on the factor analysis loads from each posttest item. This one-way analysis of covariance evaluated whether salience as a student exerted a moderating effect on the posttest deterrent scale score. The independent variable, group, included three levels: control, written information, and combined written and verbal information. The dependent variable was the posttest total deterrent score and the covariate was the transformed salience as a student score. A preliminary analysis evaluating the homogeneity-of-slopes assumption indicated that the relationship between the covariate and the dependent variable did not differ significantly as a function of the independent variable, treatment group assignment, $F(2, 183) = .23$, $MSE = 67.05$, $p = .80$, partial $\eta^2 = .00$. The ANCOVA

was not significant, $F(2, 185) = .1041$, $MSE = 301.18$, $p = .36$.

Two ANCOVA's were performed to evaluate H₃: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or no-information groups when the effect of salience as a student is held constant. The first ANCOVA used raw instrument scores and the second used scale scores derived from the factor analysis. Both ANCOVA's were not significant.

Summary

The findings of the factor analyses revealed a change in dislocated worker reported deterrents to education participation, as indicated by the change in factor structure from the pretest to the posttest. Additional analyses of covariance were performed, holding total self-concept scores and salience as a student scores constant. These ANCOVA's were not significant.

Chapter V discusses the study findings. It opens with a summary of the study. Next conclusions are presented for each hypothesis. The findings are discussed relative to the theoretical foundation used for this study. Findings are also compared to previous studies that used the Adult Learning Questionnaire. Finally, Chapter V closes with recommendations for use of this study and for future research.

CHAPTER V

SUMMARY, CONCLUSIONS, AND RECOMMENDATIONS

This chapter summarizes the study, presents conclusions, and makes recommendations for use of this study. The conclusions discuss the findings from factor analyses and comparisons of group differences. The recommendations address uses for this study as well as ideas for future research in this area.

Summary

The problem investigated in this study was whether dislocated worker supporting-services information would change dislocated workers' self-reported deterrents to education participation. The study also explored two sub-problems. The first sub-problem was whether information presentation, written format versus combined written and verbal format, would alter the participants' perceived deterrents. The second sub-problem explored whether participant personal characteristics, self-concept or role salience as a student, would influence the change in perceived deterrents. These problems were defined by three hypotheses.

H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions of deterrents to education participation.

H₂: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of self-concept is held constant.

H₃: Dislocated workers who receive verbal information combined with written

information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of salience as a student is held constant.

This study was significant in several respects. First, it tested elements of Cross' Chain of Response model, contributing to the dialogue regarding education participation and deterrence. Second, this study extended previous deterrence research by gathering data from participants having lower educational levels and lower income than those who participated in previous research. Third, data from this study provided information about the perceived deterrents of workers facing imminent dislocation. This information could assist service providers as they help workers consider retraining opportunities and barriers.

The study faced several limitations including selection, attrition, test effects, diffusion, and subject effects. The sample was limited to the manufacturing sector, primarily workers affected by plant closings in the textile industry. Participants were all volunteers. Attrition resulted in uneven group sizes. Pretesting may have sensitized participants to education-related treatment information or stimulated their reflection on education deterrents, which may have then influenced posttest responses. Diffusion was another potential threat as treatment group members might have shared information with family and friends who were assigned to a different treatment group. Finally, subject effects such as demand characteristics, social desirability bias, or response burden may have influenced results.

The population for this study was North Carolina workers in the manufacturing sector who were facing impending job dislocation due to a mass layoff or plant closing.

Three dislocation events, from which the sample was drawn, were sequentially selected from a list of events provided by the North Carolina Governor's Rapid Response Office. The final sample included two participants from a truck manufacturing plant and 192 participants from two different textile manufacturing plants.

Four instruments were used for this study. A demographic questionnaire gathered information to describe the sample. The primary instrument was the Adult Learning Questionnaire, which surveyed reasons why participants fail to participate in education. This instrument provided data for the pretest and posttest scores. Two other instruments provided data for the covariance evaluations. The Tennessee Self-Concept Scale, Second Edition, provided a measure of self-concept. The Salience Inventory provided a measure of role salience as a student. One additional form, an Information Value Survey, was used as a stimulus to encourage treatment group members to review their materials, but it was not used for analysis.

This study used three treatment levels, and two sets of treatment materials. These materials presented information explaining job loss grief, employment barriers, and services available for job search assistance, income support, upgrading skills, health care, transportation, and childcare. Treatment Group A received a video and brochures containing this information. Treatment Group B received only the brochures. Treatment Group C was the control group and received no treatment materials. After the study, all participants received all materials. The researcher left an additional 100 sets of information with the Human Resources Manager at each textile plant and encouraged distribution to workers having low literacy.

Data collection occurred within a three-group randomized design over two

sessions. At Session 1, following an introductory brief by the researcher, volunteers signed the study roster containing 500 randomly ordered group assignments and case numbers. The researcher disseminated pretest packets marked only with case numbers from the roster to protect confidentiality. Pretest packets contained the four instruments used for analysis. Upon return of pretest instruments, all participants received an instruction sheet that specified the Session 2 (posttest) date and time. Participants in a treatment group also received an envelope with appropriate treatment materials, which the researcher asked them not to share until after Session 2. The researcher returned to the study site for Session 2 and disseminated posttest packets marked only with case numbers. Upon return of posttest materials, the researcher gave participants whichever treatment materials they had not previously received. Thus, all study completers received both the video and brochures.

Analysis of these instruments included factor analyses and comparisons of group differences. The factor analyses derived deterrent factor structures from responses on both the pretest and posttest Adult Learning Questionnaires. The researcher compared these factor structures to look for differences from pretest to posttest. The comparisons of group differences investigated differences in posttest scores based on treatment group assignment. Two separate comparisons held constant the participants' self-concept and role salience as a student to investigate whether those characteristics had any effect on the change observed in participants' deterrent scores.

Conclusions

The following sections outline conclusions for each hypothesis. Conclusions were derived by considering study results in the context of Cross' (1981) Chain of Response

model, which provided the study's theoretical foundation. The conclusions were also informed by previous research using the Adult Learning Questionnaire.

Hypothesis H₁: Deterrent Factor Structure Change

The primary research problem in this study was addressed by hypothesis H₁: Delivery of dislocated worker supporting services information will change the deterrent factor structure, indicating changed perceptions of deterrents to education participation. The researcher derived this hypothesis from the Chain of Response model where Cross (1981) postulated that information would clarify opportunities and barriers to education participation. In this study, the information was provided in the treatment materials, and the clarification was operationally defined as a change in the factor structure from pretest to posttest. Hypothesis H₁ was accepted. The factor solutions changed from the pretest to the posttest.

The change in factor structure was evident in the rejected solutions, as well as the chosen solutions. Every solution examined for the posttest (three, four, five, six, and seven factors) extracted Negative Course Characteristics as the first factor. For the pretest, five solutions (three, five, six, seven, and eight factors) extracted Lack of Confidence as the first factor. The remaining pretest solution (four factors) extracted Lack of Confidence as the second factor. The change in factor structure was also evident in a Principal Components extraction using both Oblimin and Promax rotations.

Additionally, the posttest factor analysis produced a clear factor labeled as Time Constraints that did not appear in the pretest factor analysis. In the Time Constraints factor, three of the four loaded items distinctly identified time concerns (course scheduled at an inconvenient time; amount of time to finish the course; and did not have time to

study). However, on the pretest factor analyses, those three items loaded consistently with four items that were not time-related (course offered at an inconvenient location, transportation problems, course not on the right level, and lack of knowledge about available courses). This led to interpretation of a broader factor for the pretest of Poor Life Fit. This factor described logistical challenges where time constraints were part, but not most, of the deterrent factor.

Although the factor structure clearly changed from the pretest to the posttest, this study was unable to identify how the treatments influenced that change. The statistical procedures used different premises to obtain results. The factor analysis extracts factors using variables that move together in three-dimensional space, even when item means are very different. Other procedures such as reliability analyses and analysis of variance/covariance use the means to calculate the presence or absence of an effect.

Several potential explanations exist for the changed factor structure. Conceivably, the change could be the result of a testing effect. The pretest may have stimulated participants to reconsider nonparticipation reasons, which then reflected on the posttest. Alternatively, the factor structure change could be the product of participant demand characteristics that emerged on the posttest, such as social desirability bias. Yet the test-retest reliability of the control group pretest and posttest total deterrent scores ($n = 57$) was satisfactory: $r = .76, p. < .01$. That analysis indicated that the scores correlated well from pretest to posttest and argues against a testing effect or demand characteristics.

In further exploring the factor score relationships, a paired samples t-test was conducted to evaluate stability of the means for the pretest and posttest deterrent scores. The results indicated that the mean pretest scores ($M = 39.94, SD = 15.65$) were

significantly smaller than the mean posttest scores ($M = 43.00$, $SD = 16.98$), $t(193) = -.33$, $p. = .001$. Thus, participants increased their overall deterrent scores from pretest to posttest. But, the standardized effect size index was small ($d. = .24$). Given a significant difference in the deterrent means, an analysis of variance was performed to see if the difference could be narrowed to a particular treatment group. The ANOVA indicated that treatment groups did not differ significantly, $F(2, 191) = .29$, $p. = .75$. This finding shows that the treatment did not have a significant effect on changing deterrent scores.

Since the ANOVA failed to indicate a treatment effect, a follow-up test was conducted to evaluate the test-retest reliability of the Adult Learning Questionnaire for the two treatment groups. The goal of this analysis was to see if the treatment groups' deterrent responses were so stable that the ALQ instrument would remain reliable even after treatment. This test yielded a lower correlation between the pretest and posttest deterrent scores for both the brochure-only group ($r = .66$, $p. < .001$) and the video plus brochure group ($r = .67$, $p. < .001$), as compared to the control group ($r = .76$, $p. < .01$). Thus, the pretest accounted for 44% and 45% of the posttest variance for the brochure-only and video plus brochure groups, but accounted for 58% of the posttest variance for the control group. This diminished test-retest reliability for the treatment groups suggests that something besides the pretest subsumed some of the variance in posttest scores. Given the similarity of test-retest reliability results between treatment groups, one might presume that the treatment accounted for this missing variance.

These three analyses present differing evidence regarding the possibility that the treatments caused the factor structure change. This much can be affirmed: (a) the factor structure changed, (b) the pretest and posttest deterrent score means for the entire sample

differed significantly with a small effect size, (c) the pretest and posttest deterrent score means for the groups did not differ significantly, (d) the control group test-retest reliability was higher than that of the treatment groups, and (e) the pretest accounted for less posttest deterrent score variance within the treatment groups. Therefore, the conclusion of this study is that the treatment stimulated the factor structure change, but the treatment effect was not strong enough to produce between-group differences in deterrent scores beyond results attainable by chance.

One option to determine how treatments influenced a factor structure would be to sample a large enough group to permit separate factor analyses at each treatment level. This would require approximately 1,000 study participants. Unfortunately, the sample size in this study was too small to evaluate separate factor structures for each group.

New Deterrent Factors

This study extracted two new deterrent factors that do not resemble factors from previous studies: Poor Life Fit and Lack of Incentive. The new factor, Poor Life Fit, emerged in the pretest analysis because the loaded items suggested that education was broadly problematic for the study participants. As noted previously, items included those loaded on the Time Constraints factor. However, items in this factor also included spatial challenges (inconvenient location, transportation problems) and other lack-of-fit concerns (course at the wrong level, uninteresting courses, unaware of available courses). This factor emerged in every solution considered, from three factors to eight factors, with seven common variables appearing in every solution but one.

The other new factor, labeled Lack of Incentive, emerged in both the pretest and posttest factor analyses. Both pretest and posttest Lack of Incentive factors contained five

common items that included a lack of encouragement from family and from friends, family problems, childcare problems, and unwillingness to sacrifice leisure time. The posttest also included variables of education taking time away from family, an inability to attend regularly, lack of interest in taking courses, and a preference to learn on one's own. These added variables seemed to clarify the Lack of Incentive interpretation.

One element from this study that may have influenced the findings was the sample demographics with respect to education and income. Previous studies using the Adult Learning Questionnaire used samples having participants with higher education levels. Table 9 shows that this sample had a much lower college participation rate, and a much higher rate of non-high school graduates. Lower educational attainment may relate to the new factors of Lack of Incentive and Poor Life Fit. Previous research with dislocated workers reported low educational attainment as a factor associated with decreased participation in training programs (Estes, Lawrence, & Schweke, 2002; Schweke, 2004; Watt, 2002).

Table 9

Educational Attainment Reported in Adult Learning Questionnaire Studies

| Researcher, Study Year | Some College or Degree | High School Completion | No Diploma |
|------------------------------|---------------------------|---------------------------|---------------|
| Kowalik, 1989 | 100% | N/A | N/A |
| Martindale & Drake, 1989 | 31% | 69% | .2% |
| Darkenwald & Valentine, 1985 | 64% | 32% | 5.0% |
| Row, 2007 | 9% | 71% | 17.0% |

Family income was also quite different from other studies using the Adult Learning Questionnaire, as depicted in Table 10. Interestingly, all studies using the ALQ extracted Cost as a deterrent factor. In both factor structures for this study, Cost emerged as the last factor, accounting for the least amount of variance. In previous studies, Cost was extracted as the third, fourth, or fifth factor. For this study, income level did not correlate significantly to the Cost factor (pretest $r = -.111$, $p. = .13$; posttest $r = -.30$, $p. = .68$). This suggests that, as a deterrent factor, Cost did not directly relate to a study participant's income level.

Table 10

Family Income Reported in Adult Learning Questionnaire Studies

| Researcher, Study Year | < \$30,000 | \$30,000 to \$44,999 | >\$45,000 |
|------------------------------|------------|----------------------|-----------|
| Kowalik, 1989 | 13.5% | 21.0% | 65.5% |
| Darkenwald & Valentine, 1985 | 29.8% | 30.8% | 39.3% |
| Row, 2007 | 69.1% | 23.7% | 5.1% |

Another element that differed in this study was the fact that all sample members faced imminent job dislocation. This impending dislocation may have affected the participants' education deterrents in ways that differ from previous study participants. In this study, participants may have been reevaluating their perspectives about time, money, and education in view of the impending loss of income and the need to begin a job search. This reflection may also have contributed to the factor structure change.

Furthermore, the treatments used in this study were designed to stimulate reconsideration of education deterrents by emphasizing the job loss as a life transition. The treatments focused attention on the potential need for retraining to reenter the workforce successfully, and they presented information about services for dislocated workers that could mitigate perceived deterrents. This focus on the need for retraining may be one reason why the deterrent factor structure changed from pretest to posttest.

While four factors from the pretest extracted again on the posttest, two pretest factors did not reappear on the posttest: Poor Life Fit and Lack of Course Relevance. Conceivably, the treatments' focus on the need for retraining may have caused treatment group participants to reconsider the deterrent value of those variables originally loaded onto the Poor Life Fit and Lack of Course Relevance factors. Nine of eleven variables from Poor Life Fit and Lack of Course Relevance loaded on the posttest to two different factors (Negative Course Characteristics and Time Constraints). The added variables strengthened the interpretation of Negative Course Characteristics for the posttest. In addition, Time Constraints extracted as a very clear, independent variable on the posttest, instead of the time variables emerging in the broader pretest factor of Poor Life Fit.

While one of the new factors, Poor Life Fit, was subsumed by two other factors in the posttest factor analysis, the other new factor from the pretest, Lack of Incentive, was extracted again on the posttest. The four new variables that loaded onto this factor in the posttest strengthened its interpretation. These variables included a lack of interest in education, a preference to learn on one's own, a concern that education would take time away from the family, and childcare challenges.

A final observation regarding these factors relates to the four deterrent categories

described in the literature. These categories are adequate to describe individual variables, but are marginally useful for categorizing factors. Several of the factors identified by this and previous studies clearly fit within those categories, while others span several categories. The deterrent literature categorizes deterrent variables as situational, institutional, dispositional, or informational. The dispositional deterrent category includes the Lack of Confidence factor, while the institutional deterrent category includes the Negative Course Characteristics factor. The situational deterrent category includes the new factor Poor Life Fit from the pretest, the Time Constraints factor from the posttest, and the new factor Lack of Incentive from both the pretest and posttest. All of the other factors spanned more than one category. Because the Adult Learning Questionnaire contains only one item that discusses information, this category was not represented in the factor solution.

An interesting observation from this study is the change, not only in factor structure, but also in the category from which the most variance was extracted. The first extracted factor changed from a dispositional category on the pretest (Lack of Confidence) to an institutional category on the posttest (Negative Course Characteristics). When the deterrent structure changed, it shifted the first factor from internal deterrence to external deterrence. The amount of variance accounted for by the Negative Course Characteristics factor nearly doubled from the pretest to the posttest. The treatment may have stimulated this change in focus from internal deterrence to external deterrence by emphasizing the potential need for retraining.

Hypothesis H₂: Self-Concept as a Moderating Variable

The first sub-problem of this study was addressed by hypothesis H₂: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of self-concept is held constant. This hypothesis was rejected. Although the study failed to demonstrate a treatment effect in the change from pretest to posttest scores, the researcher cannot reject self-concept as an important predictor for education participation.

When the analysis of covariance using the total self-concept score as the covariate failed to achieve significance, the researcher explored the self-concept scale in more detail. The TSCS:2 total self-concept score was negatively correlated to both the pretest total deterrent score ($r = -.27, p < .001$) and the posttest total deterrent score ($r = -.23, p = .001$). Thus, as self-concept decreased, the total deterrent score increased.

The researcher next examined the subscales of the TSCS:2. This instrument was chosen, in part, because it contained an Academic-Work subscale. Importantly, most of the items used to measure that subscale are academic in nature. Appendix C provides sample items from this subscale. Cross (1981) proposed that attitudes about education were also predictors of education participation. Conceivably, this Academic-Work Subscales could act as a proxy for that construct. It is a measure of how individuals perceive themselves in the school and work environments, with emphasis on the academic aspect. In fact, the Academic-Work Subscales accounted for 9% of the variance in the pretest total deterrent score ($r = -.31, p < .001$) and 5% of the variance in the posttest total deterrent score ($r = -.23, p < .01$).

Exploring further, the researcher investigated the relationship between the Academic-Work Subscale and the separate deterrent factors extracted from the pretest and posttest. As might be expected, the Academic-Work Subscale correlated significantly, and negatively, with most of the deterrent factors. Indeed, the only factors that did not correlate with the Academic-Work Subscale were the pretest and posttest Cost factors. For the other factors, the amount of variance accounted for by the Academic-Work Subscale was modest (less than 6%) except for the Lack of Confidence factor. In this case, the Academic-Work Subscale accounted for 18% of the pretest Lack of Confidence factor, and 15% of the posttest factor. Thus, this study concludes that an individual's self-concept, with respect to academic endeavors, could be a useful predictor in a model of education participation or deterrence.

Further, the Tennessee Self-Concept Scale, Second Edition, appears to be a satisfactory instrument to measure academic self-concept, as evidenced by its negative correlation with the expected deterrent factors extracted in this study. This instrument has 82 items, which does not create a response burden. However, the researcher noted during data collection that the instrument contained items that proved challenging for some participants. Low-English-proficient participants had trouble with terms such as "sex appeal" and "cross" (angry). Some participants commented, either verbally or on the Information Value Survey, that certain items (sex appeal, relationship with God) seemed inappropriate for a study about education attitudes. Because the TSCS:2 measures six self-concept constructs, it contains items that lack face validity for a study about education attitudes. Therefore, this instrument proved satisfactory to measure the Academic-Work self-concept, but must be compared to other instruments that might

perform a similar function without questions designed to measure additional constructs.

Hypothesis H₃: Role Salience as a Student as a Moderating Variable

The second sub-problem of this study was addressed by hypothesis H₃: Dislocated workers who receive verbal information combined with written information will report significantly more changes on the Adult Learning Questionnaire than either the written-information or the no-information groups when the effect of salience as a student is held constant. This hypothesis was rejected. However, based on the previous description about the Academic-Work subscale being used as a proxy for attitudes about education in Cross' (1981) Chain of Response model, this study concludes that Cross' construct has merit.

The instrument used to measure attitudes about education for this portion of the study was the Salience Inventory. When the analysis of covariance, using the salience as a student score as the covariate, failed to achieve significance, the researcher explored the salience scale in more detail. The full scale score for salience as a student was not significantly correlated with the pretest or posttest deterrent total scores in a meaningful way. Further, the three sub-scales for the salience score (participation, commitment, and value expectation) were also not correlated with the deterrent factor scores in a useful way. Therefore, this study concludes that the Salience Inventory is not useful as a predictor of education deterrence.

Summary

In summary, several conclusions resulted from this study. First, the treatments were believed to have an effect on the deterrent factor structure even though between-group differences in mean scores were not observed at a level greater than chance.

Second, the new factors extracted may be related to demographic differences in this sample related to educational attainment and income. Third, this study concluded that self-concept is probably a useful predictor of education participation or deterrence, and that the Tennessee Self-Concept Scale, Second Edition, is an adequate measure of Academic-Work self-concept. Finally, this study concluded that the Saliency Inventory is not a useful measure to predict education deterrence.

Recommendations

Based upon the outcomes of this study, several recommendations are proposed. The first set of recommendations address using findings of this study to guide preparation of materials for dislocated workers. The next recommendations concern future research in the area of dislocated worker deterrents to education participation.

Implementing Findings of This Study

Findings of this study can be implemented in several ways. First, the researcher must share findings with appropriate service providers within the North Carolina workforce development system. Second, the researcher must share findings with literacy representatives within North Carolina. Third, the researcher should create an initial typology of dislocated worker deterrent types.

The goal of sharing findings with service providers in the North Carolina workforce development system is to enhance interventions presently provided. Findings may be shared through presentations to workforce development professionals and through a letter of findings directed to the JobLink Career Center managers. Special attention is needed to inform workers of employment barriers that they will face upon dislocation. This is essential information that workers need to make informed choices

regarding training participation. Additionally, the study findings can encourage service providers to tailor materials for dislocated workers at all literacy levels. In this vein, study materials can demonstrate the simplicity of materials that were created without regard for agency ownership; rather they were organized topically to improve understanding.

Current materials provided to dislocated workers are better suited for a literate audience. The researcher was fortunate to observe sixteen rapid response briefs to workers and managerial staff. The service providers disseminated a large volume of information to workers. The material given to workers was formatted using print media, and the service providers had time for only a few verbal comments to accompany the materials. In one instance, workers received 33 separate papers and pamphlets containing information. Much of that information was not useful as it contained items such as the legal precedents for offering various services, or other extraneous information. In addition, this information was prepared and distributed by the agency responsible to provide the support. Consequently, workers received an unorganized collection of information papers dealing with important issues such as income support or health care. This lack of information coherence represents a failing of the one-stop concept. While workers may report to one building to get services, the information they receive is fragmented because it is still divided by agency.

Workers having low-literacy or low English proficiency need simple, direct information about basic services. The information should be organized by topic, not by providing agency, to be most useful. In addition, workers with low-literacy need resources where they can get more information if they need it. These resources should not be limited to internet sites, because the internet requires literacy for navigation and

interpretation. Therefore, this study can aid service providers to better organize and prepare print media for a low-literate audience. Further, although this study failed to produce results using information provided by video, other studies have demonstrated the value of this option. Sharing findings of this study can help service providers consider video, or even audio recordings, as a supplement to print media.

The goal of sharing findings with literacy representatives within North Carolina is to improve the partnership of literacy agencies and workforce development officials. The literacy experts can assist workforce development personnel to recognize low-literacy in clients who wish to hide it. Additionally, literacy specialists can help improve material preparation.

Material preparation for dislocated workers must include literacy levels as an important consideration. The demographics from this study revealed a large percentage of workers who did not have a high school diploma (17%). During data collection, the researcher met several individuals who admitted that they could not read. Conceivably, other individuals working at the plants also had low-literacy levels. Many of these individuals may have avoided participating in the study because it used written instruments for data collection.

Therefore, service providers should prepare materials to reach those with the lowest literacy levels. These materials will still be useful by workers who are more literate. Materials from this study, brochures and the video, could serve as prototypes for literacy experts to use when consulting with service providers.

Finally, the goal of using data from this study to create a dislocated worker typology would be to identify deterred subgroups through analysis of demographic

characteristics and factor scores derived from the Adult Learning Questionnaire. For example, are the workers reporting Lack of Confidence characterized by age, by gender, or by educational attainment? A typology could identify these linkages. These demographic characteristics are more identifiable to service providers than deterrent factor scores. A typology of deterred dislocated workers would be more useful for service providers to match clients with services. This information may be particularly useful to local community college officials, who respond first to meet educational needs in the case of mass layoffs and plant closings. If workforce development agencies and college officials better understood deterrence, then they could find ways to attract the workers who really need retraining, but who are loath to seek it. This typology would comprise only a “first look.” Results from this study must be extended in future research to improve understanding of dislocated worker deterrence.

Future Research

Hypothesis H₁ compared the factor structures from pretest and posttest data. Based on observations from that portion of the study, several follow-on studies are recommended. First, another study using dislocated workers as a population should be conducted to explain how treatment affects the factor structure. Replication should include more than 1000 participants to permit separate factor analyses of treatment groups. Following factor analysis, the observed factor scores and factor structures should be compared to assess the effect of treatment in changing deterrent perceptions. In conjunction with data collection, the researcher should perform qualitative research to describe how the treatment affected deterrent perceptions.

Second, a longitudinal study of dislocated worker deterrents should be performed.

Ideally, this study would sample individuals' deterrents before they learn of the impending layoff or closure, and then at intervals after notification: before layoff/closure, and after layoff/closure. This design would offer a glimpse into the stability of deterrents to education participation across the span of a life transition as described in Cross' (1981) Chain of Response model. However, this longitudinal study could be difficult to coordinate, to get an adequate sample, due to the sensitive nature of layoffs and closings.

Third, additional studies should investigate different dislocated worker groups. This study considered only workers affected by mass layoff or plant closing in the manufacturing sector. Other studies should consider workers from other sectors as well as workers dislocated in smaller events, to improve external validity of findings.

Fourth, future studies in the deterrence realm should follow-up on the utility of academic self-concept as a predictor of participation or deterrence. Hypotheses H₂ and H₃ evaluated the role of self-concept and role salience as moderators of information reception. Although both hypotheses were rejected, academic self-concept showed correlation with deterrent factors. The goal of this research would be to define the construct of academic self-concept better. Improved understanding of academic self-concept may help educators develop interventions to improve that self-concept.

The recommendations contained here have potential to extend the understanding of deterrents to education. More importantly, they have the potential to benefit dislocated workers. In some cases, improved understanding may help workers who need retraining to get it. But, at a minimum, greater attention to preparing materials for low-literate workers will permit more dislocated workers to learn about services that can help them during their dislocation.

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APPENDIX A

VERBAL INFORMATION TEXT (VIDEO SCRIPT)

INTRODUCTION

[Video Host]

Welcome to the Dislocated Worker Support video! The purpose of this video is to give you basic information. This video talks about issues that may concern you, when you are laid off from your job.

We will cover eight topics in this video:

the job loss grief process,
employment barriers,
job search assistance,
income support,
upgrading skills,
health care,
transportation,
and childcare.

You can also find this information in eight brochures that talk about the same topics.

Losing a job can create many changes, and hardships, for workers and their families. This video will give you ideas about the types of support that are available.

Many sources of support are available to you, but you may not know how to find them. The federal and state governments have programs to help people who are laid off from their jobs. Your local community also has resources that can help you. And your family and friends can offer a lot of support if you let them know what you need.

Once again, the eight topics covered in this video are

the job loss grief process,
employment barriers,
job search assistance,
income support,
upgrading skills,

health care,
transportation,
and childcare.

By thinking about these areas, you can decide which may be concerns when you stop working. Once you know your concerns, then you can find agencies or people to help with those concerns. Remember, everyone faces a time in life when a situation is too overwhelming to handle alone. Please don't be embarrassed to ask for help. Just as you have helped other people who were down, your community has people who can help you. Your task is to be open, and persistent, to find the support that you and your family need to get through this difficult period.

The first video topic talks about job loss grief. Please watch this segment and share it with your family. You will learn that job loss stirs up many emotions. Knowing which feelings to expect can help you cope when they surface.

Fade to Nothing

SEGMENT 1: JOB LOSS GRIEF PROCESS

[Caucasian Man]

Losing a job is stressful. Job loss can create feelings of grief. These feelings can begin soon after finding out that job loss will occur. They can last for 4-5 months. It is normal to have these feelings. You could have them one at a time or together.

Some feelings start when you first hear about the layoff or plant closing. This is grief before job loss. These feelings can come even if you are still working. These feelings include shock and denial, fear and panic, anger, bargaining, depression, and acceptance.

Shock and Denial are initial reactions. At first, you will feel surprise at the news. You may not believe that your job is over. You may feel stunned when you think about losing your job.

Fear and Panic often follow when the surprise wears off. You may worry that you won't find another job. You may feel panic about how to pay your bills. You may be afraid that others will blame you for the job loss.

Anger also comes shortly after hearing the news. You might be angry with your boss or job. You could be angry at other workers. You may feel anger at your union. Some people even feel angry with family or friends.

Bargaining is another response that you might have. Some people try to make a deal to keep the job. Some people bargain in prayer.

Depression can occur when you start to realize the impact of the job loss on your life. You may feel sad about the future. You may feel alone, like nobody knows how you feel.

Acceptance of your job loss must take place for you to move forward. In acceptance, you think that you can move past the job loss. You see that you must take action to get a new job or new work skills. You start to think more about your future and its possibilities, instead of dwelling on your past and its losses.

[African American Woman]

Some feelings may come after you leave the job. These feelings include numbness, yearning, disorganization, and reorganization.

Numbness is when you can't seem to feel anything at all. You may not believe that your job has really ended. You may not be able to think about steps that you should take to move on.

Yearning is a feeling of desire for something that is missing. You might miss your old daily routine. You may miss people you worked with every day. You may feel angry or sad, or both. You might think about the past a lot.

Disorganization is when you can't seem to think or behave clearly. You may do nothing for a time. This could happen because you don't know what to do. You may be afraid to ask for help or be embarrassed. You might take a few steps to find a job, and then stop. You may feel confused about how to move forward and feel despair that you will ever recover.

Reorganization is when you make a plan to change your situation. You decide to stop waiting. You see that you must make changes. You make a plan for the future and find ways to support your plan. This process can include family or friends. Sometimes you can find help from the government.

You could have these feelings for a short or long time. You may even waver back and forth. Each person is unique. You may never feel some of the thoughts listed here. Or, they could come in a different order for you.

It's OK to talk about your feelings. Your family and friends want to help you. But they may be afraid to talk about the job loss. They don't know how you might react. And they certainly can't know how to help unless you tell them.

You may want to get help from others. Asking for help does not mean that you are weak. If you are depressed for a long time, like several months, then you may want to seek advice from a professional helper. This could be your family doctor or nurse, a local mental health agency, or a spiritual leader in your faith.

Job loss grief is normal. You should expect to have some of these feelings. Other segments of this video give you information to help you create a plan to recover from your job loss.

Fade to Nothing

SEGMENT 2: EMPLOYMENT BARRIERS

[Hispanic Man]

Some people have trouble getting a new job. A variety of reasons can cause problems. These reasons include
 not having a high school diploma,
 having poor reading or writing skills,
 having skills that don't fit open jobs,
 being older,
 having many laid-off workers in the local area,
 being unwilling to move,

receiving high wages in the lay-off job,
or having high tenure in the lay-off job.

You may notice that one or several of these items fit your situation.

Finding a new job takes effort. Since you were hired at your last job, the world of work might have changed. This means that you have to change too. The reasons discussed in this segment make finding a new job harder. You have to overcome some of these issues to make yourself more appealing as a worker.

A big problem that employers mention is the lack of a high school diploma. Many new jobs call for a high school diploma. If you don't have one, then you are not qualified for those jobs. You could have trouble finding work. The jobs you do find may offer less money than your old job. Earning a high school diploma can help you. Your Community College may have programs where you can earn a diploma.

A related concern for employers are poor reading or writing skills. Many jobs need workers who can read. Some jobs need workers who can write. If you don't read or write well, then you are not qualified for these jobs. And, if you can't read or write, you may not get training you need to improve job skills. This happens because you don't meet basic standards for job training programs. Learning to read and write can help you succeed in the job market. Your local literacy organization can help you learn to read and write better. They can also help you learn to speak English if this is a problem.

Another problem getting a job happens when your skills don't fit the open jobs. The skills from your old job may be obsolete. The new work force might not need those skills anymore. Or, your skills may not transfer to a new job that is available. You must learn which career fields are growing in your local area. Learning new skills can help you meet needs of a changed work force. Your local JobLink Career Center can help you learn about growing career fields and the skills they require. Your local Community College can help you find programs to learn those skills.

Age is factor for getting a new job. Being older may make it harder to find work. Employers may think that you will retire soon. They may not want to invest money to train you. Or, you may have a family and want more benefits than a younger applicant wants. You must emphasize that you are mature. You must remind interviewers that your experience adds value to the work place.

[Caucasian Man]

Some problems aren't about you, but are about your region. This is true if many laid-off workers are seeking jobs in the area. They are competing with you for the same job openings. If your company closed, your area may have more workers than jobs. This can make it harder for you to find one of those jobs. You may need to improve your skills to become more qualified than the other job seekers.

Another difficulty can occur if you are not willing to move. You might have lived in this area for your whole life. Your family and friends are all here. Your children may be in high school and want to stay put. But if the area has only a few jobs, then getting one may be hard. If you are competing with a lot of other unemployed people, or if your skills are old, then finding a job could be very difficult. Once again, improving your own skills is a way to make yourself more competitive in the new job market.

Some job seekers who earned high wages in the lay-off job have trouble finding a new job. You may spend your whole paycheck to pay bills. So you may not want to take a lower wage job. This can make it hard to find a new job. At first, you will lose tenure pay and merit pay at a new job. You may start as an apprentice in a new trade and earn less money. It can take several years to earn the same paycheck. You will probably have to change the way you live to stay out of debt. Your local JobLink Career Center can refer you to a financial planner or credit counselor. You may have to improve your skills to increase the odds of finding a higher paying job.

A related problem stems from high tenure in the lay-off job. You may have worked for the same company for many years. You may have earned benefits from your tenure like more vacation days. In a new job, you have to earn these benefits again. You may not find a job that gives the same benefits to a starting worker. You must choose which benefits you can live without, and which you need. Remember that your "needs" are often different from your "wants." Also, in your high-tenure job, you had seniority and the respect that goes with it. Starting over as a junior worker could be stressful.

Your life changed when your job ended. Now you must start fresh. Some of the issues here may affect you when you look for new work. Think about each issue and

about how each could affect your job search. Get ready to show how you meet the needs of the new job market.

You may want to get help from others. Asking for help takes courage, but can be worth the effort. It is OK to admit that you need help to meet the needs of the new workforce. You can get help from several local organizations. These include your local JobLink Career Center where you can get help with job search skills. A financial planner or credit counselor can help you manage your money better. Local literacy groups can help you learn to read and write better. The counselor at your Community College can help you enroll in classes to earn a high school diploma or to learn new job skills. And, if you think that someone discriminated against you because of your age, gender, or race, you may contact the Equal Employment Opportunity Commission.

Fade to Nothing

SEGMENT 3: JOB SEARCH ASSISTANCE

[African American Man]

Finding a new job takes work. The career planning steps help you to match your interests to job types. These steps are

Self-Assessment,

Career Exploration,

Goal Setting,

Taking Action,

and Evaluation.

The job search process helps you find one of those jobs that interest you. The job search process includes finding a job opening, completing a job application, submitting a resume, and getting an interview.

Work through these steps as soon as you can. The sooner you begin, the sooner you can get the support you need. Your JobLink Career Center has people who can help you. You can get help from a career counselor. You can even use the Internet for some of

these steps. Your JobLink Career Center or local library may have a computer that you can use to access the internet.

You may think that the career planning steps are a waste of your time. They aren't. If you have obsolete job skills that the work force no longer needs, then you must find a new line of work. Also, if you have worked in the same job for a long time, your interests may have changed. The career planning steps can help you prepare better for the job search process.

The first step is self-assessment. Think about what you like to do. What do you enjoy? What interests do you have? Think about your skills. Maybe you have skills from hobbies that you could use for work. Think about skills that you want to develop. Think about the work setting that you prefer. Make notes to remember your ideas.

The second step is career exploration. Match your interests to possible jobs. Talk to people who work in those jobs. Ask what they do each day. Ask if they needed special training for the job. Think if you would like to do those tasks every day.

The third step is goal setting. Set a long-term career goal. Write down what training you need and where you can get it. Then break your goal into smaller steps. You can achieve more if you use small steps to reach a large goal. Small steps help you see your progress and stay motivated.

The fourth step is taking action. Make a plan to achieve your goals. Speak to people who can help. Fill out forms right away and return them. Do a little bit every day to work on your goals. You can accomplish big jobs when many small efforts add up.

The fifth step is an ongoing evaluation of your progress. Read your plan every day. Think about how you will feel when you reach your goal. Update your plan when changes occur. Cross off steps that you finish so you can see your progress.

The career planning steps can help you find long-term work that you really like. Since you have to change jobs anyway, you should take the time to find work that will be fulfilling. Some people take a temporary job to pay bills while they work at a long-term goal. Your JobLink Career Center can help you learn about your options.

[Caucasian Woman]

When you are ready to look for work, you must do several things to get a job.

You must
find a job opening,
complete a job application,
submit a resume,
and get an interview with the employer.

Every step is important.

The first step is to find a job opening. You can look for job openings in several sources. The newspaper has help wanted ads. The Internet has links to job bank lists. The library has a newspaper and a computer that you can use. Your JobLink Career Center has a list of jobs. One of the best sources is the people you know. Tell people you know – family, friends, neighbors, even casual acquaintances – what kind of job you want. They know many other people. Those people may tell them about a job like the one you want. Some job counselors think that about 80 percent of job openings are never advertised. Job seekers referred by other workers fill those openings before the employer announces them to the public. You may have gotten your last job from a referral by someone you knew.

The second step is to complete a job application. You must fill out forms to apply for many jobs. Answer all of the questions. Tell the truth for each question. You may need to list references. Keep the names and phone numbers for your old boss and co-workers.

The third step is to submit your resume. This paper tells your work history. It lists your skills and experience. Your resume is very important. You should get help when you write it. Your JobLink Career Center has people who can help. It also has computers and printers for you to make your resume.

You mail or deliver your resume. Your resume should have a cover letter for each place where you apply. You can also give copies to family and friends. They can pass your resume to people they know who may have a job like the one you want.

The fourth step in the job search process is to get an interview. You may have to talk to the person who hires new workers. Take time to prepare. You can get help from your JobLink Career Center. Get a haircut and take a shower. Wear neat, clean clothes like those worn on the job site. Bring your resume and your licenses. If you have work samples, bring them. Carry a note pad and two pens. Arrive early. Be polite. Think about your answers before you speak. Thank each person before you leave. Send a thank you note soon after you leave. Call a few days later if you have not heard from the company.

You may want to get help for your job search. Many years may have passed since you last looked for a job. You can get help from several places in your community. These include the local JobLink Career Center, your Community College's career center, or the Internet.

Finding a job takes a lot of effort and persistence. Expect to work hard at finding your next job. Be prepared to hear "no" many more times than you will hear "yes." Work through the career planning steps as soon as you hear about the layoff. Then, give your best effort to the job search process.

Fade to Nothing

SEGMENT 4: INCOME SUPPORT

[Caucasian Man]

Finding income is a big worry for people who lose their jobs. This segment talks about sources of income support that may be available to you. It also describes other forms of income that are not cash assistance. You may need to learn new ways to save money during this period.

You may be eligible for an income support program. The most common type is unemployment insurance. This is not a handout. Your employer paid this insurance to help workers who lost their jobs. If import competition or a natural disaster caused your job loss, other programs may apply. The state also manages programs for federal employees and ex-service members.

State unemployment insurance is provided to many unemployed people. The state controls this program through the Employment Security Commission. You may file a

claim for this income support. Bring the dates you were employed and your pay rate. Support will last only a short time – from 3 to 6 months. You only get about half of your weekly pay. This money is taxed.

You must do several things to get continued support. You must file papers every week. You must register for work, and you must seek work on two days each week. You must report any job offers and tell if you earned money. The money you earn may be taken from your support.

Extended benefits may be available in some cases. North Carolina uses this program if many people are out of work at the same time. It can give a few more weeks of income support.

Trade Readjustment Allowances, often called TRA, are for people who lost jobs due to imports. This program can give income when other support ends. You must file a different claim for this support. You file for NAFTA if the imports came from Canada or Mexico. You file for TAA if the imports came from another country. This program can also give money for retraining and a health care tax credit.

Another program called Disaster Unemployment Assistance helps people affected by disasters. This support is only for big events like floods. It is for people who lost jobs from the disaster.

Work First is another special program. This support helps keep people off welfare. It can provide income for a few months. It can also help with health care and child care.

You must have several items to file a claim. You need the employer's name and address where you worked. You must have worked there more than 30 days. You need the dates when you worked there and your pay rate at that job. If you had military service, you need those dates as well.

Remember that unemployment insurance is not a handout. Your employer paid money to help workers in case something happened.

[Hispanic Man]

Other forms of income support are available to help people. Some of these programs are reviewed next. They help people with food, electricity, and home payments.

Take advantage of these programs if your bills are more than the income support that you receive.

The first programs are those that help with food. North Carolina has a school breakfast and lunch program. This plan buys breakfast and lunch for low-income school children. It saves money from the family food bill. Another plan provides meals for school children in the summer. It is called the North Carolina Summer Food Service Program.

The food stamp program helps families buy food. Many stores accept food stamps. You use them instead of money to buy food items. Many local communities also have a food pantry. These groups provide food for hungry people.

You may be eligible for an energy assistance program. This plan helps people pay their heating bills. It gives a one-time payment near the end of winter. A related program is called home energy conservation. This plan helps people save energy in the home. When you save energy, you save money.

Another way to improve your income is to get control over your debt. Consumer credit counseling agents can help you manage your bills. You keep more money with lower bill payments. You may also want to consult with a financial planner. They can help you make wise choices about retirement funds.

Another organization that can help you is the housing counseling agency. They help with housing concerns. You may need help to pay your mortgage or rent until you find another job.

Many resources are available to help people with money concerns. You must think carefully about your budget. You may not be able to pay your bills with the income support that you get. Think about using these other sources to save money or to get help with food or electricity. Use all available options to take care of your family, to pay your bills, and to keep your credit intact. You can repay some of these organizations after you get a new job if you don't like the idea of taking charity. Don't let pride cause you to make poor financial choices.

Fade to Nothing

SEGMENT 5: UPGRADING SKILLS

[Caucasian Woman]

Modern workers must have a number of skills. These range from being able to read, to getting along with others, to doing technical tasks for a job.

You will find more job options if you have greater skills. In this segment, you will learn about several types of skills. You will hear about programs that can help you improve your skills, and ways to get money for school.

Employers today expect their workers to have several types of skills. These skills include speaking English, having basic skills, workplace skills, and job skills.

If you are an immigrant or have a work visa, you may want to speak English better. You can get a job in more places if you speak English well.

One group of skills includes basic skills. Many jobs require these skills. You should be able to read, write, figure with numbers, speak, and listen. Some jobs make people take tests so they can see how well you do with these skills. The WorkKeys® System is one example of these tests.

Most jobs require more than basic skills. These are workplace skills. You must communicate with coworkers and customers by talking and writing. You have to be able to work with others on a team. You must solve problems and make decisions. You must be a responsible person.

Besides the basic skills and workplace skills, each job also has unique job skills. You may have these skills already. If you are changing your career field, then you may need to learn new skills. You could go to school or learn by on-the-job training. Ask for help from your community college or JobLink Career Center. They can tell you where to find a program.

[Caucasian Man]

You can find a program to help you learn new skills. These programs include literacy, high school diploma, apprenticeship, and job skill training. How long they take depends on how much you need to learn. Some are free and others have fees.

Literacy programs help you learn basic skills. You learn new things every day. You can learn to read and write better. You can learn math. You can learn to speak English. You can find a program at your local literacy office.

If you didn't finish high school, you can earn a GED. This is equal to a high school diploma. You can use the Internet to study, or you can go to classes. Check at your community college. Many community colleges offer free high school classes.

Apprenticeship is a beginner who works in a trade for a master. You can get job skills and earn money as an apprentice. You often have to take classes first to learn about the trade.

Job skill training is instruction of special skills for a particular job. Some jobs need special training. Many workers get it away from the workplace. You can get a list of schools from the North Carolina State Training Accountability and Reporting System. This includes trade schools as well as local colleges.

[African American Man]

You have options to help pay for school. These options include grants, loans, and government programs.

Federal Supplemental Education Opportunity Grants are for college students with very great need. The grant can pay from \$100 to \$4000 per year. Because it is a grant, and not a loan, you do not pay it back.

Federal Pell Grants are for college students. The amount of the grant depends on your need. You apply with the Free Application for Federal Student Aid. As a grant, you do not pay back this money.

North Carolina Student Incentive Grants are for college students with great need. The grant can pay \$700 per year. You do not repay this grant.

The Federal Work Study program gives jobs to college students. You earn at least the minimum wage. You only work part time so that you have time to study.

The Workforce Investment Act can pay for job training. The government created it for people who lack skills to get a new job. Ask at your JobLink Career Center if you can get money for training. Besides the Workforce Investment Act, you may also get training money from trade programs. These programs help workers whose jobs were lost due to imports.

The options listed here describe money that you can get to pay for training. You do not repay grants. You do not pay back money from federal programs like the Workforce Investment Act or the Trade Readjustment Act. Another option is to borrow money using student loans. Student loans lend money at a lower interest rate. In many cases, you can defer paying the student loan until after you finish school. This gives you time to get a job with your new skills before you start paying the loan.

You must think carefully about your skills. If you need to upgrade your skills, then now may be the right time to do it. Workers who have job skills that are not needed today should consider learning new job skills. Workers who never earned a high school diploma should take time to do that now. Improving your basic skills and workplace skills can make you more appealing as a worker. Learning new job skills can give you more job options in the future. Today's workers must be lifelong learners. You can start today by deciding which skills you want to improve.

Fade to Nothing

SEGMENT 6: HEALTH CARE

[African American Man]

Health care is a concern for many laid off workers. This segment gives you information about health care options. It has two parts. The first part is about finding health insurance. The second part is about finding health care.

You may have lost your health insurance along with your job. You may have to be creative to insure the whole family. You may use different plans for each person. Your children may use a different plan. Some plans are made just for kids. If your spouse has a

plan at work, maybe that can help for a while. You can consider the following options for health insurance.

Medicaid helps families that are very poor. It is low-cost or free health insurance. This plan covers normal health and dental care. The Work First program staff can refer you to this plan.

Another plan is the North Carolina Health Choice for Children. This helps families with low income. It has low-cost or free health insurance for kids. You must earn too much money for Medicaid. You must earn too little money to buy health insurance. This plan covers normal health and dental care. This program is North Carolina's State Children's Health Insurance Program.

If you had health insurance at work, you may ask about COBRA Continuation Coverage. This law lets some people keep their work health insurance. The laid off worker may have to pay the whole premium. The insurance firm should send you a letter. You have a limited time to decide. This policy will last up to 18 months. It can't be renewed.

A conversion policy is another option. Some workers can change a group plan to a personal plan. The insurance agent for the group plan can tell you if this is possible. You have a short time to choose this option. It may cost more than the group plan.

[Caucasian Man]

If you don't have health insurance, you may still be able to get treatment. This part discusses ways that you can find health care. Take care of yourself, and your teeth, after you are laid off. You will feel better if you do.

You should start with the North Carolina Association of Free Clinics. They help you find free clinics that offer medical care. Each clinic has its own service list. Most clinics can give you basic health care. They may know who can give other services.

The Bureau of Primary Health Care can also help you find a health clinic where you can go if you don't have money. The clinics can help with many health needs. These include lab tests, x-rays, shots, medicines, and counseling. They can also help with your dental needs to keep your teeth healthy.

You or your loved ones may need medicine. If so, you have several options. You can try the Free Medicine Program or the Free Medicine Foundation. Both programs help you find free medicine. They work with drug firms to get the medicine for you. They both charge a fee to file your papers with the drug companies.

NeedyMeds is another option to get medicine. In this program, you work with the drug firms. You file a form for each drug. Sometimes your doctor must file a form too. The drug firm sends the medicine to you or your doctor.

One more option is the Partnership for Prescription Assistance. They also help you get medicine. It might be free or cost a little money. They will refer you to a program that can help.

You want to keep taking care of your teeth. Community colleges or technical schools may help. You may get free or low cost dental care from schools. Look for schools that teach dental hygiene.

You may have to change the way you handle health and dental care. But you don't have to go without care. Be open to the programs that can help you during this difficult period. If you feel embarrassed to take their help, you can repay them later. Don't sacrifice your health for your pride.

Fade to Nothing

SEGMENT 7: TRANSPORTATION

[African American Woman]

This segment discusses transportation options. You must meet with agencies to get support. You may not have a car to use for these meetings. Or you may not be able to afford gas. You have other options to get a ride.

Many sources may be able to give you a ride. Don't be too proud to ask for help. Many people want to help you but they need you to tell them how to help. Your local JobLink Career Center can also help you get a ride.

When you do get a ride, use these trips wisely. Know what you want to do during each trip. Combine lists to buy many items at the same time. Your ride can drop you and come back at a set time. Don't make them wait while you shop.

Walking is the most flexible choice. You set the schedule. If you live nearby, walk to your meeting or shopping. Walking is good for you. You save money. And, you save favors for needs that are more important.

The lowest fee for a paid ride is the bus. The bus will cost less than a taxi ride. Someone may take you to a bus stop if they can't take you where you are going. Even a taxi ride to the bus stop may cost less than taking a taxi the whole way. You might get a bus token from social services.

The taxi is more expensive. If you don't live near a bus route, you may have to use a taxi. Taxis cost more money. Only use them if you have no other choice.

Another option is to use a carpool. You could join a carpool that goes to town each day. You can use the library as your base. You can ride the bus while in town to go to your appointments.

All of the people you know may be able to help give you a ride. Start with your family. Ask to go along when they do normal tasks. Grocery shopping is an example.

Friends who also were laid off may go to the same social services as you do. Ask them to take you along.

Neighbors may shop in the same stores as you. Ask to ride along when they go places that you need to go.

Classmates may be able to give you a ride. Ask if anyone in your class can give you a ride to school or from school to home.

Even if you only get a ride one-way, that will save some money. Then you only need to pay for a one-way ride.

[Hispanic Man]

You may want to give people something in exchange for a ride. Trading skills is one way to do this. This way you can save favors for special times.

Try to barter if you don't have money to pay for a ride. You can trade one of your skills for a ride. This can help you save money to get to the places you need to go. Think

about your skills and which skills you can trade. When you trade with someone, you feel better about getting a ride.

This part presents some barter options. It is only a short list to give you ideas. You can trade anything that a person needs.

Everyone needs to eat. You can cook a meal. Make a meal that someone can freeze in exchange for a ride. Maybe you could make your special cake or pie.

Everyone has household items that break or tear. You can repair something. For example, you could sew a piece of clothing, repair a leaky pipe, fix a broken mailbox, or paint a peeling fence.

If you like the outdoors, you can do yard work. You could mow the grass for someone. Weed the garden and trim the bushes or trees. Some people really don't like these chores. Some people would be glad to have a weekend without yard work.

Everyone has cleaning chores. You can offer to clean. Maybe you can wash a car. You could clean a house. Or you could give the pet a bath.

If you like children, you could offer to baby-sit. Trade some child care time for a ride. Other parents who were laid off may need child care to go to appointments. A stay-at-home Mom might love some time during the day. These parents may be happy to give you a ride in exchange for watching their children.

Getting a ride can be difficult if you don't have a car or can't afford gas. You will have a number of meetings to attend to get services. Try to use options that save money. This segment described ways to travel.

Remember that you can get a ride from people you know. Many people are happy to help you. Be open to asking for help. Offer to trade services in exchange for a ride. This helps both parties feel better about the exchange.

Fade to Nothing

SEGMENT 8: CHILD CARE

[African American Woman]

This segment discusses child care options. You must meet with agencies to get support. You cannot take young children to some of these meetings. You will need someone who can watch young children for you sometimes. You have other options to get help with your child care.

Many sources may be able to help with child care. Know what you want to do during these times. Use these times wisely. Save child care for the places where you just can't take children. Job interviews are one place where children should not go.

Don't be too proud to ask for help. Many people want to help you but they need you to tell them how to help. The Work First program can also refer you to child care sources.

You may be able to get help from people you know. Start by asking your family for help. Older kids may be able to watch younger kids for a short time. Your parents may be willing to visit. Ask your aunts and uncles. Your brothers or sisters may be able to help.

Your friends and neighbors are other sources. Friends from work may have the same need, so you can trade child care time. Friends from your place of worship can help too. Your neighbors may be able to take the kids to the bus in the morning. Or, maybe they can meet your kids getting off the bus.

Some communities have before or after-school programs. Some schools can help watch kids before and after school. Talk to the school counselor, principal, and teachers for advice.

Your town might have a YMCA/YWCA or Boys/Girls Club. If you live near a youth center, they might be able to help. They might have camps or programs that your kids can use when you have meetings.

Another option is a child care center. Some centers set their fees based on income. If you tell them that you were laid off, then they may charge less money. Some have reduced meal fees. Some offer health insurance for children.

Early Start may be an option for preschool children. This program helps children prepare for school. Check with the school counselor.

[Caucasian Woman]

You may want to give something in exchange for child care. Trading skills is one way to do this. This way you can save favors for special times.

Try to barter if you don't have money to pay for a baby sitter. You can trade one of your skills for child care. This can give you time to do tasks where you can't take the kids. Think about your skills and which skills you can trade. When you trade, you feel better about getting help with child care.

This part presents some barter options. It is only a short list to give you ideas. You can trade anything that a person needs.

Everyone needs to eat. You can cook a meal. Make a meal that someone can freeze in exchange for a few hours of babysitting. Maybe you could make your special dessert.

Everyone has household items that break or tear. You can repair something. For example, you could sew a piece of clothing, repair a leaky pipe, fix a broken mailbox, or paint a peeling fence.

If you like the outdoors, you can do yard work. You could mow the grass for someone. Weed the garden and trim the bushes or trees. Some people really don't like these chores. Some people would be glad to have a weekend without yard work.

Everyone has cleaning chores. You can offer to clean. Maybe you can wash a car. You could clean a house. Or you could give the pet a bath.

You could offer to baby-sit. Trade some child care time with another family. Other parents who were laid off may need child care to go to appointments. A stay-at-home Mom might love some time during the day. These parents may be happy to exchange child care with you.

Getting child care can be difficult. You will have a number of meetings to attend where you can't take young children. This segment described ways to find someone who can help with child care.

Remember that you can get help from people you know. Many people are happy to help you. Be open to asking for help. Offer to trade services in exchange for child care. This helps both parties feel better about the exchange.

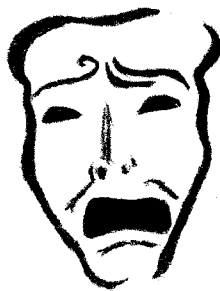
Fade to Nothing

APPENDIX B

WRITTEN INFORMATION TEXT (BROCHURES)

The following pages contain examples of the eight brochures used for the print portion of the treatment. The brochures provided print information that participants could review at their convenience. Each brochure used four pages: a front cover containing a topic outline, two interior pages that elaborated the outline, and a back cover containing resources for additional information. The brochures were printed on 11x17 inch paper using a center fold to create the four sections. Font size for text was a minimum of 16 points to improve readability for low-literate individuals. Each brochure used a distinct paper color so that users could easily differentiate the topics. Of particular concern for the written brief was the level of writing, due to the likelihood of participants with low educational attainment and low literacy. The researcher wrote the document below a 5th-grade reading level as measured by the Flesch-Kincaid Grade Level score, computed using Microsoft Office Word 2003.

Job Loss Grief Process



Grief before Job Loss

1. Shock and Denial
2. Fear and Panic
3. Anger
4. Bargaining
5. Depression*
6. Acceptance

Grief after Job Loss

1. Numbness
2. Yearning
3. Disorganization and Despair
4. Reorganization of Behavior

*Signs of Depression

- Have trouble sleeping.
- Don't want to eat.
- Feel irritated.
- Stop taking care of self.
- Can't think.
- Have low energy.
- Feel aches or pains.
- Feel a weight on chest.

Getting Help for Depression

- Family doctor/nurse
- Local mental health agency
- Spiritual leader (church, temple, mosque)

Job Loss Grief Process

Losing a job is stressful. Job loss can create feelings of grief. These feelings can begin after first finding out that job loss will occur. They can last for 4-5 months. It is normal to have these feelings. You could have them one at a time or together.

Grief before Job Loss

Some feelings start when you first hear about the job loss. These feelings can come even if you are still working. These feelings include shock and denial, fear and panic, anger, bargaining, depression, and acceptance.

Shock and Denial: At first, you will feel shock at the news. You may not believe that your job is over. You may feel stunned when you think about losing your job.

Fear and Panic: You may worry that you won't find another job. You may feel panic about how to pay your bills. You may be afraid that others will blame you for the job loss.

Anger: You might be angry with your boss or job. You could be angry at other workers. You may feel anger at your union. Some people feel angry with family or friends.

Bargaining: Some people try to make a deal to keep the job. Some people do this in prayer.

Depression: You may feel sad about the future. You may feel alone, like nobody knows how you feel.

Acceptance: You think that you can move past the job loss. You see that you must take action to get a new job or new work skills.

Grief after Job Loss

Some feelings may come after you leave the job. These feelings include numbness, yearning, disorganization, and reorganization.

Numbness: You may not believe that your job has really ended. You may not be able to think about steps you should take to move on.

Yearning: You might miss your old daily routine. You may miss people you worked with every day. You may feel angry or sad, or both. You think about the past a lot.

Disorganization: You may do nothing for a time. This could happen because you don't know what to do. You may be afraid to ask for help or be embarrassed. You might take a few steps to find a job, and then stop. You may feel confused about how to move forward.

Reorganization: You decide to stop waiting. You see that you must make changes. You make a plan for the future and find ways to support your plan. This can include family or friends. Sometimes you can find help from the government.

You could have these feelings for a short or long time. Each person is unique. You may never feel some of the thoughts listed here. Or, they could come in a different order for you.

It is OK to talk about your feelings. Your family and friends want to help you. But they may be afraid to talk about the job loss. They don't know how you might react. They can't know how to help unless you tell them.

You may want to get help from others. Asking for help does not mean that you are weak.

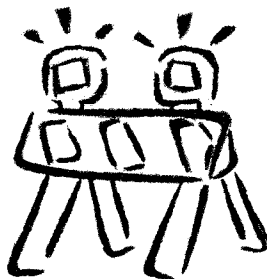
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United Way. Counseling services. Phone: Dial 2-1-1 for health and human service information in North Carolina. Internet site with links to local United Way partners: <http://www.nc211.org/>.

Employment Barriers



Some people have trouble getting a new job. The list below shows issues that can cause problems.

- **No high school diploma**
- **Poor reading or writing skills**
- **Skills don't fit open jobs**
- **Older**
- **Many laid-off workers in the area**
- **Not willing to move**
- **High wages in lay-off job**
- **High tenure in lay-off job**

Getting Help for Employment Barriers

- **JobLink Career Center**
- **Literacy Groups**
- **Community College Counselor**
- **Equal Employment Opportunity Commission**

Employment Barriers

Finding a new job takes effort. Since you were hired at your last job, the world of work might have changed. This means that you might have to change too. The reasons below can make finding a new job harder.

No high school diploma: Many new jobs call for a high school diploma. If you don't have one, then you are not qualified for those jobs. You could have trouble finding work. The jobs you do find may offer less money than your old job. Earning a high school diploma can help you.

Poor reading or writing skills: Many jobs need workers who read. Some need workers who write. If you don't read or write well, then you are not qualified for these jobs. If you can't read or write, you may not get training you need. This happens because you don't meet basic entry rules. Learning to read and write can help you succeed.

Skills don't fit open jobs: The skills from your old job may be obsolete. The new work force might not need those skills. Your skills may not transfer to a new job. You should find out what job areas are growing in your area. Learning new skills can help you meet needs of a changed work force.

Older: Being older may make it harder to find work. Employers may think that you will retire soon. They may not want to invest money to train you. You may have a family and want more benefits. You must emphasize that you are more mature. Remind them that your experience adds value to the work place.

Many laid-off workers in the area: Many other people may be looking for work too. They are competing with you for the same jobs. If your company closed, your area may have more workers than jobs. This will make it harder for you to find one of those jobs.

Not willing to move: Some people don't want to move to get a new job. You might have lived in this area for your whole life. But if the area has only a few jobs, then getting one may be hard. If your skills are old, finding a job will be difficult.

High wages in lay-off job: You may have spent your whole paycheck to pay bills. So you may not want to take a lower wage job. This can make it hard to find a job. At first, you will lose tenure pay and merit pay at a new job. You may start as an apprentice in a new trade and earn less money. It can take several years to earn the same paycheck. You will probably have to change the way you live to stay out of debt.

High tenure in lay-off job: You may have worked for the same company for many years. You may have earned benefits like more vacation. In a new job, you have to earn these benefits again. You may not find a job that gives the same benefits to a starting worker. You must choose which benefits you can live without, and which you need. Remember that your "needs" are different from your "wants."

Your life changed when your job ended. Now you must start fresh. Some of the issues here may affect you when you look for new work. Think about each issue and about how each could affect your job search. Get ready to show how you meet needs of the new job market.

Sources of More Information

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Equal Employment Opportunity Commission. Internet site <http://www.eeoc.gov/charlotte/index.html>. Telephone: (704) 344-6682/6685.

Job Search Assistance



Career Planning Steps

1. Self-Assessment
2. Career Exploration
3. Goal Setting
4. Taking Action
5. Evaluation

Job Search Process

1. Finding a Job Opening
2. Application
3. Resume
4. Interview

Getting Help for Job Search Assistance

- JobLink Career Center
- Community College Career Center
- Internet

Job Search Assistance

Finding a new job takes work. The career planning steps help you match your interests to job types. The job search process helps you find a job. Work through these steps as soon as you can. The sooner you begin, the sooner you can get the support you need. Your JobLink Career Center has people who can help you. You can get help from a career counselor. You can even use the Internet for some of these steps.

Career Planning Steps

1. Self-Assessment: Think about what you like to do. What do you enjoy? What interests do you have? Think about your skills. Maybe you have skills from hobbies that you could use for work. Think about skills that you want to develop. Think about the work setting that you prefer. Make notes to remember your ideas.

2. Career Exploration: Match your interests to possible jobs. Talk to people who work in those jobs. Ask what they do each day. Ask if they needed special training for the job. Think if you would like to do those tasks every day.

3. Goal Setting: Set a long-term career goal. Write down what training you need and where you can get it. Then break your goal into smaller steps. You can achieve more if you use small steps to reach a large goal.

4. Taking Action: Make a plan to achieve your goals. Speak to people who can help. Fill out forms right away and return them. Do a little bit every day to work on your goals.

5. Evaluation: Read your plan every day. Think about how you will feel when you reach your goal. Update your plan when changes occur. Cross off steps that you finish so you can see your progress.

Job Search Process

You must do several things to get a job. Every step is important.

1. Find a Job Opening: You can look for job openings from several sources. The newspaper has help wanted ads. The Internet has links to job bank lists. The library has a newspaper and a computer that you can use. Your JobLink Career Center has a list of jobs. One of the best sources is the people you know. Tell people you know what kind of job you want. They know many other people. Those people may tell them about a job like the one you want.

2. Application: You must fill out forms to apply for many jobs. Answer all of the questions. Tell the truth for each question. You may need to list references. Keep the names and phone numbers for your old boss and co-workers.

3. Resume: (reh-zoo-may) This paper tells your work history. It lists your skills and experience. Your resume is very important. You should get help when you write it. Your JobLink Career Center has people who can help. You mail or deliver your resume. It should have a cover letter for each place where you apply.

4. Interview: You may have to talk to the person who hires new workers. Take time to prepare. You can get help from your JobLink Career Center. Get a haircut and take a shower. Wear neat, clean clothes like those worn on the job site. Bring your resume and your licenses. If you have work samples, bring them. Carry a note pad and two pens. Arrive early. Be polite. Think about your answers before you speak. Thank each person before you leave. Send a thank you note soon after you leave. Call a few days later if you have not heard from the company.

Sources of More Information

Job Seeking Skills Materials. Dislocated Workers Toolkit. Internet site: <http://www.dwtoolkit.com/JobSeekingSkills/index.cfm>. This site can help with all parts of the job search process. Links talk about job search, resumes, and interviews. One link tells you how to dress.

Job Search. Dislocated Workers Toolkit. Internet site: <http://www.dwtoolkit.com/JobSearch.cfm>. This site helps you explore your job interests. It has links to job lists. It has links for schools and training.

North Carolina's Career Information System. <http://www.nccareers.org/>. This site has links to help you with the career planning steps. You can explore your interests. You can look for job types that match your interests or skills. You can see which programs the schools near you offer.

Career One Stop. <http://www.careeronestop.org/>. This site has links to search job lists. It also has a link to find schools. You can create a personal job bank account. It can help you write a resume and cover letter. It can search for jobs using your ideas.

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Income Support



Sources of Income Support

- **State Unemployment Insurance**
- **Unemployment Compensation for Federal Employees**
- **Unemployment Compensation for Ex-Service Members**
- **Extended Benefits**
- **Trade Readjustment Allowances**
- **Disaster Unemployment Assistance**
- **Work First**

Items Needed to File a Claim

- **Employer's Name and Address**
- **Employment Dates**
- **Pay Rate**
- **Military Service Dates**
- **Alien Registration Number**

Other Forms of Income

- **North Carolina School Breakfast and Lunch Program**
- **North Carolina Summer Food Service Program**
- **Food Stamps**
- **Food Pantry**
- **Energy Assistance**
- **Home Energy Conservation**
- **Consumer Credit Counseling**
- **Housing Counseling Agency**

Getting Help for Money Concerns

- **Credit Counselor**
- **Financial Planner**

Income Support

Sources of Income Support

State Unemployment Insurance: You may file a claim for this income support. Bring the dates you were employed and your pay rate. The state controls this program through the Employment Security Commission. Support will last only a short time – from 3 to 6 months. You only get about half of your weekly pay. This money is taxed. You must file papers every week. You must register for work and seek work on two days each week. You must report any job offers and tell if you earned money. The money you earn may be taken from your support.

Unemployment Compensation for Federal Employees: This program is for civil service workers. The state runs this program also.

Unemployment Compensation for Ex-Servicemembers: This program is for ex-military. The state runs this program also.

Extended Benefits: This program is used if the state has many people out of work. It can give a few more weeks of income support.

Trade Readjustment Allowances: This program is for people who lost jobs due to imports. It can give income when other support ends. You must file a different claim for this support. You file for NAFTA if the imports came from Canada or Mexico. You file for TAA if the imports came from another country. You can also get money for retraining and a health care tax credit.

Disaster Unemployment Assistance: This support is only for big events like floods. It is for people who lost jobs from a disaster.

Work First: This support helps keep people off welfare. It can provide income for a few months.

Items Needed to File a Claim

Employer's Name and Address: You need the name and address where you worked. You must have worked there more than 30 days.

Employment Dates: You need the dates when you worked there.

Pay Rate: You need your pay rate at that job.

Military Service Dates: You need your dates of military service.

Other Forms of Income Support

North Carolina School Breakfast and Lunch Program: This plan buys breakfast and lunch for low-income school children.

North Carolina Summer Food Service Program: This plan provides meals for school children in the summer.

Food Stamps: This plan helps families buy food. Many stores take food stamps. You use them instead of money to buy food items.

Food Pantry: These groups give groceries to hungry people.

Energy Assistance: This plan helps people pay their heating bills. It gives a one-time payment near the end of winter.

Home Energy Conservation: This plan helps people save energy in the home. When you save energy, you save money.

Consumer Credit Counseling: These people help you get control over your debt. You keep more money with lower bill payments.

Housing Counseling Agency: They help with housing concerns.

Sources of More Information

N. C. Employment Security Commission. Find a local office at this Internet site: <http://www.ncesc.com/locator/locatormain.asp>.

North Carolina Work First Program. You apply with the local Department of Social Services. Internet site to find your local office: <http://www.dhhs.state.nc.us/dss/local/index.htm>. Phone: (800) 662-7030. Internet site for more information: <http://www.dhhs.state.nc.us/dss/workfirst/index.htm>.

North Carolina School Breakfast and Lunch Program. Internet site: <http://www.ncpublicschools.org/childnutrition/nutritionprograms/>.

North Carolina Summer Food Service Program. Internet site: <http://www.nutritionnc.com/snp/sfsp.htm>.

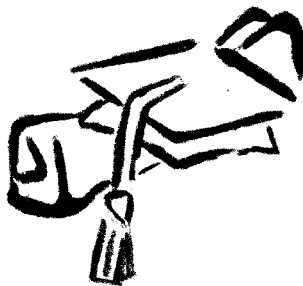
North Carolina Food Stamp Program. You apply with the local Department of Social Services. Internet site to find your local office: <http://www.dhhs.state.nc.us/dss/local/index.htm>. Phone: (800) 662-7030.

North Carolina Low-Income Energy Assistance Program. You apply with the local Department of Social Services. Internet site to find your local office: <http://www.dhhs.state.nc.us/dss/local/index.htm>. Phone: (800) 662-7030.

North Carolina Weatherization Assistance Program. Internet site: <http://www.dhhs.state.nc.us/oeo/weather.htm>. Phone: (919) 715-5850.

Housing Counseling Agency. Internet site: <http://www.hud.gov/offices/hsg/sfh/hcc/hcs.cfm>. Phone: (800) 569-4287.

Upgrading Skills



Types of Skills

- **English Language**
- **Basic Skills: Read, Write, Figure, Speak, Listen**
- **Workplace Skills: Communicate, Work with Others, Solve Problems, Make Decisions, Be Responsible**
- **Job Skills**

Finding a Program

- **Literacy Programs**
- **GED**
- **Apprenticeship**
- **Job Skill Training**

Paying for School

- **Federal Supplemental Education Opportunity Grant**
- **Federal Pell Grants**
- **Federal Work Study**
- **North Carolina Community College Scholarship**
- **North Carolina Student Incentive Grant**

Upgrading Skills

Modern workers must have a number of skills. You will find more job options if you have greater skills. Below you will find several types of skills. You will see programs to improve your skills, and ways to get money for school.

Types of Skills

English Language: You may want to speak English better. You can get a job in more places if you speak English.

Basic Skills: Many jobs call for basic skills. You should be able to read, write, figure with numbers, speak, and listen. Some jobs make people take tests so they can see how well you do with these skills. The WorkKeys® System is one example of these tests.

Workplace Skills: Most jobs require more than basic skills. You must communicate by talking and writing. You have to be able to work with others on a team. You must solve problems and make decisions. You must be a responsible person.

Job Skills: Each job also has a set of unique skills. You may have these skills already. If you are changing your career field, then you may need to learn new skills. You could go to school or learn by on-the-job training. Ask for help from your community college or JobLink Career Center. They can tell you where to find a program.

Finding a Program

Literacy Programs: You learn new things every day. You can learn to read and write better. You can learn math. You can learn to speak English. You can find a program at your local literacy office.

GED: If you didn't finish high school, you can earn a GED. This is equal to a high school diploma. You can use the Internet to study, or you can go to classes. Check at your community college.

Apprenticeship: You can get job skills and earn money as an apprentice. You often have to take classes first to learn about the trade.

Job Skill Training: Some jobs need special training. Many workers get it away from the workplace. You can get a list of schools from the North Carolina State Training Accountability and Reporting System. This includes trade schools as well as local colleges.

Paying for School

Federal Supplemental Education Opportunity Grant (FSEOG): These grants are for college students with very great need. The grant can pay from \$100 to \$4000 per year. Because it is a grant, and not a loan, you do not pay it back.

Federal Pell Grants: These grants are for college students. The amount depends on your need. You apply with the Free Application for Federal Student Aid (FAFSA). You do not pay back this money.

North Carolina Student Incentive Grant (NCSIG): These grants are for college students with great need. The grant can pay \$700 per year. You do not pay back this grant.

Federal Work Study (FWS): This program gives jobs to college students. You earn at least the minimum wage. You only work part time so that you have time to study.

Workforce Investment Act: This program can pay for job training. It is for people who lack skills to get a new job. Ask at your JobLink Career Center. You may also get training money from trade programs. They help workers whose jobs were lost due to imports.

Sources of More Information

Schools and Training Information. Dislocated Workers Toolkit. Internet site: <http://www.dwtoolkit.com/JobSearch.cfm>.

North Carolina's Career Information System. <http://www.nccareers.org/>. This site has a link that matches a job choice with school programs. You can see which programs the schools near you offer. You can get a telephone number for the school.

America's Literacy Directory. Internet site: <http://www.literacydirectory.org/>. This site has links to find local help. You can find help for basic skills, English and the GED test.

North Carolina Literacy Association. Internet site: <http://ncliteracy.org/reps/network.html>. This site has local group links.

GED Online. Internet site: <http://www.gedonline.org/>. This site can help you get ready to take the GED test. The GED is equal to a high school diploma. You pay to use this site. It has practice tests.

North Carolina Apprenticeship and Training Bureau. Internet site: <http://www.dol.state.nc.us/appren/appindex.htm>.

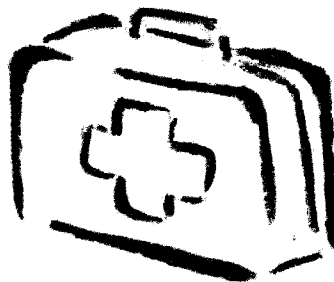
North Carolina State Training Accountability and Reporting System. Internet site: <http://www.ncstars.org/>. This site has a list of North Carolina schools with a phone number, e-mail address, or internet site.

North Carolina Community Colleges. Internet site: http://www.ncccs.cc.nc.us/colleges_map.htm. This site shows all community colleges. Course lists: <http://www.ncccs.cc.nc.us/instructionalPrograms.htm>. They have classes for basic skills, GED, and English.

North Carolina State Education Assistance Authority. Internet site: <http://www.ncseaa.edu/>. This site talks about paying for college.

WorkKeys® Assessments. Internet site: <http://www.act.org/workkeys/assess/index.html>. This site describes the WorkKeys® tests that test workplace skills.

Health Care



Finding Health Insurance

- **Medicaid**
- **North Carolina Health Choice for Children**
- **COBRA Continuation Coverage**
- **Conversion Policy**

Finding Health Care

- **North Carolina Association of Free Clinics**
- **Bureau of Primary Health Care**
- **Free Medicine Program**
- **Free Medicine Foundation**
- **NeedyMeds**
- **Partnership for Prescription Assistance**
- **Community Colleges or Technical Schools**

Health Care

Health care is a concern for many laid off workers. You may have lost your health insurance along with your job. You may have to be creative to insure the whole family. You may use different plans for each person. Your children may use a different plan. Some plans are made just for kids. If your spouse has a plan at work, maybe that can help for a while. Take care of your health, and your teeth, after you are laid off. You will feel better if you do. Be open to the programs that can help you. Don't sacrifice your health for your pride.

Finding Health Insurance

Medicaid: This helps families that are very poor. It is low-cost or free health insurance. This plan covers normal health and dental care. The Work First program staff can refer you to this plan.

North Carolina Health Choice for Children: This helps families with low income. It has low-cost or free health insurance for kids. You must earn too much money for Medicaid. You must earn too little money to buy health insurance. This plan covers normal health and dental care. This program is North Carolina's State Children's Health Insurance Program (SCHIP).

COBRA Continuation Coverage: This law lets some people keep their work health insurance. The laid off worker may have to pay the whole premium. The insurance firm should send you a letter. You have a limited time to decide. This policy will last up to 18 months. It can't be renewed.

Conversion Policy: Some workers can change a group plan to a personal plan. The insurance agent for the group plan can tell you. You have a short time to choose this option. It may cost more than the group plan.

Finding Health Care

North Carolina Association of Free Clinics. They help you find free clinics. Each clinic has its own service list. Most clinics can give you basic health care. They may know who can give other services.

Bureau of Primary Health Care: They help you find a health clinic where you can go if you don't have money. The clinics can help with many health needs. These include lab tests, x-rays, shots, medicines, and counseling. They can also help with your dental needs to keep your teeth healthy.

Free Medicine Program: You or your loved ones may need medicine. This program helps you find free medicine. They work with drug firms to get the medicine for you. They charge a fee to file your papers with the drug companies.

Free Medicine Foundation: This program also helps you find free medicine. They work with drug firms to get medicine. They charge a fee to file your papers.

NeedyMeds: In this program, you work with the drug firms. You file a form for each drug. Sometimes your doctor must file a form too. The drug firm sends the medicine to you or your doctor.

Partnership for Prescription Assistance: They also help you get medicine. It might be free or cost a little money. They will refer you to a program that can help.

Community Colleges or Technical Schools: You may get free or low cost dental care from schools. Look for schools that teach dental hygiene.

Sources of More Information

Health Insurance Resources. Dislocated Workers Toolkit. Internet site: <http://www.dwtoolkit.com/health.cfm>. This site has links for insurance, free clinics, and medicine resources.

North Carolina Department of Insurance. Health insurance Internet site: http://www.ncdoi.com/Consumer/consumer_health.asp. This site has lists of health and dental insurers.

Medicaid. North Carolina Division of Medical Assistance. Internet site: <http://www.dhhs.state.nc.us/dma/consinfo.htm>. Call your local Department of Social Services, in the phone book (County Government).

North Carolina Health Choice for Children. North Carolina Division of Medical Assistance. Internet site: <http://www.dhhs.state.nc.us/dma/cpcont.htm>. Phone: (800) 422-4658.

North Carolina Association of Free Clinics. Internet: <http://www.ncfreeclinics.org/mc/page.do>. Phone: (336) 251-1111.

Bureau of Primary Health Care. Health Resources and Services Administration. Internet site: <http://ask.hrsa.gov/pc/>.

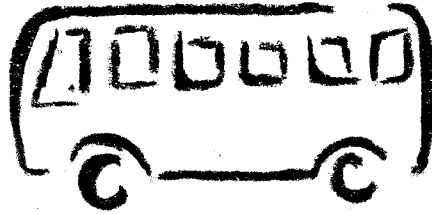
Free Medicine Program. Internet site: <http://www.freemedicineprogram.org/>. Phone: (800) 921-0072.

Free Medicine Foundation. Internet site: <http://www.freemedicinefoundation.com/>. Phone: (573) 996-3333.

NeedyMeds. Internet site: <http://www.needymeds.com/>.

Partnership for Prescription Assistance. Internet site: <https://www.pparx.org/Intro.php>. Phone: (888) 477-2669.

Transportation



Transportation Options

- Walk
- Bus
- Taxi
- Carpool
- Family
- Friend
- Neighbor
- Classmate

Trading Skills

- Cook a Meal
- Repair Something
- Do Yard Work
- Offer to Clean
- Watch Children

Transportation

Transportation Options

Many sources may be able to give you a ride. Don't be too proud to ask for help. Many people want to help you. They need you to tell them how to help. Your local JobLink Career Center can also help you.

Use these trips wisely. Know what you want to do during each trip. Combine lists to buy many items at the same time. Your ride can drop you and come back at a set time. Don't make them wait while you shop.

Walk: If you live nearby, walk. Walking is good for you. You save money. And, you save favors for more important needs.

Bus: The bus will cost less than a taxi ride. Someone may take you to a bus stop if they can't take you where you are going. Even a taxi ride to the bus stop may cost less than taking a taxi the whole way. You might get a bus token from social services.

Taxi: If you don't live near a bus route, you may have to use a taxi. Taxis cost more money. Only use them if you have no other choice.

Carpool: You could join a carpool that goes to town each day. You can use the library as your base. You can ride the bus while in town.

Family: Ask to go along when they do tasks like grocery shopping.

Friend: Friends who also were laid off may go to the same social services as you do. Ask them to take you along.

Neighbor: Ask to ride along when they go places you need to go.

Classmate: Ask if anyone in your class can give you a ride.

Trading Skills

You may want to give something in exchange for a ride. Trading skills is one way to do this. This way you can save favors for special times.

Try to barter if you don't have money to pay for a ride. You can trade one of your skills for a ride. This can help you save money to get to the places you need to go. Think about your skills and which skills you can trade. When you trade, you feel better about getting a ride.

This part gives you some barter options. It is only a short list to give you ideas. You can trade anything that a person needs.

Cook a Meal: Make a meal that someone can freeze in exchange for a ride.

Repair Something: Sew a piece of clothing. Repair a leaky pipe. Fix a broken mailbox. Paint a peeling fence.

Do Yard Work: Mow the grass for someone. Weed the garden. Trim the bushes or trees. Some people really don't like these chores. Some people would be glad to have a weekend without yard work.

Offer to Clean: Wash a car. Clean a house. Give the pet a bath.

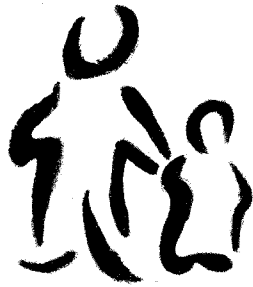
Watch Children: Trade child care time for a ride. Other parents who were laid off may need child care. A stay-at-home Mom might love some time during the day.

Sources of More Information

Transportation Services. Employment Security Commission of North Carolina. <http://www.ncesc.com/individual/default.asp>. This site has a county link for services. It lists taxi and bus services.

JobLink Career Centers. Internet site to find a local office:
<http://www.ncjoblink.com/centers/>.

Child Care



Child Care Options

- **Family**
- **Friends**
- **Neighbors**
- **Before or After-School Programs**
- **YMCA/YWCA or Boys/Girls Club**
- **Child Care Center**
- **North Carolina Head Start**

Trading Skills

- **Cook a Meal**
- **Repair Something**
- **Do Yard Work**
- **Offer to Clean**
- **Watch Children**

Child Care

Child Care Options

Many sources may be able to help with child care. Know what you want to do during these times. Use these times wisely. Save child care for the places where you just can't take children. Job interviews are one place where children should not go. Don't be too proud to ask for help. Many people want to help you but they need you to tell them how to help. The Work First program can also refer you to child care sources.

Family: Ask your family for help. Older kids may be able to watch younger kids for a short time. Your parents may be willing to visit. Ask your aunts and uncles. Your brothers or sisters may be able to help.

Friends: Your friends are another source. Friends from work may have the same need, so you can trade child care time. Friends from your place of worship can help.

Neighbors: Your neighbors may be able to take the kids to the bus in the morning. Or, maybe they can meet your kids getting off the bus.

Before or After-School Programs: Some schools can help before and after school. Talk to the school counselor or principal for advice.

YMCA/YWCA or Boys/Girls Club: If you live near a youth center, they might be able to help. They might have camps or programs that your kids can use when you have meetings.

Child Care Center: Some centers set their fees based on income. If you tell them that you were laid off, then they may charge less money. Some have reduced meal fees. Some offer health insurance for children.

Early Start: This program prepares young children (3-4) for school.

Trading Skills

You may want to give something in exchange for child care. Trading skills is one way to do this. By trading you can save favors for special times.

Try to barter if you don't have money to pay for a baby sitter. You can trade one of your skills for child care. This can give you time to do tasks where you can't take the kids. Think about your skills and which skills you can trade. When you trade, you feel better about getting help with child care.

Cook a Meal: Make a meal that someone can freeze in exchange for child care.

Repair Something: Sew a piece of clothing. Repair a leaky pipe. Fix a broken mailbox. Paint a peeling fence.

Do Yard Work: Mow the grass for someone. Weed the garden. Trim the bushes or trees. Some people really don't like these chores. Some people would be glad to have a weekend without yard work.

Offer to Clean: Wash a car. Clean a house. Give the pet a bath.

Watch Children: Trade child care time with someone else. Other parents who were laid off may also need child care. A stay-at-home Mom might love some time during the day.

Sources of More Information

Finding Child Care. North Carolina Division of Child Development. Internet link to search for child care facilities:

<http://ncchildcaresearch.dhhs.state.nc.us/search.asp>.

Child Care Aware. (800) 424-2246. Internet site to search for local child care: <http://childcareaware.org/en/findcare/>.

Paying for Child Care. North Carolina Division of Child Development. Internet link to find money to help pay for child care:

http://ncchildcare.dhhs.state.nc.us/parents/pr_sn2_ov_fa.asp.

Child Care Resource and Referral. North Carolina Division of Child Development. Internet link to find child care resources:

http://ncchildcare.dhhs.state.nc.us/parents/pr_parentcontacts.asp.

North Carolina Head Start. North Carolina Division of Child Development. Internet link:

http://ncchildcare.dhhs.state.nc.us/general/mb_headstart.asp. Phone: (800) 859-0829.

United Way. Internet site with links to local United Way partners: <http://www.nc211.org/>. Phone: Dial 2-1-1 for health and human service information in North Carolina.

North Carolina Work First Program. You apply with the local Department of Social Services. Internet site to find your local office:

<http://www.dhhs.state.nc.us/dss/local/index.htm>. Phone: (800) 662-7030.

Internet site for more information:

<http://www.dhhs.state.nc.us/dss/workfirst/index.htm>.

APPENDIX C

TENNESSEE SELF-CONCEPT SCALE, SECOND EDITION (TSCS:2)

The publisher of the Tennessee Self-Concept Scale, Second Edition, Western Psychological Services, does not typically authorize republication of tests, scales, or subscales in their entirety. However, they do authorize reproduction of five sample items. A copy of the authorization letter appears on the next page. The following five sample items were approved for inclusion in this dissertation. These items are representative of the Academic-Work Subscale and demonstrate why this instrument was chosen as a self-concept measure.

9. I am not as smart as the people around me.

12. It is easy for me to learn new things.

18. I do well at math.

50. I can't read very well.

81. It's easy for me to understand what I read.

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October 23, 2007

Lisa Row
 PhD Candidate
 Old Dominion University
 Norfolk, VA

Re: *Tennessee Self-Concept Scale, Second Edition (TSCS:2)*

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Western Psychological Services authorizes you to reprint for inclusion in your dissertation (and in articles based directly thereon) items 9, 12, 18, 50 and 81 from the TSCS:2's Academic-Work Subscale, on provision that each reprint bear the following required notice in its entirety:

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On behalf of WPS, I appreciate your interest in this instrument as well as your consideration for its copyright. It's our privilege to assist helping professionals, and I hope we can be of service to your future work.

Sincerely yours,

Susan Dunn Weinberg
 Assistant to the President
 WPS Rights and Permissions
 e-mail: weinberg@wpspublish.com

SDW:ae

APPENDIX D
SALIENCE INVENTORY (SI)

Below is a copy of the permission letter to use the Salience Inventory from one of the instrument's authors. Following the permission letter is a copy of the instrument. Since the instrument is no longer published, it was retyped and formatted for tabloid (11x17 inch) paper. Margins shown here were adjusted to fit the dissertation requirements.

Dorothy D. Nevill, Ph.D.

March 3, 2006

Ms. Lisa Row
2740 Duckwood Court
Suffolk, Virginia 23435

Dear Ms. Row:

You have my permission to use The Salience Inventory in any capacity that you wish for your dissertation. Thank you very much for your interest.

I have enclosed a copy of The Salience Inventory. Please let me know if there is anything further that I can do.

Best wishes for your research.

Dorothy D. Nevill, Ph.D.
Professor Emerita
University of Florida

The Salience Inventory

**Donald E. Super, Ph.D., and Dorothy D. Nevill,
Ph.D.
University of Florida**

This inventory of activities, attitudes, and values asks about the meaning and importance to you of the various kinds of activities in which you engage. It is concerned particularly with what you do or might do as a student, worker, or active member of your community, in your home and family, and in your leisure or free time. Please answer all the questions as well as you can; do not skip any. Your answers will be helpful in understanding people better and in helping them.

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Directions

In the Saliency Inventory you are asked to tell about some of the things you do in each of the kinds of activities to which you give some time, and then to show how you feel about doing them. You may need to consider **time** in some questions, and **amount** or **quantity** in others. Please read each statement carefully. Then use the following scale to show how true that statement is of you in each of the five activities: studying, working, community service, home and family, and leisure or free time.

- 1 means **Never** or **Rarely**, and **Little** or **None**
- 2 means **Sometimes** and **Some**
- 3 means **Often** and **Quite a Lot**
- 4 means **Almost Always** or **Always** and **a Great Deal**

The five key words used in this inventory are defined and listed below:

- Studying:** taking courses, going to school (day or night classes, lectures, or laboratory work); preparing for class, studying in a library or at home; also independent studying, formally or informally.
- Working:** for pay or for profit, on a job or for yourself.
- Community Service:** activities with community organizations such as recreational groups, Scouts, Red Cross, social service agencies, neighborhood associations, political parties and trade unions.
- Home and Family:** taking care of your room, apartment, or house; fixing or cleaning up after meals; shopping; caring for dependents such as children or aging parents.
- Leisure Activities:** taking part in sports; watching television; pursuing hobbies; going to movies, theater, or concerts; reading; relaxing or loafing; being with your family and friends.

This is the way one person who spends a good deal of time Studying and little or no time Working filled out the first line.

A. I have spent time or do spend time in ...

| STUDYING | WORKING | COMMUNITY SERVICE | HOME AND FAMILY | LEISURE ACTIVITIES |
|----------|---------|-------------------|-----------------|--------------------|
| 1 2 3 ● | ● 2 3 4 | 1 ● 3 4 | 1 2 ● 4 | 1 2 ● 4 |

Notice that this person filled in the "4" circle in column 1 (STUDYING), showing that he or she spends a great deal of time in this kind of activity. He or she filled in the "1" circle in column 2 (WORKING), showing that he or she spends little or no time in this activity. He or she filled in other circles for columns 3, 4, and 5, showing how he or she spends time in other kinds of activities. Now, use this scale of 1, 2, 3, or 4 to show what you do, and how much you do it, in each of the five types of activities, for each question A through J.

Please answer every question. Work rapidly. If you are not sure, guess – *your first thought is most likely to be the right answer for you.*

Go on to next page

Participation

(What you actually do or have done recently)

1 = Never or Rarely, and Little or None 3 = Often and Quite a Lot
 2 = Sometimes and Some 4 = Almost Always or Always and a Great Deal

A. I have spent or do spend time in ...

1. studying 2. working 3. community service 4. home & family 5. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

B. I have talked or do talk to people about ...

6. studying 7. working 8. community service 9. home & family 10. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

C. I have spent or do spend time reading about ...

11. studying 12. working 13. community service 14. home & family 15. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

D. I have taken or do take advantage of opportunities in ...

16. studying 17. working 18. community service 19. home & family 20. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

E. I have been or am active in an organization that has to do with ...

21. studying 22. working 23. community service 24. home & family 25. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

F. I have improved my performance in ...

26. studying 27. working 28. community service 29. home & family 30. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

G. I am active in ...

31. studying 32. working 33. community service 34. home & family 35. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

Go on to next page

1 = Never or Rarely, and Little or None **3 = Often and Quite a Lot**
2 = Sometimes and Some **4 = Almost Always or Always and a Great Deal**

H. I have accomplished something in ...

36. studying 37. working 38. community service 39. home & family 40. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

I. As often as I can, I take part in ...

41. studying 42. working 43. community service 44. home & family 45. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

J. I have some books and magazines on ...

46. studying 47. working 48. community service 49. home & family 50. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

Go on to next page

Commitment

(How you feel about it)

| | |
|--|---|
| 1 = Never or Rarely, and Little or None | 3 = Often and Quite a Lot |
| 2 = Sometimes and Some | 4 = Almost Always or Always and a Great Deal |

- A. It is or will be important to me to be good in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 51. studying | 52. working | 53. community service | 54. home & family | 55. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- B. I am or expect to be very much involved in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 56. studying | 57. working | 58. community service | 59. home & family | 60. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- C. I would like to be remembered for what I did in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 61. studying | 62. working | 63. community service | 64. home & family | 65. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- D. I would like to be active for many years in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 66. studying | 67. working | 68. community service | 69. home & family | 70. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- E. I really am committed to being active in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 71. studying | 72. working | 73. community service | 74. home & family | 75. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- F. I am or will be proud to do well in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 76. studying | 77. working | 78. community service | 79. home & family | 80. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |
- G. I really feel personally involved in ...
- | | | | | |
|--------------|-------------|-----------------------|-------------------|------------------------|
| 81. studying | 82. working | 83. community service | 84. home & family | 85. leisure activities |
| ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ | ① ② ③ ④ |

Go on to next page

1 = Never or Rarely, and Little or None
2 = Sometimes and Some

3 = Often and Quite a Lot
4 = Almost Always or Always and a Great Deal

H. I admire people who are good at ...

86. studying 87. working 88. community service 89. home & family 90. leisure activities

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

I. I find it fulfilling to take part in ...

91. studying 92. working 93. community service 94. home & family 95. leisure activities

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

J. I would like to have plenty of time for ...

96. studying 97. working 98. community service 99. home & family 100. leisure activities

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

① ② ③ ④

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Value Expectations

(What opportunity do you see now or in the future to ...)

Directions: In this section, we ask you what values you seek or hope to find in each of the five types of activities: studying, working, community service, home and family, and leisure or free time. Using the same scale as before, show how much value you find or expect to find in each type of activity. Sometimes a value may not apply to a role; if this is so, mark 1 on the answer sheet.

| | |
|--|---|
| 1 = Never or Rarely, and Little or None | 3 = Often and Quite a Lot |
| 2 = Sometimes and Some | 4 = Almost Always or Always and a Great Deal |

What opportunity do you see now or in the future to ...

A. use all your skills and knowledge in ...

101. studying 102. working 103. community service 104. home & family 105. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

B. know that your efforts will show in ...

106. studying 107. working 108. community service 109. home & family 110. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

C. make life more beautiful by ...

111. studying 112. working 113. community service 114. home & family 115. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

D. help people with problems in ...

116. studying 117. working 118. community service 119. home & family 120. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

E. act on your own in ...

121. studying 122. working 123. community service 124. home & family 125. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

F. discover or make new things in ...

126. studying 127. working 128. community service 129. home & family 130. leisure activities

1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4
 1 2 3 4

Go on to next page

| | |
|--|---|
| 1 = Never or Rarely, and Little or None | 3 = Often and Quite a Lot |
| 2 = Sometimes and Some | 4 = Almost Always or Always and a Great Deal |

G. have a high standard of living through ...

131. studying 132. working 133. community service 134. home & family 135. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

H. live your life your own way in ...

136. studying 137. working 138. community service 139. home & family 140. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

I. be physically active in ...

141. studying 142. working 143. community service 144. home & family 145. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

J. be admired for your knowledge and skills in ...

146. studying 147. working 148. community service 149. home & family 150. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

K. feel that you can take some risks in ...

151. studying 152. working 153. community service 154. home & family 155. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

L. do things with other people in ...

156. studying 157. working 158. community service 159. home & family 160. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

M. do a number of different things in ...

161. studying 162. working 163. community service 164. home & family 165. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

N. have good conditions for ...

166. studying 167. working 168. community service 169. home & family 170. leisure activities

① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④ ① ② ③ ④

Go on to next page

APPENDIX E

ADULT LEARNING QUESTIONNAIRE (ALQ)

Below is a copy of the copyright permission to republish the Adult Learning Questionnaire in this dissertation from the Copyright Clearance Center (Copyright.com). Following the permission excerpt is a copy of the instrument. The instrument was retyped and formatted for tabloid (11x17 inch) paper. Margins shown here were adjusted to fit the dissertation requirements.

**ADULT EDUCATION
QUARTERLY**

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Permission Status: Granted

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ISBN/ISSN: 07417136

Publication year: 1985

Publisher: SAGE PUBLICATIONS, INC.

Rightholder: Sage Publications Inc. Journals

Author/Editor: Gordon G. Darkenwald & Thomas Valentine

Republication organization: OLD DOMINION UNIVERSITY

Organization status: Non-profit 501(c)(3)

Republication date: 01/15/2008

Circulation/Distribution: 5

Type of content: Excerpt

Description of requested content: Appendix: Adult Learning Questionnaire

Page range(s): 190-192

Translating to: No Translation

Requested content's publication date: 12/01/1985

Your reference: LISA ROW'S DISSERTATION, APPENDIX E

Go on to next page

Adult Learning Questionnaire

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ADULT LEARNING QUESTIONNAIRE

Your answers are private.

Directions: Each year adults take part in learning. This could be a course, workshop, or training. They may be taught by schools, colleges, or other groups. Sometimes adults find it hard to join in this learning, even when they want to. Think of something you would like to learn, but have not. Then look at the reasons below. *How important is each reason* in your choice not to take a course? (The word "course" means any type of learning.)

Please fill one response for each item. (Fill number '1' if a reason does not apply to you.)

| Reason | Importance | | | | |
|--|---------------|--------------------|--------------------|-----------------|----------------|
| | Not Important | Slightly Important | Somewhat Important | Quite Important | Very Important |
| 1. Because I felt I couldn't compete with younger students. | ① | ② | ③ | ④ | ⑤ |
| 2. Because I don't enjoy studying. | ① | ② | ③ | ④ | ⑤ |
| 3. Because of a personal health problem or handicap. | ① | ② | ③ | ④ | ⑤ |
| 4. Because I didn't think I would be able to finish the course. | ① | ② | ③ | ④ | ⑤ |
| 5. Because I didn't have time for the studying required. | ① | ② | ③ | ④ | ⑤ |
| 6. Because I wanted to learn something specific, but the course was too general. | ① | ② | ③ | ④ | ⑤ |
| 7. Because I didn't meet the requirements for the course. | ① | ② | ③ | ④ | ⑤ |
| 8. Because the courses available did not seem interesting. | ① | ② | ③ | ④ | ⑤ |
| 9. Because the course was offered at an inconvenient location. | ① | ② | ③ | ④ | ⑤ |
| 10. Because I couldn't afford the registration or course fees. | ① | ② | ③ | ④ | ⑤ |
| 11. Because I felt I was too old to take the course. | ① | ② | ③ | ④ | ⑤ |
| 12. Because I didn't know about courses available for adults. | ① | ② | ③ | ④ | ⑤ |
| 13. Because of the amount of time required to finish the course. | ① | ② | ③ | ④ | ⑤ |
| 14. Because the course was scheduled at an inconvenient time. | ① | ② | ③ | ④ | ⑤ |
| 15. Because my family did not encourage participation. | ① | ② | ③ | ④ | ⑤ |
| 16. Because of transportation problems. | ① | ② | ③ | ④ | ⑤ |
| 17. Because the courses available were of poor quality. | ① | ② | ③ | ④ | ⑤ |

Go on to next page

ADULT LEARNING QUESTIONNAIRE

Please fill one response for each item. (Fill number '1' if a reason does not apply to you.)

| Reason | Importance | | | | |
|--|------------------|-----------------------|-----------------------|--------------------|-------------------|
| | Not Important | Slightly Important | Somewhat Important | Quite Important | Very Important |
| 18. Because I was not confident of my learning ability. | ① | ② | ③ | ④ | ⑤ |
| 19. Because of family problems. | ① | ② | ③ | ④ | ⑤ |
| 20. Because I'm not that interested in taking courses. | ① | ② | ③ | ④ | ⑤ |
| 21. Because participation would take away from time with my family. | ① | ② | ③ | ④ | ⑤ |
| 22. Because I had trouble arranging for childcare. | ① | ② | ③ | ④ | ⑤ |
| 23. Because the available courses did not seem useful or practical. | ① | ② | ③ | ④ | ⑤ |
| 24. Because I wasn't willing to give up my leisure time. | ① | ② | ③ | ④ | ⑤ |
| 25. Because the course was offered in an unsafe area. | ① | ② | ③ | ④ | ⑤ |
| 26. Because education would not help me in my job. | ① | ② | ③ | ④ | ⑤ |
| 27. Because I felt unprepared for the course. | ① | ② | ③ | ④ | ⑤ |
| 28. Because I couldn't afford miscellaneous expenses like travel, books, etc. | ① | ② | ③ | ④ | ⑤ |
| 29. Because the course was not on the right level for me. | ① | ② | ③ | ④ | ⑤ |
| 30. Because I didn't think I could attend regularly. | ① | ② | ③ | ④ | ⑤ |
| 31. Because my employer would not provide financial assistance or reimbursement. | ① | ② | ③ | ④ | ⑤ |
| 32. Because I didn't think the course would meet my needs. | ① | ② | ③ | ④ | ⑤ |
| 33. Because I prefer to learn on my own. | ① | ② | ③ | ④ | ⑤ |
| 34. Because my friends did not encourage my participation. | ① | ② | ③ | ④ | ⑤ |

APPENDIX F
DEMOGRAPHIC QUESTIONNAIRE

Demographic Questionnaire

Purpose: To learn more about workers who participated in the study.

What to do: Please complete each item by circling choices or writing your answer.

Gender: Please circle your gender. Male Female

Age: Please circle your age range. 18-24 25-34 35-44 45-54 55-64 65+

Current Job: Please print your current job title on the line below.

Work-Related Classes/Training: Please circle the number of classes since high school.

None 1-5 6-10 11-15 16-20 21 or more

Work Licenses and Certificates: Please list your licenses and certificates.

Degrees: Please circle "None" or your highest degree.

None High School Associate Bachelor Master Doctorate

Family Education: Please list the highest degree for each family member, i.e. high school.

Father: _____ Mother: _____
 Brother: _____ Sister: _____
 Husband: _____ Wife: _____
 Son: _____ Daughter: _____

Personal Income Last Year: *Please circle one income range.*

< \$15,000 \$15,000 - \$30,000 \$30,000 - \$45,000 \$45,000 - \$60,000 >\$60,000

Family Income Last Year: *Please circle one income range.*

< \$15,000 \$15,000 - \$30,000 \$30,000 - \$45,000 \$45,000 - \$60,000 >\$60,000

Main Travel Means: *Please circle one travel means.*

Own Car Public Bus Taxi Family/Friend Car Pool Other _____

Computer and Internet Access: *Please identify where you use a computer and Internet.*

Home: Computer / Internet Work: Computer / Internet Other: _____

Life Roles: *Please circle "No" or "Yes" for each role listed below. Answer questions beside the roles that you fill today.*

| | | |
|-----------------|----------|--|
| Business Owner: | No / Yes | Hours per week _____ |
| Employee: | No / Yes | Hours per week _____ |
| Volunteer: | No / Yes | Hours per week _____ |
| Student: | No / Yes | Hours per week _____ |
| Spouse: | No / Yes | |
| Parent: | No / Yes | Age(s) of children _____ |
| Caregiver: | No / Yes | Relation: Mother Father Other |
| Other role(s): | No / Yes | Hours per week _____ Describe _____ |

Race or ethnicity: *Please circle all that apply, or print your race on the line below.*

Black or African American

Hispanic

Asian

American Indian

White or Caucasian

Other(s): _____

APPENDIX G
INFORMATION VALUE SURVEY

Discrete Identifying Code

Information Value Survey

Purpose: To find out if the brochures or video were useful to you.

What to do: Please circle one value for each item using these choices.

| | | |
|--|----------------------|--|
| SD - Strongly Disagree D - Disagree | U - Uncertain | SA - Strongly Agree A - Agree |
|--|----------------------|--|

Brochures:

- | | | | | | |
|--|-----------|----------|----------|----------|-----------|
| 1. I found ideas that I need. | SD | D | U | A | SA |
| 2. I understood the brochure. | SD | D | U | A | SA |
| 3. I would give this brochure to my friends. | SD | D | U | A | SA |

Video:

I did not get the video.

- | | | | | | |
|---|-----------|----------|----------|----------|-----------|
| 1. I found ideas that I need. | SD | D | U | A | SA |
| 2. I understood the video. | SD | D | U | A | SA |
| 3. I would give this video to my friends. | SD | D | U | A | SA |

Please write your ideas below. Use the back if you need more space.

VITA

LISA A. ROW

Darden College of Education
Old Dominion University
Norfolk, Virginia 23529

Education

Ph.D. Education (Occupational & Technical Studies); Old Dominion University; 2007

M.A. National Security and Strategic Studies; Naval War College; 2003 (*with distinction*)

M.A. Teaching (Psychology); Troy State University, Montgomery; 1998

B.S. Psychology; University of Florida; 1983

Teaching Experience

| | |
|---|-----------|
| Graduate Teaching Assistant Old Dominion University, Norfolk, VA | 2004-2005 |
|---|-----------|

| | |
|---|-----------|
| Marine Corps Planning Instructor II Marine Expeditionary Force, Camp Lejeune, NC | 1999-2002 |
|---|-----------|

| | |
|---|-----------|
| Marine Air-Ground Operations Instructor/Faculty Advisor Command and Control Systems Course, Quantico, VA | 1994-1997 |
|---|-----------|

| | |
|---|-----------|
| Series/Company Commander Marine Corps Recruit Depot, Parris Island, SC | 1990-1992 |
|---|-----------|

| | |
|---|-----------|
| Weapons and Tactics Instructor Marine Air Control Squadron 6, Cherry Point, NC | 1988-1990 |
|---|-----------|

Professional Society Memberships

| | |
|---|--------------|
| American Educational Research Association | 2005-Present |
| American Association for Adult & Continuing Education | 2005-Present |
| Phi Kappa Phi Honor Society | Life Member |
| Marine Corps Association | Life Member |

Record of Authorship/Publishing

Row, L. A. (2003). *Achieving Expert-Level Performance from JTF Planners. Advanced Research Project # 3*. Newport, RI: The Center for Naval Warfare Studies.

Row, L. A. (1999). Through the Maelstrom of Three-Block War: Who Shall Lead the Marines? *Marine Corps Gazette*, 83(9), 40-43. Quantico, VA: Marine Corps Association.

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Row, L. A. (1996). Let's Align Doctrine Correctly. *Marine Corps Gazette*, 80(8), 50-51. Quantico, VA: Marine Corps Association.

Academic Honors

Dissertation Fellowship; Old Dominion University; 2006-2007

Graduate Fellowship; Old Dominion University; 2005-2006

Distinguished Graduate; Naval War College; 2003

James Forrestal Award (group award); Naval War College; 2002

Gamma Beta Phi Honor Society; Troy State University, Montgomery; 1998

Distinguished Graduate; Air Command & Staff College; 1998

Dean's Award: Research Excellence in Joint Operations, Air Command & Staff College; 1998

Elihu Rose Teacher-of-the-Year Award, Command & Control Systems School, 1996

Distinguished Honor Graduate; Command & Control Systems Course; 1993

Donald G. Cook Academic Award; Command & Control Systems Course; 1993

MajGen Edson Leadership Award; Command & Control Systems Course; 1993

Leadership Writing Award, Command & Control Systems Course; 1993