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ABSTRACT
                 To investigate the career maturity of welfare
recipients, this thesis examines six independent variables: (1) race;
(2) sex; (3) age; (4) level of formal education; (5) general
intelligence; and (6) locus of control. Scales taken from the Career
Maturity Inventory served as the dependent variables. The sample
consisted of 83 welfare recipients who were eligible for the Job
Opportunities and Basic Skills (JOBS) program in a midwestern state.
Of the 100 comparisons that were made, 30 were for main effects and
70 were for interactions. Results for the main effects indicate that
individuals who possess an internal locus of control are more mature
in decisiveness and orientation, that females are more mature in
involvement than males, and that individuals with general
intelligence (91 to 100) are more mature in compromise. As for the
significant interactions, findings revealed the following positive
correlations: (1) formal education, general intelligence, and locus
of control with Involvement; (2) formal education and age with
Decisiveness; (3) race, sex, and general intelligence with
Independence; and (4) race and sex with Orientation. Five tables and
three figures offer statistical summaries. (RJM)

CAREER MATURITY OF WELFARE RECIPIENTS

being

A Thesis Presented to the Graduate Faculty

of the Fort Hays State University in

Partial Fulfillment of the Requirements for

the Degree of Master of Science

by

Carol M. Beckman

B.S., Fort Hays State University

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Graduate Committee Approval

The Graduate Committee of Carol M. Beckman hereby approves her thesis as meeting partial fulfillment of the requirement for the Degree of Master of Science.

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Date _____

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Abstract

The purpose of the researcher was to investigate the career maturity of welfare recipients. The following six independent variables were investigated: race, sex, age, level of formal education, general intelligence, and locus of control. Dependent variables were scores from the following five scales of the Career Maturity Inventory - Attitude Scale Counseling Form B-1: Decisiveness, Involvement, Independence, Orientation, and Compromise. The sample consisted of 83 welfare recipients who were eligible for the Job Opportunities and Basic Skills (JOBS) program in a midwestern state. Five composite null hypotheses were tested at the .05 level of significance employing a three-way analysis of variance (general linear model).

A total of 100 comparisons were made plus 75 recurring. Of the 100 comparisons made, 30 were for main effects and 70 for interactions. Of the 30 main effects, 6 were statistically significant at the .05 level. Of the 70 interactions, 5 were statistically significant at the .05 level.

The results of the present study appeared to support the following generalizations:

1. individuals with internal locus of control are more mature in Decisiveness,

2. individuals with internal locus of control are more mature in Orientation,

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3. females are more mature in Involvement than males,

4. individuals with general intelligence (91 to 100) are more mature in Orientation,

5. individuals with general intelligence (91 to 100) are more mature in Compromise, and

6. significant interactions for

(a) the independent variables general intelligence and locus of control for the dependent variable Involvement,

(b) the independent variables formal education, general intelligence, and locus of control for the dependent variable Involvement,

(c) the independent variables formal education and age for the dependent variable Decisiveness,

(d) the independent variables race, sex, and general intelligence for the dependent variable Independence, and

(e) the independent variables race and sex for the dependent variable Orientation.

Introduction

Career Maturity

Vocational maturity (career maturity) has been defined as the level of competence people reach and demonstrate when dealing with the tasks and problems associated with vocational development at various life stages (Super & Overstreet, 1960). Vocational development has become known as the process through which people make vocational choices (Super, 1955).

In researching vocational development, Super, et al. (1957) theorized it as being on a continuum that involved both growth and learning. Their theory involved five life stages taken from Charlotte Buehler who wrote about general development. These five stages were: (1) growth from zero to age 14; (2) exploration from 14 to 25; (3) establishment from 25 to 45; (4) maintenance from 45 to anywhere from 55 to 75; and finally, (5) decline, which can start as early as age 55, but generally begins around age 65 until death. Super, et al. (1957) stated:

> If the individual's behavior develops normally, without being arrested, then he will progress from ~ne stage to another with increasing age, although his rate of development, and therefore the age at which he enters the various stages, may differ from that of other individuals. (p. 35)

According to Super et al. (1957), vocational behavior

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and development have three major factors. The first is the roles each person plays. Society places specific sets of expectancies, or roles, on each of its members. The second is personal factors. The following are personal factors: intelligence, special aptitudes, interests, values, attitudes, and personality. The third is situational factors which includes anything external to the individual. The following are examples: socioeconomic status (SES), atmosphere of the home, societal biases, and familial attitudes. Thus, vocational development is a process which takes place on a continuum of time and involves much more than a single vocational choice at a single point in time. Crites (1965) stated, "...vocational choice is a comprehensive, multifaceted, ongoing process which encompasses many interrelated behaviors of the individual at various points in his prework life" (p. 2).

Super (1955) identified five dimensions of vocational maturity. He reported these dimensions as a basis for measuring vocational maturity. The dimensions were the following: (1) Orientation to Vocational Choice, (2) Information and Planning, (3) Consistency of Vocational Preference, (4) Crystallization of Traits and Aptitudes, and (5) Wisdom of Vocational Preference. Crites (1965) proposed that three of these dimensions could be condensed into two dimensions which he labeled the following: (1) choice competencies, and (2) choice attitudes. His theory of

vocational maturity contained four group factors. Two were
Super's (1955), (1) consistency of vocational choice and
(2) wisdom of vocational choice; and two were his own, (3)
choice competencies, and (4) choice attitudes.

The original concept of vocational maturity (career
maturity) was thought to be applicable only to adolescents
according to Super and Kidd (1979). In more recent years,
researchers have started looking at the career maturity of
adults (Super & Kidd, 1979; and Manuele, 1983). Super et
al. (1957) stated, "In judging the normality of one's
behavior from a statistical point of view, one should be
concerned with what group the individual is being compared.
An individual could be considered normal in one group and
abnormal in another" (p. 56).

Welfare Recipients and Career Maturity

Since 1935, many members of American society have
become part of a special group or population known as
welfare recipients. It was in 1935 that the Aid to Families
with Dependent Children (AFDC) program became part of the
Social Security Act, to provide assistance to widows and
children in need (Nightingale, 1989). This special
population has been studied and discussed by many
researchers (Nightingale, 1989; Sklar, 1987; Cull and Hardy,
1973; Randolph & McCarthy, 1991; Rolle, 1977; and Bartlett,
1968) over the years. Various programs have been in place
to aid welfare recipients in gaining needed social services

and help with job search and training needs. According to
Chisman and Woodworth (1992), the current program, Job
Opportunities and Basic Skills (JOBS), was part of the
Family Support Act of 1988. The JOBS program was designed
to assist AFDC recipients to become self-sufficient by
providing the necessary employment related activities and
supportive services. Mandatory components were the
following: (1) educational activities (e.g., high school or
equivalent education, basic and/or remedial education, or
English as a Second Language); (2) job skill training; (3)
job readiness activities (e.g., Job Finder's Club, Life
Skills classes); and (4) job development and placement
activities. The program must also include at least two of
the following components: (1) group or individual job
search; (2) on-the-job training; (3) work supplementation
programs; or (4) community work experience programs (Chisman
& Woodworth). Thus, the program was designed not just to
help welfare recipients find jobs, but to increase their
educational levels and enhance their overall lifestyles.

Furstenberg, Brooks-Gunn, and Morgan (1987) made the
following statement:

> ...there are real life courses characterized by welfare
> dependency, non-marriage, low education, and high
> fertility. Those whose life course takes such a
> trajectory are likely to remain on this path. But if
> they can escape, if they can alter this trajectory by

getting a stable job, entering a stable marriage,

acquiring educational credentials or curtailing

subsequent fertility, they are no more likely than

others to fall back within this trajectory. Moreover,

children benefit as their mother's life situation

improves. (p. 128)

Randolph and McCarthy (1991) reported individuals who

live in poverty have a low self esteem. The low self esteem

results from a feeling of powerlessness and failure to

behave in a traditional or "normal" manner based on

society's expectations. Cull and Hardy (1973) described

people living in poverty as having a "stronger orientation

in the present and in short-term perspective rather than in

long-term planning and goals" (p. 121). They have a

"definite feeling of fatalism and the belief in chances;

impulsiveness and general inability to delay immediate

gratification or make definite plans for the future" (p.

121-122). They have a "thinking process that could be

termed much more concrete in character than abstract" (p.

122). They have:

general feelings of inferiority and an acceptance of

authoritarianism; therefore, when an individual who has

lived in a poverty environment during the formative

years of his growth and development becomes disabled,

the reaction is generally substantially different from

those who have been reared in a middle-class

environment. (p. 122)

Another important characteristic of families in poverty reported by Cull and Hardy (1973) was that they were in constant crises. Families in poverty were described as having a constant lack of financial stability, an increased amount of stress, children getting into trouble, the lack of or loss of employment, and insufficient nutrition and health care. Cull and Hardy stated, "These constant crises have the effect of draining all energy from the family and its members. Such emotionality takes a high toll in terms or overall ability of a family unit or of an individual" (p. 123).

Sklar (1987) pointed out "that between 25 and 75 percent of all long term recipients, who can be classified as employable, are functionally illiterate and lack essential job skills required by employers" (p. 14). Because so many recipients were found to be functionally illiterate and to lack essential job skills, the Family Support Act of 1988 JOBS program focused not only on work requirements, but also on educational needs which included gaining a high school diploma or its equivalent, basic remedial education, vocational education, and in some cases, post-secondary education (Nightingale, 1989).

Rolle (1977) studied the effectiveness of several delivery systems for occupational information to minority college students from low socioeconomic backgrounds. All

226 of his subjects were low-achieving in high school with academic records and Scholastic Aptitude Test scores showing little or no learning potential. The subjects were Black college freshmen enrolled at two predominantly Black colleges in the south. He used a posttest-only control group design. The treatment consisted of three occupational information delivery systems. The systems were described as the following: (1) career logs - records of experiences, perceptions, and reactions to occupational information; (2) career simulations - job related experiences similar to real life; and (3) written occupational briefs - occupational briefs written by subjects in areas of their vocational interest. By using treatment and control groups, he was able to establish through an analysis of variance at the .05 level of confidence that "career planning experiences and occupational explorations can be beneficial in raising career maturity of individuals from disadvantaged/minority groups" (p. 15).

Bartlett (1968) measured the vocational maturity and personality variables of trainees participating in the Manpower Development Training Act, a program designed to train and retrain the unemployed. The sample consisted of 81 female and 69 male subjects ranging in age from 16 to 21. He utilized the Vocational Development Inventory [(VDI), Crites, 1965]; and through the use of a one-way analysis of variance, he found that those trainees who scored higher on

the VDI also scored higher on the following personality variables: self confidence ($F= 5.20$, $p<.01$), achievement ($F=3.88$, $p<.01$), dominance ($F=3.68$, $p<.05$), and autonomy ($F=6.03$, $p<.01$). He also found that those with a higher educational attainment also had a high vocational maturity score ($F=11.21$, $p<.01$). He concluded that the development of vocational behavior was related to the development of mature personality characteristics; and vocational counselors should attempt to facilitate more mature personality characteristics in their counselees.

Race, Sex, Age, Level of Formal Education and Career Maturity

Holland (1981) used a multiple regression analysis to determine the relationships between career maturity and socioeconomic status (SES), race, sex and age in 6th grade students. For a randomly selected sample of 300 students from 22 public schools in Georgia, Holland found SES to be the best predictor of career attitudes ($r=.40$, $p<.01$). The higher the SES, the higher the score on the Career Maturity Inventory - Attitude Scale (CMI-AS). Even though a significant difference ($F=43.96$, $p<.001$) was found between the mean scores of White and Black subjects on the CMI-AS, the author maintained race was not an adequate predictor of career attitudes. When race was paired with SES, a significant multiple correlation coefficient was found ($F=37.24$, $R=.45$, $p<.05$). More specifically, White students

from upper class backgrounds were found to be more career mature, and Black and White students at lower and middle SES had similar career mature attitudes. She did not find sex and age to be significant predictors of career mature attitudes for this adolescent group.

Luzzo (1991) studied the career maturity of 401 undergraduate college students from California State University, Long Beach, in relation to SES and ethnic group. Through a one-way analysis of variance, the researcher found Caucasian-Americans ($\underline{M}$=37.97) to be significantly more career mature than Filipino ($\underline{M}$=33.54) and Asian-American ($\underline{M}$=35.76) students ($\underline{F}$=7.298, $\underline{p}$<.001). No significant difference was found for SES. He concluded that current theories of career development and career counseling need to be more applicable to today's ethnically diverse populations.

Lawrence and Brown (1976) used a multiple regression analysis to gain a better understanding of the relationship of many factors including self concept, SES, race and sex to career maturity as measured by the CMI - Attitude Scale and Competence Test. Their 226 subjects were 12th grade students ranging in age from 16 to 19. For the total group, self concept ($\underline{r}$=.59) and race ($\underline{r}$=.62) were found to be significant predictors of career maturity at the .01 level. They found White students to be more career mature (for Black males vs. White males, $\underline{t}$=-5.86, $\underline{p}$<.01; and for Black

females vs. White females, t=-6.66, p<.01 on the CMI-AS).
No significant differences were found between males and
females.

McNair and Brown (1983) and Lee (1984) found similar
results in their studies. The authors of these studies
investigated ethnic and sex differences in 10th grade
students. Multiple regression analysis in both studies
confirmed that White students scored higher than non-White
students (McNair & Brown, F=29.08, p<.01; Lee, F=37.30,
p<.01). Lee (1984) did not find a significant F value for
males and females; however, McNair and Brown (1983) did find
females scored significantly higher than males on career
maturity (F=4.31, p<.05). Lawrence and Brown (1976), McNair
and Brown (1983), and Lee (1984) all suggested that career
counselors must be more aware of the diverse ethnic
populations with which they work.

Herr and Enderlein (1976) examined the differences in
mean scores on the CMI among 9th, 10th and 12th grade
students and between males and females. Their sample
consisted of 1,553 students from three large nonmetropolitan
schools in Pennsylvania. Through the use of a 3 X 3
analysis of variance with grade level and school being the
factors, the researchers found career maturity did increase
incrementally by grade level (F=46.31, p<.001), but not
without other influences such as school effects, curriculum
choices, and sex differences. The researchers conducted a 2

X 3 analysis of variance with sex and grade as the factors, and found females displayed more career maturity than males at all grade levels (F=51.39, p<.001).

Healy, O'Shea, and Crook (1985) investigated the relation of age and career attitudes in 158 students from a metropolitan California state university. This college only admitted students who ranked in the upper 50th percentile of their high school or who had already achieved an associate degree. The subjects' ages ranged from 18 to 30. They found a positive correlation coefficient (r=.48, p<.01) between career attitudes and age. They also found career attitudes correlated with grade point average (r=.41, p<.01).

Gladstone and Trimmer (1985) investigated the predictors of success for welfare recipients in the Work Incentive (WIN) program in southern Nevada. This welfare reform program was designed to place welfare recipients in training and employment. Gladstone and Trimmer postulated that there were common elements among welfare recipients who were successful (completed training or entered employment) and among those who were not. The sample consisted of 29 volunteer and 27 mandatory participants, all of whom were female. They had a mean age of 27 and an average education level of 11.7. Ethnically, 59% were Black, 37% were White, 3% were Hispanic, and 1% Asian. All had requested training and all needed it. They were all considered "non-job ready"

due to a lack of work history or current work skills. The
researchers did not find school grade completion a good
predictor because often times, even high school graduates
were found to need adult basic education. They found the
average grade level completed was 11.7; however, the average
literacy level as measured by the Basic Occupational
Literacy Test (BOLT) was at a 6th grade achievement level.
Gladstone and Trimmer reported the following:

> Personality traits such as responsibility, self-esteem,
> self-confidence, and independence certainly influence
> one's success or failure in training or employment.
> ...The results of the assessment instruments used in
> this study demonstrate that intelligent and
> discretionary use of testing results in the vocational
> counseling process is effective for predicting success
> or failure in training or employment. (p. 69)

General Intelligence and Career Maturity

Gladstone and Trimmer (1985) obtained a measure of
general intelligence from their sample. They administered
the General Aptitude Test Battery (GATB) which produced a
"G" score, or a measure of general intelligence. The
researchers reported the "G" score as having five functional
levels with Level 1 being the highest and Level 5 being the
lowest. The levels were not defined by the researchers. A
definite relationship was found between "G" scores and
successful completion of training. Gladstone and Trimmer

reported 100% of the subjects with a "G" score at functional Level 1 successfully completed training, 80% at Level 2, 71% at Level 3, 63% at Level 4, and no subjects completed training when their "G" score was at Level 5. "The average 'G' score of those who completed training was 107; and the average for those who did not complete was 89" (p. 64). The authors concluded the "G" score on the GATB can be utilized in predicting success of welfare recipients in training and employment. They stated "personality traits such as responsibility, self esteem, self confidence, and independence certainly influence one's success or failure in training or employment" (p. 69).

Lawrence and Brown (1976) investigated intelligence as a predictor of career maturity. They found intelligence, or general aptitude, to be correlated with career maturity (r=.56, p<.01). They stated, "one should not be surprised to find that the less career mature may be less intellectually bright" (p. 50). Conclusions from Lawrence and Brown indicated separate equations should be utilized with different predictors, such as SES and self concept, depending on sex and race; and intelligence, race and sex had a greater effect on career maturity than SES and self concept. They stated "career maturity as measured by the CMI is highly correlated with intelligence test scores" (p. 51).

Palmo and Lutz (1983) studied the performance of

disadvantaged youth on the CMI and the Wechsler Adult Intelligence Scale (WAIS). The sample consisted of 91 high school dropouts and 29 graduates ranging from age 16 to 22. The researchers found those who scored higher on the WAIS also scored higher on the CMI (r=.51, p<.01). The researchers concluded career maturity and general intelligence were significantly related constructs for disadvantaged populations.

West (1988) looked at the correlation of career maturity and higher academic performance. His subjects were 69 college students; 30 were American Indian, 39 were non-American Indian. Through the use of Pearson product-moment correlations, West found a positive correlation between career maturity and higher academic performance for the total group (r=.3950, p=.030). Through the use of a t-test, he also found a significant difference between mean career maturity scores of the Indian and non-Indian groups for the whole sample (t=2.55, p=.013). The author concluded that ethnic minority students have significantly lower career mature attitudes.

Locus of Control and Career Maturity

Rotter (1966) defined locus of control as the degree to which an individual believes his rewards or reinforcements are a result of his actions, or of fate, luck or chance. In other words, an individual who has an internal locus of control would be more personally involved

in his vocational development and a person with an external
locus of control would be influenced by others or rely on
fate or luck to determine his life course.

Stebbing (1985) studied the effects of locus of control
on the career maturity of 61 undergraduate junior and senior
women from a large southwestern university. Through
regression and correlation analyses, she found locus of
control to be a valid predictor of career maturity ($\underline{r}$=-.31,
$\underline{p}$<.002).

Khan and Alvi (1983), Lokan, Boss, and Patsula (1982),
and Thomas and Carpenter (19⁻3) all investigated locus of
control in relation to career maturity in high school age
students. Even though different instruments were used in
each of the research projects, the researchers reached the
same conclusions. Individuals with an internal locus of
control will generally have a higher level of career
maturity.

Gable, Thompson, and Glanstein (1976) also studied
locus of control and career maturity. Their sample
consisted of 179 volunteer freshmen through senior level
female college students from a New England university.
Through an analysis of variance, the researchers found women
who were more internally controlled were also more career
mature ($\underline{F}$=32.7, $\underline{p}$<.01).

Amster and Lazarus (1982) studied the locus of control
of disadvantaged high school dropouts after conducting a

comprehensive review of the literature regarding the locus
of control of disadvantaged groups. Their review of the
literature did not produce much information about the
subject, and so, the authors conducted their study to obtain
data that could be considered normative. They administered
Rotter's I-E Scale to 197 disadvantaged high school dropouts
ranging in age from 16 to 21. The group had a mean I-E
score 9.95 ($\underline{SD}$=3.1) with a range from 2 to 19. Females in
the group were slightly more external ($\underline{M}$=10.37, $\underline{SD}$=3.05)
than males ($\underline{M}$=9.53, $\underline{SD}$=3.14). The findings indicated no
statistically significant difference for I-E mean scores for
females and males ($\underline{p}$<.09), but were consistent with the
literature regarding the I-E Scale from Rotter (1966).

Rodriguez and Blocher (1988) compared two methods of
increasing career maturity in Puerto Rican college women.
They hypothesized that the career maturity of students
participating in the "modified Adkins Career Choice Modular
Program" would be higher and their locus of control more
internal than that of students who participated in an
alternative career program or a control group. Their
investigation was for a sample of 66 Puerto Rican college
freshmen women who were academically and economically
disadvantaged. Through the use of a multivariate analysis
of covariance the researchers found a significant main
effect for treatment at $\underline{p}$=.008. In other words, traditional
career development interventions produced increases in

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career mature attitudes, and changes in locus of control
also resulted from these interventions. According to
Rodriguez and Blocher, "As people come to believe that they
can control their environments and their own future, career
attitudes may also become more mature" (p. 279).

Summary

The review of the literature assembled here covers
three major areas: (1) an overall view of career maturity;
(2) a description of welfare recipients and the welfare
reform program currently in existence; and (3) studies of
the various predictors of career maturity in different
populations related to race, sex, age, level of formal
education, general intelligence, and locus of control. Just
a few of these studies were similar in nature to the present
study. Bartlett (1968) studied the career maturity of
manpower trainees. His subjects ranged in age from 16 to
21, and were part of a low-income group, but were not
necessarily welfare recipients. Gable, Thompson, and
Glanstein (1976) researched the career maturity of women,
but limited their study to college freshmen through seniors.
Rodriguez and Blocher's (1988) study looked at the career
maturity of an economically disadvantaged group of women,
but again, the group was enrolled in college. Gladstone and
Trimmer (1985) looked at the predictors of success for
welfare recipients involved in a welfare program; however,
they did not look specifically at the career maturity of

welfare recipients. Most previous research of career maturity has been conducted on adolescents or college-age groups. Overall, the results of the studies reviewed indicated an internal locus of control and a higher general intelligence to be consistent predictors of career maturity regardless of race, sex, age, or level of formal education. In terms of race, sex, age, and level of formal education, the results are less conclusive.

In recent years, welfare reform has been a major topic of discussion within the nation. Many authors of the studies cited in this literature review offered the following suggestions for career development programs: (1) counselors need to be more aware of the diverse cultural populations with which they work, (2) counselors need to encourage autonomy and assertiveness in their counselees in order to bring about a more internal locus of control, and (3) individuals from low socioeconomic backgrounds can increase their vocational maturity by receiving occupational information through career planning experiences.

Statement of the Problem

The purpose of the researcher was to investigate the career maturity of welfare recipients.

Rationale and Importance of the Research

The author of the present study researched the special population of welfare recipients with whom many counselors, social workers, and sometimes educational personnel find

themselves working. It is essential for these professionals to have knowledge of techniques and programs that work for welfare recipients and which ones do not. Vocational counselors may need to develop career development programs for welfare recipients. With the results of this study, they can increase their knowledge base from which to build the foundation of such a program.

The current literature available offered little substantial knowledge specifically about career maturity and welfare recipients. The author of the present study incorporated the population of welfare recipients into the already existing body of knowledge regarding career maturity. The author also attempted to clarify race, sex, age, level of formal education, and career maturity for this special population.

Results of the present study may be used by legislators who work on the problem of welfare reform. The factors identified with career maturity in welfare recipients can then be emphasized in future programs. Vocational counselors, social workers, and educational personnel who work in welfare programs, may also find the results of this study helpful. The professionals in the human service field will be able to address specific issues found to be relevant in working with welfare recipients. The following are examples: promoting more internal locus of control and remedial education programs that include enhancements to

develop more mature career attitudes.

The results of the present study provided information pertaining to the following questions:

1. Is there an association between welfare recipients' race and career maturity?

2. Is there an association between welfare recipients' sex and career maturity?

3. Is there an association between welfare recipients' age and career maturity?

4. Is there an association between welfare recipients' level of formal education and career maturity?

5. Is there an association between welfare recipients' general intelligence and career maturity?

6. Is there an association between welfare recipients' locus of control and career maturity?

Composite Null Hypotheses

Each hypothesis was tested at the .05 level of significance.

1. The differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, general intelligence, and locus of control will not be statistically significant.

2. The differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, general

intelligence, and age will not be statistically significant.

3. The differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, locus of control, and age will not be statistically significant.

4. The differences among the m..... .. ....er Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to general intelligence, locus of control, and age will not be statistically significant.

5. The differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to race, sex, and general intelligence will not be statistically significant.

Independent Variables and Rationale

The six independent variables investigated were: (1) race, (2) sex, (3) age, (4) level of formal education, (5) general intelligence, and (6) locus of control. The rationale for the selection of these variables was: (a) no studies were located which dealt specifically with the career maturity of welfare recipients (most of the research regarding career maturity utilized adolescents and college students), (b) many of the studies found were not current, and (c) from the studies reviewed, few were conclusive in determining the effects of race, sex, age, and level of formal education on career maturity.

Definitions of Variables

Independent Variables

The information for the first four independent variables was self reported on the answer sheet for the General Aptitude Test Battery (GATB). Of the remaining two, general intelligence was measured by the GATB; and locus of control was self reported on Rotter's I-E Scale. The following variables were investigated:

1. race - 3 levels (determined post hoc),

   level one, White,

   level two, Black, and

   level three, Hispanic;

2. sex - 2 levels,

   level one, male, and

   level two, female;

3. age - 3 levels, (determined post hoc),

   level one, age 18 to 24,

   level two, age 25 to 31, and

   level three, age 32 to 48;

4. level of formal education - 3 levels (determined post hoc),

   level one, less than high school diploma,

   level two, high school diploma or GED, and

   level three, more than high school diploma;

5. general intelligence - 4 levels (determined post hoc),

level one, G = 80 or below,

level two, G = 81 to 90,

level three, G = 91 to 100, and

level four, G = 101 to 120; and

6. locus of control - 2 levels,

level one, internal - 0 to 10, and

level two, external - 11 to 23.

Dependent Variables

Scores from the following five scales of the Career Maturity Inventory - Attitude Scale Counseling Form B-1 were employed as the dependent variables (five items on the first four scales and eight on the fifth scale were experimental and not used in scoring):

1. Decisiveness - 15 items, possible scores are 0-10;

2. Involvement - 15 items, possible scores are 0-10;

3. Independence - 15 items, possible scores are 0-10;

4. Orientation - 15 items, possible scores are 0-10; and

5. Compromise - 15 items, possible scores are 0-7.

Limitations of the Study

The following conditions might have affected the results of the present study:

1. the sample was not random;

2. the subjects came from one geographical area;

3. th. study was limited to subjects from a single time interval;

4. most of the information was self reported; and

5. sample size.

Methodology

Setting

This study was conducted on welfare recipients who were determined to be eligible for the Job Opportunity and Basic Skills (JOBS) program in a midwestern state. The geographical location included one major city with a population of approximately 310,000, and several smaller communities. The economic base of the area was supported mainly by manufacturing; service (e.g., health care); wholesale and retail trade; transportation, communication and public utilities; finance, insurance and real estate; and construction. In November of 1993, the area had an unemployment rate of 5.9% which was higher than the previous year when it was at 4.6% (Kansas Department of Human Resources, December, 1993). This was due to massive layoffs in 1993 at one of the major aircraft manufacturing plants.

Subjects

The subjects were selected based on their eligibility for the JOBS program. To be eligible for the JOBS program, one must be receiving AFDC (i.e., cash assistance) from the State Department of Social and Rehabilitation Services (SRS). The subjects were identified by their JOBS program casemanagers, and then notified by the casemanagers to report to the researcher's office for a pre-orientation

vocational assessment. Child care assistance and a
transportation allowance was made available to those
subjects who requested it from the SRS JOBS program. The
sample consisted of 83 welfare recipients; 59 females, 24
males; and 64% were White, 30% were Black, and 6% were
Hispanic. The subjects ranged in age from 18 to 48.

Instruments

Three instruments were used. The answer sheet from the
General Aptitude Test Battery (GATB) was used to obtain
information regarding race, sex, age, and level of formal
education. The GATB was used to gain a measure of general
intelligence. The Rotter I-E Scale was used to obtain a
measure of a generalized locus of control. The Career
Maturity Inventory - Attitude Scale Counseling Form B-1 was
used as a measure of career maturity.

General Aptitude Test Battery. The General Aptitude
Test Battery (GATB) was used to measure general
intelligence. This instrument was developed by the United
States Employment Service (USES) and has been used by state
employment offices since 1947. It was normed on a sample
that consisted of 4000 people representative of the working
population of the 1940s which was oriented toward blue-
collar jobs. The GATB measures 9 aptitudes. They are the
following: general intelligence (G), verbal (V), numerical
(N), spatial perception (S), clerical perception (Q), form
perception (P), motor coordination (K), finger dexterity

(F), and manual dexterity (M).

The "G" score is the measure of general intelligence, or general learning ability. It is defined as the ability to reason and make judgements, and is essentially a measure of overall academic ability. It is a combination score obtained from three tests: the spatial perception, verbal ability, and arithmetic reasoning tests. The mean for the "G" score is 100 with a standard deviation of 20. The "G" score correlates highly with both the "V" (r=.84) and the "N" (r=.86) scores (no p value was reported). The "G" score may be used as a guideline in predicting success in training. A minimum "G" score of 100 may predict success for junior college; 110 for a four-year college; and 120 for graduate or professional school (U.S. Department of Labor, Manpower Administration, 1979).

The General Aptitude Test Battery is a widely known and used multiple aptitude battery and has been well established with numerous studies of validity and reliability. One study, conducted in 1954 by the Pennsylvania Agency, had a sample which consisted of 95 males and 85 females. Subjects were initially tested on Form A of the GATB, and then retested on Form B one week later. The correlation coefficient for the "G" score was reported at r=.92 for males, and r=.90 for females. Another study was conducted between 1956 and 1958 and included data from five states. The total sample consisted of 168 males and 155 females.

Individuals were initially tested on Form B of the GATB, and then retested on the same form two weeks later. The correlation coefficient reported for the "G" score was r=.94 for both males and females (U.S. Department of Labor, Manpower Administration, 1979).

Rotter's I-E Scale. Rotter's I-E scale was used to measure the construct of locus of control. This scale was devised by Rotter (1966), and, according to Stebbing (1985), is one of the most widely used instruments for measuring a person's internal or external orientation. The I-E scale is a forced-choice, 29-item, self-report instrument. The 29 items include 6 filler statements to make the purpose of the test remain somewhat unclear to the test taker. The score is reported in terms of the total number of *external* choices and can range from 0 to 23. Therefore, a low score indicates a more internal locus of control, and a high score signifies a more external orientation. The scale's internal consistency has been determined by a Kuder-Richardson reliability coefficient of r=.73; and its test-retest reliability coefficient for one month has been reported at r=.72 (Rotter, 1966).

Rotter (1966) reported correlation coefficients between each item of the instrument and total score. These values were cited in Appendix A.

Career Maturity Inventory - Attitude Scale Counseling Form B-1. The Career Maturity Inventory - Attitude Scale

Counseling Form B-1 was used to measure career maturity.
This instrument was constructed by Crites (1978a) and,
according to Palmo and Lutz (1983), is one of the most
widely used measures of career maturity. Form B-1 of the
attitude scale consists of 75 true-false items, 50 of which
are from the original Form A-1, and 25 are new items. Form
B-1 consists of the following five scales: Decisiveness,
Involvement, Independence, Orientation, and Compromise.
Possible scores on each of the scales is 0 to 10, except on
the Compromise scale. Possible scores are 0 to 7 for the
Compromise scale. It takes about 20 minutes to administer
Form B-1 of the Career Maturity Inventory - Attitude Scale.
This instrument was designed to elicit "the feelings, the
subjective reactions, the dispositions that the individual
has toward making a career choice and entering the world of
work" (Crites, 1978a, p. 3). Crites (1978b) reported Kuder-
Richardson (KR) 20 reliability coefficients which ranged
from .72 to .90. Internal consistency coefficients for the
five sub-scales on Form B-1 were the following:
Decisiveness, r=.67; Involvement, r=.62; Independence,
r=.71; Orientation, r=.72; and Compromise, r=.50 (1978b).

Design

A status survey factorial design was employed. The
independent variables utilized were: (a) race, (b) sex, (c)
age, (d) level of formal education, (e) general
intelligence, and (f) locus of control. The dependent

variables were scores from the following five scales of the
Career Maturity Inventory - Attitude Scale Counseling Form
B-1: Decisiveness, Involvement, Independence, Orientation,
and Compromise. The sample consisted of 83 subjects; 59
were female, 24 were male.

The following design was used with each composite null
hypothesis:

composite null hypothesis number 1, a 3 X 4 X 2
factorial design;

composite null hypothesis number 2, a 3 X 4 X 3
factorial design;

composite null hypothesis number 3, a 3 X 2 X 3
factorial design;

composite null hypothesis number 4, a 4 X 2 X 3
factorial design; and

composite null hypothesis number 5, a 3 X 2 X 4
factorial design.

McMillan and Schumacher (1984) cited 10 threats to
internal validity. The 10 threats were dealt with in the
following ways:

1. history - did not pertain because the present
study was a status survey;

2. selection - all welfare recipients asked to
participate who came and completed instruments were
included;

3. statistical regression - did not pertain because

the present study was a status survey;

4. testing - did not pertain because the present study was a status survey;

5. instrumentation - did not pertain because the present study was a status survey;

6. mortality - did not pertain because the present study was a status survey;

7. maturation - did not pertain because the present study was a status survey;

8. diffusion of treatment - did not pertain because the present study was a status survey;

9. experimenter bias - the same oral instructions were given by the researcher to all groups during the administration of the instruments and no treatment was administered; and

10. statistical conclusion - two mathematical assumptions were violated (random sample and equal numbers of subjects in cells). The general linear model was used to correct for unequal numbers of subjects in cells, and the researcher did not project beyond the statistical procedures employed.

McMillan and Schumacher (1984) cited 2 threats to external validity. The 2 threats were dealt with in the following ways:

1. population external validity - the sample was not random; therefore, the results should be generalized only to

groups similar to the sample; and

2. ecological external validity - the data were collected by standard procedures and there was no treatment.

Data Collection Procedures

The researcher contacted the director of the Employment Preparation Services (EPS), which administers the Job Opportunities and Basic Skills (JOBS) program, to request permission to use data from pre-orientation vocational assessment sessions conducted with welfare recipients who were determined to be eligible for the JOBS program (Appendix B). The names of those welfare recipients who were determined eligible for the JOBS program were placed on schedules for the pre-orientation vocational assessment sessions by their JOBS program casemanager. The recipients whose names were on the schedules were notified by their SRS casemanagers to report to the researcher's office on a specified date and time (Appendix C).

The researcher administered the instruments in the same order to each of the groups of recipients (Appendix D). The size of the groups varied from 3 to 10 subjects. The subjects were informed at a later time that parts of the assessment were used for research purposes. The researcher collected the answer sheets for each of the assessments, and then the answer sheets for the GATB were mailed to the State Department of Human Resources for machine scoring. When the scored aptitude tests had been returned to the researcher,

all data were assembled, necessary coding was made, and the
data were sent to the Fort State University Computer Center
for data analysis.

Research Procedures

The following steps were implemented in the present
study:

1. a research topic was selected;

2. related literature was obtained through data base
searches (i.e., ERIC, PSYCHLIT, Social Science Index, and
Thesis Abstracts from Ablah Library at The Wichita State
University, Wichita, Kansas);

3. resources were reviewed;

4. instruments were selected;

5. permission was obtained from the Department of
Social and Rehabilitation Services to utilize data generated
from pre-orientation vocational assessment sessions
conducted with welfare recipients in the JOBS program;

6. the Career Maturity Inventory - Attitude Scale
Counseling Form B-1 was obtained from Chronical Guidance
Publishers in Moravia, NY.

7. research proposal was written;

8. proposal was defended before the thesis committee;

9. data were collected;

10. data were analyzed;

11. final document was written;

12. completed document was defended before the thesis

committee; and

    13.   final editing of the thesis.

Data Analysis

    The following were compiled:

    1.   appropriate descriptive statistics;

    2.   three-way analysis of variance (general linear model);

    3.   Bonferroni (Dunn) t test for means; and

    4.   Duncan's multiple-range test for means.

Results

The purpose of the researcher was to investigate the career maturity of welfare recipients. The following independent variables were investigated: race, sex, age, level of formal education, general intelligence, and locus of control. The dependent variables were scores from the following five scales of the Career Maturity Inventory - Attitude Scale Counseling Form B-1: Decisiveness, Involvement, Independence, Orientation, and Compromise. The sample consisted of 83 welfare recipients who were eligible for the Job Opportunities and Basic Skills (JOBS) program in a midwestern state. Five composite null hypotheses were tested at the .05 level of significance employing a three-way analysis of variance (general linear model). A status survey factorial design was employed. The following design was used with each composite null hypothesis:

composite null hypothesis number 1, a 3 X 4 X 2 factorial design;

composite null hypothesis number 2, a 3 X 4 X 3 factorial design;

composite null hypothesis number 3, a 3 X 2 X 3 factorial design;

composite null hypothesis number 4, a 4 X 2 X 3 factorial design; and

composite null hypothesis number 5, a 3 X 2 X 4 factorial design.

The results section was organized according to composite null hypotheses for ease of reference. Information pertaining to each composite null hypothesis was presented in a common format for ease of comparison.

It was hypothesized in composite null hypothesis number 1 that the differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, general intelligence, and locus of control would not be statistically significant. Information pertaining to composite null hypothesis number 1 was presented in Table 1. The following were cited in Table 1: variables, group sizes, means, standard deviations, F values, and p levels.

Table 1: A Comparison of Mean Career Maturity Inventory Attitude Scale Counseling Form B-1 Scores for Welfare Recipients According to Level of Formal Education, General Intelligence, and Locus of Control Employing a Three-Way Analysis of Variance

Variable	n	M^*	S	F value	p level
Decisiveness[**]					
Formal Education (A)					
< H.S. diploma	38	5.2	2.02		
H.S. diploma/GED	35	5.0	2.15	0.23	.7984
> H.S. diploma	10	5.6	2.67		
General Intelligence (B)					
80 or below	16	4.8	1.88		
81 to 90	24	4.8	2.40		
91 to 100	26	5.6	2.06	1.52	.2169
101 to 120	17	5.4	2.15		
Locus of Control (C)					
Internal	40	5.8	2.18		
External	43	4.6	1.96	0.77	.3848
Interactions					
A X B				1.59	.1770
A X C				2.14	.1260
B X C				1.62	.1941
A X B X C				0.91	.4662

(continued)

Table 1 (continued)

Variable	n	M	S	F value	p level
Involvement					
Formal Education (A)					
< H.S. diploma	38	8.1	1.73		
H.S. diploma/GED	35	8.6	1.70	0.90	.4131
> H.S. diploma	10	8.6	1.51		
General Intelligence (B)					
80 or below	16	7.3	2.47		
81 to 90	24	8.3	1.43		
				1.42	.2450
91 to 100	26	6.7	1.26		
101 to 120	17	9.1	1.27		
Locus of Control (C)					
Internal	40	8.8	1.32		
				3.76	.0571
External	43	8.1	1.93		
Interactions					
A X B				1.21	.3158
A X C				0.61	.5476
B X C				3.28	.0266
A X B X C				2.80	.0334

(continued)

Table 1 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	F value	$\underline{p}$ level
Independence					
Formal Education (A)					
< H.S. diploma	38	8.8	1.69		
H.S. diploma/GED	35	8.7	1.38	0.33	.7182
> H.S. diploma	10	8.9	0.99		
General Intelligence (B)					
80 or below	16	8.4	1.63		
81 to 90	24	9.2	1.37	1.07	.3684
91 to 100	26	8.7	1.61		
101 to 120	17	8.8	1.25		
Locus of Control (C)					
Internal	40	9.0	1.31	2.37	.1285
External	43	8.6	1.62		
Interactions					
A X B				0.54	.7461
A X C				0.07	.9344
B X C				2.44	.0727
A X B X C				0.88	.4803

(continued)

Table 1 (continued)

Variable	n	M	S	F value	p level
		Orientation			
Formal Education (A)					
< H.S. diploma	38	6.2	2.31		
H.S. diploma/GED	35	6.7	2.17	0.45	.6408
> H.S. diploma	10	7.3	2.45		
General Intelligence (B)					
80 or below	16	5.6	2.58		
81 to 90	24	6.6	1.81		
91 to 100	26	7.0	2.51	0.82	.4904
101 to 120	17	6.6	2.06		
Locus of Control (C)					
Internal	40	7.1	2.26		
External	43	6.0	2.17	2.86	.0957
		Interactions			
A X B				1.66	.1573
A X C				0.40	.6690
B X C				1.32	.2763
A X B X C				0.70	.5959

(continued)

Table 1 (continued)

Variable	n	M	S	F value	p level
		Compromise			
Formal Education (A)					
< H.S. diploma	38	4.9	1.54		
H.S. diploma/GED	35	5.0	1.20	0.05	.9547
> H.S. diploma	10	5.3	1.83		
General Intelligence (B)					
80 or below	16	4.4	1.50		
81 to 90	24	4.8	1.69	1.22	.3115
91 to 100	26	5.4	1.14		
101 to 120	17	5.2	1.24		
Locus of Control (C)					
Internal	40	5.3	1.33	0.15	.7019
External	43	4.7	1.47		
		Interactions			
A X B				0.84	.5250
A X C				1.86	.1648
B X C				0.80	.4994
A X B X C				0.62	.6498

* The larger the value, the greater the career maturity.
** Possible scores: Decisiveness (0-10), Involvement (0-10),
Independence (0-10), Orientation (0-10), and Compromise (0-7).

Two of the 35 p values were statistically significant at the .05 level; therefore, the null hypotheses for these comparisons were rejected. The statistically significant comparisons were for interactions. The following interactions were statistically significant:

1. the independent variables general intelligence and locus of control for the dependent variable Involvement, and

2. the independent variables formal education, general intelligence, and locus of control for the dependent variable Involvement.

The interaction between the independent variables general intelligence and locus of control for the dependent variable Involvement was depicted in a profile plot. Figure 1 contains mean Involvement scores and curves for locus of control.

Figure 1:   The Interaction Between the Independent Variables
General Intelligence and Locus of Control for the Dependent
Variable Involvement

Locus of Control
Internal⇒————
External⇒———————
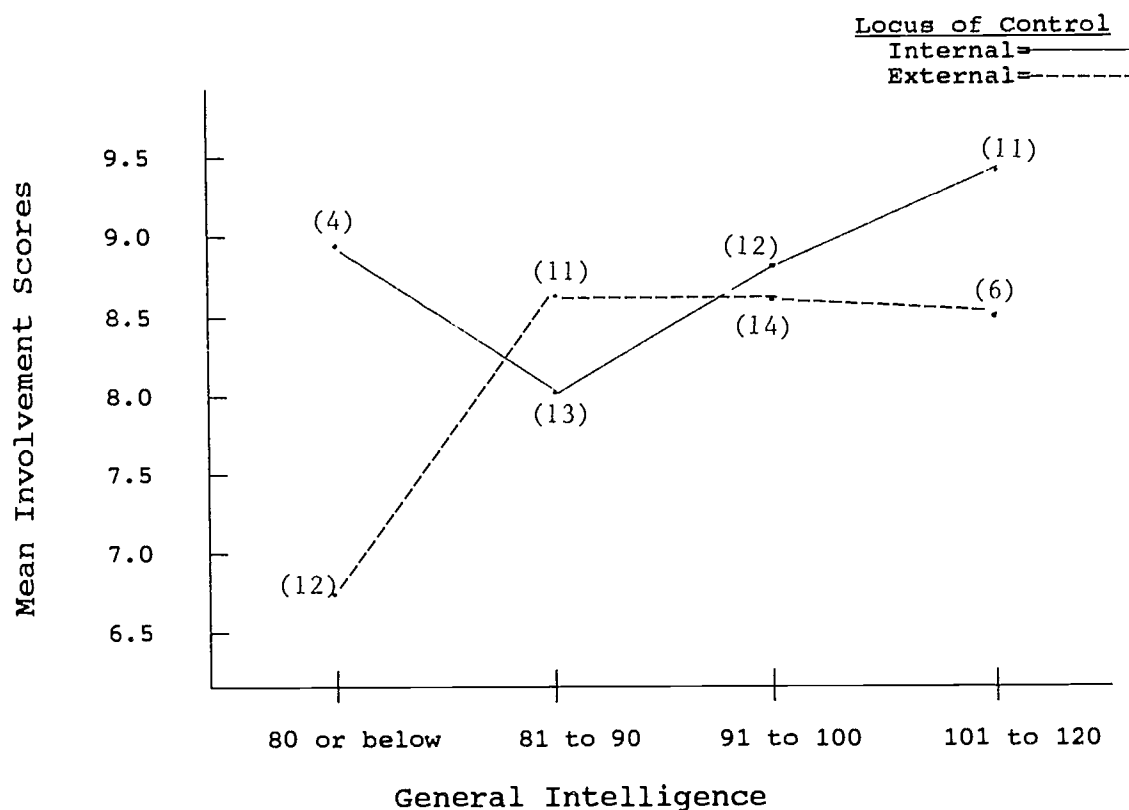
The interaction between the independent variables
general intelligence and locus of control for the dependent
variable Involvement was disordinal.   The results cited in
Figure 1 indicated the following:

1.   individuals with internal locus of control and
general intelligence of 101 to 120 had numerically the
largest mean Involvement scores of any subgroup, and

2.   individuals with external locus of control and
general intelligence of 80 or below had numerically the

smallest mean Involvement scores of any subgroup.

The interaction among the independent variables formal education, general intelligence, and locus of control for the dependent variable Involvement was not depicted in a profile plot. The interaction was not presented in a figure due to the sample size and the nature of the data.

It was hypothesized in composite null hypothesis number 2 that the differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, general intelligence, and age would not be statistically significant. Information pertaining to composite null hypothesis number 2 was presented in Table 2. The following were cited in Table 2: variables, group sizes, means, standard deviations, F values, and p levels.

Table 2: A Comparison of Mean Career Maturity Inventory
Attitude Scale Counseling Form B-1 Scores for Welfare
Recipients According to Level of Formal Education, General
Intelligence, and Age Employing a Three-Way Analysis of
Variance

Variable	n	M[*]	S	F value	p level
Decisiveness[**]					
Formal Education (A)					
< H.S. diploma	38	5.2	2.02		
H.S. diploma/GED	35	5.0	2.15	0.17	.8407
> H.S. diploma	10	5.6	2.67		
General Intelligence (B)					
80 or below	16	4.8	1.88		
81 to 90	24	4.8	2.40		
91 to 100	26	5.6	2.06	0.27	.8501
101 to 120	17	5.4	2.15		
Age (D)					
18 to 24	33	4.8	2.17		
25 to 31	32	5.2	2.24	0.36	.7014
32 to 48	18	5.7	1.87		
Interactions					
A X B				0.65	.6624
A X D				1.94	.1178
B X D				1.06	.3985
A X B X D				0.55	.7666

(continued)

Table 2 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Involvement					
Formal Education (A)					
< H.S. diploma	38	8.1	1.73		
H.S. diploma/GED	35	8.6	1.70	0.85	.4348
> H.S. diploma	10	8.6	1.51		
General Intelligence (B)					
80 or below	16	7.3	2.47		
81 to 90	24	8.3	1.43		
91 to 100	26	8.7	1.26	1.28	.2901
101 to 120	17	9.1	1.27		
Age (D)					
18 to 24	33	8.4	1.76		
25 to 31	32	8.4	1.44	0.95	.3941
32 to 48	18	8.4	2.03		
Interactions					
A X B				0.17	.9720
A X D				1.15	.3410
B X D				0.14	.9905
A X B X D				1.38	.2378

(continued)

Table 2 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Independence					
<u>Formal Education</u> (A)					
< H.S. diploma	38	8.8	1.69		
H.S. diploma/GED	35	8.7	1.38	0.07	.9316
> H.S. diploma	10	8.9	0.99		
<u>General Intelligence</u> (B)					
80 or below	16	8.4	1.63		
81 to 90	24	9.2	1.37		
91 to 100	26	8.7	1.61	0.72	.5467
101 to 120	17	8.8	1.25		
<u>Age</u> (D)					
18 to 24	33	8.9	1.54		
25 to 31	32	8.8	1.52	0.42	.6594
32 to 48	18	8.7	1.36		
Interactions					
A X B				0.27	.9259
A X D				0.28	.8916
B X D				0.60	.7266
A X B X D				0.74	.6171

(continued)

Table 2 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Orientation					
Formal Education (A)					
< H.S. diploma	38	6.2	2.31		
H.S. diploma	35	6.7	2.17	0.32	.7305
> H.S. diploma	10	7.3	2.45		
General Intelligence (B)					
80 or below	16	5.6	2.58		
81 to 90	24	6.6	1.81		
91 to 100	26	7.0	2.51	1.55	.2124
101 to 120	17	6.6	2.06		
Age (D)					
18 to 24	33	6.2	2.33		
25 to 31	32	6.8	2.13	0.09	.9120
32 to 48	18	6.9	2.39		
Interactions					
A X B				1.79	.1302
A X D				1.60	.1872
B X D				0.90	.4994
A X B X D				1.15	.3488

(continued)

Table 2 (continued)

Variable	n	M	S	F value	p level
Compromise					
Formal Education (A)					
< H.S. diploma	38	4.9	1.54		
H.S. diploma/GED	35	5.0	1.20	0.02	.9818
> H.S. diploma	10	5.3	1.83		
General Intelligence (B)					
80 or below	16	4.4	1.50		
81 to 90	24	4.8	1.69		
91 to 100	26	5.4	1.14	1.10	.3560
101 to 120	17	5.2	1.24		
Age (D)					
18 to 24	33	4.9	1.35		
25 to 31	32	5.1	1.50	0.25	.7809
31 to 48	18	4.9	1.51		
Interactions					
A X B				0.50	.7747
A X D				0.84	.5066
B X D				0.32	.9254
A X B X D				0.30	.9343

* The larger the value, the greater the career maturity.
** Possible scores: Decisiveness (0-10), Involvement (0-10), Independence (0-10), Orientation (0-10), and Compromise (0-7).

None of the 35 p values were statistically significant at the .05 level; therefore, the null hypotheses for these comparisons were retained. The results cited in Table 2 indicated no associations between independent and dependent variables.

It was hypothesized in composite null hypothesis number 3 that the differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to level of formal education, locus of control, and age would not be statistically significant. Information pertaining to composite null hypothesis number 3 was presented in Table 3. The following were cited in Table 3: variables, group sizes, means, standard deviations, F values, and p levels.

Table 3: A Comparison of Mean Career Maturity Inventory
Attitude Scale Counseling Form B-1 Scores for Welfare
Recipients According to Level of Formal Education, Locus of
Control, and Age Employing a Three-Way Analysis of Variance

Variable	n	M*	S	F value	p level
Decisiveness**					
Formal Education (A)					
< H.S. diploma	38	5.2	2.02		
H.S. diploma/GED	35	5.0	2.15	0.56	.5744
> H.S. diploma	10	5.6	2.67		
Locus of Control (C)					
Internal	40	5.8	2.18	1.30	.2591
External	43	4.6	1.96		
Age (D)					
18 to 24	33	4.8	2.17		
25 to 31	32	5.2	2.24	0.12	.8846
32 to 48	18	5.7	1.87		
Interactions					
A X C				0.72	.4903
A X D				2.61	.0435
C X D				1.31	.2757
A X C X D				1.11	.3501

(continued)

Table 3 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Involvement					
Formal Education (A)					
< H.S. diploma	38	8.1	1.73		
H.S. diploma/GED	35	8.6	1.70	0.50	.6077
> H.S. diploma	10	8.6	1.51		
Locus of Control (C)					
Internal	40	8.8	1.32	1.60	.2110
External	43	8.1	1.93		
Age (D)					
18 to 24	33	8.4	1.76		
25 to 31	32	8.4	1.44	0.68	.5090
32 to 48	18	8.4	2.03		
Interactions					
A X C				0.07	.9370
A X D				1.38	.2501
C X D				0.01	.9882
A X C X D				0.40	.7566

Table 3 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Independence					
Formal Education (A)					
< H.S. diploma	38	8.8	1.69		
H.S. diploma/GED	35	8.7	1.38	0.08	.9241
> H.S. diploma	10	8.9	0.99		
Locus of Control (C)					
Internal	40	9.0	1.31		
External	43	8.6	1.62	0.21	.6459
Age (D)					
18 to 24	33	8.9	1.54		
25 to 31	32	8.8	1.52	0.61	.5479
32 to 48	18	8.7	1.36		
Interactions					
A X C				1.19	.3094
A X D				0.15	.9624
C X D				0.22	.8042
A X C X D				0.96	.4151

(continued)

Table 3 (continued)

Variable	n	M	S	F value	p level

Orientation

Formal Education (A)

< H.S. diploma	38	6.2	2.31		
H.S. diploma/GED	35	6.7	2.17	1.97	.1472
> H.S. diploma	10	7.3	2.45		

Locus of Control (C)

Internal	40	7.1	2.26	2.04	.1577
External	43	6.0	2.17		

Age (D)

18 to 24	33	6.2	2.33		
25 to 31	32	6.8	2.13	0.32	.7253
32 to 48	18	6.9	2.39		

Interactions

	F value	p level
A X C	0.40	.6693
A X D	1.21	.3144
C X D	0.66	.5180
A X C X D	0.12	.9484

(continued)

Table 3 (continued)

Variable	n	M	S	F value	p level
		Compromise			
Formal Education (A)					
< H.S. diploma	38	4.9	1.54		
H.S. diploma/GED	35	5.0	1.20	0.55	.5811
> H.S. diploma	10	5.3	1.83		
Locus of Control (C)					
Internal	40	5.3	1.33		
				0.17	.6778
External	43	4.7	1.47		
Age (D)					
18 to 24	33	4.9	1.35		
25 to 31	32	5.1	1.50	0.45	.6372
32 to 48	18	4.9	1.51		
		Interactions			
A X C				1.36	.2625
A X D				1.90	.1202
C X D				0.27	.7632
A X C X D				1.51	.2213

* The larger the value, the greater the career maturity.
** Possible scores: Decisiveness (0-10), Involvement (0-10),
Independence (0-10), Orientation (0-10), and Compromise (0-7).

One of the 35 p values was statistically significant at the .05 level; therefore, the null hypothesis for this comparison was rejected. The statistically significant comparison was for the interaction between independent variables formal education and age for the dependent variable Decisiveness.

The interaction between independent variables formal education and age for the dependent variable Decisiveness was depicted in a profile plot. Figure 2 contains mean Decisiveness scores and curves for age.

Figure 2:   The Interaction Between the Independent Variable
Formal Education and Age for the Dependent Variable
Decisiveness
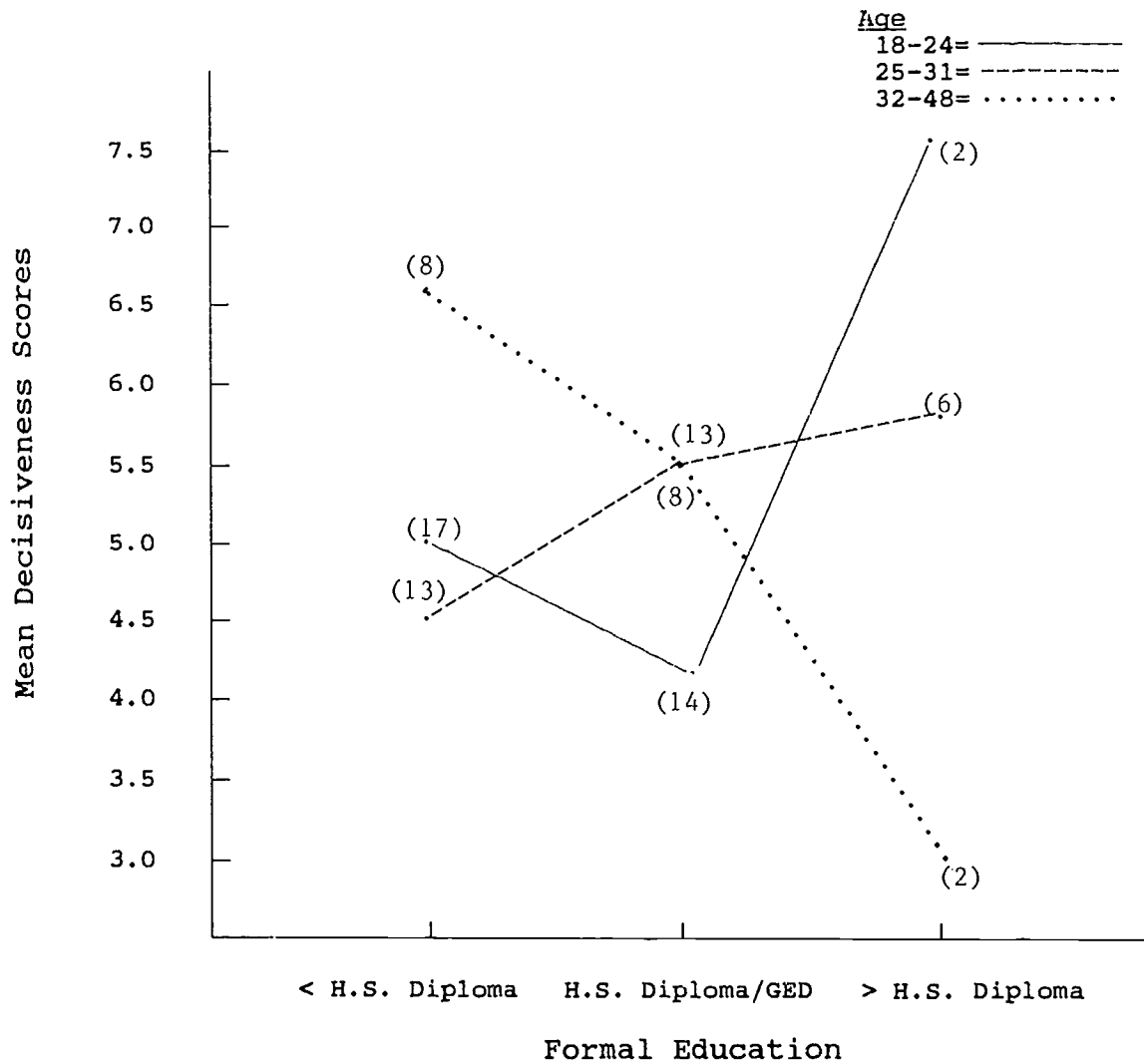
The interaction between the independent variables
formal education and age for the dependent variable
Decisiveness was disordinal. The results cited in Figure 2
indicated the following:

1.   i.dividuals age 18 to 24 with formal education of

more than a high school diploma had numerically the largest

mean Decisiveness score of any subgroup, and

2.   individuals age 32 to 48 with formal education of

more than a high school diploma had numerically the smallest

mean Decisiveness score of any subgroup.

It was hypothesized in composite null hypothesis number

4 that the differences among the mean Career Maturity

Inventory - Attitude Scale Counseling Form B-1 scores

according to level of general intelligence, locus of

control, and age would not be statistically significant.

Information pertaining to composite null hypothesis number 4

was presented in Table 4.   The following were cited in Table

4:   variables, group sizes, means, standard deviations, F

values, and p levels.

Table 4: A Comparison of Mean Career Maturity Inventory
Attitude Scale Counseling Form B-1 Scores for Welfare
Recipients According to General Intelligence, Locus of
Control, and Age Employing a Three-Way Analysis of Variance

Variable	$\underline{n}$	$\underline{M}^*$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Decisiveness**					
General Intelligence (B)					
80 or below	16	4.8	1.88		
81 to 90	24	4.8	2.40		
91 to 100	26	5.6	2.06	0.64	.5934
101 to 120	17	5.4	2.15		
Locus of Control (C)					
Internal	40	5.8[a]	2.18		
External	43	4.6[b]	1.96	5.63	.0209
Age (D)					
18 to 24	33	4.8	2.17		
25 to 31	32	5.2	2.24	0.95	.3939
32 to 48	18	5.7	1.87		
Interactions					
B X C				0.97	.4128
B X D				1.02	.4221
C X D				0.76	.4707
B X C X D				0.15	.9796

(continued)

Table 4 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level

<u>Involvement</u>

<u>General Intelligence</u> (B)

80 or below	16	7.3	2.47		
81 to 90	24	8.3	1.43		
91 to 100	26	8.7	1.26	1.01	.3964
101 to 120	17	9.1	1.27		

<u>Locus of Control</u> (C)

Internal	40	8.8	2.18		
External	43	8.1	1.96	2.54	.1160

<u>Age</u> (D)

18 to 24	33	8.4	1.76		
25 to 31	32	8.4	1.44	0.31	.7347
32 to 48	18	8.4	2.03		

<u>Interactions</u>

B X C	2.37	.0796
B X D	0.39	.8804
C X D	0.66	.5202
B X C X D	0.39	.8570

(continued)

Table 4 (continued)

Variable	n	M	S	F value	p level
Independence					
General Intelligence (B)					
80 or below	16	8.4	1.63		
81 to 90	24	9.2	1.37	0.69	.5628
91 to 100	26	8.7	1.61		
101 to 120	17	8.8	1.25		
Locus of Control (C)					
Internal	40	9.0	1.31	1.84	.1800
External	43	8.6	1.62		
Age (D)					
18 to 24	33	8.9	1.54		
25 to 31	32	8.8	1.52	0.78	.4618
32 to 48	18	8.7	1.36		
Interactions					
B X C				2.17	.1009
B X D				0.84	.5411
C X D				0.49	.6162
B X C X D				0.67	.6513

(continued)

Table 4 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value $\underline{p}$ level

Orientation

General Intelligence (B)

80 or below	16	5.6	2.58	
81 to 90	24	6.6	1.81	0.85 .4744
91 to 100	26	7.0	2.51	
101 to 120	17	6.6	2.06	

Locus of Control (C)

Internal	40	7.1[a]	2.26	6.67 .0122
External	43	6.0[b]	2.17	

Age (D)

18 to 24	33	6.2	2.33	
25 to 31	32	6.8	2.13	0.71 .4962
32 to 48	18	6.9	2.39	

Interactions

B X C	1.23	.3058
B X D	0.95	.4700
C X D	0.70	.4983
B X C X D	0.42	.8314

(continued)

Table 4 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Compromise					
General Intelligence (B)					
80 or below	16	4.4	1.50		
81 to 90	24	4.8	1.69	1.07	.3667
91 to 100	26	5.4	1.14		
101 to 120	17	5.2	1.24		
Locus of Control (C)					
Internal	40	5.3	1.33	3.47	.0676
External	43	4.7	1.47		
Age (D)					
18 to 24	33	4.9	1.35		
25 to 31	32	5.1	1.50	0.14	.8668
32 to 48	18	4.9	1.51		
Interactions					
B X C				0.32	.8134
B X D				0.35	.9059
C X D				0.48	.6194
B X C X D				0.45	.8143

* The larger the value, the greater the career maturity.
** Possible scores: Decisiveness (0-10), Involvement (0-10), Independence (0-10), Orientation (0-10), and Compromise (0-7).
ab Difference statistically significant at the .05 level according to Bonferroni (Dunn) $\underline{t}$ test for means.

Two of the 35 p values were statistically significant at the .05 level; therefore, the null hypotheses for these comparisons were rejected. The statistically significant comparisons were for main effects. The following main effects were statistically significant:

1. the independent variable locus of control for the dependent variable Decisiveness, and

2. the independent variable locus of control for the dependent variable Orientation.

The results in Table 4 indicated the following for main effects:

1. individuals with internal locus of control had a statistically larger mean Decisiveness score than those with external locus of control, and

2. individuals with internal locus of control had a statistically larger mean Orientation score than those with external locus of control.

It was hypothesized in composite null hypothesis number 5 that the differences among the mean Career Maturity Inventory - Attitude Scale Counseling Form B-1 scores according to race, sex, and general intelligence would not be statistically significant. Information pertaining to composite null hypothesis number 5 was presented in Table 5. The following were cited in Table 5: variables, group sizes, means, standard deviations, F values, and p levels.

Table 5: A Comparison of Mean Career Maturity Inventory
Attitude Scale Counseling Form B-1 Scores for Welfare
Recipients According to Race, Sex, and General Intelligence
Employing a Three-Way Analysis of Variance

Variable	$\underline{n}$	$\underline{M}^*$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Decisiveness**					
Race (E)					
White	53	5.0	2.22		
Black	25	5.4	2.08	1.21	.3042
Hispanic	5	5.2	1.79		
Sex (F)					
Male	24	5.6	2.34		
Female	59	5.0	2.05	0.22	.6438
General Intelligence (B)					
80 or below	16	4.8	1.88		
81 to 90	24	4.8	2.40		
91 to 100	26	5.6	2.06	1.51	.2197
101 to 120	17	5.4	2.15		
Interactions					
E X F				0.00	.9947
E X B				0.57	.7244
F X B				0.56	.6412
E X F X B				1.08	.3032

(continued)

Table 5 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Involvement					
Race (E)					
White	53	8.5	1.77		
Black	25	8.2	1.55	0.11	.8930
Hispanic	5	7.8	1.48		
Sex (F)					
Male	24	7.8[a]	2.01	9.62	.0028
Female	59	8.7[b]	2.48		
General Intelligence (B)					
80 or below	16	7.3[a]	2.47		
81 to 90	24	8.3	1.43	3.59	.0181
91 to 100	26	8.7[b]	1.26		
101 to 120	17	9.1[b]	1.27		
Interactions					
E X F				0.08	.7822
E X B				0.96	.4509
F X B				2.15	.1021
E X F X B				0.00	.9840

(continued)

Table 5 (continued)

Variable	n	M	S	F value	p level
Independence					
Race (E)					
White	53	8.5	1.65		
Black	25	8.2	0.86	0.94	.3977
Hispanic	5	7.8	1.52		
Sex (F)					
Male	24	7.8	1.82	0.62	.4349
Female	59	8.7	1.31		
General Intelligence (B)					
80 or below	16	7.3	1.63		
81 to 90	24	8.3	1.37	1.12	.3472
91 to 100	26	8.7	1.61		
101 to 120	17	9.1	1.25		
Interactions					
E X F				0.73	.5363
E X B				1.16	.3406
F X B				0.85	.4738
E X F X B				5.14	.0268

(continued)

Table 5 (continued)

Variable	n	M	S	F value	p level
Orientation					
Race (E)					
White	53	6.1	2.25		
Black	25	7.6	2.06	1.25	.2929
Hispanic	5	6.6	1.95		
Sex (F)					
Male	24	6.7	2.32	1.94	.1686
Female	59	6.5	2.26		
General Intelligence (B)					
80 or below	16	5.6^g	2.58		
81 to 90	24	6.6	1.81	3.80	.0142
91 to 100	26	7.0^h	2.51		
101 to 120	17	6.6	2.06		
Interactions					
E X F				3.95	.0511
E X B				0.10	.9926
F X B				2.11	.1075
E X F X B				1.34	.2511

(continued)

Table 5 (continued)

Variable	$\underline{n}$	$\underline{M}$	$\underline{S}$	$\underline{F}$ value	$\underline{p}$ level
Compromise					
Race (E)					
White	53	5.0	1.45		
Black	25	5.0	1.50	2.08	.1330
Hispanic	5	4.6	0.89		
Sex (F)					
Male	24	5.0	1.68	0.09	.7668
Female	59	5.0	1.33		
General Intelligence (B)					
80 or below	16	4.4^d	1.50		
81 to 90	24	4.8	1.69	3.70	.0160
91 to 100	26	5.4^e	1.14		
101 to 120	17	5.2	1.24		
Interactions					
E X F				1.57	.2153
E X B				0.81	.5479
F X B				2.56	.0623
E X F X B				0.73	.3962

* The larger the value, the greater the career maturity.
** Possible scores: Decisiveness (0-10), Involvement (0-10), Independence (0-10), Orientation (0-10), and Compromise (0-7).
ab Difference statistically significant at the .05 level according to Bonferroni (Dunn) $\underline{t}$ test for means.
gh Difference statistically significant at the .05 level.
de Difference statistically significant at the .05 level according to Duncan's multiple-range test for means.

Six of the 35 p values were statistically significant
at the .05 level; therefore, the null hypotheses for these
comparisons were rejected. Four of the statistically
significant comparisons were for main effects. The
following main effects were statistically significant:

1. the independent variable sex for the dependent
variable Involvement,

2. the independent variable general intelligence for
the dependent variable Involvement,

3. the independent variable general intelligence for
the dependent variable Orientation, and

4. the independent variable general intelligence for
the dependent variable Compromise.
The results cited in Table 5 indicated the following for
main effects:

1. females had a statistically larger mean Involvement
score than males,

2. individuals with general intelligence of 91 and
greater had a statistically larger mean Involvement score
than those with 90 or below,

3. individuals with general intelligence of 91 to 100
had a statistically larger mean Orientation score than those
with 80 or below, and

4. individuals with general intelligence of 91 to 100
had a statistically larger mean Compromise score than those
with 80 or below.

Two of the statistically significant comparisons were for interactions. The following interactions were statistically significant:

1. the independent variables race, sex, and general intelligence for the dependent variable Independence, and

2. the independent variables race and sex for the dependent variable Orientation.

The interaction among the independent variables race, sex, and general intelligence for the dependent variable Independence was not depicted in a profile plot. The interaction was not presented in a figure due to the sample size and the nature of the data.

The interaction between the independent variables race and sex for the dependent variable Orientation was depicted in a profile plot. Figure 3 contains mean Orientation scores and curves for sex.

Figure 3:   The interaction between Independent Variables Race and Sex for the Dependent Variable Orientation

Figure 3: The interaction between Independent Variables Race and Sex for the Dependent Variable Orientation
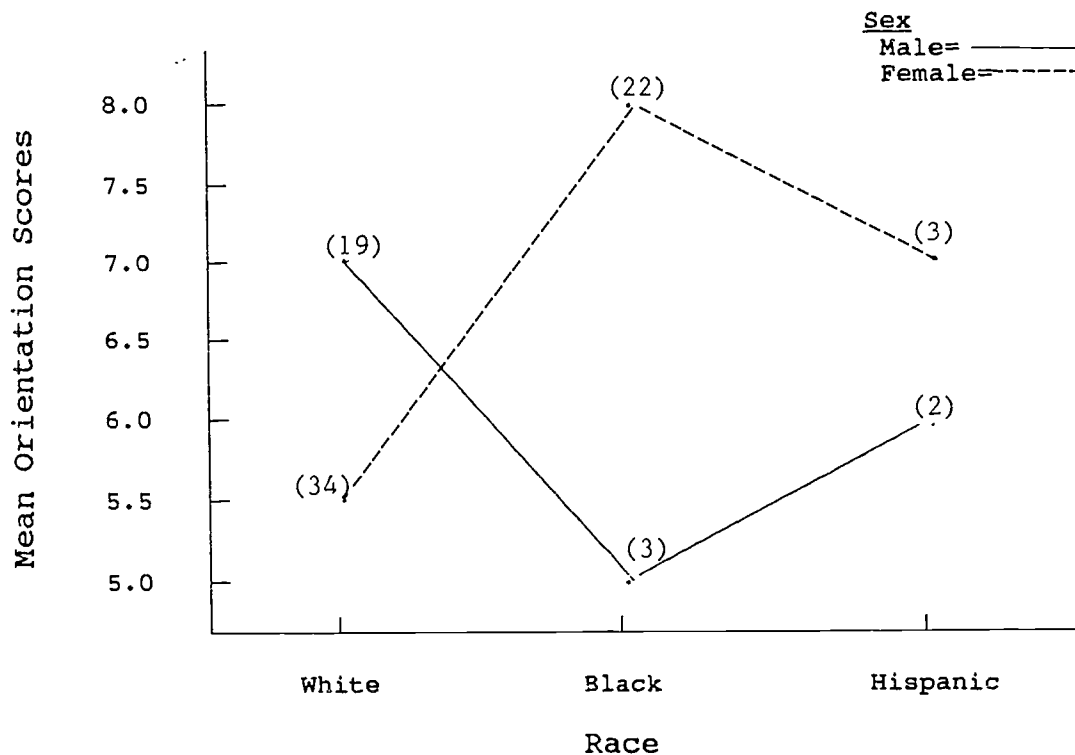
The interaction between the independent variables race and sex for the dependent variable Orientation was disordinal.   The results cited in Figure 3 indicated the following:

1.   Black females had numerically the largest mean Orientation score of any subgroup,

2.   Black males had numerically the smallest mean Orientation score of any subgroup, and

3.   Black females had numerically larger mean Orientation scores than Black males; and White males had numerically larger mean Orientation scores than White females.

Discussion

Summary

The purpose of the researcher was to investigate the career maturity of welfare recipients. The following six independent variables were investigated: race, sex, age, level of formal education, general intelligence, and locus of control. Dependent variables were scores from the following five scales of the Career Maturity Inventory - Attitude Scale Counseling Form B-1: Decisiveness, Invol'ement, Independence, Orientation, and Compromise. The sample consisted of 83 welfare recipients who were eligible for the Job Opportunities and Basic Skills (JOBS) program in a midwestern state. Five composite null hypotheses were tested at the .05 level of significance employing a three-way analysis of variance (general linear model).

A total of 100 comparisons were made plus 75 recurring. Of the 100 comparisons made, 30 were for main effects and 70 for interactions. Of the 30 main effects, 6 were statistically significant at the .05 level. The following main effects were statistically significant:

1.	the independent variable locus of control for the dependent variable Decisiveness,

2.	the independent variable locus of control for the dependent variable Orientation,

3.	the independent variable sex for the dependent variable Involvement,

4. the independent variable general intelligence for the dependent variable Involvement,

5. the independent variable general intelligence for the dependent variable Orientation, and

6. the independent variable general intelligence for the dependent variable Compromise.

The results indicated the following for main effects:

1. individuals with internal locus of control had a statistically larger mean Decisiveness score than those with external locus of control,

2. individuals with internal locus of control had a statistically larger mean Orientation score than those with external locus of control,

3. females had a statistically larger mean Involvement score than males,

4. individuals with general intelligence of 91 and greater had a statistically larger mean Involvement score than those with 90 and less,

5. individuals with general intelligence of 91 to 100 had a statistically larger mean Orientation score than those with 80 or below, and

6. individuals with general intelligence of 91 to 100 had a statistically larger mean Compromise score than those with 80 or below.

Of the 70 interactions, 5 were statistically significant at the .05 level. The following interactions

were statistically significant:

1.   the independent variables general intelligence and locus of control for the dependent variable Involvement,

2.   the independent variables formal education, general intelligence, and locus of control for the dependent variable Involvement,

3.   the independent variables formal education and age for the dependent variable Decisiveness,

4.   the independent variables race, sex, and general intelligence for the dependent variable Independence, and

5.   the independent variables race and sex for the dependent variable Orientation.

Related Literature and the Results of the Present Study

Overall, the results of the studies reviewed indicated an internal locus of control and a higher general intelligence to be consistent predictors of career maturity regardless of race, sex, age, and level of formal education. In terms of race, sex, age, and level of formal education, the results were less conclusive.

The results of the present study supported those reported by Stebbing (1985), Khan and Alvi (1983), Lokan, Boss, and Patsula (1982), Thomas and Carpenter (1976), and Gable, Thompson, and Glanstein (1976). The results of these studies indicated locus of control to be a valid predictor of career maturity. The present researcher found a statistically significant association between locus of

control and the following three scales of the Career
Maturity Inventory - Attitude Scale Counseling Form B-1:
Decisiveness, Involvement, and Orientation.

Lawrence and Brown (1976) found a positive association
between intelligence and career maturity in their study of
9th, 10th, and 12th grade students. They also reported an
association among intelligence, race, sex, and career
maturity. The results of the present study supported those
of Lawrence and Brown. Subjects of the present study with a
higher general intelligence were found to also have a higher
career maturity on the following scales of the Career
Maturity Inventory - Attitude Scale Counseling Form B-1:
Involvement, Independence, Orientation, and Compromise.

The results of Lawrence and Brown (1976), McNair and
Brown (1983), and Lee (1984) all indicated Whites as being
more career mature than Blacks. The results of the present
study failed to support the results of those studies
conclusively. The present researcher found Black females
had numerically the highest career maturity on the
Orientation Scale and Black males had numerically the lowest
career maturity. Also on the Orientation Scale, White males
were found to be numerically more career mature than White
females.

Lee (1984) and Herr and Enderlein (1976) reported
females as significantly more career mature than males.
However, Lawrence and Brown (1976) and McNair and Brown

(1983) did not report a significant difference between males and females. The present researcher found that females were significantly more career mature on the Involvement Scale of the Career Maturity Inventory - Attitude Scale Counseling Form B-1 than males, thus, supporting the results of Lee, and Herr and Enderlein.

Herr and Enderlein (1976) studied the career maturity of 9th, 10th, and 12th grade students and reported that career maturity increased with grade level, but not without other influences such as school effects, curriculum choices, and sex differences. Healy, O'Shea, and Crook (1985) studied 18 to 30 year old college students and reported a positive association between age and career maturity. That is, career attitudes mature with age. The results of the present study indicated individuals aged 18 to 24 with formal education of more than a high school diploma had numerically higher career maturity on the Decisiveness Scale, thus, supporting the conclusions of Herr and Enderlein, and Healy, O'Shea, and Crook for this age group. The present researcher also found adults aged 32 to 48 with formal education of more than a high school diploma had numerically the lowest career maturity on the Decisiveness Scale. Therefore, for this age group, the results of the present study did not support the findings of Healy, O'Shea, and Crook that career attitudes mature with age.

Generalizations

The results of the present study appeared to support the following generalizations:

1. individuals with internal locus of control are more mature in Decisiveness,

2. individuals with internal locus of control are more mature in Orientation,

3. females are more mature in Involvement than males,

4. individuals with general intelligence (91 to 100) are more mature in Orientation,

5. individuals with general intelligence (91 to 100) are more mature in Compromise, and

6. significant interactions for

(a) the independent variables general intelligence and locus of control for the dependent variable Involvement,

(b) the independent variables formal education, general intelligence, and locus of control for the dependent variable Involvement,

(c) the independent variables formal education and age for the dependent variable Decisiveness,

(d) the independent variables race, sex, and general intelligence for the dependent variable Independence, and

(e) the independent variables race and sex for the dependent variable Orientation.

Recommendations

The results of the present study appeared to support the following recommendations:

1. the study should be replicated with a large random sample,

2. the study should be replicated in a variety of geographical areas, and

3. the study should be replicated as longitudinal.

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Appendix A

Correlation Coefficients Between Item

and Total Score for the I-E Scale

Correlation Coefficients Between Item
and Total Score for the I-E Scale*

Item Number	Biserial Correlation Coefficient
1.	(filler)
2.	.260
3.	.182
4.	.289
5.	.179
6.	.319
7.	.229
8.	(filler)
9.	.164
10.	.238
11.	.301
12.	.265
13.	.271
14.	(filler)
15.	.288
16.	.307
17.	.357
18.	.310
19.	(filler)
20.	.271

21.	.152
22.	.227
23.	.255
24.	(filler)
25.	.480
26.	.195
27.	(filler)
28.	.238
29.	.109

* $\underline{N}$=400, 200 males, 200 females

Appendix B

Permission to Utilize Data Generated

from Pre-Orientation Vocational Assessment

Sessions Conducted with Welfare Recipients

Who were Eligible for the JOBS Program

February 14, 1994

Phyllis Lewin, Director
Employment Preparation Services
West Hall, 2nd Floor
300 SW Oakley
Topeka, KS 66606

Dear Ms. Lewin:

I am a vocational counselor with the DHR KanWork program in
Sedgwick County. I am working toward the completion of a
Master of Science degree in Counseling from Fort Hays State
University. A thesis is required for completion of this
program. The topic I have chosen is the career maturity of
welfare recipients.

My plan is to investigate race, sex, age, level of formal
education, general intelligence (measured by the General
Aptitude Test Battery), locus of control (measured by
Rotter's I-E Scale), and career maturity (measured by the
Career Maturity Inventory) of welfare recipients.

Recently I spoke with Linda Sorrell, Director of the SRS
KanWork program in Sedgwick County, and gained her support
for my research project. She has agreed to allow me to
conduct pre-orientation vocational assessment sessions which
would include the testing instruments mentioned above.

All new KanWork clients subject to initial contact in March,
1994, will be scheduled for pre-orientation vocational
assessments (group sessions lasting approximately 4 hours).
This is not a current practice in Sedgwick County, but has
been a long-time goal and will be viewed as a pilot project.
In addition, the pre-orientation vocational assessments may
speed up each client's career choice process. If
successful, consideration will be given to adopting this
procedure to the intake process in Sedgwick County according
to Ms. Sorrell.

Please consider this request to use data from these
assessments for my research thesis. No clients will be
identified by name, and all information will be treated as

group data.   In addition, a profile will be completed on
each client which will be given to the SRS KanWork
casemanagers to be used as part of their assessment.

Your immediate reply would be greatly appreciated.   Please
mark the appropriate response below:

_____   Permission is hereby granted to Ms. Carol Beckman to
            use data collected during the pre-orientation
            vocational assessment sessions conducted with welfare
            recipients in the KanWork program.

_____   Permission is denied.

Please return this request to me in the enclosed envelope as
soon as possible.   If you have questions, please feel free
to contact me during office hours, 8:00 a.m. to 5:00 p.m. at
(316) 266-8611.

Sincerely,

Carol Beckman
KanWork Vocational Counselor
Department of Human Resources

Appendix C

Sample Letter to Subjects

Dear KanWork Client:

You are about to enter the KanWork program. Before you do, however, you are required to attend a pre-orientation vocational assessment.

This assessment will take approximately four (4) hours. The results of your assessment will help you and your KanWork casemanager decide upon your plan of action.

It is critical that you attend this assessment. Please report to **the Job Service Center, 402 East 2nd Street (2nd & Topeka) at 9:00 a.m. on Monday, March 14, 1994.**

Please do not bring children as there are no accommodations for their care. If you need assistance with child care or transportation, please contact the person listed below.

We look forward to seeing you!

Appendix D

Verbal Instructions

for Test Administration

Verbal Instructions for Test Administration

1. SAY: Thank you for coming to the pre-orientation vocational assessment. The assessment you complete today will provide information regarding your academic strengths and abilities and career decision making skills. Instructions will be provided to you for each assessment, so please listen carefully.

2. SAY: The first assessment you will be taking is called the General Aptitude Test Battery. This assessment will provide information regarding your academic skills and abilities, and give an indication of the types of jobs and/or training you would be able to do easily. It is a standardized test and because of that, the instructions will be read verbatim from the manual.

3. The researcher used instructions for the administration of the GATB - Form D from the Manual for the USES General Aptitude Test Battery Section I: Administration and Scoring (U.S. Department of Labor, Employment and Training Administration, U.S. Employment Service, 1983).

4. The subjects were allowed a 10 minute break after all of them had finished the GATB. Once all subjects had returned and were settled, the researcher continued.

5. SAY: Now you will complete the second of the three assessments This one is not timed. Please write your name and today's date at the top of the assessment form.

6. HAND OUT THE I-E SCALE.

7. The researcher used instructions for the administration of the I-E Scale taken from Rotter [(1966) Appendix E].

8. After all subjects had finished the I-E Scale, the copies were collected.

9. SAY: The last assessment is also not timed. When you finish, please hand it to me and then you may go. The results of your assessment will be given to your KanWork casemanager.

10. HAND OUT THE CAREER MATURITY INVENTORY - ATTITUDE SCALE COUNSELING FORM B-1.

11. The researcher used instructions for the administration of the Attitude Scale of the Career Maturity Inventory from the Administration and Use Manual by Crites (1978a).

12. Participants were thanked individually as they handed in the last assessment.

Instruments were handed out in the following order:

1. General Aptitude Test Battery;

2. I-E Scale; and

3. Career Maturity Inventory - Attitude Scale.

Additional items needed for the administration of the instrument included the following:

1. No. 2 pencils;

2. scratch paper; and

3. a stopwatch.

Appendix E

Instructions for the I-E Scale

Instructions for the I-E Scale*

SAY: This is a questionnaire to find out the way in which certain important events in our society affect different people. Each item consists of a pair of alternatives lettered a or b. Please select the one statement of each pair (and only one) which you more strongly believe to be the case as far as you're concerned. Be sure to select the one you actually believe to be more true rather than the one you think you should choose or the one you would like to be true. This is a measure of personal belief: obviously there are no right or wrong answers. ...Please answer these items carefully but do not spend too much time on any one item. Be sure to find an answer for every choice. Circle either a or b on each question for the statement you believe to be more true. In some instances you may discover that you believe both statements or neither one. In such cases, be sure to select the one you more strongly believe to be the case as far as you're concerned. Also try to respond to each item independently when making your choice; do not be influenced by your previous choices.

* Adapted from, Rotter, J. B. (1966). Generalized expectancies for internal versus external control of reinforcement. Psychological Monographs: General and Applied, 80, (1 Whole No. 609)