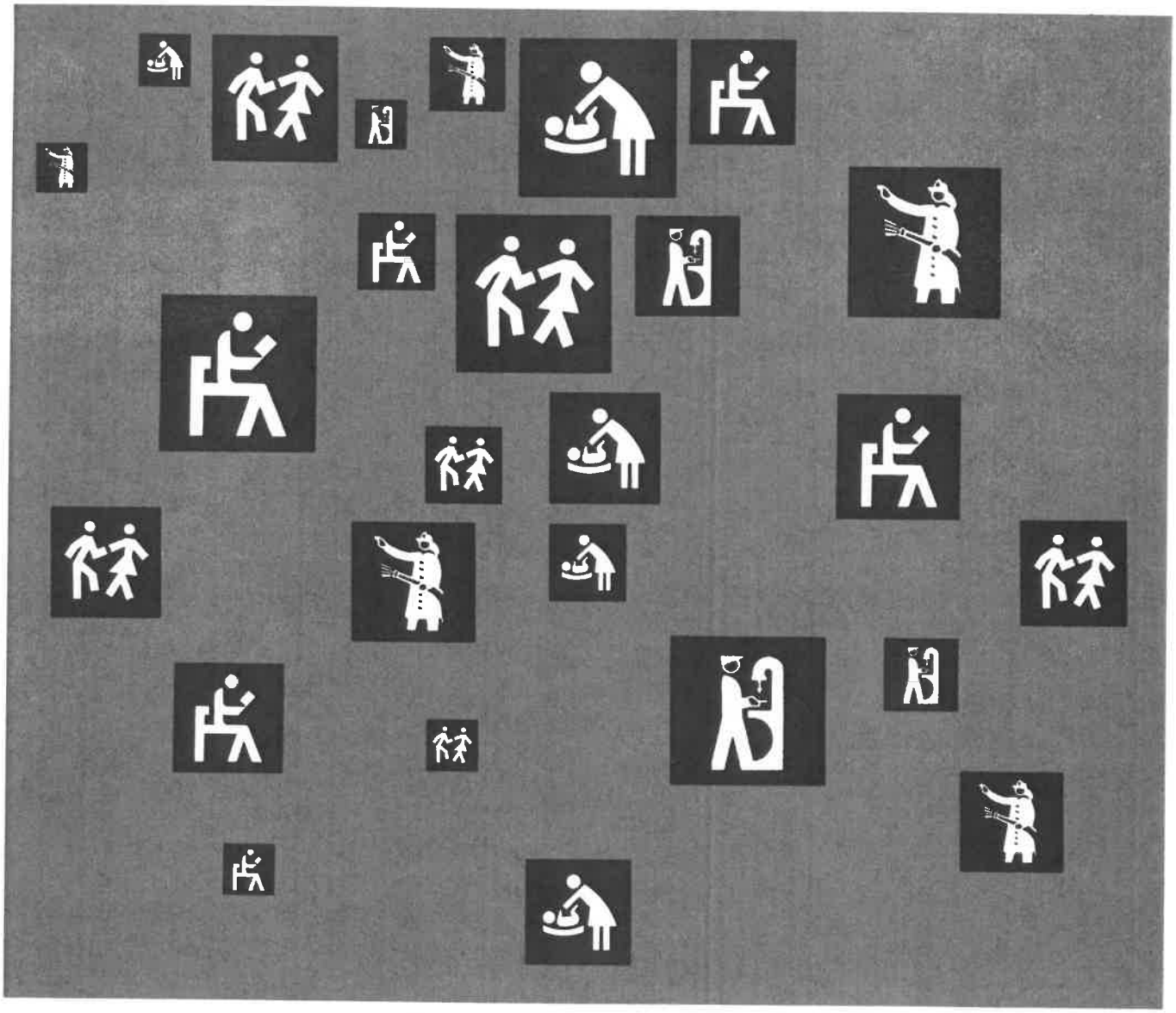
The Salience Inventory

Theory, Application, and Research

Dorothy D. Nevill, Ph.D.

Manual (Research Edition)

Donald E. Super, Ph.D.



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University of Florida

Consulting Psychologists Press
577 College Avenue
Palo Alto, California 94306

Acknowledgments

The *Salience Inventory* (SI) was developed by the Work Importance Study, an international consortium of vocational psychologists led by Dr. Donald Super. Because of the international origins of the SI, acknowledgments are due, as in all test development projects, to a great many friends and strangers scattered across the United States and in fact around the world. As an international project, specialists in most of the countries of Western and Central Europe, and in some of Eastern Europe, contributed to the identification of variables to be studied, to their definition, to their item writing, and to the logical and empirical selection of the items to retain. They did this in collaboration with American, Australian, Canadian, and British colleagues in meetings and in correspondence. This is the manual for the American form, for which the American project staff are responsible; because of the many people involved, most of them are not individually named here despite the importance of their roles.

During the first stages of the Work Importance Study it was two Britons—Drs. Jennifer M. Kidd and Edward G. Knasel, colleagues of Donald Super's in Cambridge—whose collaboration was most vital to the project, working together as a team of three on the literature reviews, conceptualization, definitions, and item writing. Dr. Frank Minor of IBM and Dr. William H. Helme of the Army Reseach Institute also made helpful suggestions at occasional meetings. On Super's return to the United States Dr. Dorothy Nevill of the University of Florida became an active colleague and has served since 1981 as co-author of the SI.

In trying out the instruments with small samples of adults and getting feedback for criticism, Drs. Frank Minor and Thomas Armstrong of IBM, Drs. Richard Campbell and Mary Tenopyr of AT&T, Ms. Shirley Chennault of Eastern Airlines, Mrs. Marjorie Mastie of Ann Arbor, Michigan, and Dr. Lloyd V. Yates of Southern Illinois University were helpful, the latter carrying the work further with large numbers and with statistical analyses. The authors obtained student feedback and data for test refinement in schools and colleges in Florida, Maryland, and New Jersey and from adults in workshops in New York and Virginia. In collecting refinement and tentative norming data, Mrs. Carolyn Graham of Charles County, Maryland, Mrs. Doris Bryant of New Brunswick, New Jersey, Dr. Robert Newman of Ocean County, New Jersey, and Mr. Thomas J. Walls of Mercer County, New Jersey, were most helpful in their school districts. At the college level, such data were obtained by Dr. Bruce Fretz of the University of Maryland and by Dorothy Nevill at the University of Florida.

Preliminary Canadian, Yugoslavian, and Portuguese data are used with the permission of the Employment Support Services Branch, Canada Employment and Immigration Commission (Mr. Stuart Conger) and Drs. George Fitzsimmons, Branimir Sverko, and Jose Ferreira-Marques of those respective countries. Many more school, college, and adult organizations and individuals are helping with the definitive norming and validation. We hope to extend these acknowledgments in the near future with the publication of an expanded SI Manual.

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CHAPTER I

Introduction

The *Salience Inventory* (SI) is a 170-item, 30 to 45 minute inventory scored for participation in, commitment to, and value expectations of five major life roles: Student, Worker, Homemaker (including spouse and parent), Leisurite, and Citizen. These roles are, for general communication purposes, referred to and defined in terms of activities: Study, Work, Home and Family, Leisure, and Community Service. The inventory can be used from the upper elementary or middle school level up through the adult years.

The five roles and the three types of measures of the importance of these roles are conceptually and empirically differentiable, although in the case of the first two scales, Participation and Commitment, the similarity in format appears to create a response set that causes the *behavioral* Participation measure to correlate more highly with the *affective* Commitment measure than was anticipated, while the more different-appearing Value Expectations measure of affective commitment does have the expected lower correlation with Participation (see Table 2; and Super, Mastie, & Nevill, 1984). Thus, if one must reduce administration time, the Commitment scale can be omitted and the Participation and Value Expectations scales retained.

Information concerning the technical development of the SI can be found in Chapter V. The scales are all very reliable with alpha coefficients in the .80s and .90s. The SI development methods have assured content validity. Construct and concurrent validity are shown by the intercorrelations of the scales. Predictive validity cannot be assessed until time has passed and criterion data have been collected, a task which the authors have already begun and in which they will welcome cooperation and offer consultation.

The Salience Inventory in Research and Counseling

This manual was developed to be used in SI research (validation, needs surveys, career commitment evaluation, etc.), and in exploring its use as a counseling aid. Preliminary use of the SI has shown that it will be an asset in individual counseling, group assessment, career-development workshops, needs surveys, and research with other variables such as career maturity, sex, and socio-economic status (Nevill & Super, 1984; Super, 1983; Super & Nevill, 1984).

Theory tells us that the relative importance to an individual of the major life roles of study, homemaking, work, leisure, and community service is an important determinant of the time and energy that will be devoted to each of these life roles. Life is a changing constellation of roles: the amount of time given to each and the amount of affect attached to each varies with changes in maturity and in the environment (Lowenthal, Thurnher, & Chiriboga, 1975; Super, 1980, 1982). In order to understand a person's readiness to make career decisions, one needs to know the relative importance that he or she attaches to study, work, homemaking, leisure, and community service (Super, 1983). In order to interpret scores on a vocational interest inventory, one must know how important work is to the student or adult, as well as the nature and degree of exposure to work and occupations. Similarly, in educational, leisure, and marital counseling the relative importance of the role in question is an essential bit of information (Richardson, 1974). The SI quickly and objectively provides this information.

Origin of the Salience Inventory

The SI was developed by the Work Importance Study (WIS), an international consortium of vocational psychologists in a dozen European, American, and, later, Asian countries. Active participants now include Australia, Canada, the United States, Portugal, France, Italy, Yugoslavia, and Israel, with correspondents in Czechoslovakia and India. The objective of this collaborative effort was twofold:

1. To assess the relative importance of the work role in the context of other life roles.

2. To better understand the values that individuals seek or hope to find in various life roles.

The international project is coordinated by Donald E. Super, Ph.D., D.Sc., Adjunct Professor of Psychology and of Counselor Education at the University of Florida, Consultant in Counseling Psychology at the University of Georgia, Consultant in Psychology at Armstrong State College, Savannah, Georgia, Professor Emeritus of Psychology and Education at Columbia University, and Honorary Fellow of the National Institute for Careers Education and Counseling at Cambridge, England. In the United States, the project is directed by Dorothy D. Nevill, Ph.D., Professor of Psychology at the University of Flordia. Drs. Super and Nevill authored the American version of the SI.

CHAPTER II

Theoretical Background

Work plays a central role in societal development (Parsons, 1949; Weber, 1930) as well as in individual development (Dubin, 1958; Roe, 1956). However, work has had different meanings for different people. For some it has meant a way to sustain life or to produce goods and services; to others work serves as a way to maintain contact with reality, to be part of a community, or to serve God (Task Force on Work in America, 1973).

The meaning of work in contemporary society varies as individual life styles change. Women have entered the labor market in ever greater numbers in search of self-realization in work or of the funds with which to support a desired life style and some of the self-actualizing non-work activities of leisure, citizenship, and homemaking. Men have found much of their daily work clearly society-maintaining rather than self-expressive; therefore roles other than work and occupational career have begun to command more of their attention. Educators, counselors, and psychologists have begun to pay more attention to education for leisure, volunteer community service, and homemaking. Psychologists have begun to think in terms of self-realization in a constellation of life-career roles which include not only that of worker, but also the roles of student, homemaker, and leisurite.

Any one individual plays a variety of roles during the course of a lifetime, adding some in adolescence and young adulthood, dropping some in later adulthood. Life styles vary considerably from person to person. Not everyone plays all roles. Some never become spouses or parents, while others die before retirement. None of the roles is necessarily sex-linked, although in some cultures they have been and still are. Both sexes can play all roles, except for biologically defined ones such as that of mother or father, with varying degrees of involvement at different stages of life.

The Life-Career Rainbow

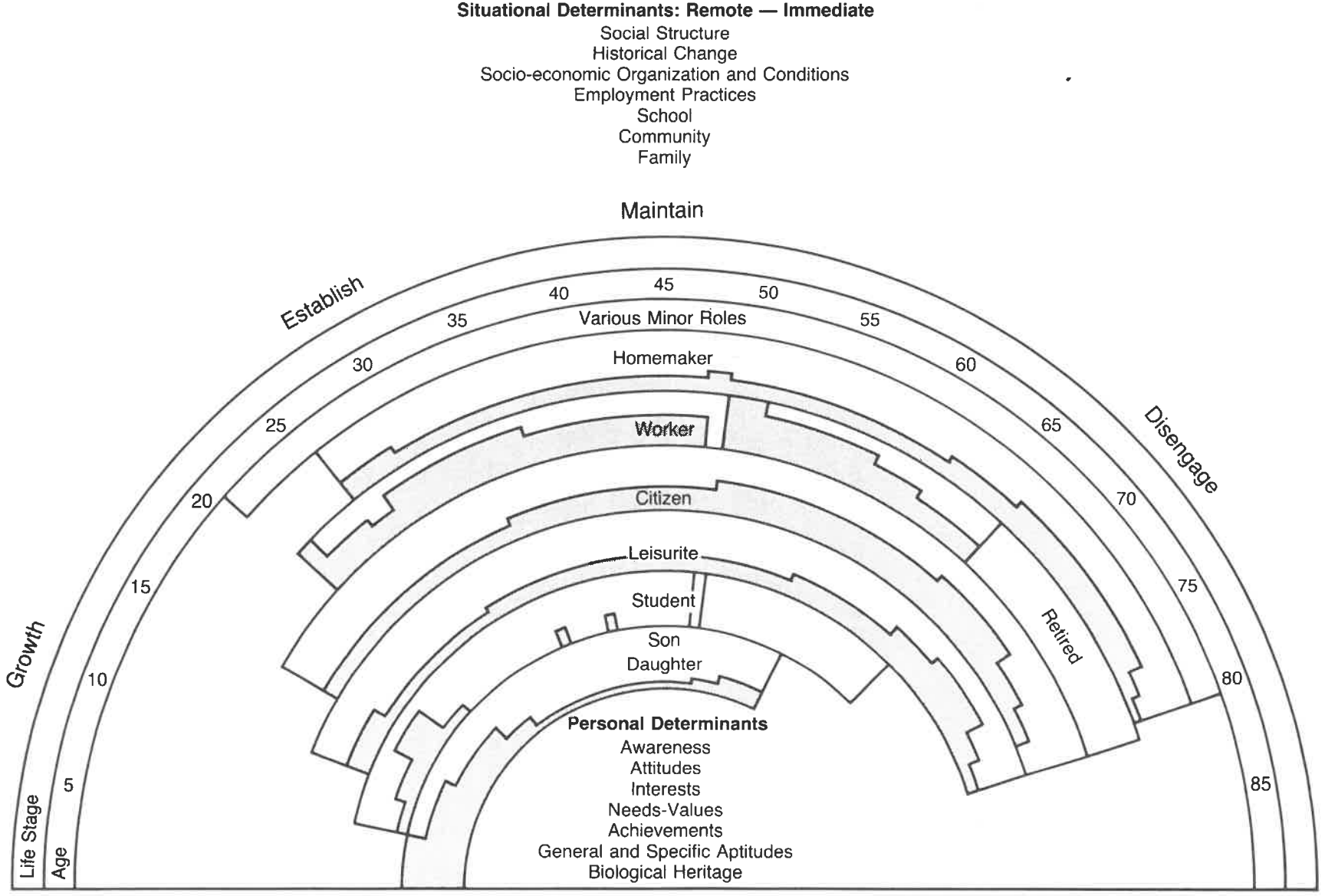
A Life-Career Rainbow was conceptualized by Super (1980) to depict careers in the life span as exemplified by the various roles played at any one time. A career is thus a changing constellation of roles, some sequential and some simultaneous. Roles decrease and increase in importance depending upon the developmental tasks to be accomplished, the values sought, and the ways chosen for attaining them.

Figure 1 is a revision of the original Life-Career Rainbow (Super, 1976, 1980) for use with the SI. The arcs of the rainbow represent six important life roles: son or daughter (not assessed by the SI for economy of testing time except as it enters into homemaking), student, leisurite, citizen, worker, and homemaker. In this revision of the Life-Career Rainbow, homemaker includes the roles of spouse and parent. The seventh arc represents various minor roles in life. The person portrayed in this rainbow finished college at the age of 22, went at once to work, married at age 26, became a parent at age 27, intermittently attended school part-time until returning full-time at age 47 for a year, suffered the loss of parents at age 57, retired at 67, was widowed at 78, and died at age 81.

The Life-Career Rainbow can be used to show both the temporal importance of and the emotional involvement in a life role (Super, 1980). Temporal importance is shown by the amount of time that an individual devotes to a role. It is portrayed in the Life-Career Rainbow by the width of the shaded band for each role. For example, the role of worker for the person portrayed in Figure 1 does not take up any space during the first 22 years of life. However, starting with the late 20s the role of worker and homemaker constitute the majority of life space. The worker role is traditionally dominant in males and the homemaker role in

Figure 1

The Life-Career Rainbow



females, although role emphases have been changing rapidly since the 1960s. The role of worker often diminishes in later years as more attention is paid to family and to leisure activities. Similar fluctuation occurs in the other roles of life.

Emotional involvement also varies with age. A worker could be heavily committed during the early years when in the establishment phase, but have divided loyalties with the birth of children. A worker could lose enthusiasm with the realization that aspirations are not likely to be reached. Similar changes in the degree of emotional importance can be seen in other roles. When the Life-Career Rainbow is shown in color, emotional involvement is portrayed graphically by the depth of color.

Role Importance

The Work Importance Study (Super, 1982) developed a model for determining role importance, suggesting that the importance of a role can be judged in three ways: by attitudes and emotions, by behavior, and by knowledge. Figure 2 shows the three basic components in a model of role importance which pertains to all life-career roles. The model was developed for the Work Importance Study while Super was with the National Institute for Careers Education and Counseling in Cambridge, England, in collaboration with Jennifer M. Kidd and Edward G. Knasel.

The first component of the model is *Commitment*, the attitudinal or the affective aspect, and thus in many cases the conative, aspect of importance. Commitment is emotional attachment to a role, to one's studies, to one's work, to one's home or leisure and to the things that one is expected to do and expects to do in that role. However, one can be committed to a role and do nothing about it. Emotion does not necessarily involve action. A high school student may be strongly committed to being a lawyer, but at that stage do nothing about becoming one.

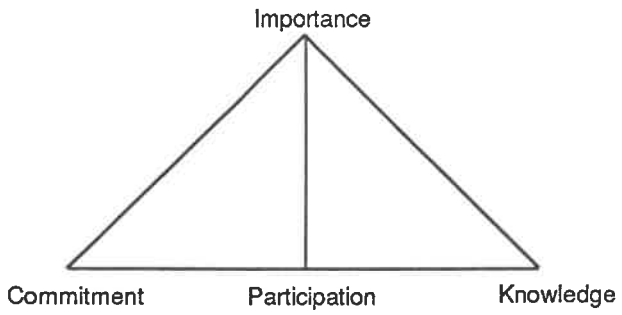
The second component of role importance is *Participation*, the behavioral aspect. Participation is the spending of time and energy in a role. However, one can be emotionally involved in a role and even spend time in it and still know little about it. A little girl may dream of being a ballerina and work hard at her classes, but know nothing about the life style and the dedication that the life demands.

The third component of role importance is the cognitive aspect, *Knowledge*, which is acquired by experience, direct or vicarious. It is the result of participation, which can be sought after, imposed upon, or accidental. The two-dimensional Life-Career Rainbow and the SI do not attempt to take it into account, the latter because special tests of knowledge need to be developed for each role. Knowledge assessment exists presently only for occupational roles (for example, the *Career Development Inventory*, Super, Thompson, Lindeman, Jordaan & Myers, 1979, 1981).

These three components of the model—Commitment, Participation, and Knowledge—combine in various ways to define role importance. The three basic components of importance have been shown to be identifiable and either only slightly or not at all related to each other in students, whose role decisions are still tentative and whose role participations are still limited (Super, 1982; Nevill & Perrotta, 1983).

Figure 2

A model of the importance of work or any other life-career role



Based on the model developed at the National Institute for Careers Education and Counseling, Cambridge, England, by Drs. Donald E. Super, Jennifer M. Kidd, and Edward G. Knasel for the Work Importance Study, 1978-79.

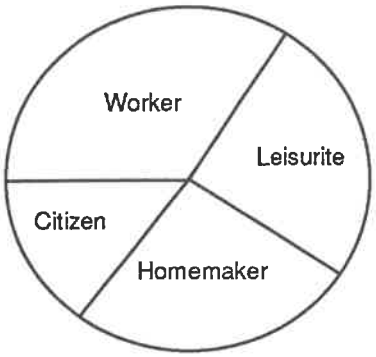
Work Salience

People differ in the degree to which work figures in their lives. In his synthesis of the research on work alienation, Kanungo (1982) clearly showed that not everyone is work motivated. Thus having a structural model of the absolute importance of work in a person's life is not sufficient to understand the meaning of work for that person. What is needed is a model of the importance of that role in relation to other roles. One such model is shown in Figure 3. Here, in a simplified version, is the life space of an individual who at the current time plays four major roles. The role of worker is clearly the most important. The worker role is salient to this individual.[1] In this case the roles of

[1] The term "salient" is used to avoid the ambiguity of "important," which to some writers means commitment, to some participation, and to some knowledge. "Salient" here denotes varying combinations of these components.

Figure 3

A model of role salience



leisurite and homemaker are important, though less so than that of worker. The role of citizen is the least salient.

A Developmental Assessment Model for Career Counseling

A new model of assessment for career guidance has been proposed by Super (1983), one which involves a truly developmental career assessment process. The model, slightly modified in Table 1, includes the psychological characteristics of career development. These are the relative importance of work (Super, 1983), the centrality of values sought in work (Super, 1973), and the level of career maturity (Super & Thompson, 1979) including a sense of autonomy and self-esteem (Korman, 1969).

Step I

As with many assessment models, the first step begins with a preview of what is to come. The initial step is to review the client's records, interview the individual, and make a counseling plan based on a preliminary assessment.

It is after the first step that the Developmental Assessment Model differs from other models. Rather than begin with questions concerning abilities and interests, the Developmental Assessment Model tries to ascertain the relative importance of work to the counselee and the values that the counselee hopes to realize through the worker role. While making an in-depth study of a counselee's career development and possibilities, the first question asked by some counselors, and stressed by the Developmental Assessment Model, is that of clients' *readiness* to assess their abilities and interest and to make self- and occupational-matching

Table 1

A Developmental Assessment Model for career counseling

Step I. Preview
- A. Assembly of data on hand
- B. Intake interview
- C. Preliminary assessment

Step II. Depth-view: further testing?
- A. Work salience
  - 1. Relative importance of diverse roles
    - a. Study
    - b. Work and career
    - c. Home and family
    - d. Community service
    - e. Leisure activities
  - 2. Participation in each role
  - 3. Commitment to each role
  - 4. Knowledge of each role
- B. Values sought in each role
- C. Career maturity
  - 1. Planfulness
  - 2. Exploratory attitudes
  - 3. Decision-making skills
  - 4. Information
    - a. World of work
    - b. Preferred occupational group
    - c. Other life-career roles
  - 5. Realism
- D. Level of abilities and potential functioning
- E. Field of interest and probable activity

Step III. Assessment of all data
- A. Review of all data
- B. Work salience
- C. Values
- D. Career maturity
  - 1. Individual and occupations
  - 2. Individual and nonoccupational roles
- E. Planning communication with counselee, family, etc.

Step IV. Counseling
- A. Joint review and discussion
- B. Revision or acceptance of assessment
- C. Assimilation by the counselee
  - 1. Understanding the present
  - 2. Understanding the meaning of work and other life roles
  - 3. Exploration for maturing?
  - 4. Exploration in breadth for crystallization?
  - 5. Exploration in depth for specification?
  - 6. Choice of preparation, training, or jobs?
  - 7. Searches for job and other outlets?
  - 8. Exploring self and situation for self-realization?
- D. Discussion of action implications and planning
  - 1. Planning
  - 2. Monitored execution
  - 3. Follow-up for support and evaluation

decisions. These questions involve work salience, values, and career maturity.

The next step is thus an in-depth study of these types of questions. Several instruments were developed specifically for answering the questions raised in developmental counseling: the *Salience Inventory* (Super & Nevill, 1986a), the *Values Scale* (Super & Nevill, 1986b), the *Career Development Inventory* (Super et al., 1979, 1981), and the *Adult Career Concerns Inventory* (Super, Thompson, Lindeman, Myers, & Jordaan, 1986).

Step II

The importance of work to an individual is an important component of career decision making. For those to whom work does not seem important, the attitudes and information involved in choosing a career must appear irrelevant (LoCascio, 1974; Richardson, 1974). Super and Nevill (1984; Nevill & Super, 1984) have shown that in adolescents the relative importance of work is more important than class or sex in determining career maturity.

An individual's readiness for career decision making involves the motivation for work or for a career. This is true whether work is seen as merely a means of survival, of using time and having friends, or of self-fulfillment (Super, 1976). If work is not important to a high school student, then scores on vocational interest inventories shed little light on occupational choice for that individual. Low scores on a career development inventory might only mean that occupations and occupational roles play little part in that counselee's life. In this case it might be appropriate to try to arouse the counselee's awareness of and interest in work. Perhaps such counseling should be aimed at the choice of and preparation for other roles such as those of leisurite, homemaker, and citizen active in community service (Super, 1984). The SI was developed to investigate these issues.

The centrality of values is also an important asssessment step in the Developmental Assessment Model (Super, 1983). For example, an individual might hold three important values: economic rewards, altruism, and physical activity. A job satisfying all three might not be possible, but by satisfying some values in other roles of life the counselee's needs could be met. The value of economic rewards could be satisfied through the worker role, the value of altruism might be realized through engaging in church work or running for political office, and the value of physical activity could be met through amateur sports. An individual's values play a key part in making a career decision. Both the SI and the *Values Scale* (Super & Nevill, 1986b) are helpful in answering questions of these kinds.

The level of the counselee's career maturity is also important. Five aspects of career maturity have been identified (Super & Thompson, 1979):

1. planfulness
2. exploratory attitudes
3. decision-making skills
4. information
5. realism

It is important to know the stage of development of the counselee. Does he or she have the attitude of planfulness (a tendency to plan ahead based on a sense of control, an awareness of the past and anticipation of the future, and a sense of self-esteem)? Does he or she have exploratory attitudes (a habit of asking questions about the various roles of life and the developmental tasks to be encountered)? Does he or she have decision-making skills which can be applied to career decision problems? Does he or she have enough information about the world of work in general, the preferred occupational group, and other life-career roles to make an intelligent decision? Does he or she have a realistic appraisal of personal abilities and situational demands? The *Career Development Inventory* (Super et al., 1979, 1981) and the *Adult Career Concerns Inventory* (Super et al., 1986) were developed to answer all but the last of these questions. The question about appraisal of personal abilities and situational demands can be assessed by comparing an individual's aspirations with ability test and labor market information (Super & Overstreet, 1960).

Steps III and IV

After having gathered the relevant information and reviewed it for both occupational and nonoccupational roles, the counselor and the counselee meet to discuss the material. During this session the emphasis is on helping the counselee to understand the implications of the material. Clients need to understand that they are in a developmental process and to have a clear view of their current status and the attendant tasks. They need to understand what competencies and decisions are appropriate for that level of development and what the next stage holds. Clients also need to see the role of work in relation to other life roles such as student, homemaker, and leisurite, and how their own values fit into these life roles.

Both the counselor and the counselee need to understand how ready or unprepared the counselee is to make career decisions. Depending upon the level of preparation, clients need to engage in different types of exploration. If the client needs to be made aware of the developmental tasks that are being or about to be confronted then exploration may be needed for maturing and for creating a readiness to cope with the career decision-making tasks. If the client needs help in crystallizing a career choice, then a breadth of working world exploration may be needed for the client to evaluate potential choices. If the client has a fairly good understanding of work in general, but needs to make a specific choice, then exploration of a few occupations in depth may be needed to deepen understanding.

After the exploration process, the counselor and the counselee should develop a joint plan of action, whether it

is for the client to obtain further training or to begin seeking a job. Included in this decision would be a discussion of the possibilities of outlets for self-realization in ways other than via a job. The counselor and the counselee should discuss the implications of their plans and the counselor should monitor the action and meet with the client for follow-up support and evaluation.

The Developmental Assessment Model is unique in that it takes into account the importance of career readiness in making vocational and related career decisions. Central to this counseling process are issues such as the importance of work in relation to the other roles of life, the values sought in life, and the level of career maturity. Only when this information is obtained and assimilated does it appear reasonable to begin looking at the individual's level of abilities or field of interests. A sample case of developmental assessment is reported at the end of Chapter IV.

CHAPTER III

Administration, Scoring, and Scale Description

The *Salience Inventory* (SI) is a 170-item instrument divided into three parts, each examining the importance of five life-career roles: Studying, Working, Community Service, Home and Family, and Leisure Activities. It has three components: the Participation scale, the Commitment scale, and the Value Expectations scale. It does not seek to assess role knowledge for occupations, as do career development inventories such as the *Career Development Inventory* (Super, et al., 1979, 1981), the *Career Maturity Inventory* (Crites, 1978), and the *Cognitive Vocational Maturity Test* (Westbrook & Parry-Hill, 1973). To our knowledge no work has yet been done on testing knowledge of other life roles.

Administration

The SI can be administered to high school, college, and adult populations in about 30 to 45 minutes. The less educated the clients, the longer they will take to complete the SI. In school situations a regular class period is usually ample. There are no right or wrong answers; the SI is a self-descriptive inventory.

Distribute the six-page reusable booklets and the answer sheets. Since the answer sheets can be either hand or computer scored, it is best to mark them with a number two pencil. Make sure a supply of pencils is on hand.

First have the subjects fill out the front of the answer sheet. The only information that is absolutely required is sex and some identification (either have the respondents fill out the name box or assign them identification numbers). The other demographic information boxes are recommended especially when doing research on the SI or when collecting norms. For box number 10B, note that the back of the booklet contains sample occupations for each of the Occupational Groups. Refer respondents to the back of the booklet when answering this box.

Following completion of the demographic information, have the subjects turn over the answer sheet. Refer to the booklet and have them read the *first paragraph on the cover* of the SI to themselves. Then say, "Turn to the inside cover and read it as I read it aloud." Be sure to give time for the definitions of the five types of activities. It is important for these five activities to be understood. Be sure that the rating scale is understood:

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**

Show the respondents how the booklet opens. Open the booklet to show Participation, then Commitment, and finally Value Expectations. Stress that all questions should be answered.[1] Say, "Work rapidly, guess if you are not certain, and continue until all the questions have been answered."

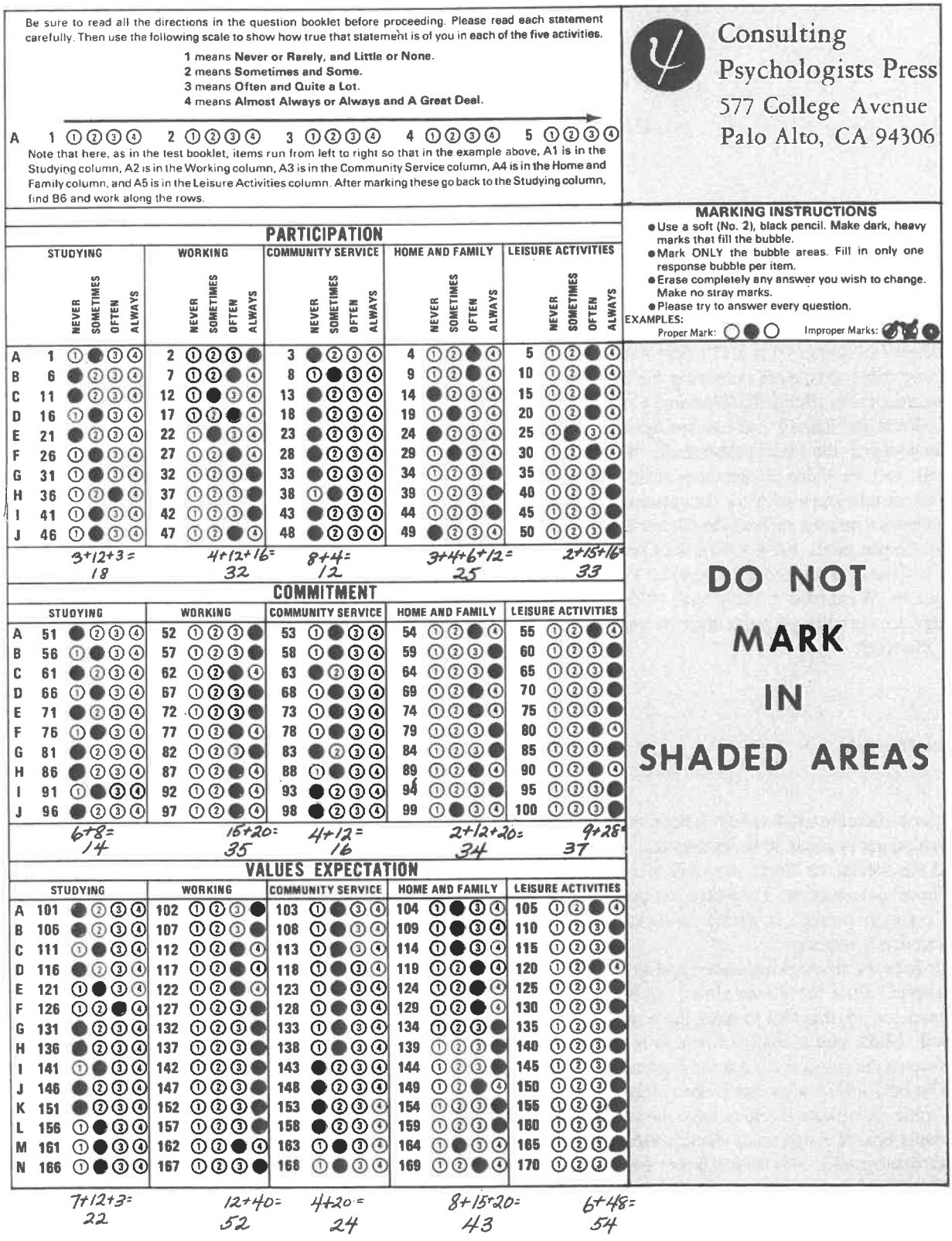
Scoring

The SI can be mailed to the publisher for scoring. Answer sheets with "Not-Prepaid Profile" in the upper-right-hand corner should have payment included when they are mailed

[1] When administering the short form of the SI the Commitment section is skipped.

Figure 4

Sample scoring of a *Salience Inventory* answer sheet



Be sure to read all the directions in the question booklet before proceeding. 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.

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.**

A 1 ①②③④ 2 ①②③④ 3 ①②③④ 4 ①②③④ 5 ①②③④

Note that here, as in the test booklet, items run from left to right so that in the example above, A1 is in the Studying column, A2 is in the Working column, A3 is in the Community Service column, A4 is in the Home and Family column, and A5 is in the Leisure Activities column. After marking these go back to the Studying column, find B6 and work along the rows.

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MARKING INSTRUCTIONS

- Use a soft (No. 2), black pencil. Make dark, heavy marks that fill the bubble.
- Mark ONLY the bubble areas. Fill in only one response bubble per item.
- Erase completely any answer you wish to change. Make no stray marks.
- Please try to answer every question.

EXAMPLES: Proper Mark: ○●○ Improper Marks: ✓ ✗ ●

PARTICIPATION

	STUDYING	WORKING	COMMUNITY SERVICE	HOME AND FAMILY	LEISURE ACTIVITIES
	NEVER SOMETIMES OFTEN ALWAYS	NEVER SOMETIMES OFTEN ALWAYS	NEVER SOMETIMES OFTEN ALWAYS	NEVER SOMETIMES OFTEN ALWAYS	NEVER SOMETIMES OFTEN ALWAYS
A	1 ①●③④	2 ①②③●	3 ●②③④	4 ①②●④	5 ①②●④
B	6 ●②③④	7 ①②●④	8 ①●③④	9 ①②●④	10 ①②●④
C	11 ●②③④	12 ①●③④	13 ●②③④	14 ●②③④	15 ①②●④
D	16 ①●③④	17 ①②●④	18 ●②③④	19 ①●③④	20 ①②●④
E	21 ●②③④	22 ①●③④	23 ●②③④	24 ●②③④	25 ①●③④
F	26 ①●③④	27 ①②●④	28 ●②③④	29 ①●③④	30 ①②●④
G	31 ①●③④	32 ①②③●	33 ●②③④	34 ①②③●	35 ①②③●
H	36 ①②●④	37 ①②③●	38 ①●③④	39 ①②③●	40 ①②③●
I	41 ①●③④	42 ①②③●	43 ●②③④	44 ①②③●	45 ①②③●
J	46 ①●③④	47 ①②●④	48 ●②③④	49 ●②③④	50 ①②③●
	3+12+3= 18	4+12+16= 32	8+4= 12	3+4+6+12= 25	2+15+16= 33

COMMITMENT

	STUDYING	WORKING	COMMUNITY SERVICE	HOME AND FAMILY	LEISURE ACTIVITIES
A	51 ●②③④	52 ①②③●	53 ①●③④	54 ①②●④	55 ①②●④
B	56 ①●③④	57 ①②③●	58 ①●③④	59 ①②③●	60 ①②③●
C	61 ●②③④	62 ①②●④	63 ●②③④	64 ①②③●	65 ①②③●
D	66 ①●③④	67 ①②③●	68 ①●③④	69 ①②●④	70 ①②③●
E	71 ●②③④	72 ①②③●	73 ①●③④	74 ①②●④	75 ①②③●
F	76 ①●③④	77 ①②●④	78 ①●③④	79 ①②③●	80 ①②●④
G	81 ●②③④	82 ①②③●	83 ●②③④	84 ①②③●	85 ①②③●
H	86 ●②③④	87 ①②●④	88 ①●③④	89 ①②●④	90 ①②●④
I	91 ①●③④	92 ①②●④	93 ●②③④	94 ①②③●	95 ①②③●
J	96 ●②③④	97 ①②●④	98 ●②③④	99 ①●③④	100 ①②③●
	6+8= 14	15+20= 35	4+12= 16	2+12+20= 34	9+28= 37

VALUES EXPECTATION

	STUDYING	WORKING	COMMUNITY SERVICE	HOME AND FAMILY	LEISURE ACTIVITIES
A	101 ●②③④	102 ①②③●	103 ①●③④	104 ①●③④	105 ①②●④
B	106 ●②③④	107 ①②③●	108 ①●③④	109 ①●③④	110 ①②③●
C	111 ①●③④	112 ①②●④	113 ①●③④	114 ①●③④	115 ①②③●
D	116 ●②③④	117 ①②●④	118 ①●③④	119 ①②●④	120 ①②●④
E	121 ①●③④	122 ①②●④	123 ①●③④	124 ①②●④	125 ①②③●
F	126 ①②●④	127 ①②③●	128 ①●③④	129 ①②●④	130 ①②③●
G	131 ●②③④	132 ①②③●	133 ①●③④	134 ①②③●	135 ①②③●
H	136 ●②③④	137 ①②③●	138 ①●③④	139 ①②③●	140 ①②③●
I	141 ①●③④	142 ①②③●	143 ●②③④	144 ①②③●	145 ①②③●
J	146 ●②③④	147 ①②③●	148 ●②③④	149 ①②●④	150 ①②③●
K	151 ●②③④	152 ①②③●	153 ●②③④	154 ①②③●	155 ①②③●
L	156 ①●③④	157 ①②③●	158 ●②③④	159 ①②③●	160 ①②③●
M	161 ①●③④	162 ①②●④	163 ①●③④	164 ①●③④	165 ①②③●
N	166 ①●③④	167 ①②③●	168 ①●③④	169 ①②●④	170 ①②③●
	7+12+3= 22	12+40= 52	4+20= 24	8+15+20= 43	6+48= 54

DO NOT MARK IN SHADED AREAS

to the publisher. Not-prepaid scoring prices are listed in the Consulting Psychologists Press catalog.

The SI answer sheet was designed to allow hand scoring. Figure 4 shows a handscored SI answer sheet. The SI is made up of fifteen scales with the same five roles (Studying, Working, Community Service, Home and Family, and Leisure Activities) nested under the three components (Participation, Commitment, and Value Expectations). To score the SI add up the score in each column of each component. The score is the sum of the weights (1 to 4) given to each item scored for its role. For example, the Studying score for Participation is the rating (1, 2, 3, or 4) given to item 1 plus the rating given to item 6, plus the rating given to item 11, and so on for items 16, 21, 26, 31, 36, 41, and 46.

In summary, the items for each scale can be seen from the items in each column on the answer sheet. The scores for each scale can be calculated by adding the numerical response (1 for *never*, 2 for *sometimes*, 3 for *often*, and 4 for *always*) for each of the items in the scale. It also can be mailed to the publishers for scoring. Handscoring may also be done by constructing templates based on Figure 4.

Scale Description

Participation

The first component of the SI, the Participation scale, is behavioral in content and asks "what you actually do or have done recently" in each of the five life-career roles. The scale consists of ten stems with the same five roles for each stem, rated on a 4-point scale. For example:

Participation (what you actually do or have done recently)
A. I have spent or do spend time in. . . . .

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

Participation is the behavioral component of the importance of a role. It denotes action. It can be measured by the amount of time given to a particular role. Participation does not measure how a person feels about a particular role, or how much the person knows about it. For example, a college student could spend many hours at a job, but feel that the job was unimportant and was only a "means to an end," a way to support further education. Or, that same college student could feel that the job gave valuable experience for a future career and thus was very important. In both cases participation would be high. In a like manner a high school student could be strongly committed to being a lawyer, but as yet have done nothing about becoming one or working as one, not even reading or talking about law as an occupation. In that case participation would be rated low.

Commitment

The second component of the SI, the Commitment scale, is affective in content. It assesses attitudes toward roles by asking about the degree of commitment to the role. The scale asks "how you feel about" the five life-career roles. This scale consists of ten stems with the same five life roles rated on a 4-point scale. For example:

Commitment (how you feel about it)
A. It is or will be important to me to be good in. . . . .

51. studying	1 2 3 4
52. working	1 2 3 4
53. community service	1 2 3 4
54. home and family	1 2 3 4
55. leisure activities	1 2 3 4

Commitment is the attitudinal, the affective, the conative aspect of importance. It is emotional attachment to a role, such as one's work, and to the things that one is expected to do and expects to do in the role. It is identification with the role and its activities. In the case of work, commitment would be identification with the work, whether in the form of the occupation (for example, baker), the particular job or position (apprentice baker), the company ("Golden Bread"), the industry (baking), or simply the work as work, whatever its content or setting.

Value Expectations

The third component of the SI, the Value Expectations scale, is also affective in content. It assesses attitudes toward roles by ratings of the degree to which major life satisfactions or values are expected to be found in the role. The scale asks "which values you seek in each of the five major life roles." The scale consists of fourteen values:

1. Ability Utilization
2. Achievement
3. Aesthetics
4. Altruism
5. Autonomy
6. Creativity
7. Economics
8. Life Style
9. Physical Activity
10. Prestige
11. Risk

12. Social Interaction
13. Variety
14. Working Conditions

These fourteen values were chosen from the twenty-one in the *Values Scale* (Super & Nevill, 1986b) because: 1) these values best represent the universe of values (as shown by their independence and reliability); 2) these are values which have shown differentiation between occupations in other studies; and 3) with only fourteen values the scale is sufficiently reliable yet keeps the whole inventory from being too long. The stem chosen for each value was the best of those used for each value in the *Values Scale* as judged by the correlation with the total score and by content. The stems corresponding to each of the above values are:

1. use all your skills and knowledge in . . .
2. know that your efforts will show in . . .
3. make life more beautiful by . . .
4. help people with problems in . . .
5. act on your own in . . .
6. discover or make new things in . . .
7. have a high standard of living through . . .
8. live life your own way in . . .
9. be physically active in . . .
10. be admired for your knowledge and skills in . . .
11. feel that you can take some risks in . . .
12. do things with other people in . . .
13. do a number of different things in . . .
14. have good conditions for . . .

The format used in the Value Expectations scale is similar to that for the Participation and Commitment scales. For example:

Value Expectations (what opportunity do you see now or in the future to . . .)
A. use all your skills and knowledge in. . . . .

101. studying	1 2 3 4
102. working	1 2 3 4
103. community service	1 2 3 4
104. home and family	1 2 3 4
105. leisure activities	1 2 3 4

Values are objectives that one seeks to attain in order to satisfy a need. Values are sought in behavior and may be satisfied by more than one kind of activity. For example, one can seek achievement through the work and community service roles, aesthetics through the worker and leisurite roles, and social interaction though the worker and home and family roles.

The values chosen for the SI measure both intrinsic and extrinsic values, the former being inherent in the activity and the latter concomitants or outcomes of the activity. Thus, Ability Utilization and Creativity are intrinsic values and Economic Rewards and Prestige are extrinsic values or outcomes.

CHAPTER IV

Use and Interpretation

The SI was developed to fill a gap in the array of tools of career development researchers and practitioners. It was designed to assess the relative importance of five major life roles in individuals and cultures. The SI makes it possible to assess both cultural and individual differences when studying the relative importance of life roles to the individual, and when studying differences in the importance of a given role or set of roles across individuals or cultures. The SI has been developed for national and cross-national use. Its psychometric qualities are satisfactory for individual counseling as well as survey work.

The SI would be helpful in looking at the relative importance of each role in the life of an individual as roles change over time. For example, in newlyweds the spouse role might be competing with the worker role in a way that would not occur in couples who have retired. Similarly in a dual-career couple, when children are young, the woman might be more committed to the parental role than the husband and the man more committed to the worker role than the wife. However, as the children mature, the relative importance of the roles might be similar for the two of them.

The SI is also important in looking at the impact of each role on other roles. When individuals attempt to fulfill more than one role simultaneously, they may find that they must satisfy multiple sets of expectations. Role conflict occurs when an individual experiences difficulty in conforming to multiple role expectations. For example, a father might have difficulty in meeting the time demands of his work and an active relationship with his children. The SI could clearly determine which roles impact upon other roles. In conjunction with other measures it could help researchers to have a more adequate understanding of the variables which contribute to the nature and extent of multiple role demands. For example, Nevill and Damico (1978) found that women experience more conflict between home and employment when holding a low-status job than when occupying a high-status one, in spite of the heavy time and pressure demands of the latter.

The SI yields information concerning the values sought in each role including those values which are peculiar to or dominant in each role, those that are common to several roles, and the degree of role rigidity or flexibility for values in different roles. For example, Astin (1984) proposes a three-factor model of work motivation: survival needs, pleasure needs, and contribution needs. She suggests that vocational "maladjustment occurs when the drive to satisfy one need predominates to the extent that the other needs are inadequately satisfied" (p. 125). In the case of the woman combining a low-status job with homemaking, the two roles might be seen in conflict as the former took time away from the latter without meeting any further needs and also increased the disproportionate emphasis already given to contributory needs. In contrast, the woman who combined a high-status job with homemaking would have her survival and pleasure needs met through paid employment while her contributory needs would be met through activities at home. Thus, the two roles would complement each other. The SI can yield pertinent information such as this for a wider number of values for each of the major roles in life.

One unexplored use of the SI is for surveys of life roles. For example, Holden (1985) discussed a report on higher education produced by the Carnegie Foundation. The author of the report, Frank Newman, wrote that "the most critical demand is to restore to higher education its original purpose of preparing graduates for a life of involved and committed citizenship" (p. 302). The SI provides the ability to track the commitments and importance of life roles of various populations.

Another use of the SI is in validation studies. The most important type of validity data is that which shows that the test actually measures what theory predicts that it should measure. The most readily available type, construct validity data, comes from analysis of the psychometric qualities of the test. Construct validity studies are reported in Chapter V. The next most readily available evidence lies in studies of concurrent validity; that is, studies that relate scores on the SI to scores from other measures or to other data which theory states should be related to the SI measures. Groups which should be studied include behaviorally and verbally committed full-time workers and homemakers, adults active and not active in community service, "workaholic adults" versus adults who spend time with their family or in other pursuits, etc.

Career Development Studies

Since the SI is a unique instrument, assessing important variables, it will be a valuable asset to many kinds of research. The SI will be particularly relevant in research on role choices and satisfactions, on occupational and cultural differences, on changes associated with socialization, and on changes across life stages. Examples of completed, ongoing, and possible future research are reviewed below.

Occupational Differences

The degree of commitment to and participation in the multiple roles of life varies greatly from person to person, not only as a function of age and status, but also in relation to many other personal and situational variables. Commitment to one's occupation has been given increasing research attention over the last fifty years. Homemaking and leisure have come into prominence much more recently.

An individual might spend a large amount of time in a role to which he or she is not committed or from which he or she expects to realize few values. Since work is a society-maintaining activity, individuals without a high commitment, or unable to realize values in work, face possible job dissatisfaction, stress, and burnout. Occupations vary in the degree to which workers are committed to their work (Kanungo, 1982) and in which they find opportunity for realization of values (Centers, 1949; Super, 1983). The SI can determine two different kinds of information useful in studies of such occupational differences: 1) the relative commitment of people in the pursuit of their work and other roles; and 2) the relative commitment of people to the worker role when compared with people in other occupations.

Certain occupations such as those in the human services field are believed to be particularly prone to "burnout" (Edelwich & Brodsky, 1980; Maslach, 1982; Maslach & Jackson, 1986). For example, Madill, Brintnell, Stewin, Fitzsimmons, and Macnab (1984) used a multidimensional model of work salience and the Canadian SI to study the career patterns of occupational therapists in Alberta, Canada. They found a disconcertingly high attrition rate and concluded that leadership from within the field of occupational therapy was a crucial element in the degree of job satisfaction and the level of commitment experienced by staff therapists. Thus the SI can be used to determine the relationship between job salience and job dissatisfaction and serve as a basis for remedial action and prevention.

Cultural Differences

Individuals play various roles during their lives. Cultural differences result in different attitudes toward and valuation of the various roles (Hofstede, 1980). For example, Feldman, Sam, McDonald, and Bechtel (1980) and Orpen (1978) explored the impact of culture on the worker role. Feldman et al. found differences in the evaluation of and preference for job outcomes. Orpen demonstrated differences in the acceptance of the tenets of the Protestant Work Ethic.

The SI is a particularly appropriate instrument for cross-national research as it was developed by a multi-national team and is available in seven languages. Two research projects are described below to give examples of the kinds of questions that can be addressed with the SI in cross-national research.

Nevill and Perrotta (1985) compared preliminary samples of high school students in Australia, Portugal, and the United States. They found that Australian students had the highest work participation, but the lowest work commitment. Portuguese students had the least work experience and the lowest value expectations of work, but were more committed to work than to home and family. Students in the United States were the most committed to home and family and had the highest value expectations from work. In the United States and Australia, females were more committed to home than were males. Portuguese females, in a school system in which attendance in the later years of secondary school is exceptional, reported higher commitment to work than Portuguese males.

Nevill and Nazario (1985) studied the importance of work in two waves of Cuban immigrants to the United States. They found that recent immigrants ranked work as the most important role in their lives, and were more committed to it and expected to realize more values through work than did earlier arrivals. A clear pattern related to work emerged to distinguish the more recent Cuban immigrants from earlier, already established immigrants: work was seen as of utmost importance as a way of establishing worth and as a compensation for not having close family ties. The new environment, particularly the opportunity for immediate employment, was important. So too were variables relevant to the individual such as educational level, occupation, and degree of political activism.

Socialization

Each culture defines what is appropriate behavior for its members. Certain variables such as sex, age, and socio-economic status are major determinants of how one acts. Females are traditionally expected to be more committed to home than to work, while the reverse is true for males. Young people are expected to be more committed to study than to the other life roles. The work ethic may be stronger for middle class individuals than for the upper class individuals who work only as a function of interest or the lower class who might despair of obtaining self-actualizing employment.

A great deal has been written about the changing role of women in society (for example, Nevill, 1984). The SI is particularly useful when comparing the relative importance of roles as a function of the socialization process. For example, Farmer (1983) sampled ninth and twelfth grade students in Illinois and found that high school girls scored higher than boys on both commitment to home and commitment to work. Super and Nevill (1984) found that high school girls with a high commitment to work tended to score higher on career maturity than did either other females or males regardless of level of commitment. Both sexes showed a positive relationship between career maturity and commitment to work and home.

These same authors (Nevill & Super, 1984) found an interesting change when studying college-age subjects. Males and females did not differ in their commitment to home and family, but females scored higher than males on commitment to work; a college population would presumably include a higher percentage of women interested in careers than would one of high school students. In the same vein, a larger proportion of college males would be affected by contemporary sex-role changes and be willing to endorse home and family as a valued part of their lives.

Life Stage

Increasingly more attention is being paid to developmental changes over the life span (Baltes & Brim, 1983; Baltes & Schaie, 1973; Levinson, 1978; Lowenthal, Thurnher, & Chiriboga, 1975). It is reasonable to assume that role importance and the values expected to be realized through different roles would change during a person's lifetime. Such changes would be expected from the Life-Career Rainbow model (Figure 1). The relationship of changes to age, sex, socio-economic staus, and different occupations is an empirical question. Leisure might dominate during the early and late stages of life, with work and family becoming more important in the middle years. But how would important needs be met as role importance shifted? For example, the value of altruism might be realized through one's occupation when employed, but through volunteer activities when retired. Similarly, the value of authority could be expressed in youth by being a school leader (student role), or later through political activity either as a candidate (work role) or as a campaign worker (community service).

Counseling

At present the SI is ready for career counseling use only with ipsative interpretation, a common and valuable use not to be confused with normative interpretation. In *ipsative* interpretation, the score (raw or standard) that the counselee has made on one scale of a test or inventory is compared with his or her scores on other scales of the same instrument. If the weighting of items and the item numbers in each scale are the same, raw scores may be compared; if they vary from scale to scale the raw scores need to be transformed into percent correct or mean rating (depending upon whether the scale is one of right-wrong or of ratings); standard scores or percentiles can be used if norms are available. In *normative* interpretation the score the counselee makes on one scale is compared with the scores made by other comparable people on the same scale by means of percentile or standard score conversions.

Ipsative Interpretation

Ipsative interpretation makes it possible to identify an individual's strong and weak areas if the test is one of aptitude or achievement — strong and weak, that is, when the person is compared with him- or herself, regardless of what others do. If the instrument is one in which there are no right or wrong answers, but only answers that describe a person, the comparisons, often in the form of the profiles of scores, permit individuals to analyze the relative strength of their traits. The SI scores are of the latter type, and thus it is possible to ascertain the relative importance to the individual of any one of the five roles. One can also make intrapersonal comparisons of participation, commitment, and value expectations in any one role by comparing raw scores (ratings).

Inter-Role Comparisons. A certain high school junior may place more emphasis (make higher scores) on Leisure than on Study, on Home and Family than on Work, and attach less importance to Community Service than to any of the other five major life-career roles. On the other hand, a particular college senior may make much higher scores on Work and Study than on any of the other roles, suggesting in this case a degree of work career commitment not seen in the first case. Such differences suggest developmental and perhaps socio-economic differences (a good research question), with distance from the world of work in the high school junior and proximity to it in the college senior. At the same time, other college seniors can be found who attach little importance to the work and student

roles, because they are not career motivated, and other high school juniors can be found who rate Work and Study high. Still others, of course, will score high on these and on Home and Family or other roles, and some will be observed who make low scores on all of the roles just mentioned.

Intra-Role Comparisons. The second type of ipsative interpretation made possible by the SI is the comparison of the amount of participation, the degree of commitment, and the amount of value satisfaction expected in a given role by the respondent. For example, a college student may report little participation in the work role, even though most of the items permit people who are not working to report participation, e.g., talking with someone about an occupation and belonging to an occupationally related association such as Psi Chi. This same student may rate Commitment to the Work role high.[1] In this case, the student's score on Value Expectations in Work would have either more or less relationship to the Work Participation score (the score might be higher or lower, for the correlation between Work Participation and Work Value Expectations is only .26). Adults who are in the labor force show a greater relationship between Work Participation and Work Commitment (r = .65) and Work Participation and Work Value Expectations (r = .53).

Interpreting Other Counseling Instruments in the Light of SI Scores

Ipsative interpretations of the SI can be helpful in the interpretation of aptitude tests, interest inventories, and career maturity measures. Although the development of norms for school, college, and adult groups will make richer interpretations of the SI possible and thus greatly increase the value of the SI in counseling, it is already an excellent tool for examining the meaning of standard vocational tests and inventories. If, for example, a student or adult shows on the SI that he or she attaches considerably more importance to the leisure or homemaking role than to the work role, one must question the utility for that person of vocational interest inventories and perhaps even of aptitude tests. In the latter case it may be only that the subject will not take the vocational aptitude tests seriously (if they are indeed perceived as vocational by that individual), and not do as well as he or she might otherwise. In the case of inventories, whether or not the instrument is seen as vocational may make an important difference in the individual's attitudes toward it. Thus, a values scale that is labeled "Work Values" may be less valid for someone who is not work oriented and may never expect to work, than for someone seriously considering which field of work to enter and committed to pursuing a career for self-fulfillment. On the other hand, an individual not committed to a career who takes a "Values Scale" that contains many general values items that do not refer to work and occupations and that recognizes that values are sought outside the work role as well as within the work role, is likely to take the instrument more seriously.

In the case of interest inventories, the *Kuder Occupational Interest Survey* (KOIS) (Kuder, 1979) may be less relevant for an adult wondering how to use his or her leisure than might the *Strong-Campbell Interest Inventory* (Strong) (Hansen & Campbell, 1985) because the KOIS contains only occupational items whereas the Strong contains hobby, school subject, and personality items as well as occupational items. Furthermore, if a person does not have a work orientation, he or she would not be expected to have acquired much information about occupations, in which case occupational interest cannot be reliably assessed. The interest scores of people who score low on the SI Work Salience (Participation, Commitment, and Value Expectations) would theoretically be expected to have either a flat profile on an interest inventory, or to have scores which fluctuate randomly from one testing to another with the same instrument.

In such cases a career maturity inventory may add additional useful information to the counseling process. Instruments such as the *Career Development Inventory* (CDI) (Super et al., 1979, 1981), the *Career Maturity Inventory* (Crites, 1978), and the *Cognitive Vocational Maturity Test* (Westbrook & Parry-Hill, 1973) include assessments of occupational information. The SI can help interpret these inventories by throwing light on the reasons for the low scores, which may be lack of career commitment (low Work scores on the SI) or lack of exposure to work (low Participation in Work scores on the SI and low Attitude Scale scores on the CDI). An illustrative case follows.

A Sample Case: Sam, 25-Year-Old Male

For the past three years Sam has been teaching mathematics and coaching football and tennis while also serving as an assistant house master in a prep school. He is thinking seriously of resigning to embark upon a combined Law and Business Administration program next year. This graduate program at a university near his home takes four years to complete and gives degrees in both fields.

The isolation of the boarding school as he experiences it, the great distance from his family home, and his desire for more challenge and a higher standard of living have made him feel that he should give up teaching. His stated goal is to become an investment analyst. He views "managerial or professional" work as a means of self-expression.

[1] Attitudes and behavior are positively but not highly correlated, as the correlations of these two scales evidence. Work Participation and Work Commitment have an r of .41 in college students (see Table 10).

Sam's academic record and background suggest that he should be successful in his contemplated program, as he has always been a good student, was enrolled in gifted and honors programs, graduated in the top fifth of his high school class, and had *Scholastic Aptitude Test* scores of 670 Verbal and 590 Mathematics. He graduated from college with a major in psychology and a minor in mathematics. During his college years he was a residence counselor, waited on tables, and was largely self-supporting.

Sam's father is a chemistry professor in a small college and his mother is a teacher of home economics in the local high school. An older sister is a graduate of a selective university and a successful fashion writer.

Before making a major career change and starting a four-year graduate program, Sam sought counseling at a nearby state university which operates a well-known and respected counseling center. There, as is customary with career counseling cases, he was given two standard inventories, the *Strong-Campbell Interest Inventory* (Strong) (Hansen & Campbell, 1985) and the *Career Development Inventory* (CDI) (Super et al., 1979, 1981). In addition, he was given the *Adult Career Concerns Inventory* (ACCI) (Super et al., 1986), the *Salience Inventory* (SI) (Super & Nevill, 1986a), and the *Values Scale* (VS) (Nevill & Super, 1986; Super & Nevill, 1986b). The results of all of these are considered here because of the greater richness of a multifactor interpretation.

The Strong-Campbell Interest Inventory (Strong). On the Strong Sam made high scores in Social Service and Teaching, including School Administration. In his proposed fields of Law and Business, however, he showed interests only slightly like those of people employed in them. This seeming discrepancy between his expressed and his inventoried interests made it appear especially important to assess Sam's career maturity, values, and life role involvements.

The Career Development Inventory (CDI). Although Sam has been out of college for three years and holds a teaching job he was given the College and University Form of the CDI and compared to college seniors. This was done in order to get a multidimensional picture of his career maturity. This score on the 77th percentile on the Career Exploration scale showed that Sam has been willing and able to use the resources available to him to learn about careers. This interpretation was confirmed by his self-referral to the Counseling Center. Sam scored on the 47th percentile on the Decision Making scale when compared to 2l-year-olds. This score may show that at age 25 some of his current indecision is due to a relative lack of knowledge of what factors to consider and of how to weight them in making vocational choices. His relatively low percentile on the Career Planning scale (33rd percentile) combined with his lower score on the World of Work scale (2lst percentile) and very low score on the Knowledge of Preferred Occupational Field scale (2nd percentile) further support the interpretation of this young man's situation as one of lack of a firm base for building a career: he lacks self-understanding in relation to the world of work. Sam considers himself a good worker and says he wants a self-expressive career; however, the CDI shows that he does not really know what such a career might be nor how to go about choosing a field of work. Further exploration such as he has now voluntarily undertaken seems called for, and his openness to it is encouraging.

The Adult Career Concerns Inventory (ACCI). Sam's scores on the ACCI were those one might have expected from the intake interview and from the CDI. He is concerned with the tasks of Exploration, tasks such as crystallizing and specifying a preference for an occupation. He is not yet concerned with the tasks of Establishment, Maintenance, or Disengagement. That he shows some concern for the tasks of Innovation may be a function of his expressed need to break out of teaching to explore and to find better occupational outlets for expressing himself. It is interesting that he shows little concern for implementing an occupational preference: perhaps this is a function of his confidence in the institutional placement resources and in his ability to earn the required academic credentials.

The Salience Inventory (SI) (the major focus in this presentation). An ipsative analysis of Sam's scores on the SI reveals what appears to be a fairly even balance of role involvements. He expects to realize his values (Value Expectations scales) equally through the roles of Worker (3.9), Student (4.0), Family Member (4.0), and Leisurite (3.9), with somewhat less importance attached to his role as a Citizen (2.7). These scores must of course be considered in relation to his age and marital and occupational status, since Sam is a young bachelor living in a boarding school in which his life is relatively circumscribed. It may be presumed that he does not value a larger community role because he has never yet really experienced one, but it is clear that he does value the family role from which boarding school life separates him. The roles of student, worker, and leisurite are, however, both known and currently accessible to him, and he expects to attain his values in them. His participation in and commitment to each of the five roles are similar to his value expectations: herein lies his balance, a balance that might be changed or upset were situational demands to change with marriage or with increasing job demands.

The Values Scale (VS). Ability Utilization ranked highest in Sam's value hierarchy. He made his highest score, 4.0, on this value.[2] Personal Development was Sam's next highest value, with a rating of 3.8. Also high were Achievement, Economic Security, Economic Rewards,

[2] The scoring of the VS is still only ipsative, with the focus on the relative strength of a given value in the individual's own value system, although norms for comparisons with other samples are in process and are also relevant.

and Social Relations, all rated 3.6. Closely following were Physical Activity, Advancement, Creativity, Social Interaction, Life Style, and Working Conditions, all rated 3.4. This combination of intrinsic (seven) and extrinsic (five) values suggests a person motivated to make the most of his potential, to have a comfortable life style, and to associate with congenial people. Self-expression and a good life are his goals. It is perhaps this combination and his lack of occupational information that lie at the root of his current career indecision. Altruism and Authority are also important to Sam, although less so than his other notable values. One is inclined to wonder, with no normative data to guide the speculation, whether the relative unimportance of Risk Taking might contraindicate a career in investments, a career into which Sam is thinking of changing.

The primary contribution of a values measure to career counseling is what it tells about what a person wants from life and the life roles, as opposed to how he or she thinks the values might be attained. What does the VS tell about Sam's prospects for happiness in finance as opposed to education? Would he, in changing to business, be more likely to achieve self-realization? The Strong has already indicated that his interests are more like those of teachers and school administrators than they are like those of businessmen and lawyers. The VS shows that he values self-expression (Ability Utilization, Personal Development, Social Relations, and Creativity) and good material living conditions (Economic Rewards and Security, Advancement, and Working Conditions). In view of this mixture of intrinsic and extrinsic values, his Life Style score should probably be interpreted as indicative of both a self-fulfilling and a comfortable life.

The Strong and the VS thus join in contraindicating Sam's present occupational preference of combining business and law for investment analysis, and strengthen the suggestion that he might better look for ways of finding a more satisfying life style and more satisfying work outlets in education. Administration is the logical objective to explore with him in further interviews, and for him to explore in talking with school people in good educational systems in his home and neighboring states and in a good graduate school of education in the same region, one that knows the local market and its needs and rewards.

Summary. At the age of 25 Sam's proposed plan to enter a graduate program in Law and Business appears to be based on the desire to find an occupation that offers a richer life and more economic security, as well as opportunity for self-expression and personal development. It does not appear to be based on a matching of his abilities and interests with those of people in the business and legal fields. It does appear that it is his values that are motivating him, values unguided by knowledge of occupations and careers, unguided by knowledge of how to make decisions, and values not being used in careful and extensive planning.

If Sam were to go ahead with the proposed program he is very likely to be successful in it, and he may find it possible to attain his many values and find self-expression in a combination of work, family, and leisure roles; it seems unlikely, however, that the work of an investment analyst will in itself prove any more self-fulfilling for him than does teaching. A possibly more promising plan might be explored: he could change to public-school teaching, and pursue work in educational administration. Thus, he could seek both self-expression and the good life in one of the better public school systems of his native state or region. In educational administration he could, if the measured interest becomes manifest in study and incidental tasks, and if his present values persist, combine the pursuit of business finance, personnel administration, helping people, and the development of his own personality more than he could in investment analysis.

Normative Interpretation

Although the SI has been administered to some 2,000 youths and adults in the United States, until 1985 the subjects have been samples of convenience rather than representative samples. They have been suitable for instrument refinement, but not for the development of national norms. To be fully useful the SI must be provided with the usual grade, age, curricular, sex, and selected occupational groups norms. The authors are receptive to receiving data to add to those now being collected.

National Samples

Means and standard deviations of the preliminary American data are provided in Tables 6, 7, and 8 for the convenience of the user. These tables should be interpreted with caution as they are derived from the following list of populations:

	Total *N*
High School	
1. Ocean County, New Jersey	198
2. New Brunswick, New Jersey	194
3. Mercer County, New Jersey	182
College and University	
1. University of Florida, Gainesville	583
2. University of Maryland, College Park	193
Adult	
1. Southern Illinois AAF Adult Education Program, nationwide	313
2. Managerial employees of AT&T, IBM, and Eastern Airlines	66

The data that are being collected from high school, college, and adult samples will be used to develop national norms. High school samples are designed to be representative of urban, suburban, and rural populations in the major US regions, various socio-economic levels, and both

sexes. Colleges and universities are also being sampled representatively so that arts, letters, science, and technical students are included from the major regions of the country. Adult samples are being chosen from across all Holland-type occupations[3] and the literate socio-economic levels. Attention is being paid to obtaining diversity in region, age, and sex.

Cross-National Samples

Since the Work Importance Study is international, one of its strengths is that inventories are available in some seven different languages. Each national team is responsible for the development of its version of the *Salience Inventory* and is involved in gathering normative data based on the guidelines mentioned above. Although each national team owns its own national version, three countries (Canada, Yugoslavia, and Portugal) are sufficiently far along in data collecting to share their results and have given permission to reproduce the means and standard deviations.

As described by Fitzsimmons, Macnab, and Casserly (1984) in their report on the Canadian Work Importance Study, two parallel Canadian forms of the SI were developed; one in French and one in English. The high school sample was collected from a number of school districts across Canada. The college sample was collected from a diverse selection of universities, technical colleges, vocational colleges, and community colleges throughout Canada. The adult sample was collected from a large publishing company, a large national department store, a hospital in a large city, a petrochemical company, a large computer manufacturing company, and a number of departments of the federal government including the Department of Energy, Mines and Resources, Employment and Immigration, the National Research Council, and the Canadian Broadcasting Corporation. Tables 12, 13, 14, and 15 in Appendix C give the Canadian high school, college, and adult data. For the high school sample, both English and French data are available (Tables 12 and 13 respectively). Only English sampling is available for the college population (Table 14). However, both English and French norms have been collected for the adults (Table 15).

Data from Yugoslavia have been collected by Sverko, Jerneic, Kulenovic, and Vizek-Vidovic (1984). The high school sample consists of 2 percent of the population of all tenth and twelfth graders in Croatia. Classes in all of the districts were sampled in proportion to the total number of students in each district. The university students were enrolled in different departments (mechanical, electrical, and civil engineering, economics, architecture, medicine, social work, education, and psychology) in all the universities in Croatia. Subjects were tested in courses appropriate for sampling their area. The adult sample was collected by psychology students who were instructed to find subjects of both sexes, various ages, and various educational levels. The adult sample was thus one of convenience and may not be representative of adult workers as a whole. Means and standard deviations for the high school, college, and adult samples are shown in Tables 16, 17, and 18 respectively in Appendix C.

At this time only high school data are available from Portugal (Ferreira-Marques, Miranda, Pinto, & Afonso, 1984). The sample was collected from high schools throughout the capital city of Lisbon. Means and standard deviations for both the tenth and twelfth grade are shown in Table 19 in Appendix C.

[3] The Holland-type occupational classifications are: Realistic, Investigative, Artistic, Social, Enterprising, and Conventional.

CHAPTER V

Development, Reliability, and Validity

Development

The Work Importance Study (WIS) is an informal consortium of autonomous research teams in a dozen countries in Europe, North America, and Australia, with corresponding members in Asia and Africa. The WIS was launched by Donald Super while a Senior Research Fellow at the National Institute for Careers Education and Counseling and at Wolfson College, Cambridge, England, in 1976-79. The WIS brought together a group of psychologists interested in the values and satisfactions people seek in work and in other life-career roles, and in the relative importance of work and these other roles.

The original member countries were: the United States, the United Kingdom, France, the Netherlands, the Federal Republic of Germany, Switzerland, Poland, Yugoslavia, Spain, Portugal, and Canada. Funding problems and personnel changes caused some of these countries to drop out after the first two years. Australia and Greece soon joined the WIS, and Czechoslovakia and Zimbabwe became unofficial corresponding members. Since then, Israel and Italy have become members, and India and South Africa have become corresponding members. Active participants now include Australia, Canada, the United States, Portugal, France, Italy, Yugoslavia, and Israel, with correspondents in Czechoslovakia and India.

The national teams consist, in some instances, of members of the psychology faculties of major universities such as Lisbon and Zagreb, and in other instances of researchers in national departments of labor such as Canada's Employment and Immigration. Each national team finds its own funding, although until late 1979 the European Research Office of the US Army Research Institute funded the semi-annual working conferences of national project directors and the coordinating work of the study's founder.

The objective of the Work Importance Study was to assess the relative importance of the work role in the context of other life roles and the values that individuals seek through their work and other roles. The first step was for each national team to review its national literature. These reviews were shared and were synthesized by the Anglo-American team in Cambridge, England.

The team did not find any psychometric instruments which would assess the salience of roles other than work despite the publications of Dubin (1956) and of England and associates (for example, England & Misumi, 1982) on the centrality of work. It was therefore decided that the WIS would develop an instrument to measure the salience of life roles. The team worked collaboratively at every step with an eye to utility for both cross-national and national research and service projects. Each country was to own its instruments, acknowledging the collaboration. New participants were to be accepted provided they would work in the same manner.

Procedures

The WIS began, in effect, at the International Congress of Applied Psychology in Munich in July, 1978. It met in Europe twice yearly until 1982 for working conferences of from three to five days each, rotating between Cambridge, Lisbon, and Dubrovnik. Since then it has met at least once yearly, in Edinburgh, Montreal, Florence, Lisbon, Dubrovnik, and Jerusalem. Meetings are convened by the Coordinator by common consent of the members.

Each team studied the national reviews of the literature and the synthesis done by the Anglo-American team, together with the lists of values and roles that had been

identified. Working groups of three or four participants, representing countries with somewhat differing traditions, economic systems, and conditions (even though they were all then by design European or Transoceanic European), wrote definitions of each assigned role. These definitions were distributed to each participant and were discussed in plenary sessions of some twenty members. Revisions were then made, reviewed, and again revised.

Once the definitions were agreed upon, sample items were written in the same manner as the definitions. At the first working meeting only a few items were written for each role, reviewed and revised as prototypes, and then assigned to at least two diverse national teams for further writing and refinement between meetings with the help of colleagues in their own institutes. These draft items and definitions were circulated in English in advance of or at the next meeting of the project directors. The draft items were reviewed and sometimes revised in plenary session.

An important aspect of the project was having the different cultural perspectives of agnostic, Catholic, and Protestant countries; of Capitalist, Socialist, and Communist economic systems; and of developed and developing economies. The varying perspectives were helpful in writing meaningful but at the same time cross-culturally acceptable definitions and items for roles such as Participation in Home and Family, and Commitment to Leisure.

Each national team, working with the English versions at meetings, put items into their own language by having colleagues with a good knowledge of English review the translations. The items were then pilot tested on small samples. Members of other teams who knew the languages in question also carefully reviewed the translations.

Refinement

The development of the SI followed the triangular model of role importance (Commitment, Participation, and Knowledge), but the focus was on the two more readily assessable aspects of importance, the behavioral and the attitudinal (Super, 1982). Since the SI is a self-report instrument, Participation items sampled a variety of types and levels of participation, ranging from reading about a role such as that of worker or homemaker to obtaining training in the role and being active in an organization dedicated to that role. The teams recognized that attitudes toward roles might be assessed in at least two ways: 1) by statements of commitment to the role, and 2) by ratings of the degree to which major life satisfactions or values were expected to be found in the role. There are thus two attitudinal or commitment scales, called for their contents the Commitment scale and the Value Expectations scale.

The first version of the SI had fourteen items for Participation and Commitment and twenty items from the *Values Scale* for Value Expectations. It was thus a 240-item inventory, made up of fourteen types of participation in each of five roles, fourteen types or manifestations of commitment to each of the five roles, and twenty values that might be sought in each of the five roles. Early work in the American version of the SI adjusted the format to make it shorter, less repetitive, and clearer. The shortening of the scales was warranted by high reliability (Super & Nevill, 1983). The current form has a total of 170 items in a format similar to the Australian form.

Super, Mastie, and Nevill (1984) looked at the role of response set. The Commitment and Value Expectations scales both measure the affective components of role importance, while the Participation scale measures the behavioral content. However, the Participation and Commitment scales resemble each other in format more than they resemble the Value Expectations scale. The formal similarities in the Participation and Commitment scales might create a general mental set which would dominate the specific mental set which should be created by the directions for each part.

To test this, Super, Mastie, and Nevill (1984) produced an experimental version of the SI which had three separate parts (Participation, Commitment, and Value Expectations), and administered them to high school students in three separate sessions with a time lapse between testings of from one to eight days. These results were compared with those found in the regular administration to high school students. The rationale was that if format and response set contributed significantly to the correlations between Participation and Commitment, the regular administration (controls) would produce higher correlations than the experimental condition. This should be true also of the Value Expectations scales, although it is less contaminated by superficial similarities than the Participation and Commitment scales.

The results of this study (see Table 2) suggested that the Value Expectations scales provided a set of more independent measures of commitment than did the Commitment scales. The result may be because of the format differences between the sections that were more readily perceived by subjects. When time permits, the use of all three parts (Participation, Commitment, and Value Expectations) appears to be warranted. When time is limited it may be best to use just the behavioral Participation and the affective Value Expectations parts.

Reliability

Two measures of reliability were computed for the current form of the SI: internal consistency (alpha coefficients) for high school, college, and adult samples, and stability (test-retest) for the college population (see Table 3). The alphas were very high (above .80) for all three populations.

Table 2

Intercorrelations of Participation, Commitment, and Value Expectations scales

Scale		PW[a]	PC	PH	PL	CS	CW	CC	CH	CL	VES	VEW	VEC	VEH	VEL
PS[a]	Con[b]	24[c]	44	48	00	***75***	13	39	26	02	***52***	13	32	22	01
	Exp	35	24	34	30	***70***	38	24	35	26	***61***	30	19	26	15
PW	Con		34	39	25	14	***49***	27	25	18	23	***41***	23	24	18
	Exp		30	36	13	26	***64***	23	36	16	11	***50***	14	25	12
PC	Con			42	10	35	04	***77***	21	05	30	05	***50***	19	03
	Exp			57	03	12	04	***71***	30	03	15	15	***63***	32	11
PH	Con				19	42	30	39	***71***	16	35	27	31	***59***	16
	Exp				16	25	25	46	***70***	15	17	18	40	***56***	09
PL	Con					-03	23	07	20	***70***	06	25	13	16	***55***
	Exp					23	26	16	26	***74***	19	25	07	29	***57***
CS	Con						25	48	34	08	***66***	18	37	24	05
	Exp						56	33	47	37	***63***	40	14	24	23
CW	Con							20	47	34	22	***66***	17	39	27
	Exp							27	59	47	33	***72***	12	40	37
CC	Con								35	14	44	19	***64***	34	15
	Exp								47	30	27	34	***70***	41	26
CH	Con									34	33	36	28	***73***	30
	Exp									45	30	44	32	***73***	33
CL	Con										11	32	12	29	***72***
	Exp										32	43	15	38	***69***
VES	Con											36	61	40	21
	Exp											56	42	40	39
VEW	Con												31	52	44
	Exp												41	59	55
VEC	Con													44	25
	Exp													49	27
VEH	Con														44
	Exp														50

[a] Participation in Studying (PS), Working (PW), Community Service (PC), Home and Family (PH), and Leisure Activities (PL); Commitment to Studying (CS), Working (CW), Community Service (CC), Home and Family (CH), and Leisure Activities (CL); Value Expectations of Studying (VES), Working (VEW), Community Service (VEC), Home and Family (VEH), and Leisure Activities (VEL).

[b] Controls (Con) N = 539, Experimentals (Exp) N = 85.

[c] Decimal points are omitted from correlations. Correlations between differing measures of the same Role are in italic boldface.

Table 3

Internal consistency (alpha coefficients) and stability (test-retest correlations)

	Alpha Coefficients			Test-Retest
	High school $N = 353$	College $N = 295$	Adult $N = 20$	College $N = 85$
Participation				
Studying	.88	.81	.95	.72
Working	.85	.88	.91	.78
Community Service	.93	.94	.94	.83
Home and Family	.87	.87	.95	.69
Leisure Activities	.88	.87	.92	.59
Commitment				
Studying	.92	.87	.95	.74
Working	.88	.82	.92	.68
Community Service	.93	.93	.95	.77
Home and Family	.93	.91	.90	.69
Leisure Activities	.91	.89	.92	.60
Value Expectations				
Studying	.92	.84	.91	.65
Working	.89	.85	.90	.56
Community Service	.93	.90	.92	.67
Home and Family	.90	.83	.82	.58
Leisure Activities	.90	.84	.84	.37

However, test-retest reliabilities of less than .70 were found for ten of the fifteen scales. Since the reliabilities became increasingly lower as the test progressed and subjects complained of the repetitiveness of the previous version of the SI,[1] fatigue or boredom might have caused random guessing by subjects in this study.

To test the fatigue hypothesis, Super and Nevill (1983) gave the SI in either the regular sequence or in reverse order. Thus, half of the subjects took pre- and post-tests in the normal sequence of Participation, Commitment, and Value Expectations, and half completed specially designed booklets which had a reverse sequence of Value Expectations, Commitment, and Participation. If the length of the test did indeed cause increasing amounts of random guessing, then subjects who took Participation first would get the highest test-retest scores on that scale and the lowest on Value Expectations. The opposite would be true for those subjects taking Value Expectations first. Commitment scores should remain the same. Regardless of whether the Value Expectations scale was given first or last, the reliabilities for this scale were lower than for either Participation or Commitment (see Table 4).

[1] A previous version of the SI was not as compactly printed as the current version since it had the five roles listed vertically rather than horizontally. It also did not have a specially designed answer sheet.

Validity

Content Validity

The SI was developed through an evaluation of the relevant content domains and thus the content validity of the SI was an intrinsic part of its development. Reference was made to the literature on life stages and career development in order to select the major life roles of adolescents and adults. The national project directors met in small group and plenary meetings to work over the definitions of roles and activities. These definitions were refined after receiving results from field trials. In the sessions, agreement was reached on the adopted phrasing, as well as on the final SI roles. The best items were selected on the basis of subject reactions,

Table 4

Test-retest given in two different sequences

	SI Forward[a] N = 121	SI Backward[b] N = 118
Participation		
Studying	.72	.67
Working	.79	.68
Community Service	.85	.74
Home and Family	.73	.60
Leisure Activities	.75	.64
Commitment		
Studying	.69	.75
Working	.70	.66
Community Service	.81	.74
Home and Family	.68	.57
Leisure Activities	.77	.56
Value Expectations		
Studying	.67	.61
Working	.61	.60
Community Service	.75	.65
Home and Family	.69	.48
Leisure Activities	.69	.45

Note: The sample consisted of college students.
[a] SI scales in the forward order were Participation, Commitment, and Value Expectations.
[b] SI scales in the backward order were Value Expectations, Commitment, and Participation.

item-scale correlations, and project staff consensus on appropriateness and coverage of item content. For example, an effort was made to have some participation items that were common among adolescents but also meaningful to adults (e.g., reading about an activity) and others that, while not inappropriate for adolescents, would permit adults to show a higher level of participation (e.g., belonging to an association concerned with the activity).

Construct Validity

Sex and age differences in commitment to home and family provided some support for the construct validity of the SI. In concurrent studies with high school students (Super & Nevill, 1984) and college students (Nevill & Super, 1984) the relationship betwen sex and commitment to home and work was examined in two ways.

In the high school sample a positive correlation was found between being female and being committed to home and family (r = .16, $p < .01$). A negative relationship would have meant a positive correlation between being male and being committed to home and family. There was a marginally significant difference ($c^2 = 6.57$, $p < .05$) in the relative commitment of males and females to the work and home and family roles, with males being relatively more committed to work and females to the home.

Different results were found for a sample of 446 college students from two large public universities in Florida and Maryland (Nevill & Super, 1984). The point-biserial correlation between sex and commitment to home equalled only .14 ($p > .05$). However, that between sex and commitment to work equalled .30 ($p < .01$). Since positive scores showed correlations between being female and role importance, these results show that males and females did not differ in their relative commitment to work as opposed to home and family. Both had a much greater commitment to home and family than to work. However, the college women indicated more participation in home and family than did the college males.

These college findings make an interesting progression from the high school sample where males tended to exceed females in work motivation and the reverse was true for homemaking. A college population would presumably include a higher percentage of women interested in a career than would one of high school students. In the same vein, a larger proportion of college males would be affected by contemporary sex-role changes and be willing to endorse home and family as a valued part of their lives. Hawley and

Even (1982) found that as educational level increased from less than high school to graduate school, men and women were more willing to endorse similar career development attitudes and behaviors. The changes in commitment to home and work from the high school samples to college samples for males and females are logical and thus lend support to the validity of the SI.

In an extension of the above two studies Nevill (1985) found that work maturity was highly related to career maturity. Role salience was affected by sex. High school females were more often committed to home than to work, but high school males showed the opposite pattern. However, college females expressed more commitment to both home and work than did male college students even though females did not expect to realize more values through their work than did males.

A look at the relative rankings of the five roles comparing the high school, college, and adult samples is relevant to the construct validity of the SI (see Table 5). Tables 6, 7, and 8 in Appendix A show the means and standard deviations.

Among high school students Leisure and Work tended to be rated as most important, Studying and Community Service least, and Home and Family in the middle. That leisure tends to be important to high school students is not surprising, but the finding that work appeared more important than studying was somewhat unexpected. Perhaps high school students in general are not involved in their school work, but view it as a means to getting a job or becoming an adult. High school study may be something "one does when one has to." The moderate importance placed on home and family is expected, since adolescence is a stage in which the main focus is on peer relationships. The importance of peer relationships also explains the low ranking by the high school sample for Community Service.

By the college years Participation in Leisure Activities is rated as important, but the maturing of role values can be seen in the greater affect (Commitment and Value Expectations) given to Work and Home and Family, with only moderate emphasis on Leisure. Participation in Studying tends also to be high, as would be expected since the more serious students go on to college from high school. In college as in high school, Community Service tended to be ranked as least important.

The central responsibilities of the adult years, work and home, may be seen in the high rankings for these roles. Though increasing numbers of people spend more time in the work setting than at home, Commitment to Home and Family and Value Expectations in Home and Family tended to outrank Work. Leisure is of only moderate importance, followed by Study and Community Service as might be expected. The trends described above appear consistent with developmental changes, but data are needed for larger samples of adults.

Similar results for adults were found by Yates (1985) in his study of 321 students enrolled in an off-campus baccalaureate degree program conducted by a major midwestern university. He found the expected sex-role, marital status, and age differences. Females showed a greater participation in home and family activities, maintained a stronger commitment to work, to community affairs, and to the home and family, and sought greater satisfaction from

Table 5

Relative rankings of the five roles for high school, college, and adult samples

	High School	College	Adult
Participation	1. leisurite	leisurite	worker
	2. worker	student	homemaker
	3. homemaker	homemaker	leisurite
	4. student	worker	student
	5. citizen	citizen	citizen
Commitment	1. worker	homemaker	homemaker
	2. leisurite	worker	worker
	3. homemaker	leisurite	leisurite
	4. citizen	student	student
	5. student	citizen	citizen
Value Expectations	1. leisurite	worker	homemaker
	2. worker	homemaker	worker
	3. homemaker	leisurite	leisurite
	4. citizen	student	student
	5. student	citizen	citizen

activities related to the community and to the home and family than did males. Married respondents indicated a greater participation in, a stronger commitment to, and placed greater value in home and family activities than did the unmarried respondents. Conversely, unmarried respondents indicated greater participation in leisure pursuits, a greater commitment to community and leisure activities, and sought greater satisfaction from their involvement in community and leisure activities than did unmarried respondents. The youngest age group, 17 to 25, participated the most in leisure activities, were the most committed to them, and indicated the strongest leisure-related value expectations.

Concurrent Validity

Concurrent validity of the SI is shown in Tables 9, 10, and 11 in Appendix B which show the interscale correlations for the high school, college, and adult samples. In a sample of 574 high school students the correlations between the Participation and Commitment scales are .75 for Study and .49 for Work. The correlations between Participation and the less instrumentally contaminated Value Expectations scales are .52 for Study and .41 for Work. The intercorrelations of other role scales are comparable. Both the Commitment scale and the Value Expecations scale measure Commitment. Thus they are theoretically similar, but use a different format. The Participation scale is theoretically different from the other two scales. The two scales (Commitment and Value Expectations) which are theoretically more similar are more highly correlated than those two are to the third variable (Participation) which is theoretically different. Thus these tables are good evidence for both the convergent and the divergent validity of the scales.

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APPENDIX A

Means and Standard Deviations of United States High School Students, College Students, and Adults: Preliminary Samples

Table 6

Means and standard deviations for high school students: Preliminary sample

	High School					
	Total N = 574		Male N = 273		Female N = 301	
	Mean	SD	Mean	SD	Mean	SD
Participation						
Study	20.55	6.53	19.78	6.70	21.24	6.31
Work	25.77	6.30	26.79	6.06	24.88	6.39
Community	18.64	7.85	19.11	7.97	18.24	7.73
Home	25.65	6.73	24.50	6.53	26.65	6.75
Leisure	29.65	7.15	30.84	7.04	28.63	7.09
Commitment						
Study	23.20	8.17	21.83	8.18	24.45	7.97
Work	31.70	6.28	31.22	6.38	32.13	6.17
Community	23.22	8.51	23.00	8.41	23.41	8.61
Home	30.91	7.69	29.43	8.06	32.19	7.14
Leisure	31.69	7.23	32.31	6.93	31.13	7.45
Value Expectations						
Study	35.34	11.59	33.53	11.82	36.97	11.14
Work	43.78	8.38	43.72	8.12	43.83	8.62
Community	35.91	12.02	34.64	11.63	37.05	12.27
Home	43.24	9.15	41.46	9.52	44.81	8.53
Leisure	43.98	9.73	45.30	8.91	42.81	10.27

Table 7

Means and standard deviations for college students: Preliminary sample

	College					
	Total N = 776		Male N = 389		Female N = 387	
	Mean	SD	Mean	SD	Mean	SD
Participation						
Study	27.37	5.44	26.72	5.31	28.06	5.51
Work	22.08	6.76	22.52	6.25	21.61	7.24
Community	17.85	7.41	17.15	7.25	18.61	7.50
Home	25.24	6.26	23.89	6.03	26.59	6.20
Leisure	30.45	6.22	31.25	6.09	29.65	6.27
Commitment						
Study	30.25	6.16	29.09	6.19	31.48	5.87
Work	32.74	5.52	31.92	5.66	33.54	5.25
Community	25.70	7.92	24.44	7.92	27.05	7.70
Home	34.25	5.84	33.19	6.10	35.30	5.38
Leisure	32.14	6.00	32.42	5.72	31.86	6.29
Value Expectations						
Study	38.75	8.53	38.32	8.54	39.19	8.53
Work	44.48	7.96	44.13	7.81	44.80	8.11
Community	35.16	10.86	33.62	10.76	36.79	10.74
Home	43.27	8.35	42.11	8.30	44.44	8.27
Leisure	42.58	8.24	42.97	8.35	42.22	8.14

Table 8

Means and standard deviations for adults: Preliminary sample

	Adult					
	Total N = 379		Male N = 277		Female N = 102	
	Mean	SD	Mean	SD	Mean	SD
Participation						
Study	27.40	6.71	27.63	6.19	26.71	8.05
Work	31.64	5.12	31.40	4.93	32.30	5.72
Community	17.67	7.68	17.31	7.60	18.75	7.90
Home	25.42	6.28	24.43	5.81	28.24	6.77
Leisure	22.44	6.20	21.92	6.10	23.95	6.30
Commitment						
Study	29.92	7.05	30.11	6.74	29.39	7.96
Work	34.35	4.99	34.30	5.05	35.77	4.78
Community	23.35	8.52	22.77	8.59	25.01	8.20
Home	35.54	5.58	35.30	5.75	36.21	5.10
Leisure	27.45	6.83	27.08	6.72	28.48	7.14
Value Expectations						
Study	39.21	8.89	39.23	8.85	39.12	9.10
Work	45.65	6.84	45.71	6.81	45.46	7.06
Community	31.43	11.83	30.23	11.68	34.83	11.80
Home	45.16	7.85	44.77	8.05	46.24	7.31
Leisure	38.35	9.33	37.89	9.28	39.65	9.45

APPENDIX B

Interscale Correlations for High School Students, College Students, and Adults

Table 9

Interscale correlations for high school students

	High School (N = 574)													
	Participation				Commitment					Value Expectations				
	W	C	H	L	S	W	C	H	L	S	W	C	H	L
Participation														
Study (S)	24	44	48	00	75	13	39	26	02	52	12	32	21	01
Work (W)		34	39	25	14	49	27	25	18	22	41	23	25	18
Community (C)			42	10	35	04	77	21	05	29	04	51	20	02
Home (H)				19	42	30	39	71	16	35	27	31	59	14
Leisure (L)					-03	23	07	20	70	07	24	11	14	56
Commitment														
Study (S)						25	48	34	08	68	18	37	25	04
Work (W)							20	47	34	23	68	18	41	27
Community (C)								35	14	45	19	66	35	16
Home (H)									34	33	37	29	75	30
Leisure (L)										12	33	11	29	73
Value Expectations														
Study (S)											35	61	39	21
Work (W)												30	52	43
Community (C)													44	24
Home (H)														44
Leisure (L)														

Notes: $r \geq .09$, $p < .05$
$r \geq .12$, $p < .01$

All decimals are omitted.

Table 10

Interscale correlations for college students

	College (N = 335)													
	Participation				Commitment					Value Expectations				
	W	C	H	L	S	W	C	H	L	S	W	C	H	L
Participation														
Study (S)	14	15	08	-06	63	22	23	13	00	44	21	12	12	02
Work (W)		20	20	00	13	41	17	05	03	09	26	19	15	08
Community (C)			34	16	09	04	74	15	-02	12	11	53	17	04
Home (H)				27	07	15	28	56	17	17	19	22	52	25
Leisure (L)					-13	08	13	13	62	03	09	11	20	43
Commitment														
Study (S)						32	25	21	11	64	24	21	25	17
Work (W)							25	37	24	30	55	19	27	15
Community (C)								34	14	24	21	72	31	12
Home (H)									27	22	29	29	65	18
Leisure (L)										18	19	11	28	61
Value Expectations														
Study (S)											44	29	42	37
Work (W)												37	48	38
Community (C)													41	26
Home (H)														53
Leisure (L)														

Notes: $r \geq .10$, $p < .05$
$r \geq .13$, $p < .01$

All decimals are omitted.

Table 11

Interscale correlations for adults

	Adults (N = 66)													
	Participation				Commitment					Value Expectations				
	W	C	H	L	S	W	C	H	L	S	W	C	H	L
Participation														
Study (S)	22	08	-17	21	82	29	11	-18	-16	47	33	12	-17	-20
Work (W)		21	44	-19	17	65	14	47	09	08	53	03	22	01
Community (C)			07	-26	05	18	80	14	-31	-08	24	51	19	-16
Home (H)				23	-18	32	-13	78	14	-05	19	07	72	09
Leisure (L)					-22	07	-30	13	88	06	-01	-01	25	61
Commitment														
Study (S)						32	25	-16	-12	36	10	06	-12	-08
Work (W)							25	36	25	06	55	26	36	18
Community (C)								01	-28	15	31	69	09	-24
Home (H)									22	-08	05	09	70	18
Leisure (L)										08	06	-05	16	74
Value Expectations														
Study (S)											35	26	09	04
Work (W)												42	31	02
Community (C)													36	-05
Home (H)														40
Leisure (L)														

Notes: $r \geq .31$, $p < .05$
$r \geq .36$, $p < .01$

All decimals are omitted.

APPENDIX C

Means and Standard Deviations for Canadian, Yugoslavian, and Portuguese High School Students, College Students, and Adults

Table 12

Means and standard deviations for Canadian high school students: Anglophones*

	10th Grade				12th Grade			
	Male $N = 563$		Female $N = 549$		Male $N = 635$		Female $N = 593$	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD
Participation								
Study	20.26	6.46	22.43	6.22	19.94	6.58	23.24	7.04
Work	25.38	6.10	24.61	6.02	26.05	5.95	25.60	6.01
Community	16.16	6.99	18.23	7.71	15.70	6.82	18.63	7.79
Home	24.04	6.57	27.57	6.18	23.10	6.04	27.68	6.69
Leisure	31.90	6.85	31.46	6.07	31.63	6.19	30.48	6.50
Commitment								
Study	22.19	7.75	25.44	7.70	22.13	7.95	26.30	8.08
Work	31.41	6.25	32.08	5.62	31.66	6.04	33.09	5.33
Community	19.07	8.14	22.44	8.58	18.78	8.23	22.93	8.67
Home	29.12	7.97	32.79	6.49	29.15	6.89	33.21	6.86
Leisure	32.14	7.32	31.80	6.37	32.29	6.67	31.44	6.73
Value Expectations								
Study	32.17	11.24	35.60	10.30	31.32	11.13	36.08	10.77
Work	44.63	7.83	45.78	7.00	44.35	7.56	46.10	6.73
Community	28.57	12.07	32.42	11.94	27.82	11.86	32.82	12.25
Home	40.68	10.36	44.81	8.50	41.08	9.28	44.94	8.76
Leisure	44.63	9.83	43.89	8.60	44.56	8.72	43.69	9.04

* By permission of the Employment Support Services Branch, Canada Employment and Immigration Commission.

Table 13

Means and standard deviations for Canadian high school students: Francophones*

	10th Grade				12th Grade			
	Male $N = 179$		Female $N = 190$		Male $N = 179$		Female $N = 227$	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD
Participation								
Study	24.12	7.10	27.15	5.76	24.85	6.01	28.59	6.00
Work	24.13	6.12	25.54	5.64	23.74	6.82	24.33	6.67
Community	17.39	7.10	20.16	6.79	16.68	6.38	20.11	7.18
Home	21.75	6.52	25.26	6.10	20.10	6.21	24.95	6.58
Leisure	30.55	6.81	29.32	7.38	30.20	5.90	30.04	6.01
Commitment								
Study	25.59	7.67	30.39	5.64	27.42	6.31	30.73	6.16
Work	28.76	6.46	31.94	4.92	31.25	5.57	31.62	6.22
Community	20.56	8.03	24.39	7.34	20.58	7.51	24.34	7.92
Home	24.48	7.65	28.94	6.22	24.89	7.87	29.29	7.06
Leisure	31.24	6.75	30.24	7.53	31.63	6.06	30.88	6.34
Value Expectations								
Study	37.46	10.92	42.43	7.35	38.26	9.17	42.48	8.54
Work	42.50	8.05	45.71	6.48	44.98	7.22	45.53	8.29
Community	31.12	11.26	35.71	10.08	30.73	11.21	35.17	11.47
Home	35.77	10.79	41.48	8.20	36.27	10.78	41.50	9.34
Leisure	44.52	8.83	42.35	9.93	44.45	8.02	44.00	8.36

* By permission of the Employment Support Services Branch, Canada Employment and Immigration Commission.

Table 14

Means and standard deviations for Canadian college students: Anglophones*

	College			
	Male N = 208		Female N = 413	
	Mean	SD	Mean	SD
Participation				
Study	27.70	0.65	29.65	0.63
Work	24.55	0.61	24.22	0.67
Community	16.18	0.66	18.14	0.72
Home	24.55	0.62	26.94	0.65
Leisure	28.24	0.65	27.50	0.62
Commitment				
Study	29.23	0.66	30.50	0.68
Work	32.34	0.60	33.83	0.50
Community	21.81	0.80	24.65	0.81
Home	33.13	0.67	35.00	0.58
Leisure	30.13	0.67	30.18	0.65
Value Expectations				
Study	38.91	8.76	39.90	8.89
Work	45.08	6.83	46.23	6.15
Community	31.91	10.92	34.10	11.42
Home	43.90	8.55	45.88	7.87
Leisure	42.01	8.60	41.75	8.50

* By permission of the Employment Support Services Branch, Canada Employment and Immigration Commission.

Table 15

Means and standard deviations for Canadian adults: Anglophones and Francophones*

	Anglophones						Francophones					
	Total $N = 5160$		Male $N = 1803$		Female $N = 3357$		Total $N = 1222$		Male $N = 479$		Female $N = 743$	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD
Participation												
Study	23.95	7.34	23.60	7.29	24.14	7.36	23.60	7.23	23.21	7.39	23.86	7.12
Work	29.46	5.86	29.18	5.81	29.60	5.88	29.11	5.37	28.83	5.55	29.29	5.24
Community	18.76	7.52	18.19	7.36	19.06	7.60	17.16	6.89	17.43	7.27	16.99	6.64
Home	28.51	6.31	26.88	6.27	29.38	6.15	24.42	6.91	23.62	6.65	24.94	7.03
Leisure	26.85	6.32	26.38	6.58	27.11	6.17	26.25	6.34	26.11	6.50	26.34	6.24
Commitment												
Study	25.93	7.87	25.26	7.97	26.29	7.79	26.00	7.57	24.89	7.78	26.72	7.35
Work	34.13	5.30	33.82	5.53	34.30	5.17	33.03	5.56	32.38	5.92	33.44	5.29
Community	23.01	8.15	22.04	8.26	23.53	8.04	20.43	7.71	20.40	7.88	20.45	7.60
Home	35.47	5.87	34.45	6.34	36.02	5.53	28.11	8.27	27.76	8.01	28.34	8.43
Leisure	28.84	6.95	28.16	7.31	29.20	6.73	28.22	6.81	28.03	7.02	28.34	6.67
Value Expectations												
Study	34.68	10.37	34.34	10.46	34.85	10.33	35.95	10.53	35.07	11.10	36.51	10.11
Work	44.18	7.71	43.95	7.88	44.31	7.63	45.29	7.50	44.80	7.95	45.61	7.20
Community	31.44	11.20	30.58	11.30	31.92	11.12	30.04	11.31	29.88	11.48	30.14	11.21
Home	45.95	7.97	44.80	8.26	46.55	7.73	40.98	10.21	39.94	10.84	41.64	9.72
Leisure	40.05	9.03	39.42	9.41	40.39	8.81	40.22	9.53	40.31	9.60	40.17	9.49

* By permission of the Employment Support Services Branch, Canada Employment and Immigration Commission.

Table 16

Means and standard deviations for Yugoslavian high school students*

	10th Grade						12th Grade					
	Total $N = 923$		Male $N = 392$		Female $N = 531$		Total $N = 948$		Male $N = 460$		Female $N = 488$	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD
Participation												
Study	25.79	5.52	24.48	5.46	26.76	5.38	25.14	5.89	23.14	5.58	27.03	5.55
Work	19.69	7.08	20.17	7.08	19.33	7.06	20.65	6.97	22.01	6.67	19.37	6.99
Community	19.11	7.22	19.08	7.10	19.14	7.30	19.86	7.34	19.84	7.45	19.87	7.24
Home	23.23	5.78	21.11	5.30	24.80	5.63	23.74	5.78	21.52	5.39	25.83	5.33
Leisure	30.74	5.88	31.88	5.41	29.90	6.08	30.49	5.99	30.75	5.75	30.25	6.21
Commitment												
Study	27.22	5.90	25.75	6.03	28.31	5.57	26.00	6.13	24.25	6.05	27.65	5.73
Work	27.97	6.97	27.97	6.75	27.97	7.13	28.00	6.92	28.37	6.41	27.66	7.35
Community	23.69	7.69	23.03	7.57	24.18	7.74	23.14	7.64	22.34	7.71	23.90	7.51
Home	28.03	6.60	25.63	6.62	29.80	6.00	28.09	6.65	25.70	6.57	30.34	5.90
Leisure	32.88	5.79	33.94	5.47	32.10	5.90	32.44	5.73	32.83	5.54	32.06	5.88
Value Expectations												
Study	38.42	7.36	37.08	7.52	39.41	7.10	37.72	7.61	36.26	7.58	39.09	7.39
Work	40.54	9.50	40.68	8.77	40.44	10.01	40.43	9.83	40.80	8.54	40.07	10.91
Community	33.26	10.20	32.63	10.00	33.73	10.33	32.81	10.19	32.19	10.04	33.39	10.31
Home	39.48	7.94	37.40	8.12	41.02	7.45	39.72	8.00	37.77	8.14	41.56	7.41
Leisure	44.53	7.28	45.07	7.19	44.13	7.32	43.64	7.56	43.39	7.47	43.89	7.64

* By permission of Dr. Branimir Sverko, Professor of Psychology, University of Zagreb, Zagreb, Yugoslavia.

Table 17

Means and standard deviations for Yugoslavian college students*

	College					
	Total $N = 348$		Male $N = 119$		Female $N = 229$	
	Mean	SD	Mean	SD	Mean	SD
Participation						
Study	30.50	4.90	28.58	5.32	31.49	4.36
Work	16.54	5.65	17.22	5.92	16.19	5.49
Community	16.59	6.15	16.64	6.07	16.57	6.20
Home	21.08	5.55	18.14	5.23	22.60	5.08
Leisure	29.51	5.84	29.06	5.97	29.75	5.77
Commitment						
Study	29.87	5.42	27.57	5.91	31.07	4.74
Work	28.49	6.63	28.55	6.95	28.47	6.47
Community	20.36	7.09	20.03	7.26	20.54	7.01
Home	26.23	6.73	24.67	6.98	27.04	6.46
Leisure	31.94	5.16	31.77	5.73	32.02	4.85
Value Expectations						
Study	38.20	6.06	37.54	6.25	38.55	5.94
Work	41.29	7.79	40.66	7.94	41.61	7.71
Community	27.91	9.16	26.78	9.41	28.50	9.00
Home	36.65	7.84	35.70	8.43	37.15	7.49
Leisure	42.26	6.59	40.99	7.03	42.91	6.26

* By permission of Dr. Branimir Sverko, Professor of Psychology, University of Zagreb, Zagreb, Yugoslavia.

Table 18

Means and standard deviations for Yugoslavian adults*

	Adult					
	Total N = 344		Male N = 193		Female N = 151	
	Mean	SD	Mean	SD	Mean	SD
Participation						
Study	20.93	7.78	21.92	7.27	19.67	8.24
Work	30.44	4.98	30.49	5.04	30.38	4.91
Community	19.75	7.10	20.84	7.04	18.35	7.00
Home	25.80	5.96	23.91	5.78	28.21	5.30
Leisure	25.93	6.67	26.01	6.68	25.83	6.67
Commitment						
Study	24.80	7.81	25.41	7.43	24.02	8.22
Work	33.53	5.15	32.92	5.54	34.32	4.50
Community	22.46	7.98	23.17	7.94	21.55	7.97
Home	31.47	6.52	29.90	6.87	33.47	5.45
Leisure	29.58	6.33	29.64	6.22	29.49	6.49
Value Expectations						
Study	33.16	9.98	34.46	9.09	31.50	10.81
Work	41.92	7.41	42.46	7.23	41.25	7.61
Community	29.31	10.40	30.44	10.11	27.87	10.63
Home	40.62	7.92	39.78	8.35	41.70	7.21
Leisure	38.93	8.12	39.44	7.89	38.29	8.39

* By permission of Dr. Branimir Sverko, Professor of Psychology, University of Zagreb, Zagreb, Yugoslavia.

Table 19

Means and standard deviations for Portuguese high school students*

	10th Grade						12th Grade					
	Total N = 1199		Male N = 586		Female N = 613		Total N = 1189		Male N = 451		Female N = 738	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD
Participation												
Study	27.41	5.29	27.20	5.28	27.65	5.32	28.69	5.24	27.52	5.21	29.39	5.14
Work	17.86	5.71	18.39	5.91	17.35	5.46	17.71	5.66	17.80	5.82	17.66	5.56
Community	17.16	6.58	17.23	6.94	17.13	6.22	16.69	6.30	16.30	6.35	16.93	6.26
Home	19.70	5.42	19.01	5.54	20.35	5.22	19.56	5.21	17.89	5.03	20.56	5.05
Leisure	29.33	6.78	29.67	7.03	28.99	6.53	27.65	6.35	28.26	6.25	27.28	6.39
Commitment												
Study	29.36	6.16	29.15	6.19	29.60	6.14	30.40	6.55	29.47	6.86	30.95	6.32
Work	29.87	5.55	29.96	5.59	29.81	5.58	31.20	5.50	30.68	6.05	31.51	5.12
Community	25.63	7.12	25.42	7.43	25.86	6.80	25.67	7.01	24.88	7.44	26.13	6.70
Home	24.42	6.91	23.78	7.28	25.02	6.47	23.83	6.71	22.18	6.81	24.82	6.44
Leisure	30.13	6.87	30.34	6.86	29.90	6.89	28.89	6.73	28.88	6.95	28.89	6.60
Value Expectations												
Study	40.06	8.53	40.01	8.49	40.13	8.58	39.00	8.61	38.04	8.70	39.57	8.53
Work	42.88	8.07	43.19	7.84	42.57	8.28	42.12	8.10	41.44	8.34	42.55	7.93
Community	35.40	10.16	35.09	10.30	35.72	10.01	33.96	9.91	33.04	9.94	34.52	9.86
Home	35.25	9.10	34.24	9.09	36.18	9.00	34.17	8.79	32.16	9.31	35.41	8.23
Leisure	41.72	9.28	42.02	9.12	41.39	9.43	39.88	8.83	39.75	9.27	39.98	8.57

* By permission of Dr. J. Ferreira-Marques, Professor of Psychology and Education, University of Lisbon, Lisbon, Portugal.